GW - ___028___

2018
AGWMR
(3 of 3)

2019

ANALYTICAL REPORT

April 12, 2018

TRC Solutions - Austin, TX

Sample Delivery Group: L982870
Samples Received: 04/04/2018
Project Number: 294318.0000.0000.
Description: REST Spring 2018
Site: REST (NAVAJO-ARTESIA)

Report To: Julie Speer
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Entire Report Reviewed By:

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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SAMPLE SUMMARY

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Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 09:35	04/04/18 08:45

MW-125 L982870-01 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095025	1	04/10/18 16:10	04/10/18 16:31	EG
Wet Chemistry by Method 353.2	WG1093665	1	04/05/18 18:21	04/05/18 18:21	JER
Wet Chemistry by Method 9056A	WG1093514	1	04/05/18 02:27	04/05/18 02:27	MAJ
Wet Chemistry by Method 9056A	WG1093514	20	04/05/18 02:40	04/05/18 02:40	MAJ
Wet Chemistry by Method 9056A	WG1093514	50	04/05/18 12:52	04/05/18 12:52	MAJ
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/06/18 18:58	WBD
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/09/18 11:32	JPD
Metals (ICPMS) by Method 6020	WG1093709	1	04/05/18 07:04	04/05/18 16:46	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1093787	1	04/05/18 07:34	04/05/18 07:34	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1093960	1	04/05/18 15:22	04/05/18 15:22	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1093593	1	04/04/18 16:22	04/06/18 05:29	LM

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 10:15	04/04/18 08:45

MW-116 L982870-02 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095025	1	04/10/18 16:10	04/10/18 16:31	EG
Wet Chemistry by Method 353.2	WG1093665	1	04/05/18 18:22	04/05/18 18:22	JER
Wet Chemistry by Method 9056A	WG1093514	1	04/05/18 02:54	04/05/18 02:54	MAJ
Wet Chemistry by Method 9056A	WG1093514	20	04/05/18 03:07	04/05/18 03:07	MAJ
Wet Chemistry by Method 9056A	WG1093514	50	04/05/18 13:05	04/05/18 13:05	MAJ
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/06/18 19:20	WBD
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/09/18 12:01	JPD
Metals (ICPMS) by Method 6020	WG1093709	1	04/05/18 07:04	04/05/18 17:01	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1093787	1	04/05/18 07:56	04/05/18 07:56	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1093960	1	04/05/18 15:43	04/05/18 15:43	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1093593	1	04/04/18 16:22	04/06/18 05:49	LM

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 19:25	04/04/18 08:45

UG-2 L982870-03 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095025	1	04/10/18 16:10	04/10/18 16:31	EG
Wet Chemistry by Method 353.2	WG1093665	5	04/05/18 17:50	04/05/18 17:50	JER
Wet Chemistry by Method 4500CN E-2011	WG1093922	1	04/05/18 20:28	04/06/18 08:27	KK
Wet Chemistry by Method 9056A	WG1093514	1	04/05/18 03:21	04/05/18 03:21	MAJ
Wet Chemistry by Method 9056A	WG1093514	20	04/05/18 03:34	04/05/18 03:34	MAJ
Mercury by Method 7470A	WG1093744	1	04/04/18 22:06	04/05/18 10:42	ABL
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 18:29	EL
Metals (ICP) by Method 6010B	WG1093624	1	04/04/18 17:16	04/04/18 22:26	ST
Metals (ICP) by Method 6010B	WG1093778	1	04/05/18 14:38	04/05/18 19:10	ST
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/06/18 19:24	WBD
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/09/18 12:05	JPD
Metals (ICPMS) by Method 6020	WG1093709	1	04/05/18 07:04	04/05/18 17:04	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1093787	1	04/05/18 08:18	04/05/18 08:18	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1093960	1	04/05/18 16:06	04/05/18 16:06	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1093593	1	04/04/18 16:22	04/06/18 06:10	LM

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/02/18 17:00	04/04/18 08:45

UG-3R L982870-04 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1094508	1	04/07/18 15:43	04/07/18 16:27	MMF
Wet Chemistry by Method 353.2	WG1093665	1	04/05/18 17:51	04/05/18 17:51	JER
Wet Chemistry by Method 4500CN E-2011	WG1093922	1	04/05/18 20:28	04/06/18 08:28	KK
Wet Chemistry by Method 9056A	WG1093667	1	04/05/18 01:58	04/05/18 01:58	CSU
Wet Chemistry by Method 9056A	WG1094105	20	04/05/18 17:20	04/05/18 17:20	DR
Mercury by Method 7470A	WG1093744	1	04/04/18 22:06	04/05/18 10:51	ABL
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 18:31	EL
Metals (ICP) by Method 6010B	WG1093624	1	04/04/18 17:16	04/04/18 22:30	ST
Metals (ICP) by Method 6010B	WG1093778	1	04/05/18 14:38	04/05/18 19:12	ST
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/06/18 19:44	WBD
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/09/18 12:10	JPD
Metals (ICPMS) by Method 6020	WG1093709	1	04/05/18 07:04	04/05/18 17:23	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1093787	1	04/05/18 08:41	04/05/18 08:41	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1093960	1	04/05/18 16:25	04/05/18 16:25	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1093593	1	04/04/18 16:22	04/06/18 06:30	LM

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/02/18 17:50	04/04/18 08:45

UG-1 L982870-05 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1094508	1	04/07/18 15:43	04/07/18 16:27	MMF
Wet Chemistry by Method 353.2	WG1093665	5	04/05/18 17:53	04/05/18 17:53	JER
Wet Chemistry by Method 4500CN E-2011	WG1093922	1	04/05/18 20:28	04/06/18 08:29	KK
Wet Chemistry by Method 9056A	WG1093667	1	04/05/18 02:29	04/05/18 02:29	CSU
Wet Chemistry by Method 9056A	WG1093667	20	04/05/18 02:45	04/05/18 02:45	MAJ
Wet Chemistry by Method 9056A	WG1094105	20	04/05/18 17:33	04/05/18 17:33	DR
Mercury by Method 7470A	WG1093744	1	04/04/18 22:06	04/05/18 10:58	ABL
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 18:33	EL
Metals (ICP) by Method 6010B	WG1093624	1	04/04/18 17:16	04/04/18 22:34	ST
Metals (ICP) by Method 6010B	WG1093778	1	04/05/18 14:38	04/05/18 19:15	ST
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/06/18 19:48	WBD
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/09/18 12:15	JPD
Metals (ICPMS) by Method 6020	WG1093709	1	04/05/18 07:04	04/05/18 17:27	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1093787	1	04/05/18 09:03	04/05/18 09:03	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1093960	1	04/05/18 16:47	04/05/18 16:47	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1093593	1	04/04/18 16:22	04/06/18 06:50	LM

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/02/18 18:35	04/04/18 08:45

UG-4 L982870-06 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1094508	1	04/07/18 15:43	04/07/18 16:27	MMF
Wet Chemistry by Method 353.2	WG1093665	1	04/05/18 17:58	04/05/18 17:58	JER
Wet Chemistry by Method 4500CN E-2011	WG1093922	1	04/05/18 20:28	04/06/18 08:30	KK
Wet Chemistry by Method 9056A	WG1093667	1	04/05/18 03:00	04/05/18 03:00	CSU
Wet Chemistry by Method 9056A	WG1093667	20	04/05/18 03:15	04/05/18 03:15	MAJ
Wet Chemistry by Method 9056A	WG1094105	50	04/05/18 17:46	04/05/18 17:46	DR
Mercury by Method 7470A	WG1093744	1	04/04/18 22:06	04/05/18 11:01	ABL
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 18:36	EL
Metals (ICP) by Method 6010B	WG1093624	1	04/04/18 17:16	04/04/18 22:38	ST
Metals (ICP) by Method 6010B	WG1093778	1	04/05/18 14:38	04/05/18 18:59	ST
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/06/18 19:53	WBD
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/09/18 12:20	JPD

	Collected by	Collected date/time	Received date/time
UG-4 L982870-06 GW	Scott Ude/HMI Team	04/02/18 18:35	04/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1093709	1	04/05/18 07:04	04/05/18 17:31	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1093787	1	04/05/18 09:25	04/05/18 09:25	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1093960	1	04/05/18 17:08	04/05/18 17:08	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1093593	1	04/04/18 16:22	04/06/18 07:10	LM

CASE NARRATIVE

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3900	J3	2.82	10.0	1	04/10/2018 16:31	WG1095025

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.213		0.0197	0.100	1	04/05/2018 18:21	WG1093665

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	337		1.04	20.0	20	04/05/2018 02:40	WG1093514
Fluoride	1.32		0.00990	0.100	1	04/05/2018 02:27	WG1093514
Sulfate	2680		3.87	250	50	04/05/2018 12:52	WG1093514

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00440		0.000250	0.00200	1	04/05/2018 16:46	WG1093709
Arsenic,Dissolved	0.00345		0.000250	0.00200	1	04/06/2018 18:58	WG1093627
Barium	0.00924		0.000360	0.00500	1	04/05/2018 16:46	WG1093709
Barium,Dissolved	0.00760		0.000360	0.00500	1	04/06/2018 18:58	WG1093627
Calcium	548	V	0.0460	1.00	1	04/05/2018 16:46	WG1093709
Chromium	U		0.000540	0.00200	1	04/05/2018 16:46	WG1093709
Chromium,Dissolved	U		0.000540	0.00200	1	04/09/2018 11:32	WG1093627
Iron	0.0793	J	0.0150	0.100	1	04/05/2018 16:46	WG1093709
Iron,Dissolved	U		0.0150	0.100	1	04/06/2018 18:58	WG1093627
Lead	U		0.000240	0.00200	1	04/05/2018 16:46	WG1093709
Lead,Dissolved	U		0.000240	0.00200	1	04/06/2018 18:58	WG1093627
Manganese	0.393		0.000250	0.00500	1	04/05/2018 16:46	WG1093709
Manganese,Dissolved	0.398		0.000250	0.00500	1	04/06/2018 18:58	WG1093627
Potassium	1.28		0.0370	1.00	1	04/05/2018 16:46	WG1093709
Selenium	0.00275		0.000380	0.00200	1	04/05/2018 16:46	WG1093709
Selenium,Dissolved	0.00261		0.000380	0.00200	1	04/06/2018 18:58	WG1093627
Sodium	234	V	0.110	1.00	1	04/05/2018 16:46	WG1093709

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/05/2018 07:34	WG1093787
(S) a,a,a-Trifluorotoluene(FID)	*97.0*			*77.0-122*		*04/05/2018 07:34*	WG1093787

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/05/2018 15:22	WG1093960
Benzene	U		0.000331	0.00100	1	04/05/2018 15:22	WG1093960
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 15:22	WG1093960
Bromoform	U		0.000469	0.00100	1	04/05/2018 15:22	WG1093960
Bromomethane	U		0.000866	0.00500	1	04/05/2018 15:22	WG1093960
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 15:22	WG1093960
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 15:22	WG1093960
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 15:22	WG1093960
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 15:22	WG1093960

1 Cp
2 Tc
3 Ss
4 Cn
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Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 15:22	WG1093960
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 15:22	WG1093960
Chloroethane	U		0.000453	0.00500	1	04/05/2018 15:22	WG1093960
Chloroform	U		0.000324	0.00500	1	04/05/2018 15:22	WG1093960
Chloromethane	U		0.000276	0.00250	1	04/05/2018 15:22	WG1093960
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 15:22	WG1093960
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 15:22	WG1093960
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 15:22	WG1093960
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 15:22	WG1093960
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 15:22	WG1093960
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 15:22	WG1093960
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 15:22	WG1093960
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 15:22	WG1093960
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 15:22	WG1093960
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 15:22	WG1093960
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 15:22	WG1093960
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 15:22	WG1093960
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 15:22	WG1093960
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 15:22	WG1093960
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 15:22	WG1093960
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 15:22	WG1093960
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 15:22	WG1093960
Naphthalene	U		0.00100	0.00500	1	04/05/2018 15:22	WG1093960
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 15:22	WG1093960
Styrene	U		0.000307	0.00100	1	04/05/2018 15:22	WG1093960
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 15:22	WG1093960
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 15:22	WG1093960
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 15:22	WG1093960
Toluene	U		0.000412	0.00100	1	04/05/2018 15:22	WG1093960
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 15:22	WG1093960
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 15:22	WG1093960
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 15:22	WG1093960
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 15:22	WG1093960
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 15:22	WG1093960
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 15:22	WG1093960
o-Xylene	U		0.000341	0.00100	1	04/05/2018 15:22	WG1093960
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 15:22	WG1093960
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 15:22	WG1093960
(S) Toluene-d8	*96.2*			*80.0-120*		*04/05/2018 15:22*	WG1093960
(S) Dibromofluoromethane	*109*			*76.0-123*		*04/05/2018 15:22*	WG1093960
(S) 4-Bromofluorobenzene	*91.1*			*80.0-120*		*04/05/2018 15:22*	WG1093960

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0475	J	0.0247	0.100	1	04/06/2018 05:29	WG1093593
(S) o-Terphenyl	*109*			*31.0-160*		*04/06/2018 05:29*	WG1093593

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2950		2.82	10.0	1	04/10/2018 16:31	WG1095025

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.851		0.0197	0.100	1	04/05/2018 18:22	WG1093665

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	198		1.04	20.0	20	04/05/2018 03:07	WG1093514
Fluoride	2.55		0.00990	0.100	1	04/05/2018 02:54	WG1093514
Sulfate	2040		3.87	250	50	04/05/2018 13:05	WG1093514

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00492		0.000250	0.00200	1	04/05/2018 17:01	WG1093709
Arsenic,Dissolved	0.00431		0.000250	0.00200	1	04/06/2018 19:20	WG1093627
Barium	0.00839		0.000360	0.00500	1	04/05/2018 17:01	WG1093709
Barium,Dissolved	0.00837		0.000360	0.00500	1	04/06/2018 19:20	WG1093627
Calcium	592		0.0460	1.00	1	04/05/2018 17:01	WG1093709
Chromium	U		0.000540	0.00200	1	04/05/2018 17:01	WG1093709
Chromium,Dissolved	U		0.000540	0.00200	1	04/09/2018 12:01	WG1093627
Iron	0.0594	J	0.0150	0.100	1	04/05/2018 17:01	WG1093709
Iron,Dissolved	U		0.0150	0.100	1	04/06/2018 19:20	WG1093627
Lead	U		0.000240	0.00200	1	04/05/2018 17:01	WG1093709
Lead,Dissolved	0.000315	J	0.000240	0.00200	1	04/06/2018 19:20	WG1093627
Manganese	0.0226		0.000250	0.00500	1	04/05/2018 17:01	WG1093709
Manganese,Dissolved	0.0218		0.000250	0.00500	1	04/06/2018 19:20	WG1093627
Potassium	3.16		0.0370	1.00	1	04/05/2018 17:01	WG1093709
Selenium	0.00743		0.000380	0.00200	1	04/05/2018 17:01	WG1093709
Selenium,Dissolved	0.00602		0.000380	0.00200	1	04/06/2018 19:20	WG1093627
Sodium	154		0.110	1.00	1	04/05/2018 17:01	WG1093709

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/05/2018 07:56	WG1093787
(S) a,a,a-Trifluorotoluene(FID)	*96.8*			*77.0-122*		*04/05/2018 07:56*	WG1093787

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/05/2018 15:43	WG1093960
Benzene	U		0.000331	0.00100	1	04/05/2018 15:43	WG1093960
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 15:43	WG1093960
Bromoform	U		0.000469	0.00100	1	04/05/2018 15:43	WG1093960
Bromomethane	U		0.000866	0.00500	1	04/05/2018 15:43	WG1093960
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 15:43	WG1093960
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 15:43	WG1093960
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 15:43	WG1093960
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 15:43	WG1093960

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 15:43	WG1093960
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 15:43	WG1093960
Chloroethane	U		0.000453	0.00500	1	04/05/2018 15:43	WG1093960
Chloroform	U		0.000324	0.00500	1	04/05/2018 15:43	WG1093960
Chloromethane	U		0.000276	0.00250	1	04/05/2018 15:43	WG1093960
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 15:43	WG1093960
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 15:43	WG1093960
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 15:43	WG1093960
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 15:43	WG1093960
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 15:43	WG1093960
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 15:43	WG1093960
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 15:43	WG1093960
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 15:43	WG1093960
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 15:43	WG1093960
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 15:43	WG1093960
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 15:43	WG1093960
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 15:43	WG1093960
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 15:43	WG1093960
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 15:43	WG1093960
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 15:43	WG1093960
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 15:43	WG1093960
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 15:43	WG1093960
Naphthalene	U		0.00100	0.00500	1	04/05/2018 15:43	WG1093960
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 15:43	WG1093960
Styrene	U		0.000307	0.00100	1	04/05/2018 15:43	WG1093960
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 15:43	WG1093960
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 15:43	WG1093960
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 15:43	WG1093960
Toluene	U		0.000412	0.00100	1	04/05/2018 15:43	WG1093960
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 15:43	WG1093960
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 15:43	WG1093960
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 15:43	WG1093960
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 15:43	WG1093960
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 15:43	WG1093960
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 15:43	WG1093960
o-Xylene	U		0.000341	0.00100	1	04/05/2018 15:43	WG1093960
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 15:43	WG1093960
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 15:43	WG1093960
(S) Toluene-d8	*96.5*			*80.0-120*		*04/05/2018 15:43*	WG1093960
(S) Dibromofluoromethane	*108*			*76.0-123*		*04/05/2018 15:43*	WG1093960
(S) 4-Bromofluorobenzene	*90.4*			*80.0-120*		*04/05/2018 15:43*	WG1093960

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0353	J	0.0247	0.100	1	04/06/2018 05:49	WG1093593
(S) o-Terphenyl	*97.2*			*31.0-160*		*04/06/2018 05:49*	WG1093593

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1810		2.82	10.0	1	04/10/2018 16:31	WG1095025

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	14.1		0.0985	0.500	5	04/05/2018 17:50	WG1093665

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/06/2018 08:27	WG1093922

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	72.5		0.0519	1.00	1	04/05/2018 03:21	WG1093514
Fluoride	1.62		0.00990	0.100	1	04/05/2018 03:21	WG1093514
Sulfate	1050		1.55	100	20	04/05/2018 03:34	WG1093514

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	0.0000684	B J	0.0000490	0.000200	1	04/08/2018 18:29	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/05/2018 10:42	WG1093744

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.303		0.0126	0.200	1	04/04/2018 22:26	WG1093624
Boron,Dissolved	0.421		0.0126	0.200	1	04/05/2018 19:10	WG1093778

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00236	B	0.000250	0.00200	1	04/05/2018 17:04	WG1093709
Arsenic,Dissolved	0.00194	J	0.000250	0.00200	1	04/06/2018 19:24	WG1093627
Barium	0.0142		0.000360	0.00500	1	04/05/2018 17:04	WG1093709
Barium,Dissolved	0.0135		0.000360	0.00500	1	04/06/2018 19:24	WG1093627
Cadmium	U		0.000160	0.00100	1	04/05/2018 17:04	WG1093709
Cadmium,Dissolved	U		0.000160	0.00100	1	04/06/2018 19:24	WG1093627
Calcium	321		0.0460	1.00	1	04/05/2018 17:04	WG1093709
Chromium	U		0.000540	0.00200	1	04/05/2018 17:04	WG1093709
Chromium,Dissolved	U		0.000540	0.00200	1	04/09/2018 12:05	WG1093627
Cobalt	U		0.000260	0.00200	1	04/05/2018 17:04	WG1093709
Cobalt,Dissolved	U		0.000260	0.00200	1	04/06/2018 19:24	WG1093627
Iron	0.0153	J	0.0150	0.100	1	04/05/2018 17:04	WG1093709
Iron,Dissolved	U		0.0150	0.100	1	04/06/2018 19:24	WG1093627
Lead	U		0.000240	0.00200	1	04/05/2018 17:04	WG1093709
Lead,Dissolved	U		0.000240	0.00200	1	04/06/2018 19:24	WG1093627
Manganese	0.00678		0.000250	0.00500	1	04/05/2018 17:04	WG1093709
Manganese,Dissolved	U		0.000250	0.00500	1	04/06/2018 19:24	WG1093627
Nickel	0.00188	J	0.000350	0.00200	1	04/05/2018 17:04	WG1093709
Nickel,Dissolved	0.00146	J	0.000350	0.00200	1	04/06/2018 19:24	WG1093627

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	1.33		0.0370	1.00	1	04/05/2018 17:04	WG1093709
Selenium	0.00710		0.000380	0.00200	1	04/05/2018 17:04	WG1093709
Selenium,Dissolved	0.00622		0.000380	0.00200	1	04/06/2018 19:24	WG1093627
Sodium	85.4		0.110	1.00	1	04/05/2018 17:04	WG1093709
Uranium	0.0131		0.000330	0.0100	1	04/05/2018 17:04	WG1093709
Uranium,Dissolved	0.0131		0.000330	0.0100	1	04/06/2018 19:24	WG1093627
Vanadium	0.0176		0.000180	0.00500	1	04/05/2018 17:04	WG1093709
Vanadium,Dissolved	0.0158		0.000180	0.00500	1	04/06/2018 19:24	WG1093627

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/05/2018 08:18	WG1093787
(S) a,a,a-Trifluorotoluene(FID)	*97.8*			*77.0-122*		*04/05/2018 08:18*	WG1093787

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/05/2018 16:06	WG1093960
Benzene	U		0.000331	0.00100	1	04/05/2018 16:06	WG1093960
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 16:06	WG1093960
Bromoform	U		0.000469	0.00100	1	04/05/2018 16:06	WG1093960
Bromomethane	U		0.000866	0.00500	1	04/05/2018 16:06	WG1093960
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 16:06	WG1093960
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 16:06	WG1093960
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 16:06	WG1093960
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 16:06	WG1093960
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 16:06	WG1093960
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 16:06	WG1093960
Chloroethane	U		0.000453	0.00500	1	04/05/2018 16:06	WG1093960
Chloroform	U		0.000324	0.00500	1	04/05/2018 16:06	WG1093960
Chloromethane	U		0.000276	0.00250	1	04/05/2018 16:06	WG1093960
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 16:06	WG1093960
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 16:06	WG1093960
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 16:06	WG1093960
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 16:06	WG1093960
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 16:06	WG1093960
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 16:06	WG1093960
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 16:06	WG1093960
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 16:06	WG1093960
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 16:06	WG1093960
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 16:06	WG1093960
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 16:06	WG1093960
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 16:06	WG1093960
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 16:06	WG1093960
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 16:06	WG1093960
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 16:06	WG1093960
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 16:06	WG1093960
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 16:06	WG1093960
Naphthalene	U		0.00100	0.00500	1	04/05/2018 16:06	WG1093960
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 16:06	WG1093960
Styrene	U		0.000307	0.00100	1	04/05/2018 16:06	WG1093960
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 16:06	WG1093960
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 16:06	WG1093960
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 16:06	WG1093960

UG-2
Collected date/time: 04/03/18 19:25

SAMPLE RESULTS - 03

L982870

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Toluene	U		0.000412	0.00100	1	04/05/2018 16:06	WG1093960
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 16:06	WG1093960
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 16:06	WG1093960
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 16:06	WG1093960
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 16:06	WG1093960
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 16:06	WG1093960
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 16:06	WG1093960
o-Xylene	U		0.000341	0.00100	1	04/05/2018 16:06	WG1093960
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 16:06	WG1093960
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 16:06	WG1093960
(S) Toluene-d8	*96.9*			*80.0-120*		*04/05/2018 16:06*	WG1093960
(S) Dibromofluoromethane	*110*			*76.0-123*		*04/05/2018 16:06*	WG1093960
(S) 4-Bromofluorobenzene	*90.4*			*80.0-120*		*04/05/2018 16:06*	WG1093960

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/06/2018 06:10	WG1093593
(S) o-Terphenyl	*105*			*31.0-160*		*04/06/2018 06:10*	WG1093593

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2190		2.82	10.0	1	04/07/2018 16:27	WG1094508

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	1.68		0.0197	0.100	1	04/05/2018 17:51	WG1093665

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/06/2018 08:28	WG1093922

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	40.8		0.0519	1.00	1	04/05/2018 01:58	WG1093667
Fluoride	0.599		0.00990	0.100	1	04/05/2018 01:58	WG1093667
Sulfate	1470		1.55	100	20	04/05/2018 17:20	WG1094105

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	04/08/2018 18:31	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/05/2018 10:51	WG1093744

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.470		0.0126	0.200	1	04/04/2018 22:30	WG1093624
Boron,Dissolved	0.597		0.0126	0.200	1	04/05/2018 19:12	WG1093778

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00202	B	0.000250	0.00200	1	04/05/2018 17:23	WG1093709
Arsenic,Dissolved	0.00161	J	0.000250	0.00200	1	04/06/2018 19:44	WG1093627
Barium	0.0170		0.000360	0.00500	1	04/05/2018 17:23	WG1093709
Barium,Dissolved	0.0167		0.000360	0.00500	1	04/06/2018 19:44	WG1093627
Cadmium	U		0.000160	0.00100	1	04/05/2018 17:23	WG1093709
Cadmium,Dissolved	U		0.000160	0.00100	1	04/06/2018 19:44	WG1093627
Calcium	418		0.0460	1.00	1	04/05/2018 17:23	WG1093709
Chromium	U		0.000540	0.00200	1	04/05/2018 17:23	WG1093709
Chromium,Dissolved	0.000691	J	0.000540	0.00200	1	04/09/2018 12:10	WG1093627
Cobalt	U		0.000260	0.00200	1	04/05/2018 17:23	WG1093709
Cobalt,Dissolved	U		0.000260	0.00200	1	04/06/2018 19:44	WG1093627
Iron	0.0377	J	0.0150	0.100	1	04/05/2018 17:23	WG1093709
Iron,Dissolved	0.0186	B J	0.0150	0.100	1	04/06/2018 19:44	WG1093627
Lead	U		0.000240	0.00200	1	04/05/2018 17:23	WG1093709
Lead,Dissolved	U		0.000240	0.00200	1	04/06/2018 19:44	WG1093627
Manganese	0.000713	J	0.000250	0.00500	1	04/05/2018 17:23	WG1093709
Manganese,Dissolved	0.000475	J	0.000250	0.00500	1	04/06/2018 19:44	WG1093627
Nickel	0.00104	J	0.000350	0.00200	1	04/05/2018 17:23	WG1093709
Nickel,Dissolved	0.000962	J	0.000350	0.00200	1	04/06/2018 19:44	WG1093627

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	1.67		0.0370	1.00	1	04/05/2018 17:23	WG1093709
Selenium	0.00418		0.000380	0.00200	1	04/05/2018 17:23	WG1093709
Selenium,Dissolved	0.00298		0.000380	0.00200	1	04/06/2018 19:44	WG1093627
Sodium	73.6		0.110	1.00	1	04/05/2018 17:23	WG1093709
Uranium	0.0124		0.000330	0.0100	1	04/05/2018 17:23	WG1093709
Uranium,Dissolved	0.0126		0.000330	0.0100	1	04/06/2018 19:44	WG1093627
Vanadium	0.0111		0.000180	0.00500	1	04/05/2018 17:23	WG1093709
Vanadium,Dissolved	0.00919		0.000180	0.00500	1	04/06/2018 19:44	WG1093627

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/05/2018 08:41	WG1093787
(S) a,a,a-Trifluorotoluene(FID)	*97.5*			*77.0-122*		*04/05/2018 08:41*	WG1093787

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/05/2018 16:25	WG1093960
Benzene	U		0.000331	0.00100	1	04/05/2018 16:25	WG1093960
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 16:25	WG1093960
Bromoform	U		0.000469	0.00100	1	04/05/2018 16:25	WG1093960
Bromomethane	U		0.000866	0.00500	1	04/05/2018 16:25	WG1093960
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 16:25	WG1093960
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 16:25	WG1093960
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 16:25	WG1093960
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 16:25	WG1093960
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 16:25	WG1093960
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 16:25	WG1093960
Chloroethane	U		0.000453	0.00500	1	04/05/2018 16:25	WG1093960
Chloroform	U		0.000324	0.00500	1	04/05/2018 16:25	WG1093960
Chloromethane	U		0.000276	0.00250	1	04/05/2018 16:25	WG1093960
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 16:25	WG1093960
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 16:25	WG1093960
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 16:25	WG1093960
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 16:25	WG1093960
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 16:25	WG1093960
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 16:25	WG1093960
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 16:25	WG1093960
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 16:25	WG1093960
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 16:25	WG1093960
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 16:25	WG1093960
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 16:25	WG1093960
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 16:25	WG1093960
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 16:25	WG1093960
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 16:25	WG1093960
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 16:25	WG1093960
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 16:25	WG1093960
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 16:25	WG1093960
Naphthalene	U		0.00100	0.00500	1	04/05/2018 16:25	WG1093960
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 16:25	WG1093960
Styrene	U		0.000307	0.00100	1	04/05/2018 16:25	WG1093960
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 16:25	WG1093960
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 16:25	WG1093960
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 16:25	WG1093960

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Toluene	U		0.000412	0.00100	1	04/05/2018 16:25	WG1093960
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 16:25	WG1093960
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 16:25	WG1093960
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 16:25	WG1093960
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 16:25	WG1093960
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 16:25	WG1093960
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 16:25	WG1093960
o-Xylene	U		0.000341	0.00100	1	04/05/2018 16:25	WG1093960
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 16:25	WG1093960
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 16:25	WG1093960
(S) Toluene-d8	*96.4*			*80.0-120*		*04/05/2018 16:25*	WG1093960
(S) Dibromofluoromethane	*109*			*76.0-123*		*04/05/2018 16:25*	WG1093960
(S) 4-Bromofluorobenzene	*90.0*			*80.0-120*		*04/05/2018 16:25*	WG1093960

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/06/2018 06:30	WG1093593
(S) o-Terphenyl	*108*			*31.0-160*		*04/06/2018 06:30*	WG1093593

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2600		2.82	10.0	1	04/07/2018 16:27	WG1094508

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	6.73		0.0985	0.500	5	04/05/2018 17:53	WG1093665

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	0.00224	B J	0.00180	0.00500	1	04/06/2018 08:29	WG1093922

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	107		1.04	20.0	20	04/05/2018 02:45	WG1093667
Fluoride	0.751		0.00990	0.100	1	04/05/2018 02:29	WG1093667
Sulfate	1670		1.55	100	20	04/05/2018 17:33	WG1094105

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.0000552	B J	0.0000490	0.000200	1	04/08/2018 18:33	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/05/2018 10:58	WG1093744

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.668		0.0126	0.200	1	04/04/2018 22:34	WG1093624
Boron,Dissolved	0.756		0.0126	0.200	1	04/05/2018 19:15	WG1093778

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00177	B J	0.000250	0.00200	1	04/05/2018 17:27	WG1093709
Arsenic,Dissolved	0.00131	J	0.000250	0.00200	1	04/06/2018 19:48	WG1093627
Barium	0.0122		0.000360	0.00500	1	04/05/2018 17:27	WG1093709
Barium,Dissolved	0.0119		0.000360	0.00500	1	04/06/2018 19:48	WG1093627
Cadmium	U		0.000160	0.00100	1	04/05/2018 17:27	WG1093709
Cadmium,Dissolved	U		0.000160	0.00100	1	04/06/2018 19:48	WG1093627
Calcium	434		0.0460	1.00	1	04/05/2018 17:27	WG1093709
Chromium	U		0.000540	0.00200	1	04/05/2018 17:27	WG1093709
Chromium,Dissolved	0.000981	J	0.000540	0.00200	1	04/09/2018 12:15	WG1093627
Cobalt	0.00130	J	0.000260	0.00200	1	04/05/2018 17:27	WG1093709
Cobalt,Dissolved	0.00125	J	0.000260	0.00200	1	04/06/2018 19:48	WG1093627
Iron	U		0.0150	0.100	1	04/05/2018 17:27	WG1093709
Iron,Dissolved	U		0.0150	0.100	1	04/06/2018 19:48	WG1093627
Lead	U		0.000240	0.00200	1	04/05/2018 17:27	WG1093709
Lead,Dissolved	U		0.000240	0.00200	1	04/06/2018 19:48	WG1093627
Manganese	0.000486	J	0.000250	0.00500	1	04/05/2018 17:27	WG1093709
Manganese,Dissolved	0.000405	J	0.000250	0.00500	1	04/06/2018 19:48	WG1093627
Nickel	0.00188	J	0.000350	0.00200	1	04/05/2018 17:27	WG1093709
Nickel,Dissolved	0.00218		0.000350	0.00200	1	04/06/2018 19:48	WG1093627

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	2.12		0.0370	1.00	1	04/05/2018 17:27	WG1093709
Selenium	0.00692		0.000380	0.00200	1	04/05/2018 17:27	WG1093709
Selenium,Dissolved	0.00579		0.000380	0.00200	1	04/06/2018 19:48	WG1093627
Sodium	98.3		0.110	1.00	1	04/05/2018 17:27	WG1093709
Uranium	0.0263		0.000330	0.0100	1	04/05/2018 17:27	WG1093709
Uranium,Dissolved	0.0273		0.000330	0.0100	1	04/06/2018 19:48	WG1093627
Vanadium	0.0153		0.000180	0.00500	1	04/05/2018 17:27	WG1093709
Vanadium,Dissolved	0.0132		0.000180	0.00500	1	04/06/2018 19:48	WG1093627

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/05/2018 09:03	WG1093787
(S) a,a,a-Trifluorotoluene(FID)	*97.4*			*77.0-122*		*04/05/2018 09:03*	WG1093787

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/05/2018 16:47	WG1093960
Benzene	U		0.000331	0.00100	1	04/05/2018 16:47	WG1093960
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 16:47	WG1093960
Bromoform	U		0.000469	0.00100	1	04/05/2018 16:47	WG1093960
Bromomethane	U		0.000866	0.00500	1	04/05/2018 16:47	WG1093960
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 16:47	WG1093960
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 16:47	WG1093960
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 16:47	WG1093960
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 16:47	WG1093960
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 16:47	WG1093960
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 16:47	WG1093960
Chloroethane	U		0.000453	0.00500	1	04/05/2018 16:47	WG1093960
Chloroform	0.000367	J	0.000324	0.00500	1	04/05/2018 16:47	WG1093960
Chloromethane	U		0.000276	0.00250	1	04/05/2018 16:47	WG1093960
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 16:47	WG1093960
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 16:47	WG1093960
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 16:47	WG1093960
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 16:47	WG1093960
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 16:47	WG1093960
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 16:47	WG1093960
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 16:47	WG1093960
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 16:47	WG1093960
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 16:47	WG1093960
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 16:47	WG1093960
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 16:47	WG1093960
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 16:47	WG1093960
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 16:47	WG1093960
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 16:47	WG1093960
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 16:47	WG1093960
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 16:47	WG1093960
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 16:47	WG1093960
Naphthalene	U		0.00100	0.00500	1	04/05/2018 16:47	WG1093960
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 16:47	WG1093960
Styrene	U		0.000307	0.00100	1	04/05/2018 16:47	WG1093960
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 16:47	WG1093960
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 16:47	WG1093960
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 16:47	WG1093960

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	04/05/2018 16:47	WG1093960
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 16:47	WG1093960
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 16:47	WG1093960
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 16:47	WG1093960
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 16:47	WG1093960
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 16:47	WG1093960
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 16:47	WG1093960
o-Xylene	U		0.000341	0.00100	1	04/05/2018 16:47	WG1093960
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 16:47	WG1093960
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 16:47	WG1093960
(S) Toluene-d8	*97.6*			*80.0-120*		*04/05/2018 16:47*	WG1093960
(S) Dibromofluoromethane	*111*			*76.0-123*		*04/05/2018 16:47*	WG1093960
(S) 4-Bromofluorobenzene	*90.8*			*80.0-120*		*04/05/2018 16:47*	WG1093960

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0723	J	0.0247	0.100	1	04/06/2018 06:50	WG1093593
(S) o-Terphenyl	*107*			*31.0-160*		*04/06/2018 06:50*	WG1093593

UG-4
Collected date/time: 04/02/18 18:35

SAMPLE RESULTS - 06

L982870

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4030		2.82	10.0	1	04/07/2018 16:27	WG1094508

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.515		0.0197	0.100	1	04/05/2018 17:58	WG1093665

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/06/2018 08:30	WG1093922

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	125		1.04	20.0	20	04/05/2018 03:15	WG1093667
Fluoride	0.574		0.00990	0.100	1	04/05/2018 03:00	WG1093667
Sulfate	2680		3.87	250	50	04/05/2018 17:46	WG1094105

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.0000571	B J	0.0000490	0.000200	1	04/08/2018 18:36	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/05/2018 11:01	WG1093744

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	1.07		0.0126	0.200	1	04/04/2018 22:38	WG1093624
Boron,Dissolved	1.17		0.0126	0.200	1	04/05/2018 18:59	WG1093778

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00177	B J	0.000250	0.00200	1	04/05/2018 17:31	WG1093709
Arsenic,Dissolved	0.00109	J	0.000250	0.00200	1	04/06/2018 19:53	WG1093627
Barium	0.0158		0.000360	0.00500	1	04/05/2018 17:31	WG1093709
Barium,Dissolved	0.0163		0.000360	0.00500	1	04/06/2018 19:53	WG1093627
Cadmium	U		0.000160	0.00100	1	04/05/2018 17:31	WG1093709
Cadmium,Dissolved	U		0.000160	0.00100	1	04/06/2018 19:53	WG1093627
Calcium	620		0.0460	1.00	1	04/05/2018 17:31	WG1093709
Chromium	U		0.000540	0.00200	1	04/05/2018 17:31	WG1093709
Chromium,Dissolved	U		0.000540	0.00200	1	04/09/2018 12:20	WG1093627
Cobalt	U		0.000260	0.00200	1	04/05/2018 17:31	WG1093709
Cobalt,Dissolved	U		0.000260	0.00200	1	04/06/2018 19:53	WG1093627
Iron	0.0330	J	0.0150	0.100	1	04/05/2018 17:31	WG1093709
Iron,Dissolved	U		0.0150	0.100	1	04/06/2018 19:53	WG1093627
Lead	U		0.000240	0.00200	1	04/05/2018 17:31	WG1093709
Lead,Dissolved	U		0.000240	0.00200	1	04/06/2018 19:53	WG1093627
Manganese	0.00117	J	0.000250	0.00500	1	04/05/2018 17:31	WG1093709
Manganese,Dissolved	U		0.000250	0.00500	1	04/06/2018 19:53	WG1093627
Nickel	0.000467	J	0.000350	0.00200	1	04/05/2018 17:31	WG1093709
Nickel,Dissolved	U		0.000350	0.00200	1	04/06/2018 19:53	WG1093627

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Potassium	1.77		0.0370	1.00	1	04/05/2018 17:31	WG1093709
Selenium	0.0202		0.000380	0.00200	1	04/05/2018 17:31	WG1093709
Selenium,Dissolved	0.0173		0.000380	0.00200	1	04/06/2018 19:53	WG1093627
Sodium	201		0.110	1.00	1	04/05/2018 17:31	WG1093709
Uranium	0.0324		0.000330	0.0100	1	04/05/2018 17:31	WG1093709
Uranium,Dissolved	0.0335		0.000330	0.0100	1	04/06/2018 19:53	WG1093627
Vanadium	0.00962	B	0.000180	0.00500	1	04/05/2018 17:31	WG1093709
Vanadium,Dissolved	0.00710		0.000180	0.00500	1	04/06/2018 19:53	WG1093627

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/05/2018 09:25	WG1093787
(S) a,a,a-Trifluorotoluene(FID)	*97.4*			*77.0-122*		*04/05/2018 09:25*	WG1093787

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/05/2018 17:08	WG1093960
Benzene	U		0.000331	0.00100	1	04/05/2018 17:08	WG1093960
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 17:08	WG1093960
Bromoform	U		0.000469	0.00100	1	04/05/2018 17:08	WG1093960
Bromomethane	U		0.000866	0.00500	1	04/05/2018 17:08	WG1093960
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 17:08	WG1093960
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 17:08	WG1093960
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 17:08	WG1093960
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 17:08	WG1093960
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 17:08	WG1093960
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 17:08	WG1093960
Chloroethane	U		0.000453	0.00500	1	04/05/2018 17:08	WG1093960
Chloroform	U		0.000324	0.00500	1	04/05/2018 17:08	WG1093960
Chloromethane	U		0.000276	0.00250	1	04/05/2018 17:08	WG1093960
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 17:08	WG1093960
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 17:08	WG1093960
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 17:08	WG1093960
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 17:08	WG1093960
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 17:08	WG1093960
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 17:08	WG1093960
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 17:08	WG1093960
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 17:08	WG1093960
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 17:08	WG1093960
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 17:08	WG1093960
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 17:08	WG1093960
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 17:08	WG1093960
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 17:08	WG1093960
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 17:08	WG1093960
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 17:08	WG1093960
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 17:08	WG1093960
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 17:08	WG1093960
Naphthalene	U		0.00100	0.00500	1	04/05/2018 17:08	WG1093960
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 17:08	WG1093960
Styrene	U		0.000307	0.00100	1	04/05/2018 17:08	WG1093960
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 17:08	WG1093960
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 17:08	WG1093960
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 17:08	WG1093960

UG-4

Collected date/time: 04/02/18 18:35

SAMPLE RESULTS - 06

L982870

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Toluene	U		0.000412	0.00100	1	04/05/2018 17:08	WG1093960
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 17:08	WG1093960
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 17:08	WG1093960
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 17:08	WG1093960
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 17:08	WG1093960
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 17:08	WG1093960
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 17:08	WG1093960
o-Xylene	U		0.000341	0.00100	1	04/05/2018 17:08	WG1093960
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 17:08	WG1093960
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 17:08	WG1093960
(S) Toluene-d8	*96.5*			*80.0-120*		*04/05/2018 17:08*	WG1093960
(S) Dibromofluoromethane	*111*			*76.0-123*		*04/05/2018 17:08*	WG1093960
(S) 4-Bromofluorobenzene	*91.8*			*80.0-120*		*04/05/2018 17:08*	WG1093960

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/06/2018 07:10	WG1093593
(S) o-Terphenyl	*109*			*31.0-160*		*04/06/2018 07:10*	WG1093593

WG1094508

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L982870-04,05,06

Method Blank (MB)

(MB) R3300598-1 04/07/18 16:27

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L982870-04 Original Sample (OS) • Duplicate (DUP)

(OS) L982870-04 04/07/18 16:27 • (DUP) R3300598-4 04/07/18 16:27

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2190	2190	1	0.000		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300598-2 04/07/18 16:27 • (LCSD) R3300598-3 04/07/18 16:27

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8430	8560	95.8	97.3	85.0-115			1.53	5

WG1095025

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L982870-01,02,03

Method Blank (MB)

(MB) R3300991-1 04/10/18 16:31

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Dissolved Solids	U		2.82	10.0

L982870-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982870-01 04/10/18 16:31 • (DUP) R3300991-4 04/10/18 16:31

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	3900	4200	1	7.42	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300991-2 04/10/18 16:31 • (LCSD) R3300991-3 04/10/18 16:31

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Dissolved Solids	8800	8530	8300	96.9	94.3	85.0-115			2.73	5

WG1093665

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L982870-01,02,03,04,05,06

Method Blank (MB)

(MB) R3299725-1 04/05/18 17:28

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L982755-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982755-01 04/05/18 17:31 • (DUP) R3299725-4 04/05/18 17:33

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	ND	0.000	1	0.000		20

L982886-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982886-01 04/05/18 18:01 • (DUP) R3299725-6 04/05/18 18:02

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	ND	0.0520	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299725-2 04/05/18 17:29 • (LCSD) R3299725-3 04/05/18 17:30

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.75	3.87	93.6	96.7	90.0-110			3.21	20

L982755-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L982755-02 04/05/18 17:34 • (MS) R3299725-5 04/05/18 17:35

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	6.30	7.70	56.0	1	90.0-110	E J6

L982886-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982886-02 04/05/18 18:03 • (MS) R3299725-7 04/05/18 18:04 • (MSD) R3299725-8 04/05/18 18:05

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	3.99	5.78	5.77	71.7	71.3	1	90.0-110	E J6	E J6	0.156	20

QUALITY CONTROL SUMMARY

L982870-03,04,05,06

Method Blank (MB)

(MB) R3299572-1 04/06/18 08:13

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	0.00263	J	0.00180	0.00500

L982567-02 Original Sample (OS) • Duplicate (DUP)

(OS) L982567-02 04/06/18 08:19 • (DUP) R3299572-4 04/06/18 08:20

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L982940-02 Original Sample (OS) • Duplicate (DUP)

(OS) L982940-02 04/06/18 08:40 • (DUP) R3299572-5 04/06/18 08:41

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	0.00515	0.00367	1	33.6	P1	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299572-2 04/06/18 08:14 • (LCSD) R3299572-3 04/06/18 08:15

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.106	0.110	106	110	85.0-115			3.70	20

L983075-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983075-02 04/06/18 08:42 • (MS) R3299572-6 04/06/18 08:43 • (MSD) R3299572-7 04/06/18 08:44

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	ND	0.0986	0.0973	98.6	97.3	1	75.0-125			1.33	20

QUALITY CONTROL SUMMARY

L982870-01,02,03

Method Blank (MB)

(MB) R3299414-1 04/04/18 06:52

Analyte	MB Result mg/l	**MB Qualifier**	MB MDL mg/l	MB RDL mg/l
Chloride	0.0923	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L982693-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982693-01 04/04/18 15:10 • (DUP) R3299414-4 04/04/18 15:23

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	**DUP Qualifier**	DUP RPD Limits %
Fluoride	0.187	0.190	1	1.70		15

L982983-03 Original Sample (OS) • Duplicate (DUP)

(OS) L982983-03 04/05/18 05:08 • (DUP) R3299414-7 04/05/18 05:21

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	**DUP Qualifier**	DUP RPD Limits %
Fluoride	0.122	0.148	1	19.9	P1	15

L982983-03 Original Sample (OS) • Duplicate (DUP)

(OS) L982983-03 04/05/18 13:45 • (DUP) R3299414-9 04/05/18 13:58

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	**DUP Qualifier**	DUP RPD Limits %
Chloride	148	148	5	0.00522		15
Sulfate	120	120	5	0.119		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299414-2 04/04/18 07:05 • (LCSD) R3299414-3 04/04/18 07:18

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	**LCS Qualifier**	**LCSD Qualifier**	RPD %	RPD Limits %
Chloride	40.0	39.7	39.7	99.3	99.2	80.0-120			0.0708	15
Fluoride	8.00	8.02	8.02	100	100	80.0-120			0.111	15
Sulfate	40.0	40.0	40.0	100	99.9	80.0-120			0.195	15

L982770-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982770-01 04/04/18 15:37 • (MS) R3299414-5 04/04/18 15:50 • (MSD) R3299414-6 04/04/18 16:04

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	53.1	101	101	95.3	96.2	1	80.0-120	E	E	0.443	15
Fluoride	5.00	0.479	5.46	5.51	99.7	101	1	80.0-120			0.804	15
Sulfate	50.0	49.0	96.5	96.8	95.0	95.6	1	80.0-120			0.349	15

L982983-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L982983-03 04/05/18 05:08 • (MS) R3299414-8 04/05/18 05:35

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Fluoride	5.00	0.122	5.13	100	1	80.0-120	

WG1093667

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L982870-04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299329-1 04/04/18 09:36

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100

L982682-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982682-01 04/04/18 20:04 • (DUP) R3299329-4 04/04/18 20:19

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	42.0	42.0	1	0.0881		15
Fluoride	0.238	0.267	1	11.3		15

L982753-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982753-01 04/05/18 00:26 • (DUP) R3299329-7 04/05/18 00:41

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	29.2	29.4	1	0.570		15
Fluoride	0.364	0.364	1	0.0549		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299329-2 04/04/18 09:51 • (LCSD) R3299329-3 04/04/18 10:07

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.3	39.3	98.2	98.3	80.0-120			0.104	15
Fluoride	8.00	7.95	7.98	99.4	99.7	80.0-120			0.320	15

L982682-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982682-01 04/04/18 20:04 • (MS) R3299329-5 04/04/18 20:35 • (MSD) R3299329-6 04/04/18 20:50

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	42.0	95.9	92.0	108	100	1	80.0-120			4.21	15
Fluoride	5.00	0.238	5.36	5.58	102	107	1	80.0-120			3.97	15

L982753-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L982753-01 04/05/18 00:26 • (MS) R3299329-8 04/05/18 00:57

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	29.2	85.1	112	1	80.0-120	
Fluoride	5.00	0.364	4.05	73.7	1	80.0-120	J6

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299530-1 04/05/18 15:29

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L983201-09 Original Sample (OS) • Duplicate (DUP)

(OS) L983201-09 04/05/18 19:34 • (DUP) R3299530-4 04/05/18 19:47

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	19.9	19.9	1	0.269		15

L983201-14 Original Sample (OS) • Duplicate (DUP)

(OS) L983201-14 04/05/18 22:01 • (DUP) R3299530-7 04/05/18 22:15

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	4.39	4.39	1	0.0569	J	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299530-2 04/05/18 15:43 • (LCSD) R3299530-3 04/05/18 15:56

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	40.0	40.0	100	99.9	80.0-120			0.0378	15

L983201-09 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983201-09 04/05/18 19:34 • (MS) R3299530-5 04/05/18 20:01 • (MSD) R3299530-6 04/05/18 20:14

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	19.9	69.1	69.5	98.3	99.1	1	80.0-120			0.578	15

L983201-14 Original Sample (OS) • Matrix Spike (MS)

(OS) L983201-14 04/05/18 22:01 • (MS) R3299530-8 04/05/18 22:28

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	4.39	54.1	99.5	1	80.0-120	

WG1093744

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L982870-03,04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299307-1 04/05/18 10:36

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury,Dissolved	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299307-2 04/05/18 10:38 • (LCSD) R3299307-3 04/05/18 10:40

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	0.00278	0.00282	92.6	94.0	80.0-120			1.54	20

L982870-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982870-03 04/05/18 10:42 • (MS) R3299307-4 04/05/18 10:45 • (MSD) R3299307-5 04/05/18 10:47

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	U	0.00285	0.00285	95.1	94.9	1	75.0-125			0.154	20

WG1094325

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L982870-03,04,05,06

Method Blank (MB)

(MB) R3300045-1 04/08/18 18:08

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury	0.0000934	J	0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300045-2 04/08/18 18:11 • (LCSD) R3300045-3 04/08/18 18:13

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury	0.00300	0.00307	0.00303	102	101	80.0-120			1.35	20

L983343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983343-01 04/08/18 18:15 • (MS) R3300045-4 04/08/18 18:17 • (MSD) R3300045-5 04/08/18 18:20

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury	0.00300	ND	0.00290	0.00291	93.9	93.9	1	75.0-125			0.0723	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299172-1 04/04/18 20:53

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299172-2 04/04/18 20:56 • (LCSD) R3299172-3 04/04/18 20:59

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Boron	1.00	0.978	0.991	97.8	99.1	80.0-120			1.41	20

L982857-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982857-01 04/04/18 21:03 • (MS) R3299172-5 04/04/18 21:10 • (MSD) R3299172-6 04/04/18 21:14

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Boron	1.00	3.70	4.63	4.62	92.9	91.8	1	75.0-125			0.236	20

WG1093778

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L982870-03,04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299508-1 04/05/18 18:51

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Boron,Dissolved	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299508-2 04/05/18 18:54 • (LCSD) R3299508-3 04/05/18 18:56

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Boron,Dissolved	1.00	1.03	1.02	103	102	80.0-120			0.480	20

L982870-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982870-06 04/05/18 18:59 • (MS) R3299508-5 04/05/18 19:04 • (MSD) R3299508-6 04/05/18 19:07

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Boron,Dissolved	1.00	1.17	2.19	2.20	102	103	1	75.0-125			0.426	20

WG1093627

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L982870-01,02,03,04,05,06

Method Blank (MB)

(MB) R3299827-1 04/06/18 18:45

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	0.0153	J	0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	0.000197	J	0.000180	0.00500

Method Blank (MB)

(MB) R3300141-1 04/09/18 11:18

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chromium,Dissolved	U		0.000540	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299827-2 04/06/18 18:49 • (LCSD) R3299827-3 04/06/18 18:54

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0486	0.0490	97.2	98.0	80.0-120			0.768	20
Barium,Dissolved	0.0500	0.0467	0.0455	93.3	91.0	80.0-120			2.56	20
Cadmium,Dissolved	0.0500	0.0496	0.0492	99.2	98.5	80.0-120			0.667	20
Cobalt,Dissolved	0.0500	0.0518	0.0525	104	105	80.0-120			1.24	20
Iron,Dissolved	5.00	4.93	4.93	98.5	98.6	80.0-120			0.0520	20
Lead,Dissolved	0.0500	0.0487	0.0487	97.5	97.3	80.0-120			0.110	20
Manganese,Dissolved	0.0500	0.0482	0.0505	96.4	101	80.0-120			4.72	20
Nickel,Dissolved	0.0500	0.0527	0.0515	105	103	80.0-120			2.28	20
Selenium,Dissolved	0.0500	0.0484	0.0481	96.8	96.1	80.0-120			0.642	20
Uranium,Dissolved	0.0500	0.0466	0.0471	93.2	94.2	80.0-120			1.09	20
Vanadium,Dissolved	0.0500	0.0494	0.0494	98.8	98.9	80.0-120			0.0667	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300141-2 04/09/18 11:22 • (LCSD) R3300141-3 04/09/18 11:27

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chromium,Dissolved	0.0500	0.0516	0.0503	103	101	80.0-120			2.52	20

L982870-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982870-01 04/06/18 18:58 • (MS) R3299827-4 04/06/18 19:07 • (MSD) R3299827-5 04/06/18 19:11

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic,Dissolved	0.0500	0.00345	0.0529	0.0514	98.9	95.8	1	75.0-125			2.90	20
Barium,Dissolved	0.0500	0.00760	0.0579	0.0583	101	101	1	75.0-125			0.704	20
Cadmium,Dissolved	0.0500	U	0.0488	0.0506	97.6	101	1	75.0-125			3.64	20
Cobalt,Dissolved	0.0500	0.00445	0.0551	0.0535	101	98.1	1	75.0-125			3.05	20
Iron,Dissolved	5.00	U	4.88	4.77	97.7	95.4	1	75.0-125			2.34	20
Lead,Dissolved	0.0500	U	0.0489	0.0486	97.8	97.2	1	75.0-125			0.615	20
Manganese,Dissolved	0.0500	0.398	0.454	0.445	113	94.7	1	75.0-125			2.08	20
Nickel,Dissolved	0.0500	0.00915	0.0599	0.0587	102	99.1	1	75.0-125			2.07	20
Selenium,Dissolved	0.0500	0.00261	0.0525	0.0508	99.8	96.4	1	75.0-125			3.33	20
Uranium,Dissolved	0.0500	0.0397	0.0880	0.0886	96.6	97.7	1	75.0-125			0.642	20
Vanadium,Dissolved	0.0500	0.0182	0.0676	0.0671	98.9	97.8	1	75.0-125			0.804	20

L982870-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982870-01 04/09/18 11:32 • (MS) R3300141-5 04/09/18 11:41 • (MSD) R3300141-6 04/09/18 11:46

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chromium,Dissolved	0.0500	U	0.0500	0.0487	100	97.4	1	75.0-125			2.62	20

QUALITY CONTROL SUMMARY

L982870-01,02,03,04,05,06

Method Blank (MB)

(MB) R3299482-1 04/05/18 16:34

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	0.000252	J	0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	0.000719	J	0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	0.00111	J	0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299482-2 04/05/18 16:38 • (LCSD) R3299482-3 04/05/18 16:42

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0494	0.0490	98.7	98.0	80.0-120			0.750	20
Barium	0.0500	0.0449	0.0436	89.8	87.1	80.0-120			3.05	20
Cadmium	0.0500	0.0508	0.0512	102	102	80.0-120			0.846	20
Calcium	5.00	4.78	4.78	95.7	95.6	80.0-120			0.0832	20
Chromium	0.0500	0.0490	0.0485	98.0	97.0	80.0-120			1.07	20
Cobalt	0.0500	0.0520	0.0517	104	103	80.0-120			0.502	20
Iron	5.00	4.94	4.94	98.7	98.7	80.0-120			0.0409	20
Lead	0.0500	0.0483	0.0474	96.6	94.8	80.0-120			1.85	20
Manganese	0.0500	0.0446	0.0441	89.1	88.1	80.0-120			1.16	20
Nickel	0.0500	0.0532	0.0526	106	105	80.0-120			1.16	20
Potassium	5.00	4.58	4.52	91.6	90.5	80.0-120			1.28	20
Selenium	0.0500	0.0544	0.0549	109	110	80.0-120			0.886	20
Sodium	5.00	5.32	5.22	106	104	80.0-120			1.84	20
Uranium	0.0500	0.0462	0.0455	92.4	91.0	80.0-120			1.57	20
Vanadium	0.0500	0.0478	0.0477	95.6	95.3	80.0-120			0.280	20

L982870-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982870-01 04/05/18 16:46 • (MS) R3299482-5 04/05/18 16:53 • (MSD) R3299482-6 04/05/18 16:57

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00440	0.0526	0.0525	96.4	96.1	1	75.0-125			0.214	20
Barium	0.0500	0.00924	0.0546	0.0559	90.7	93.4	1	75.0-125			2.39	20
Cadmium	0.0500	U	0.0506	0.0512	101	102	1	75.0-125			1.26	20
Calcium	5.00	548	548	550	0.000	40.8	1	75.0-125	V	V	0.475	20
Chromium	0.0500	U	0.0475	0.0468	95.1	93.6	1	75.0-125			1.49	20
Cobalt	0.0500	0.00477	0.0546	0.0543	99.6	99.1	1	75.0-125			0.419	20
Potassium	5.00	1.28	6.24	6.23	99.1	98.9	1	75.0-125			0.128	20
Iron	5.00	0.0793	5.00	5.00	98.5	98.5	1	75.0-125			0.0350	20
Lead	0.0500	U	0.0477	0.0482	95.5	96.4	1	75.0-125			0.998	20
Manganese	0.0500	0.393	0.434	0.431	82.7	76.6	1	75.0-125			0.699	20
Nickel	0.0500	0.0164	0.0670	0.0669	101	101	1	75.0-125			0.0935	20
Selenium	0.0500	0.00275	0.0614	0.0626	117	120	1	75.0-125			1.91	20
Sodium	5.00	234	237	238	53.5	66.2	1	75.0-125	V	V	0.267	20
Uranium	0.0500	0.0383	0.0856	0.0854	94.6	94.2	1	75.0-125			0.237	20
Vanadium	0.0500	0.0206	0.0698	0.0685	98.4	95.8	1	75.0-125			1.84	20

WG1093787

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L982870-01,02,03,04,05,06

Method Blank (MB)

(MB) R3299286-3 04/05/18 01:37

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*97.1*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299286-1 04/05/18 00:31 • (LCSD) R3299286-2 04/05/18 00:53

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	5.43	5.60	98.8	102	71.0-136			3.01	20
(S) a,a,a-Trifluorotoluene(FID)				*102*	*101*	*77.0-122*				

L982870-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982870-06 04/05/18 09:25 • (MS) R3299286-4 04/05/18 10:10 • (MSD) R3299286-5 04/05/18 10:33

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	U	3.27	3.36	59.5	61.1	1	18.0-160			2.75	20
(S) a,a,a-Trifluorotoluene(FID)					*97.3*	*96.1*		*77.0-122*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300593-2 04/05/18 11:05

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300593-2 04/05/18 11:05

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*97.3*			*80.0-120*
(S) Dibromofluoromethane	*106*			*76.0-123*
(S) 4-Bromofluorobenzene	*91.1*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3300593-1 04/05/18 10:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.117	93.4	10.0-160	
Benzene	0.0250	0.0270	108	69.0-123	
Bromodichloromethane	0.0250	0.0237	94.9	76.0-120	
Bromoform	0.0250	0.0216	86.3	67.0-132	
Bromomethane	0.0250	0.0309	124	18.0-160	
n-Butylbenzene	0.0250	0.0273	109	72.0-126	
sec-Butylbenzene	0.0250	0.0250	100	74.0-121	
Carbon disulfide	0.0250	0.0267	107	55.0-127	
Carbon tetrachloride	0.0250	0.0265	106	63.0-122	
Chlorobenzene	0.0250	0.0249	99.5	79.0-121	
Chlorodibromomethane	0.0250	0.0251	100	75.0-125	
Chloroethane	0.0250	0.0293	117	47.0-152	
Chloroform	0.0250	0.0252	101	72.0-121	
Chloromethane	0.0250	0.0258	103	48.0-139	
1,2-Dibromoethane	0.0250	0.0248	99.3	77.0-123	
1,1-Dichloroethane	0.0250	0.0283	113	70.0-126	
1,2-Dichloroethane	0.0250	0.0268	107	67.0-126	
1,1-Dichloroethene	0.0250	0.0258	103	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0258	103	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0264	106	71.0-121	
1,2-Dichloropropane	0.0250	0.0258	103	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0260	104	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0248	99.3	74.0-127	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS)

(LCS) R3300593-1 04/05/18 10:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.0250	0.0250	100	77.0-120	
2-Hexanone	0.125	0.123	98.4	58.0-147	
Isopropylbenzene	0.0250	0.0245	97.9	75.0-120	
p-Isopropyltoluene	0.0250	0.0246	98.2	74.0-126	
2-Butanone (MEK)	0.125	0.138	111	37.0-158	
Methylene Chloride	0.0250	0.0256	103	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.127	102	59.0-143	
Methyl tert-butyl ether	0.0250	0.0270	108	64.0-123	
Naphthalene	0.0250	0.0244	97.8	62.0-128	
n-Propylbenzene	0.0250	0.0241	96.3	79.0-120	
Styrene	0.0250	0.0239	95.6	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0248	99.2	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0221	88.4	71.0-122	
Tetrachloroethene	0.0250	0.0256	102	70.0-127	
Toluene	0.0250	0.0251	101	77.0-120	
1,1,1-Trichloroethane	0.0250	0.0269	108	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0226	90.5	78.0-120	
Trichloroethene	0.0250	0.0253	101	78.0-120	
1,2,4-Trimethylbenzene	0.0250	0.0237	94.6	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0245	97.9	75.0-120	
Vinyl chloride	0.0250	0.0281	112	64.0-133	
Xylenes, Total	0.0750	0.0759	101	77.0-120	
o-Xylene	0.0250	0.0257	103	78.0-120	
m&p-Xylenes	0.0500	0.0502	100	77.0-120	
(S) Toluene-d8			*94.7*	*80.0-120*	
(S) Dibromofluoromethane			*104*	*76.0-123*	
(S) 4-Bromofluorobenzene			*87.1*	*80.0-120*	

WG1093593

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L982870-01,02,03,04,05,06

Method Blank (MB)

(MB) R3300192-1 04/05/18 15:19

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*96.2*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300192-2 04/05/18 15:39 • (LCSD) R3300192-3 04/05/18 15:59

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.47	1.49	98.0	99.3	50.0-150			1.26	20
(S) o-Terphenyl				*110*	*117*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico[1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina[1]	DW21704
Georgia	NELAP	North Carolina[3]	41
Georgia[1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky[1,6]	90010	South Carolina	84004
Kentucky[2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee[1,4]	2006
Louisiana[1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas[5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

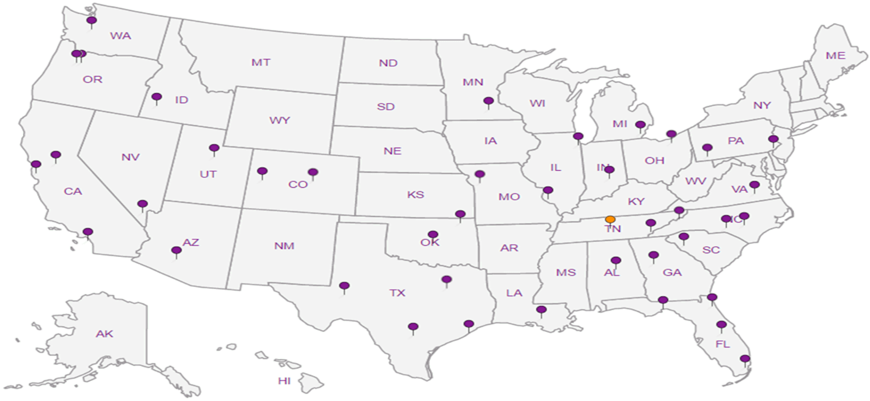
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025[5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



Chain of Custody Page 1 of 2

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# L982870

F102

Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-99	Grab	GW				10	X	X	X	X	X	X	X					
MW-66	Grab	GW				11	X	X	X		X	X	X	X	X			
MW-28	Grab	GW				11	X	X	X		X	X	X	X	X			
MW-59	Grab	GW				10	X	X	X	X	X	X	X					
MW-60	Grab	GW				11	X	X	X		X	X	X	X	X			
MW-107	Grab	GW				10	X	X	X	X	X	X	X					
MW-128	Grab	GW				10	X	X	X	X	X	X	X					
MW-125	Grab	GW		4/3/18	0935	10	X	X	X	X	X	X	X					-01
MW-116	Grab	GW		4/3/18	1015	10	X	X	X	X	X	X	X					02
UG-2	Grab	GW		4/2/18	1925	11	X	X			X	X	X	X	X			03

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking # 4264 9213 4008

Sample Receipt Checklist
COC Seal Present/Intact: ~~NP~~ ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature) Date: Time:
Received by: (Signature)
Trip Blank Received: Yes / No
HCL / MeoH
TBR

Relinquished by : (Signature) Date: Time:
Received by: (Signature)
Temp: 2.1 9/10 °C Bottles Received: 64
If preservation required by Login: Date/Time

Relinquished by : (Signature) Date: Time:
Received for lab by: (Signature) 810
Date: 4/4/18 Time: 845
Hold:
Condition: NCF / [✓ OK]

Chain of Custody Page 2 of 2

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project #: **249545.0000.0000 000001**

Lab Project #: **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: **REST (Navajo - Artesia)**

P.O. #: **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L# L982870

Table #

Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
UG-3R	**Grab**	**GW**		**4/2/18**	**1700**	**11**	X	X	X		X	X	X	X	X			-04
UG-1	**Grab**	**GW**		**4/2/18**	**1750**	**11**	X	X	X		X	X	X	X	X			05
UG-4	**Grab**	**GW**		**4/2/18**	**1835**	**11**	X	X	X		X	X	X	X	X			06
MW-101	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-105	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
RW-2	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-61	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-62	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-93	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-43	**Grab**	**GW**				**11**	X	X	X		X	X	X	X	X			

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ~~NP~~ Y ✓ _N
COC Signed/Accurate: Y ✓ _N
Bottles arrive intact: Y ✓ _N
Correct bottles used: Y ✓ _N
Sufficient volume sent: Y ✓ _N
If Applicable
VOA Zero Headspace: Y ✓ _N
Preservation Correct/Checked: Y ✓ _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 2.1 °C Bottles Received: 64
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/4/18 Time: 845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Chain of Custody Page 1 of 1

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# L982870

Table #

Acctnum:TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: REST Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

Immediately Packed on Ice N ___ Y ✓

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
UG-1	Grab	GW		4/2/18	1750		✓	✓	✓		✓	✓	✓	✓	✓			-05
UG-2	Grab	GW		4/2/18	1925		✓	✓	✓		✓	✓	✓	✓	✓			03
UG-3R	Grab	GW		4/2/18	1700		✓	✓	✓		✓	✓	✓	✓	✓			04
UG-4	Grab	GW		4/2/18	1835		✓	✓	✓		✓	✓	✓	✓	✓			06
MW-116	Grab	GW		4/3/18	1015		✓	✓	✓	✓		✓	✓	✓				02
MW-125	Grab	GW		4/3/18	935		✓	✓	✓	✓		✓	✓	✓				01
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ___________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Samples returned via: ☐ UPS
☑ FedEx ☐ Courier ☐ ______

Hold #

Condition: (lab use only)

Relinquished by : (Signature) Scott Ude	Date: 4/3/18	Time: 1215	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Temp: 2.4 °C Bottles Received:

Date: 4/4/18 Time: 845

COC Seal Intact: ✓ Y ___ N ___ NA

pH Checked:

NCF:

ESC Lab Sciences
Non-Conformance Form

Login #: L982870	**Client: TRCATX**	**Date: 4/4/18**	**Evaluated by: Jeremy**

Non-Conformance (check applicable items)

	Sample Integrity		**Chain of Custody Clarification**		
	Parameter(s) past holding time		Login Clarification Needed		**If Broken Container:**
	Improper temperature		Chain of custody is incomplete		Insufficient packing material around container
	Improper container type		Please specify Metals requested.		Insufficient packing material inside cooler
	Improper preservation		Please specify TCLP requested.		Improper handling by carrier (FedEx / UPS / Courie
	Insufficient sample volume.		Received additional samples not listed on coc.		Sample was frozen
	Sample is biphasic.		Sample ids on containers do not match ids on coc		Container lid not intact
	Vials received with headspace.		Trip Blank not received.		**If no Chain of Custody:**
	Broken container		Client did not "X" analysis.		Received by:
x	Broken container:		Chain of Custody is missing		Date/Time:
x	Sufficient sample remains				Temp./Cont. Rec./pH:
					Carrier:
					Tracking#

Login Comments: 2 out of 6 Vials broken for UG-2

Client informed by:		Call		Email		Voice Mail		Date:	Time:
TSR Initials:CM	Client Contact:								

Login Instructions:

Analysis can be ran from remaining volume.

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ANALYTICAL REPORT

April 17, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L982876
Samples Received:	04/04/2018
Project Number:	294318.0000.0000.
Description:	TMD Spring 2018
Site:	TMD - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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MW-46R L982876-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 11:00	04/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1094509	1	04/10/18 16:52	04/10/18 17:15	MMF
Wet Chemistry by Method 353.2	WG1093665	1	04/05/18 18:00	04/05/18 18:00	JER
Wet Chemistry by Method 9056A	WG1093514	1	04/05/18 03:47	04/05/18 03:47	MAJ
Wet Chemistry by Method 9056A	WG1093514	20	04/05/18 04:01	04/05/18 04:01	MAJ
Wet Chemistry by Method 9056A	WG1093514	50	04/05/18 13:18	04/05/18 13:18	MAJ
Metals (ICPMS) by Method 6020	WG1093627	1	04/05/18 15:04	04/06/18 19:57	WBD
Metals (ICPMS) by Method 6020	WG1093709	1	04/05/18 07:04	04/05/18 17:34	JPD
Metals (ICPMS) by Method 6020	WG1098023	1	04/13/18 16:28	04/14/18 15:54	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1093960	1	04/05/18 17:29	04/05/18 17:29	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1093593	1	04/04/18 16:22	04/06/18 07:30	LM

TRIP BLANK-TMD-01 L982876-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 00:00	04/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1093960	1	04/05/18 12:09	04/05/18 12:09	DWR

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3620		2.82	10.0	1	04/10/2018 17:15	WG1094509

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/05/2018 18:00	WG1093665

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	282		1.04	20.0	20	04/05/2018 04:01	WG1093514
Fluoride	1.78		0.00990	0.100	1	04/05/2018 03:47	WG1093514
Sulfate	2310		3.87	250	50	04/05/2018 13:18	WG1093514

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00428		0.000250	0.00200	1	04/05/2018 17:34	WG1093709
Arsenic,Dissolved	0.00260		0.000250	0.00200	1	04/06/2018 19:57	WG1093627
Barium	0.0125		0.000360	0.00500	1	04/05/2018 17:34	WG1093709
Barium,Dissolved	0.0106		0.000360	0.00500	1	04/06/2018 19:57	WG1093627
Calcium	613		0.0460	1.00	1	04/05/2018 17:34	WG1093709
Chromium	U		0.000540	0.00200	1	04/05/2018 17:34	WG1093709
Chromium,Dissolved	0.00175	J	0.000540	0.00200	1	04/14/2018 15:54	WG1098023
Iron	0.0570	J	0.0150	0.100	1	04/05/2018 17:34	WG1093709
Iron,Dissolved	0.0510	B J	0.0150	0.100	1	04/06/2018 19:57	WG1093627
Lead	0.000480	J	0.000240	0.00200	1	04/05/2018 17:34	WG1093709
Lead,Dissolved	0.000304	J	0.000240	0.00200	1	04/06/2018 19:57	WG1093627
Manganese	0.170		0.000250	0.00500	1	04/05/2018 17:34	WG1093709
Manganese,Dissolved	0.107		0.000250	0.00500	1	04/06/2018 19:57	WG1093627
Potassium	1.43		0.0370	1.00	1	04/05/2018 17:34	WG1093709
Selenium	0.000882	J	0.000380	0.00200	1	04/05/2018 17:34	WG1093709
Selenium,Dissolved	0.000587	J	0.000380	0.00200	1	04/06/2018 19:57	WG1093627
Sodium	192		0.110	1.00	1	04/05/2018 17:34	WG1093709

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/05/2018 17:29	WG1093960
Benzene	U		0.000331	0.00100	1	04/05/2018 17:29	WG1093960
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 17:29	WG1093960
Bromoform	U		0.000469	0.00100	1	04/05/2018 17:29	WG1093960
Bromomethane	U		0.000866	0.00500	1	04/05/2018 17:29	WG1093960
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 17:29	WG1093960
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 17:29	WG1093960
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 17:29	WG1093960
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 17:29	WG1093960
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 17:29	WG1093960
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 17:29	WG1093960
Chloroethane	U		0.000453	0.00500	1	04/05/2018 17:29	WG1093960
Chloroform	U		0.000324	0.00500	1	04/05/2018 17:29	WG1093960
Chloromethane	U		0.000276	0.00250	1	04/05/2018 17:29	WG1093960
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 17:29	WG1093960
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 17:29	WG1093960

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 17:29	WG1093960
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 17:29	WG1093960
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 17:29	WG1093960
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 17:29	WG1093960
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 17:29	WG1093960
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 17:29	WG1093960
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 17:29	WG1093960
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 17:29	WG1093960
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 17:29	WG1093960
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 17:29	WG1093960
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 17:29	WG1093960
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 17:29	WG1093960
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 17:29	WG1093960
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 17:29	WG1093960
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 17:29	WG1093960
Naphthalene	U		0.00100	0.00500	1	04/05/2018 17:29	WG1093960
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 17:29	WG1093960
Styrene	U		0.000307	0.00100	1	04/05/2018 17:29	WG1093960
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 17:29	WG1093960
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 17:29	WG1093960
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 17:29	WG1093960
Toluene	U		0.000412	0.00100	1	04/05/2018 17:29	WG1093960
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 17:29	WG1093960
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 17:29	WG1093960
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 17:29	WG1093960
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 17:29	WG1093960
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 17:29	WG1093960
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 17:29	WG1093960
o-Xylene	U		0.000341	0.00100	1	04/05/2018 17:29	WG1093960
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 17:29	WG1093960
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 17:29	WG1093960
(S) Toluene-d8	*98.8*			*80.0-120*		*04/05/2018 17:29*	WG1093960
(S) Dibromofluoromethane	*108*			*76.0-123*		*04/05/2018 17:29*	WG1093960
(S) 4-Bromofluorobenzene	*90.9*			*80.0-120*		*04/05/2018 17:29*	WG1093960

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/06/2018 07:30	WG1093593
(S) o-Terphenyl	*102*			*31.0-160*		*04/06/2018 07:30*	WG1093593

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/05/2018 12:09	WG1093960
Benzene	U		0.000331	0.00100	1	04/05/2018 12:09	WG1093960
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 12:09	WG1093960
Bromoform	U		0.000469	0.00100	1	04/05/2018 12:09	WG1093960
Bromomethane	U		0.000866	0.00500	1	04/05/2018 12:09	WG1093960
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 12:09	WG1093960
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 12:09	WG1093960
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 12:09	WG1093960
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 12:09	WG1093960
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 12:09	WG1093960
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 12:09	WG1093960
Chloroethane	U		0.000453	0.00500	1	04/05/2018 12:09	WG1093960
Chloroform	U		0.000324	0.00500	1	04/05/2018 12:09	WG1093960
Chloromethane	U		0.000276	0.00250	1	04/05/2018 12:09	WG1093960
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 12:09	WG1093960
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 12:09	WG1093960
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 12:09	WG1093960
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 12:09	WG1093960
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 12:09	WG1093960
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 12:09	WG1093960
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 12:09	WG1093960
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 12:09	WG1093960
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 12:09	WG1093960
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 12:09	WG1093960
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 12:09	WG1093960
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 12:09	WG1093960
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 12:09	WG1093960
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 12:09	WG1093960
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 12:09	WG1093960
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 12:09	WG1093960
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 12:09	WG1093960
Naphthalene	U		0.00100	0.00500	1	04/05/2018 12:09	WG1093960
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 12:09	WG1093960
Styrene	U		0.000307	0.00100	1	04/05/2018 12:09	WG1093960
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 12:09	WG1093960
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 12:09	WG1093960
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 12:09	WG1093960
Toluene	0.00118		0.000412	0.00100	1	04/05/2018 12:09	WG1093960
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 12:09	WG1093960
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 12:09	WG1093960
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 12:09	WG1093960
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 12:09	WG1093960
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 12:09	WG1093960
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 12:09	WG1093960
o-Xylene	0.000404	J	0.000341	0.00100	1	04/05/2018 12:09	WG1093960
m&p-Xylene	0.00102	J	0.000719	0.00200	1	04/05/2018 12:09	WG1093960
Xylenes, Total	0.00142	J	0.00106	0.00300	1	04/05/2018 12:09	WG1093960
(S) Toluene-d8	*97.5*			*80.0-120*		*04/05/2018 12:09*	WG1093960
(S) Dibromofluoromethane	*104*			*76.0-123*		*04/05/2018 12:09*	WG1093960
(S) 4-Bromofluorobenzene	*90.4*			*80.0-120*		*04/05/2018 12:09*	WG1093960

WG1094509

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L982876-01

Method Blank (MB)

(MB) R3300973-1 04/10/18 17:15

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L982727-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982727-01 04/10/18 17:15 • (DUP) R3300973-4 04/10/18 17:15

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	253	248	1	2.00		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300973-2 04/10/18 17:15 • (LCSD) R3300973-3 04/10/18 17:15

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8450	8470	96.0	96.3	85.0-115			0.236	5

QUALITY CONTROL SUMMARY

L982876-01

Method Blank (MB)

(MB) R3299725-1 04/05/18 17:28

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L982755-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982755-01 04/05/18 17:31 • (DUP) R3299725-4 04/05/18 17:33

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	ND	0.000	1	0.000		20

L982886-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982886-01 04/05/18 18:01 • (DUP) R3299725-6 04/05/18 18:02

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	ND	0.0520	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299725-2 04/05/18 17:29 • (LCSD) R3299725-3 04/05/18 17:30

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.75	3.87	93.6	96.7	90.0-110			3.21	20

L982755-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L982755-02 04/05/18 17:34 • (MS) R3299725-5 04/05/18 17:35

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	6.30	7.70	56.0	1	90.0-110	E J6

L982886-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982886-02 04/05/18 18:03 • (MS) R3299725-7 04/05/18 18:04 • (MSD) R3299725-8 04/05/18 18:05

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	3.99	5.78	5.77	71.7	71.3	1	90.0-110	E J6	E J6	0.156	20

Method Blank (MB)

(MB) R3299414-1 04/04/18 06:52

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.0923	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L982693-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982693-01 04/04/18 15:10 • (DUP) R3299414-4 04/04/18 15:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	0.187	0.190	1	1.70		15

L982983-03 Original Sample (OS) • Duplicate (DUP)

(OS) L982983-03 04/05/18 05:08 • (DUP) R3299414-7 04/05/18 05:21

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	0.122	0.148	1	19.9	P1	15

L982983-03 Original Sample (OS) • Duplicate (DUP)

(OS) L982983-03 04/05/18 13:45 • (DUP) R3299414-9 04/05/18 13:58

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	148	148	5	0.00522		15
Sulfate	120	120	5	0.119		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299414-2 04/04/18 07:05 • (LCSD) R3299414-3 04/04/18 07:18

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.7	39.7	99.3	99.2	80.0-120			0.0708	15
Fluoride	8.00	8.02	8.02	100	100	80.0-120			0.111	15
Sulfate	40.0	40.0	40.0	100	99.9	80.0-120			0.195	15

WG1093514

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L982876-01

L982770-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982770-01 04/04/18 15:37 • (MS) R3299414-5 04/04/18 15:50 • (MSD) R3299414-6 04/04/18 16:04

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	53.1	101	101	95.3	96.2	1	80.0-120	E	E	0.443	15
Fluoride	5.00	0.479	5.46	5.51	99.7	101	1	80.0-120			0.804	15
Sulfate	50.0	49.0	96.5	96.8	95.0	95.6	1	80.0-120			0.349	15

L982983-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L982983-03 04/05/18 05:08 • (MS) R3299414-8 04/05/18 05:35

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Fluoride	5.00	0.122	5.13	100	1	80.0-120	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299827-1 04/06/18 18:45

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Iron,Dissolved	0.0153	J	0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Selenium,Dissolved	U		0.000380	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299827-2 04/06/18 18:49 • (LCSD) R3299827-3 04/06/18 18:54

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0486	0.0490	97.2	98.0	80.0-120			0.768	20
Barium,Dissolved	0.0500	0.0467	0.0455	93.3	91.0	80.0-120			2.56	20
Iron,Dissolved	5.00	4.93	4.93	98.5	98.6	80.0-120			0.0520	20
Lead,Dissolved	0.0500	0.0487	0.0487	97.5	97.3	80.0-120			0.110	20
Manganese,Dissolved	0.0500	0.0482	0.0505	96.4	101	80.0-120			4.72	20
Selenium,Dissolved	0.0500	0.0484	0.0481	96.8	96.1	80.0-120			0.642	20

L982870-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982870-01 04/06/18 18:58 • (MS) R3299827-4 04/06/18 19:07 • (MSD) R3299827-5 04/06/18 19:11

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.00345	0.0529	0.0514	98.9	95.8	1	75.0-125			2.90	20
Barium,Dissolved	0.0500	0.00760	0.0579	0.0583	101	101	1	75.0-125			0.704	20
Iron,Dissolved	5.00	U	4.88	4.77	97.7	95.4	1	75.0-125			2.34	20
Lead,Dissolved	0.0500	U	0.0489	0.0486	97.8	97.2	1	75.0-125			0.615	20
Manganese,Dissolved	0.0500	0.398	0.454	0.445	113	94.7	1	75.0-125			2.08	20
Selenium,Dissolved	0.0500	0.00261	0.0525	0.0508	99.8	96.4	1	75.0-125			3.33	20

WG1093709

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L982876-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299482-1 04/05/18 16:34

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Arsenic	0.000252	J	0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	0.000719	J	0.000540	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299482-2 04/05/18 16:38 • (LCSD) R3299482-3 04/05/18 16:42

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Arsenic	0.0500	0.0494	0.0490	98.7	98.0	80.0-120			0.750	20
Barium	0.0500	0.0449	0.0436	89.8	87.1	80.0-120			3.05	20
Calcium	5.00	4.78	4.78	95.7	95.6	80.0-120			0.0832	20
Chromium	0.0500	0.0490	0.0485	98.0	97.0	80.0-120			1.07	20
Iron	5.00	4.94	4.94	98.7	98.7	80.0-120			0.0409	20
Lead	0.0500	0.0483	0.0474	96.6	94.8	80.0-120			1.85	20
Manganese	0.0500	0.0446	0.0441	89.1	88.1	80.0-120			1.16	20
Potassium	5.00	4.58	4.52	91.6	90.5	80.0-120			1.28	20
Selenium	0.0500	0.0544	0.0549	109	110	80.0-120			0.886	20
Sodium	5.00	5.32	5.22	106	104	80.0-120			1.84	20

L982870-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982870-01 04/05/18 16:46 • (MS) R3299482-5 04/05/18 16:53 • (MSD) R3299482-6 04/05/18 16:57

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.00440	0.0526	0.0525	96.4	96.1	1	75.0-125			0.214	20
Barium	0.0500	0.00924	0.0546	0.0559	90.7	93.4	1	75.0-125			2.39	20
Calcium	5.00	548	548	550	0.000	40.8	1	75.0-125	V	V	0.475	20
Chromium	0.0500	U	0.0475	0.0468	95.1	93.6	1	75.0-125			1.49	20
Potassium	5.00	1.28	6.24	6.23	99.1	98.9	1	75.0-125			0.128	20
Iron	5.00	0.0793	5.00	5.00	98.5	98.5	1	75.0-125			0.0350	20
Lead	0.0500	U	0.0477	0.0482	95.5	96.4	1	75.0-125			0.998	20

L982870-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982870-01 04/05/18 16:46 • (MS) R3299482-5 04/05/18 16:53 • (MSD) R3299482-6 04/05/18 16:57

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Manganese	0.0500	0.393	0.434	0.431	82.7	76.6	1	75.0-125			0.699	20
Selenium	0.0500	0.00275	0.0614	0.0626	117	120	1	75.0-125			1.91	20
Sodium	5.00	234	237	238	53.5	66.2	1	75.0-125	V	V	0.267	20

WG1098023

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L982876-01

Method Blank (MB)

(MB) R3301908-1 04/14/18 15:39

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chromium,Dissolved	U		0.000540	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301908-2 04/14/18 15:44 • (LCSD) R3301908-3 04/14/18 15:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chromium,Dissolved	0.0500	0.0540	0.0549	108	110	80.0-120			1.68	20

L982876-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L982876-01 04/14/18 15:54 • (MS) R3301908-5 04/14/18 16:03 • (MSD) R3301908-6 04/14/18 16:08

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium,Dissolved	0.0500	0.00175	0.0570	0.0576	111	112	1	75.0-125			1.04	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1093960

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L982876-01,02

Method Blank (MB)

(MB) R3300593-2 04/05/18 11:05

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1093960

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L982876-01,02

Method Blank (MB)

(MB) R3300593-2 04/05/18 11:05

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*97.3*			*80.0-120*
(S) Dibromofluoromethane	*106*			*76.0-123*
(S) 4-Bromofluorobenzene	*91.1*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3300593-1 04/05/18 10:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.117	93.4	10.0-160	
Benzene	0.0250	0.0270	108	69.0-123	
Bromodichloromethane	0.0250	0.0237	94.9	76.0-120	
Bromoform	0.0250	0.0216	86.3	67.0-132	
Bromomethane	0.0250	0.0309	124	18.0-160	
n-Butylbenzene	0.0250	0.0273	109	72.0-126	
sec-Butylbenzene	0.0250	0.0250	100	74.0-121	
Carbon disulfide	0.0250	0.0267	107	55.0-127	
Carbon tetrachloride	0.0250	0.0265	106	63.0-122	
Chlorobenzene	0.0250	0.0249	99.5	79.0-121	
Chlorodibromomethane	0.0250	0.0251	100	75.0-125	
Chloroethane	0.0250	0.0293	117	47.0-152	
Chloroform	0.0250	0.0252	101	72.0-121	
Chloromethane	0.0250	0.0258	103	48.0-139	
1,2-Dibromoethane	0.0250	0.0248	99.3	77.0-123	
1,1-Dichloroethane	0.0250	0.0283	113	70.0-126	
1,2-Dichloroethane	0.0250	0.0268	107	67.0-126	
1,1-Dichloroethene	0.0250	0.0258	103	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0258	103	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0264	106	71.0-121	
1,2-Dichloropropane	0.0250	0.0258	103	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0260	104	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0248	99.3	74.0-127	

WG1093960

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L982876-01,02

Laboratory Control Sample (LCS)

(LCS) R3300593-1 04/05/18 10:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.0250	0.0250	100	77.0-120	
2-Hexanone	0.125	0.123	98.4	58.0-147	
Isopropylbenzene	0.0250	0.0245	97.9	75.0-120	
p-Isopropyltoluene	0.0250	0.0246	98.2	74.0-126	
2-Butanone (MEK)	0.125	0.138	111	37.0-158	
Methylene Chloride	0.0250	0.0256	103	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.127	102	59.0-143	
Methyl tert-butyl ether	0.0250	0.0270	108	64.0-123	
Naphthalene	0.0250	0.0244	97.8	62.0-128	
n-Propylbenzene	0.0250	0.0241	96.3	79.0-120	
Styrene	0.0250	0.0239	95.6	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0248	99.2	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0221	88.4	71.0-122	
Tetrachloroethene	0.0250	0.0256	102	70.0-127	
Toluene	0.0250	0.0251	101	77.0-120	
1,1,1-Trichloroethane	0.0250	0.0269	108	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0226	90.5	78.0-120	
Trichloroethene	0.0250	0.0253	101	78.0-120	
1,2,4-Trimethylbenzene	0.0250	0.0237	94.6	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0245	97.9	75.0-120	
Vinyl chloride	0.0250	0.0281	112	64.0-133	
Xylenes, Total	0.0750	0.0759	101	77.0-120	
o-Xylene	0.0250	0.0257	103	78.0-120	
m&p-Xylenes	0.0500	0.0502	100	77.0-120	
(S) Toluene-d8			*94.7*	*80.0-120*	
(S) Dibromofluoromethane			*104*	*76.0-123*	
(S) 4-Bromofluorobenzene			*87.1*	*80.0-120*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1093593

QUALITY CONTROL SUMMARY

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

L982876-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300192-1 04/05/18 15:19

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*96.2*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300192-2 04/05/18 15:39 • (LCSD) R3300192-3 04/05/18 15:59

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.47	1.49	98.0	99.3	50.0-150			1.26	20
(S) o-Terphenyl				*110*	*117*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia[1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky[1,6]	90010
Kentucky[2]	16
Louisiana	AI30792
Louisiana[1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086
Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico[1]	n/a
New York	11742
North Carolina	Env375
North Carolina[1]	DW21704
North Carolina[3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee[1,4]	2006
Texas	T 104704245-17-14
Texas[5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

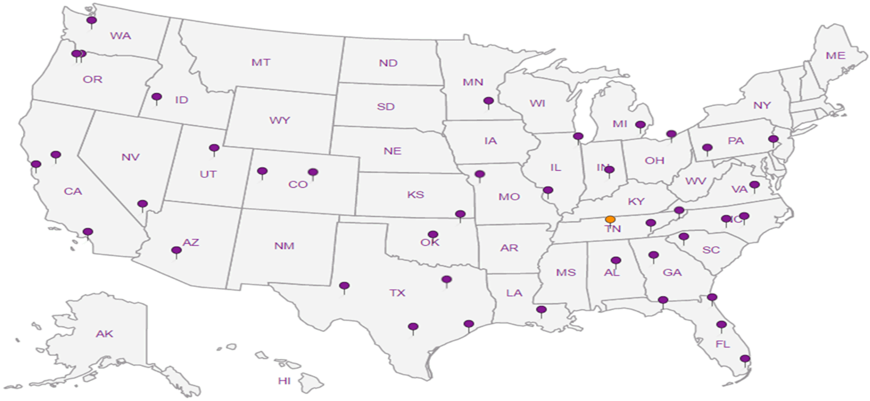
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01
A2LA – ISO 17025[5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003
AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page 1 of 1

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **TMD Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-TMD**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **TMD (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L# L982876

Table # F101

Acctnum: **TRCATX**
Template: **T133687**
Prelogin: **P643798**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
											<2		<2					
MW-26	**Grab**	**GW**		-	-	**8**	X	X		X	X	X	X					
MW-46R	**Grab**	**GW**		**4/3/18**	**1100**	**8**	X	X		X	X	X	X					01
TRIP BLANK-TMD-01	**Grab**	**GW**		-	-	**1**	X											02

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS [✓ FedEx] __ Courier __ ______

Tracking # 4269 4213 4008

Sample Receipt Checklist
COC Seal Present/Intact: __NP [✓ Y] __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 1 [✓ HCL] / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 2.1$^{4}_{10}$ °C Bottles Received: 9	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/4/18 Time: 845	Hold: Condition: NCF / [✓ OK]

Chain of Custody Page 1 of 1

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# L982876
Table #
Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
Shipped Via:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer
Email To: jspeer@trcwsolutions.com
Project Description: TMD Spring 2018
City/State Collected: Artesia, NM
Phone: 512-684-3170
Fax:
Client Project #
Lab Project #
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID #: TMD (Navajo - Artesia)
P.O. #: 119503
Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%
Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes
Immediately Packed on Ice N ___ Y ✓

Analysis / Container / Preservative

								<2			<2				
Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-46R	Grab	GW		4/3/18	1100		✓	✓	✓	✓		✓	✓	✓				-01
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________
Flow ________ Other ________
Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/3/18	Time: 1215	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ____	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4 °C Bottles Received:	COC Seal Intact: ✓ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/4/18 Time: 845	pH Checked: NCF:

ANALYTICAL REPORT

April 17, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L983352
Samples Received:	04/05/2018
Project Number:	294318.0000.0000.
Description:	TEL Spring 2018
Site:	TEL - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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9 Sc

TEL-4 L983352-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 09:25	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095025	1	04/10/18 16:10	04/10/18 16:31	EG
Wet Chemistry by Method 353.2	WG1094862	1	04/09/18 13:58	04/09/18 13:58	JER
Wet Chemistry by Method 9056A	WG1094190	1	04/07/18 00:07	04/07/18 00:07	MAJ
Wet Chemistry by Method 9056A	WG1094190	20	04/07/18 00:21	04/07/18 00:21	MAJ
Wet Chemistry by Method 9056A	WG1095827	50	04/10/18 14:20	04/10/18 14:20	DR
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 16:35	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/12/18 19:14	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/13/18 00:01	JPD
Metals (ICPMS) by Method 6020	WG1097667	1	04/13/18 08:51	04/13/18 12:03	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094454	1	04/06/18 00:30	04/06/18 00:30	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/05/18 23:32	04/05/18 23:32	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 03:48	TH

TEL-3 L983352-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 10:45	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095025	1	04/10/18 16:10	04/10/18 16:31	EG
Wet Chemistry by Method 353.2	WG1094862	5	04/09/18 14:00	04/09/18 14:00	JER
Wet Chemistry by Method 9056A	WG1094190	1	04/07/18 00:34	04/07/18 00:34	MAJ
Wet Chemistry by Method 9056A	WG1094190	20	04/07/18 00:48	04/07/18 00:48	MAJ
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 16:39	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/12/18 19:18	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/13/18 00:05	JPD
Metals (ICPMS) by Method 6020	WG1097667	1	04/13/18 08:51	04/13/18 12:07	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094454	1	04/06/18 00:54	04/06/18 00:54	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/05/18 23:51	04/05/18 23:51	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	10	04/10/18 22:41	04/10/18 22:41	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 04:09	TH

TEL-2 L983352-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 11:45	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095025	1	04/10/18 16:10	04/10/18 16:31	EG
Wet Chemistry by Method 353.2	WG1094862	5	04/09/18 14:01	04/09/18 14:01	JER
Wet Chemistry by Method 9056A	WG1094922	1	04/07/18 19:21	04/07/18 19:21	DR
Wet Chemistry by Method 9056A	WG1094922	20	04/07/18 19:34	04/07/18 19:34	DR
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/12/18 19:22	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/13/18 00:09	JPD
Metals (ICPMS) by Method 6020	WG1097667	1	04/13/18 08:51	04/13/18 12:23	JPD
Metals (ICPMS) by Method 6020	WG1098665	1	04/16/18 20:43	04/17/18 01:54	LD
Metals (ICPMS) by Method 6020	WG1098704	1	04/16/18 09:10	04/16/18 13:34	LAT
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094454	10	04/06/18 01:18	04/06/18 01:18	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	10	04/06/18 00:10	04/06/18 00:10	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	5	04/06/18 03:56	04/11/18 20:40	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

TEL-1 L983352-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 12:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095025	1	04/10/18 16:10	04/10/18 16:31	EG
Wet Chemistry by Method 353.2	WG1094862	1	04/09/18 14:02	04/09/18 14:02	JER
Wet Chemistry by Method 9056A	WG1094922	1	04/07/18 19:46	04/07/18 19:46	DR
Wet Chemistry by Method 9056A	WG1094922	20	04/07/18 20:23	04/07/18 20:23	DR
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 16:59	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/12/18 19:41	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/13/18 00:48	JPD
Metals (ICPMS) by Method 6020	WG1097667	1	04/13/18 08:51	04/13/18 12:27	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094454	1	04/06/18 07:42	04/06/18 07:42	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/06/18 00:29	04/06/18 00:29	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 04:49	TH

DUP-TEL-01 L983352-05 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 10:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095025	1	04/10/18 16:10	04/10/18 16:31	EG
Wet Chemistry by Method 353.2	WG1094862	1	04/09/18 14:04	04/09/18 14:04	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 03:52	04/06/18 03:52	MAJ
Wet Chemistry by Method 9056A	WG1094250	20	04/06/18 04:05	04/06/18 04:05	MAJ
Wet Chemistry by Method 9056A	WG1094722	50	04/06/18 19:30	04/06/18 19:30	MAJ
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:03	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/12/18 19:45	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/13/18 00:52	JPD
Metals (ICPMS) by Method 6020	WG1097667	1	04/13/18 08:51	04/13/18 12:32	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094454	1	04/06/18 08:06	04/06/18 08:06	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/06/18 00:48	04/06/18 00:48	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 05:09	TH

EB-TEL-01 L983352-06 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 11:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1097188	1	04/12/18 17:09	04/12/18 17:27	EG
Wet Chemistry by Method 353.2	WG1094862	1	04/09/18 14:09	04/09/18 14:09	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 04:17	04/06/18 04:17	MAJ
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 16:19	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/12/18 18:56	LD
Metals (ICPMS) by Method 6020	WG1094695	1	04/09/18 17:38	04/12/18 23:45	JPD
Metals (ICPMS) by Method 6020	WG1097667	1	04/13/18 08:51	04/13/18 12:35	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094454	1	04/06/18 08:30	04/06/18 08:30	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/06/18 01:07	04/06/18 01:07	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 05:29	TH

TRIP BLANK-TEL-01 L983352-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 00:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/05/18 20:41	04/05/18 20:41	LRL

CASE NARRATIVE

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4330		2.82	10.0	1	04/10/2018 16:31	WG1095025

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0230	J	0.0197	0.100	1	04/09/2018 13:58	WG1094862

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	360		1.04	20.0	20	04/07/2018 00:21	WG1094190
Fluoride	1.12		0.00990	0.100	1	04/07/2018 00:07	WG1094190
Sulfate	2400		3.87	250	50	04/10/2018 14:20	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00733		0.000250	0.00200	1	04/12/2018 19:14	WG1094695
Arsenic,Dissolved	0.00619		0.000250	0.00200	1	04/11/2018 16:35	WG1094247
Barium	0.0224		0.000360	0.00500	1	04/12/2018 19:14	WG1094695
Barium,Dissolved	0.0207		0.000360	0.00500	1	04/11/2018 16:35	WG1094247
Calcium	448		0.0460	1.00	1	04/12/2018 19:14	WG1094695
Chromium	0.593		0.000540	0.00200	1	04/13/2018 00:01	WG1094695
Chromium,Dissolved	0.0734		0.000540	0.00200	1	04/11/2018 16:35	WG1094247
Iron	0.796		0.0150	0.100	1	04/12/2018 19:14	WG1094695
Iron,Dissolved	0.233		0.0150	0.100	1	04/11/2018 16:35	WG1094247
Lead	0.000795	J	0.000240	0.00200	1	04/12/2018 19:14	WG1094695
Lead,Dissolved	0.000648	J	0.000240	0.00200	1	04/11/2018 16:35	WG1094247
Manganese	1.48		0.000250	0.00500	1	04/12/2018 19:14	WG1094695
Manganese,Dissolved	1.46		0.000250	0.00500	1	04/11/2018 16:35	WG1094247
Potassium	1.19	B	0.0370	1.00	1	04/13/2018 12:03	WG1097667
Selenium	U		0.000380	0.00200	1	04/12/2018 19:14	WG1094695
Selenium,Dissolved	0.000680	J	0.000380	0.00200	1	04/11/2018 16:35	WG1094247
Sodium	477		0.110	1.00	1	04/12/2018 19:14	WG1094695

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.32		0.0314	0.100	1	04/06/2018 00:30	WG1094454
(S) a,a,a-Trifluorotoluene(FID)	*117*			*77.0-122*		*04/06/2018 00:30*	WG1094454

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/05/2018 23:32	WG1094405
Benzene	0.0415		0.000331	0.00100	1	04/05/2018 23:32	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 23:32	WG1094405
Bromoform	U		0.000469	0.00100	1	04/05/2018 23:32	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/05/2018 23:32	WG1094405
n-Butylbenzene	0.00236		0.000361	0.00100	1	04/05/2018 23:32	WG1094405
sec-Butylbenzene	0.0105		0.000365	0.00100	1	04/05/2018 23:32	WG1094405
Carbon disulfide	0.000526	J	0.000275	0.00100	1	04/05/2018 23:32	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 23:32	WG1094405

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 23:32	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 23:32	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/05/2018 23:32	WG1094405
Chloroform	U		0.000324	0.00500	1	04/05/2018 23:32	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/05/2018 23:32	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 23:32	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 23:32	WG1094405
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 23:32	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 23:32	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 23:32	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 23:32	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 23:32	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 23:32	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 23:32	WG1094405
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 23:32	WG1094405
Isopropylbenzene	0.0266		0.000326	0.00100	1	04/05/2018 23:32	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 23:32	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 23:32	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 23:32	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 23:32	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 23:32	WG1094405
Methyl tert-butyl ether	0.0670		0.000367	0.00100	1	04/05/2018 23:32	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/05/2018 23:32	WG1094405
n-Propylbenzene	0.0295		0.000349	0.00100	1	04/05/2018 23:32	WG1094405
Styrene	U		0.000307	0.00100	1	04/05/2018 23:32	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 23:32	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 23:32	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 23:32	WG1094405
Toluene	0.00124		0.000412	0.00100	1	04/05/2018 23:32	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 23:32	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 23:32	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 23:32	WG1094405
1,2,4-Trimethylbenzene	0.00454		0.000373	0.00100	1	04/05/2018 23:32	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 23:32	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 23:32	WG1094405
o-Xylene	U		0.000341	0.00100	1	04/05/2018 23:32	WG1094405
m&p-Xylene	0.00408		0.000719	0.00200	1	04/05/2018 23:32	WG1094405
Xylenes, Total	0.00408		0.00106	0.00300	1	04/05/2018 23:32	WG1094405
(S) Toluene-d8	*97.2*			*80.0-120*		*04/05/2018 23:32*	WG1094405
(S) Dibromofluoromethane	*96.4*			*76.0-123*		*04/05/2018 23:32*	WG1094405
(S) 4-Bromofluorobenzene	*87.2*			*80.0-120*		*04/05/2018 23:32*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.99		0.0247	0.100	1	04/08/2018 03:48	WG1094423
(S) o-Terphenyl	*116*			*31.0-160*		*04/08/2018 03:48*	WG1094423

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2440		2.82	10.0	1	04/10/2018 16:31	WG1095025

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0985	0.500	5	04/09/2018 14:00	WG1094862

Sample Narrative:

L983352-02 WG1094862: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	696		1.04	20.0	20	04/07/2018 00:48	WG1094190
Fluoride	2.51		0.00990	0.100	1	04/07/2018 00:34	WG1094190
Sulfate	442		1.55	100	20	04/07/2018 00:48	WG1094190

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0109		0.000250	0.00200	1	04/12/2018 19:18	WG1094695
Arsenic,Dissolved	0.00964		0.000250	0.00200	1	04/11/2018 16:39	WG1094247
Barium	0.0248		0.000360	0.00500	1	04/12/2018 19:18	WG1094695
Barium,Dissolved	0.0219		0.000360	0.00500	1	04/11/2018 16:39	WG1094247
Calcium	302		0.0460	1.00	1	04/12/2018 19:18	WG1094695
Chromium	0.334		0.000540	0.00200	1	04/13/2018 00:05	WG1094695
Chromium,Dissolved	0.0263		0.000540	0.00200	1	04/11/2018 16:39	WG1094247
Iron	1.47		0.0150	0.100	1	04/12/2018 19:18	WG1094695
Iron,Dissolved	0.0526	J	0.0150	0.100	1	04/11/2018 16:39	WG1094247
Lead	0.000726	J	0.000240	0.00200	1	04/12/2018 19:18	WG1094695
Lead,Dissolved	0.000337	J	0.000240	0.00200	1	04/11/2018 16:39	WG1094247
Manganese	0.0114		0.000250	0.00500	1	04/12/2018 19:18	WG1094695
Manganese,Dissolved	0.00609		0.000250	0.00500	1	04/11/2018 16:39	WG1094247
Potassium	6.00		0.0370	1.00	1	04/13/2018 12:07	WG1097667
Selenium	U		0.000380	0.00200	1	04/12/2018 19:18	WG1094695
Selenium,Dissolved	0.000457	J	0.000380	0.00200	1	04/11/2018 16:39	WG1094247
Sodium	308		0.110	1.00	1	04/12/2018 19:18	WG1094695

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	2.05		0.0314	0.100	1	04/06/2018 00:54	WG1094454
(S) a,a,a-Trifluorotoluene(FID)	*111*			*77.0-122*		*04/06/2018 00:54*	WG1094454

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/05/2018 23:51	WG1094405
Benzene	0.392		0.00331	0.0100	10	04/10/2018 22:41	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 23:51	WG1094405
Bromoform	U		0.000469	0.00100	1	04/05/2018 23:51	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/05/2018 23:51	WG1094405
n-Butylbenzene	0.00174		0.000361	0.00100	1	04/05/2018 23:51	WG1094405

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
sec-Butylbenzene	0.0117		0.000365	0.00100	1	04/05/2018 23:51	WG1094405
Carbon disulfide	0.00114		0.000275	0.00100	1	04/05/2018 23:51	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 23:51	WG1094405
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 23:51	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 23:51	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/05/2018 23:51	WG1094405
Chloroform	U		0.000324	0.00500	1	04/05/2018 23:51	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/05/2018 23:51	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 23:51	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 23:51	WG1094405
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 23:51	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 23:51	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 23:51	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 23:51	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 23:51	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 23:51	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 23:51	WG1094405
Ethylbenzene	0.00162		0.000384	0.00100	1	04/05/2018 23:51	WG1094405
Isopropylbenzene	0.0556		0.000326	0.00100	1	04/05/2018 23:51	WG1094405
p-Isopropyltoluene	0.000823	J	0.000350	0.00100	1	04/05/2018 23:51	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 23:51	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 23:51	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 23:51	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 23:51	WG1094405
Methyl tert-butyl ether	0.0637		0.000367	0.00100	1	04/05/2018 23:51	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/05/2018 23:51	WG1094405
n-Propylbenzene	0.00998		0.000349	0.00100	1	04/05/2018 23:51	WG1094405
Styrene	U		0.000307	0.00100	1	04/05/2018 23:51	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 23:51	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 23:51	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 23:51	WG1094405
Toluene	0.00394		0.000412	0.00100	1	04/05/2018 23:51	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 23:51	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 23:51	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 23:51	WG1094405
1,2,4-Trimethylbenzene	0.0200		0.000373	0.00100	1	04/05/2018 23:51	WG1094405
1,3,5-Trimethylbenzene	0.000983	J	0.000387	0.00100	1	04/05/2018 23:51	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 23:51	WG1094405
o-Xylene	0.00313		0.000341	0.00100	1	04/05/2018 23:51	WG1094405
m&p-Xylene	0.0188		0.000719	0.00200	1	04/05/2018 23:51	WG1094405
Xylenes, Total	0.0219		0.00106	0.00300	1	04/05/2018 23:51	WG1094405
(S) Toluene-d8	*107*			*80.0-120*		*04/10/2018 22:41*	WG1094405
(S) Toluene-d8	*99.1*			*80.0-120*		*04/05/2018 23:51*	WG1094405
(S) Dibromofluoromethane	*90.7*			*76.0-123*		*04/05/2018 23:51*	WG1094405
(S) Dibromofluoromethane	*100*			*76.0-123*		*04/10/2018 22:41*	WG1094405
(S) 4-Bromofluorobenzene	*86.3*			*80.0-120*		*04/05/2018 23:51*	WG1094405
(S) 4-Bromofluorobenzene	*95.0*			*80.0-120*		*04/10/2018 22:41*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	7.42		0.0247	0.100	1	04/08/2018 04:09	WG1094423
(S) o-Terphenyl	*106*			*31.0-160*		*04/08/2018 04:09*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2770		2.82	10.0	1	04/10/2018 16:31	WG1095025

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0985	0.500	5	04/09/2018 14:01	WG1094862

Sample Narrative:

L983352-03 WG1094862: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	222		1.04	20.0	20	04/07/2018 19:34	WG1094922
Fluoride	1.08		0.00990	0.100	1	04/07/2018 19:21	WG1094922
Sulfate	1200		1.55	100	20	04/07/2018 19:34	WG1094922

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0183		0.000250	0.00200	1	04/12/2018 19:22	WG1094695
Arsenic,Dissolved	0.0166		0.000250	0.00200	1	04/16/2018 13:34	WG1098704
Barium	0.221		0.000360	0.00500	1	04/12/2018 19:22	WG1094695
Barium,Dissolved	0.0431		0.000360	0.00500	1	04/16/2018 13:34	WG1098704
Calcium	260		0.0460	1.00	1	04/12/2018 19:22	WG1094695
Chromium	0.00202		0.000540	0.00200	1	04/13/2018 00:09	WG1094695
Chromium,Dissolved	0.000859	J	0.000540	0.00200	1	04/16/2018 13:34	WG1098704
Iron	0.0568	J	0.0150	0.100	1	04/12/2018 19:22	WG1094695
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 13:34	WG1098704
Lead	0.00114	J	0.000240	0.00200	1	04/12/2018 19:22	WG1094695
Lead,Dissolved	0.00255	B	0.000240	0.00200	1	04/16/2018 13:34	WG1098704
Manganese	0.0154		0.000250	0.00500	1	04/12/2018 19:22	WG1094695
Manganese,Dissolved	0.0149		0.000250	0.00500	1	04/16/2018 13:34	WG1098704
Potassium	1.78	B	0.0370	1.00	1	04/13/2018 12:23	WG1097667
Selenium	0.000522	J	0.000380	0.00200	1	04/12/2018 19:22	WG1094695
Selenium,Dissolved	0.000571	J	0.000380	0.00200	1	04/17/2018 01:54	WG1098665
Sodium	451		0.110	1.00	1	04/12/2018 19:22	WG1094695

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	3.84		0.314	1.00	10	04/06/2018 01:18	WG1094454
(S) a,a,a-Trifluorotoluene(FID)	*114*			*77.0-122*		*04/06/2018 01:18*	WG1094454

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.100	0.500	10	04/06/2018 00:10	WG1094405
Benzene	0.619		0.00331	0.0100	10	04/06/2018 00:10	WG1094405
Bromodichloromethane	U		0.00380	0.0100	10	04/06/2018 00:10	WG1094405
Bromoform	U		0.00469	0.0100	10	04/06/2018 00:10	WG1094405
Bromomethane	U		0.00866	0.0500	10	04/06/2018 00:10	WG1094405
n-Butylbenzene	U		0.00361	0.0100	10	04/06/2018 00:10	WG1094405

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
sec-Butylbenzene	0.00651	J	0.00365	0.0100	10	04/06/2018 00:10	WG1094405
Carbon disulfide	U		0.00275	0.0100	10	04/06/2018 00:10	WG1094405
Carbon tetrachloride	U		0.00379	0.0100	10	04/06/2018 00:10	WG1094405
Chlorobenzene	U		0.00348	0.0100	10	04/06/2018 00:10	WG1094405
Chlorodibromomethane	U		0.00327	0.0100	10	04/06/2018 00:10	WG1094405
Chloroethane	U		0.00453	0.0500	10	04/06/2018 00:10	WG1094405
Chloroform	U		0.00324	0.0500	10	04/06/2018 00:10	WG1094405
Chloromethane	U		0.00276	0.0250	10	04/06/2018 00:10	WG1094405
1,2-Dibromoethane	U		0.00381	0.0100	10	04/06/2018 00:10	WG1094405
1,1-Dichloroethane	U		0.00259	0.0100	10	04/06/2018 00:10	WG1094405
1,2-Dichloroethane	U		0.00361	0.0100	10	04/06/2018 00:10	WG1094405
1,1-Dichloroethene	U		0.00398	0.0100	10	04/06/2018 00:10	WG1094405
cis-1,2-Dichloroethene	U		0.00260	0.0100	10	04/06/2018 00:10	WG1094405
trans-1,2-Dichloroethene	U		0.00396	0.0100	10	04/06/2018 00:10	WG1094405
1,2-Dichloropropane	U		0.00306	0.0100	10	04/06/2018 00:10	WG1094405
cis-1,3-Dichloropropene	U		0.00418	0.0100	10	04/06/2018 00:10	WG1094405
trans-1,3-Dichloropropene	U		0.00419	0.0100	10	04/06/2018 00:10	WG1094405
Ethylbenzene	U		0.00384	0.0100	10	04/06/2018 00:10	WG1094405
Isopropylbenzene	0.0303		0.00326	0.0100	10	04/06/2018 00:10	WG1094405
p-Isopropyltoluene	U		0.00350	0.0100	10	04/06/2018 00:10	WG1094405
2-Butanone (MEK)	U		0.0393	0.100	10	04/06/2018 00:10	WG1094405
2-Hexanone	U		0.0382	0.100	10	04/06/2018 00:10	WG1094405
Methylene Chloride	U		0.0100	0.0500	10	04/06/2018 00:10	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.0214	0.100	10	04/06/2018 00:10	WG1094405
Methyl tert-butyl ether	0.00795	J	0.00367	0.0100	10	04/06/2018 00:10	WG1094405
Naphthalene	U		0.0100	0.0500	10	04/06/2018 00:10	WG1094405
n-Propylbenzene	0.0322		0.00349	0.0100	10	04/06/2018 00:10	WG1094405
Styrene	U		0.00307	0.0100	10	04/06/2018 00:10	WG1094405
1,1,1,2-Tetrachloroethane	U		0.00385	0.0100	10	04/06/2018 00:10	WG1094405
1,1,2,2-Tetrachloroethane	U		0.00130	0.0100	10	04/06/2018 00:10	WG1094405
Tetrachloroethene	U		0.00372	0.0100	10	04/06/2018 00:10	WG1094405
Toluene	0.0134		0.00412	0.0100	10	04/06/2018 00:10	WG1094405
1,1,1-Trichloroethane	U		0.00319	0.0100	10	04/06/2018 00:10	WG1094405
1,1,2-Trichloroethane	U		0.00383	0.0100	10	04/06/2018 00:10	WG1094405
Trichloroethene	U		0.00398	0.0100	10	04/06/2018 00:10	WG1094405
1,2,4-Trimethylbenzene	0.0855		0.00373	0.0100	10	04/06/2018 00:10	WG1094405
1,3,5-Trimethylbenzene	0.00503	J	0.00387	0.0100	10	04/06/2018 00:10	WG1094405
Vinyl chloride	U		0.00259	0.0100	10	04/06/2018 00:10	WG1094405
o-Xylene	U		0.00341	0.0100	10	04/06/2018 00:10	WG1094405
m&p-Xylene	0.0962		0.00719	0.0200	10	04/06/2018 00:10	WG1094405
Xylenes, Total	0.0962		0.0106	0.0300	10	04/06/2018 00:10	WG1094405
(S) Toluene-d8	*102*			*80.0-120*		*04/06/2018 00:10*	WG1094405
(S) Dibromofluoromethane	*96.2*			*76.0-123*		*04/06/2018 00:10*	WG1094405
(S) 4-Bromofluorobenzene	*87.0*			*80.0-120*		*04/06/2018 00:10*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	16.7		0.124	0.500	5	04/11/2018 20:40	WG1094423
(S) o-Terphenyl	*114*			*31.0-160*		*04/11/2018 20:40*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2230		2.82	10.0	1	04/10/2018 16:31	WG1095025

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U	J6	0.0197	0.100	1	04/09/2018 14:02	WG1094862

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	272		1.04	20.0	20	04/07/2018 20:23	WG1094922
Fluoride	2.23		0.00990	0.100	1	04/07/2018 19:46	WG1094922
Sulfate	815		1.55	100	20	04/07/2018 20:23	WG1094922

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0132		0.000250	0.00200	1	04/12/2018 19:41	WG1094695
Arsenic,Dissolved	0.0132		0.000250	0.00200	1	04/11/2018 16:59	WG1094247
Barium	0.0140		0.000360	0.00500	1	04/12/2018 19:41	WG1094695
Barium,Dissolved	0.0145		0.000360	0.00500	1	04/11/2018 16:59	WG1094247
Calcium	188		0.0460	1.00	1	04/12/2018 19:41	WG1094695
Chromium	0.0103		0.000540	0.00200	1	04/13/2018 00:48	WG1094695
Chromium,Dissolved	0.00212		0.000540	0.00200	1	04/11/2018 16:59	WG1094247
Iron	0.107		0.0150	0.100	1	04/12/2018 19:41	WG1094695
Iron,Dissolved	0.0315	J	0.0150	0.100	1	04/11/2018 16:59	WG1094247
Lead	U		0.000240	0.00200	1	04/12/2018 19:41	WG1094695
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 16:59	WG1094247
Manganese	0.0532		0.000250	0.00500	1	04/12/2018 19:41	WG1094695
Manganese,Dissolved	0.0540		0.000250	0.00500	1	04/11/2018 16:59	WG1094247
Potassium	1.06	B	0.0370	1.00	1	04/13/2018 12:27	WG1097667
Selenium	U		0.000380	0.00200	1	04/12/2018 19:41	WG1094695
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 16:59	WG1094247
Sodium	465		0.110	1.00	1	04/12/2018 19:41	WG1094695

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.415		0.0314	0.100	1	04/06/2018 07:42	WG1094454
(S) a,a,a-Trifluorotoluene(FID)	*115*			*77.0-122*		*04/06/2018 07:42*	WG1094454

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 00:29	WG1094405
Benzene	U		0.000331	0.00100	1	04/06/2018 00:29	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 00:29	WG1094405
Bromoform	U		0.000469	0.00100	1	04/06/2018 00:29	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/06/2018 00:29	WG1094405
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 00:29	WG1094405
sec-Butylbenzene	0.000579	J	0.000365	0.00100	1	04/06/2018 00:29	WG1094405
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 00:29	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 00:29	WG1094405

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 00:29	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 00:29	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/06/2018 00:29	WG1094405
Chloroform	U		0.000324	0.00500	1	04/06/2018 00:29	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/06/2018 00:29	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 00:29	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 00:29	WG1094405
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 00:29	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 00:29	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 00:29	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 00:29	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 00:29	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 00:29	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 00:29	WG1094405
Ethylbenzene	0.000482	J	0.000384	0.00100	1	04/06/2018 00:29	WG1094405
Isopropylbenzene	0.00114		0.000326	0.00100	1	04/06/2018 00:29	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 00:29	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 00:29	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 00:29	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 00:29	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 00:29	WG1094405
Methyl tert-butyl ether	0.00337		0.000367	0.00100	1	04/06/2018 00:29	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/06/2018 00:29	WG1094405
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 00:29	WG1094405
Styrene	U		0.000307	0.00100	1	04/06/2018 00:29	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 00:29	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 00:29	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 00:29	WG1094405
Toluene	0.000872	J	0.000412	0.00100	1	04/06/2018 00:29	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 00:29	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 00:29	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 00:29	WG1094405
1,2,4-Trimethylbenzene	0.000848	J	0.000373	0.00100	1	04/06/2018 00:29	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 00:29	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 00:29	WG1094405
o-Xylene	0.00136		0.000341	0.00100	1	04/06/2018 00:29	WG1094405
m&p-Xylene	0.000870	J	0.000719	0.00200	1	04/06/2018 00:29	WG1094405
Xylenes, Total	0.00223	J	0.00106	0.00300	1	04/06/2018 00:29	WG1094405
(S) Toluene-d8	*101*			*80.0-120*		*04/06/2018 00:29*	WG1094405
(S) Dibromofluoromethane	*95.6*			*76.0-123*		*04/06/2018 00:29*	WG1094405
(S) 4-Bromofluorobenzene	*86.8*			*80.0-120*		*04/06/2018 00:29*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	8.29		0.0247	0.100	1	04/08/2018 04:49	WG1094423
(S) o-Terphenyl	*102*			*31.0-160*		*04/08/2018 04:49*	WG1094423

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4490		2.82	10.0	1	04/10/2018 16:31	WG1095025

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0280	J	0.0197	0.100	1	04/09/2018 14:04	WG1094862

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	362		1.04	20.0	20	04/06/2018 04:05	WG1094250
Fluoride	1.09		0.00990	0.100	1	04/06/2018 03:52	WG1094250
Sulfate	2460		3.87	250	50	04/06/2018 19:30	WG1094722

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00695		0.000250	0.00200	1	04/12/2018 19:45	WG1094695
Arsenic,Dissolved	0.00629		0.000250	0.00200	1	04/11/2018 17:03	WG1094247
Barium	0.0208		0.000360	0.00500	1	04/12/2018 19:45	WG1094695
Barium,Dissolved	0.0205		0.000360	0.00500	1	04/11/2018 17:03	WG1094247
Calcium	439		0.0460	1.00	1	04/12/2018 19:45	WG1094695
Chromium	0.741		0.000540	0.00200	1	04/13/2018 00:52	WG1094695
Chromium,Dissolved	0.0748		0.000540	0.00200	1	04/11/2018 17:03	WG1094247
Iron	0.950		0.0150	0.100	1	04/12/2018 19:45	WG1094695
Iron,Dissolved	0.229		0.0150	0.100	1	04/11/2018 17:03	WG1094247
Lead	0.000918	J	0.000240	0.00200	1	04/12/2018 19:45	WG1094695
Lead,Dissolved	0.000498	J	0.000240	0.00200	1	04/11/2018 17:03	WG1094247
Manganese	1.45		0.000250	0.00500	1	04/12/2018 19:45	WG1094695
Manganese,Dissolved	1.45		0.000250	0.00500	1	04/11/2018 17:03	WG1094247
Potassium	1.19	B	0.0370	1.00	1	04/13/2018 12:32	WG1097667
Selenium	0.000409	J	0.000380	0.00200	1	04/12/2018 19:45	WG1094695
Selenium,Dissolved	0.000471	J	0.000380	0.00200	1	04/11/2018 17:03	WG1094247
Sodium	470		0.110	1.00	1	04/12/2018 19:45	WG1094695

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.16		0.0314	0.100	1	04/06/2018 08:06	WG1094454
(S) a,a,a-Trifluorotoluene(FID)	*117*			*77.0-122*		*04/06/2018 08:06*	WG1094454

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 00:48	WG1094405
Benzene	0.0405		0.000331	0.00100	1	04/06/2018 00:48	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 00:48	WG1094405
Bromoform	U		0.000469	0.00100	1	04/06/2018 00:48	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/06/2018 00:48	WG1094405
n-Butylbenzene	0.00245		0.000361	0.00100	1	04/06/2018 00:48	WG1094405
sec-Butylbenzene	0.0111		0.000365	0.00100	1	04/06/2018 00:48	WG1094405
Carbon disulfide	0.000293	J	0.000275	0.00100	1	04/06/2018 00:48	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 00:48	WG1094405

DUP-TEL-01
Collected date/time: 04/03/18 10:00

SAMPLE RESULTS - 05

L983352

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 00:48	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 00:48	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/06/2018 00:48	WG1094405
Chloroform	U		0.000324	0.00500	1	04/06/2018 00:48	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/06/2018 00:48	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 00:48	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 00:48	WG1094405
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 00:48	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 00:48	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 00:48	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 00:48	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 00:48	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 00:48	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 00:48	WG1094405
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 00:48	WG1094405
Isopropylbenzene	0.0266		0.000326	0.00100	1	04/06/2018 00:48	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 00:48	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 00:48	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 00:48	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 00:48	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 00:48	WG1094405
Methyl tert-butyl ether	0.0671		0.000367	0.00100	1	04/06/2018 00:48	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/06/2018 00:48	WG1094405
n-Propylbenzene	0.0299		0.000349	0.00100	1	04/06/2018 00:48	WG1094405
Styrene	U		0.000307	0.00100	1	04/06/2018 00:48	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 00:48	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 00:48	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 00:48	WG1094405
Toluene	0.00126		0.000412	0.00100	1	04/06/2018 00:48	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 00:48	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 00:48	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 00:48	WG1094405
1,2,4-Trimethylbenzene	0.00438		0.000373	0.00100	1	04/06/2018 00:48	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 00:48	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 00:48	WG1094405
o-Xylene	U		0.000341	0.00100	1	04/06/2018 00:48	WG1094405
m&p-Xylene	0.00401		0.000719	0.00200	1	04/06/2018 00:48	WG1094405
Xylenes, Total	0.00401		0.00106	0.00300	1	04/06/2018 00:48	WG1094405
(S) Toluene-d8	*99.4*			*80.0-120*		*04/06/2018 00:48*	WG1094405
(S) Dibromofluoromethane	*96.2*			*76.0-123*		*04/06/2018 00:48*	WG1094405
(S) 4-Bromofluorobenzene	*88.6*			*80.0-120*		*04/06/2018 00:48*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.24		0.0247	0.100	1	04/08/2018 05:09	WG1094423
(S) o-Terphenyl	*111*			*31.0-160*		*04/08/2018 05:09*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	18.0	Q	2.82	10.0	1	04/12/2018 17:27	WG1097188

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0450	J	0.0197	0.100	1	04/09/2018 14:09	WG1094862

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.932	J	0.0519	1.00	1	04/06/2018 04:17	WG1094250
Fluoride	U		0.00990	0.100	1	04/06/2018 04:17	WG1094250
Sulfate	0.759	J	0.0774	5.00	1	04/06/2018 04:17	WG1094250

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00103	J	0.000250	0.00200	1	04/12/2018 18:56	WG1094695
Arsenic,Dissolved	U		0.000250	0.00200	1	04/11/2018 16:19	WG1094247
Barium	0.00139	J	0.000360	0.00500	1	04/12/2018 18:56	WG1094695
Barium,Dissolved	0.00137	J	0.000360	0.00500	1	04/11/2018 16:19	WG1094247
Calcium	0.442	J	0.0460	1.00	1	04/12/2018 18:56	WG1094695
Chromium	U		0.000540	0.00200	1	04/12/2018 23:45	WG1094695
Chromium,Dissolved	0.00123	J	0.000540	0.00200	1	04/11/2018 16:19	WG1094247
Iron	U		0.0150	0.100	1	04/12/2018 18:56	WG1094695
Iron,Dissolved	0.0273	J	0.0150	0.100	1	04/11/2018 16:19	WG1094247
Lead	U		0.000240	0.00200	1	04/12/2018 18:56	WG1094695
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 16:19	WG1094247
Manganese	U		0.000250	0.00500	1	04/12/2018 18:56	WG1094695
Manganese,Dissolved	U		0.000250	0.00500	1	04/11/2018 16:19	WG1094247
Potassium	0.530	B J	0.0370	1.00	1	04/13/2018 12:35	WG1097667
Selenium	U		0.000380	0.00200	1	04/12/2018 18:56	WG1094695
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 16:19	WG1094247
Sodium	1.14		0.110	1.00	1	04/12/2018 18:56	WG1094695

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/06/2018 08:30	WG1094454
(S) a,a,a-Trifluorotoluene(FID)	*115*			*77.0-122*		*04/06/2018 08:30*	WG1094454

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 01:07	WG1094405
Benzene	U		0.000331	0.00100	1	04/06/2018 01:07	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 01:07	WG1094405
Bromoform	U		0.000469	0.00100	1	04/06/2018 01:07	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/06/2018 01:07	WG1094405
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 01:07	WG1094405
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 01:07	WG1094405
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 01:07	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 01:07	WG1094405

EB-TEL-01
Collected date/time: 04/03/18 11:00

SAMPLE RESULTS - 06

L983352

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 01:07	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 01:07	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/06/2018 01:07	WG1094405
Chloroform	U		0.000324	0.00500	1	04/06/2018 01:07	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/06/2018 01:07	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 01:07	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 01:07	WG1094405
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 01:07	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 01:07	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 01:07	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 01:07	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 01:07	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 01:07	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 01:07	WG1094405
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 01:07	WG1094405
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 01:07	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 01:07	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 01:07	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 01:07	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 01:07	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 01:07	WG1094405
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 01:07	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/06/2018 01:07	WG1094405
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 01:07	WG1094405
Styrene	U		0.000307	0.00100	1	04/06/2018 01:07	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 01:07	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 01:07	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 01:07	WG1094405
Toluene	U		0.000412	0.00100	1	04/06/2018 01:07	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 01:07	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 01:07	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 01:07	WG1094405
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 01:07	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 01:07	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 01:07	WG1094405
o-Xylene	U		0.000341	0.00100	1	04/06/2018 01:07	WG1094405
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 01:07	WG1094405
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 01:07	WG1094405
(S) Toluene-d8	*103*			*80.0-120*		*04/06/2018 01:07*	WG1094405
(S) Dibromofluoromethane	*96.6*			*76.0-123*		*04/06/2018 01:07*	WG1094405
(S) 4-Bromofluorobenzene	*89.3*			*80.0-120*		*04/06/2018 01:07*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0312	J	0.0247	0.100	1	04/08/2018 05:29	WG1094423
(S) o-Terphenyl	*100*			*31.0-160*		*04/08/2018 05:29*	WG1094423

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	0.0135	J	0.0100	0.0500	1	04/05/2018 20:41	WG1094405
Benzene	U		0.000331	0.00100	1	04/05/2018 20:41	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 20:41	WG1094405
Bromoform	U		0.000469	0.00100	1	04/05/2018 20:41	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/05/2018 20:41	WG1094405
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 20:41	WG1094405
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 20:41	WG1094405
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 20:41	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 20:41	WG1094405
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 20:41	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 20:41	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/05/2018 20:41	WG1094405
Chloroform	U		0.000324	0.00500	1	04/05/2018 20:41	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/05/2018 20:41	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 20:41	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 20:41	WG1094405
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 20:41	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 20:41	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 20:41	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 20:41	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 20:41	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 20:41	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 20:41	WG1094405
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 20:41	WG1094405
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 20:41	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 20:41	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 20:41	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 20:41	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 20:41	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 20:41	WG1094405
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 20:41	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/05/2018 20:41	WG1094405
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 20:41	WG1094405
Styrene	U		0.000307	0.00100	1	04/05/2018 20:41	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 20:41	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 20:41	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 20:41	WG1094405
Toluene	U		0.000412	0.00100	1	04/05/2018 20:41	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 20:41	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 20:41	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 20:41	WG1094405
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 20:41	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 20:41	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 20:41	WG1094405
o-Xylene	U		0.000341	0.00100	1	04/05/2018 20:41	WG1094405
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 20:41	WG1094405
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 20:41	WG1094405
(S) Toluene-d8	*103*			*80.0-120*		*04/05/2018 20:41*	WG1094405
(S) Dibromofluoromethane	*99.5*			*76.0-123*		*04/05/2018 20:41*	WG1094405
(S) 4-Bromofluorobenzene	*90.6*			*80.0-120*		*04/05/2018 20:41*	WG1094405

WG1095025

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983352-01,02,03,04,05

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300991-1 04/10/18 16:31

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L982870-01 Original Sample (OS) • Duplicate (DUP)

(OS) L982870-01 04/10/18 16:31 • (DUP) R3300991-4 04/10/18 16:31

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	3900	4200	1	7.42	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300991-2 04/10/18 16:31 • (LCSD) R3300991-3 04/10/18 16:31

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8530	8300	96.9	94.3	85.0-115			2.73	5

WG1097188

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983352-06

Method Blank (MB)

(MB) R3301686-1 04/12/18 17:27

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L984958-02 Original Sample (OS) • Duplicate (DUP)

(OS) L984958-02 04/12/18 17:27 • (DUP) R3301686-4 04/12/18 17:27

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2940	3120	1	5.94	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301686-2 04/12/18 17:27 • (LCSD) R3301686-3 04/12/18 17:27

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8480	8860	96.4	101	85.0-115			4.38	5

Method Blank (MB)

(MB) R3300262-1 04/09/18 13:55

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983352-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983352-01 04/09/18 13:58 • (DUP) R3300262-4 04/09/18 13:59

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	0.0230	0.0250	1	8.33	J	20

L983408-13 Original Sample (OS) • Duplicate (DUP)

(OS) L983408-13 04/09/18 14:27 • (DUP) R3300262-6 04/09/18 14:28

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300262-2 04/09/18 13:56 • (LCSD) R3300262-3 04/09/18 13:57

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.77	3.84	94.3	96.0	90.0-110			1.73	20

L983352-04 Original Sample (OS) • Matrix Spike (MS)

(OS) L983352-04 04/09/18 14:02 • (MS) R3300262-5 04/09/18 14:03

Analyte	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	U	1.96	78.5	1	90.0-110	J6

L983408-14 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983408-14 04/09/18 14:29 • (MS) R3300262-7 04/09/18 14:30 • (MSD) R3300262-8 04/09/18 14:31

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	0.294	2.39	2.41	83.7	84.6	1	90.0-110	J6	J6	0.917	20

WG1094190

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983352-01,02

Method Blank (MB)

(MB) R3299885-1 04/06/18 12:25

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.0656	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L981317-01 Original Sample (OS) • Duplicate (DUP)

(OS) L981317-01 04/06/18 17:08 • (DUP) R3299885-4 04/06/18 17:21

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	75.1	75.1	1	0.0490		15
Fluoride	3.30	3.34	1	1.13		15
Sulfate	25.0	25.0	1	0.110		15

L983318-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983318-03 04/06/18 18:41 • (DUP) R3299885-5 04/06/18 18:55

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	2.73	2.75	1	0.876		15
Fluoride	ND	0.0245	1	0.000		15
Sulfate	59.2	60.0	1	1.35		15

L983318-10 Original Sample (OS) • Duplicate (DUP)

(OS) L983318-10 04/06/18 21:22 • (DUP) R3299885-8 04/06/18 21:36

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	44.8	44.9	1	0.304		15
Fluoride	0.196	0.201	1	2.67		15
Sulfate	15.5	15.4	1	0.450		15

QUALITY CONTROL SUMMARY

L983352-01,02

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299885-2 04/06/18 12:39 • (LCSD) R3299885-3 04/06/18 12:52

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.6	39.6	99.0	99.0	80.0-120			0.0192	15
Fluoride	8.00	7.99	7.99	99.9	99.9	80.0-120			0.0138	15
Sulfate	40.0	40.0	39.9	99.9	99.9	80.0-120			0.0158	15

L983318-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983318-03 04/06/18 18:41 • (MS) R3299885-6 04/06/18 19:08 • (MSD) R3299885-7 04/06/18 19:22

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	2.73	52.8	51.6	100	97.8	1	80.0-120			2.25	15
Fluoride	5.00	ND	5.11	5.02	102	100	1	80.0-120			1.87	15
Sulfate	50.0	59.2	107	106	95.7	93.6	1	80.0-120	E	E	1.02	15

L983318-10 Original Sample (OS) • Matrix Spike (MS)

(OS) L983318-10 04/06/18 21:22 • (MS) R3299885-9 04/06/18 21:49

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	44.8	92.4	95.2	1	80.0-120	
Fluoride	5.00	0.196	5.10	98.1	1	80.0-120	
Sulfate	50.0	15.5	63.9	96.9	1	80.0-120	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299675-1 04/06/18 00:22

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983343-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983343-01 04/06/18 01:11 • (DUP) R3299675-4 04/06/18 01:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	32.0	32.4	1	1.13		15
Fluoride	ND	0.0756	1	8.24	J	15
Sulfate	ND	0.506	1	5.91	J	15

L983343-06 Original Sample (OS) • Duplicate (DUP)

(OS) L983343-06 04/06/18 03:15 • (DUP) R3299675-7 04/06/18 03:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	5.87	5.95	1	1.35		15
Fluoride	ND	0.0329	1	45.5	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299675-2 04/06/18 00:34 • (LCSD) R3299675-3 04/06/18 00:46

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.8	39.8	99.6	99.5	80.0-120			0.0414	15
Fluoride	8.00	8.05	8.05	101	101	80.0-120			0.00248	15
Sulfate	40.0	40.0	39.9	100	99.8	80.0-120			0.216	15

L983343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983343-01 04/06/18 01:11 • (MS) R3299675-5 04/06/18 01:36 • (MSD) R3299675-6 04/06/18 01:48

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	32.0	85.6	82.3	107	101	1	80.0-120			3.89	15
Fluoride	5.00	ND	5.54	5.42	109	107	1	80.0-120			2.10	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983343-01 04/06/18 01:11 • (MS) R3299675-5 04/06/18 01:36 • (MSD) R3299675-6 04/06/18 01:48

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Sulfate	50.0	ND	50.7	50.9	100	101	1	80.0-120			0.504	15

L983343-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L983343-06 04/06/18 03:15 • (MS) R3299675-8 04/06/18 03:40

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	5.87	61.4	111	1	80.0-120	
Fluoride	5.00	ND	5.43	108	1	80.0-120	

QUALITY CONTROL SUMMARY

L983352-05

Method Blank (MB)

(MB) R3299893-1 04/06/18 15:20

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L983292-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983292-03 04/06/18 18:29 • (DUP) R3299893-4 04/06/18 18:44

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Sulfate	17.6	17.7	1	0.420		15

L983578-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983578-01 04/07/18 00:54 • (DUP) R3299893-7 04/07/18 01:09

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Sulfate	36.4	36.8	1	0.984		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299893-2 04/06/18 15:36 • (LCSD) R3299893-3 04/06/18 15:51

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	39.4	39.4	98.5	98.5	80.0-120			0.0287	15

L983292-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983292-03 04/06/18 18:29 • (MS) R3299893-5 04/06/18 18:59 • (MSD) R3299893-6 04/06/18 19:15

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	17.6	68.6	68.4	102	102	1	80.0-120			0.226	15

L983578-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L983578-01 04/07/18 00:54 • (MS) R3299893-8 04/07/18 01:25

Analyte	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	36.4	85.4	98.1	1	80.0-120	

Method Blank (MB)

(MB) R3299938-1 04/07/18 14:49

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.0857	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.142	J	0.0774	5.00

L983693-12 Original Sample (OS) • Duplicate (DUP)

(OS) L983693-12 04/07/18 18:44 • (DUP) R3299938-4 04/07/18 18:56

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	26.3	26.3	1	0.0346		15
Fluoride	0.383	0.379	1	1.21		15
Sulfate	17.7	17.7	1	0.0656		15

L983791-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983791-01 04/07/18 23:42 • (DUP) R3299938-6 04/07/18 23:54

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	5.24	5.57	1	6.02		15
Fluoride	0.233	0.225	1	3.53		15
Sulfate	18.7	18.8	1	0.486		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299938-2 04/07/18 15:02 • (LCSD) R3299938-3 04/07/18 15:14

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.7	39.6	99.2	99.0	80.0-120			0.202	15
Fluoride	8.00	8.05	8.05	101	101	80.0-120			0.0845	15
Sulfate	40.0	40.1	40.0	100	100	80.0-120			0.230	15

WG1094922

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983352-03,04

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983693-12 Original Sample (OS) • Matrix Spike (MS)

(OS) L983693-12 04/07/18 18:44 • (MS) R3299938-5 04/07/18 19:09

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	26.3	75.8	98.9	1	80.0-120	
Fluoride	5.00	0.383	5.35	99.3	1	80.0-120	
Sulfate	50.0	17.7	67.3	99.1	1	80.0-120	

L983791-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983791-01 04/07/18 23:42 • (MS) R3299938-7 04/08/18 00:07 • (MSD) R3299938-8 04/08/18 00:19

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	5.24	55.8	55.6	101	101	1	80.0-120			0.359	15
Fluoride	5.00	0.233	5.25	5.25	100	100	1	80.0-120			0.0647	15
Sulfate	50.0	18.7	68.3	68.2	99.2	99.0	1	80.0-120			0.189	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300644-1 04/10/18 10:30

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Sulfate	U		0.0774	5.00

L983865-30 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-30 04/10/18 19:03 • (DUP) R3300644-8 04/10/18 19:16

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Sulfate	1.08	1.07	1	1.19	J	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300644-4 04/10/18 13:50 • (LCSD) R3300644-3 04/10/18 11:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Sulfate	40.0	40.9	40.6	102	101	80.0-120			0.854	15

L983865-30 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-30 04/10/18 19:03 • (MS) R3300644-9 04/10/18 19:29 • (MSD) R3300644-10 04/10/18 19:43

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Sulfate	50.0	1.08	48.4	53.0	94.7	104	1	80.0-120			9.00	15

Method Blank (MB)

(MB) R3300990-1 04/11/18 16:07

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Chromium,Dissolved	U		0.000540	0.00200
Iron,Dissolved	U		0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Selenium,Dissolved	U		0.000380	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300990-2 04/11/18 16:11 • (LCSD) R3300990-3 04/11/18 16:15

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0483	0.0487	96.6	97.5	80.0-120			0.905	20
Barium,Dissolved	0.0500	0.0480	0.0488	96.0	97.7	80.0-120			1.75	20
Chromium,Dissolved	0.0500	0.0507	0.0502	101	100	80.0-120			0.990	20
Iron,Dissolved	5.00	5.12	5.16	102	103	80.0-120			0.727	20
Lead,Dissolved	0.0500	0.0504	0.0503	101	101	80.0-120			0.127	20
Manganese,Dissolved	0.0500	0.0496	0.0477	99.2	95.5	80.0-120			3.84	20
Selenium,Dissolved	0.0500	0.0495	0.0555	99.1	111	80.0-120			11.4	20

L983352-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983352-06 04/11/18 16:19 • (MS) R3300990-5 04/11/18 16:27 • (MSD) R3300990-6 04/11/18 16:31

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	U	0.0498	0.0487	99.5	97.4	1	75.0-125			2.14	20
Barium,Dissolved	0.0500	0.00137	0.0506	0.0501	98.5	97.4	1	75.0-125			1.17	20
Chromium,Dissolved	0.0500	0.00123	0.0505	0.0499	98.6	97.4	1	75.0-125			1.27	20
Iron,Dissolved	5.00	0.0273	5.06	5.05	101	100	1	75.0-125			0.350	20
Lead,Dissolved	0.0500	U	0.0504	0.0505	101	101	1	75.0-125			0.254	20
Manganese,Dissolved	0.0500	U	0.0487	0.0490	97.4	98.1	1	75.0-125			0.668	20
Selenium,Dissolved	0.0500	U	0.0482	0.0526	96.5	105	1	75.0-125			8.71	20

WG1094695

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983352-01,02,03,04,05,06

Method Blank (MB)

(MB) R3301441-1 04/12/18 18:43

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	U		0.0460	1.00
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Selenium	U		0.000380	0.00200
Sodium	0.111	J	0.110	1.00

Method Blank (MB)

(MB) R3301491-1 04/12/18 23:34

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chromium	U		0.000540	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301441-2 04/12/18 18:48 • (LCSD) R3301441-3 04/12/18 18:52

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0496	0.0510	99.2	102	80.0-120			2.82	20
Barium	0.0500	0.0494	0.0501	98.8	100	80.0-120			1.43	20
Calcium	5.00	4.95	5.03	99.0	101	80.0-120			1.54	20
Iron	5.00	5.19	5.37	104	107	80.0-120			3.41	20
Lead	0.0500	0.0494	0.0497	98.8	99.4	80.0-120			0.554	20
Manganese	0.0500	0.0490	0.0505	98.0	101	80.0-120			3.07	20
Selenium	0.0500	0.0499	0.0506	99.8	101	80.0-120			1.29	20
Sodium	5.00	5.57	5.44	111	109	80.0-120			2.23	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301491-2 04/12/18 23:37 • (LCSD) R3301491-3 04/12/18 23:41

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chromium	0.0500	0.0492	0.0541	98.4	108	80.0-120			9.49	20

WG1094695

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983352-01,02,03,04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983352-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983352-06 04/12/18 18:56 • (MS) R3301441-5 04/12/18 19:05 • (MSD) R3301441-6 04/12/18 19:09

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00103	0.0508	0.0511	99.5	100	1	75.0-125			0.667	20
Barium	0.0500	0.00139	0.0517	0.0505	101	98.2	1	75.0-125			2.38	20
Calcium	5.00	0.442	5.47	5.50	101	101	1	75.0-125			0.527	20
Iron	5.00	U	5.20	5.20	104	104	1	75.0-125			0.00857	20
Lead	0.0500	U	0.0495	0.0502	99.1	100	1	75.0-125			1.36	20
Manganese	0.0500	U	0.0495	0.0496	99.0	99.3	1	75.0-125			0.246	20
Selenium	0.0500	U	0.0506	0.0502	101	100	1	75.0-125			0.805	20
Sodium	5.00	1.14	6.28	6.23	103	102	1	75.0-125			0.786	20

L983352-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983352-06 04/12/18 23:45 • (MS) R3301491-5 04/12/18 23:53 • (MSD) R3301491-6 04/12/18 23:57

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium	0.0500	U	0.0487	0.0493	97.4	98.6	1	75.0-125			1.25	20

WG1097667

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983352-01,02,03,04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301656-1 04/13/18 11:31

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Potassium	0.342	J	0.0370	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301656-2 04/13/18 11:35 • (LCSD) R3301656-3 04/13/18 11:39

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Potassium	5.00	5.56	5.69	111	114	80.0-120			2.37	20

L983576-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983576-01 04/13/18 11:43 • (MS) R3301656-5 04/13/18 11:51 • (MSD) R3301656-6 04/13/18 11:55

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Potassium	5.00	9.27	15.2	15.3	119	120	1	75.0-125			0.489	20

WG1098665

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983352-03

Method Blank (MB)

(MB) R3302308-1 04/17/18 01:21

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Selenium,Dissolved	U		0.000380	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302308-2 04/17/18 01:25 • (LCSD) R3302308-3 04/17/18 01:31

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Selenium,Dissolved	0.0500	0.0542	0.0547	108	109	80.0-120			0.827	20

L985681-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L985681-02 04/17/18 01:35 • (MS) R3302308-5 04/17/18 01:44 • (MSD) R3302308-6 04/17/18 01:49

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Selenium,Dissolved	0.0500	ND	0.0537	0.0573	106	114	1	75.0-125			6.52	20

Method Blank (MB)

(MB) R3302207-1 04/16/18 13:20

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Chromium,Dissolved	U		0.000540	0.00200
Iron,Dissolved	U		0.0150	0.100
Lead,Dissolved	0.000784	J	0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302207-2 04/16/18 13:24 • (LCSD) R3302207-3 04/16/18 13:29

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Arsenic,Dissolved	0.0500	0.0413	0.0482	82.6	96.3	80.0-120			15.4	20
Barium,Dissolved	0.0500	0.0418	0.0498	83.6	99.6	80.0-120			17.4	20
Chromium,Dissolved	0.0500	0.0418	0.0499	83.6	99.7	80.0-120			17.5	20
Iron,Dissolved	5.00	4.23	4.98	84.6	99.5	80.0-120			16.2	20
Lead,Dissolved	0.0500	0.0488	0.0491	97.5	98.1	80.0-120			0.627	20
Manganese,Dissolved	0.0500	0.0413	0.0478	82.6	95.6	80.0-120			14.6	20

L983352-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983352-03 04/16/18 13:34 • (MS) R3302207-5 04/16/18 13:43 • (MSD) R3302207-6 04/16/18 13:47

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic,Dissolved	0.0500	0.0166	0.0648	0.0649	96.3	96.7	1	75.0-125			0.255	20
Barium,Dissolved	0.0500	0.0431	0.0921	0.0920	97.9	97.7	1	75.0-125			0.101	20
Chromium,Dissolved	0.0500	0.000859	0.0485	0.0468	95.3	92.0	1	75.0-125			3.45	20
Iron,Dissolved	5.00	U	5.00	4.78	99.9	95.6	1	75.0-125			4.42	20
Lead,Dissolved	0.0500	0.00255	0.0513	0.0510	97.6	96.9	1	75.0-125			0.697	20
Manganese,Dissolved	0.0500	0.0149	0.0609	0.0616	92.0	93.3	1	75.0-125			1.06	20

WG1094454

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L983352-01,02,03,04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300971-3 04/05/18 23:48

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*115*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300971-1 04/05/18 22:36 • (LCSD) R3300971-2 04/05/18 23:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	4.90	5.10	89.2	92.7	71.0-136			3.85	20
(S) a,a,a-Trifluorotoluene(FID)				*120*	*120*	*77.0-122*				

L983369-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983369-07 04/06/18 14:54 • (MS) R3300971-4 04/06/18 15:18 • (MSD) R3300971-5 04/06/18 15:42

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	ND	4.00	3.88	72.8	70.5	1	18.0-160			3.26	20
(S) a,a,a-Trifluorotoluene(FID)					*116*	*116*		*77.0-122*				

WG1094405

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983352-01,02,03,04,05,06,07

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300482-3 04/05/18 20:03

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300482-3 04/05/18 20:03

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*103*			*80.0-120*
(S) Dibromofluoromethane	*97.9*			*76.0-123*
(S) 4-Bromofluorobenzene	*90.3*			*80.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300482-1 04/05/18 19:07 • (LCSD) R3300482-2 04/05/18 19:25

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.0943	0.0954	75.4	76.3	10.0-160			1.17	23
Benzene	0.0250	0.0227	0.0225	91.0	89.9	69.0-123			1.19	20
Bromodichloromethane	0.0250	0.0220	0.0225	87.9	90.0	76.0-120			2.31	20
Bromoform	0.0250	0.0245	0.0246	98.0	98.5	67.0-132			0.547	20
Bromomethane	0.0250	0.0378	0.0381	151	152	18.0-160			0.755	20
n-Butylbenzene	0.0250	0.0233	0.0235	93.2	93.9	72.0-126			0.718	20
sec-Butylbenzene	0.0250	0.0236	0.0236	94.4	94.3	74.0-121			0.0835	20
Carbon disulfide	0.0250	0.0197	0.0201	78.8	80.3	55.0-127			1.87	20
Carbon tetrachloride	0.0250	0.0215	0.0227	86.1	90.9	63.0-122			5.38	20
Chlorobenzene	0.0250	0.0264	0.0267	106	107	79.0-121			1.32	20
Chlorodibromomethane	0.0250	0.0254	0.0260	102	104	75.0-125			2.39	20
Chloroethane	0.0250	0.0325	0.0331	130	132	47.0-152			1.83	20
Chloroform	0.0250	0.0225	0.0222	90.1	88.6	72.0-121			1.65	20
Chloromethane	0.0250	0.0192	0.0197	76.6	78.7	48.0-139			2.75	20
1,2-Dibromoethane	0.0250	0.0262	0.0268	105	107	77.0-123			2.22	20
1,1-Dichloroethane	0.0250	0.0216	0.0220	86.2	87.9	70.0-126			1.97	20
1,2-Dichloroethane	0.0250	0.0222	0.0223	88.8	89.2	67.0-126			0.483	20
1,1-Dichloroethene	0.0250	0.0213	0.0210	85.2	84.1	64.0-129			1.30	20
cis-1,2-Dichloroethene	0.0250	0.0225	0.0236	90.1	94.5	73.0-120			4.77	20
trans-1,2-Dichloroethene	0.0250	0.0223	0.0226	89.4	90.5	71.0-121			1.23	20
1,2-Dichloropropane	0.0250	0.0222	0.0231	88.7	92.5	75.0-125			4.14	20
cis-1,3-Dichloropropene	0.0250	0.0251	0.0258	100	103	79.0-123			2.89	20
trans-1,3-Dichloropropene	0.0250	0.0259	0.0266	104	106	74.0-127			2.62	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300482-1 04/05/18 19:07 • (LCSD) R3300482-2 04/05/18 19:25

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0264	0.0267	106	107	77.0-120			0.998	20
2-Hexanone	0.125	0.124	0.126	99.1	100	58.0-147			1.40	20
Isopropylbenzene	0.0250	0.0230	0.0228	92.1	91.0	75.0-120			1.16	20
p-Isopropyltoluene	0.0250	0.0248	0.0250	99.3	99.9	74.0-126			0.663	20
2-Butanone (MEK)	0.125	0.110	0.110	88.1	88.0	37.0-158			0.190	20
Methylene Chloride	0.0250	0.0223	0.0228	89.3	91.4	66.0-121			2.26	20
4-Methyl-2-pentanone (MIBK)	0.125	0.122	0.124	97.7	99.1	59.0-143			1.35	20
Methyl tert-butyl ether	0.0250	0.0210	0.0215	83.8	86.0	64.0-123			2.55	20
Naphthalene	0.0250	0.0244	0.0252	97.8	101	62.0-128			3.07	20
n-Propylbenzene	0.0250	0.0227	0.0223	91.0	89.3	79.0-120			1.80	20
Styrene	0.0250	0.0245	0.0242	98.1	96.7	78.0-124			1.45	20
1,1,1,2-Tetrachloroethane	0.0250	0.0257	0.0264	103	106	75.0-122			2.60	20
1,1,2,2-Tetrachloroethane	0.0250	0.0222	0.0220	88.9	88.0	71.0-122			1.04	20
Tetrachloroethene	0.0250	0.0277	0.0277	111	111	70.0-127			0.177	20
Toluene	0.0250	0.0245	0.0250	98.2	99.9	77.0-120			1.77	20
1,1,1-Trichloroethane	0.0250	0.0207	0.0208	82.7	83.2	68.0-122			0.601	20
1,1,2-Trichloroethane	0.0250	0.0259	0.0259	104	104	78.0-120			0.0128	20
Trichloroethene	0.0250	0.0259	0.0262	103	105	78.0-120			1.40	20
1,2,4-Trimethylbenzene	0.0250	0.0233	0.0237	93.1	94.8	75.0-120			1.85	20
1,3,5-Trimethylbenzene	0.0250	0.0229	0.0227	91.7	90.9	75.0-120			0.819	20
Vinyl chloride	0.0250	0.0211	0.0215	84.6	85.9	64.0-133			1.57	20
Xylenes, Total	0.0750	0.0784	0.0810	105	108	77.0-120			3.26	20
o-Xylene	0.0250	0.0261	0.0271	104	108	78.0-120			3.69	20
m&p-Xylenes	0.0500	0.0523	0.0539	105	108	77.0-120			3.14	20
(S) Toluene-d8				*99.9*	*101*	*80.0-120*				
(S) Dibromofluoromethane				*92.5*	*92.7*	*76.0-123*				
(S) 4-Bromofluorobenzene				*85.4*	*84.1*	*80.0-120*				

WG1094423

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L983352-01,02,03,04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300206-1 04/08/18 02:07

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*95.3*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300206-2 04/08/18 02:27 • (LCSD) R3300206-3 04/08/18 02:47

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.70	1.68	113	112	50.0-150			1.59	20
(S) o-Terphenyl				*120*	*120*	*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
Q	Sample was prepared and/or analyzed past recommended holding time. Concentrations should be considered minimum values.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia [1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky [1,6]	90010
Kentucky [2]	16
Louisiana	AI30792
Louisiana [1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086
Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico [1]	n/a
New York	11742
North Carolina	Env375
North Carolina [1]	DW21704
North Carolina [3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee [1,4]	2006
Texas	T 104704245-17-14
Texas [5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

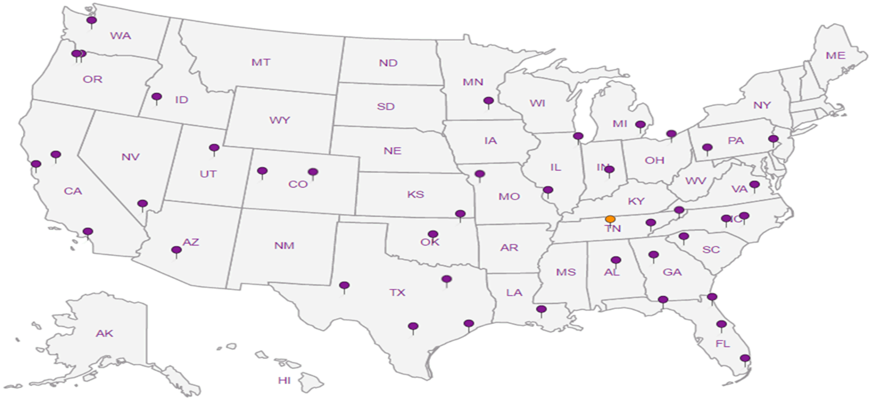
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01
A2LA – ISO 17025 [5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003
AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page ___ of ___

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YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**
Project Description: **TEL Spring 2018**	City/State Collected: **Artesia, NM**
Phone: **512-684-3170** Fax:	Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-TEL**	
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **TEL (Navajo - Artesia)**
P.O. # **119503**	Quote #
Collected by (signature):	
Immediately Packed on Ice N ___ Y ___	

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

L # L983352
F105
Acctnum: **TRCATX**
Template: **T118731**
Prelogin: **P643084**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
TEL-4	**Grab**	**GW**		**4/3/18**	**0925**	**10**	X	X	X	X	X	X	X					-01
TEL-3	**Grab**	**GW**		**4/3/18**	**1045**	**10**	X	X	X	X	X	X	X					02
TEL-2	**Grab**	**GW**		**4/3/18**	**1145**	**10**	X	X	X	X	X	X	X					03
TEL-1	**Grab**	**GW**		**4/3/18**	**1235**	**10**	X	X	X	X	X	X	X					04
MW-49	**Grab**	**GW**				**11**	X	X	X		X	X	X	X	X			
DUP-TEL-01	**Grab**	**GW**		**4/3/18**	**1000**	**10**	X	X	X	X	X	X	X					05
EB-TEL-01	**Grab**	**GW**		**4/3/18**	**1100**	**10**	X	X	X	X	X	X	X					06
TRIP BLANK-TEL-01	**Grab**	**GW**		**4/3/18**	-	**1**	X											07

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking # 4269 4212 1578

Sample Receipt Checklist
COC Seal Present/Intact: NP [✓ Y] __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR 1		
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 2.3 °C	Bottles Received: 61	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) 860	Date: 4/5/18	Time: 845	Hold:
						Condition: NCF / [✓ OK]

Chain of Custody Page 1 of 1

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12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# L983352

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: TEL Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: TEL (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

Immediately Packed on Ice N ___ Y ✓

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide	Rem./Contaminant	Sample # (lab only)
TEL-1	Grab	GW		4/3/18	1235		✓	✓	✓	✓		✓	✓	✓			04
Trip Blank-TEL-01	Grab	GW		4/3/18	—		✓										07
TEL-2	Grab	GW		4/3/18	1145		✓	✓	✓	✓		✓	✓	✓			03
TEL-3	Grab	GW		4/3/18	1045		✓	✓	✓	✓		✓	✓	✓			02
EB-TEL-01	Grab	GW		4/3/18	1100		✓	✓	✓	✓		✓	✓	✓			06
TEL-4	Grab	GW		4/3/18	925		✓	✓	✓	✓		✓	✓	✓			01
DUP-TEL-01	Grab	GW		4/3/18	1000		✓	✓	✓	✓		✓	✓	✓			05
	Grab	GW															
	Grab	GW															
	Grab	GW															

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ______

Remarks: Diss. metals are field-filtered.

pH ______ Temp ______

Flow ______ Other ______

Hold #

Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______

Relinquished by: (Signature) Scott Ude	Date: 4/4/18	Time: 1000	Received by: (Signature)	
Relinquished by: (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.5 °C Bottles Received:
Relinquished by: (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 845

Condition: (lab use only) OK

COC Seal Intact: ✓ Y ___ N ___ NA

pH Checked:

NCF:

ANALYTICAL REPORT

April 13, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L983354
Samples Received:	04/05/2018
Project Number:	249545.0000.0000 000
Description:	NCL Spring 2018
Site:	NCL (NAVAJO-ARTESIA)
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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MW-54A L983354-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 09:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095027	1	04/10/18 17:40	04/10/18 18:38	EG
Wet Chemistry by Method 353.2	WG1094866	1	04/09/18 15:27	04/09/18 15:27	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 04:30	04/06/18 04:30	MAJ
Wet Chemistry by Method 9056A	WG1094250	20	04/06/18 04:42	04/06/18 04:42	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 19:14	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 22:13	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 13:43	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/06/18 01:26	04/06/18 01:26	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 05:50	TH

NCL-49 L983354-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 10:20	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095027	1	04/10/18 17:40	04/10/18 18:38	EG
Wet Chemistry by Method 353.2	WG1094866	5	04/09/18 15:29	04/09/18 15:29	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 04:55	04/06/18 04:55	MAJ
Wet Chemistry by Method 9056A	WG1094250	20	04/06/18 05:32	04/06/18 05:32	MAJ
Wet Chemistry by Method 9056A	WG1094722	50	04/06/18 19:45	04/06/18 19:45	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 19:30	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 22:28	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 13:47	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/06/18 01:45	04/06/18 01:45	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 06:10	TH

MW-53 L983354-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 11:10	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095027	1	04/10/18 17:40	04/10/18 18:38	EG
Wet Chemistry by Method 353.2	WG1094866	1	04/09/18 15:30	04/09/18 15:30	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 05:44	04/06/18 05:44	MAJ
Wet Chemistry by Method 9056A	WG1094250	20	04/06/18 05:57	04/06/18 05:57	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 19:34	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 22:32	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:06	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/06/18 02:04	04/06/18 02:04	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 06:30	TH

DUP-NCL-01 L983354-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 10:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095027	1	04/10/18 17:40	04/10/18 18:38	EG
Wet Chemistry by Method 353.2	WG1094866	5	04/09/18 15:32	04/09/18 15:32	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 06:09	04/06/18 06:09	MAJ
Wet Chemistry by Method 9056A	WG1094250	20	04/06/18 06:21	04/06/18 06:21	MAJ
Wet Chemistry by Method 9056A	WG1094722	50	04/06/18 20:32	04/06/18 20:32	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 19:38	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 22:36	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:10	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/06/18 02:23	04/06/18 02:23	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 06:50	TH

	Collected by	Collected date/time	Received date/time
TRIP BLANK-NCL-01 L983354-05 GW	Scott Ude/HMI Team	04/03/18 00:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094405	1	04/05/18 21:00	04/05/18 21:00	LRL

CASE NARRATIVE

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1650		2.82	10.0	1	04/10/2018 18:38	WG1095027

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/09/2018 15:27	WG1094866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	186		1.04	20.0	20	04/06/2018 04:42	WG1094250
Fluoride	0.955		0.00990	0.100	1	04/06/2018 04:30	WG1094250
Sulfate	746		1.55	100	20	04/06/2018 04:42	WG1094250

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00456		0.000250	0.00200	1	04/11/2018 22:13	WG1094256
Arsenic,Dissolved	0.00347		0.000250	0.00200	1	04/11/2018 19:14	WG1094251
Barium	0.0161		0.000360	0.00500	1	04/11/2018 22:13	WG1094256
Barium,Dissolved	0.0166		0.000360	0.00500	1	04/11/2018 19:14	WG1094251
Calcium	373	V	0.0460	1.00	1	04/11/2018 22:13	WG1094256
Chromium	U	J3 J4	0.000540	0.00200	1	04/11/2018 22:13	WG1094256
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 19:14	WG1094251
Iron	0.0500	J	0.0150	0.100	1	04/11/2018 22:13	WG1094256
Iron,Dissolved	0.0258	J	0.0150	0.100	1	04/11/2018 19:14	WG1094251
Lead	0.000449	J	0.000240	0.00200	1	04/11/2018 22:13	WG1094256
Lead,Dissolved	0.000275	J	0.000240	0.00200	1	04/11/2018 19:14	WG1094251
Manganese	0.531		0.000250	0.00500	1	04/11/2018 22:13	WG1094256
Manganese,Dissolved	0.525		0.000250	0.00500	1	04/11/2018 19:14	WG1094251
Potassium	0.324	B J	0.0370	1.00	1	04/12/2018 13:43	WG1096943
Selenium	0.000467	J	0.000380	0.00200	1	04/11/2018 22:13	WG1094256
Selenium,Dissolved	0.000398	J	0.000380	0.00200	1	04/11/2018 19:14	WG1094251
Sodium	61.7		0.110	1.00	1	04/11/2018 22:13	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 01:26	WG1094405
Benzene	U		0.000331	0.00100	1	04/06/2018 01:26	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 01:26	WG1094405
Bromoform	U		0.000469	0.00100	1	04/06/2018 01:26	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/06/2018 01:26	WG1094405
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 01:26	WG1094405
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 01:26	WG1094405
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 01:26	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 01:26	WG1094405
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 01:26	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 01:26	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/06/2018 01:26	WG1094405
Chloroform	U		0.000324	0.00500	1	04/06/2018 01:26	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/06/2018 01:26	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 01:26	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 01:26	WG1094405

MW-54A
Collected date/time: 04/03/18 09:35

SAMPLE RESULTS - 01
L983354

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 01:26	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 01:26	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 01:26	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 01:26	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 01:26	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 01:26	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 01:26	WG1094405
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 01:26	WG1094405
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 01:26	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 01:26	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 01:26	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 01:26	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 01:26	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 01:26	WG1094405
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 01:26	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/06/2018 01:26	WG1094405
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 01:26	WG1094405
Styrene	U		0.000307	0.00100	1	04/06/2018 01:26	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 01:26	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 01:26	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 01:26	WG1094405
Toluene	U		0.000412	0.00100	1	04/06/2018 01:26	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 01:26	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 01:26	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 01:26	WG1094405
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 01:26	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 01:26	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 01:26	WG1094405
o-Xylene	U		0.000341	0.00100	1	04/06/2018 01:26	WG1094405
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 01:26	WG1094405
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 01:26	WG1094405
(S) Toluene-d8	*103*			*80.0-120*		*04/06/2018 01:26*	WG1094405
(S) Dibromofluoromethane	*97.8*			*76.0-123*		*04/06/2018 01:26*	WG1094405
(S) 4-Bromofluorobenzene	*90.5*			*80.0-120*		*04/06/2018 01:26*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	2.51		0.0247	0.100	1	04/08/2018 05:50	WG1094423
(S) o-Terphenyl	*106*			*31.0-160*		*04/08/2018 05:50*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2560		2.82	10.0	1	04/10/2018 18:38	WG1095027

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	7.75		0.0985	0.500	5	04/09/2018 15:29	WG1094866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	169		1.04	20.0	20	04/06/2018 05:32	WG1094250
Fluoride	0.640		0.00990	0.100	1	04/06/2018 04:55	WG1094250
Sulfate	2070		3.87	250	50	04/06/2018 19:45	WG1094722

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00283		0.000250	0.00200	1	04/11/2018 22:28	WG1094256
Arsenic,Dissolved	0.00167	J	0.000250	0.00200	1	04/11/2018 19:30	WG1094251
Barium	0.0138		0.000360	0.00500	1	04/11/2018 22:28	WG1094256
Barium,Dissolved	0.0126		0.000360	0.00500	1	04/11/2018 19:30	WG1094251
Calcium	522		0.0460	1.00	1	04/11/2018 22:28	WG1094256
Chromium	0.000688	J J3 J4	0.000540	0.00200	1	04/11/2018 22:28	WG1094256
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 19:30	WG1094251
Iron	U		0.0150	0.100	1	04/11/2018 22:28	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 19:30	WG1094251
Lead	0.000258	J	0.000240	0.00200	1	04/11/2018 22:28	WG1094256
Lead,Dissolved	0.000260	J	0.000240	0.00200	1	04/11/2018 19:30	WG1094251
Manganese	0.00310	J	0.000250	0.00500	1	04/11/2018 22:28	WG1094256
Manganese,Dissolved	0.00138	J	0.000250	0.00500	1	04/11/2018 19:30	WG1094251
Potassium	0.736	B J	0.0370	1.00	1	04/12/2018 13:47	WG1096943
Selenium	0.0111		0.000380	0.00200	1	04/11/2018 22:28	WG1094256
Selenium,Dissolved	0.0115		0.000380	0.00200	1	04/11/2018 19:30	WG1094251
Sodium	145		0.110	1.00	1	04/11/2018 22:28	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 01:45	WG1094405
Benzene	U		0.000331	0.00100	1	04/06/2018 01:45	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 01:45	WG1094405
Bromoform	U		0.000469	0.00100	1	04/06/2018 01:45	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/06/2018 01:45	WG1094405
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 01:45	WG1094405
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 01:45	WG1094405
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 01:45	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 01:45	WG1094405
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 01:45	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 01:45	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/06/2018 01:45	WG1094405
Chloroform	U		0.000324	0.00500	1	04/06/2018 01:45	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/06/2018 01:45	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 01:45	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 01:45	WG1094405

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 01:45	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 01:45	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 01:45	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 01:45	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 01:45	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 01:45	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 01:45	WG1094405
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 01:45	WG1094405
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 01:45	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 01:45	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 01:45	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 01:45	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 01:45	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 01:45	WG1094405
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 01:45	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/06/2018 01:45	WG1094405
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 01:45	WG1094405
Styrene	U		0.000307	0.00100	1	04/06/2018 01:45	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 01:45	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 01:45	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 01:45	WG1094405
Toluene	U		0.000412	0.00100	1	04/06/2018 01:45	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 01:45	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 01:45	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 01:45	WG1094405
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 01:45	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 01:45	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 01:45	WG1094405
o-Xylene	U		0.000341	0.00100	1	04/06/2018 01:45	WG1094405
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 01:45	WG1094405
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 01:45	WG1094405
(S) Toluene-d8	*103*			*80.0-120*		*04/06/2018 01:45*	WG1094405
(S) Dibromofluoromethane	*96.5*			*76.0-123*		*04/06/2018 01:45*	WG1094405
(S) 4-Bromofluorobenzene	*90.4*			*80.0-120*		*04/06/2018 01:45*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0568	J	0.0247	0.100	1	04/08/2018 06:10	WG1094423
(S) o-Terphenyl	*96.9*			*31.0-160*		*04/08/2018 06:10*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1860		2.82	10.0	1	04/10/2018 18:38	WG1095027

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	1.58	J6	0.0197	0.100	1	04/09/2018 15:30	WG1094866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	72.9		0.0519	1.00	1	04/06/2018 05:44	WG1094250
Fluoride	1.13		0.00990	0.100	1	04/06/2018 05:44	WG1094250
Sulfate	1250		1.55	100	20	04/06/2018 05:57	WG1094250

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00259		0.000250	0.00200	1	04/11/2018 22:32	WG1094256
Arsenic,Dissolved	0.00144	J	0.000250	0.00200	1	04/11/2018 19:34	WG1094251
Barium	0.0423		0.000360	0.00500	1	04/11/2018 22:32	WG1094256
Barium,Dissolved	0.0197		0.000360	0.00500	1	04/11/2018 19:34	WG1094251
Calcium	315		0.0460	1.00	1	04/11/2018 22:32	WG1094256
Chromium	0.000742	J J3 J4	0.000540	0.00200	1	04/11/2018 22:32	WG1094256
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 19:34	WG1094251
Iron	0.0922	J	0.0150	0.100	1	04/11/2018 22:32	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 19:34	WG1094251
Lead	0.000794	J	0.000240	0.00200	1	04/11/2018 22:32	WG1094256
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 19:34	WG1094251
Manganese	2.34		0.000250	0.00500	1	04/11/2018 22:32	WG1094256
Manganese,Dissolved	0.437		0.000250	0.00500	1	04/11/2018 19:34	WG1094251
Potassium	1.12	B	0.0370	1.00	1	04/12/2018 14:06	WG1096943
Selenium	0.000729	J	0.000380	0.00200	1	04/11/2018 22:32	WG1094256
Selenium,Dissolved	0.00109	J	0.000380	0.00200	1	04/11/2018 19:34	WG1094251
Sodium	118		0.110	1.00	1	04/11/2018 22:32	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 02:04	WG1094405
Benzene	U		0.000331	0.00100	1	04/06/2018 02:04	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 02:04	WG1094405
Bromoform	U		0.000469	0.00100	1	04/06/2018 02:04	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/06/2018 02:04	WG1094405
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 02:04	WG1094405
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 02:04	WG1094405
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 02:04	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 02:04	WG1094405
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 02:04	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 02:04	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/06/2018 02:04	WG1094405
Chloroform	U		0.000324	0.00500	1	04/06/2018 02:04	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/06/2018 02:04	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 02:04	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 02:04	WG1094405

MW-53

Collected date/time: 04/03/18 11:10

SAMPLE RESULTS - 03

L983354

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 02:04	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 02:04	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 02:04	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 02:04	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 02:04	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 02:04	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 02:04	WG1094405
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 02:04	WG1094405
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 02:04	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 02:04	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 02:04	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 02:04	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 02:04	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 02:04	WG1094405
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 02:04	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/06/2018 02:04	WG1094405
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 02:04	WG1094405
Styrene	U		0.000307	0.00100	1	04/06/2018 02:04	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 02:04	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 02:04	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 02:04	WG1094405
Toluene	U		0.000412	0.00100	1	04/06/2018 02:04	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 02:04	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 02:04	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 02:04	WG1094405
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 02:04	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 02:04	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 02:04	WG1094405
o-Xylene	U		0.000341	0.00100	1	04/06/2018 02:04	WG1094405
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 02:04	WG1094405
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 02:04	WG1094405
(S) Toluene-d8	*102*			*80.0-120*		*04/06/2018 02:04*	WG1094405
(S) Dibromofluoromethane	*95.1*			*76.0-123*		*04/06/2018 02:04*	WG1094405
(S) 4-Bromofluorobenzene	*91.4*			*80.0-120*		*04/06/2018 02:04*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.158		0.0247	0.100	1	04/08/2018 06:30	WG1094423
(S) o-Terphenyl	*107*			*31.0-160*		*04/08/2018 06:30*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3060		2.82	10.0	1	04/10/2018 18:38	WG1095027

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	7.85		0.0985	0.500	5	04/09/2018 15:32	WG1094866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	171		1.04	20.0	20	04/06/2018 06:21	WG1094250
Fluoride	0.651		0.00990	0.100	1	04/06/2018 06:09	WG1094250
Sulfate	2070		3.87	250	50	04/06/2018 20:32	WG1094722

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00254		0.000250	0.00200	1	04/11/2018 22:36	WG1094256
Arsenic,Dissolved	0.00149	J	0.000250	0.00200	1	04/11/2018 19:38	WG1094251
Barium	0.0136		0.000360	0.00500	1	04/11/2018 22:36	WG1094256
Barium,Dissolved	0.0127		0.000360	0.00500	1	04/11/2018 19:38	WG1094251
Calcium	525		0.0460	1.00	1	04/11/2018 22:36	WG1094256
Chromium	U	J3 J4	0.000540	0.00200	1	04/11/2018 22:36	WG1094256
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 19:38	WG1094251
Iron	U		0.0150	0.100	1	04/11/2018 22:36	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 19:38	WG1094251
Lead	U		0.000240	0.00200	1	04/11/2018 22:36	WG1094256
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 19:38	WG1094251
Manganese	0.00462	J	0.000250	0.00500	1	04/11/2018 22:36	WG1094256
Manganese,Dissolved	0.00114	J	0.000250	0.00500	1	04/11/2018 19:38	WG1094251
Potassium	0.995	B J	0.0370	1.00	1	04/12/2018 14:10	WG1096943
Selenium	0.0125		0.000380	0.00200	1	04/11/2018 22:36	WG1094256
Selenium,Dissolved	0.0122		0.000380	0.00200	1	04/11/2018 19:38	WG1094251
Sodium	147		0.110	1.00	1	04/11/2018 22:36	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 02:23	WG1094405
Benzene	U		0.000331	0.00100	1	04/06/2018 02:23	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 02:23	WG1094405
Bromoform	U		0.000469	0.00100	1	04/06/2018 02:23	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/06/2018 02:23	WG1094405
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 02:23	WG1094405
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 02:23	WG1094405
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 02:23	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 02:23	WG1094405
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 02:23	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 02:23	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/06/2018 02:23	WG1094405
Chloroform	U		0.000324	0.00500	1	04/06/2018 02:23	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/06/2018 02:23	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 02:23	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 02:23	WG1094405

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 02:23	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 02:23	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 02:23	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 02:23	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 02:23	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 02:23	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 02:23	WG1094405
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 02:23	WG1094405
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 02:23	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 02:23	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 02:23	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 02:23	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 02:23	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 02:23	WG1094405
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 02:23	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/06/2018 02:23	WG1094405
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 02:23	WG1094405
Styrene	U		0.000307	0.00100	1	04/06/2018 02:23	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 02:23	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 02:23	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 02:23	WG1094405
Toluene	U		0.000412	0.00100	1	04/06/2018 02:23	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 02:23	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 02:23	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 02:23	WG1094405
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 02:23	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 02:23	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 02:23	WG1094405
o-Xylene	U		0.000341	0.00100	1	04/06/2018 02:23	WG1094405
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 02:23	WG1094405
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 02:23	WG1094405
(S) Toluene-d8	*103*			*80.0-120*		*04/06/2018 02:23*	WG1094405
(S) Dibromofluoromethane	*96.3*			*76.0-123*		*04/06/2018 02:23*	WG1094405
(S) 4-Bromofluorobenzene	*89.0*			*80.0-120*		*04/06/2018 02:23*	WG1094405

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0559	J	0.0247	0.100	1	04/08/2018 06:50	WG1094423
(S) o-Terphenyl	*94.6*			*31.0-160*		*04/08/2018 06:50*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	0.0102	J	0.0100	0.0500	1	04/05/2018 21:00	WG1094405
Benzene	U		0.000331	0.00100	1	04/05/2018 21:00	WG1094405
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 21:00	WG1094405
Bromoform	U		0.000469	0.00100	1	04/05/2018 21:00	WG1094405
Bromomethane	U		0.000866	0.00500	1	04/05/2018 21:00	WG1094405
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 21:00	WG1094405
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 21:00	WG1094405
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 21:00	WG1094405
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 21:00	WG1094405
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 21:00	WG1094405
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 21:00	WG1094405
Chloroethane	U		0.000453	0.00500	1	04/05/2018 21:00	WG1094405
Chloroform	U		0.000324	0.00500	1	04/05/2018 21:00	WG1094405
Chloromethane	U		0.000276	0.00250	1	04/05/2018 21:00	WG1094405
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 21:00	WG1094405
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 21:00	WG1094405
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 21:00	WG1094405
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 21:00	WG1094405
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 21:00	WG1094405
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 21:00	WG1094405
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 21:00	WG1094405
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 21:00	WG1094405
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 21:00	WG1094405
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 21:00	WG1094405
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 21:00	WG1094405
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 21:00	WG1094405
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 21:00	WG1094405
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 21:00	WG1094405
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 21:00	WG1094405
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 21:00	WG1094405
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 21:00	WG1094405
Naphthalene	U		0.00100	0.00500	1	04/05/2018 21:00	WG1094405
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 21:00	WG1094405
Styrene	U		0.000307	0.00100	1	04/05/2018 21:00	WG1094405
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 21:00	WG1094405
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 21:00	WG1094405
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 21:00	WG1094405
Toluene	0.000420	J	0.000412	0.00100	1	04/05/2018 21:00	WG1094405
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 21:00	WG1094405
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 21:00	WG1094405
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 21:00	WG1094405
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 21:00	WG1094405
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 21:00	WG1094405
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 21:00	WG1094405
o-Xylene	U		0.000341	0.00100	1	04/05/2018 21:00	WG1094405
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 21:00	WG1094405
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 21:00	WG1094405
(S) Toluene-d8	*102*			*80.0-120*		*04/05/2018 21:00*	WG1094405
(S) Dibromofluoromethane	*98.0*			*76.0-123*		*04/05/2018 21:00*	WG1094405
(S) 4-Bromofluorobenzene	*89.3*			*80.0-120*		*04/05/2018 21:00*	WG1094405

WG1095027

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983354-01,02,03,04

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300984-1 04/10/18 18:38

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983354-02 Original Sample (OS) • Duplicate (DUP)

(OS) L983354-02 04/10/18 18:38 • (DUP) R3300984-4 04/10/18 18:38

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2560	2580	1	0.974		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300984-2 04/10/18 18:38 • (LCSD) R3300984-3 04/10/18 18:38

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8660	8340	98.4	94.8	85.0-115			3.76	5

WG1094866

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L983354-01,02,03,04

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300264-1 04/09/18 15:24

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983354-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983354-01 04/09/18 15:27 • (DUP) R3300264-4 04/09/18 15:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

L983365-30 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-30 04/09/18 15:57 • (DUP) R3300264-7 04/09/18 15:58

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	5	0.000		20

Sample Narrative:

OS: Diluted due to sulfide interference

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300264-2 04/09/18 15:25 • (LCSD) R3300264-3 04/09/18 15:26

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.80	3.89	94.9	97.3	90.0-110			2.52	20

L983354-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L983354-03 04/09/18 15:30 • (MS) R3300264-5 04/09/18 15:31

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	1.58	3.56	79.1	1	90.0-110	J6

WG1094866

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L983354-01,02,03,04

L983365-31 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-31 04/09/18 15:59 • (MS) R3300264-8 04/09/18 16:00 • (MSD) R3300264-9 04/09/18 16:01

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	2.50	U	2.12	2.13	84.9	85.0	1	90.0-110	J6	J6	0.141	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

QUALITY CONTROL SUMMARY

L983354-01,02,03,04

Method Blank (MB)

(MB) R3299675-1 04/06/18 00:22

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983343-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983343-01 04/06/18 01:11 • (DUP) R3299675-4 04/06/18 01:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	32.0	32.4	1	1.13		15
Fluoride	ND	0.0756	1	8.24	J	15
Sulfate	ND	0.506	1	5.91	J	15

L983343-06 Original Sample (OS) • Duplicate (DUP)

(OS) L983343-06 04/06/18 03:15 • (DUP) R3299675-7 04/06/18 03:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	5.87	5.95	1	1.35		15
Fluoride	ND	0.0329	1	45.5	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299675-2 04/06/18 00:34 • (LCSD) R3299675-3 04/06/18 00:46

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.8	39.8	99.6	99.5	80.0-120			0.0414	15
Fluoride	8.00	8.05	8.05	101	101	80.0-120			0.00248	15
Sulfate	40.0	40.0	39.9	100	99.8	80.0-120			0.216	15

L983343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983343-01 04/06/18 01:11 • (MS) R3299675-5 04/06/18 01:36 • (MSD) R3299675-6 04/06/18 01:48

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	32.0	85.6	82.3	107	101	1	80.0-120			3.89	15
Fluoride	5.00	ND	5.54	5.42	109	107	1	80.0-120			2.10	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983343-01 04/06/18 01:11 • (MS) R3299675-5 04/06/18 01:36 • (MSD) R3299675-6 04/06/18 01:48

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	ND	50.7	50.9	100	101	1	80.0-120			0.504	15

L983343-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L983343-06 04/06/18 03:15 • (MS) R3299675-8 04/06/18 03:40

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	5.87	61.4	111	1	80.0-120	
Fluoride	5.00	ND	5.43	108	1	80.0-120	

Method Blank (MB)

(MB) R3299893-1 04/06/18 15:20

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L983292-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983292-03 04/06/18 18:29 • (DUP) R3299893-4 04/06/18 18:44

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	17.6	17.7	1	0.420		15

L983578-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983578-01 04/07/18 00:54 • (DUP) R3299893-7 04/07/18 01:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	36.4	36.8	1	0.984		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299893-2 04/06/18 15:36 • (LCSD) R3299893-3 04/06/18 15:51

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	39.4	39.4	98.5	98.5	80.0-120			0.0287	15

L983292-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983292-03 04/06/18 18:29 • (MS) R3299893-5 04/06/18 18:59 • (MSD) R3299893-6 04/06/18 19:15

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	17.6	68.6	68.4	102	102	1	80.0-120			0.226	15

L983578-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L983578-01 04/07/18 00:54 • (MS) R3299893-8 04/07/18 01:25

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	36.4	85.4	98.1	1	80.0-120	

Method Blank (MB)

(MB) R3301059-1 04/11/18 19:03

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Chromium,Dissolved	U		0.000540	0.00200
Iron,Dissolved	U		0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Selenium,Dissolved	U		0.000380	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301059-2 04/11/18 19:07 • (LCSD) R3301059-3 04/11/18 19:11

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0477	0.0493	95.5	98.6	80.0-120			3.17	20
Barium,Dissolved	0.0500	0.0462	0.0472	92.4	94.3	80.0-120			2.07	20
Chromium,Dissolved	0.0500	0.0498	0.0492	99.7	98.5	80.0-120			1.21	20
Iron,Dissolved	5.00	4.99	5.04	99.8	101	80.0-120			0.927	20
Lead,Dissolved	0.0500	0.0497	0.0504	99.4	101	80.0-120			1.46	20
Manganese,Dissolved	0.0500	0.0474	0.0475	94.8	95.1	80.0-120			0.309	20
Selenium,Dissolved	0.0500	0.0505	0.0536	101	107	80.0-120			5.92	20

L983354-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983354-01 04/11/18 19:14 • (MS) R3301059-5 04/11/18 19:22 • (MSD) R3301059-6 04/11/18 19:26

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.00347	0.0507	0.0532	94.4	99.4	1	75.0-125			4.85	20
Barium,Dissolved	0.0500	0.0166	0.0617	0.0660	90.3	98.8	1	75.0-125			6.64	20
Chromium,Dissolved	0.0500	U	0.0484	0.0505	96.8	101	1	75.0-125			4.21	20
Iron,Dissolved	5.00	0.0258	4.92	5.13	97.8	102	1	75.0-125			4.19	20
Lead,Dissolved	0.0500	0.000275	0.0504	0.0526	100	105	1	75.0-125			4.22	20
Manganese,Dissolved	0.0500	0.525	0.569	0.581	87.0	111	1	75.0-125			2.09	20
Selenium,Dissolved	0.0500	0.000398	0.0512	0.0498	102	98.8	1	75.0-125			2.79	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301060-1 04/11/18 22:01

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Selenium	U		0.000380	0.00200
Sodium	0.440	J	0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301060-2 04/11/18 22:05 • (LCSD) R3301060-3 04/11/18 22:09

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Arsenic	0.0500	0.0481	0.0495	96.2	98.9	80.0-120			2.74	20
Barium	0.0500	0.0467	0.0487	93.4	97.3	80.0-120			4.12	20
Calcium	5.00	4.96	5.00	99.2	99.9	80.0-120			0.721	20
Chromium	0.0500	0.0486	0.0688	97.3	138	80.0-120		J3 J4	34.3	20
Iron	5.00	4.94	5.24	98.8	105	80.0-120			5.91	20
Lead	0.0500	0.0497	0.0510	99.5	102	80.0-120			2.45	20
Manganese	0.0500	0.0481	0.0510	96.1	102	80.0-120			5.86	20
Selenium	0.0500	0.0489	0.0501	97.7	100	80.0-120			2.57	20
Sodium	5.00	5.13	5.07	103	101	80.0-120			1.20	20

L983354-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983354-01 04/11/18 22:13 • (MS) R3301060-5 04/11/18 22:21 • (MSD) R3301060-6 04/11/18 22:25

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.00456	0.0533	0.0528	97.5	96.5	1	75.0-125			1.01	20
Barium	0.0500	0.0161	0.0648	0.0653	97.4	98.4	1	75.0-125			0.735	20
Calcium	5.00	373	375	373	47.6	4.45	1	75.0-125	V	V	0.576	20
Chromium	0.0500	U	0.0486	0.0502	97.1	100	1	75.0-125			3.30	20
Iron	5.00	0.0500	5.00	5.00	99.0	98.9	1	75.0-125			0.0489	20
Lead	0.0500	0.000449	0.0514	0.0518	102	103	1	75.0-125			0.690	20
Manganese	0.0500	0.531	0.575	0.574	88.2	86.2	1	75.0-125			0.173	20
Selenium	0.0500	0.000467	0.0482	0.0529	95.5	105	1	75.0-125			9.30	20
Sodium	5.00	61.7	67.1	65.8	106	81.9	1	75.0-125			1.83	20

WG1096943

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983354-01,02,03,04

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301355-1 04/12/18 13:16

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Potassium	0.117	J	0.0370	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301355-2 04/12/18 13:20 • (LCSD) R3301355-3 04/12/18 13:23

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Potassium	5.00	4.92	5.08	98.4	102	80.0-120			3.25	20

L983365-31 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-31 04/12/18 13:27 • (MS) R3301355-5 04/12/18 13:35 • (MSD) R3301355-6 04/12/18 13:39

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Potassium	5.00	0.0729	4.96	5.16	97.8	102	1	75.0-125			3.81	20

WG1094405

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983354-01,02,03,04,05

Method Blank (MB)

(MB) R3300482-3 04/05/18 20:03

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1094405

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983354-01,02,03,04,05

Method Blank (MB)

(MB) R3300482-3 04/05/18 20:03

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*103*			*80.0-120*
(S) Dibromofluoromethane	*97.9*			*76.0-123*
(S) 4-Bromofluorobenzene	*90.3*			*80.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300482-1 04/05/18 19:07 • (LCSD) R3300482-2 04/05/18 19:25

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.0943	0.0954	75.4	76.3	10.0-160			1.17	23
Benzene	0.0250	0.0227	0.0225	91.0	89.9	69.0-123			1.19	20
Bromodichloromethane	0.0250	0.0220	0.0225	87.9	90.0	76.0-120			2.31	20
Bromoform	0.0250	0.0245	0.0246	98.0	98.5	67.0-132			0.547	20
Bromomethane	0.0250	0.0378	0.0381	151	152	18.0-160			0.755	20
n-Butylbenzene	0.0250	0.0233	0.0235	93.2	93.9	72.0-126			0.718	20
sec-Butylbenzene	0.0250	0.0236	0.0236	94.4	94.3	74.0-121			0.0835	20
Carbon disulfide	0.0250	0.0197	0.0201	78.8	80.3	55.0-127			1.87	20
Carbon tetrachloride	0.0250	0.0215	0.0227	86.1	90.9	63.0-122			5.38	20
Chlorobenzene	0.0250	0.0264	0.0267	106	107	79.0-121			1.32	20
Chlorodibromomethane	0.0250	0.0254	0.0260	102	104	75.0-125			2.39	20
Chloroethane	0.0250	0.0325	0.0331	130	132	47.0-152			1.83	20
Chloroform	0.0250	0.0225	0.0222	90.1	88.6	72.0-121			1.65	20
Chloromethane	0.0250	0.0192	0.0197	76.6	78.7	48.0-139			2.75	20
1,2-Dibromoethane	0.0250	0.0262	0.0268	105	107	77.0-123			2.22	20
1,1-Dichloroethane	0.0250	0.0216	0.0220	86.2	87.9	70.0-126			1.97	20
1,2-Dichloroethane	0.0250	0.0222	0.0223	88.8	89.2	67.0-126			0.483	20
1,1-Dichloroethene	0.0250	0.0213	0.0210	85.2	84.1	64.0-129			1.30	20
cis-1,2-Dichloroethene	0.0250	0.0225	0.0236	90.1	94.5	73.0-120			4.77	20
trans-1,2-Dichloroethene	0.0250	0.0223	0.0226	89.4	90.5	71.0-121			1.23	20
1,2-Dichloropropane	0.0250	0.0222	0.0231	88.7	92.5	75.0-125			4.14	20
cis-1,3-Dichloropropene	0.0250	0.0251	0.0258	100	103	79.0-123			2.89	20
trans-1,3-Dichloropropene	0.0250	0.0259	0.0266	104	106	74.0-127			2.62	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300482-1 04/05/18 19:07 • (LCSD) R3300482-2 04/05/18 19:25

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0264	0.0267	106	107	77.0-120			0.998	20
2-Hexanone	0.125	0.124	0.126	99.1	100	58.0-147			1.40	20
Isopropylbenzene	0.0250	0.0230	0.0228	92.1	91.0	75.0-120			1.16	20
p-Isopropyltoluene	0.0250	0.0248	0.0250	99.3	99.9	74.0-126			0.663	20
2-Butanone (MEK)	0.125	0.110	0.110	88.1	88.0	37.0-158			0.190	20
Methylene Chloride	0.0250	0.0223	0.0228	89.3	91.4	66.0-121			2.26	20
4-Methyl-2-pentanone (MIBK)	0.125	0.122	0.124	97.7	99.1	59.0-143			1.35	20
Methyl tert-butyl ether	0.0250	0.0210	0.0215	83.8	86.0	64.0-123			2.55	20
Naphthalene	0.0250	0.0244	0.0252	97.8	101	62.0-128			3.07	20
n-Propylbenzene	0.0250	0.0227	0.0223	91.0	89.3	79.0-120			1.80	20
Styrene	0.0250	0.0245	0.0242	98.1	96.7	78.0-124			1.45	20
1,1,1,2-Tetrachloroethane	0.0250	0.0257	0.0264	103	106	75.0-122			2.60	20
1,1,2,2-Tetrachloroethane	0.0250	0.0222	0.0220	88.9	88.0	71.0-122			1.04	20
Tetrachloroethene	0.0250	0.0277	0.0277	111	111	70.0-127			0.177	20
Toluene	0.0250	0.0245	0.0250	98.2	99.9	77.0-120			1.77	20
1,1,1-Trichloroethane	0.0250	0.0207	0.0208	82.7	83.2	68.0-122			0.601	20
1,1,2-Trichloroethane	0.0250	0.0259	0.0259	104	104	78.0-120			0.0128	20
Trichloroethene	0.0250	0.0259	0.0262	103	105	78.0-120			1.40	20
1,2,4-Trimethylbenzene	0.0250	0.0233	0.0237	93.1	94.8	75.0-120			1.85	20
1,3,5-Trimethylbenzene	0.0250	0.0229	0.0227	91.7	90.9	75.0-120			0.819	20
Vinyl chloride	0.0250	0.0211	0.0215	84.6	85.9	64.0-133			1.57	20
Xylenes, Total	0.0750	0.0784	0.0810	105	108	77.0-120			3.26	20
o-Xylene	0.0250	0.0261	0.0271	104	108	78.0-120			3.69	20
m&p-Xylenes	0.0500	0.0523	0.0539	105	108	77.0-120			3.14	20
(S) Toluene-d8				*99.9*	*101*	*80.0-120*				
(S) Dibromofluoromethane				*92.5*	*92.7*	*76.0-123*				
(S) 4-Bromofluorobenzene				*85.4*	*84.1*	*80.0-120*				

WG1094423

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L983354-01,02,03,04

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300206-1 04/08/18 02:07

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*95.3*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300206-2 04/08/18 02:27 • (LCSD) R3300206-3 04/08/18 02:47

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.70	1.68	113	112	50.0-150			1.59	20
(S) o-Terphenyl				*120*	*120*	*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

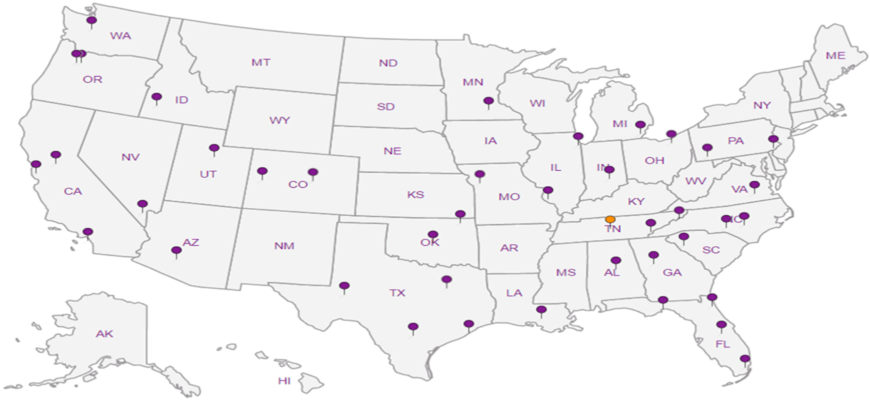
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



TRC Solutions - Austin, TX **505 E. Huntland Dr, Ste 250** **Austin, TX 78752**	Billing Information: **Accounts Payable** **21 Griffin Road North** **Windsor, CT 06095**	Pres Chk
Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**	
Project Description: **NCL Spring 2018**	City/State Collected: **Artesia, NM**	
Phone: **512-684-3170** Fax:	Client Project # **249545.0000.0000 000001**	Lab Project # **TRCATX-NCL**
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **NCL (NAVAJO-ARTESIA)**	P.O. # **119503**
Collected by (signature): Immediately Packed on Ice N ___ Y ___	***Rush?*** (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day	Quote # Date Results Needed

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-54A	**Grab**	**GW**		**4/3/18**	**0935**	**8**	X	X		X	X	X	X					-01
NCL-49	**Grab**	**GW**		**4/3/18**	**1020**	**8**	X	X		X	X	X	X					02
MW-53	**Grab**	**GW**		**4/3/18**	**1110**	**8**	X	X		X	X	X	X					03
DUP-NCL-01	**Grab**	**GW**		**4/3/18**	**1000**	**8**	X	X		X	X	X	X					04
EB-NCL-01	**Grab**	**GW**				**8**	X	X		X	X	X	X					~~0~~
TRIP BLANK-NCL-01	**Grab**	**GW**		**4/3/18**	**-**	**1**	X											05

Chain of Custody Page 1 of 1

ESC
L·A·B S·C·I·E·N·C·E·S
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12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L # L983354

F104

Acctnum: **TRCATX**

Template: **T133457**

Prelogin: **P643095**

TSR: **526**

PB:

Shipped Via:

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS [✓ FedEx] __ Courier ______

Tracking # 4264 9212 1659

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] __Y __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR 1
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.4 °C Bottles Received: 3.3
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Chain of Custody Page 1 of 1

ESC
L·A·B S·C·I·E·N·C·E·S
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12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# L983354

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: NCL Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: NCL (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Immediately Packed on Ice N ____ Y ✓

Rush? (Lab MUST Be Notified)
- ____ Same Day 200%
- ____ Next Day 100%
- ____ Two Day 50%
- ____ Three Day 25%

Date Results Needed

Email? ___No ✓ Yes

FAX? ___No ___Yes

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
NCL-49	Grab	GW		4/3/18	1020		✓	✓		✓		✓	✓	✓				-02
DUP-NCL-01	Grab	GW		4/3/18	1000		✓	✓		✓		✓	✓	✓				04
Trip Blank-NCL-01	Grab	GW		4/3/18	—		✓											05
MW-53	Grab	GW		4/3/18	1110		✓	✓		✓		✓	✓	✓				03
MW-54A	Grab	GW		4/3/18	935		✓	✓		✓		✓	✓	✓				-01
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	
Scott Ude	4/4/18	1000		Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.5 °C Bottles Received:
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845

Condition: (lab use only) OK

COC Seal Intact: ✓ Y ____N ____NA

pH Checked:

NCF:

ANALYTICAL REPORT

April 16, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L983360
Samples Received:	04/05/2018
Project Number:	294318.0000.0000.
Description:	TMD Spring 2018
Site:	TMD - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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MW-68 L983360-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 18:55	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094866	1	04/09/18 15:34	04/09/18 15:34	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 06:34	04/06/18 06:34	MAJ
Wet Chemistry by Method 9056A	WG1094250	20	04/06/18 06:46	04/06/18 06:46	MAJ
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 22:58	LD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 16:06	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:13	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 13:41	04/06/18 13:41	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 13:59	LM

MW-27 L983360-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 18:05	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094866	1	04/09/18 15:39	04/09/18 15:39	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 06:59	04/06/18 06:59	MAJ
Wet Chemistry by Method 9056A	WG1094722	20	04/06/18 20:47	04/06/18 20:47	MAJ
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:02	LD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 16:22	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:17	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 14:02	04/06/18 14:02	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 14:16	LM

MW-89 L983360-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 17:15	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094866	1	04/09/18 15:40	04/09/18 15:40	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 07:24	04/06/18 07:24	MAJ
Wet Chemistry by Method 9056A	WG1094250	10	04/06/18 08:01	04/06/18 08:01	MAJ
Wet Chemistry by Method 9056A	WG1094722	20	04/06/18 21:03	04/06/18 21:03	MAJ
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:05	LD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 16:26	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:21	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 14:23	04/06/18 14:23	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 14:33	LM

MW-16 L983360-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 16:25	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094866	1	04/09/18 15:41	04/09/18 15:41	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 08:13	04/06/18 08:13	MAJ
Wet Chemistry by Method 9056A	WG1094250	20	04/06/18 08:26	04/06/18 08:26	MAJ
Wet Chemistry by Method 9056A	WG1094722	50	04/06/18 21:18	04/06/18 21:18	MAJ
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:09	LD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 16:41	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:25	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 14:43	04/06/18 14:43	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 14:50	LM

	Collected by	Collected date/time	Received date/time
MW-26 L983360-05 GW	Scott Ude/HMI Team	04/03/18 15:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094866	1	04/09/18 15:42	04/09/18 15:42	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 08:38	04/06/18 08:38	MAJ
Wet Chemistry by Method 9056A	WG1094250	20	04/06/18 08:50	04/06/18 08:50	MAJ
Wet Chemistry by Method 9056A	WG1094722	50	04/06/18 21:33	04/06/18 21:33	MAJ
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:13	LD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 16:45	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:29	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 15:04	04/06/18 15:04	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 15:06	LM

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2150		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.390		0.0197	0.100	1	04/09/2018 15:34	WG1094866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	176		1.04	20.0	20	04/06/2018 06:46	WG1094250
Fluoride	1.82		0.00990	0.100	1	04/06/2018 06:34	WG1094250
Sulfate	1470		1.55	100	20	04/06/2018 06:46	WG1094250

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00326		0.000250	0.00200	1	04/11/2018 22:58	WG1094256
Arsenic,Dissolved	0.00252		0.000250	0.00200	1	04/12/2018 16:06	WG1095180
Barium	0.0119		0.000360	0.00500	1	04/11/2018 22:58	WG1094256
Barium,Dissolved	0.0113		0.000360	0.00500	1	04/12/2018 16:06	WG1095180
Calcium	388		0.0460	1.00	1	04/11/2018 22:58	WG1094256
Chromium	0.00211	B	0.000540	0.00200	1	04/12/2018 14:13	WG1096943
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 16:06	WG1095180
Iron	0.141		0.0150	0.100	1	04/11/2018 22:58	WG1094256
Iron,Dissolved	0.0205	B J	0.0150	0.100	1	04/12/2018 16:06	WG1095180
Lead	0.000658	J	0.000240	0.00200	1	04/11/2018 22:58	WG1094256
Lead,Dissolved	0.000713	J	0.000240	0.00200	1	04/12/2018 16:06	WG1095180
Manganese	0.0543		0.000250	0.00500	1	04/11/2018 22:58	WG1094256
Manganese,Dissolved	0.0527		0.000250	0.00500	1	04/12/2018 16:06	WG1095180
Potassium	5.01		0.0370	1.00	1	04/12/2018 14:13	WG1096943
Selenium	0.00780		0.000380	0.00200	1	04/11/2018 22:58	WG1094256
Selenium,Dissolved	0.00800		0.000380	0.00200	1	04/12/2018 16:06	WG1095180
Sodium	162		0.110	1.00	1	04/11/2018 22:58	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 13:41	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 13:41	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 13:41	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 13:41	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 13:41	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 13:41	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 13:41	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 13:41	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 13:41	WG1094680
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 13:41	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 13:41	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 13:41	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 13:41	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 13:41	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 13:41	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 13:41	WG1094680

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 13:41	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 13:41	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 13:41	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 13:41	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 13:41	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 13:41	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 13:41	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 13:41	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 13:41	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 13:41	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 13:41	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 13:41	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 13:41	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 13:41	WG1094680
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 13:41	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 13:41	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 13:41	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 13:41	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 13:41	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 13:41	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 13:41	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 13:41	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 13:41	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 13:41	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 13:41	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 13:41	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 13:41	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 13:41	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 13:41	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 13:41	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 13:41	WG1094680
(S) Toluene-d8	*106*			*80.0-120*		*04/06/2018 13:41*	WG1094680
(S) Dibromofluoromethane	*89.5*			*76.0-123*		*04/06/2018 13:41*	WG1094680
(S) 4-Bromofluorobenzene	*107*			*80.0-120*		*04/06/2018 13:41*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0508	J	0.0247	0.100	1	04/09/2018 13:59	WG1094424
(S) o-Terphenyl	*100*			*31.0-160*		*04/09/2018 13:59*	WG1094424

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1870		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.770		0.0197	0.100	1	04/09/2018 15:39	WG1094866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	80.2		0.0519	1.00	1	04/06/2018 06:59	WG1094250
Fluoride	1.33		0.00990	0.100	1	04/06/2018 06:59	WG1094250
Sulfate	1140		1.55	100	20	04/06/2018 20:47	WG1094722

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00335		0.000250	0.00200	1	04/11/2018 23:02	WG1094256
Arsenic,Dissolved	0.00228		0.000250	0.00200	1	04/12/2018 16:22	WG1095180
Barium	0.0150		0.000360	0.00500	1	04/11/2018 23:02	WG1094256
Barium,Dissolved	0.0147		0.000360	0.00500	1	04/12/2018 16:22	WG1095180
Calcium	337		0.0460	1.00	1	04/11/2018 23:02	WG1094256
Chromium	0.000709	B J	0.000540	0.00200	1	04/12/2018 14:17	WG1096943
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 16:22	WG1095180
Iron	0.183		0.0150	0.100	1	04/11/2018 23:02	WG1094256
Iron,Dissolved	0.0213	B J	0.0150	0.100	1	04/12/2018 16:22	WG1095180
Lead	0.000265	J	0.000240	0.00200	1	04/11/2018 23:02	WG1094256
Lead,Dissolved	0.000824	J	0.000240	0.00200	1	04/12/2018 16:22	WG1095180
Manganese	0.0539		0.000250	0.00500	1	04/11/2018 23:02	WG1094256
Manganese,Dissolved	0.0491		0.000250	0.00500	1	04/12/2018 16:22	WG1095180
Potassium	7.88		0.0370	1.00	1	04/12/2018 14:17	WG1096943
Selenium	0.0124		0.000380	0.00200	1	04/11/2018 23:02	WG1094256
Selenium,Dissolved	0.0119		0.000380	0.00200	1	04/12/2018 16:22	WG1095180
Sodium	129		0.110	1.00	1	04/11/2018 23:02	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 14:02	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 14:02	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 14:02	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 14:02	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 14:02	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 14:02	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 14:02	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 14:02	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 14:02	WG1094680
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 14:02	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 14:02	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 14:02	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 14:02	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 14:02	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 14:02	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 14:02	WG1094680

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 14:02	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 14:02	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 14:02	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 14:02	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 14:02	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 14:02	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 14:02	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 14:02	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 14:02	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 14:02	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 14:02	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 14:02	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 14:02	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 14:02	WG1094680
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 14:02	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 14:02	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 14:02	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 14:02	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 14:02	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 14:02	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 14:02	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 14:02	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 14:02	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 14:02	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 14:02	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 14:02	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 14:02	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 14:02	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 14:02	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 14:02	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 14:02	WG1094680
(S) Toluene-d8	*107*			*80.0-120*		*04/06/2018 14:02*	WG1094680
(S) Dibromofluoromethane	*88.0*			*76.0-123*		*04/06/2018 14:02*	WG1094680
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 14:02*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0537	J	0.0247	0.100	1	04/09/2018 14:16	WG1094424
(S) o-Terphenyl	*98.3*			*31.0-160*		*04/09/2018 14:16*	WG1094424

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2430		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	1.10		0.0197	0.100	1	04/09/2018 15:40	WG1094866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	170		0.519	10.0	10	04/06/2018 08:01	WG1094250
Fluoride	2.64		0.00990	0.100	1	04/06/2018 07:24	WG1094250
Sulfate	1630		1.55	100	20	04/06/2018 21:03	WG1094722

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0112		0.000250	0.00200	1	04/11/2018 23:05	WG1094256
Arsenic,Dissolved	0.00953		0.000250	0.00200	1	04/12/2018 16:26	WG1095180
Barium	0.0136		0.000360	0.00500	1	04/11/2018 23:05	WG1094256
Barium,Dissolved	0.0138		0.000360	0.00500	1	04/12/2018 16:26	WG1095180
Calcium	513		0.0460	1.00	1	04/11/2018 23:05	WG1094256
Chromium	0.000638	J J3 J4	0.000540	0.00200	1	04/11/2018 23:05	WG1094256
Chromium,Dissolved	0.00168	B J	0.000540	0.00200	1	04/12/2018 16:26	WG1095180
Iron	U		0.0150	0.100	1	04/11/2018 23:05	WG1094256
Iron,Dissolved	0.0243	B J	0.0150	0.100	1	04/12/2018 16:26	WG1095180
Lead	0.000617	J	0.000240	0.00200	1	04/11/2018 23:05	WG1094256
Lead,Dissolved	0.000551	J	0.000240	0.00200	1	04/12/2018 16:26	WG1095180
Manganese	0.628		0.000250	0.00500	1	04/11/2018 23:05	WG1094256
Manganese,Dissolved	0.605		0.000250	0.00500	1	04/12/2018 16:26	WG1095180
Potassium	8.61		0.0370	1.00	1	04/12/2018 14:21	WG1096943
Selenium	0.00218		0.000380	0.00200	1	04/11/2018 23:05	WG1094256
Selenium,Dissolved	0.00261		0.000380	0.00200	1	04/12/2018 16:26	WG1095180
Sodium	151		0.110	1.00	1	04/11/2018 23:05	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 14:23	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 14:23	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 14:23	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 14:23	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 14:23	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 14:23	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 14:23	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 14:23	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 14:23	WG1094680
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 14:23	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 14:23	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 14:23	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 14:23	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 14:23	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 14:23	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 14:23	WG1094680

MW-89

Collected date/time: 04/03/18 17:15

SAMPLE RESULTS - 03

L983360

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 14:23	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 14:23	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 14:23	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 14:23	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 14:23	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 14:23	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 14:23	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 14:23	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 14:23	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 14:23	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 14:23	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 14:23	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 14:23	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 14:23	WG1094680
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 14:23	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 14:23	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 14:23	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 14:23	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 14:23	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 14:23	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 14:23	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 14:23	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 14:23	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 14:23	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 14:23	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 14:23	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 14:23	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 14:23	WG1094680
o-Xylene	0.000421	J	0.000341	0.00100	1	04/06/2018 14:23	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 14:23	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 14:23	WG1094680
(S) Toluene-d8	*109*			*80.0-120*		*04/06/2018 14:23*	WG1094680
(S) Dibromofluoromethane	*89.8*			*76.0-123*		*04/06/2018 14:23*	WG1094680
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/06/2018 14:23*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.403		0.0247	0.100	1	04/09/2018 14:33	WG1094424
(S) o-Terphenyl	*102*			*31.0-160*		*04/09/2018 14:33*	WG1094424

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4960		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.428		0.0197	0.100	1	04/09/2018 15:41	WG1094866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	705		1.04	20.0	20	04/06/2018 08:26	WG1094250
Fluoride	2.26		0.00990	0.100	1	04/06/2018 08:13	WG1094250
Sulfate	2820		3.87	250	50	04/06/2018 21:18	WG1094722

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00612		0.000250	0.00200	1	04/11/2018 23:09	WG1094256
Arsenic,Dissolved	0.00517		0.000250	0.00200	1	04/12/2018 16:41	WG1095180
Barium	0.0157		0.000360	0.00500	1	04/11/2018 23:09	WG1094256
Barium,Dissolved	0.0134		0.000360	0.00500	1	04/12/2018 16:41	WG1095180
Calcium	600		0.0460	1.00	1	04/11/2018 23:09	WG1094256
Chromium	U	J3 J4	0.000540	0.00200	1	04/11/2018 23:09	WG1094256
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 16:41	WG1095180
Iron	0.0436	J	0.0150	0.100	1	04/11/2018 23:09	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 16:41	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 23:09	WG1094256
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 16:41	WG1095180
Manganese	0.322		0.000250	0.00500	1	04/11/2018 23:09	WG1094256
Manganese,Dissolved	0.0579		0.000250	0.00500	1	04/12/2018 16:41	WG1095180
Potassium	9.59		0.0370	1.00	1	04/12/2018 14:25	WG1096943
Selenium	0.00394		0.000380	0.00200	1	04/11/2018 23:09	WG1094256
Selenium,Dissolved	0.00361		0.000380	0.00200	1	04/12/2018 16:41	WG1095180
Sodium	643		0.110	1.00	1	04/11/2018 23:09	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 14:43	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 14:43	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 14:43	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 14:43	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 14:43	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 14:43	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 14:43	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 14:43	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 14:43	WG1094680
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 14:43	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 14:43	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 14:43	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 14:43	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 14:43	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 14:43	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 14:43	WG1094680

MW-16
Collected date/time: 04/03/18 16:25

SAMPLE RESULTS - 04

L983360

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 14:43	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 14:43	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 14:43	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 14:43	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 14:43	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 14:43	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 14:43	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 14:43	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 14:43	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 14:43	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 14:43	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 14:43	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 14:43	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 14:43	WG1094680
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 14:43	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 14:43	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 14:43	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 14:43	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 14:43	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 14:43	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 14:43	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 14:43	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 14:43	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 14:43	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 14:43	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 14:43	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 14:43	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 14:43	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 14:43	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 14:43	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 14:43	WG1094680
(S) Toluene-d8	*107*			*80.0-120*		*04/06/2018 14:43*	WG1094680
(S) Dibromofluoromethane	*87.5*			*76.0-123*		*04/06/2018 14:43*	WG1094680
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/06/2018 14:43*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.189		0.0247	0.100	1	04/09/2018 14:50	WG1094424
(S) o-Terphenyl	*99.0*			*31.0-160*		*04/09/2018 14:50*	WG1094424

MW-26
Collected date/time: 04/03/18 15:35

SAMPLE RESULTS - 05

L983360

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	7170		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.986		0.0197	0.100	1	04/09/2018 15:42	WG1094866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1120		1.04	20.0	20	04/06/2018 08:50	WG1094250
Fluoride	1.61		0.00990	0.100	1	04/06/2018 08:38	WG1094250
Sulfate	3830		3.87	250	50	04/06/2018 21:33	WG1094722

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00426		0.000250	0.00200	1	04/11/2018 23:13	WG1094256
Arsenic,Dissolved	0.00335		0.000250	0.00200	1	04/12/2018 16:45	WG1095180
Barium	0.00944		0.000360	0.00500	1	04/11/2018 23:13	WG1094256
Barium,Dissolved	0.00897		0.000360	0.00500	1	04/12/2018 16:45	WG1095180
Calcium	664		0.0460	1.00	1	04/11/2018 23:13	WG1094256
Chromium	U	J3 J4	0.000540	0.00200	1	04/11/2018 23:13	WG1094256
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 16:45	WG1095180
Iron	U		0.0150	0.100	1	04/11/2018 23:13	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 16:45	WG1095180
Lead	0.000351	J	0.000240	0.00200	1	04/11/2018 23:13	WG1094256
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 16:45	WG1095180
Manganese	0.513		0.000250	0.00500	1	04/11/2018 23:13	WG1094256
Manganese,Dissolved	0.481		0.000250	0.00500	1	04/12/2018 16:45	WG1095180
Potassium	5.46		0.0370	1.00	1	04/12/2018 14:29	WG1096943
Selenium	0.0238		0.000380	0.00200	1	04/11/2018 23:13	WG1094256
Selenium,Dissolved	0.0220		0.000380	0.00200	1	04/12/2018 16:45	WG1095180
Sodium	731		0.110	1.00	1	04/11/2018 23:13	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 15:04	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 15:04	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 15:04	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 15:04	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 15:04	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 15:04	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 15:04	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 15:04	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 15:04	WG1094680
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 15:04	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 15:04	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 15:04	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 15:04	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 15:04	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 15:04	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 15:04	WG1094680

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 15:04	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 15:04	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 15:04	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 15:04	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 15:04	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 15:04	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 15:04	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 15:04	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 15:04	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 15:04	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 15:04	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 15:04	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 15:04	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 15:04	WG1094680
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 15:04	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 15:04	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 15:04	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 15:04	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 15:04	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 15:04	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 15:04	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 15:04	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 15:04	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 15:04	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 15:04	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 15:04	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 15:04	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 15:04	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 15:04	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 15:04	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 15:04	WG1094680
(S) Toluene-d8	*110*			*80.0-120*		*04/06/2018 15:04*	WG1094680
(S) Dibromofluoromethane	*88.5*			*76.0-123*		*04/06/2018 15:04*	WG1094680
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 15:04*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0492	J	0.0247	0.100	1	04/09/2018 15:06	WG1094424
(S) o-Terphenyl	*97.4*			*31.0-160*		*04/09/2018 15:06*	WG1094424

WG1095029

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983360-01,02,03,04,05

Method Blank (MB)

(MB) R3300997-1 04/10/18 19:06

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983360-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983360-01 04/10/18 19:06 • (DUP) R3300997-4 04/10/18 19:06

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2150	2260	1	5.00		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300997-2 04/10/18 19:06 • (LCSD) R3300997-3 04/10/18 19:06

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8490	8870	96.5	101	85.0-115			4.38	5

QUALITY CONTROL SUMMARY

L983360-01,02,03,04,05

Method Blank (MB)

(MB) R3300264-1 04/09/18 15:24

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983354-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983354-01 04/09/18 15:27 • (DUP) R3300264-4 04/09/18 15:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

L983365-30 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-30 04/09/18 15:57 • (DUP) R3300264-7 04/09/18 15:58

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	5	0.000		20

Sample Narrative:

OS: Diluted due to sulfide interference

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300264-2 04/09/18 15:25 • (LCSD) R3300264-3 04/09/18 15:26

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.80	3.89	94.9	97.3	90.0-110			2.52	20

L983354-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L983354-03 04/09/18 15:30 • (MS) R3300264-5 04/09/18 15:31

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	1.58	3.56	79.1	1	90.0-110	J6

WG1094866

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L983360-01,02,03,04,05

L983365-31 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-31 04/09/18 15:59 • (MS) R3300264-8 04/09/18 16:00 • (MSD) R3300264-9 04/09/18 16:01

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	2.50	U	2.12	2.13	84.9	85.0	1	90.0-110	J6	J6	0.141	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1094250

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983360-01,02,03,04,05

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299675-1 04/06/18 00:22

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983343-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983343-01 04/06/18 01:11 • (DUP) R3299675-4 04/06/18 01:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	32.0	32.4	1	1.13		15
Fluoride	ND	0.0756	1	8.24	J	15
Sulfate	ND	0.506	1	5.91	J	15

L983343-06 Original Sample (OS) • Duplicate (DUP)

(OS) L983343-06 04/06/18 03:15 • (DUP) R3299675-7 04/06/18 03:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	5.87	5.95	1	1.35		15
Fluoride	ND	0.0329	1	45.5	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299675-2 04/06/18 00:34 • (LCSD) R3299675-3 04/06/18 00:46

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.8	39.8	99.6	99.5	80.0-120			0.0414	15
Fluoride	8.00	8.05	8.05	101	101	80.0-120			0.00248	15
Sulfate	40.0	40.0	39.9	100	99.8	80.0-120			0.216	15

L983343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983343-01 04/06/18 01:11 • (MS) R3299675-5 04/06/18 01:36 • (MSD) R3299675-6 04/06/18 01:48

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	32.0	85.6	82.3	107	101	1	80.0-120			3.89	15
Fluoride	5.00	ND	5.54	5.42	109	107	1	80.0-120			2.10	15

QUALITY CONTROL SUMMARY

L983360-01,02,03,04,05

L983343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983343-01 04/06/18 01:11 • (MS) R3299675-5 04/06/18 01:36 • (MSD) R3299675-6 04/06/18 01:48

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	ND	50.7	50.9	100	101	1	80.0-120			0.504	15

L983343-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L983343-06 04/06/18 03:15 • (MS) R3299675-8 04/06/18 03:40

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	5.87	61.4	111	1	80.0-120	
Fluoride	5.00	ND	5.43	108	1	80.0-120	

QUALITY CONTROL SUMMARY

L983360-02,03,04,05

Method Blank (MB)

(MB) R3299893-1 04/06/18 15:20

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L983292-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983292-03 04/06/18 18:29 • (DUP) R3299893-4 04/06/18 18:44

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	17.6	17.7	1	0.420		15

L983578-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983578-01 04/07/18 00:54 • (DUP) R3299893-7 04/07/18 01:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	36.4	36.8	1	0.984		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299893-2 04/06/18 15:36 • (LCSD) R3299893-3 04/06/18 15:51

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	39.4	39.4	98.5	98.5	80.0-120			0.0287	15

L983292-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983292-03 04/06/18 18:29 • (MS) R3299893-5 04/06/18 18:59 • (MSD) R3299893-6 04/06/18 19:15

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	17.6	68.6	68.4	102	102	1	80.0-120			0.226	15

L983578-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L983578-01 04/07/18 00:54 • (MS) R3299893-8 04/07/18 01:25

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	36.4	85.4	98.1	1	80.0-120	

QUALITY CONTROL SUMMARY

L983360-01,02,03,04,05

Method Blank (MB)

(MB) R3301060-1 04/11/18 22:01

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Selenium	U		0.000380	0.00200
Sodium	0.440	J	0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301060-2 04/11/18 22:05 • (LCSD) R3301060-3 04/11/18 22:09

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0481	0.0495	96.2	98.9	80.0-120			2.74	20
Barium	0.0500	0.0467	0.0487	93.4	97.3	80.0-120			4.12	20
Calcium	5.00	4.96	5.00	99.2	99.9	80.0-120			0.721	20
Chromium	0.0500	0.0486	0.0688	97.3	138	80.0-120		J3 J4	34.3	20
Iron	5.00	4.94	5.24	98.8	105	80.0-120			5.91	20
Lead	0.0500	0.0497	0.0510	99.5	102	80.0-120			2.45	20
Manganese	0.0500	0.0481	0.0510	96.1	102	80.0-120			5.86	20
Selenium	0.0500	0.0489	0.0501	97.7	100	80.0-120			2.57	20
Sodium	5.00	5.13	5.07	103	101	80.0-120			1.20	20

L983354-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983354-01 04/11/18 22:13 • (MS) R3301060-5 04/11/18 22:21 • (MSD) R3301060-6 04/11/18 22:25

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00456	0.0533	0.0528	97.5	96.5	1	75.0-125			1.01	20
Barium	0.0500	0.0161	0.0648	0.0653	97.4	98.4	1	75.0-125			0.735	20
Calcium	5.00	373	375	373	47.6	4.45	1	75.0-125	V	V	0.576	20
Chromium	0.0500	U	0.0486	0.0502	97.1	100	1	75.0-125			3.30	20
Iron	5.00	0.0500	5.00	5.00	99.0	98.9	1	75.0-125			0.0489	20
Lead	0.0500	0.000449	0.0514	0.0518	102	103	1	75.0-125			0.690	20
Manganese	0.0500	0.531	0.575	0.574	88.2	86.2	1	75.0-125			0.173	20
Selenium	0.0500	0.000467	0.0482	0.0529	95.5	105	1	75.0-125			9.30	20
Sodium	5.00	61.7	67.1	65.8	106	81.9	1	75.0-125			1.83	20

Method Blank (MB)

(MB) R3301420-1 04/12/18 15:55

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Chromium,Dissolved	0.000907	J	0.000540	0.00200
Iron,Dissolved	0.0322	J	0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Selenium,Dissolved	U		0.000380	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301420-2 04/12/18 15:59 • (LCSD) R3301420-3 04/12/18 16:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0505	0.0510	101	102	80.0-120			0.868	20
Barium,Dissolved	0.0500	0.0479	0.0495	95.9	99.0	80.0-120			3.25	20
Chromium,Dissolved	0.0500	0.0499	0.0510	99.8	102	80.0-120			2.10	20
Iron,Dissolved	5.00	5.08	5.11	102	102	80.0-120			0.686	20
Lead,Dissolved	0.0500	0.0519	0.0501	104	100	80.0-120			3.47	20
Manganese,Dissolved	0.0500	0.0492	0.0493	98.5	98.7	80.0-120			0.189	20
Selenium,Dissolved	0.0500	0.0510	0.0522	102	104	80.0-120			2.27	20

L983360-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983360-01 04/12/18 16:06 • (MS) R3301420-5 04/12/18 16:14 • (MSD) R3301420-6 04/12/18 16:18

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.00252	0.0523	0.0529	99.5	101	1	75.0-125			1.16	20
Barium,Dissolved	0.0500	0.0113	0.0643	0.0615	106	100	1	75.0-125			4.54	20
Chromium,Dissolved	0.0500	U	0.0498	0.0500	99.6	99.9	1	75.0-125			0.298	20
Iron,Dissolved	5.00	0.0205	4.97	4.98	99.0	99.2	1	75.0-125			0.229	20
Lead,Dissolved	0.0500	0.000713	0.0510	0.0510	101	101	1	75.0-125			0.00218	20
Manganese,Dissolved	0.0500	0.0527	0.0988	0.0999	92.2	94.4	1	75.0-125			1.11	20
Selenium,Dissolved	0.0500	0.00800	0.0605	0.0584	105	101	1	75.0-125			3.48	20

WG1096943

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983360-01,02,03,04,05

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301355-1 04/12/18 13:16

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chromium	0.00144	J	0.000540	0.00200
Potassium	0.117	J	0.0370	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301355-2 04/12/18 13:20 • (LCSD) R3301355-3 04/12/18 13:23

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chromium	0.0500	0.0503	0.0530	101	106	80.0-120			5.11	20
Potassium	5.00	4.92	5.08	98.4	102	80.0-120			3.25	20

L983365-31 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-31 04/12/18 13:27 • (MS) R3301355-5 04/12/18 13:35 • (MSD) R3301355-6 04/12/18 13:39

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium	0.0500	0.00112	0.0517	0.0544	101	107	1	75.0-125			5.17	20
Potassium	5.00	0.0729	4.96	5.16	97.8	102	1	75.0-125			3.81	20

WG1094680

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983360-01,02,03,04,05

Method Blank (MB)

(MB) R3300632-2 04/06/18 12:29

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

QUALITY CONTROL SUMMARY

L983360-01,02,03,04,05

Method Blank (MB)

(MB) R3300632-2 04/06/18 12:29

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*108*			*80.0-120*
(S) Dibromofluoromethane	*87.8*			*76.0-123*
(S) 4-Bromofluorobenzene	*104*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3300632-1 04/06/18 11:26

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.0779	62.3	10.0-160	
Benzene	0.0250	0.0229	91.6	69.0-123	
Bromodichloromethane	0.0250	0.0250	100	76.0-120	
Bromoform	0.0250	0.0258	103	67.0-132	
Bromomethane	0.0250	0.00903	36.1	18.0-160	
n-Butylbenzene	0.0250	0.0265	106	72.0-126	
sec-Butylbenzene	0.0250	0.0263	105	74.0-121	
Carbon disulfide	0.0250	0.0236	94.3	55.0-127	
Carbon tetrachloride	0.0250	0.0226	90.5	63.0-122	
Chlorobenzene	0.0250	0.0251	100	79.0-121	
Chlorodibromomethane	0.0250	0.0257	103	75.0-125	
Chloroethane	0.0250	0.0267	107	47.0-152	
Chloroform	0.0250	0.0226	90.4	72.0-121	
Chloromethane	0.0250	0.0203	81.0	48.0-139	
1,2-Dibromoethane	0.0250	0.0261	104	77.0-123	
1,1-Dichloroethane	0.0250	0.0230	92.2	70.0-126	
1,2-Dichloroethane	0.0250	0.0222	88.9	67.0-126	
1,1-Dichloroethene	0.0250	0.0233	93.2	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0226	90.4	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0235	94.2	71.0-121	
1,2-Dichloropropane	0.0250	0.0254	101	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0265	106	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0260	104	74.0-127	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS)

(LCS) R3300632-1 04/06/18 11:26

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.0250	0.0265	106	77.0-120	
2-Hexanone	0.125	0.132	105	58.0-147	
Isopropylbenzene	0.0250	0.0266	106	75.0-120	
p-Isopropyltoluene	0.0250	0.0265	106	74.0-126	
2-Butanone (MEK)	0.125	0.103	82.2	37.0-158	
Methylene Chloride	0.0250	0.0218	87.1	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.133	106	59.0-143	
Methyl tert-butyl ether	0.0250	0.0234	93.5	64.0-123	
Naphthalene	0.0250	0.0270	108	62.0-128	
n-Propylbenzene	0.0250	0.0259	104	79.0-120	
Styrene	0.0250	0.0268	107	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0261	104	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0266	106	71.0-122	
Tetrachloroethene	0.0250	0.0254	102	70.0-127	
Toluene	0.0250	0.0252	101	77.0-120	
1,1,1-Trichloroethane	0.0250	0.0235	93.9	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0259	103	78.0-120	
Trichloroethene	0.0250	0.0235	94.0	78.0-120	
1,2,4-Trimethylbenzene	0.0250	0.0256	102	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0258	103	75.0-120	
Vinyl chloride	0.0250	0.0232	92.6	64.0-133	
Xylenes, Total	0.0750	0.0796	106	77.0-120	
o-Xylene	0.0250	0.0264	106	78.0-120	
m&p-Xylenes	0.0500	0.0532	106	77.0-120	
(S) Toluene-d8			*103*	*80.0-120*	
(S) Dibromofluoromethane			*88.6*	*76.0-123*	
(S) 4-Bromofluorobenzene			*103*	*80.0-120*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300543-1 04/09/18 11:29

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*99.6*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300543-2 04/09/18 11:46 • (LCSD) R3300543-3 04/09/18 12:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.57	1.62	105	108	50.0-150			3.16	20
(S) o-Terphenyl				*124*	*128*	*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia[1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky[1 6]	90010
Kentucky[2]	16
Louisiana	AI30792
Louisiana[1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086

Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico[1]	n/a
New York	11742
North Carolina	Env375
North Carolina[1]	DW21704
North Carolina[3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee[1 4]	2006
Texas	T 104704245-17-14
Texas[5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

Third Party Federal Accreditations

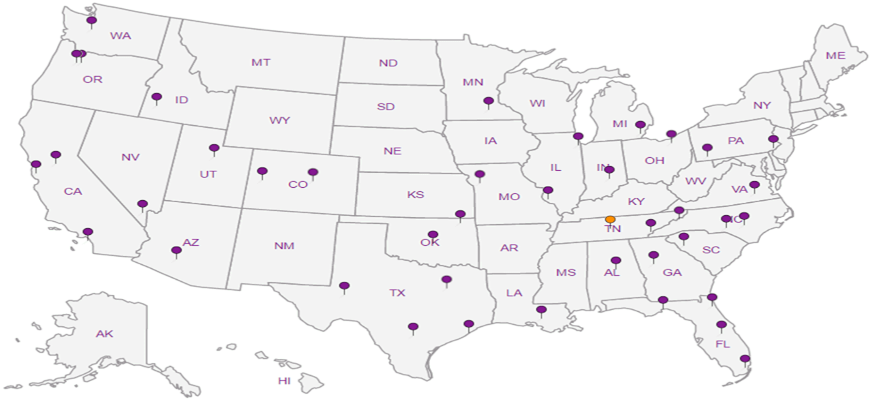
A2LA – ISO 17025	1461.01
A2LA – ISO 17025[5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003

AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 1 of 2

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **TMD Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-TMD**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **TMD (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N___ Y___

L# L983360

E045

Acctnum: **TRCATX**
Template: **T133687**
Prelogin: **P643798**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-25	Grab	GW				8	X	X		X	X	X	X					
MW-20	Grab	GW				8	X	X		X	X	X	X					
NP-1	Grab	GW				5	X				X	X	X					
MW-8	Grab	GW				10	X	X	X	X	X	X	X					
MW-21	Grab	GW				10	X	X	X	X	X	X	X					
MW-71	Grab	GW				9	X	X			X	X	X	X	X			
MW-68	Grab	GW		4/3/18	1855	8	X	X		X	X	X	X					-01
MW-27	Grab	GW		4/3/18	1805	8	X	X		X	X	X	X					02
MW-89	Grab	GW		4/3/18	1715	8	X	X		X	X	X	X					03
MW-16	Grab	GW		4/3/18	1625	8	X	X		X	X	X	X					04

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier __ ______

Tracking # 4214 9213 4046

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y ✓N
* pH adjusted in Lab for FF Metals @1540

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR 0
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 2.1/10 °C Bottles Received: 40
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) 840	Date: 4/5/18 Time: 845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Chain of Custody Page 2 of 2

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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **TMD Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project #: **249545.0000.0000 000001**

Lab Project #: **TRCATX-TMD**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: **TMD (Navajo - Artesia)**

P.O. #: **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ___

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

L # L983360
Table #
Acctnum: **TRCATX**
Template: **T133687**
Prelogin: **P643798**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved) *<2	Cations (from "total metals" bottle) <2	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-26	**Grab**	**GW**		**4/3/18**	**1535**	**8**	X	X		X	X	X	X					-05
MW-46R	**Grab**	**GW**				**8**	X	X		X	X	X	X					
TRIP BLANK-TMD-01	**Grab**	**GW**				**1**	X											

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP [✓ Y] __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] [✓ N]
* pH adjusted in Lab for FF metals @1540

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: Yes / No
HCL / MeoH
TBR
0

Temp: 7.1 9/10 °C
Bottles Received: 40

Date: 4/5/18
Time: 845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 1 of 1

ESC
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YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# L983366

Table #

Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
Shipped Via:

Report to: Julie Speer
Email To: jspeer@trcwsolutions.com
Project Description: TMD Spring 2018
City/State Collected: Artesia, NM
Phone: 512-684-3170
Fax:
Client Project #
Lab Project #
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID #: TMD (Navajo - Artesia)
P.O. #: 119503
Collected by (signature):
Immediately Packed on Ice N ___ [✓ Y]

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-16	Grab	GW		4/3/18	1625		✓	✓		✓		✓	✓	✓				04
MW-26	Grab	GW		4/3/18	1535		✓	✓		✓		✓	✓	✓				05
MW-27	Grab	GW		4/3/18	1805		✓	✓		✓		✓	✓	✓				02
MW-68	Grab	GW		4/3/18	1855		✓	✓		✓		✓	✓	✓				01
MW-89	Grab	GW		4/3/18	1715		✓	✓		✓		✓	✓	✓				03
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________
Flow ________ Other ________
Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/4/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.2 °C Bottles Received:	COC Seal Intact: [✓ Y] ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	pH Checked: NCF:

ANALYTICAL REPORT

April 17, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L983365
Samples Received:	04/05/2018
Project Number:	294318.0000.0000.
Description:	REST Spring 2018
Site:	REST (NAVAJO-ARTESIA)
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By:

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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RA-4798 L983365-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 14:42	04/09/18 14:42	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 09:03	04/06/18 09:03	MAJ
Wet Chemistry by Method 9056A	WG1094722	10	04/06/18 21:49	04/06/18 21:49	MAJ
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 20:11	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 00:57	04/06/18 00:57	ACG

RA-4196 L983365-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:05	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 14:44	04/09/18 14:44	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 09:15	04/06/18 09:15	MAJ
Wet Chemistry by Method 9056A	WG1094250	10	04/06/18 09:28	04/06/18 09:28	MAJ
Wet Chemistry by Method 9056A	WG1094722	20	04/06/18 22:04	04/06/18 22:04	MAJ
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 20:28	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 01:18	04/06/18 01:18	ACG

MW-135 L983365-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 11:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094863	25	04/09/18 15:17	04/09/18 15:17	JER
Wet Chemistry by Method 9056A	WG1094250	1	04/06/18 09:40	04/06/18 09:40	MAJ
Wet Chemistry by Method 9056A	WG1094250	20	04/06/18 09:52	04/06/18 09:52	MAJ
Wet Chemistry by Method 9056A	WG1094722	50	04/06/18 22:20	04/06/18 22:20	MAJ
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 02:05	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 20:33	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:03	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 14:07	04/06/18 14:07	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 01:39	04/06/18 01:39	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 20:08	LM

KWB-11A L983365-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 09:40	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 14:47	04/09/18 14:47	JER
Wet Chemistry by Method 4500CN E-2011	WG1094972	1	04/06/18 22:07	04/09/18 15:30	KK
Wet Chemistry by Method 9056A	WG1094255	1	04/05/18 23:35	04/05/18 23:35	MAJ
Wet Chemistry by Method 9056A	WG1094255	20	04/05/18 23:50	04/05/18 23:50	MAJ
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 18:58	EL
Mercury by Method 7470A	WG1094326	1	04/06/18 08:56	04/08/18 19:32	EL
Metals (ICP) by Method 6010B	WG1094248	1	04/06/18 09:52	04/08/18 20:53	ST
Metals (ICP) by Method 6010B	WG1094698	1	04/10/18 06:38	04/10/18 09:55	CCE
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 02:21	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 20:40	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:08	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 14:29	04/06/18 14:29	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 02:00	04/06/18 02:00	ACG

KWB-11A L983365-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 09:40	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 20:24	LM

KWB-11B L983365-05 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 10:25	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095029	1	04/10/18 18:46	04/10/18 19:06	EG
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 14:48	04/09/18 14:48	JER
Wet Chemistry by Method 4500CN E-2011	WG1094972	1	04/06/18 22:07	04/09/18 15:31	KK
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 00:06	04/06/18 00:06	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 00:21	04/06/18 00:21	MAJ
Wet Chemistry by Method 9056A	WG1094922	20	04/07/18 20:36	04/07/18 20:36	DR
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 19:00	EL
Mercury by Method 7470A	WG1094326	1	04/06/18 08:56	04/08/18 19:25	EL
Metals (ICP) by Method 6010B	WG1094248	1	04/06/18 09:52	04/08/18 20:56	ST
Metals (ICP) by Method 6010B	WG1094698	1	04/10/18 06:38	04/10/18 09:59	CCE
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 02:25	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 20:53	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:21	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 14:51	04/06/18 14:51	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 02:21	04/06/18 02:21	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 20:41	LM

MW-136 L983365-06 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 17:50	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	5	04/09/18 14:54	04/09/18 14:54	JER
Wet Chemistry by Method 4500CN E-2011	WG1094972	1	04/06/18 22:07	04/09/18 15:34	KK
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 00:37	04/06/18 00:37	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 00:52	04/06/18 00:52	MAJ
Wet Chemistry by Method 9056A	WG1094922	50	04/07/18 20:48	04/07/18 20:48	DR
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 19:03	EL
Mercury by Method 7470A	WG1094326	1	04/06/18 08:56	04/08/18 19:35	EL
Metals (ICP) by Method 6010B	WG1094248	1	04/06/18 09:52	04/08/18 20:59	ST
Metals (ICP) by Method 6010B	WG1094698	1	04/10/18 06:38	04/10/18 10:03	CCE
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 02:29	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 20:57	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:25	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 15:13	04/06/18 15:13	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 02:41	04/06/18 02:41	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 20:58	LM

MW-126A L983365-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:55	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 14:55	04/09/18 14:55	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 01:08	04/06/18 01:08	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 01:56	04/06/18 01:56	MAJ
Wet Chemistry by Method 9056A	WG1094922	20	04/07/18 21:01	04/07/18 21:01	DR

MW-126A L983365-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:55	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 02:41	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:01	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:30	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 15:35	04/06/18 15:35	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 03:02	04/06/18 03:02	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 21:14	LM

MW-126B L983365-08 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 14:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 14:56	04/09/18 14:56	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 02:11	04/06/18 02:11	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 02:27	04/06/18 02:27	MAJ
Wet Chemistry by Method 9056A	WG1094922	50	04/07/18 21:13	04/07/18 21:13	DR
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 02:44	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:06	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:34	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 16:51	04/06/18 16:51	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 03:23	04/06/18 03:23	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 21:31	LM

MW-127 L983365-09 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:10	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	5	04/09/18 14:57	04/09/18 14:57	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 02:42	04/06/18 02:42	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 02:57	04/06/18 02:57	MAJ
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 02:48	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:10	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:38	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 17:13	04/06/18 17:13	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	20	04/06/18 03:44	04/06/18 03:44	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 21:48	LM

MW-129 L983365-10 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 12:20	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 14:58	04/09/18 14:58	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 03:13	04/06/18 03:13	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 03:28	04/06/18 03:28	MAJ
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 02:52	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:14	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:43	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 17:35	04/06/18 17:35	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 04:05	04/06/18 04:05	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	100	04/11/18 20:52	04/11/18 20:52	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 22:04	LM

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

RW-#18A L983365-11 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 11:20	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 14:59	04/09/18 14:59	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 03:44	04/06/18 03:44	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 03:59	04/06/18 03:59	MAJ
Wet Chemistry by Method 9056A	WG1094922	50	04/07/18 21:25	04/07/18 21:25	DR
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 02:56	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:18	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:47	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 04:25	04/06/18 04:25	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/11/18 21:12	04/11/18 21:12	DWR

KWB-1A L983365-12 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 10:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 15:00	04/09/18 15:00	JER
Wet Chemistry by Method 4500CN E-2011	WG1094972	1	04/06/18 22:07	04/09/18 15:35	KK
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 04:14	04/06/18 04:14	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 05:01	04/06/18 05:01	MAJ
Wet Chemistry by Method 9056A	WG1094922	50	04/07/18 21:38	04/07/18 21:38	DR
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 19:05	EL
Mercury by Method 7470A	WG1094326	1	04/06/18 08:56	04/08/18 19:37	EL
Metals (ICP) by Method 6010B	WG1094248	1	04/06/18 09:52	04/08/18 21:07	ST
Metals (ICP) by Method 6010B	WG1094698	1	04/10/18 06:38	04/10/18 10:13	CCE
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:00	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:23	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:52	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 04:46	04/06/18 04:46	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 22:21	LM

KWB-10R L983365-13 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 09:50	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	1	04/09/18 15:01	04/09/18 15:01	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 05:16	04/06/18 05:16	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 05:32	04/06/18 05:32	MAJ
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:04	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:27	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 14:56	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	250	04/06/18 05:07	04/06/18 05:07	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 22:37	LM

MW-58 L983365-14 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 16:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	5	04/09/18 15:02	04/09/18 15:02	JER
Wet Chemistry by Method 4500CN E-2011	WG1094972	1	04/06/18 22:07	04/09/18 15:36	KK
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 05:47	04/06/18 05:47	MAJ

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-58 L983365-14 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 16:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 06:02	04/06/18 06:02	MAJ
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 19:07	EL
Mercury by Method 7470A	WG1094326	1	04/06/18 08:56	04/08/18 19:39	EL
Metals (ICP) by Method 6010B	WG1094248	1	04/06/18 09:52	04/08/18 21:10	ST
Metals (ICP) by Method 6010B	WG1096390	1	04/11/18 09:30	04/11/18 16:05	ST
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:08	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:31	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 15:00	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	50	04/06/18 05:28	04/06/18 05:28	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 22:54	LM

KWB-13 L983365-15 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 15:45	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095030	1	04/10/18 15:57	04/10/18 16:17	MMF
Wet Chemistry by Method 353.2	WG1094863	5	04/09/18 15:03	04/09/18 15:03	JER
Wet Chemistry by Method 4500CN E-2011	WG1094972	1	04/06/18 22:07	04/09/18 15:38	KK
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 06:18	04/06/18 06:18	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 06:33	04/06/18 06:33	MAJ
Wet Chemistry by Method 9056A	WG1094922	50	04/07/18 21:50	04/07/18 21:50	DR
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 19:10	EL
Mercury by Method 7470A	WG1094326	1	04/06/18 08:56	04/08/18 19:41	EL
Metals (ICP) by Method 6010B	WG1094248	1	04/06/18 09:52	04/08/18 21:13	ST
Metals (ICP) by Method 6010B	WG1094698	1	04/10/18 06:38	04/10/18 10:17	CCE
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:12	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:44	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 15:14	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 05:49	04/06/18 05:49	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 23:11	LM

MW-103 L983365-16 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094863	20	04/09/18 15:08	04/09/18 15:08	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 06:49	04/06/18 06:49	MAJ
Wet Chemistry by Method 9056A	WG1094255	100	04/06/18 07:04	04/06/18 07:04	MAJ
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:16	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:48	WBD
Metals (ICPMS) by Method 6020	WG1094253	10	04/05/18 17:52	04/07/18 15:18	WBD
Metals (ICPMS) by Method 6020	WG1094253	10	04/05/18 17:52	04/08/18 15:09	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 17:57	04/06/18 17:57	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 06:10	04/06/18 06:10	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	50	04/11/18 21:32	04/11/18 21:32	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 23:27	LM

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-104 L983365-17 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 12:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094863	20	04/09/18 15:09	04/09/18 15:09	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 07:19	04/06/18 07:19	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 08:06	04/06/18 08:06	MAJ
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:28	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:52	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 15:22	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 18:19	04/06/18 18:19	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	1	04/06/18 06:31	04/06/18 06:31	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/09/18 23:44	LM

MW-64 L983365-18 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:55	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094863	50	04/09/18 15:10	04/09/18 15:10	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 08:21	04/06/18 08:21	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 08:37	04/06/18 08:37	MAJ
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:31	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 21:57	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 15:27	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	20	04/06/18 18:41	04/06/18 18:41	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	20	04/06/18 06:51	04/06/18 06:51	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/10/18 00:01	LM

MW-65 L983365-19 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 14:50	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094863	5	04/09/18 15:11	04/09/18 15:11	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 08:52	04/06/18 08:52	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 09:07	04/06/18 09:07	MAJ
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:35	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 22:01	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 15:31	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	5	04/06/18 19:03	04/06/18 19:03	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	100	04/06/18 07:12	04/06/18 07:12	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/10/18 00:17	LM

MW-102 L983365-20 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 15:55	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094863	50	04/09/18 15:14	04/09/18 15:14	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 09:23	04/06/18 09:23	MAJ
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 09:38	04/06/18 09:38	MAJ
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:39	JPD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/06/18 22:05	WBD
Metals (ICPMS) by Method 6020	WG1094253	1	04/05/18 17:52	04/07/18 15:36	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	100	04/06/18 19:25	04/06/18 19:25	BMB

MW-102 L983365-20 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 15:55	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094443	500	04/06/18 07:33	04/06/18 07:33	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	10	04/06/18 23:45	04/13/18 06:34	LM

MW-98 L983365-21 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:20	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094866	100	04/09/18 15:43	04/09/18 15:43	JER
Wet Chemistry by Method 9056A	WG1094255	2	04/06/18 09:54	04/06/18 09:54	MAJ
Wet Chemistry by Method 9056A	WG1094922	20	04/07/18 22:03	04/07/18 22:03	DR
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:43	JPD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:17	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:33	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	100	04/06/18 19:47	04/06/18 19:47	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	50	04/05/18 23:05	04/05/18 23:05	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/10/18 00:54	LM

MW-106 L983365-22 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 14:15	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094866	100	04/09/18 15:44	04/09/18 15:44	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 11:26	04/06/18 11:26	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 11:42	04/06/18 11:42	MAJ
Wet Chemistry by Method 9056A	WG1094922	20	04/07/18 22:15	04/07/18 22:15	DR
Metals (ICPMS) by Method 6020	WG1094249	1	04/09/18 10:13	04/12/18 03:47	JPD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:21	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:37	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	100	04/06/18 20:10	04/06/18 20:10	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	200	04/10/18 21:09	04/10/18 21:09	JHH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/10/18 23:21	TH

MW-50 L983365-23 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 11:55	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094866	5	04/09/18 15:45	04/09/18 15:45	JER
Wet Chemistry by Method 9056A	WG1094255	1	04/06/18 11:57	04/06/18 11:57	MAJ
Wet Chemistry by Method 9056A	WG1094255	10	04/06/18 12:28	04/06/18 12:28	MAJ
Wet Chemistry by Method 9056A	WG1094922	50	04/07/18 22:52	04/07/18 22:52	DR
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 19:56	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:25	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:53	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	1	04/05/18 23:45	04/05/18 23:45	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094422	1	04/06/18 23:45	04/10/18 23:38	TH

RW-1 L983365-24 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:10	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094866	100	04/09/18 15:46	04/09/18 15:46	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 00:01	04/07/18 00:01	MAJ
Wet Chemistry by Method 9056A	WG1094674	10	04/07/18 00:13	04/07/18 00:13	MAJ
Wet Chemistry by Method 9056A	WG1097077	20	04/12/18 13:09	04/12/18 13:09	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 20:00	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:29	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 14:57	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 20:32	04/06/18 20:32	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	1	04/06/18 00:04	04/06/18 00:04	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	50	04/10/18 21:28	04/10/18 21:28	JHH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 07:11	TH

MW-91 L983365-25 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:55	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095031	1	04/10/18 15:50	04/10/18 16:08	EG
Wet Chemistry by Method 353.2	WG1094866	100	04/09/18 15:47	04/09/18 15:47	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 00:26	04/07/18 00:26	MAJ
Wet Chemistry by Method 9056A	WG1094674	10	04/07/18 00:38	04/07/18 00:38	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 20:04	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:33	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 15:01	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	100	04/06/18 20:54	04/06/18 20:54	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	100	04/06/18 00:24	04/06/18 00:24	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	100	04/10/18 21:47	04/10/18 21:47	JHH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 07:31	TH

MW-90 L983365-26 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 14:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1094866	10	04/09/18 15:48	04/09/18 15:48	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 00:51	04/07/18 00:51	MAJ
Wet Chemistry by Method 9056A	WG1094674	20	04/07/18 01:28	04/07/18 01:28	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 20:08	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:51	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 15:05	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 21:16	04/06/18 21:16	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	1	04/06/18 00:44	04/06/18 00:44	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	1	04/11/18 21:01	04/11/18 21:01	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 07:51	TH

MW-96 L983365-27 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 15:15	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1094866	100	04/09/18 15:54	04/09/18 15:54	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 01:40	04/07/18 01:40	MAJ
Wet Chemistry by Method 9056A	WG1094674	10	04/07/18 01:53	04/07/18 01:53	MAJ

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 15:15	04/05/18 08:45

MW-96 L983365-27 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 20:12	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:55	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 15:09	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	100	04/06/18 21:38	04/06/18 21:38	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	1000	04/10/18 22:24	04/10/18 22:24	JHH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	50	04/06/18 01:04	04/06/18 01:04	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 08:11	TH

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 16:20	04/05/18 08:45

MW-67 L983365-28 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1094866	10	04/09/18 15:55	04/09/18 15:55	JER
Wet Chemistry by Method 4500CN E-2011	WG1094972	100	04/06/18 22:07	04/09/18 15:39	KK
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 02:05	04/07/18 02:05	MAJ
Wet Chemistry by Method 9056A	WG1094674	10	04/07/18 02:17	04/07/18 02:17	MAJ
Mercury by Method 7470A	WG1094325	1	04/06/18 08:53	04/08/18 19:12	EL
Mercury by Method 7470A	WG1094326	1	04/06/18 08:56	04/08/18 19:44	EL
Metals (ICP) by Method 6010B	WG1094248	1	04/06/18 09:52	04/08/18 21:16	ST
Metals (ICP) by Method 6010B	WG1094698	1	04/10/18 06:38	04/10/18 10:21	CCE
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 20:16	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/11/18 23:59	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 15:13	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094444	1	04/06/18 22:00	04/06/18 22:00	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	5	04/11/18 21:21	04/11/18 21:21	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 08:31	TH

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 18:45	04/05/18 08:45

RW-#17A L983365-29 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1094866	1	04/09/18 15:56	04/09/18 15:56	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 02:30	04/07/18 02:30	MAJ
Wet Chemistry by Method 9056A	WG1094674	20	04/07/18 02:42	04/07/18 02:42	MAJ
Wet Chemistry by Method 9056A	WG1095383	50	04/10/18 01:35	04/10/18 01:35	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 20:20	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/12/18 00:03	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 15:17	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094454	1	04/06/18 11:07	04/06/18 11:07	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	1	04/06/18 01:44	04/06/18 01:44	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 08:52	TH

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:00	04/05/18 08:45

DUP-REST-02 L983365-30 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1094866	5	04/09/18 15:57	04/09/18 15:57	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 02:55	04/07/18 02:55	MAJ
Wet Chemistry by Method 9056A	WG1094674	10	04/07/18 03:07	04/07/18 03:07	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 20:24	LD

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:00	04/05/18 08:45

DUP-REST-02 L983365-30 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/12/18 00:07	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 15:20	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094454	1	04/06/18 11:31	04/06/18 11:31	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	5	04/06/18 02:04	04/06/18 02:04	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 09:12	TH

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 12:20	04/05/18 08:45

EB-REST-02 L983365-31 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1094866	1	04/09/18 15:59	04/09/18 15:59	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 03:19	04/07/18 03:19	MAJ
Metals (ICPMS) by Method 6020	WG1094251	1	04/09/18 12:46	04/11/18 20:28	LD
Metals (ICPMS) by Method 6020	WG1094256	1	04/09/18 09:41	04/12/18 00:11	LD
Metals (ICPMS) by Method 6020	WG1096943	1	04/12/18 06:37	04/12/18 13:27	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094454	1	04/06/18 11:55	04/06/18 11:55	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094402	1	04/06/18 02:24	04/06/18 02:24	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094423	1	04/06/18 03:56	04/08/18 09:32	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Christopher J

Chris McCord
Technical Service Representative

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1340		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.878		0.0197	0.100	1	04/09/2018 14:42	WG1094863

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	62.9		0.0519	1.00	1	04/06/2018 09:03	WG1094250
Fluoride	0.408		0.00990	0.100	1	04/06/2018 09:03	WG1094250
Sulfate	783		0.774	50.0	10	04/06/2018 21:49	WG1094722

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Calcium	238	V	0.0460	1.00	1	04/06/2018 20:11	WG1094253
Potassium	1.98		0.0370	1.00	1	04/06/2018 20:11	WG1094253
Sodium	41.4		0.110	1.00	1	04/06/2018 20:11	WG1094253

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 00:57	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 00:57	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 00:57	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 00:57	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 00:57	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 00:57	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 00:57	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 00:57	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 00:57	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 00:57	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 00:57	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 00:57	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 00:57	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 00:57	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 00:57	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 00:57	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 00:57	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 00:57	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 00:57	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 00:57	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 00:57	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 00:57	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 00:57	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 00:57	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 00:57	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 00:57	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 00:57	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 00:57	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 00:57	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 00:57	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 00:57	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 00:57	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 00:57	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 00:57	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 00:57	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 00:57	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 00:57	WG1094443
Toluene	U		0.000412	0.00100	1	04/06/2018 00:57	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 00:57	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 00:57	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 00:57	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 00:57	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 00:57	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 00:57	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 00:57	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 00:57	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 00:57	WG1094443
(S) Toluene-d8	*110*			*80.0-120*		*04/06/2018 00:57*	WG1094443
(S) Dibromofluoromethane	*88.9*			*76.0-123*		*04/06/2018 00:57*	WG1094443
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/06/2018 00:57*	WG1094443

SAMPLE RESULTS - 02

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2070		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/09/2018 14:44	WG1094863

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	131		0.519	10.0	10	04/06/2018 09:28	WG1094250
Fluoride	0.354		0.00990	0.100	1	04/06/2018 09:15	WG1094250
Sulfate	1290		1.55	100	20	04/06/2018 22:04	WG1094722

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Calcium	379		0.0460	1.00	1	04/06/2018 20:28	WG1094253
Potassium	2.22		0.0370	1.00	1	04/06/2018 20:28	WG1094253
Sodium	97.9		0.110	1.00	1	04/06/2018 20:28	WG1094253

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 01:18	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 01:18	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 01:18	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 01:18	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 01:18	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 01:18	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 01:18	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 01:18	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 01:18	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 01:18	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 01:18	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 01:18	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 01:18	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 01:18	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 01:18	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 01:18	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 01:18	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 01:18	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 01:18	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 01:18	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 01:18	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 01:18	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 01:18	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 01:18	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 01:18	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 01:18	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 01:18	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 01:18	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 01:18	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 01:18	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	0.00693		0.000367	0.00100	1	04/06/2018 01:18	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 01:18	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 01:18	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 01:18	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 01:18	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 01:18	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 01:18	WG1094443
Toluene	U		0.000412	0.00100	1	04/06/2018 01:18	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 01:18	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 01:18	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 01:18	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 01:18	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 01:18	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 01:18	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 01:18	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 01:18	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 01:18	WG1094443
(S) Toluene-d8	*109*			*80.0-120*		*04/06/2018 01:18*	WG1094443
(S) Dibromofluoromethane	*87.4*			*76.0-123*		*04/06/2018 01:18*	WG1094443
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/06/2018 01:18*	WG1094443

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5020		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	32.8		0.492	2.50	25	04/09/2018 15:17	WG1094863

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	765		1.04	20.0	20	04/06/2018 09:52	WG1094250
Fluoride	1.09		0.00990	0.100	1	04/06/2018 09:40	WG1094250
Sulfate	2530		3.87	250	50	04/06/2018 22:20	WG1094722

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00348		0.000250	0.00200	1	04/06/2018 20:33	WG1094253
Arsenic,Dissolved	0.00335		0.000250	0.00200	1	04/12/2018 02:05	WG1094249
Barium	0.0186		0.000360	0.00500	1	04/06/2018 20:33	WG1094253
Barium,Dissolved	0.00908		0.000360	0.00500	1	04/12/2018 02:05	WG1094249
Calcium	493		0.0460	1.00	1	04/06/2018 20:33	WG1094253
Chromium	0.00386	B	0.000540	0.00200	1	04/06/2018 20:33	WG1094253
Chromium,Dissolved	0.00103	J	0.000540	0.00200	1	04/12/2018 02:05	WG1094249
Iron	0.205	B	0.0150	0.100	1	04/06/2018 20:33	WG1094253
Iron,Dissolved	0.0191	B J	0.0150	0.100	1	04/12/2018 02:05	WG1094249
Lead	0.000510	J	0.000240	0.00200	1	04/07/2018 14:03	WG1094253
Lead,Dissolved	0.000295	J	0.000240	0.00200	1	04/12/2018 02:05	WG1094249
Manganese	0.0114		0.000250	0.00500	1	04/06/2018 20:33	WG1094253
Manganese,Dissolved	0.00153	J	0.000250	0.00500	1	04/12/2018 02:05	WG1094249
Potassium	0.904	J	0.0370	1.00	1	04/06/2018 20:33	WG1094253
Selenium	0.0254		0.000380	0.00200	1	04/06/2018 20:33	WG1094253
Selenium,Dissolved	0.0275		0.000380	0.00200	1	04/12/2018 02:05	WG1094249
Sodium	599		0.110	1.00	1	04/06/2018 20:33	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/06/2018 14:07	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.9*			*77.0-122*		*04/06/2018 14:07*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 01:39	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 01:39	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 01:39	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 01:39	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 01:39	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 01:39	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 01:39	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 01:39	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 01:39	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 01:39	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 01:39	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 01:39	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 01:39	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 01:39	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 01:39	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 01:39	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 01:39	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 01:39	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 01:39	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 01:39	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 01:39	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 01:39	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 01:39	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 01:39	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 01:39	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 01:39	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 01:39	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 01:39	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 01:39	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 01:39	WG1094443
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 01:39	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 01:39	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 01:39	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 01:39	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 01:39	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 01:39	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 01:39	WG1094443
Toluene	U		0.000412	0.00100	1	04/06/2018 01:39	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 01:39	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 01:39	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 01:39	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 01:39	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 01:39	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 01:39	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 01:39	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 01:39	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 01:39	WG1094443
(S) Toluene-d8	*109*			*80.0-120*		*04/06/2018 01:39*	WG1094443
(S) Dibromofluoromethane	*88.7*			*76.0-123*		*04/06/2018 01:39*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 01:39*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0408	J	0.0247	0.100	1	04/09/2018 20:08	WG1094422
(S) o-Terphenyl	*97.6*			*31.0-160*		*04/09/2018 20:08*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3570		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	4.51		0.0197	0.100	1	04/09/2018 14:47	WG1094863

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 15:30	WG1094972

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	849		1.04	20.0	20	04/05/2018 23:50	WG1094255
Fluoride	0.567		0.00990	0.100	1	04/05/2018 23:35	WG1094255
Sulfate	1060		1.55	100	20	04/05/2018 23:50	WG1094255

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/08/2018 18:58	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/08/2018 19:32	WG1094326

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.460		0.0126	0.200	1	04/08/2018 20:53	WG1094248
Boron,Dissolved	0.473		0.0126	0.200	1	04/10/2018 09:55	WG1094698

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0112		0.000250	0.00200	1	04/06/2018 20:40	WG1094253
Arsenic,Dissolved	0.00547		0.000250	0.00200	1	04/12/2018 02:21	WG1094249
Barium	0.0210		0.000360	0.00500	1	04/06/2018 20:40	WG1094253
Barium,Dissolved	0.0231		0.000360	0.00500	1	04/12/2018 02:21	WG1094249
Cadmium	U		0.000160	0.00100	1	04/06/2018 20:40	WG1094253
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 02:21	WG1094249
Calcium	461		0.0460	1.00	1	04/06/2018 20:40	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 20:40	WG1094253
Chromium,Dissolved	0.000575	J	0.000540	0.00200	1	04/12/2018 02:21	WG1094249
Cobalt	0.00532		0.000260	0.00200	1	04/06/2018 20:40	WG1094253
Cobalt,Dissolved	0.00616		0.000260	0.00200	1	04/12/2018 02:21	WG1094249
Iron	0.595		0.0150	0.100	1	04/06/2018 20:40	WG1094253
Iron,Dissolved	0.315		0.0150	0.100	1	04/12/2018 02:21	WG1094249
Lead	0.00131	J	0.000240	0.00200	1	04/07/2018 14:08	WG1094253
Lead,Dissolved	0.00129	J	0.000240	0.00200	1	04/12/2018 02:21	WG1094249
Manganese	0.413		0.000250	0.00500	1	04/06/2018 20:40	WG1094253
Manganese,Dissolved	0.423		0.000250	0.00500	1	04/12/2018 02:21	WG1094249
Nickel	0.00463		0.000350	0.00200	1	04/06/2018 20:40	WG1094253
Nickel,Dissolved	0.00639		0.000350	0.00200	1	04/12/2018 02:21	WG1094249

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	0.856	J	0.0370	1.00	1	04/06/2018 20:40	WG1094253
Selenium	0.00246		0.000380	0.00200	1	04/06/2018 20:40	WG1094253
Selenium,Dissolved	0.00257		0.000380	0.00200	1	04/12/2018 02:21	WG1094249
Sodium	335		0.110	1.00	1	04/06/2018 20:40	WG1094253
Uranium	0.0140		0.000330	0.0100	1	04/07/2018 14:08	WG1094253
Uranium,Dissolved	0.0159		0.000330	0.0100	1	04/12/2018 02:21	WG1094249
Vanadium	0.00760		0.000180	0.00500	1	04/06/2018 20:40	WG1094253
Vanadium,Dissolved	0.00659		0.000180	0.00500	1	04/12/2018 02:21	WG1094249

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.287		0.0314	0.100	1	04/06/2018 14:29	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*98.0*			*77.0-122*		*04/06/2018 14:29*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 02:00	WG1094443
Benzene	0.000985	J	0.000331	0.00100	1	04/06/2018 02:00	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 02:00	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 02:00	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 02:00	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 02:00	WG1094443
sec-Butylbenzene	0.00328		0.000365	0.00100	1	04/06/2018 02:00	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 02:00	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 02:00	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 02:00	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 02:00	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 02:00	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 02:00	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 02:00	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 02:00	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 02:00	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 02:00	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 02:00	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 02:00	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 02:00	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 02:00	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 02:00	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 02:00	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 02:00	WG1094443
Isopropylbenzene	0.000355	J	0.000326	0.00100	1	04/06/2018 02:00	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 02:00	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 02:00	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 02:00	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 02:00	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 02:00	WG1094443
Methyl tert-butyl ether	0.00341		0.000367	0.00100	1	04/06/2018 02:00	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 02:00	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 02:00	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 02:00	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 02:00	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 02:00	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 02:00	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	04/06/2018 02:00	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 02:00	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 02:00	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 02:00	WG1094443
1,2,4-Trimethylbenzene	0.00290		0.000373	0.00100	1	04/06/2018 02:00	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 02:00	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 02:00	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 02:00	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 02:00	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 02:00	WG1094443
(S) Toluene-d8	*108*			*80.0-120*		*04/06/2018 02:00*	WG1094443
(S) Dibromofluoromethane	*88.8*			*76.0-123*		*04/06/2018 02:00*	WG1094443
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/06/2018 02:00*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.398		0.0247	0.100	1	04/09/2018 20:24	WG1094422
(S) o-Terphenyl	*109*			*31.0-160*		*04/09/2018 20:24*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2650		2.82	10.0	1	04/10/2018 19:06	WG1095029

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	3.32		0.0197	0.100	1	04/09/2018 14:48	WG1094863

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/09/2018 15:31	WG1094972

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	300		0.519	10.0	10	04/06/2018 00:21	WG1094255
Fluoride	0.418		0.00990	0.100	1	04/06/2018 00:06	WG1094255
Sulfate	1580		1.55	100	20	04/07/2018 20:36	WG1094922

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	0.0000648	B J	0.0000490	0.000200	1	04/08/2018 19:00	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/08/2018 19:25	WG1094326

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.131	J	0.0126	0.200	1	04/08/2018 20:56	WG1094248
Boron,Dissolved	0.171	J	0.0126	0.200	1	04/10/2018 09:59	WG1094698

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00154	J	0.000250	0.00200	1	04/06/2018 20:53	WG1094253
Arsenic,Dissolved	0.00145	J	0.000250	0.00200	1	04/12/2018 02:25	WG1094249
Barium	0.0130		0.000360	0.00500	1	04/06/2018 20:53	WG1094253
Barium,Dissolved	0.0131		0.000360	0.00500	1	04/12/2018 02:25	WG1094249
Cadmium	U		0.000160	0.00100	1	04/06/2018 20:53	WG1094253
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 02:25	WG1094249
Calcium	497		0.0460	1.00	1	04/06/2018 20:53	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 20:53	WG1094253
Chromium,Dissolved	0.0320		0.000540	0.00200	1	04/12/2018 02:25	WG1094249
Cobalt	U		0.000260	0.00200	1	04/06/2018 20:53	WG1094253
Cobalt,Dissolved	0.000364	J	0.000260	0.00200	1	04/12/2018 02:25	WG1094249
Iron	U		0.0150	0.100	1	04/06/2018 20:53	WG1094253
Iron,Dissolved	0.137	B	0.0150	0.100	1	04/12/2018 02:25	WG1094249
Lead	U		0.000240	0.00200	1	04/07/2018 14:21	WG1094253
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 02:25	WG1094249
Manganese	0.000543	J	0.000250	0.00500	1	04/06/2018 20:53	WG1094253
Manganese,Dissolved	0.00464	J	0.000250	0.00500	1	04/12/2018 02:25	WG1094249
Nickel	U		0.000350	0.00200	1	04/06/2018 20:53	WG1094253
Nickel,Dissolved	0.0157		0.000350	0.00200	1	04/12/2018 02:25	WG1094249

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Potassium	2.21		0.0370	1.00	1	04/06/2018 20:53	WG1094253
Selenium	0.0107		0.000380	0.00200	1	04/06/2018 20:53	WG1094253
Selenium,Dissolved	0.0108		0.000380	0.00200	1	04/12/2018 02:25	WG1094249
Sodium	91.8		0.110	1.00	1	04/06/2018 20:53	WG1094253
Uranium	0.0111		0.000330	0.0100	1	04/07/2018 14:21	WG1094253
Uranium,Dissolved	0.0125		0.000330	0.0100	1	04/12/2018 02:25	WG1094249
Vanadium	0.00826		0.000180	0.00500	1	04/06/2018 20:53	WG1094253
Vanadium,Dissolved	0.00884		0.000180	0.00500	1	04/12/2018 02:25	WG1094249

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/06/2018 14:51	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.7*			*77.0-122*		*04/06/2018 14:51*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 02:21	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 02:21	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 02:21	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 02:21	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 02:21	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 02:21	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 02:21	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 02:21	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 02:21	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 02:21	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 02:21	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 02:21	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 02:21	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 02:21	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 02:21	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 02:21	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 02:21	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 02:21	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 02:21	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 02:21	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 02:21	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 02:21	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 02:21	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 02:21	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 02:21	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 02:21	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 02:21	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 02:21	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 02:21	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 02:21	WG1094443
Methyl tert-butyl ether	0.000498	J	0.000367	0.00100	1	04/06/2018 02:21	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 02:21	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 02:21	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 02:21	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 02:21	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 02:21	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 02:21	WG1094443

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

KWB-11B

Collected date/time: 04/03/18 10:25

SAMPLE RESULTS - 05

L983365

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	04/06/2018 02:21	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 02:21	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 02:21	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 02:21	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 02:21	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 02:21	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 02:21	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 02:21	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 02:21	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 02:21	WG1094443
(S) Toluene-d8	*108*			*80.0-120*		*04/06/2018 02:21*	WG1094443
(S) Dibromofluoromethane	*89.4*			*76.0-123*		*04/06/2018 02:21*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 02:21*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0406	J	0.0247	0.100	1	04/09/2018 20:41	WG1094422
(S) o-Terphenyl	*100*			*31.0-160*		*04/09/2018 20:41*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4270		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	10.3		0.0985	0.500	5	04/09/2018 14:54	WG1094863

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/09/2018 15:34	WG1094972

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	352		0.519	10.0	10	04/06/2018 00:52	WG1094255
Fluoride	1.61		0.00990	0.100	1	04/06/2018 00:37	WG1094255
Sulfate	2640		3.87	250	50	04/07/2018 20:48	WG1094922

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	0.0000593	B J	0.0000490	0.000200	1	04/08/2018 19:03	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/08/2018 19:35	WG1094326

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.657		0.0126	0.200	1	04/08/2018 20:59	WG1094248
Boron,Dissolved	0.681		0.0126	0.200	1	04/10/2018 10:03	WG1094698

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00245		0.000250	0.00200	1	04/06/2018 20:57	WG1094253
Arsenic,Dissolved	0.00258		0.000250	0.00200	1	04/12/2018 02:29	WG1094249
Barium	0.0104		0.000360	0.00500	1	04/06/2018 20:57	WG1094253
Barium,Dissolved	0.0103		0.000360	0.00500	1	04/12/2018 02:29	WG1094249
Cadmium	U		0.000160	0.00100	1	04/06/2018 20:57	WG1094253
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 02:29	WG1094249
Calcium	666		0.0460	1.00	1	04/06/2018 20:57	WG1094253
Chromium	0.00403	B	0.000540	0.00200	1	04/06/2018 20:57	WG1094253
Chromium,Dissolved	0.000582	J	0.000540	0.00200	1	04/12/2018 02:29	WG1094249
Cobalt	U		0.000260	0.00200	1	04/06/2018 20:57	WG1094253
Cobalt,Dissolved	U		0.000260	0.00200	1	04/12/2018 02:29	WG1094249
Iron	0.0368	B J	0.0150	0.100	1	04/06/2018 20:57	WG1094253
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 02:29	WG1094249
Lead	U		0.000240	0.00200	1	04/07/2018 14:25	WG1094253
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 02:29	WG1094249
Manganese	0.00375	J	0.000250	0.00500	1	04/06/2018 20:57	WG1094253
Manganese,Dissolved	0.00578		0.000250	0.00500	1	04/12/2018 02:29	WG1094249
Nickel	0.00193	J	0.000350	0.00200	1	04/06/2018 20:57	WG1094253
Nickel,Dissolved	0.00356		0.000350	0.00200	1	04/12/2018 02:29	WG1094249

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	2.74		0.0370	1.00	1	04/06/2018 20:57	WG1094253
Selenium	0.00759		0.000380	0.00200	1	04/06/2018 20:57	WG1094253
Selenium,Dissolved	0.00755		0.000380	0.00200	1	04/12/2018 02:29	WG1094249
Sodium	147		0.110	1.00	1	04/06/2018 20:57	WG1094253
Uranium	0.0675		0.000330	0.0100	1	04/07/2018 14:25	WG1094253
Uranium,Dissolved	0.0769		0.000330	0.0100	1	04/12/2018 02:29	WG1094249
Vanadium	0.0163		0.000180	0.00500	1	04/06/2018 20:57	WG1094253
Vanadium,Dissolved	0.0176		0.000180	0.00500	1	04/12/2018 02:29	WG1094249

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/06/2018 15:13	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.4*			*77.0-122*		*04/06/2018 15:13*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 02:41	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 02:41	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 02:41	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 02:41	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 02:41	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 02:41	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 02:41	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 02:41	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 02:41	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 02:41	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 02:41	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 02:41	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 02:41	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 02:41	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 02:41	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 02:41	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 02:41	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 02:41	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 02:41	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 02:41	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 02:41	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 02:41	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 02:41	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 02:41	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 02:41	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 02:41	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 02:41	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 02:41	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 02:41	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 02:41	WG1094443
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 02:41	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 02:41	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 02:41	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 02:41	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 02:41	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 02:41	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 02:41	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	04/06/2018 02:41	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 02:41	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 02:41	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 02:41	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 02:41	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 02:41	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 02:41	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 02:41	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 02:41	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 02:41	WG1094443
(S) Toluene-d8	*109*			*80.0-120*		*04/06/2018 02:41*	WG1094443
(S) Dibromofluoromethane	*88.5*			*76.0-123*		*04/06/2018 02:41*	WG1094443
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/06/2018 02:41*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0596	J	0.0247	0.100	1	04/09/2018 20:58	WG1094422
(S) o-Terphenyl	*103*			*31.0-160*		*04/09/2018 20:58*	WG1094422

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3350		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/09/2018 14:55	WG1094863

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	245		0.519	10.0	10	04/06/2018 01:56	WG1094255
Fluoride	0.881		0.00990	0.100	1	04/06/2018 01:08	WG1094255
Sulfate	1780		1.55	100	20	04/07/2018 21:01	WG1094922

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00200	J	0.000250	0.00200	1	04/06/2018 21:01	WG1094253
Arsenic,Dissolved	0.00225		0.000250	0.00200	1	04/12/2018 02:41	WG1094249
Barium	0.0170		0.000360	0.00500	1	04/06/2018 21:01	WG1094253
Barium,Dissolved	0.0177		0.000360	0.00500	1	04/12/2018 02:41	WG1094249
Calcium	383		0.0460	1.00	1	04/06/2018 21:01	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 21:01	WG1094253
Chromium,Dissolved	0.00329		0.000540	0.00200	1	04/12/2018 02:41	WG1094249
Iron	0.653		0.0150	0.100	1	04/06/2018 21:01	WG1094253
Iron,Dissolved	0.709		0.0150	0.100	1	04/12/2018 02:41	WG1094249
Lead	0.000242	J	0.000240	0.00200	1	04/07/2018 14:30	WG1094253
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 02:41	WG1094249
Manganese	0.851		0.000250	0.00500	1	04/06/2018 21:01	WG1094253
Manganese,Dissolved	0.930		0.000250	0.00500	1	04/12/2018 02:41	WG1094249
Potassium	0.548	J	0.0370	1.00	1	04/06/2018 21:01	WG1094253
Selenium	U		0.000380	0.00200	1	04/06/2018 21:01	WG1094253
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 02:41	WG1094249
Sodium	200		0.110	1.00	1	04/06/2018 21:01	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.0634	J	0.0314	0.100	1	04/06/2018 15:35	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.8*			*77.0-122*		*04/06/2018 15:35*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 03:02	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 03:02	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 03:02	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 03:02	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 03:02	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 03:02	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 03:02	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 03:02	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 03:02	WG1094443

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 03:02	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 03:02	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 03:02	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 03:02	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 03:02	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 03:02	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 03:02	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 03:02	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 03:02	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 03:02	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 03:02	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 03:02	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 03:02	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 03:02	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 03:02	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 03:02	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 03:02	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 03:02	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 03:02	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 03:02	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 03:02	WG1094443
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 03:02	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 03:02	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 03:02	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 03:02	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 03:02	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 03:02	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 03:02	WG1094443
Toluene	U		0.000412	0.00100	1	04/06/2018 03:02	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 03:02	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 03:02	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 03:02	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 03:02	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 03:02	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 03:02	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 03:02	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 03:02	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 03:02	WG1094443
(S) Toluene-d8	*108*			*80.0-120*		*04/06/2018 03:02*	WG1094443
(S) Dibromofluoromethane	*87.8*			*76.0-123*		*04/06/2018 03:02*	WG1094443
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/06/2018 03:02*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.390		0.0247	0.100	1	04/09/2018 21:14	WG1094422
(S) o-Terphenyl	*103*			*31.0-160*		*04/09/2018 21:14*	WG1094422

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3680		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.436		0.0197	0.100	1	04/09/2018 14:56	WG1094863

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	266		0.519	10.0	10	04/06/2018 02:27	WG1094255
Fluoride	0.764		0.00990	0.100	1	04/06/2018 02:11	WG1094255
Sulfate	2310		3.87	250	50	04/07/2018 21:13	WG1094922

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00339		0.000250	0.00200	1	04/06/2018 21:06	WG1094253
Arsenic,Dissolved	0.00363		0.000250	0.00200	1	04/12/2018 02:44	WG1094249
Barium	0.00918		0.000360	0.00500	1	04/06/2018 21:06	WG1094253
Barium,Dissolved	0.0107		0.000360	0.00500	1	04/12/2018 02:44	WG1094249
Calcium	534		0.0460	1.00	1	04/06/2018 21:06	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 21:06	WG1094253
Chromium,Dissolved	0.00124	J	0.000540	0.00200	1	04/12/2018 02:44	WG1094249
Iron	U		0.0150	0.100	1	04/06/2018 21:06	WG1094253
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 02:44	WG1094249
Lead	U		0.000240	0.00200	1	04/07/2018 14:34	WG1094253
Lead,Dissolved	0.000247	J	0.000240	0.00200	1	04/12/2018 02:44	WG1094249
Manganese	0.0516		0.000250	0.00500	1	04/06/2018 21:06	WG1094253
Manganese,Dissolved	0.0513		0.000250	0.00500	1	04/12/2018 02:44	WG1094249
Potassium	2.36		0.0370	1.00	1	04/06/2018 21:06	WG1094253
Selenium	0.00364		0.000380	0.00200	1	04/06/2018 21:06	WG1094253
Selenium,Dissolved	0.00349		0.000380	0.00200	1	04/12/2018 02:44	WG1094249
Sodium	202		0.110	1.00	1	04/06/2018 21:06	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/06/2018 16:51	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.6*			*77.0-122*		*04/06/2018 16:51*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 03:23	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 03:23	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 03:23	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 03:23	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 03:23	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 03:23	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 03:23	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 03:23	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 03:23	WG1094443

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Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 03:23	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 03:23	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 03:23	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 03:23	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 03:23	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 03:23	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 03:23	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 03:23	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 03:23	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 03:23	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 03:23	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 03:23	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 03:23	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 03:23	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 03:23	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 03:23	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 03:23	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 03:23	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 03:23	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 03:23	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 03:23	WG1094443
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 03:23	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 03:23	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 03:23	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 03:23	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 03:23	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 03:23	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 03:23	WG1094443
Toluene	U		0.000412	0.00100	1	04/06/2018 03:23	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 03:23	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 03:23	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 03:23	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 03:23	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 03:23	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 03:23	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 03:23	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 03:23	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 03:23	WG1094443
(S) Toluene-d8	*110*			*80.0-120*		*04/06/2018 03:23*	WG1094443
(S) Dibromofluoromethane	*88.1*			*76.0-123*		*04/06/2018 03:23*	WG1094443
(S) 4-Bromofluorobenzene	*102*			*80.0-120*		*04/06/2018 03:23*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.244		0.0247	0.100	1	04/09/2018 21:31	WG1094422
(S) o-Terphenyl	*105*			*31.0-160*		*04/09/2018 21:31*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2010		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0985	0.500	5	04/09/2018 14:57	WG1094863

Sample Narrative:

L983365-09 WG1094863: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	225		0.519	10.0	10	04/06/2018 02:57	WG1094255
Fluoride	0.997		0.00990	0.100	1	04/06/2018 02:42	WG1094255
Sulfate	677		0.774	50.0	10	04/06/2018 02:57	WG1094255

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00381		0.000250	0.00200	1	04/06/2018 21:10	WG1094253
Arsenic,Dissolved	0.00350		0.000250	0.00200	1	04/12/2018 02:48	WG1094249
Barium	0.0682		0.000360	0.00500	1	04/06/2018 21:10	WG1094253
Barium,Dissolved	0.0793		0.000360	0.00500	1	04/12/2018 02:48	WG1094249
Calcium	245		0.0460	1.00	1	04/06/2018 21:10	WG1094253
Chromium	0.00370	B	0.000540	0.00200	1	04/06/2018 21:10	WG1094253
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 02:48	WG1094249
Iron	0.144	B	0.0150	0.100	1	04/06/2018 21:10	WG1094253
Iron,Dissolved	0.0507	B J	0.0150	0.100	1	04/12/2018 02:48	WG1094249
Lead	U		0.000240	0.00200	1	04/07/2018 14:38	WG1094253
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 02:48	WG1094249
Manganese	0.106		0.000250	0.00500	1	04/06/2018 21:10	WG1094253
Manganese,Dissolved	0.108		0.000250	0.00500	1	04/12/2018 02:48	WG1094249
Potassium	0.279	J	0.0370	1.00	1	04/06/2018 21:10	WG1094253
Selenium	U		0.000380	0.00200	1	04/06/2018 21:10	WG1094253
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 02:48	WG1094249
Sodium	148		0.110	1.00	1	04/06/2018 21:10	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	5.15		0.0314	0.100	1	04/06/2018 17:13	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*101*			*77.0-122*		*04/06/2018 17:13*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.200	1.00	20	04/06/2018 03:44	WG1094443
Benzene	1.18		0.00662	0.0200	20	04/06/2018 03:44	WG1094443
Bromodichloromethane	U		0.00760	0.0200	20	04/06/2018 03:44	WG1094443
Bromoform	U		0.00938	0.0200	20	04/06/2018 03:44	WG1094443
Bromomethane	U		0.0173	0.100	20	04/06/2018 03:44	WG1094443
n-Butylbenzene	U		0.00722	0.0200	20	04/06/2018 03:44	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	U		0.00730	0.0200	20	04/06/2018 03:44	WG1094443
Carbon disulfide	U		0.00550	0.0200	20	04/06/2018 03:44	WG1094443
Carbon tetrachloride	U		0.00758	0.0200	20	04/06/2018 03:44	WG1094443
Chlorobenzene	U		0.00696	0.0200	20	04/06/2018 03:44	WG1094443
Chlorodibromomethane	U		0.00654	0.0200	20	04/06/2018 03:44	WG1094443
Chloroethane	U		0.00906	0.100	20	04/06/2018 03:44	WG1094443
Chloroform	U		0.00648	0.100	20	04/06/2018 03:44	WG1094443
Chloromethane	U		0.00552	0.0500	20	04/06/2018 03:44	WG1094443
1,2-Dibromoethane	U		0.00762	0.0200	20	04/06/2018 03:44	WG1094443
1,1-Dichloroethane	U		0.00518	0.0200	20	04/06/2018 03:44	WG1094443
1,2-Dichloroethane	U		0.00722	0.0200	20	04/06/2018 03:44	WG1094443
1,1-Dichloroethene	U		0.00796	0.0200	20	04/06/2018 03:44	WG1094443
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	04/06/2018 03:44	WG1094443
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	04/06/2018 03:44	WG1094443
1,2-Dichloropropane	U		0.00612	0.0200	20	04/06/2018 03:44	WG1094443
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	04/06/2018 03:44	WG1094443
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	04/06/2018 03:44	WG1094443
Ethylbenzene	0.121		0.00768	0.0200	20	04/06/2018 03:44	WG1094443
Isopropylbenzene	0.0160	J	0.00652	0.0200	20	04/06/2018 03:44	WG1094443
p-Isopropyltoluene	U		0.00700	0.0200	20	04/06/2018 03:44	WG1094443
2-Butanone (MEK)	U		0.0786	0.200	20	04/06/2018 03:44	WG1094443
2-Hexanone	U		0.0764	0.200	20	04/06/2018 03:44	WG1094443
Methylene Chloride	U		0.0200	0.100	20	04/06/2018 03:44	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	04/06/2018 03:44	WG1094443
Methyl tert-butyl ether	0.623		0.00734	0.0200	20	04/06/2018 03:44	WG1094443
Naphthalene	U		0.0200	0.100	20	04/06/2018 03:44	WG1094443
n-Propylbenzene	0.0255		0.00698	0.0200	20	04/06/2018 03:44	WG1094443
Styrene	U		0.00614	0.0200	20	04/06/2018 03:44	WG1094443
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	04/06/2018 03:44	WG1094443
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	04/06/2018 03:44	WG1094443
Tetrachloroethene	U		0.00744	0.0200	20	04/06/2018 03:44	WG1094443
Toluene	0.0424		0.00824	0.0200	20	04/06/2018 03:44	WG1094443
1,1,1-Trichloroethane	U		0.00638	0.0200	20	04/06/2018 03:44	WG1094443
1,1,2-Trichloroethane	U		0.00766	0.0200	20	04/06/2018 03:44	WG1094443
Trichloroethene	U		0.00796	0.0200	20	04/06/2018 03:44	WG1094443
1,2,4-Trimethylbenzene	0.0375		0.00746	0.0200	20	04/06/2018 03:44	WG1094443
1,3,5-Trimethylbenzene	U		0.00774	0.0200	20	04/06/2018 03:44	WG1094443
Vinyl chloride	U		0.00518	0.0200	20	04/06/2018 03:44	WG1094443
o-Xylene	U		0.00682	0.0200	20	04/06/2018 03:44	WG1094443
m&p-Xylene	0.0654		0.0144	0.0400	20	04/06/2018 03:44	WG1094443
Xylenes, Total	0.0654		0.0212	0.0600	20	04/06/2018 03:44	WG1094443
(S) Toluene-d8	*107*			*80.0-120*		*04/06/2018 03:44*	WG1094443
(S) Dibromofluoromethane	*89.0*			*76.0-123*		*04/06/2018 03:44*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 03:44*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.06		0.0247	0.100	1	04/09/2018 21:48	WG1094422
(S) o-Terphenyl	*109*			*31.0-160*		*04/09/2018 21:48*	WG1094422

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1270		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/09/2018 14:58	WG1094863

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	282		0.519	10.0	10	04/06/2018 03:28	WG1094255
Fluoride	1.04		0.00990	0.100	1	04/06/2018 03:13	WG1094255
Sulfate	52.6		0.0774	5.00	1	04/06/2018 03:13	WG1094255

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0252		0.000250	0.00200	1	04/06/2018 21:14	WG1094253
Arsenic,Dissolved	0.0244		0.000250	0.00200	1	04/12/2018 02:52	WG1094249
Barium	0.516		0.000360	0.00500	1	04/06/2018 21:14	WG1094253
Barium,Dissolved	0.558		0.000360	0.00500	1	04/12/2018 02:52	WG1094249
Calcium	162		0.0460	1.00	1	04/06/2018 21:14	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 21:14	WG1094253
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 02:52	WG1094249
Iron	5.42		0.0150	0.100	1	04/06/2018 21:14	WG1094253
Iron,Dissolved	5.17		0.0150	0.100	1	04/12/2018 02:52	WG1094249
Lead	U		0.000240	0.00200	1	04/07/2018 14:43	WG1094253
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 02:52	WG1094249
Manganese	1.01		0.000250	0.00500	1	04/06/2018 21:14	WG1094253
Manganese,Dissolved	1.08		0.000250	0.00500	1	04/12/2018 02:52	WG1094249
Potassium	0.251	J	0.0370	1.00	1	04/06/2018 21:14	WG1094253
Selenium	U		0.000380	0.00200	1	04/06/2018 21:14	WG1094253
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 02:52	WG1094249
Sodium	201		0.110	1.00	1	04/06/2018 21:14	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	4.33		0.0314	0.100	1	04/06/2018 17:35	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.1*			*77.0-122*		*04/06/2018 17:35*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 04:05	WG1094443
Benzene	0.00731		0.000331	0.00100	1	04/06/2018 04:05	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 04:05	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 04:05	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 04:05	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 04:05	WG1094443
sec-Butylbenzene	0.000419	J	0.000365	0.00100	1	04/06/2018 04:05	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 04:05	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 04:05	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 04:05	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 04:05	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 04:05	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 04:05	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 04:05	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 04:05	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 04:05	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 04:05	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 04:05	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 04:05	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 04:05	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 04:05	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 04:05	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 04:05	WG1094443
Ethylbenzene	0.00130		0.000384	0.00100	1	04/06/2018 04:05	WG1094443
Isopropylbenzene	0.000687	J	0.000326	0.00100	1	04/06/2018 04:05	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 04:05	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 04:05	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 04:05	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 04:05	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 04:05	WG1094443
Methyl tert-butyl ether	5.40		0.0367	0.100	100	04/11/2018 20:52	WG1094443
Naphthalene	0.00124	J	0.00100	0.00500	1	04/06/2018 04:05	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 04:05	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 04:05	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 04:05	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 04:05	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 04:05	WG1094443
Toluene	0.000816	J	0.000412	0.00100	1	04/06/2018 04:05	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 04:05	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 04:05	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 04:05	WG1094443
1,2,4-Trimethylbenzene	0.000452	J	0.000373	0.00100	1	04/06/2018 04:05	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 04:05	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 04:05	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 04:05	WG1094443
m&p-Xylene	0.00125	J	0.000719	0.00200	1	04/06/2018 04:05	WG1094443
Xylenes, Total	0.00125	J	0.00106	0.00300	1	04/06/2018 04:05	WG1094443
(S) Toluene-d8	*96.5*			*80.0-120*		*04/11/2018 20:52*	WG1094443
(S) Toluene-d8	*106*			*80.0-120*		*04/06/2018 04:05*	WG1094443
(S) Dibromofluoromethane	*99.9*			*76.0-123*		*04/11/2018 20:52*	WG1094443
(S) Dibromofluoromethane	*87.2*			*76.0-123*		*04/06/2018 04:05*	WG1094443
(S) 4-Bromofluorobenzene	*102*			*80.0-120*		*04/06/2018 04:05*	WG1094443
(S) 4-Bromofluorobenzene	*99.0*			*80.0-120*		*04/11/2018 20:52*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.40		0.0247	0.100	1	04/09/2018 22:04	WG1094422
(S) o-Terphenyl	*102*			*31.0-160*		*04/09/2018 22:04*	WG1094422

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3940		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.408		0.0197	0.100	1	04/09/2018 14:59	WG1094863

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	206		0.519	10.0	10	04/06/2018 03:59	WG1094255
Fluoride	1.82		0.00990	0.100	1	04/06/2018 03:44	WG1094255
Sulfate	2750		3.87	250	50	04/07/2018 21:25	WG1094922

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00278		0.000250	0.00200	1	04/06/2018 21:18	WG1094253
Arsenic,Dissolved	0.00355		0.000250	0.00200	1	04/12/2018 02:56	WG1094249
Barium	0.0105		0.000360	0.00500	1	04/06/2018 21:18	WG1094253
Barium,Dissolved	0.0118		0.000360	0.00500	1	04/12/2018 02:56	WG1094249
Calcium	491		0.0460	1.00	1	04/06/2018 21:18	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 21:18	WG1094253
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 02:56	WG1094249
Iron	U		0.0150	0.100	1	04/06/2018 21:18	WG1094253
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 02:56	WG1094249
Lead	U		0.000240	0.00200	1	04/07/2018 14:47	WG1094253
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 02:56	WG1094249
Manganese	0.00299	J	0.000250	0.00500	1	04/06/2018 21:18	WG1094253
Manganese,Dissolved	0.00395	J	0.000250	0.00500	1	04/12/2018 02:56	WG1094249
Potassium	0.832	J	0.0370	1.00	1	04/06/2018 21:18	WG1094253
Selenium	0.00321		0.000380	0.00200	1	04/06/2018 21:18	WG1094253
Selenium,Dissolved	0.00389		0.000380	0.00200	1	04/12/2018 02:56	WG1094249
Sodium	132		0.110	1.00	1	04/06/2018 21:18	WG1094253

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 04:25	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 04:25	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 04:25	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 04:25	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 04:25	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 04:25	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 04:25	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 04:25	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 04:25	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 04:25	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 04:25	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 04:25	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 04:25	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 04:25	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 04:25	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 04:25	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 04:25	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 04:25	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 04:25	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 04:25	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 04:25	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 04:25	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 04:25	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 04:25	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 04:25	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 04:25	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 04:25	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 04:25	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 04:25	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 04:25	WG1094443
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/11/2018 21:12	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 04:25	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 04:25	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 04:25	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 04:25	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 04:25	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 04:25	WG1094443
Toluene	U		0.000412	0.00100	1	04/06/2018 04:25	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 04:25	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 04:25	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 04:25	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 04:25	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 04:25	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 04:25	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 04:25	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 04:25	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 04:25	WG1094443
(S) Toluene-d8	*97.2*			*80.0-120*		*04/11/2018 21:12*	WG1094443
(S) Toluene-d8	*110*			*80.0-120*		*04/06/2018 04:25*	WG1094443
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/11/2018 21:12*	WG1094443
(S) Dibromofluoromethane	*87.9*			*76.0-123*		*04/06/2018 04:25*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 04:25*	WG1094443
(S) 4-Bromofluorobenzene	*99.3*			*80.0-120*		*04/11/2018 21:12*	WG1094443

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4690		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.341		0.0197	0.100	1	04/09/2018 15:00	WG1094863

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 15:35	WG1094972

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	354		0.519	10.0	10	04/06/2018 05:01	WG1094255
Fluoride	1.21		0.00990	0.100	1	04/06/2018 04:14	WG1094255
Sulfate	2930		3.87	250	50	04/07/2018 21:38	WG1094922

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/08/2018 19:05	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/08/2018 19:37	WG1094326

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.759		0.0126	0.200	1	04/08/2018 21:07	WG1094248
Boron,Dissolved	0.783		0.0126	0.200	1	04/10/2018 10:13	WG1094698

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00344		0.000250	0.00200	1	04/06/2018 21:23	WG1094253
Arsenic,Dissolved	0.00373		0.000250	0.00200	1	04/12/2018 03:00	WG1094249
Barium	0.00777		0.000360	0.00500	1	04/06/2018 21:23	WG1094253
Barium,Dissolved	0.00914		0.000360	0.00500	1	04/12/2018 03:00	WG1094249
Cadmium	U		0.000160	0.00100	1	04/06/2018 21:23	WG1094253
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 03:00	WG1094249
Calcium	511		0.0460	1.00	1	04/06/2018 21:23	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 21:23	WG1094253
Chromium,Dissolved	0.00238		0.000540	0.00200	1	04/12/2018 03:00	WG1094249
Cobalt	0.00513		0.000260	0.00200	1	04/06/2018 21:23	WG1094253
Cobalt,Dissolved	0.00503		0.000260	0.00200	1	04/12/2018 03:00	WG1094249
Iron	U		0.0150	0.100	1	04/06/2018 21:23	WG1094253
Iron,Dissolved	0.0224	B J	0.0150	0.100	1	04/12/2018 03:00	WG1094249
Lead	0.000342	J	0.000240	0.00200	1	04/07/2018 14:52	WG1094253
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 03:00	WG1094249
Manganese	0.379		0.000250	0.00500	1	04/06/2018 21:23	WG1094253
Manganese,Dissolved	0.399		0.000250	0.00500	1	04/12/2018 03:00	WG1094249
Nickel	0.00815		0.000350	0.00200	1	04/06/2018 21:23	WG1094253
Nickel,Dissolved	0.00904		0.000350	0.00200	1	04/12/2018 03:00	WG1094249

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	1.00		0.0370	1.00	1	04/06/2018 21:23	WG1094253
Selenium	0.000859	J	0.000380	0.00200	1	04/06/2018 21:23	WG1094253
Selenium,Dissolved	0.000469	J	0.000380	0.00200	1	04/12/2018 03:00	WG1094249
Sodium	272		0.110	1.00	1	04/06/2018 21:23	WG1094253
Uranium	0.0197		0.000330	0.0100	1	04/07/2018 14:52	WG1094253
Uranium,Dissolved	0.0226		0.000330	0.0100	1	04/12/2018 03:00	WG1094249
Vanadium	0.0209		0.000180	0.00500	1	04/06/2018 21:23	WG1094253
Vanadium,Dissolved	0.0233		0.000180	0.00500	1	04/12/2018 03:00	WG1094249

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 04:46	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 04:46	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 04:46	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 04:46	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 04:46	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 04:46	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 04:46	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 04:46	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 04:46	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 04:46	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 04:46	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 04:46	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 04:46	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 04:46	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 04:46	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 04:46	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 04:46	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 04:46	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 04:46	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 04:46	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 04:46	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 04:46	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 04:46	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 04:46	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 04:46	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 04:46	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 04:46	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 04:46	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 04:46	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 04:46	WG1094443
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 04:46	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 04:46	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 04:46	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 04:46	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 04:46	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 04:46	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 04:46	WG1094443
Toluene	U		0.000412	0.00100	1	04/06/2018 04:46	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 04:46	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 04:46	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 04:46	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 04:46	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 04:46	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 04:46	WG1094443

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

KWB-1A

Collected date/time: 04/03/18 10:35

SAMPLE RESULTS - 12

L983365

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
o-Xylene	U		0.000341	0.00100	1	04/06/2018 04:46	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 04:46	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 04:46	WG1094443
(S) Toluene-d8	*108*			*80.0-120*		*04/06/2018 04:46*	WG1094443
(S) Dibromofluoromethane	*88.4*			*76.0-123*		*04/06/2018 04:46*	WG1094443
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/06/2018 04:46*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0900	J	0.0247	0.100	1	04/09/2018 22:21	WG1094422
(S) o-Terphenyl	*99.2*			*31.0-160*		*04/09/2018 22:21*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1060		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0250	J	0.0197	0.100	1	04/09/2018 15:01	WG1094863

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	183		0.519	10.0	10	04/06/2018 05:32	WG1094255
Fluoride	1.35		0.00990	0.100	1	04/06/2018 05:16	WG1094255
Sulfate	U		0.0774	5.00	1	04/06/2018 05:16	WG1094255

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0169		0.000250	0.00200	1	04/06/2018 21:27	WG1094253
Arsenic,Dissolved	0.0178		0.000250	0.00200	1	04/12/2018 03:04	WG1094249
Barium	3.91		0.000360	0.00500	1	04/06/2018 21:27	WG1094253
Barium,Dissolved	4.22		0.000360	0.00500	1	04/12/2018 03:04	WG1094249
Calcium	138		0.0460	1.00	1	04/06/2018 21:27	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 21:27	WG1094253
Chromium,Dissolved	0.00201		0.000540	0.00200	1	04/12/2018 03:04	WG1094249
Iron	4.57		0.0150	0.100	1	04/06/2018 21:27	WG1094253
Iron,Dissolved	4.73		0.0150	0.100	1	04/12/2018 03:04	WG1094249
Lead	0.00320		0.000240	0.00200	1	04/07/2018 14:56	WG1094253
Lead,Dissolved	0.00295		0.000240	0.00200	1	04/12/2018 03:04	WG1094249
Manganese	0.170		0.000250	0.00500	1	04/06/2018 21:27	WG1094253
Manganese,Dissolved	0.182		0.000250	0.00500	1	04/12/2018 03:04	WG1094249
Potassium	0.430	J	0.0370	1.00	1	04/06/2018 21:27	WG1094253
Selenium	U		0.000380	0.00200	1	04/06/2018 21:27	WG1094253
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 03:04	WG1094249
Sodium	122		0.110	1.00	1	04/06/2018 21:27	WG1094253

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		2.50	12.5	250	04/06/2018 05:07	WG1094443
Benzene	3.06		0.0828	0.250	250	04/06/2018 05:07	WG1094443
Bromodichloromethane	U		0.0950	0.250	250	04/06/2018 05:07	WG1094443
Bromoform	U		0.117	0.250	250	04/06/2018 05:07	WG1094443
Bromomethane	U		0.216	1.25	250	04/06/2018 05:07	WG1094443
n-Butylbenzene	U		0.0902	0.250	250	04/06/2018 05:07	WG1094443
sec-Butylbenzene	U		0.0912	0.250	250	04/06/2018 05:07	WG1094443
Carbon disulfide	U		0.0688	0.250	250	04/06/2018 05:07	WG1094443
Carbon tetrachloride	U		0.0948	0.250	250	04/06/2018 05:07	WG1094443
Chlorobenzene	U		0.0870	0.250	250	04/06/2018 05:07	WG1094443
Chlorodibromomethane	U		0.0818	0.250	250	04/06/2018 05:07	WG1094443
Chloroethane	U		0.113	1.25	250	04/06/2018 05:07	WG1094443
Chloroform	U		0.0810	1.25	250	04/06/2018 05:07	WG1094443
Chloromethane	U		0.0690	0.625	250	04/06/2018 05:07	WG1094443
1,2-Dibromoethane	U		0.0952	0.250	250	04/06/2018 05:07	WG1094443
1,1-Dichloroethane	U		0.0648	0.250	250	04/06/2018 05:07	WG1094443

KWB-10R

Collected date/time: 04/03/18 09:50

SAMPLE RESULTS - 13

L983365

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.0902	0.250	250	04/06/2018 05:07	WG1094443
1,1-Dichloroethene	U		0.0995	0.250	250	04/06/2018 05:07	WG1094443
cis-1,2-Dichloroethene	U		0.0650	0.250	250	04/06/2018 05:07	WG1094443
trans-1,2-Dichloroethene	U		0.0990	0.250	250	04/06/2018 05:07	WG1094443
1,2-Dichloropropane	U		0.0765	0.250	250	04/06/2018 05:07	WG1094443
cis-1,3-Dichloropropene	U		0.104	0.250	250	04/06/2018 05:07	WG1094443
trans-1,3-Dichloropropene	U		0.105	0.250	250	04/06/2018 05:07	WG1094443
Ethylbenzene	0.354		0.0960	0.250	250	04/06/2018 05:07	WG1094443
Isopropylbenzene	U		0.0815	0.250	250	04/06/2018 05:07	WG1094443
p-Isopropyltoluene	U		0.0875	0.250	250	04/06/2018 05:07	WG1094443
2-Butanone (MEK)	U		0.982	2.50	250	04/06/2018 05:07	WG1094443
2-Hexanone	U		0.955	2.50	250	04/06/2018 05:07	WG1094443
Methylene Chloride	U		0.250	1.25	250	04/06/2018 05:07	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.535	2.50	250	04/06/2018 05:07	WG1094443
Methyl tert-butyl ether	2.74		0.0918	0.250	250	04/06/2018 05:07	WG1094443
Naphthalene	U		0.250	1.25	250	04/06/2018 05:07	WG1094443
n-Propylbenzene	U		0.0872	0.250	250	04/06/2018 05:07	WG1094443
Styrene	U		0.0768	0.250	250	04/06/2018 05:07	WG1094443
1,1,1,2-Tetrachloroethane	U		0.0962	0.250	250	04/06/2018 05:07	WG1094443
1,1,2,2-Tetrachloroethane	U		0.0325	0.250	250	04/06/2018 05:07	WG1094443
Tetrachloroethene	U		0.0930	0.250	250	04/06/2018 05:07	WG1094443
Toluene	U		0.103	0.250	250	04/06/2018 05:07	WG1094443
1,1,1-Trichloroethane	U		0.0798	0.250	250	04/06/2018 05:07	WG1094443
1,1,2-Trichloroethane	U		0.0958	0.250	250	04/06/2018 05:07	WG1094443
Trichloroethene	U		0.0995	0.250	250	04/06/2018 05:07	WG1094443
1,2,4-Trimethylbenzene	0.214	J	0.0932	0.250	250	04/06/2018 05:07	WG1094443
1,3,5-Trimethylbenzene	U		0.0968	0.250	250	04/06/2018 05:07	WG1094443
Vinyl chloride	U		0.0648	0.250	250	04/06/2018 05:07	WG1094443
o-Xylene	0.0922	J	0.0852	0.250	250	04/06/2018 05:07	WG1094443
m&p-Xylene	0.457	J	0.180	0.500	250	04/06/2018 05:07	WG1094443
Xylenes, Total	0.549	J	0.265	0.750	250	04/06/2018 05:07	WG1094443
(S) Toluene-d8	*108*			*80.0-120*		*04/06/2018 05:07*	WG1094443
(S) Dibromofluoromethane	*87.6*			*76.0-123*		*04/06/2018 05:07*	WG1094443
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/06/2018 05:07*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	3.23		0.0247	0.100	1	04/09/2018 22:37	WG1094422
(S) o-Terphenyl	*99.5*			*31.0-160*		*04/09/2018 22:37*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1250		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0985	0.500	5	04/09/2018 15:02	WG1094863

Sample Narrative:

L983365-14 WG1094863: Diluted due to sulfide interference

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 15:36	WG1094972

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	207		0.519	10.0	10	04/06/2018 06:02	WG1094255
Fluoride	1.37		0.00990	0.100	1	04/06/2018 05:47	WG1094255
Sulfate	2.59	J	0.0774	5.00	1	04/06/2018 05:47	WG1094255

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/08/2018 19:07	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/08/2018 19:39	WG1094326

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.511		0.0126	0.200	1	04/08/2018 21:10	WG1094248
Boron,Dissolved	0.517		0.0126	0.200	1	04/11/2018 16:05	WG1096390

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00453		0.000250	0.00200	1	04/06/2018 21:31	WG1094253
Arsenic,Dissolved	0.00405		0.000250	0.00200	1	04/12/2018 03:08	WG1094249
Barium	1.35		0.000360	0.00500	1	04/06/2018 21:31	WG1094253
Barium,Dissolved	1.47		0.000360	0.00500	1	04/12/2018 03:08	WG1094249
Cadmium	U		0.000160	0.00100	1	04/06/2018 21:31	WG1094253
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 03:08	WG1094249
Calcium	215		0.0460	1.00	1	04/06/2018 21:31	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 21:31	WG1094253
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 03:08	WG1094249
Cobalt	U		0.000260	0.00200	1	04/06/2018 21:31	WG1094253
Cobalt,Dissolved	U		0.000260	0.00200	1	04/12/2018 03:08	WG1094249
Iron	1.54		0.0150	0.100	1	04/06/2018 21:31	WG1094253
Iron,Dissolved	0.160	B	0.0150	0.100	1	04/12/2018 03:08	WG1094249
Lead	0.00185	J	0.000240	0.00200	1	04/07/2018 15:00	WG1094253
Lead,Dissolved	0.000816	J	0.000240	0.00200	1	04/12/2018 03:08	WG1094249
Manganese	0.210		0.000250	0.00500	1	04/06/2018 21:31	WG1094253

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Manganese,Dissolved	0.219		0.000250	0.00500	1	04/12/2018 03:08	WG1094249
Nickel	0.00105	J	0.000350	0.00200	1	04/06/2018 21:31	WG1094253
Nickel,Dissolved	0.000927	J	0.000350	0.00200	1	04/12/2018 03:08	WG1094249
Potassium	0.290	J	0.0370	1.00	1	04/06/2018 21:31	WG1094253
Selenium	U		0.000380	0.00200	1	04/06/2018 21:31	WG1094253
Selenium,Dissolved	0.000412	J	0.000380	0.00200	1	04/12/2018 03:08	WG1094249
Sodium	98.5		0.110	1.00	1	04/06/2018 21:31	WG1094253
Uranium	U		0.000330	0.0100	1	04/07/2018 15:00	WG1094253
Uranium,Dissolved	U		0.000330	0.0100	1	04/12/2018 03:08	WG1094249
Vanadium	0.00270	J	0.000180	0.00500	1	04/06/2018 21:31	WG1094253
Vanadium,Dissolved	0.00108	J	0.000180	0.00500	1	04/12/2018 03:08	WG1094249

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.500	2.50	50	04/06/2018 05:28	WG1094443
Benzene	4.12		0.0166	0.0500	50	04/06/2018 05:28	WG1094443
Bromodichloromethane	U		0.0190	0.0500	50	04/06/2018 05:28	WG1094443
Bromoform	U		0.0234	0.0500	50	04/06/2018 05:28	WG1094443
Bromomethane	U		0.0433	0.250	50	04/06/2018 05:28	WG1094443
n-Butylbenzene	U		0.0180	0.0500	50	04/06/2018 05:28	WG1094443
sec-Butylbenzene	U		0.0182	0.0500	50	04/06/2018 05:28	WG1094443
Carbon disulfide	U		0.0138	0.0500	50	04/06/2018 05:28	WG1094443
Carbon tetrachloride	U		0.0190	0.0500	50	04/06/2018 05:28	WG1094443
Chlorobenzene	U		0.0174	0.0500	50	04/06/2018 05:28	WG1094443
Chlorodibromomethane	U		0.0164	0.0500	50	04/06/2018 05:28	WG1094443
Chloroethane	U		0.0226	0.250	50	04/06/2018 05:28	WG1094443
Chloroform	U		0.0162	0.250	50	04/06/2018 05:28	WG1094443
Chloromethane	U		0.0138	0.125	50	04/06/2018 05:28	WG1094443
1,2-Dibromoethane	U		0.0190	0.0500	50	04/06/2018 05:28	WG1094443
1,1-Dichloroethane	U		0.0130	0.0500	50	04/06/2018 05:28	WG1094443
1,2-Dichloroethane	U		0.0180	0.0500	50	04/06/2018 05:28	WG1094443
1,1-Dichloroethene	U		0.0199	0.0500	50	04/06/2018 05:28	WG1094443
cis-1,2-Dichloroethene	U		0.0130	0.0500	50	04/06/2018 05:28	WG1094443
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	04/06/2018 05:28	WG1094443
1,2-Dichloropropane	U		0.0153	0.0500	50	04/06/2018 05:28	WG1094443
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	04/06/2018 05:28	WG1094443
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	04/06/2018 05:28	WG1094443
Ethylbenzene	0.946		0.0192	0.0500	50	04/06/2018 05:28	WG1094443
Isopropylbenzene	0.0521		0.0163	0.0500	50	04/06/2018 05:28	WG1094443
p-Isopropyltoluene	U		0.0175	0.0500	50	04/06/2018 05:28	WG1094443
2-Butanone (MEK)	U		0.196	0.500	50	04/06/2018 05:28	WG1094443
2-Hexanone	U		0.191	0.500	50	04/06/2018 05:28	WG1094443
Methylene Chloride	U		0.0500	0.250	50	04/06/2018 05:28	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	04/06/2018 05:28	WG1094443
Methyl tert-butyl ether	0.0303	J	0.0184	0.0500	50	04/06/2018 05:28	WG1094443
Naphthalene	0.267		0.0500	0.250	50	04/06/2018 05:28	WG1094443
n-Propylbenzene	0.0965		0.0174	0.0500	50	04/06/2018 05:28	WG1094443
Styrene	U		0.0154	0.0500	50	04/06/2018 05:28	WG1094443
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	04/06/2018 05:28	WG1094443
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	04/06/2018 05:28	WG1094443
Tetrachloroethene	U		0.0186	0.0500	50	04/06/2018 05:28	WG1094443
Toluene	U		0.0206	0.0500	50	04/06/2018 05:28	WG1094443
1,1,1-Trichloroethane	U		0.0160	0.0500	50	04/06/2018 05:28	WG1094443
1,1,2-Trichloroethane	U		0.0192	0.0500	50	04/06/2018 05:28	WG1094443
Trichloroethene	U		0.0199	0.0500	50	04/06/2018 05:28	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2,4-Trimethylbenzene	0.574		0.0186	0.0500	50	04/06/2018 05:28	WG1094443
1,3,5-Trimethylbenzene	U		0.0194	0.0500	50	04/06/2018 05:28	WG1094443
Vinyl chloride	U		0.0130	0.0500	50	04/06/2018 05:28	WG1094443
o-Xylene	U		0.0170	0.0500	50	04/06/2018 05:28	WG1094443
m&p-Xylene	0.268		0.0360	0.100	50	04/06/2018 05:28	WG1094443
Xylenes, Total	0.268		0.0530	0.150	50	04/06/2018 05:28	WG1094443
(S) Toluene-d8	*108*			*80.0-120*		*04/06/2018 05:28*	WG1094443
(S) Dibromofluoromethane	*87.3*			*76.0-123*		*04/06/2018 05:28*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 05:28*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	5.73		0.0247	0.100	1	04/09/2018 22:54	WG1094422
(S) o-Terphenyl	*101*			*31.0-160*		*04/09/2018 22:54*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3580		2.82	10.0	1	04/10/2018 16:17	WG1095030

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	15.3		0.0985	0.500	5	04/09/2018 15:03	WG1094863

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 15:38	WG1094972

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	136		0.519	10.0	10	04/06/2018 06:33	WG1094255
Fluoride	0.704		0.00990	0.100	1	04/06/2018 06:18	WG1094255
Sulfate	2470		3.87	250	50	04/07/2018 21:50	WG1094922

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.0000726	B J	0.0000490	0.000200	1	04/08/2018 19:10	WG1094325
Mercury,Dissolved	0.0000695	B J	0.0000490	0.000200	1	04/08/2018 19:41	WG1094326

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.343		0.0126	0.200	1	04/08/2018 21:13	WG1094248
Boron,Dissolved	0.343		0.0126	0.200	1	04/10/2018 10:17	WG1094698

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00395		0.000250	0.00200	1	04/06/2018 21:44	WG1094253
Arsenic,Dissolved	0.00325		0.000250	0.00200	1	04/12/2018 03:12	WG1094249
Barium	0.0325		0.000360	0.00500	1	04/06/2018 21:44	WG1094253
Barium,Dissolved	0.0201		0.000360	0.00500	1	04/12/2018 03:12	WG1094249
Cadmium	U		0.000160	0.00100	1	04/06/2018 21:44	WG1094253
Cadmium,Dissolved	0.000440	J	0.000160	0.00100	1	04/12/2018 03:12	WG1094249
Calcium	558		0.0460	1.00	1	04/06/2018 21:44	WG1094253
Chromium	0.00437	B	0.000540	0.00200	1	04/06/2018 21:44	WG1094253
Chromium,Dissolved	0.142		0.000540	0.00200	1	04/12/2018 03:12	WG1094249
Cobalt	0.000953	J	0.000260	0.00200	1	04/06/2018 21:44	WG1094253
Cobalt,Dissolved	0.00156	J	0.000260	0.00200	1	04/12/2018 03:12	WG1094249
Iron	3.01		0.0150	0.100	1	04/06/2018 21:44	WG1094253
Iron,Dissolved	0.619		0.0150	0.100	1	04/12/2018 03:12	WG1094249
Lead	0.00292		0.000240	0.00200	1	04/07/2018 15:14	WG1094253
Lead,Dissolved	0.000566	J	0.000240	0.00200	1	04/12/2018 03:12	WG1094249
Manganese	0.0490		0.000250	0.00500	1	04/06/2018 21:44	WG1094253
Manganese,Dissolved	0.00905		0.000250	0.00500	1	04/12/2018 03:12	WG1094249
Nickel	0.00296		0.000350	0.00200	1	04/06/2018 21:44	WG1094253
Nickel,Dissolved	0.0687		0.000350	0.00200	1	04/12/2018 03:12	WG1094249

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Potassium	1.66		0.0370	1.00	1	04/06/2018 21:44	WG1094253
Selenium	0.0131		0.000380	0.00200	1	04/07/2018 15:14	WG1094253
Selenium,Dissolved	0.0133		0.000380	0.00200	1	04/12/2018 03:12	WG1094249
Sodium	227		0.110	1.00	1	04/06/2018 21:44	WG1094253
Uranium	0.0249		0.000330	0.0100	1	04/07/2018 15:14	WG1094253
Uranium,Dissolved	0.0278		0.000330	0.0100	1	04/12/2018 03:12	WG1094249
Vanadium	0.0261		0.000180	0.00500	1	04/06/2018 21:44	WG1094253
Vanadium,Dissolved	0.0206		0.000180	0.00500	1	04/12/2018 03:12	WG1094249

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 05:49	WG1094443
Benzene	U		0.000331	0.00100	1	04/06/2018 05:49	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 05:49	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 05:49	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 05:49	WG1094443
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 05:49	WG1094443
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 05:49	WG1094443
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 05:49	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 05:49	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 05:49	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 05:49	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 05:49	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 05:49	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 05:49	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 05:49	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 05:49	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 05:49	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 05:49	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 05:49	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 05:49	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 05:49	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 05:49	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 05:49	WG1094443
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 05:49	WG1094443
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 05:49	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 05:49	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 05:49	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 05:49	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 05:49	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 05:49	WG1094443
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 05:49	WG1094443
Naphthalene	U		0.00100	0.00500	1	04/06/2018 05:49	WG1094443
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 05:49	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 05:49	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 05:49	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 05:49	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 05:49	WG1094443
Toluene	U		0.000412	0.00100	1	04/06/2018 05:49	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 05:49	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 05:49	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 05:49	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 05:49	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 05:49	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 05:49	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
o-Xylene	U		0.000341	0.00100	1	04/06/2018 05:49	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 05:49	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 05:49	WG1094443
(S) Toluene-d8	*109*			*80.0-120*		*04/06/2018 05:49*	WG1094443
(S) Dibromofluoromethane	*89.5*			*76.0-123*		*04/06/2018 05:49*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 05:49*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0567	J	0.0247	0.100	1	04/09/2018 23:11	WG1094422
(S) o-Terphenyl	*97.3*			*31.0-160*		*04/09/2018 23:11*	WG1094422

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	13400		2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.394	2.00	20	04/09/2018 15:08	WG1094863

Sample Narrative:

L983365-16 WG1094863: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	6800		5.19	100	100	04/06/2018 07:04	WG1094255
Fluoride	7.41		0.00990	0.100	1	04/06/2018 06:49	WG1094255
Sulfate	60.4		0.0774	5.00	1	04/06/2018 06:49	WG1094255

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00699		0.000250	0.00200	1	04/06/2018 21:48	WG1094253
Arsenic,Dissolved	0.00564		0.000250	0.00200	1	04/12/2018 03:16	WG1094249
Barium	3.44		0.000360	0.00500	1	04/06/2018 21:48	WG1094253
Barium,Dissolved	3.80		0.000360	0.00500	1	04/12/2018 03:16	WG1094249
Calcium	94.1		0.0460	1.00	1	04/06/2018 21:48	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 21:48	WG1094253
Chromium,Dissolved	0.000882	J	0.000540	0.00200	1	04/12/2018 03:16	WG1094249
Iron	0.0617	B J	0.0150	0.100	1	04/06/2018 21:48	WG1094253
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 03:16	WG1094249
Lead	U		0.00240	0.0200	10	04/07/2018 15:18	WG1094253
Lead,Dissolved	0.00107	J	0.000240	0.00200	1	04/12/2018 03:16	WG1094249
Manganese	0.00151	J	0.000250	0.00500	1	04/06/2018 21:48	WG1094253
Manganese,Dissolved	0.00187	J	0.000250	0.00500	1	04/12/2018 03:16	WG1094249
Potassium	1.41		0.0370	1.00	1	04/06/2018 21:48	WG1094253
Selenium	0.00106	J	0.000380	0.00200	1	04/06/2018 21:48	WG1094253
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 03:16	WG1094249
Sodium	5980		1.10	10.0	10	04/08/2018 15:09	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	6.45		0.0314	0.100	1	04/06/2018 17:57	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*89.5*			*77.0-122*		*04/06/2018 17:57*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 06:10	WG1094443
Benzene	1.75		0.0166	0.0500	50	04/11/2018 21:32	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 06:10	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 06:10	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 06:10	WG1094443
n-Butylbenzene	0.00391		0.000361	0.00100	1	04/06/2018 06:10	WG1094443

MW-103

Collected date/time: 04/03/18 13:00

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L983365

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.00527		0.000365	0.00100	1	04/06/2018 06:10	WG1094443
Carbon disulfide	0.000406	J	0.000275	0.00100	1	04/06/2018 06:10	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 06:10	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 06:10	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 06:10	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 06:10	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 06:10	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 06:10	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 06:10	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 06:10	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 06:10	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 06:10	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 06:10	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 06:10	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 06:10	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 06:10	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 06:10	WG1094443
Ethylbenzene	0.0384		0.000384	0.00100	1	04/06/2018 06:10	WG1094443
Isopropylbenzene	0.0303		0.000326	0.00100	1	04/06/2018 06:10	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 06:10	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 06:10	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 06:10	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 06:10	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 06:10	WG1094443
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 06:10	WG1094443
Naphthalene	0.116		0.00100	0.00500	1	04/06/2018 06:10	WG1094443
n-Propylbenzene	0.0425		0.000349	0.00100	1	04/06/2018 06:10	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 06:10	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 06:10	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 06:10	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 06:10	WG1094443
Toluene	0.0408		0.000412	0.00100	1	04/06/2018 06:10	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 06:10	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 06:10	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 06:10	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 06:10	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 06:10	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 06:10	WG1094443
o-Xylene	0.00461		0.000341	0.00100	1	04/06/2018 06:10	WG1094443
m&p-Xylene	0.00775		0.000719	0.00200	1	04/06/2018 06:10	WG1094443
Xylenes, Total	0.0124		0.00106	0.00300	1	04/06/2018 06:10	WG1094443
(S) Toluene-d8	*101*			*80.0-120*		*04/06/2018 06:10*	WG1094443
(S) Toluene-d8	*95.3*			*80.0-120*		*04/11/2018 21:32*	WG1094443
(S) Dibromofluoromethane	*87.5*			*76.0-123*		*04/06/2018 06:10*	WG1094443
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/11/2018 21:32*	WG1094443
(S) 4-Bromofluorobenzene	*100*			*80.0-120*		*04/11/2018 21:32*	WG1094443
(S) 4-Bromofluorobenzene	*102*			*80.0-120*		*04/06/2018 06:10*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	6.23		0.0247	0.100	1	04/09/2018 23:27	WG1094422
(S) o-Terphenyl	*104*			*31.0-160*		*04/09/2018 23:27*	WG1094422

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1110		2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.394	2.00	20	04/09/2018 15:09	WG1094863

Sample Narrative:

L983365-17 WG1094863: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	102		0.519	10.0	10	04/06/2018 08:06	WG1094255
Fluoride	1.67		0.00990	0.100	1	04/06/2018 07:19	WG1094255
Sulfate	417		0.774	50.0	10	04/06/2018 08:06	WG1094255

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0200		0.000250	0.00200	1	04/06/2018 21:52	WG1094253
Arsenic,Dissolved	0.0209		0.000250	0.00200	1	04/12/2018 03:28	WG1094249
Barium	0.0371		0.000360	0.00500	1	04/06/2018 21:52	WG1094253
Barium,Dissolved	0.0358		0.000360	0.00500	1	04/12/2018 03:28	WG1094249
Calcium	207		0.0460	1.00	1	04/06/2018 21:52	WG1094253
Chromium	0.00170	B J	0.000540	0.00200	1	04/06/2018 21:52	WG1094253
Chromium,Dissolved	0.00115	J	0.000540	0.00200	1	04/12/2018 03:28	WG1094249
Iron	0.241	B	0.0150	0.100	1	04/06/2018 21:52	WG1094253
Iron,Dissolved	0.0187	B J	0.0150	0.100	1	04/12/2018 03:28	WG1094249
Lead	U		0.000240	0.00200	1	04/07/2018 15:22	WG1094253
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 03:28	WG1094249
Manganese	0.00414	J	0.000250	0.00500	1	04/06/2018 21:52	WG1094253
Manganese,Dissolved	0.00414	J	0.000250	0.00500	1	04/12/2018 03:28	WG1094249
Potassium	5.95		0.0370	1.00	1	04/06/2018 21:52	WG1094253
Selenium	U		0.000380	0.00200	1	04/06/2018 21:52	WG1094253
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 03:28	WG1094249
Sodium	74.9		0.110	1.00	1	04/06/2018 21:52	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.40		0.0314	0.100	1	04/06/2018 18:19	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*95.3*			*77.0-122*		*04/06/2018 18:19*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 06:31	WG1094443
Benzene	0.142		0.000331	0.00100	1	04/06/2018 06:31	WG1094443
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 06:31	WG1094443
Bromoform	U		0.000469	0.00100	1	04/06/2018 06:31	WG1094443
Bromomethane	U		0.000866	0.00500	1	04/06/2018 06:31	WG1094443
n-Butylbenzene	0.000615	J	0.000361	0.00100	1	04/06/2018 06:31	WG1094443

MW-104

Collected date/time: 04/03/18 12:00

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
sec-Butylbenzene	0.0369		0.000365	0.00100	1	04/06/2018 06:31	WG1094443
Carbon disulfide	0.000748	J	0.000275	0.00100	1	04/06/2018 06:31	WG1094443
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 06:31	WG1094443
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 06:31	WG1094443
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 06:31	WG1094443
Chloroethane	U		0.000453	0.00500	1	04/06/2018 06:31	WG1094443
Chloroform	U		0.000324	0.00500	1	04/06/2018 06:31	WG1094443
Chloromethane	U		0.000276	0.00250	1	04/06/2018 06:31	WG1094443
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 06:31	WG1094443
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 06:31	WG1094443
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 06:31	WG1094443
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 06:31	WG1094443
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 06:31	WG1094443
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 06:31	WG1094443
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 06:31	WG1094443
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 06:31	WG1094443
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 06:31	WG1094443
Ethylbenzene	0.000906	J	0.000384	0.00100	1	04/06/2018 06:31	WG1094443
Isopropylbenzene	0.0430		0.000326	0.00100	1	04/06/2018 06:31	WG1094443
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 06:31	WG1094443
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 06:31	WG1094443
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 06:31	WG1094443
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 06:31	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 06:31	WG1094443
Methyl tert-butyl ether	0.00320		0.000367	0.00100	1	04/06/2018 06:31	WG1094443
Naphthalene	0.00239	J	0.00100	0.00500	1	04/06/2018 06:31	WG1094443
n-Propylbenzene	0.00374		0.000349	0.00100	1	04/06/2018 06:31	WG1094443
Styrene	U		0.000307	0.00100	1	04/06/2018 06:31	WG1094443
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 06:31	WG1094443
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 06:31	WG1094443
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 06:31	WG1094443
Toluene	0.000415	J	0.000412	0.00100	1	04/06/2018 06:31	WG1094443
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 06:31	WG1094443
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 06:31	WG1094443
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 06:31	WG1094443
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 06:31	WG1094443
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 06:31	WG1094443
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 06:31	WG1094443
o-Xylene	U		0.000341	0.00100	1	04/06/2018 06:31	WG1094443
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 06:31	WG1094443
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 06:31	WG1094443
(S) Toluene-d8	*107*			*80.0-120*		*04/06/2018 06:31*	WG1094443
(S) Dibromofluoromethane	*86.1*			*76.0-123*		*04/06/2018 06:31*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 06:31*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.85		0.0247	0.100	1	04/09/2018 23:44	WG1094422
(S) o-Terphenyl	*105*			*31.0-160*		*04/09/2018 23:44*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1500		2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	04/09/2018 15:10	WG1094863

Sample Narrative:

L983365-18 WG1094863: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	323		0.519	10.0	10	04/06/2018 08:37	WG1094255
Fluoride	0.795		0.00990	0.100	1	04/06/2018 08:21	WG1094255
Sulfate	1.84	J	0.0774	5.00	1	04/06/2018 08:21	WG1094255

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0394		0.000250	0.00200	1	04/06/2018 21:57	WG1094253
Arsenic,Dissolved	0.0391		0.000250	0.00200	1	04/12/2018 03:31	WG1094249
Barium	2.17		0.000360	0.00500	1	04/06/2018 21:57	WG1094253
Barium,Dissolved	2.32		0.000360	0.00500	1	04/12/2018 03:31	WG1094249
Calcium	93.7		0.0460	1.00	1	04/06/2018 21:57	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 21:57	WG1094253
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 03:31	WG1094249
Iron	0.179	B	0.0150	0.100	1	04/06/2018 21:57	WG1094253
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 03:31	WG1094249
Lead	0.00122	J	0.000240	0.00200	1	04/07/2018 15:27	WG1094253
Lead,Dissolved	0.000331	J	0.000240	0.00200	1	04/12/2018 03:31	WG1094249
Manganese	0.0638		0.000250	0.00500	1	04/06/2018 21:57	WG1094253
Manganese,Dissolved	0.0656		0.000250	0.00500	1	04/12/2018 03:31	WG1094249
Potassium	0.697	J	0.0370	1.00	1	04/06/2018 21:57	WG1094253
Selenium	0.000584	J	0.000380	0.00200	1	04/06/2018 21:57	WG1094253
Selenium,Dissolved	0.000382	J	0.000380	0.00200	1	04/12/2018 03:31	WG1094249
Sodium	362		0.110	1.00	1	04/06/2018 21:57	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	102		0.628	2.00	20	04/06/2018 18:41	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*93.8*			*77.0-122*		*04/06/2018 18:41*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.200	1.00	20	04/06/2018 06:51	WG1094443
Benzene	2.37		0.00662	0.0200	20	04/06/2018 06:51	WG1094443
Bromodichloromethane	U		0.00760	0.0200	20	04/06/2018 06:51	WG1094443
Bromoform	U		0.00938	0.0200	20	04/06/2018 06:51	WG1094443
Bromomethane	U		0.0173	0.100	20	04/06/2018 06:51	WG1094443
n-Butylbenzene	U		0.00722	0.0200	20	04/06/2018 06:51	WG1094443

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
sec-Butylbenzene	U		0.00730	0.0200	20	04/06/2018 06:51	WG1094443
Carbon disulfide	0.00554	J	0.00550	0.0200	20	04/06/2018 06:51	WG1094443
Carbon tetrachloride	U		0.00758	0.0200	20	04/06/2018 06:51	WG1094443
Chlorobenzene	U		0.00696	0.0200	20	04/06/2018 06:51	WG1094443
Chlorodibromomethane	U		0.00654	0.0200	20	04/06/2018 06:51	WG1094443
Chloroethane	U		0.00906	0.100	20	04/06/2018 06:51	WG1094443
Chloroform	U		0.00648	0.100	20	04/06/2018 06:51	WG1094443
Chloromethane	U		0.00552	0.0500	20	04/06/2018 06:51	WG1094443
1,2-Dibromoethane	U		0.00762	0.0200	20	04/06/2018 06:51	WG1094443
1,1-Dichloroethane	U		0.00518	0.0200	20	04/06/2018 06:51	WG1094443
1,2-Dichloroethane	U		0.00722	0.0200	20	04/06/2018 06:51	WG1094443
1,1-Dichloroethene	U		0.00796	0.0200	20	04/06/2018 06:51	WG1094443
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	04/06/2018 06:51	WG1094443
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	04/06/2018 06:51	WG1094443
1,2-Dichloropropane	U		0.00612	0.0200	20	04/06/2018 06:51	WG1094443
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	04/06/2018 06:51	WG1094443
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	04/06/2018 06:51	WG1094443
Ethylbenzene	0.237		0.00768	0.0200	20	04/06/2018 06:51	WG1094443
Isopropylbenzene	0.00783	J	0.00652	0.0200	20	04/06/2018 06:51	WG1094443
p-Isopropyltoluene	U		0.00700	0.0200	20	04/06/2018 06:51	WG1094443
2-Butanone (MEK)	U		0.0786	0.200	20	04/06/2018 06:51	WG1094443
2-Hexanone	U		0.0764	0.200	20	04/06/2018 06:51	WG1094443
Methylene Chloride	U		0.0200	0.100	20	04/06/2018 06:51	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	04/06/2018 06:51	WG1094443
Methyl tert-butyl ether	0.0359		0.00734	0.0200	20	04/06/2018 06:51	WG1094443
Naphthalene	0.0238	J	0.0200	0.100	20	04/06/2018 06:51	WG1094443
n-Propylbenzene	0.0101	J	0.00698	0.0200	20	04/06/2018 06:51	WG1094443
Styrene	U		0.00614	0.0200	20	04/06/2018 06:51	WG1094443
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	04/06/2018 06:51	WG1094443
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	04/06/2018 06:51	WG1094443
Tetrachloroethene	U		0.00744	0.0200	20	04/06/2018 06:51	WG1094443
Toluene	0.816		0.00824	0.0200	20	04/06/2018 06:51	WG1094443
1,1,1-Trichloroethane	U		0.00638	0.0200	20	04/06/2018 06:51	WG1094443
1,1,2-Trichloroethane	U		0.00766	0.0200	20	04/06/2018 06:51	WG1094443
Trichloroethene	U		0.00796	0.0200	20	04/06/2018 06:51	WG1094443
1,2,4-Trimethylbenzene	0.0519		0.00746	0.0200	20	04/06/2018 06:51	WG1094443
1,3,5-Trimethylbenzene	0.0107	J	0.00774	0.0200	20	04/06/2018 06:51	WG1094443
Vinyl chloride	U		0.00518	0.0200	20	04/06/2018 06:51	WG1094443
o-Xylene	0.122		0.00682	0.0200	20	04/06/2018 06:51	WG1094443
m&p-Xylene	0.360		0.0144	0.0400	20	04/06/2018 06:51	WG1094443
Xylenes, Total	0.482		0.0212	0.0600	20	04/06/2018 06:51	WG1094443
(S) Toluene-d8	*108*			*80.0-120*		*04/06/2018 06:51*	WG1094443
(S) Dibromofluoromethane	*87.2*			*76.0-123*		*04/06/2018 06:51*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 06:51*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	8.37		0.0247	0.100	1	04/10/2018 00:01	WG1094422
(S) o-Terphenyl	*104*			*31.0-160*		*04/10/2018 00:01*	WG1094422

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1340		2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0985	0.500	5	04/09/2018 15:11	WG1094863

Sample Narrative:

L983365-19 WG1094863: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	306		0.519	10.0	10	04/06/2018 09:07	WG1094255
Fluoride	1.33		0.00990	0.100	1	04/06/2018 08:52	WG1094255
Sulfate	10.2		0.0774	5.00	1	04/06/2018 08:52	WG1094255

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0108		0.000250	0.00200	1	04/06/2018 22:01	WG1094253
Arsenic,Dissolved	0.0108		0.000250	0.00200	1	04/12/2018 03:35	WG1094249
Barium	2.60		0.000360	0.00500	1	04/06/2018 22:01	WG1094253
Barium,Dissolved	2.75		0.000360	0.00500	1	04/12/2018 03:35	WG1094249
Calcium	132		0.0460	1.00	1	04/06/2018 22:01	WG1094253
Chromium	U		0.000540	0.00200	1	04/06/2018 22:01	WG1094253
Chromium,Dissolved	0.00329		0.000540	0.00200	1	04/12/2018 03:35	WG1094249
Iron	2.18		0.0150	0.100	1	04/06/2018 22:01	WG1094253
Iron,Dissolved	1.52		0.0150	0.100	1	04/12/2018 03:35	WG1094249
Lead	0.000448	J	0.000240	0.00200	1	04/07/2018 15:31	WG1094253
Lead,Dissolved	0.000368	J	0.000240	0.00200	1	04/12/2018 03:35	WG1094249
Manganese	0.527		0.000250	0.00500	1	04/06/2018 22:01	WG1094253
Manganese,Dissolved	0.559		0.000250	0.00500	1	04/12/2018 03:35	WG1094249
Potassium	0.732	J	0.0370	1.00	1	04/06/2018 22:01	WG1094253
Selenium	U		0.000380	0.00200	1	04/06/2018 22:01	WG1094253
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 03:35	WG1094249
Sodium	264		0.110	1.00	1	04/06/2018 22:01	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	15.5		0.157	0.500	5	04/06/2018 19:03	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.8*			*77.0-122*		*04/06/2018 19:03*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		1.00	5.00	100	04/06/2018 07:12	WG1094443
Benzene	4.39		0.0331	0.100	100	04/06/2018 07:12	WG1094443
Bromodichloromethane	U		0.0380	0.100	100	04/06/2018 07:12	WG1094443
Bromoform	U		0.0469	0.100	100	04/06/2018 07:12	WG1094443
Bromomethane	U		0.0866	0.500	100	04/06/2018 07:12	WG1094443
n-Butylbenzene	U		0.0361	0.100	100	04/06/2018 07:12	WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
sec-Butylbenzene	U		0.0365	0.100	100	04/06/2018 07:12	WG1094443
Carbon disulfide	U		0.0275	0.100	100	04/06/2018 07:12	WG1094443
Carbon tetrachloride	U		0.0379	0.100	100	04/06/2018 07:12	WG1094443
Chlorobenzene	U		0.0348	0.100	100	04/06/2018 07:12	WG1094443
Chlorodibromomethane	U		0.0327	0.100	100	04/06/2018 07:12	WG1094443
Chloroethane	U		0.0453	0.500	100	04/06/2018 07:12	WG1094443
Chloroform	U		0.0324	0.500	100	04/06/2018 07:12	WG1094443
Chloromethane	U		0.0276	0.250	100	04/06/2018 07:12	WG1094443
1,2-Dibromoethane	U		0.0381	0.100	100	04/06/2018 07:12	WG1094443
1,1-Dichloroethane	U		0.0259	0.100	100	04/06/2018 07:12	WG1094443
1,2-Dichloroethane	U		0.0361	0.100	100	04/06/2018 07:12	WG1094443
1,1-Dichloroethene	U		0.0398	0.100	100	04/06/2018 07:12	WG1094443
cis-1,2-Dichloroethene	U		0.0260	0.100	100	04/06/2018 07:12	WG1094443
trans-1,2-Dichloroethene	U		0.0396	0.100	100	04/06/2018 07:12	WG1094443
1,2-Dichloropropane	U		0.0306	0.100	100	04/06/2018 07:12	WG1094443
cis-1,3-Dichloropropene	U		0.0418	0.100	100	04/06/2018 07:12	WG1094443
trans-1,3-Dichloropropene	U		0.0419	0.100	100	04/06/2018 07:12	WG1094443
Ethylbenzene	0.0528	J	0.0384	0.100	100	04/06/2018 07:12	WG1094443
Isopropylbenzene	0.0594	J	0.0326	0.100	100	04/06/2018 07:12	WG1094443
p-Isopropyltoluene	U		0.0350	0.100	100	04/06/2018 07:12	WG1094443
2-Butanone (MEK)	U		0.393	1.00	100	04/06/2018 07:12	WG1094443
2-Hexanone	U		0.382	1.00	100	04/06/2018 07:12	WG1094443
Methylene Chloride	U		0.100	0.500	100	04/06/2018 07:12	WG1094443
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	04/06/2018 07:12	WG1094443
Methyl tert-butyl ether	1.73		0.0367	0.100	100	04/06/2018 07:12	WG1094443
Naphthalene	0.253	J	0.100	0.500	100	04/06/2018 07:12	WG1094443
n-Propylbenzene	0.0716	J	0.0349	0.100	100	04/06/2018 07:12	WG1094443
Styrene	U		0.0307	0.100	100	04/06/2018 07:12	WG1094443
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	04/06/2018 07:12	WG1094443
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	04/06/2018 07:12	WG1094443
Tetrachloroethene	U		0.0372	0.100	100	04/06/2018 07:12	WG1094443
Toluene	U		0.0412	0.100	100	04/06/2018 07:12	WG1094443
1,1,1-Trichloroethane	U		0.0319	0.100	100	04/06/2018 07:12	WG1094443
1,1,2-Trichloroethane	U		0.0383	0.100	100	04/06/2018 07:12	WG1094443
Trichloroethene	U		0.0398	0.100	100	04/06/2018 07:12	WG1094443
1,2,4-Trimethylbenzene	U		0.0373	0.100	100	04/06/2018 07:12	WG1094443
1,3,5-Trimethylbenzene	U		0.0387	0.100	100	04/06/2018 07:12	WG1094443
Vinyl chloride	U		0.0259	0.100	100	04/06/2018 07:12	WG1094443
o-Xylene	U		0.0341	0.100	100	04/06/2018 07:12	WG1094443
m&p-Xylene	U		0.0719	0.200	100	04/06/2018 07:12	WG1094443
Xylenes, Total	U		0.106	0.300	100	04/06/2018 07:12	WG1094443
(S) Toluene-d8	*107*			*80.0-120*		*04/06/2018 07:12*	WG1094443
(S) Dibromofluoromethane	*87.6*			*76.0-123*		*04/06/2018 07:12*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 07:12*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	5.05		0.0247	0.100	1	04/10/2018 00:17	WG1094422
(S) o-Terphenyl	*110*			*31.0-160*		*04/10/2018 00:17*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1380		2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U	J5	0.985	5.00	50	04/09/2018 15:14	WG1094863

Sample Narrative:

L983365-20 WG1094863: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	26.4		0.0519	1.00	1	04/06/2018 09:38	WG1094255
Fluoride	0.954		0.00990	0.100	1	04/06/2018 09:23	WG1094255
Sulfate	5.49		0.0774	5.00	1	04/06/2018 09:23	WG1094255

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0181		0.000250	0.00200	1	04/06/2018 22:05	WG1094253
Arsenic,Dissolved	0.0139		0.000250	0.00200	1	04/12/2018 03:39	WG1094249
Barium	7.83		0.000360	0.00500	1	04/06/2018 22:05	WG1094253
Barium,Dissolved	5.87		0.000360	0.00500	1	04/12/2018 03:39	WG1094249
Calcium	136		0.0460	1.00	1	04/06/2018 22:05	WG1094253
Chromium	0.00358	B	0.000540	0.00200	1	04/06/2018 22:05	WG1094253
Chromium,Dissolved	0.00158	J	0.000540	0.00200	1	04/12/2018 03:39	WG1094249
Iron	6.74		0.0150	0.100	1	04/06/2018 22:05	WG1094253
Iron,Dissolved	0.146	B	0.0150	0.100	1	04/12/2018 03:39	WG1094249
Lead	0.0111		0.000240	0.00200	1	04/07/2018 15:36	WG1094253
Lead,Dissolved	0.00227		0.000240	0.00200	1	04/12/2018 03:39	WG1094249
Manganese	0.0651		0.000250	0.00500	1	04/06/2018 22:05	WG1094253
Manganese,Dissolved	0.0315		0.000250	0.00500	1	04/12/2018 03:39	WG1094249
Potassium	0.960	J	0.0370	1.00	1	04/06/2018 22:05	WG1094253
Selenium	0.000601	J	0.000380	0.00200	1	04/06/2018 22:05	WG1094253
Selenium,Dissolved	0.000441	J	0.000380	0.00200	1	04/12/2018 03:39	WG1094249
Sodium	406		0.110	1.00	1	04/06/2018 22:05	WG1094253

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	32.7		3.14	10.0	100	04/06/2018 19:25	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.3*			*77.0-122*		*04/06/2018 19:25*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		5.00	25.0	500	04/06/2018 07:33	WG1094443
Benzene	7.63		0.166	0.500	500	04/06/2018 07:33	WG1094443
Bromodichloromethane	U		0.190	0.500	500	04/06/2018 07:33	WG1094443
Bromoform	U		0.234	0.500	500	04/06/2018 07:33	WG1094443
Bromomethane	U		0.433	2.50	500	04/06/2018 07:33	WG1094443
n-Butylbenzene	U		0.180	0.500	500	04/06/2018 07:33	WG1094443

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	U		0.182	0.500	500	04/06/2018 07:33	WG1094443
Carbon disulfide	U		0.138	0.500	500	04/06/2018 07:33	WG1094443
Carbon tetrachloride	U		0.190	0.500	500	04/06/2018 07:33	WG1094443
Chlorobenzene	U		0.174	0.500	500	04/06/2018 07:33	WG1094443
Chlorodibromomethane	U		0.164	0.500	500	04/06/2018 07:33	WG1094443
Chloroethane	U		0.226	2.50	500	04/06/2018 07:33	WG1094443
Chloroform	U		0.162	2.50	500	04/06/2018 07:33	WG1094443
Chloromethane	U		0.138	1.25	500	04/06/2018 07:33	WG1094443
1,2-Dibromoethane	U		0.190	0.500	500	04/06/2018 07:33	WG1094443
1,1-Dichloroethane	U		0.130	0.500	500	04/06/2018 07:33	WG1094443
1,2-Dichloroethane	U		0.180	0.500	500	04/06/2018 07:33	WG1094443
1,1-Dichloroethene	U		0.199	0.500	500	04/06/2018 07:33	WG1094443
cis-1,2-Dichloroethene	U		0.130	0.500	500	04/06/2018 07:33	WG1094443
trans-1,2-Dichloroethene	U		0.198	0.500	500	04/06/2018 07:33	WG1094443
1,2-Dichloropropane	U		0.153	0.500	500	04/06/2018 07:33	WG1094443
cis-1,3-Dichloropropene	U		0.209	0.500	500	04/06/2018 07:33	WG1094443
trans-1,3-Dichloropropene	U		0.210	0.500	500	04/06/2018 07:33	WG1094443
Ethylbenzene	0.903		0.192	0.500	500	04/06/2018 07:33	WG1094443
Isopropylbenzene	U		0.163	0.500	500	04/06/2018 07:33	WG1094443
p-Isopropyltoluene	U		0.175	0.500	500	04/06/2018 07:33	WG1094443
2-Butanone (MEK)	U		1.96	5.00	500	04/06/2018 07:33	WG1094443
2-Hexanone	U		1.91	5.00	500	04/06/2018 07:33	WG1094443
Methylene Chloride	U		0.500	2.50	500	04/06/2018 07:33	WG1094443
4-Methyl-2-pentanone (MIBK)	U		1.07	5.00	500	04/06/2018 07:33	WG1094443
Methyl tert-butyl ether	1.19		0.184	0.500	500	04/06/2018 07:33	WG1094443
Naphthalene	U		0.500	2.50	500	04/06/2018 07:33	WG1094443
n-Propylbenzene	U		0.174	0.500	500	04/06/2018 07:33	WG1094443
Styrene	U		0.154	0.500	500	04/06/2018 07:33	WG1094443
1,1,1,2-Tetrachloroethane	U		0.192	0.500	500	04/06/2018 07:33	WG1094443
1,1,2,2-Tetrachloroethane	U		0.0650	0.500	500	04/06/2018 07:33	WG1094443
Tetrachloroethene	U		0.186	0.500	500	04/06/2018 07:33	WG1094443
Toluene	U		0.206	0.500	500	04/06/2018 07:33	WG1094443
1,1,1-Trichloroethane	U		0.160	0.500	500	04/06/2018 07:33	WG1094443
1,1,2-Trichloroethane	U		0.192	0.500	500	04/06/2018 07:33	WG1094443
Trichloroethene	U		0.199	0.500	500	04/06/2018 07:33	WG1094443
1,2,4-Trimethylbenzene	0.288	J	0.186	0.500	500	04/06/2018 07:33	WG1094443
1,3,5-Trimethylbenzene	U		0.194	0.500	500	04/06/2018 07:33	WG1094443
Vinyl chloride	U		0.130	0.500	500	04/06/2018 07:33	WG1094443
o-Xylene	U		0.170	0.500	500	04/06/2018 07:33	WG1094443
m&p-Xylene	0.410	J	0.360	1.00	500	04/06/2018 07:33	WG1094443
Xylenes, Total	U		0.530	1.50	500	04/06/2018 07:33	WG1094443
(S) Toluene-d8	*106*			*80.0-120*		*04/06/2018 07:33*	WG1094443
(S) Dibromofluoromethane	*88.1*			*76.0-123*		*04/06/2018 07:33*	WG1094443
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 07:33*	WG1094443

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	34.6		0.247	1.00	10	04/13/2018 06:34	WG1094422
(S) o-Terphenyl	*127*			*31.0-160*		*04/13/2018 06:34*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2910		2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		1.97	10.0	100	04/09/2018 15:43	WG1094866

Sample Narrative:

L983365-21 WG1094866: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	81.5		0.104	2.00	2	04/06/2018 09:54	WG1094255
Fluoride	1.70		0.0198	0.200	2	04/06/2018 09:54	WG1094255
Sulfate	1790		1.55	100	20	04/07/2018 22:03	WG1094922

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00120	J	0.000250	0.00200	1	04/11/2018 23:17	WG1094256
Arsenic,Dissolved	0.000942	J	0.000250	0.00200	1	04/12/2018 03:43	WG1094249
Barium	0.0156		0.000360	0.00500	1	04/11/2018 23:17	WG1094256
Barium,Dissolved	0.0273		0.000360	0.00500	1	04/12/2018 03:43	WG1094249
Calcium	543		0.0460	1.00	1	04/11/2018 23:17	WG1094256
Chromium	0.000670	J J3 J4	0.000540	0.00200	1	04/11/2018 23:17	WG1094256
Chromium,Dissolved	0.00591		0.000540	0.00200	1	04/12/2018 03:43	WG1094249
Iron	U		0.0150	0.100	1	04/11/2018 23:17	WG1094256
Iron,Dissolved	0.0464	B J	0.0150	0.100	1	04/12/2018 03:43	WG1094249
Lead	0.00964		0.000240	0.00200	1	04/11/2018 23:17	WG1094256
Lead,Dissolved	0.00903		0.000240	0.00200	1	04/12/2018 03:43	WG1094249
Manganese	0.0246		0.000250	0.00500	1	04/11/2018 23:17	WG1094256
Manganese,Dissolved	0.0255		0.000250	0.00500	1	04/12/2018 03:43	WG1094249
Potassium	0.235	B J	0.0370	1.00	1	04/12/2018 14:33	WG1096943
Selenium	0.000402	J	0.000380	0.00200	1	04/11/2018 23:17	WG1094256
Selenium,Dissolved	0.000756	J	0.000380	0.00200	1	04/12/2018 03:43	WG1094249
Sodium	106		0.110	1.00	1	04/11/2018 23:17	WG1094256

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	25.4		3.14	10.0	100	04/06/2018 19:47	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.4*			*77.0-122*		*04/06/2018 19:47*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.500	2.50	50	04/05/2018 23:05	WG1094402
Benzene	3.17		0.0166	0.0500	50	04/05/2018 23:05	WG1094402
Bromodichloromethane	U		0.0190	0.0500	50	04/05/2018 23:05	WG1094402
Bromoform	U		0.0234	0.0500	50	04/05/2018 23:05	WG1094402
Bromomethane	U		0.0433	0.250	50	04/05/2018 23:05	WG1094402
n-Butylbenzene	U		0.0180	0.0500	50	04/05/2018 23:05	WG1094402

MW-98
Collected date/time: 04/03/18 13:20

SAMPLE RESULTS - 21
L983365

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	U		0.0182	0.0500	50	04/05/2018 23:05	WG1094402
Carbon disulfide	U		0.0138	0.0500	50	04/05/2018 23:05	WG1094402
Carbon tetrachloride	U		0.0190	0.0500	50	04/05/2018 23:05	WG1094402
Chlorobenzene	U		0.0174	0.0500	50	04/05/2018 23:05	WG1094402
Chlorodibromomethane	U		0.0164	0.0500	50	04/05/2018 23:05	WG1094402
Chloroethane	U		0.0226	0.250	50	04/05/2018 23:05	WG1094402
Chloroform	U		0.0162	0.250	50	04/05/2018 23:05	WG1094402
Chloromethane	U		0.0138	0.125	50	04/05/2018 23:05	WG1094402
1,2-Dibromoethane	U		0.0190	0.0500	50	04/05/2018 23:05	WG1094402
1,1-Dichloroethane	U		0.0130	0.0500	50	04/05/2018 23:05	WG1094402
1,2-Dichloroethane	U		0.0180	0.0500	50	04/05/2018 23:05	WG1094402
1,1-Dichloroethene	U		0.0199	0.0500	50	04/05/2018 23:05	WG1094402
cis-1,2-Dichloroethene	U		0.0130	0.0500	50	04/05/2018 23:05	WG1094402
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	04/05/2018 23:05	WG1094402
1,2-Dichloropropane	U		0.0153	0.0500	50	04/05/2018 23:05	WG1094402
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	04/05/2018 23:05	WG1094402
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	04/05/2018 23:05	WG1094402
Ethylbenzene	1.08		0.0192	0.0500	50	04/05/2018 23:05	WG1094402
Isopropylbenzene	0.102		0.0163	0.0500	50	04/05/2018 23:05	WG1094402
p-Isopropyltoluene	U		0.0175	0.0500	50	04/05/2018 23:05	WG1094402
2-Butanone (MEK)	U		0.196	0.500	50	04/05/2018 23:05	WG1094402
2-Hexanone	U		0.191	0.500	50	04/05/2018 23:05	WG1094402
Methylene Chloride	U		0.0500	0.250	50	04/05/2018 23:05	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	04/05/2018 23:05	WG1094402
Methyl tert-butyl ether	U		0.0184	0.0500	50	04/05/2018 23:05	WG1094402
Naphthalene	0.327		0.0500	0.250	50	04/05/2018 23:05	WG1094402
n-Propylbenzene	0.141		0.0174	0.0500	50	04/05/2018 23:05	WG1094402
Styrene	U		0.0154	0.0500	50	04/05/2018 23:05	WG1094402
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	04/05/2018 23:05	WG1094402
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	04/05/2018 23:05	WG1094402
Tetrachloroethene	U		0.0186	0.0500	50	04/05/2018 23:05	WG1094402
Toluene	0.282		0.0206	0.0500	50	04/05/2018 23:05	WG1094402
1,1,1-Trichloroethane	U		0.0160	0.0500	50	04/05/2018 23:05	WG1094402
1,1,2-Trichloroethane	U		0.0192	0.0500	50	04/05/2018 23:05	WG1094402
Trichloroethene	U		0.0199	0.0500	50	04/05/2018 23:05	WG1094402
1,2,4-Trimethylbenzene	0.475		0.0186	0.0500	50	04/05/2018 23:05	WG1094402
1,3,5-Trimethylbenzene	0.116		0.0194	0.0500	50	04/05/2018 23:05	WG1094402
Vinyl chloride	U		0.0130	0.0500	50	04/05/2018 23:05	WG1094402
o-Xylene	0.0245	J	0.0170	0.0500	50	04/05/2018 23:05	WG1094402
m&p-Xylene	1.88		0.0360	0.100	50	04/05/2018 23:05	WG1094402
Xylenes, Total	1.90		0.0530	0.150	50	04/05/2018 23:05	WG1094402
(S) Toluene-d8	*103*			*80.0-120*		*04/05/2018 23:05*	WG1094402
(S) Dibromofluoromethane	*108*			*76.0-123*		*04/05/2018 23:05*	WG1094402
(S) 4-Bromofluorobenzene	*117*			*80.0-120*		*04/05/2018 23:05*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.78		0.0247	0.100	1	04/10/2018 00:54	WG1094422
(S) o-Terphenyl	*95.9*			*31.0-160*		*04/10/2018 00:54*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2180		2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		1.97	10.0	100	04/09/2018 15:44	WG1094866

Sample Narrative:

L983365-22 WG1094866: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	211		0.519	10.0	10	04/06/2018 11:42	WG1094255
Fluoride	1.29		0.00990	0.100	1	04/06/2018 11:26	WG1094255
Sulfate	1220		1.55	100	20	04/07/2018 22:15	WG1094922

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0152		0.000250	0.00200	1	04/11/2018 23:21	WG1094256
Arsenic,Dissolved	0.0143		0.000250	0.00200	1	04/12/2018 03:47	WG1094249
Barium	0.0277		0.000360	0.00500	1	04/11/2018 23:21	WG1094256
Barium,Dissolved	0.0321		0.000360	0.00500	1	04/12/2018 03:47	WG1094249
Calcium	341		0.0460	1.00	1	04/11/2018 23:21	WG1094256
Chromium	0.00136	J J3 J4	0.000540	0.00200	1	04/11/2018 23:21	WG1094256
Chromium,Dissolved	0.00245		0.000540	0.00200	1	04/12/2018 03:47	WG1094249
Iron	0.0688	J	0.0150	0.100	1	04/11/2018 23:21	WG1094256
Iron,Dissolved	0.0232	B J	0.0150	0.100	1	04/12/2018 03:47	WG1094249
Lead	0.00240		0.000240	0.00200	1	04/11/2018 23:21	WG1094256
Lead,Dissolved	0.00198	J	0.000240	0.00200	1	04/12/2018 03:47	WG1094249
Manganese	0.00677		0.000250	0.00500	1	04/11/2018 23:21	WG1094256
Manganese,Dissolved	0.00685		0.000250	0.00500	1	04/12/2018 03:47	WG1094249
Potassium	2.38		0.0370	1.00	1	04/12/2018 14:37	WG1096943
Selenium	0.000564	J	0.000380	0.00200	1	04/11/2018 23:21	WG1094256
Selenium,Dissolved	0.00459		0.000380	0.00200	1	04/12/2018 03:47	WG1094249
Sodium	280		0.110	1.00	1	04/11/2018 23:21	WG1094256

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	25.9		3.14	10.0	100	04/06/2018 20:10	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.1*			*77.0-122*		*04/06/2018 20:10*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		2.00	10.0	200	04/10/2018 21:09	WG1094402
Benzene	8.13		0.0662	0.200	200	04/10/2018 21:09	WG1094402
Bromodichloromethane	U		0.0760	0.200	200	04/10/2018 21:09	WG1094402
Bromoform	U		0.0938	0.200	200	04/10/2018 21:09	WG1094402
Bromomethane	U		0.173	1.00	200	04/10/2018 21:09	WG1094402
n-Butylbenzene	U		0.0722	0.200	200	04/10/2018 21:09	WG1094402

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	U		0.0730	0.200	200	04/10/2018 21:09	WG1094402
Carbon disulfide	U		0.0550	0.200	200	04/10/2018 21:09	WG1094402
Carbon tetrachloride	U		0.0758	0.200	200	04/10/2018 21:09	WG1094402
Chlorobenzene	U		0.0696	0.200	200	04/10/2018 21:09	WG1094402
Chlorodibromomethane	U		0.0654	0.200	200	04/10/2018 21:09	WG1094402
Chloroethane	U		0.0906	1.00	200	04/10/2018 21:09	WG1094402
Chloroform	U		0.0648	1.00	200	04/10/2018 21:09	WG1094402
Chloromethane	U		0.0552	0.500	200	04/10/2018 21:09	WG1094402
1,2-Dibromoethane	U		0.0762	0.200	200	04/10/2018 21:09	WG1094402
1,1-Dichloroethane	U		0.0518	0.200	200	04/10/2018 21:09	WG1094402
1,2-Dichloroethane	U		0.0722	0.200	200	04/10/2018 21:09	WG1094402
1,1-Dichloroethene	U		0.0796	0.200	200	04/10/2018 21:09	WG1094402
cis-1,2-Dichloroethene	U		0.0520	0.200	200	04/10/2018 21:09	WG1094402
trans-1,2-Dichloroethene	U		0.0792	0.200	200	04/10/2018 21:09	WG1094402
1,2-Dichloropropane	U		0.0612	0.200	200	04/10/2018 21:09	WG1094402
cis-1,3-Dichloropropene	U		0.0836	0.200	200	04/10/2018 21:09	WG1094402
trans-1,3-Dichloropropene	U		0.0838	0.200	200	04/10/2018 21:09	WG1094402
Ethylbenzene	0.0772	J	0.0768	0.200	200	04/10/2018 21:09	WG1094402
Isopropylbenzene	U		0.0652	0.200	200	04/10/2018 21:09	WG1094402
p-Isopropyltoluene	U		0.0700	0.200	200	04/10/2018 21:09	WG1094402
2-Butanone (MEK)	U		0.786	2.00	200	04/10/2018 21:09	WG1094402
2-Hexanone	U		0.764	2.00	200	04/10/2018 21:09	WG1094402
Methylene Chloride	U		0.200	1.00	200	04/10/2018 21:09	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.428	2.00	200	04/10/2018 21:09	WG1094402
Methyl tert-butyl ether	0.0813	J	0.0734	0.200	200	04/10/2018 21:09	WG1094402
Naphthalene	U		0.200	1.00	200	04/10/2018 21:09	WG1094402
n-Propylbenzene	U		0.0698	0.200	200	04/10/2018 21:09	WG1094402
Styrene	U		0.0614	0.200	200	04/10/2018 21:09	WG1094402
1,1,1,2-Tetrachloroethane	U		0.0770	0.200	200	04/10/2018 21:09	WG1094402
1,1,2,2-Tetrachloroethane	U		0.0260	0.200	200	04/10/2018 21:09	WG1094402
Tetrachloroethene	U		0.0744	0.200	200	04/10/2018 21:09	WG1094402
Toluene	0.237		0.0824	0.200	200	04/10/2018 21:09	WG1094402
1,1,1-Trichloroethane	U		0.0638	0.200	200	04/10/2018 21:09	WG1094402
1,1,2-Trichloroethane	U		0.0766	0.200	200	04/10/2018 21:09	WG1094402
Trichloroethene	U		0.0796	0.200	200	04/10/2018 21:09	WG1094402
1,2,4-Trimethylbenzene	0.110	J	0.0746	0.200	200	04/10/2018 21:09	WG1094402
1,3,5-Trimethylbenzene	U		0.0774	0.200	200	04/10/2018 21:09	WG1094402
Vinyl chloride	U		0.0518	0.200	200	04/10/2018 21:09	WG1094402
o-Xylene	U		0.0682	0.200	200	04/10/2018 21:09	WG1094402
m&p-Xylene	0.298	J	0.144	0.400	200	04/10/2018 21:09	WG1094402
Xylenes, Total	0.299	J	0.212	0.600	200	04/10/2018 21:09	WG1094402
(S) Toluene-d8	*105*			*80.0-120*		*04/10/2018 21:09*	WG1094402
(S) Dibromofluoromethane	*89.8*			*76.0-123*		*04/10/2018 21:09*	WG1094402
(S) 4-Bromofluorobenzene	*83.8*			*80.0-120*		*04/10/2018 21:09*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	9.31		0.0247	0.100	1	04/10/2018 23:21	WG1094422
(S) o-Terphenyl	*119*			*31.0-160*		*04/10/2018 23:21*	WG1094422

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5320		2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	9.78		0.0985	0.500	5	04/09/2018 15:45	WG1094866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	415		0.519	10.0	10	04/06/2018 12:28	WG1094255
Fluoride	2.12		0.00990	0.100	1	04/06/2018 11:57	WG1094255
Sulfate	3440		3.87	250	50	04/07/2018 22:52	WG1094922

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00391		0.000250	0.00200	1	04/11/2018 23:25	WG1094256
Arsenic,Dissolved	0.00326		0.000250	0.00200	1	04/11/2018 19:56	WG1094251
Barium	0.0130		0.000360	0.00500	1	04/11/2018 23:25	WG1094256
Barium,Dissolved	0.0128		0.000360	0.00500	1	04/11/2018 19:56	WG1094251
Calcium	558		0.0460	1.00	1	04/11/2018 23:25	WG1094256
Chromium	U	J3 J4	0.000540	0.00200	1	04/11/2018 23:25	WG1094256
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 19:56	WG1094251
Iron	0.323		0.0150	0.100	1	04/11/2018 23:25	WG1094256
Iron,Dissolved	0.165		0.0150	0.100	1	04/11/2018 19:56	WG1094251
Lead	0.000419	J	0.000240	0.00200	1	04/11/2018 23:25	WG1094256
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 19:56	WG1094251
Manganese	0.968		0.000250	0.00500	1	04/11/2018 23:25	WG1094256
Manganese,Dissolved	1.01		0.000250	0.00500	1	04/11/2018 19:56	WG1094251
Potassium	4.09		0.0370	1.00	1	04/12/2018 14:53	WG1096943
Selenium	0.00580		0.000380	0.00200	1	04/11/2018 23:25	WG1094256
Selenium,Dissolved	0.00415		0.000380	0.00200	1	04/11/2018 19:56	WG1094251
Sodium	531		0.110	1.00	1	04/11/2018 23:25	WG1094256

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/05/2018 23:45	WG1094402
Benzene	U		0.000331	0.00100	1	04/05/2018 23:45	WG1094402
Bromodichloromethane	U		0.000380	0.00100	1	04/05/2018 23:45	WG1094402
Bromoform	U		0.000469	0.00100	1	04/05/2018 23:45	WG1094402
Bromomethane	U		0.000866	0.00500	1	04/05/2018 23:45	WG1094402
n-Butylbenzene	U		0.000361	0.00100	1	04/05/2018 23:45	WG1094402
sec-Butylbenzene	U		0.000365	0.00100	1	04/05/2018 23:45	WG1094402
Carbon disulfide	U		0.000275	0.00100	1	04/05/2018 23:45	WG1094402
Carbon tetrachloride	U		0.000379	0.00100	1	04/05/2018 23:45	WG1094402
Chlorobenzene	U		0.000348	0.00100	1	04/05/2018 23:45	WG1094402
Chlorodibromomethane	U		0.000327	0.00100	1	04/05/2018 23:45	WG1094402
Chloroethane	U		0.000453	0.00500	1	04/05/2018 23:45	WG1094402
Chloroform	U		0.000324	0.00500	1	04/05/2018 23:45	WG1094402
Chloromethane	U		0.000276	0.00250	1	04/05/2018 23:45	WG1094402
1,2-Dibromoethane	U		0.000381	0.00100	1	04/05/2018 23:45	WG1094402
1,1-Dichloroethane	U		0.000259	0.00100	1	04/05/2018 23:45	WG1094402

MW-50

Collected date/time: 04/03/18 11:55

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L983365

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/05/2018 23:45	WG1094402
1,1-Dichloroethene	U		0.000398	0.00100	1	04/05/2018 23:45	WG1094402
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/05/2018 23:45	WG1094402
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/05/2018 23:45	WG1094402
1,2-Dichloropropane	U		0.000306	0.00100	1	04/05/2018 23:45	WG1094402
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/05/2018 23:45	WG1094402
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/05/2018 23:45	WG1094402
Ethylbenzene	U		0.000384	0.00100	1	04/05/2018 23:45	WG1094402
Isopropylbenzene	U		0.000326	0.00100	1	04/05/2018 23:45	WG1094402
p-Isopropyltoluene	U		0.000350	0.00100	1	04/05/2018 23:45	WG1094402
2-Butanone (MEK)	U		0.00393	0.0100	1	04/05/2018 23:45	WG1094402
2-Hexanone	U		0.00382	0.0100	1	04/05/2018 23:45	WG1094402
Methylene Chloride	U		0.00100	0.00500	1	04/05/2018 23:45	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/05/2018 23:45	WG1094402
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/05/2018 23:45	WG1094402
Naphthalene	U		0.00100	0.00500	1	04/05/2018 23:45	WG1094402
n-Propylbenzene	U		0.000349	0.00100	1	04/05/2018 23:45	WG1094402
Styrene	U		0.000307	0.00100	1	04/05/2018 23:45	WG1094402
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/05/2018 23:45	WG1094402
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/05/2018 23:45	WG1094402
Tetrachloroethene	U		0.000372	0.00100	1	04/05/2018 23:45	WG1094402
Toluene	U		0.000412	0.00100	1	04/05/2018 23:45	WG1094402
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/05/2018 23:45	WG1094402
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/05/2018 23:45	WG1094402
Trichloroethene	U		0.000398	0.00100	1	04/05/2018 23:45	WG1094402
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/05/2018 23:45	WG1094402
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/05/2018 23:45	WG1094402
Vinyl chloride	U		0.000259	0.00100	1	04/05/2018 23:45	WG1094402
o-Xylene	U		0.000341	0.00100	1	04/05/2018 23:45	WG1094402
m&p-Xylene	U		0.000719	0.00200	1	04/05/2018 23:45	WG1094402
Xylenes, Total	U		0.00106	0.00300	1	04/05/2018 23:45	WG1094402
(S) Toluene-d8	*102*			*80.0-120*		*04/05/2018 23:45*	WG1094402
(S) Dibromofluoromethane	*104*			*76.0-123*		*04/05/2018 23:45*	WG1094402
(S) 4-Bromofluorobenzene	*120*			*80.0-120*		*04/05/2018 23:45*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.489		0.0247	0.100	1	04/10/2018 23:38	WG1094422
(S) o-Terphenyl	*97.9*			*31.0-160*		*04/10/2018 23:38*	WG1094422

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1810		2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		1.97	10.0	100	04/09/2018 15:46	WG1094866

Sample Narrative:

L983365-24 WG1094866: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	255		0.519	10.0	10	04/07/2018 00:13	WG1094674
Fluoride	0.913		0.00990	0.100	1	04/07/2018 00:01	WG1094674
Sulfate	1030		1.55	100	20	04/12/2018 13:09	WG1097077

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0204		0.000250	0.00200	1	04/11/2018 23:29	WG1094256
Arsenic,Dissolved	0.00532		0.000250	0.00200	1	04/11/2018 20:00	WG1094251
Barium	0.0328		0.000360	0.00500	1	04/11/2018 23:29	WG1094256
Barium,Dissolved	0.0308		0.000360	0.00500	1	04/11/2018 20:00	WG1094251
Calcium	363		0.0460	1.00	1	04/11/2018 23:29	WG1094256
Chromium	0.000826	J J3 J4	0.000540	0.00200	1	04/11/2018 23:29	WG1094256
Chromium,Dissolved	0.000552	J	0.000540	0.00200	1	04/11/2018 20:00	WG1094251
Iron	1.50		0.0150	0.100	1	04/11/2018 23:29	WG1094256
Iron,Dissolved	0.0584	J	0.0150	0.100	1	04/11/2018 20:00	WG1094251
Lead	0.00156	J	0.000240	0.00200	1	04/11/2018 23:29	WG1094256
Lead,Dissolved	0.000322	J	0.000240	0.00200	1	04/11/2018 20:00	WG1094251
Manganese	0.0237		0.000250	0.00500	1	04/11/2018 23:29	WG1094256
Manganese,Dissolved	0.0124		0.000250	0.00500	1	04/11/2018 20:00	WG1094251
Potassium	2.24		0.0370	1.00	1	04/12/2018 14:57	WG1096943
Selenium	0.00213		0.000380	0.00200	1	04/11/2018 23:29	WG1094256
Selenium,Dissolved	0.00122	J	0.000380	0.00200	1	04/11/2018 20:00	WG1094251
Sodium	247		0.110	1.00	1	04/11/2018 23:29	WG1094256

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	6.05		0.0314	0.100	1	04/06/2018 20:32	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.8*			*77.0-122*		*04/06/2018 20:32*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 00:04	WG1094402
Benzene	1.52		0.0166	0.0500	50	04/10/2018 21:28	WG1094402
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 00:04	WG1094402
Bromoform	U		0.000469	0.00100	1	04/06/2018 00:04	WG1094402
Bromomethane	U		0.000866	0.00500	1	04/06/2018 00:04	WG1094402
n-Butylbenzene	0.00339		0.000361	0.00100	1	04/06/2018 00:04	WG1094402

RW-1

Collected date/time: 04/03/18 13:10

SAMPLE RESULTS - 24

L983365

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.00486		0.000365	0.00100	1	04/06/2018 00:04	WG1094402
Carbon disulfide	0.00134		0.000275	0.00100	1	04/06/2018 00:04	WG1094402
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 00:04	WG1094402
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 00:04	WG1094402
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 00:04	WG1094402
Chloroethane	U		0.000453	0.00500	1	04/06/2018 00:04	WG1094402
Chloroform	U		0.000324	0.00500	1	04/06/2018 00:04	WG1094402
Chloromethane	U		0.000276	0.00250	1	04/06/2018 00:04	WG1094402
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 00:04	WG1094402
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 00:04	WG1094402
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 00:04	WG1094402
1,1-Dichloroethene	0.00110		0.000398	0.00100	1	04/06/2018 00:04	WG1094402
cis-1,2-Dichloroethene	0.681		0.0130	0.0500	50	04/10/2018 21:28	WG1094402
trans-1,2-Dichloroethene	0.0173		0.000396	0.00100	1	04/06/2018 00:04	WG1094402
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 00:04	WG1094402
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 00:04	WG1094402
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 00:04	WG1094402
Ethylbenzene	0.0964		0.000384	0.00100	1	04/06/2018 00:04	WG1094402
Isopropylbenzene	0.0316		0.000326	0.00100	1	04/06/2018 00:04	WG1094402
p-Isopropyltoluene	0.00204		0.000350	0.00100	1	04/06/2018 00:04	WG1094402
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 00:04	WG1094402
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 00:04	WG1094402
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 00:04	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 00:04	WG1094402
Methyl tert-butyl ether	0.0292		0.000367	0.00100	1	04/06/2018 00:04	WG1094402
Naphthalene	0.0132		0.00100	0.00500	1	04/06/2018 00:04	WG1094402
n-Propylbenzene	0.0336		0.000349	0.00100	1	04/06/2018 00:04	WG1094402
Styrene	U		0.000307	0.00100	1	04/06/2018 00:04	WG1094402
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 00:04	WG1094402
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 00:04	WG1094402
Tetrachloroethene	0.00413		0.000372	0.00100	1	04/06/2018 00:04	WG1094402
Toluene	0.0176		0.000412	0.00100	1	04/06/2018 00:04	WG1094402
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 00:04	WG1094402
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 00:04	WG1094402
Trichloroethene	0.0169		0.000398	0.00100	1	04/06/2018 00:04	WG1094402
1,2,4-Trimethylbenzene	0.0303		0.000373	0.00100	1	04/06/2018 00:04	WG1094402
1,3,5-Trimethylbenzene	0.00550		0.000387	0.00100	1	04/06/2018 00:04	WG1094402
Vinyl chloride	0.00131		0.000259	0.00100	1	04/06/2018 00:04	WG1094402
o-Xylene	0.00282		0.000341	0.00100	1	04/06/2018 00:04	WG1094402
m&p-Xylene	0.0827		0.000719	0.00200	1	04/06/2018 00:04	WG1094402
Xylenes, Total	0.0855		0.00106	0.00300	1	04/06/2018 00:04	WG1094402
(S) Toluene-d8	*106*			*80.0-120*		*04/10/2018 21:28*	WG1094402
(S) Toluene-d8	*99.8*			*80.0-120*		*04/06/2018 00:04*	WG1094402
(S) Dibromofluoromethane	*90.1*			*76.0-123*		*04/10/2018 21:28*	WG1094402
(S) Dibromofluoromethane	*119*			*76.0-123*		*04/06/2018 00:04*	WG1094402
(S) 4-Bromofluorobenzene	*80.1*			*80.0-120*		*04/10/2018 21:28*	WG1094402
(S) 4-Bromofluorobenzene	*119*			*80.0-120*		*04/06/2018 00:04*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	8.92		0.0247	0.100	1	04/08/2018 07:11	WG1094423
(S) o-Terphenyl	*120*			*31.0-160*		*04/08/2018 07:11*	WG1094423

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2170	J3	2.82	10.0	1	04/10/2018 16:08	WG1095031

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		1.97	10.0	100	04/09/2018 15:47	WG1094866

Sample Narrative:

L983365-25 WG1094866: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	167		0.519	10.0	10	04/07/2018 00:38	WG1094674
Fluoride	1.31		0.00990	0.100	1	04/07/2018 00:26	WG1094674
Sulfate	961		0.774	50.0	10	04/07/2018 00:38	WG1094674

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00800		0.000250	0.00200	1	04/11/2018 23:33	WG1094256
Arsenic,Dissolved	0.00616		0.000250	0.00200	1	04/11/2018 20:04	WG1094251
Barium	0.0454		0.000360	0.00500	1	04/11/2018 23:33	WG1094256
Barium,Dissolved	0.0432		0.000360	0.00500	1	04/11/2018 20:04	WG1094251
Calcium	440		0.0460	1.00	1	04/11/2018 23:33	WG1094256
Chromium	U	J3 J4	0.000540	0.00200	1	04/11/2018 23:33	WG1094256
Chromium,Dissolved	0.00125	J	0.000540	0.00200	1	04/11/2018 20:04	WG1094251
Iron	0.0370	J	0.0150	0.100	1	04/11/2018 23:33	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 20:04	WG1094251
Lead	0.00365		0.000240	0.00200	1	04/11/2018 23:33	WG1094256
Lead,Dissolved	0.00312		0.000240	0.00200	1	04/11/2018 20:04	WG1094251
Manganese	0.00264	J	0.000250	0.00500	1	04/11/2018 23:33	WG1094256
Manganese,Dissolved	0.00285	J	0.000250	0.00500	1	04/11/2018 20:04	WG1094251
Potassium	0.513	B J	0.0370	1.00	1	04/12/2018 15:01	WG1096943
Selenium	U		0.000380	0.00200	1	04/11/2018 23:33	WG1094256
Selenium,Dissolved	0.000491	J	0.000380	0.00200	1	04/11/2018 20:04	WG1094251
Sodium	40.0		0.110	1.00	1	04/11/2018 23:33	WG1094256

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	17.2		3.14	10.0	100	04/06/2018 20:54	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.3*			*77.0-122*		*04/06/2018 20:54*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		1.00	5.00	100	04/06/2018 00:24	WG1094402
Benzene	2.41		0.0331	0.100	100	04/10/2018 21:47	WG1094402
Bromodichloromethane	U		0.0380	0.100	100	04/06/2018 00:24	WG1094402
Bromoform	U		0.0469	0.100	100	04/06/2018 00:24	WG1094402
Bromomethane	U		0.0866	0.500	100	04/06/2018 00:24	WG1094402
n-Butylbenzene	U		0.0361	0.100	100	04/06/2018 00:24	WG1094402

MW-91
Collected date/time: 04/03/18 13:55

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	U		0.0365	0.100	100	04/06/2018 00:24	WG1094402
Carbon disulfide	0.0336	J	0.0275	0.100	100	04/06/2018 00:24	WG1094402
Carbon tetrachloride	U		0.0379	0.100	100	04/06/2018 00:24	WG1094402
Chlorobenzene	U		0.0348	0.100	100	04/06/2018 00:24	WG1094402
Chlorodibromomethane	U		0.0327	0.100	100	04/06/2018 00:24	WG1094402
Chloroethane	U		0.0453	0.500	100	04/06/2018 00:24	WG1094402
Chloroform	U		0.0324	0.500	100	04/06/2018 00:24	WG1094402
Chloromethane	U		0.0276	0.250	100	04/06/2018 00:24	WG1094402
1,2-Dibromoethane	U		0.0381	0.100	100	04/06/2018 00:24	WG1094402
1,1-Dichloroethane	U		0.0259	0.100	100	04/06/2018 00:24	WG1094402
1,2-Dichloroethane	U		0.0361	0.100	100	04/06/2018 00:24	WG1094402
1,1-Dichloroethene	U		0.0398	0.100	100	04/06/2018 00:24	WG1094402
cis-1,2-Dichloroethene	U		0.0260	0.100	100	04/10/2018 21:47	WG1094402
trans-1,2-Dichloroethene	U		0.0396	0.100	100	04/06/2018 00:24	WG1094402
1,2-Dichloropropane	U		0.0306	0.100	100	04/06/2018 00:24	WG1094402
cis-1,3-Dichloropropene	U		0.0418	0.100	100	04/06/2018 00:24	WG1094402
trans-1,3-Dichloropropene	U		0.0419	0.100	100	04/06/2018 00:24	WG1094402
Ethylbenzene	0.258		0.0384	0.100	100	04/06/2018 00:24	WG1094402
Isopropylbenzene	0.106		0.0326	0.100	100	04/06/2018 00:24	WG1094402
p-Isopropyltoluene	U		0.0350	0.100	100	04/06/2018 00:24	WG1094402
2-Butanone (MEK)	U		0.393	1.00	100	04/06/2018 00:24	WG1094402
2-Hexanone	U		0.382	1.00	100	04/06/2018 00:24	WG1094402
Methylene Chloride	U		0.100	0.500	100	04/06/2018 00:24	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	04/06/2018 00:24	WG1094402
Methyl tert-butyl ether	U		0.0367	0.100	100	04/06/2018 00:24	WG1094402
Naphthalene	0.136	J	0.100	0.500	100	04/06/2018 00:24	WG1094402
n-Propylbenzene	0.122		0.0349	0.100	100	04/06/2018 00:24	WG1094402
Styrene	U		0.0307	0.100	100	04/06/2018 00:24	WG1094402
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	04/06/2018 00:24	WG1094402
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	04/06/2018 00:24	WG1094402
Tetrachloroethene	U		0.0372	0.100	100	04/06/2018 00:24	WG1094402
Toluene	1.23		0.0412	0.100	100	04/06/2018 00:24	WG1094402
1,1,1-Trichloroethane	U		0.0319	0.100	100	04/06/2018 00:24	WG1094402
1,1,2-Trichloroethane	U		0.0383	0.100	100	04/06/2018 00:24	WG1094402
Trichloroethene	U		0.0398	0.100	100	04/06/2018 00:24	WG1094402
1,2,4-Trimethylbenzene	0.214		0.0373	0.100	100	04/06/2018 00:24	WG1094402
1,3,5-Trimethylbenzene	0.0671	J	0.0387	0.100	100	04/06/2018 00:24	WG1094402
Vinyl chloride	U		0.0259	0.100	100	04/06/2018 00:24	WG1094402
o-Xylene	0.138		0.0341	0.100	100	04/06/2018 00:24	WG1094402
m&p-Xylene	0.559		0.0719	0.200	100	04/06/2018 00:24	WG1094402
Xylenes, Total	0.697		0.106	0.300	100	04/06/2018 00:24	WG1094402
(S) Toluene-d8	*103*			*80.0-120*		*04/06/2018 00:24*	WG1094402
(S) Toluene-d8	*105*			*80.0-120*		*04/10/2018 21:47*	WG1094402
(S) Dibromofluoromethane	*90.6*			*76.0-123*		*04/10/2018 21:47*	WG1094402
(S) Dibromofluoromethane	*106*			*76.0-123*		*04/06/2018 00:24*	WG1094402
(S) 4-Bromofluorobenzene	*82.2*			*80.0-120*		*04/10/2018 21:47*	WG1094402
(S) 4-Bromofluorobenzene	*119*			*80.0-120*		*04/06/2018 00:24*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	8.33		0.0247	0.100	1	04/08/2018 07:31	WG1094423
(S) o-Terphenyl	*113*			*31.0-160*		*04/08/2018 07:31*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2510		2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.197	1.00	10	04/09/2018 15:48	WG1094866

Sample Narrative:

L983365-26 WG1094866: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	166		1.04	20.0	20	04/07/2018 01:28	WG1094674
Fluoride	2.11		0.00990	0.100	1	04/07/2018 00:51	WG1094674
Sulfate	1620		1.55	100	20	04/07/2018 01:28	WG1094674

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00307		0.000250	0.00200	1	04/11/2018 23:51	WG1094256
Arsenic,Dissolved	0.00225		0.000250	0.00200	1	04/11/2018 20:08	WG1094251
Barium	0.0170		0.000360	0.00500	1	04/11/2018 23:51	WG1094256
Barium,Dissolved	0.0166		0.000360	0.00500	1	04/11/2018 20:08	WG1094251
Calcium	300		0.0460	1.00	1	04/11/2018 23:51	WG1094256
Chromium	U	J3 J4	0.000540	0.00200	1	04/11/2018 23:51	WG1094256
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 20:08	WG1094251
Iron	0.0329	J	0.0150	0.100	1	04/11/2018 23:51	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 20:08	WG1094251
Lead	U		0.000240	0.00200	1	04/11/2018 23:51	WG1094256
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 20:08	WG1094251
Manganese	0.0329		0.000250	0.00500	1	04/11/2018 23:51	WG1094256
Manganese,Dissolved	0.0330		0.000250	0.00500	1	04/11/2018 20:08	WG1094251
Potassium	1.16	B	0.0370	1.00	1	04/12/2018 15:05	WG1096943
Selenium	0.000532	J	0.000380	0.00200	1	04/11/2018 23:51	WG1094256
Selenium,Dissolved	0.000611	J	0.000380	0.00200	1	04/11/2018 20:08	WG1094251
Sodium	200		0.110	1.00	1	04/11/2018 23:51	WG1094256

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.354		0.0314	0.100	1	04/06/2018 21:16	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.8*			*77.0-122*		*04/06/2018 21:16*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 00:44	WG1094402
Benzene	0.000758	J	0.000331	0.00100	1	04/11/2018 21:01	WG1094402
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 00:44	WG1094402
Bromoform	U		0.000469	0.00100	1	04/06/2018 00:44	WG1094402
Bromomethane	U		0.000866	0.00500	1	04/06/2018 00:44	WG1094402
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 00:44	WG1094402

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
sec-Butylbenzene	0.00471		0.000365	0.00100	1	04/06/2018 00:44	WG1094402
Carbon disulfide	0.000427	J	0.000275	0.00100	1	04/06/2018 00:44	WG1094402
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 00:44	WG1094402
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 00:44	WG1094402
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 00:44	WG1094402
Chloroethane	U		0.000453	0.00500	1	04/06/2018 00:44	WG1094402
Chloroform	U		0.000324	0.00500	1	04/06/2018 00:44	WG1094402
Chloromethane	U		0.000276	0.00250	1	04/06/2018 00:44	WG1094402
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 00:44	WG1094402
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 00:44	WG1094402
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 00:44	WG1094402
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 00:44	WG1094402
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/11/2018 21:01	WG1094402
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 00:44	WG1094402
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 00:44	WG1094402
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 00:44	WG1094402
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 00:44	WG1094402
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 00:44	WG1094402
Isopropylbenzene	0.0321		0.000326	0.00100	1	04/06/2018 00:44	WG1094402
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 00:44	WG1094402
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 00:44	WG1094402
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 00:44	WG1094402
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 00:44	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 00:44	WG1094402
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 00:44	WG1094402
Naphthalene	U		0.00100	0.00500	1	04/06/2018 00:44	WG1094402
n-Propylbenzene	0.000888	J	0.000349	0.00100	1	04/06/2018 00:44	WG1094402
Styrene	U		0.000307	0.00100	1	04/06/2018 00:44	WG1094402
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 00:44	WG1094402
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 00:44	WG1094402
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 00:44	WG1094402
Toluene	U		0.000412	0.00100	1	04/06/2018 00:44	WG1094402
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 00:44	WG1094402
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 00:44	WG1094402
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 00:44	WG1094402
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 00:44	WG1094402
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 00:44	WG1094402
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 00:44	WG1094402
o-Xylene	U		0.000341	0.00100	1	04/06/2018 00:44	WG1094402
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 00:44	WG1094402
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 00:44	WG1094402
(S) Toluene-d8	*104*			*80.0-120*		*04/06/2018 00:44*	WG1094402
(S) Toluene-d8	*97.9*			*80.0-120*		*04/11/2018 21:01*	WG1094402
(S) Dibromofluoromethane	*106*			*76.0-123*		*04/06/2018 00:44*	WG1094402
(S) Dibromofluoromethane	*99.1*			*76.0-123*		*04/11/2018 21:01*	WG1094402
(S) 4-Bromofluorobenzene	*115*			*80.0-120*		*04/06/2018 00:44*	WG1094402
(S) 4-Bromofluorobenzene	*115*			*80.0-120*		*04/11/2018 21:01*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.29		0.0247	0.100	1	04/08/2018 07:51	WG1094423
(S) o-Terphenyl	*121*			*31.0-160*		*04/08/2018 07:51*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1450		2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		1.97	10.0	100	04/09/2018 15:54	WG1094866

Sample Narrative:

L983365-27 WG1094866: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	159		0.519	10.0	10	04/07/2018 01:53	WG1094674
Fluoride	1.18		0.00990	0.100	1	04/07/2018 01:40	WG1094674
Sulfate	178		0.774	50.0	10	04/07/2018 01:53	WG1094674

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00321		0.000250	0.00200	1	04/11/2018 23:55	WG1094256
Arsenic,Dissolved	0.00269		0.000250	0.00200	1	04/11/2018 20:12	WG1094251
Barium	0.124		0.000360	0.00500	1	04/11/2018 23:55	WG1094256
Barium,Dissolved	0.121		0.000360	0.00500	1	04/11/2018 20:12	WG1094251
Calcium	188		0.0460	1.00	1	04/11/2018 23:55	WG1094256
Chromium	0.000908	J J3 J4	0.000540	0.00200	1	04/11/2018 23:55	WG1094256
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 20:12	WG1094251
Iron	0.0251	J	0.0150	0.100	1	04/11/2018 23:55	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 20:12	WG1094251
Lead	0.000257	J	0.000240	0.00200	1	04/11/2018 23:55	WG1094256
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 20:12	WG1094251
Manganese	0.00146	J	0.000250	0.00500	1	04/11/2018 23:55	WG1094256
Manganese,Dissolved	0.000674	J	0.000250	0.00500	1	04/11/2018 20:12	WG1094251
Potassium	1.23		0.0370	1.00	1	04/12/2018 15:09	WG1096943
Selenium	U		0.000380	0.00200	1	04/11/2018 23:55	WG1094256
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 20:12	WG1094251
Sodium	229		0.110	1.00	1	04/11/2018 23:55	WG1094256

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	36.5		3.14	10.0	100	04/06/2018 21:38	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*97.2*			*77.0-122*		*04/06/2018 21:38*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.500	2.50	50	04/06/2018 01:04	WG1094402
Benzene	U		0.0166	0.0500	50	04/06/2018 01:04	WG1094402
Bromodichloromethane	U		0.0190	0.0500	50	04/06/2018 01:04	WG1094402
Bromoform	U		0.0234	0.0500	50	04/06/2018 01:04	WG1094402
Bromomethane	U		0.0433	0.250	50	04/06/2018 01:04	WG1094402
n-Butylbenzene	U		0.0180	0.0500	50	04/06/2018 01:04	WG1094402

MW-96

SAMPLE RESULTS - 27

Collected date/time: 04/03/18 15:15

L983365

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	U		0.0182	0.0500	50	04/06/2018 01:04	WG1094402
Carbon disulfide	U		0.0138	0.0500	50	04/06/2018 01:04	WG1094402
Carbon tetrachloride	U		0.0190	0.0500	50	04/06/2018 01:04	WG1094402
Chlorobenzene	U		0.0174	0.0500	50	04/06/2018 01:04	WG1094402
Chlorodibromomethane	U		0.0164	0.0500	50	04/06/2018 01:04	WG1094402
Chloroethane	U		0.0226	0.250	50	04/06/2018 01:04	WG1094402
Chloroform	U		0.0162	0.250	50	04/06/2018 01:04	WG1094402
Chloromethane	U		0.0138	0.125	50	04/06/2018 01:04	WG1094402
1,2-Dibromoethane	U		0.0190	0.0500	50	04/06/2018 01:04	WG1094402
1,1-Dichloroethane	U		0.0130	0.0500	50	04/06/2018 01:04	WG1094402
1,2-Dichloroethane	U		0.0180	0.0500	50	04/06/2018 01:04	WG1094402
1,1-Dichloroethene	U		0.0199	0.0500	50	04/06/2018 01:04	WG1094402
cis-1,2-Dichloroethene	U		0.0130	0.0500	50	04/06/2018 01:04	WG1094402
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	04/06/2018 01:04	WG1094402
1,2-Dichloropropane	U		0.0153	0.0500	50	04/06/2018 01:04	WG1094402
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	04/06/2018 01:04	WG1094402
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	04/06/2018 01:04	WG1094402
Ethylbenzene	U		0.0192	0.0500	50	04/06/2018 01:04	WG1094402
Isopropylbenzene	0.118		0.0163	0.0500	50	04/06/2018 01:04	WG1094402
p-Isopropyltoluene	U		0.0175	0.0500	50	04/06/2018 01:04	WG1094402
2-Butanone (MEK)	U		0.196	0.500	50	04/06/2018 01:04	WG1094402
2-Hexanone	U		0.191	0.500	50	04/06/2018 01:04	WG1094402
Methylene Chloride	U		0.0500	0.250	50	04/06/2018 01:04	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	04/06/2018 01:04	WG1094402
Methyl tert-butyl ether	29.4		0.367	1.00	1000	04/10/2018 22:24	WG1094402
Naphthalene	U		0.0500	0.250	50	04/06/2018 01:04	WG1094402
n-Propylbenzene	0.0996		0.0174	0.0500	50	04/06/2018 01:04	WG1094402
Styrene	U		0.0154	0.0500	50	04/06/2018 01:04	WG1094402
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	04/06/2018 01:04	WG1094402
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	04/06/2018 01:04	WG1094402
Tetrachloroethene	U		0.0186	0.0500	50	04/06/2018 01:04	WG1094402
Toluene	U		0.0206	0.0500	50	04/06/2018 01:04	WG1094402
1,1,1-Trichloroethane	U		0.0160	0.0500	50	04/06/2018 01:04	WG1094402
1,1,2-Trichloroethane	U		0.0192	0.0500	50	04/06/2018 01:04	WG1094402
Trichloroethene	U		0.0199	0.0500	50	04/06/2018 01:04	WG1094402
1,2,4-Trimethylbenzene	U		0.0186	0.0500	50	04/06/2018 01:04	WG1094402
1,3,5-Trimethylbenzene	U		0.0194	0.0500	50	04/06/2018 01:04	WG1094402
Vinyl chloride	U		0.0130	0.0500	50	04/06/2018 01:04	WG1094402
o-Xylene	U		0.0170	0.0500	50	04/06/2018 01:04	WG1094402
m&p-Xylene	U		0.0360	0.100	50	04/06/2018 01:04	WG1094402
Xylenes, Total	U		0.0530	0.150	50	04/06/2018 01:04	WG1094402
(S) Toluene-d8	*105*			*80.0-120*		*04/10/2018 22:24*	WG1094402
(S) Toluene-d8	*105*			*80.0-120*		*04/06/2018 01:04*	WG1094402
(S) Dibromofluoromethane	*107*			*76.0-123*		*04/06/2018 01:04*	WG1094402
(S) Dibromofluoromethane	*91.2*			*76.0-123*		*04/10/2018 22:24*	WG1094402
(S) 4-Bromofluorobenzene	*80.1*			*80.0-120*		*04/10/2018 22:24*	WG1094402
(S) 4-Bromofluorobenzene	*116*			*80.0-120*		*04/06/2018 01:04*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.65		0.0247	0.100	1	04/08/2018 08:11	WG1094423
(S) o-Terphenyl	*126*			*31.0-160*		*04/08/2018 08:11*	WG1094423

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1660		2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.197	1.00	10	04/09/2018 15:55	WG1094866

Sample Narrative:

L983365-28 WG1094866: Diluted due to sulfide interference

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.180	0.500	100	04/09/2018 15:39	WG1094972

Sample Narrative:

L983365-28 WG1094972: diluted due to matrix interference: high sulfide content

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	328		0.519	10.0	10	04/07/2018 02:17	WG1094674
Fluoride	0.636		0.00990	0.100	1	04/07/2018 02:05	WG1094674
Sulfate	404		0.774	50.0	10	04/07/2018 02:17	WG1094674

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	04/08/2018 19:12	WG1094325
Mercury,Dissolved	U		0.0000490	0.000200	1	04/08/2018 19:44	WG1094326

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.456		0.0126	0.200	1	04/08/2018 21:16	WG1094248
Boron,Dissolved	0.470		0.0126	0.200	1	04/10/2018 10:21	WG1094698

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0107		0.000250	0.00200	1	04/11/2018 23:59	WG1094256
Arsenic,Dissolved	0.00676		0.000250	0.00200	1	04/11/2018 20:16	WG1094251
Barium	0.120		0.000360	0.00500	1	04/11/2018 23:59	WG1094256
Barium,Dissolved	0.0921		0.000360	0.00500	1	04/11/2018 20:16	WG1094251
Cadmium	U		0.000160	0.00100	1	04/11/2018 23:59	WG1094256
Cadmium,Dissolved	U		0.000160	0.00100	1	04/11/2018 20:16	WG1094251
Calcium	220		0.0460	1.00	1	04/11/2018 23:59	WG1094256
Chromium	0.000927	J J3 J4	0.000540	0.00200	1	04/11/2018 23:59	WG1094256
Chromium,Dissolved	0.000938	J	0.000540	0.00200	1	04/11/2018 20:16	WG1094251
Cobalt	U		0.000260	0.00200	1	04/11/2018 23:59	WG1094256
Cobalt,Dissolved	U		0.000260	0.00200	1	04/11/2018 20:16	WG1094251
Iron	0.0743	J	0.0150	0.100	1	04/11/2018 23:59	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 20:16	WG1094251

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Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Lead	0.00171	J	0.000240	0.00200	1	04/11/2018 23:59	WG1094256
Lead,Dissolved	0.000391	J	0.000240	0.00200	1	04/11/2018 20:16	WG1094251
Manganese	0.0943		0.000250	0.00500	1	04/11/2018 23:59	WG1094256
Manganese,Dissolved	0.0930		0.000250	0.00500	1	04/11/2018 20:16	WG1094251
Nickel	0.000828	J	0.000350	0.00200	1	04/11/2018 23:59	WG1094256
Nickel,Dissolved	0.000912	J	0.000350	0.00200	1	04/11/2018 20:16	WG1094251
Potassium	0.573	B J	0.0370	1.00	1	04/12/2018 15:13	WG1096943
Selenium	0.000518	J	0.000380	0.00200	1	04/11/2018 23:59	WG1094256
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 20:16	WG1094251
Sodium	245		0.110	1.00	1	04/11/2018 23:59	WG1094256
Uranium	U		0.000330	0.0100	1	04/11/2018 23:59	WG1094256
Uranium,Dissolved	U		0.000330	0.0100	1	04/11/2018 20:16	WG1094251
Vanadium	0.000584	J	0.000180	0.00500	1	04/11/2018 23:59	WG1094256
Vanadium,Dissolved	0.000590	J	0.000180	0.00500	1	04/11/2018 20:16	WG1094251

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.53		0.0314	0.100	1	04/06/2018 22:00	WG1094444
(S) a,a,a-Trifluorotoluene(FID)	*98.9*			*77.0-122*		*04/06/2018 22:00*	WG1094444

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	04/11/2018 21:21	WG1094402
Benzene	0.147		0.00166	0.00500	5	04/11/2018 21:21	WG1094402
Bromodichloromethane	U		0.00190	0.00500	5	04/11/2018 21:21	WG1094402
Bromoform	U		0.00234	0.00500	5	04/11/2018 21:21	WG1094402
Bromomethane	U		0.00433	0.0250	5	04/11/2018 21:21	WG1094402
n-Butylbenzene	0.00588		0.00180	0.00500	5	04/11/2018 21:21	WG1094402
sec-Butylbenzene	0.00834		0.00182	0.00500	5	04/11/2018 21:21	WG1094402
Carbon disulfide	U		0.00138	0.00500	5	04/11/2018 21:21	WG1094402
Carbon tetrachloride	U		0.00190	0.00500	5	04/11/2018 21:21	WG1094402
Chlorobenzene	U		0.00174	0.00500	5	04/11/2018 21:21	WG1094402
Chlorodibromomethane	U		0.00164	0.00500	5	04/11/2018 21:21	WG1094402
Chloroethane	U		0.00226	0.0250	5	04/11/2018 21:21	WG1094402
Chloroform	U		0.00162	0.0250	5	04/11/2018 21:21	WG1094402
Chloromethane	U		0.00138	0.0125	5	04/11/2018 21:21	WG1094402
1,2-Dibromoethane	U		0.00190	0.00500	5	04/11/2018 21:21	WG1094402
1,1-Dichloroethane	U		0.00130	0.00500	5	04/11/2018 21:21	WG1094402
1,2-Dichloroethane	U		0.00180	0.00500	5	04/11/2018 21:21	WG1094402
1,1-Dichloroethene	U		0.00199	0.00500	5	04/11/2018 21:21	WG1094402
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	04/11/2018 21:21	WG1094402
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	04/11/2018 21:21	WG1094402
1,2-Dichloropropane	U		0.00153	0.00500	5	04/11/2018 21:21	WG1094402
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	04/11/2018 21:21	WG1094402
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	04/11/2018 21:21	WG1094402
Ethylbenzene	0.00500		0.00192	0.00500	5	04/11/2018 21:21	WG1094402
Isopropylbenzene	0.0470		0.00163	0.00500	5	04/11/2018 21:21	WG1094402
p-Isopropyltoluene	0.00191	J	0.00175	0.00500	5	04/11/2018 21:21	WG1094402
2-Butanone (MEK)	U		0.0196	0.0500	5	04/11/2018 21:21	WG1094402
2-Hexanone	U		0.0191	0.0500	5	04/11/2018 21:21	WG1094402
Methylene Chloride	U		0.00500	0.0250	5	04/11/2018 21:21	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	04/11/2018 21:21	WG1094402
Methyl tert-butyl ether	0.219		0.00184	0.00500	5	04/11/2018 21:21	WG1094402

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Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Naphthalene	U		0.00500	0.0250	5	04/11/2018 21:21	WG1094402
n-Propylbenzene	0.0323		0.00174	0.00500	5	04/11/2018 21:21	WG1094402
Styrene	U		0.00154	0.00500	5	04/11/2018 21:21	WG1094402
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	04/11/2018 21:21	WG1094402
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	04/11/2018 21:21	WG1094402
Tetrachloroethene	U		0.00186	0.00500	5	04/11/2018 21:21	WG1094402
Toluene	0.00261	J	0.00206	0.00500	5	04/11/2018 21:21	WG1094402
1,1,1-Trichloroethane	U		0.00160	0.00500	5	04/11/2018 21:21	WG1094402
1,1,2-Trichloroethane	U		0.00192	0.00500	5	04/11/2018 21:21	WG1094402
Trichloroethene	U		0.00199	0.00500	5	04/11/2018 21:21	WG1094402
1,2,4-Trimethylbenzene	0.00206	J	0.00186	0.00500	5	04/11/2018 21:21	WG1094402
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	04/11/2018 21:21	WG1094402
Vinyl chloride	U		0.00130	0.00500	5	04/11/2018 21:21	WG1094402
o-Xylene	U		0.00170	0.00500	5	04/11/2018 21:21	WG1094402
m&p-Xylene	0.00916	J	0.00360	0.0100	5	04/11/2018 21:21	WG1094402
Xylenes, Total	0.00916	J	0.00530	0.0150	5	04/11/2018 21:21	WG1094402
(S) Toluene-d8	*95.1*			*80.0-120*		*04/11/2018 21:21*	WG1094402
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/11/2018 21:21*	WG1094402
(S) 4-Bromofluorobenzene	*113*			*80.0-120*		*04/11/2018 21:21*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.25		0.0247	0.100	1	04/08/2018 08:31	WG1094423
(S) o-Terphenyl	*111*			*31.0-160*		*04/08/2018 08:31*	WG1094423

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4430		2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0920	J	0.0197	0.100	1	04/09/2018 15:56	WG1094866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	358		1.04	20.0	20	04/07/2018 02:42	WG1094674
Fluoride	2.31		0.00990	0.100	1	04/07/2018 02:30	WG1094674
Sulfate	3080		3.87	250	50	04/10/2018 01:35	WG1095383

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0106		0.000250	0.00200	1	04/12/2018 00:03	WG1094256
Arsenic,Dissolved	0.0102		0.000250	0.00200	1	04/11/2018 20:20	WG1094251
Barium	0.0232		0.000360	0.00500	1	04/12/2018 00:03	WG1094256
Barium,Dissolved	0.0217		0.000360	0.00500	1	04/11/2018 20:20	WG1094251
Calcium	635		0.0460	1.00	1	04/12/2018 00:03	WG1094256
Chromium	U	J3 J4	0.000540	0.00200	1	04/12/2018 00:03	WG1094256
Chromium,Dissolved	0.000940	J	0.000540	0.00200	1	04/11/2018 20:20	WG1094251
Iron	0.0346	J	0.0150	0.100	1	04/12/2018 00:03	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 20:20	WG1094251
Lead	0.00975		0.000240	0.00200	1	04/12/2018 00:03	WG1094256
Lead,Dissolved	0.00688		0.000240	0.00200	1	04/11/2018 20:20	WG1094251
Manganese	0.767		0.000250	0.00500	1	04/12/2018 00:03	WG1094256
Manganese,Dissolved	0.748		0.000250	0.00500	1	04/11/2018 20:20	WG1094251
Potassium	3.87		0.0370	1.00	1	04/12/2018 15:17	WG1096943
Selenium	0.00322		0.000380	0.00200	1	04/12/2018 00:03	WG1094256
Selenium,Dissolved	0.00305		0.000380	0.00200	1	04/11/2018 20:20	WG1094251
Sodium	345		0.110	1.00	1	04/12/2018 00:03	WG1094256

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0927	J	0.0314	0.100	1	04/06/2018 11:07	WG1094454
(S) a,a,a-Trifluorotoluene(FID)	*115*			*77.0-122*		*04/06/2018 11:07*	WG1094454

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 01:44	WG1094402
Benzene	U		0.000331	0.00100	1	04/06/2018 01:44	WG1094402
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 01:44	WG1094402
Bromoform	U		0.000469	0.00100	1	04/06/2018 01:44	WG1094402
Bromomethane	U		0.000866	0.00500	1	04/06/2018 01:44	WG1094402
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 01:44	WG1094402
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 01:44	WG1094402
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 01:44	WG1094402
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 01:44	WG1094402

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 01:44	WG1094402
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 01:44	WG1094402
Chloroethane	U		0.000453	0.00500	1	04/06/2018 01:44	WG1094402
Chloroform	U		0.000324	0.00500	1	04/06/2018 01:44	WG1094402
Chloromethane	U		0.000276	0.00250	1	04/06/2018 01:44	WG1094402
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 01:44	WG1094402
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 01:44	WG1094402
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 01:44	WG1094402
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 01:44	WG1094402
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 01:44	WG1094402
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 01:44	WG1094402
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 01:44	WG1094402
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 01:44	WG1094402
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 01:44	WG1094402
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 01:44	WG1094402
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 01:44	WG1094402
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 01:44	WG1094402
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 01:44	WG1094402
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 01:44	WG1094402
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 01:44	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 01:44	WG1094402
Methyl tert-butyl ether	0.107		0.000367	0.00100	1	04/06/2018 01:44	WG1094402
Naphthalene	U		0.00100	0.00500	1	04/06/2018 01:44	WG1094402
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 01:44	WG1094402
Styrene	U		0.000307	0.00100	1	04/06/2018 01:44	WG1094402
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 01:44	WG1094402
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 01:44	WG1094402
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 01:44	WG1094402
Toluene	U		0.000412	0.00100	1	04/06/2018 01:44	WG1094402
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 01:44	WG1094402
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 01:44	WG1094402
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 01:44	WG1094402
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 01:44	WG1094402
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 01:44	WG1094402
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 01:44	WG1094402
o-Xylene	U		0.000341	0.00100	1	04/06/2018 01:44	WG1094402
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 01:44	WG1094402
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 01:44	WG1094402
(S) Toluene-d8	*106*			*80.0-120*		*04/06/2018 01:44*	WG1094402
(S) Dibromofluoromethane	*106*			*76.0-123*		*04/06/2018 01:44*	WG1094402
(S) 4-Bromofluorobenzene	*116*			*80.0-120*		*04/06/2018 01:44*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.57		0.0247	0.100	1	04/08/2018 08:52	WG1094423
(S) o-Terphenyl	*111*			*31.0-160*		*04/08/2018 08:52*	WG1094423

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1110		2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0985	0.500	5	04/09/2018 15:57	WG1094866

Sample Narrative:

L983365-30 WG1094866: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	106		0.519	10.0	10	04/07/2018 03:07	WG1094674
Fluoride	1.75		0.00990	0.100	1	04/07/2018 02:55	WG1094674
Sulfate	437		0.774	50.0	10	04/07/2018 03:07	WG1094674

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0213		0.000250	0.00200	1	04/12/2018 00:07	WG1094256
Arsenic,Dissolved	0.0205		0.000250	0.00200	1	04/11/2018 20:24	WG1094251
Barium	0.0346		0.000360	0.00500	1	04/12/2018 00:07	WG1094256
Barium,Dissolved	0.0322		0.000360	0.00500	1	04/11/2018 20:24	WG1094251
Calcium	229		0.0460	1.00	1	04/12/2018 00:07	WG1094256
Chromium	0.00103	B J	0.000540	0.00200	1	04/12/2018 15:20	WG1096943
Chromium,Dissolved	0.000578	J	0.000540	0.00200	1	04/11/2018 20:24	WG1094251
Iron	0.231		0.0150	0.100	1	04/12/2018 00:07	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 20:24	WG1094251
Lead	U		0.000240	0.00200	1	04/12/2018 00:07	WG1094256
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 20:24	WG1094251
Manganese	0.00567		0.000250	0.00500	1	04/12/2018 00:07	WG1094256
Manganese,Dissolved	0.00432	J	0.000250	0.00500	1	04/11/2018 20:24	WG1094251
Potassium	7.12		0.0370	1.00	1	04/12/2018 15:20	WG1096943
Selenium	0.000732	J	0.000380	0.00200	1	04/12/2018 00:07	WG1094256
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 20:24	WG1094251
Sodium	76.8		0.110	1.00	1	04/12/2018 00:07	WG1094256

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	1.53		0.0314	0.100	1	04/06/2018 11:31	WG1094454
(S) a,a,a-Trifluorotoluene(FID)	*112*			*77.0-122*		*04/06/2018 11:31*	WG1094454

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0500	0.250	5	04/06/2018 02:04	WG1094402
Benzene	0.139		0.00166	0.00500	5	04/06/2018 02:04	WG1094402
Bromodichloromethane	U		0.00190	0.00500	5	04/06/2018 02:04	WG1094402
Bromoform	U		0.00234	0.00500	5	04/06/2018 02:04	WG1094402
Bromomethane	U		0.00433	0.0250	5	04/06/2018 02:04	WG1094402
n-Butylbenzene	U		0.00180	0.00500	5	04/06/2018 02:04	WG1094402

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.0292		0.00182	0.00500	5	04/06/2018 02:04	WG1094402
Carbon disulfide	0.00144	J	0.00138	0.00500	5	04/06/2018 02:04	WG1094402
Carbon tetrachloride	U		0.00190	0.00500	5	04/06/2018 02:04	WG1094402
Chlorobenzene	U		0.00174	0.00500	5	04/06/2018 02:04	WG1094402
Chlorodibromomethane	U		0.00164	0.00500	5	04/06/2018 02:04	WG1094402
Chloroethane	U		0.00226	0.0250	5	04/06/2018 02:04	WG1094402
Chloroform	U		0.00162	0.0250	5	04/06/2018 02:04	WG1094402
Chloromethane	U		0.00138	0.0125	5	04/06/2018 02:04	WG1094402
1,2-Dibromoethane	U		0.00190	0.00500	5	04/06/2018 02:04	WG1094402
1,1-Dichloroethane	U		0.00130	0.00500	5	04/06/2018 02:04	WG1094402
1,2-Dichloroethane	U		0.00180	0.00500	5	04/06/2018 02:04	WG1094402
1,1-Dichloroethene	U		0.00199	0.00500	5	04/06/2018 02:04	WG1094402
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	04/06/2018 02:04	WG1094402
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	04/06/2018 02:04	WG1094402
1,2-Dichloropropane	U		0.00153	0.00500	5	04/06/2018 02:04	WG1094402
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	04/06/2018 02:04	WG1094402
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	04/06/2018 02:04	WG1094402
Ethylbenzene	U		0.00192	0.00500	5	04/06/2018 02:04	WG1094402
Isopropylbenzene	0.0393		0.00163	0.00500	5	04/06/2018 02:04	WG1094402
p-Isopropyltoluene	U		0.00175	0.00500	5	04/06/2018 02:04	WG1094402
2-Butanone (MEK)	U		0.0196	0.0500	5	04/06/2018 02:04	WG1094402
2-Hexanone	U		0.0191	0.0500	5	04/06/2018 02:04	WG1094402
Methylene Chloride	U		0.00500	0.0250	5	04/06/2018 02:04	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	04/06/2018 02:04	WG1094402
Methyl tert-butyl ether	0.00393	J	0.00184	0.00500	5	04/06/2018 02:04	WG1094402
Naphthalene	U		0.00500	0.0250	5	04/06/2018 02:04	WG1094402
n-Propylbenzene	0.00355	J	0.00174	0.00500	5	04/06/2018 02:04	WG1094402
Styrene	U		0.00154	0.00500	5	04/06/2018 02:04	WG1094402
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	04/06/2018 02:04	WG1094402
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	04/06/2018 02:04	WG1094402
Tetrachloroethene	U		0.00186	0.00500	5	04/06/2018 02:04	WG1094402
Toluene	U		0.00206	0.00500	5	04/06/2018 02:04	WG1094402
1,1,1-Trichloroethane	U		0.00160	0.00500	5	04/06/2018 02:04	WG1094402
1,1,2-Trichloroethane	U		0.00192	0.00500	5	04/06/2018 02:04	WG1094402
Trichloroethene	U		0.00199	0.00500	5	04/06/2018 02:04	WG1094402
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	04/06/2018 02:04	WG1094402
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	04/06/2018 02:04	WG1094402
Vinyl chloride	U		0.00130	0.00500	5	04/06/2018 02:04	WG1094402
o-Xylene	U		0.00170	0.00500	5	04/06/2018 02:04	WG1094402
m&p-Xylene	U		0.00360	0.0100	5	04/06/2018 02:04	WG1094402
Xylenes, Total	U		0.00530	0.0150	5	04/06/2018 02:04	WG1094402
(S) Toluene-d8	*104*			*80.0-120*		*04/06/2018 02:04*	WG1094402
(S) Dibromofluoromethane	*105*			*76.0-123*		*04/06/2018 02:04*	WG1094402
(S) 4-Bromofluorobenzene	*121*	J1		*80.0-120*		*04/06/2018 02:04*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.80		0.0247	0.100	1	04/08/2018 09:12	WG1094423
(S) o-Terphenyl	*119*			*31.0-160*		*04/08/2018 09:12*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	U		2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U	J6	0.0197	0.100	1	04/09/2018 15:59	WG1094866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.254	B J P1	0.0519	1.00	1	04/07/2018 03:19	WG1094674
Fluoride	U		0.00990	0.100	1	04/07/2018 03:19	WG1094674
Sulfate	0.466	B J P1	0.0774	5.00	1	04/07/2018 03:19	WG1094674

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	04/12/2018 00:11	WG1094256
Arsenic,Dissolved	U		0.000250	0.00200	1	04/11/2018 20:28	WG1094251
Barium	0.000659	J	0.000360	0.00500	1	04/12/2018 00:11	WG1094256
Barium,Dissolved	U		0.000360	0.00500	1	04/11/2018 20:28	WG1094251
Calcium	0.820	J	0.0460	1.00	1	04/12/2018 00:11	WG1094256
Chromium	0.00147	J J3 J4	0.000540	0.00200	1	04/12/2018 00:11	WG1094256
Chromium,Dissolved	0.00114	J	0.000540	0.00200	1	04/11/2018 20:28	WG1094251
Iron	U		0.0150	0.100	1	04/12/2018 00:11	WG1094256
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 20:28	WG1094251
Lead	U		0.000240	0.00200	1	04/12/2018 00:11	WG1094256
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 20:28	WG1094251
Manganese	0.000707	J	0.000250	0.00500	1	04/12/2018 00:11	WG1094256
Manganese,Dissolved	0.000749	J	0.000250	0.00500	1	04/11/2018 20:28	WG1094251
Potassium	0.0729	B J	0.0370	1.00	1	04/12/2018 13:27	WG1096943
Selenium	U		0.000380	0.00200	1	04/12/2018 00:11	WG1094256
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 20:28	WG1094251
Sodium	0.624	B J	0.110	1.00	1	04/12/2018 00:11	WG1094256

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/06/2018 11:55	WG1094454
(S) a,a,a-Trifluorotoluene(FID)	*116*			*77.0-122*		*04/06/2018 11:55*	WG1094454

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 02:24	WG1094402
Benzene	U		0.000331	0.00100	1	04/06/2018 02:24	WG1094402
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 02:24	WG1094402
Bromoform	U		0.000469	0.00100	1	04/06/2018 02:24	WG1094402
Bromomethane	U		0.000866	0.00500	1	04/06/2018 02:24	WG1094402
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 02:24	WG1094402
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 02:24	WG1094402
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 02:24	WG1094402
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 02:24	WG1094402

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 02:24	WG1094402
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 02:24	WG1094402
Chloroethane	U		0.000453	0.00500	1	04/06/2018 02:24	WG1094402
Chloroform	U		0.000324	0.00500	1	04/06/2018 02:24	WG1094402
Chloromethane	U		0.000276	0.00250	1	04/06/2018 02:24	WG1094402
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 02:24	WG1094402
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 02:24	WG1094402
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 02:24	WG1094402
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 02:24	WG1094402
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 02:24	WG1094402
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 02:24	WG1094402
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 02:24	WG1094402
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 02:24	WG1094402
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 02:24	WG1094402
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 02:24	WG1094402
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 02:24	WG1094402
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 02:24	WG1094402
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 02:24	WG1094402
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 02:24	WG1094402
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 02:24	WG1094402
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 02:24	WG1094402
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 02:24	WG1094402
Naphthalene	U		0.00100	0.00500	1	04/06/2018 02:24	WG1094402
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 02:24	WG1094402
Styrene	U		0.000307	0.00100	1	04/06/2018 02:24	WG1094402
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 02:24	WG1094402
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 02:24	WG1094402
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 02:24	WG1094402
Toluene	U		0.000412	0.00100	1	04/06/2018 02:24	WG1094402
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 02:24	WG1094402
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 02:24	WG1094402
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 02:24	WG1094402
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 02:24	WG1094402
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 02:24	WG1094402
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 02:24	WG1094402
o-Xylene	U		0.000341	0.00100	1	04/06/2018 02:24	WG1094402
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 02:24	WG1094402
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 02:24	WG1094402
(S) Toluene-d8	*106*			*80.0-120*		*04/06/2018 02:24*	WG1094402
(S) Dibromofluoromethane	*106*			*76.0-123*		*04/06/2018 02:24*	WG1094402
(S) 4-Bromofluorobenzene	*122*	J1		*80.0-120*		*04/06/2018 02:24*	WG1094402

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0284	J	0.0247	0.100	1	04/08/2018 09:32	WG1094423
(S) o-Terphenyl	*96.3*			*31.0-160*		*04/08/2018 09:32*	WG1094423

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300997-1 04/10/18 19:06

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983360-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983360-01 04/10/18 19:06 • (DUP) R3300997-4 04/10/18 19:06

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2150	2260	1	5.00		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300997-2 04/10/18 19:06 • (LCSD) R3300997-3 04/10/18 19:06

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8490	8870	96.5	101	85.0-115			4.38	5

WG1095030

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983365-06,07,08,09,10,11,12,13,14,15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301037-1 04/10/18 16:17

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Dissolved Solids	U		2.82	10.0

L983365-15 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-15 04/10/18 16:17 • (DUP) R3301037-4 04/10/18 16:17

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	3580	3570	1	0.420		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301037-2 04/10/18 16:17 • (LCSD) R3301037-3 04/10/18 16:17

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Dissolved Solids	8800	8690	8550	98.8	97.2	85.0-115			1.62	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301031-1 04/10/18 16:08

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983365-25 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-25 04/10/18 16:08 • (DUP) R3301031-4 04/10/18 16:08

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Dissolved Solids	2170	2370	1	8.60	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301031-2 04/10/18 16:08 • (LCSD) R3301031-3 04/10/18 16:08

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8570	8420	97.4	95.7	85.0-115			1.77	5

WG1095810

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983365-26,27,28,29,30,31

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301029-1 04/10/18 15:08

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983397-04 Original Sample (OS) • Duplicate (DUP)

(OS) L983397-04 04/10/18 15:08 • (DUP) R3301029-4 04/10/18 15:08

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	4860	4460	1	8.58	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301029-2 04/10/18 15:08 • (LCSD) R3301029-3 04/10/18 15:08

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8560	8350	97.3	94.9	85.0-115			2.48	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300263-1 04/09/18 14:39

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983365-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-01 04/09/18 14:42 • (DUP) R3300263-4 04/09/18 14:43

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.878	0.870	1	0.915		20

L983365-19 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-19 04/09/18 15:11 • (DUP) R3300263-7 04/09/18 15:12

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	5	0.000		20

Sample Narrative:

OS: Diluted due to sulfide interference

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300263-2 04/09/18 14:40 • (LCSD) R3300263-3 04/09/18 14:41

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.74	3.82	93.5	95.5	90.0-110			2.17	20

L983365-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L983365-02 04/09/18 14:44 • (MS) R3300263-5 04/09/18 14:45

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	U	2.25	90.0	1	90.0-110	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983365-20 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-20 04/09/18 15:14 • (MS) R3300263-8 04/09/18 15:15 • (MSD) R3300263-9 04/09/18 15:16

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	0.0500	U	110	111	4380	4440	50	90.0-110	J5	J5	1.41	20

Sample Narrative:

OS: Diluted due to sulfide interference

Method Blank (MB)

(MB) R3300264-1 04/09/18 15:24

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983354-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983354-01 04/09/18 15:27 • (DUP) R3300264-4 04/09/18 15:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

L983365-30 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-30 04/09/18 15:57 • (DUP) R3300264-7 04/09/18 15:58

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	5	0.000		20

Sample Narrative:

OS: Diluted due to sulfide interference

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300264-2 04/09/18 15:25 • (LCSD) R3300264-3 04/09/18 15:26

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.80	3.89	94.9	97.3	90.0-110			2.52	20

L983354-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L983354-03 04/09/18 15:30 • (MS) R3300264-5 04/09/18 15:31

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	1.58	3.56	79.1	1	90.0-110	J6

L983365-31 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-31 04/09/18 15:59 • (MS) R3300264-8 04/09/18 16:00 • (MSD) R3300264-9 04/09/18 16:01

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	2.50	U	2.12	2.13	84.9	85.0	1	90.0-110	J6	J6	0.141	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300229-1 04/09/18 15:09

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L983251-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983251-01 04/09/18 15:26 • (DUP) R3300229-4 04/09/18 15:27

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L983365-14 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-14 04/09/18 15:36 • (DUP) R3300229-5 04/09/18 15:37

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300229-2 04/09/18 15:10 • (LCSD) R3300229-3 04/09/18 15:11

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.102	0.0900	102	90.0	85.0-115			12.5	20

L983397-10 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983397-10 04/09/18 15:40 • (MS) R3300229-6 04/09/18 15:41 • (MSD) R3300229-7 04/09/18 15:42

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	U	0.0896	0.0906	89.6	90.6	1	75.0-125			1.11	20

QUALITY CONTROL SUMMARY

L983365-01,02,03

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299675-1 04/06/18 00:22

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100

L983343-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983343-01 04/06/18 01:11 • (DUP) R3299675-4 04/06/18 01:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	32.0	32.4	1	1.13		15
Fluoride	ND	0.0756	1	8.24	J	15

L983343-06 Original Sample (OS) • Duplicate (DUP)

(OS) L983343-06 04/06/18 03:15 • (DUP) R3299675-7 04/06/18 03:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	5.87	5.95	1	1.35		15
Fluoride	ND	0.0329	1	45.5	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299675-2 04/06/18 00:34 • (LCSD) R3299675-3 04/06/18 00:46

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.8	39.8	99.6	99.5	80.0-120			0.0414	15
Fluoride	8.00	8.05	8.05	101	101	80.0-120			0.00248	15

L983343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983343-01 04/06/18 01:11 • (MS) R3299675-5 04/06/18 01:36 • (MSD) R3299675-6 04/06/18 01:48

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	32.0	85.6	82.3	107	101	1	80.0-120			3.89	15
Fluoride	5.00	ND	5.54	5.42	109	107	1	80.0-120			2.10	15

WG1094250

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983365-01,02,03

L983343-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L983343-06 04/06/18 03:15 • (MS) R3299675-8 04/06/18 03:40

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	5.87	61.4	111	1	80.0-120	
Fluoride	5.00	ND	5.43	108	1	80.0-120	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1094255

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983365-04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20,21,22,23

Method Blank (MB)

(MB) R3299761-1 04/05/18 22:33

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983365-21 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-21 04/06/18 09:54 • (DUP) R3299761-4 04/06/18 10:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	81.5	82.8	2	1.58		15
Fluoride	1.70	1.80	2	5.68		15

L983365-23 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-23 04/06/18 11:57 • (DUP) R3299761-7 04/06/18 12:12

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	2.12	2.35	1	10.1		15

L983365-23 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-23 04/06/18 12:28 • (DUP) R3299761-8 04/06/18 12:43

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	415	412	10	0.745		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299761-2 04/05/18 22:49 • (LCSD) R3299761-3 04/05/18 23:04

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.3	39.4	98.2	98.4	80.0-120			0.174	15
Fluoride	8.00	8.02	8.02	100	100	80.0-120			0.0599	15
Sulfate	40.0	38.7	38.8	96.7	97.0	80.0-120			0.361	15

WG1094255

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983365-04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20,21,22,23

L983365-23 Original Sample (OS) • Matrix Spike (MS)

(OS) L983365-23 04/06/18 11:57 • (MS) R3299761-9 04/06/18 12:59

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Fluoride	5.00	2.12	6.88	95.1	1	80.0-120	

QUALITY CONTROL SUMMARY

L983365-24,25,26,27,28,29,30,31

Method Blank (MB)

(MB) R3299901-1 04/06/18 22:59

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.0857	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.145	J	0.0774	5.00

L983365-31 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-31 04/07/18 03:19 • (DUP) R3299901-4 04/07/18 03:57

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.254	0.119	1	72.3	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	0.466	0.000	1	200	P1	15

L983370-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983370-03 04/07/18 04:59 • (DUP) R3299901-7 04/07/18 05:11

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	11.4	11.4	1	0.192		15
Fluoride	0.636	0.636	1	0.0315		15
Sulfate	8.90	8.95	1	0.489		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299901-2 04/06/18 23:11 • (LCSD) R3299901-3 04/06/18 23:24

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.6	39.6	99.1	99.1	80.0-120			0.0588	15
Fluoride	8.00	8.03	8.01	100	100	80.0-120			0.132	15
Sulfate	40.0	40.0	39.9	100	99.9	80.0-120			0.168	15

QUALITY CONTROL SUMMARY

L983365-24,25,26,27,28,29,30,31

L983365-31 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-31 04/07/18 03:19 • (MS) R3299901-5 04/07/18 04:09 • (MSD) R3299901-6 04/07/18 04:22

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	0.254	51.6	51.4	103	102	1	80.0-120			0.413	15
Fluoride	5.00	U	5.35	5.22	107	104	1	80.0-120			2.53	15
Sulfate	50.0	0.466	52.6	51.5	104	102	1	80.0-120			2.03	15

L983370-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L983370-03 04/07/18 04:59 • (MS) R3299901-8 04/07/18 05:24

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	11.4	61.1	99.5	1	80.0-120	
Fluoride	5.00	0.636	5.55	98.2	1	80.0-120	
Sulfate	50.0	8.90	58.4	99.1	1	80.0-120	

Method Blank (MB)

(MB) R3299893-1 04/06/18 15:20

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L983292-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983292-03 04/06/18 18:29 • (DUP) R3299893-4 04/06/18 18:44

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	17.6	17.7	1	0.420		15

L983578-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983578-01 04/07/18 00:54 • (DUP) R3299893-7 04/07/18 01:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	36.4	36.8	1	0.984		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299893-2 04/06/18 15:36 • (LCSD) R3299893-3 04/06/18 15:51

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	39.4	39.4	98.5	98.5	80.0-120			0.0287	15

L983292-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983292-03 04/06/18 18:29 • (MS) R3299893-5 04/06/18 18:59 • (MSD) R3299893-6 04/06/18 19:15

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	17.6	68.6	68.4	102	102	1	80.0-120			0.226	15

L983578-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L983578-01 04/07/18 00:54 • (MS) R3299893-8 04/07/18 01:25

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	36.4	85.4	98.1	1	80.0-120	

WG1094922

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983365-05,06,07,08,11,12,15,21,22,23

Method Blank (MB)

(MB) R3299938-1 04/07/18 14:49

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	0.142	J	0.0774	5.00

L983693-12 Original Sample (OS) • Duplicate (DUP)

(OS) L983693-12 04/07/18 18:44 • (DUP) R3299938-4 04/07/18 18:56

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	17.7	17.7	1	0.0656		15

L983791-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983791-01 04/07/18 23:42 • (DUP) R3299938-6 04/07/18 23:54

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	18.7	18.8	1	0.486		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299938-2 04/07/18 15:02 • (LCSD) R3299938-3 04/07/18 15:14

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	40.1	40.0	100	100	80.0-120			0.230	15

L983693-12 Original Sample (OS) • Matrix Spike (MS)

(OS) L983693-12 04/07/18 18:44 • (MS) R3299938-5 04/07/18 19:09

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	17.7	67.3	99.1	1	80.0-120	

L983791-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983791-01 04/07/18 23:42 • (MS) R3299938-7 04/08/18 00:07 • (MSD) R3299938-8 04/08/18 00:19

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	18.7	68.3	68.2	99.2	99.0	1	80.0-120			0.189	15

WG1095383

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983365-29

Method Blank (MB)

(MB) R3300437-1 04/09/18 18:14

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L983318-06 Original Sample (OS) • Duplicate (DUP)

(OS) L983318-06 04/09/18 23:00 • (DUP) R3300437-4 04/09/18 23:16

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	141	141	5	0.268		15

L983836-05 Original Sample (OS) • Duplicate (DUP)

(OS) L983836-05 04/10/18 05:10 • (DUP) R3300437-7 04/10/18 05:26

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	385	397	5	3.12		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300437-2 04/09/18 18:30 • (LCSD) R3300437-3 04/09/18 18:45

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	38.7	39.0	96.8	97.5	80.0-120			0.743	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301305-1 04/12/18 06:51

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L984949-01 Original Sample (OS) • Duplicate (DUP)

(OS) L984949-01 04/12/18 16:15 • (DUP) R3301305-4 04/12/18 16:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	22.0	21.8	1	0.690		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301305-2 04/12/18 07:03 • (LCSD) R3301305-3 04/12/18 07:15

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	39.4	39.4	98.6	98.4	80.0-120			0.122	15

L984949-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984949-01 04/12/18 16:15 • (MS) R3301305-5 04/12/18 16:40 • (MSD) R3301305-6 04/12/18 16:52

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	22.0	63.0	62.7	82.0	81.5	1	80.0-120			0.444	15

WG1094325

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983365-04,05,06,12,14,15,28

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300045-1 04/08/18 18:08

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury	0.0000934	J	0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300045-2 04/08/18 18:11 • (LCSD) R3300045-3 04/08/18 18:13

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	0.00307	0.00303	102	101	80.0-120			1.35	20

L983343-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983343-01 04/08/18 18:15 • (MS) R3300045-4 04/08/18 18:17 • (MSD) R3300045-5 04/08/18 18:20

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	ND	0.00290	0.00291	93.9	93.9	1	75.0-125			0.0723	20

WG1094326

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983365-04,05,06,12,14,15,28

Method Blank (MB)

(MB) R3300046-1 04/08/18 19:14

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury,Dissolved	0.0000591	J	0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300046-2 04/08/18 19:16 • (LCSD) R3300046-3 04/08/18 19:23

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	0.00311	0.00311	104	104	80.0-120			0.00322	20

L983365-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-05 04/08/18 19:25 • (MS) R3300046-4 04/08/18 19:28 • (MSD) R3300046-5 04/08/18 19:30

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	U	0.00284	0.00276	94.5	91.9	1	75.0-125			2.78	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300026-1 04/08/18 20:04

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300026-2 04/08/18 20:06 • (LCSD) R3300026-3 04/08/18 20:08

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Boron	1.00	0.981	0.988	98.1	98.8	80.0-120			0.670	20

L983306-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983306-05 04/08/18 20:11 • (MS) R3300026-5 04/08/18 20:16 • (MSD) R3300026-6 04/08/18 20:19

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Boron	1.00	ND	1.05	1.08	98.0	101	1	75.0-125			2.54	20

WG1094698

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983365-04,05,06,12,15,28

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300526-1 04/10/18 09:32

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Boron,Dissolved	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300526-2 04/10/18 09:35 • (LCSD) R3300526-3 04/10/18 09:38

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Boron,Dissolved	1.00	0.986	0.980	98.6	98.0	80.0-120			0.679	20

L983536-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983536-04 04/10/18 09:42 • (MS) R3300526-5 04/10/18 09:48 • (MSD) R3300526-6 04/10/18 09:51

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Boron,Dissolved	1.00	0.150	1.15	1.15	99.9	99.9	1	75.0-125			0.0386	20

WG1096390

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983365-14

Method Blank (MB)

(MB) R3301006-1 04/11/18 15:47

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Boron,Dissolved	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301006-2 04/11/18 15:49 • (LCSD) R3301006-3 04/11/18 15:52

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Boron,Dissolved	1.00	0.987	1.01	98.7	101	80.0-120			2.81	20

L984110-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984110-02 04/11/18 15:54 • (MS) R3301006-5 04/11/18 16:00 • (MSD) R3301006-6 04/11/18 16:02

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Boron,Dissolved	1.00	0.0752	1.08	1.08	100	100	1	75.0-125			0.182	20

QUALITY CONTROL SUMMARY

L983365-03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20,21,22

Method Blank (MB)

(MB) R3301100-1 04/12/18 01:53

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Chromium,Dissolved	U		0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	0.0193	J	0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301100-2 04/12/18 01:57 • (LCSD) R3301100-3 04/12/18 02:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0515	0.0519	103	104	80.0-120			0.743	20
Barium,Dissolved	0.0500	0.0519	0.0485	104	97.0	80.0-120			6.83	20
Cadmium,Dissolved	0.0500	0.0533	0.0535	107	107	80.0-120			0.307	20
Chromium,Dissolved	0.0500	0.0515	0.0517	103	103	80.0-120			0.450	20
Cobalt,Dissolved	0.0500	0.0530	0.0530	106	106	80.0-120			0.0287	20
Iron,Dissolved	5.00	5.17	5.19	103	104	80.0-120			0.355	20
Lead,Dissolved	0.0500	0.0518	0.0512	104	102	80.0-120			1.18	20
Manganese,Dissolved	0.0500	0.0502	0.0501	100	100	80.0-120			0.167	20
Nickel,Dissolved	0.0500	0.0537	0.0545	107	109	80.0-120			1.39	20
Selenium,Dissolved	0.0500	0.0502	0.0515	100	103	80.0-120			2.61	20
Uranium,Dissolved	0.0500	0.0532	0.0526	106	105	80.0-120			1.22	20
Vanadium,Dissolved	0.0500	0.0500	0.0514	100	103	80.0-120			2.74	20

L983365-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-03 04/12/18 02:05 • (MS) R3301100-5 04/12/18 02:13 • (MSD) R3301100-6 04/12/18 02:17

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.00335	0.0537	0.0531	101	99.5	1	75.0-125			1.07	20
Barium,Dissolved	0.0500	0.00908	0.0602	0.0596	102	101	1	75.0-125			0.997	20
Cadmium,Dissolved	0.0500	U	0.0554	0.0545	111	109	1	75.0-125			1.55	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983365-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-03 04/12/18 02:05 • (MS) R3301100-5 04/12/18 02:13 • (MSD) R3301100-6 04/12/18 02:17

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium,Dissolved	0.0500	0.00103	0.0510	0.0497	99.9	97.4	1	75.0-125			2.45	20
Cobalt,Dissolved	0.0500	0.000322	0.0527	0.0513	105	102	1	75.0-125			2.71	20
Iron,Dissolved	5.00	0.0191	5.11	5.01	102	99.9	1	75.0-125			1.97	20
Lead,Dissolved	0.0500	0.000295	0.0540	0.0541	107	108	1	75.0-125			0.0896	20
Manganese,Dissolved	0.0500	0.00153	0.0509	0.0481	98.8	93.2	1	75.0-125			5.60	20
Nickel,Dissolved	0.0500	0.00190	0.0538	0.0520	104	100	1	75.0-125			3.43	20
Selenium,Dissolved	0.0500	0.0275	0.0802	0.0775	105	100	1	75.0-125			3.36	20
Uranium,Dissolved	0.0500	0.0352	0.0906	0.0902	111	110	1	75.0-125			0.435	20
Vanadium,Dissolved	0.0500	0.0256	0.0765	0.0761	102	101	1	75.0-125			0.542	20

WG1094251

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983365-23,24,25,26,27,28,29,30,31

Method Blank (MB)

(MB) R3301059-1 04/11/18 19:03

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Chromium,Dissolved	U		0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	U		0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301059-2 04/11/18 19:07 • (LCSD) R3301059-3 04/11/18 19:11

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0477	0.0493	95.5	98.6	80.0-120			3.17	20
Barium,Dissolved	0.0500	0.0462	0.0472	92.4	94.3	80.0-120			2.07	20
Cadmium,Dissolved	0.0500	0.0506	0.0527	101	105	80.0-120			4.08	20
Chromium,Dissolved	0.0500	0.0498	0.0492	99.7	98.5	80.0-120			1.21	20
Cobalt,Dissolved	0.0500	0.0520	0.0518	104	104	80.0-120			0.440	20
Iron,Dissolved	5.00	4.99	5.04	99.8	101	80.0-120			0.927	20
Lead,Dissolved	0.0500	0.0497	0.0504	99.4	101	80.0-120			1.46	20
Manganese,Dissolved	0.0500	0.0474	0.0475	94.8	95.1	80.0-120			0.309	20
Nickel,Dissolved	0.0500	0.0513	0.0514	103	103	80.0-120			0.362	20
Selenium,Dissolved	0.0500	0.0505	0.0536	101	107	80.0-120			5.92	20
Uranium,Dissolved	0.0500	0.0502	0.0513	100	103	80.0-120			1.99	20
Vanadium,Dissolved	0.0500	0.0485	0.0497	96.9	99.3	80.0-120			2.46	20

L983354-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983354-01 04/11/18 19:14 • (MS) R3301059-5 04/11/18 19:22 • (MSD) R3301059-6 04/11/18 19:26

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.00347	0.0507	0.0532	94.4	99.4	1	75.0-125			4.85	20
Barium,Dissolved	0.0500	0.0166	0.0617	0.0660	90.3	98.8	1	75.0-125			6.64	20
Cadmium,Dissolved	0.0500	U	0.0528	0.0551	106	110	1	75.0-125			4.42	20

QUALITY CONTROL SUMMARY

L983365-23,24,25,26,27,28,29,30,31

L983354-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983354-01 04/11/18 19:14 • (MS) R3301059-5 04/11/18 19:22 • (MSD) R3301059-6 04/11/18 19:26

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium,Dissolved	0.0500	U	0.0484	0.0505	96.8	101	1	75.0-125			4.21	20
Cobalt,Dissolved	0.0500	0.00276	0.0522	0.0548	98.8	104	1	75.0-125			4.99	20
Iron,Dissolved	5.00	0.0258	4.92	5.13	97.8	102	1	75.0-125			4.19	20
Lead,Dissolved	0.0500	0.000275	0.0504	0.0526	100	105	1	75.0-125			4.22	20
Manganese,Dissolved	0.0500	0.525	0.569	0.581	87.0	111	1	75.0-125			2.09	20
Nickel,Dissolved	0.0500	0.00543	0.0546	0.0557	98.3	101	1	75.0-125			2.06	20
Selenium,Dissolved	0.0500	0.000398	0.0512	0.0498	102	98.8	1	75.0-125			2.79	20
Uranium,Dissolved	0.0500	0.0135	0.0663	0.0679	106	109	1	75.0-125			2.31	20
Vanadium,Dissolved	0.0500	0.00505	0.0533	0.0554	96.6	101	1	75.0-125			3.90	20

WG1094253

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983365-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

Method Blank (MB)

(MB) R3299928-1 04/06/18 19:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	0.0943	J	0.0460	1.00
Chromium	0.000585	J	0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	0.0375	J	0.0150	0.100
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Vanadium	U		0.000180	0.00500

Method Blank (MB)

(MB) R3299929-1 04/07/18 13:28

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Lead	U		0.000240	0.00200
Uranium	U		0.000330	0.0100

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299928-2 04/06/18 20:03 • (LCSD) R3299928-3 04/06/18 20:07

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0485	0.0478	97.0	95.5	80.0-120			1.47	20
Barium	0.0500	0.0469	0.0484	93.8	96.7	80.0-120			3.11	20
Cadmium	0.0500	0.0480	0.0492	96.0	98.5	80.0-120			2.49	20
Calcium	5.00	5.07	4.80	101	96.1	80.0-120			5.37	20
Chromium	0.0500	0.0565	0.0484	113	96.9	80.0-120			15.4	20
Cobalt	0.0500	0.0498	0.0492	99.7	98.5	80.0-120			1.24	20
Iron	5.00	4.95	4.83	98.9	96.5	80.0-120			2.47	20
Manganese	0.0500	0.0473	0.0469	94.6	93.7	80.0-120			0.986	20
Nickel	0.0500	0.0503	0.0497	101	99.4	80.0-120			1.21	20
Potassium	5.00	4.91	4.79	98.2	95.8	80.0-120			2.49	20
Selenium	0.0500	0.0472	0.0473	94.3	94.7	80.0-120			0.348	20
Sodium	5.00	4.90	4.81	97.9	96.2	80.0-120			1.81	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299928-2 04/06/18 20:03 • (LCSD) R3299928-3 04/06/18 20:07

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Vanadium	0.0500	0.0476	0.0476	95.1	95.2	80.0-120			0.102	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299929-2 04/07/18 13:33 • (LCSD) R3299929-3 04/07/18 13:37

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Lead	0.0500	0.0492	0.0498	98.5	99.5	80.0-120			1.07	20
Uranium	0.0500	0.0474	0.0465	94.9	93.0	80.0-120			1.97	20

L983365-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-01 04/06/18 20:11 • (MS) R3299928-5 04/06/18 20:20 • (MSD) R3299928-6 04/06/18 20:24

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00124	0.0495	0.0497	96.5	96.9	1	75.0-125			0.400	20
Barium	0.0500	0.00886	0.0560	0.0539	94.2	90.0	1	75.0-125			3.86	20
Cadmium	0.0500	U	0.0486	0.0490	97.2	98.1	1	75.0-125			0.832	20
Calcium	5.00	238	239	240	22.2	47.4	1	75.0-125	V	V	0.526	20
Chromium	0.0500	U	0.0484	0.0463	96.9	92.7	1	75.0-125			4.46	20
Cobalt	0.0500	U	0.0483	0.0480	96.6	95.9	1	75.0-125			0.710	20
Potassium	5.00	1.98	6.73	6.82	95.1	96.8	1	75.0-125			1.31	20
Iron	5.00	2.19	6.98	6.91	95.7	94.3	1	75.0-125			1.05	20
Manganese	0.0500	0.0113	0.0580	0.0579	93.5	93.3	1	75.0-125			0.187	20
Nickel	0.0500	0.000536	0.0484	0.0489	95.7	96.7	1	75.0-125			1.09	20
Selenium	0.0500	0.00598	0.0565	0.0561	101	100	1	75.0-125			0.767	20
Sodium	5.00	41.4	46.2	46.9	96.0	109	1	75.0-125			1.40	20
Vanadium	0.0500	0.00599	0.0536	0.0536	95.1	95.2	1	75.0-125			0.0732	20

L983365-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-01 04/07/18 13:42 • (MS) R3299929-5 04/07/18 13:50 • (MSD) R3299929-6 04/07/18 13:55

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Lead	0.0500	0.000797	0.0495	0.0500	97.5	98.5	1	75.0-125			1.02	20
Uranium	0.0500	0.00434	0.0521	0.0532	95.6	97.8	1	75.0-125			2.13	20

WG1094256

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983365-21,22,23,24,25,26,27,28,29,30,31

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301060-1 04/11/18 22:01

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Selenium	U		0.000380	0.00200
Sodium	0.440	J	0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301060-2 04/11/18 22:05 • (LCSD) R3301060-3 04/11/18 22:09

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0481	0.0495	96.2	98.9	80.0-120			2.74	20
Barium	0.0500	0.0467	0.0487	93.4	97.3	80.0-120			4.12	20
Cadmium	0.0500	0.0504	0.0523	101	105	80.0-120			3.61	20
Calcium	5.00	4.96	5.00	99.2	99.9	80.0-120			0.721	20
Chromium	0.0500	0.0486	0.0688	97.3	138	80.0-120		J3 J4	34.3	20
Cobalt	0.0500	0.0509	0.0522	102	104	80.0-120			2.41	20
Iron	5.00	4.94	5.24	98.8	105	80.0-120			5.91	20
Lead	0.0500	0.0497	0.0510	99.5	102	80.0-120			2.45	20
Manganese	0.0500	0.0481	0.0510	96.1	102	80.0-120			5.86	20
Nickel	0.0500	0.0507	0.0527	101	105	80.0-120			3.98	20
Selenium	0.0500	0.0489	0.0501	97.7	100	80.0-120			2.57	20
Sodium	5.00	5.13	5.07	103	101	80.0-120			1.20	20
Uranium	0.0500	0.0506	0.0517	101	103	80.0-120			2.25	20
Vanadium	0.0500	0.0483	0.0511	96.6	102	80.0-120			5.53	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983354-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983354-01 04/11/18 22:13 • (MS) R3301060-5 04/11/18 22:21 • (MSD) R3301060-6 04/11/18 22:25

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.00456	0.0533	0.0528	97.5	96.5	1	75.0-125			1.01	20
Barium	0.0500	0.0161	0.0648	0.0653	97.4	98.4	1	75.0-125			0.735	20
Cadmium	0.0500	0.000282	0.0541	0.0533	108	106	1	75.0-125			1.35	20
Calcium	5.00	373	375	373	47.6	4.45	1	75.0-125	V	V	0.576	20
Chromium	0.0500	U	0.0486	0.0502	97.1	100	1	75.0-125			3.30	20
Cobalt	0.0500	0.00266	0.0538	0.0530	102	101	1	75.0-125			1.49	20
Iron	5.00	0.0500	5.00	5.00	99.0	98.9	1	75.0-125			0.0489	20
Lead	0.0500	0.000449	0.0514	0.0518	102	103	1	75.0-125			0.690	20
Manganese	0.0500	0.531	0.575	0.574	88.2	86.2	1	75.0-125			0.173	20
Nickel	0.0500	0.00587	0.0536	0.0546	95.5	97.5	1	75.0-125			1.89	20
Selenium	0.0500	0.000467	0.0482	0.0529	95.5	105	1	75.0-125			9.30	20
Sodium	5.00	61.7	67.1	65.8	106	81.9	1	75.0-125			1.83	20
Uranium	0.0500	0.0137	0.0675	0.0673	108	107	1	75.0-125			0.393	20
Vanadium	0.0500	0.00520	0.0547	0.0540	99.0	97.5	1	75.0-125			1.32	20

WG1096943

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983365-21,22,23,24,25,26,27,28,29,30,31

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301355-1 04/12/18 13:16

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chromium	0.00144	J	0.000540	0.00200
Potassium	0.117	J	0.0370	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301355-2 04/12/18 13:20 • (LCSD) R3301355-3 04/12/18 13:23

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chromium	0.0500	0.0503	0.0530	101	106	80.0-120			5.11	20
Potassium	5.00	4.92	5.08	98.4	102	80.0-120			3.25	20

L983365-31 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-31 04/12/18 13:27 • (MS) R3301355-5 04/12/18 13:35 • (MSD) R3301355-6 04/12/18 13:39

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium	0.0500	0.00112	0.0517	0.0544	101	107	1	75.0-125			5.17	20
Potassium	5.00	0.0729	4.96	5.16	97.8	102	1	75.0-125			3.81	20

WG1094444

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L983365-03,04,05,06,07,08,09,10,16,17,18,19,20,21,22,24,25,26,27,28

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300976-3 04/06/18 12:53

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*97.7*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300976-1 04/06/18 11:36 • (LCSD) R3300976-2 04/06/18 12:09

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	5.72	5.58	104	101	71.0-136			2.55	20
(S) a,a,a-Trifluorotoluene(FID)				*104*	*104*	*77.0-122*				

WG1094454

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L983365-29,30,31

Method Blank (MB)

(MB) R3300971-3 04/05/18 23:48

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*115*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300971-1 04/05/18 22:36 • (LCSD) R3300971-2 04/05/18 23:00

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) Low Fraction	5.50	4.90	5.10	89.2	92.7	71.0-136			3.85	20
(S) a,a,a-Trifluorotoluene(FID)				*120*	*120*	*77.0-122*				

L983369-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983369-07 04/06/18 14:54 • (MS) R3300971-4 04/06/18 15:18 • (MSD) R3300971-5 04/06/18 15:42

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
TPH (GC/FID) Low Fraction	5.50	ND	4.00	3.88	72.8	70.5	1	18.0-160			3.26	20
(S) a,a,a-Trifluorotoluene(FID)					*116*	*116*		*77.0-122*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300549-1 04/05/18 18:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300549-1 04/05/18 18:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
Xylenes, Total	U		0.00106	0.00300
(S) Toluene-d8	*107*			*80.0-120*
(S) Dibromofluoromethane	*105*			*76.0-123*
(S) 4-Bromofluorobenzene	*118*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3300549-2 04/05/18 19:19

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.0972	77.8	10.0-160	
Bromodichloromethane	0.0250	0.0195	77.8	76.0-120	
Bromoform	0.0250	0.0281	112	67.0-132	
Bromomethane	0.0250	0.0224	89.4	18.0-160	
n-Butylbenzene	0.0250	0.0238	95.0	72.0-126	
sec-Butylbenzene	0.0250	0.0242	96.6	74.0-121	
Carbon disulfide	0.0250	0.0210	84.0	55.0-127	
Carbon tetrachloride	0.0250	0.0255	102	63.0-122	
Benzene	0.0250	0.0238	95.4	69.0-123	
Chlorobenzene	0.0250	0.0234	93.5	79.0-121	
Chlorodibromomethane	0.0250	0.0244	97.7	75.0-125	
Chloroethane	0.0250	0.0216	86.5	47.0-152	
Chloroform	0.0250	0.0237	94.9	72.0-121	
Chloromethane	0.0250	0.0204	81.7	48.0-139	
1,2-Dibromoethane	0.0250	0.0253	101	77.0-123	
1,1-Dichloroethane	0.0250	0.0241	96.4	70.0-126	
1,2-Dichloroethane	0.0250	0.0254	102	67.0-126	
1,1-Dichloroethene	0.0250	0.0251	100	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0232	92.7	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0237	94.8	71.0-121	
1,2-Dichloropropane	0.0250	0.0227	90.7	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0264	106	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0251	100	74.0-127	

Laboratory Control Sample (LCS)

(LCS) R3300549-2 04/05/18 19:19

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
2-Hexanone	0.125	0.131	104	58.0-147	
Isopropylbenzene	0.0250	0.0272	109	75.0-120	
p-Isopropyltoluene	0.0250	0.0253	101	74.0-126	
2-Butanone (MEK)	0.125	0.124	99.2	37.0-158	
Methylene Chloride	0.0250	0.0232	92.8	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.127	101	59.0-143	
Ethylbenzene	0.0250	0.0231	92.5	77.0-120	
n-Propylbenzene	0.0250	0.0270	108	79.0-120	
Styrene	0.0250	0.0259	104	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0235	93.8	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0266	106	71.0-122	
Tetrachloroethene	0.0250	0.0239	95.8	70.0-127	
1,1,1-Trichloroethane	0.0250	0.0233	93.3	68.0-122	
Methyl tert-butyl ether	0.0250	0.0229	91.7	64.0-123	
1,1,2-Trichloroethane	0.0250	0.0229	91.8	78.0-120	
Trichloroethene	0.0250	0.0236	94.5	78.0-120	
Naphthalene	0.0250	0.0269	108	62.0-128	
1,2,4-Trimethylbenzene	0.0250	0.0228	91.2	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0245	97.8	75.0-120	
Vinyl chloride	0.0250	0.0252	101	64.0-133	
Toluene	0.0250	0.0224	89.6	77.0-120	
o-Xylene	0.0250	0.0227	90.9	78.0-120	
m&p-Xylenes	0.0500	0.0453	90.5	77.0-120	
Xylenes, Total	0.0750	0.0680	90.7	77.0-120	
(S) Toluene-d8			*106*	*80.0-120*	
(S) Dibromofluoromethane			*106*	*76.0-123*	
(S) 4-Bromofluorobenzene			*118*	*80.0-120*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300926-2 04/05/18 22:31

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1094443

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983365-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

Method Blank (MB)

(MB) R3300926-2 04/05/18 22:31

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*109*			*80.0-120*
(S) Dibromofluoromethane	*87.2*			*76.0-123*
(S) 4-Bromofluorobenzene	*104*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3300926-1 04/05/18 21:50

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.0750	60.0	10.0-160	
Benzene	0.0250	0.0244	97.6	69.0-123	
Bromodichloromethane	0.0250	0.0266	107	76.0-120	
Bromoform	0.0250	0.0274	110	67.0-132	
Bromomethane	0.0250	0.0137	55.0	18.0-160	
n-Butylbenzene	0.0250	0.0275	110	72.0-126	
sec-Butylbenzene	0.0250	0.0280	112	74.0-121	
Carbon disulfide	0.0250	0.0239	95.5	55.0-127	
Carbon tetrachloride	0.0250	0.0236	94.5	63.0-122	
Chlorobenzene	0.0250	0.0276	110	79.0-121	
Chlorodibromomethane	0.0250	0.0283	113	75.0-125	
Chloroethane	0.0250	0.0231	92.4	47.0-152	
Chloroform	0.0250	0.0237	94.9	72.0-121	
Chloromethane	0.0250	0.0214	85.5	48.0-139	
1,2-Dibromoethane	0.0250	0.0282	113	77.0-123	
1,1-Dichloroethane	0.0250	0.0244	97.7	70.0-126	
1,2-Dichloroethane	0.0250	0.0232	93.0	67.0-126	
1,1-Dichloroethene	0.0250	0.0253	101	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0239	95.6	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0254	102	71.0-121	
1,2-Dichloropropane	0.0250	0.0268	107	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0288	115	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0278	111	74.0-127	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS)

(LCS) R3300926-1 04/05/18 21:50

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.0250	0.0288	115	77.0-120	
2-Hexanone	0.125	0.130	104	58.0-147	
Isopropylbenzene	0.0250	0.0282	113	75.0-120	
p-Isopropyltoluene	0.0250	0.0284	114	74.0-126	
2-Butanone (MEK)	0.125	0.0993	79.4	37.0-158	
Methylene Chloride	0.0250	0.0232	92.7	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.134	107	59.0-143	
Methyl tert-butyl ether	0.0250	0.0247	99.0	64.0-123	
Naphthalene	0.0250	0.0285	114	62.0-128	
n-Propylbenzene	0.0250	0.0275	110	79.0-120	
Styrene	0.0250	0.0294	117	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0287	115	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0258	103	71.0-122	
Tetrachloroethene	0.0250	0.0275	110	70.0-127	
Toluene	0.0250	0.0275	110	77.0-120	
1,1,1-Trichloroethane	0.0250	0.0245	97.8	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0277	111	78.0-120	
Trichloroethene	0.0250	0.0268	107	78.0-120	
1,2,4-Trimethylbenzene	0.0250	0.0277	111	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0277	111	75.0-120	
Vinyl chloride	0.0250	0.0236	94.4	64.0-133	
Xylenes, Total	0.0750	0.0867	116	77.0-120	
o-Xylene	0.0250	0.0287	115	78.0-120	
m&p-Xylenes	0.0500	0.0580	116	77.0-120	
(S) Toluene-d8			*104*	*80.0-120*	
(S) Dibromofluoromethane			*88.7*	*76.0-123*	
(S) 4-Bromofluorobenzene			*101*	*80.0-120*	

WG1094422

QUALITY CONTROL SUMMARY

Semi-Volatile Organic Compounds (GC) by Method 3511/8015 L983365-03,04,05,06,07,08,09,10,12,13,14,15,16,17,18,19,20,21,22,23

Method Blank (MB)

(MB) R3300542-1 04/09/18 12:19

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*99.3*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300542-2 04/09/18 12:36 • (LCSD) R3300542-3 04/09/18 12:52

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.62	1.62	108	108	50.0-150			0.152	20
(S) o-Terphenyl				*128*	*126*	*31.0-160*				

WG1094423

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L983365-24,25,26,27,28,29,30,31

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300206-1 04/08/18 02:07

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*95.3*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300206-2 04/08/18 02:27 • (LCSD) R3300206-3 04/08/18 02:47

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.70	1.68	113	112	50.0-150			1.59	20
(S) o-Terphenyl				*120*	*120*	*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
J	The identification of the analyte is acceptable; the reported value is an estimate.
J1	Surrogate recovery limits have been exceeded; values are outside upper control limits.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J5	The sample matrix interfered with the ability to make any accurate determination; spike value is high.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia [1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky [1,6]	90010
Kentucky [2]	16
Louisiana	AI30792
Louisiana [1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086

Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico [1]	n/a
New York	11742
North Carolina	Env375
North Carolina [1]	DW21704
North Carolina [3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee [1,4]	2006
Texas	T 104704245-17-14
Texas [5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

Third Party Federal Accreditations

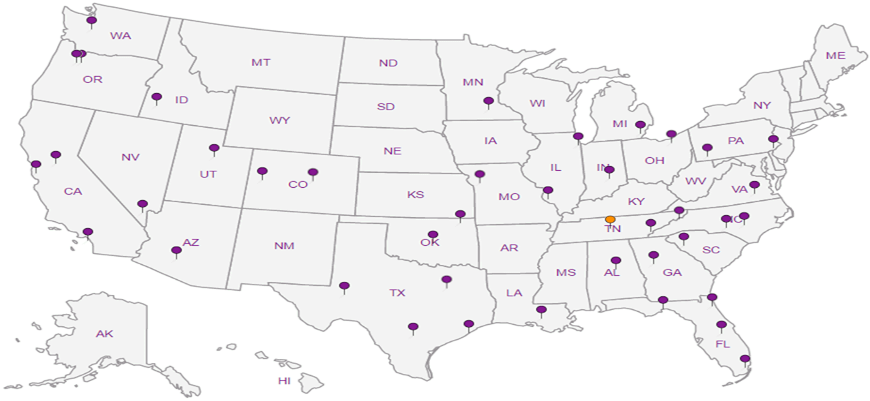
A2LA – ISO 17025	1461.01
A2LA – ISO 17025 [5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003

AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 1 of 9

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

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Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**

Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L# L983365

Ta F103

Acctnum: **TRCATX**

Template: **T133463**

Prelogin: **P643247**

TSR: **526**

PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
KWB-8	Grab	GW				9	X	X			X	X	X	X	X			
RW-22	Grab	GW				8	X	X		X	X	X	X					
RW-20A	Grab	GW				8	X	X		X	X	X	X					
RW-20B	Grab	GW				8	X	X		X	X	X	X					
RW-13R	Grab	GW				8	X	X		X	X	X	X					
RW-14R	Grab	GW				8	X	X		X	X	X	X					
MW-133	Grab	GW				10	X	X	X	X	X	X	X					
MW-134	Grab	GW				10	X	X	X	X	X	X	X					
RA-4798	Grab	GW		4/3/18	1335	5	X				X	X	X					-01
RA-4196	Grab	GW		4/3/18	1305	5	X				X	X	X					02

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier ______

Tracking # 4219 9211 4885

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.1 °C Bottles Received: 243	If preservation required by Login: Date/Time PH adjusted in Lab @ 1540 for FF metals
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	Hold: Condition: NCF / OK

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 2 of 9

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Quote #
Date Results Needed
Immediately Packed on Ice N ___ Y ___

L# L983365
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										✓	✓		✓		✓			
RA-3156	Grab	GW				5	X				X	X	X					
RA-313	Grab	GW				5	X				X	X	X					
KWB-7	Grab	GW				9	X	X			X	X	X	X	X			
MW-135	Grab	GW		4/3/18	1135	10	X	X	X	X	X	X	X					03
KWB-11A	Grab	GW		4/3/18	0940	11	X	X	X		X	X	X	X	X			04
KWB-11B	Grab	GW		4/3/18	1025	11	X	X	X		X	X	X	X	X			05
MW-115	Grab	GW				10	X	X	X	X	X	X	X					
MW-114	Grab	GW				10	X	X	X	X	X	X	X					
MW-117	Grab	GW				10	X	X	X	X	X	X	X					
MW-118	Grab	GW				10	X	X	X	X	X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ___ FedEx ___ Courier ___ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.1 °C Bottles Received: 243	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	Hold: Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
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Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 3 of 9

ESC
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YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Quote #
Immediately Packed on Ice N____ Y____

Rush? (Lab MUST Be Notified)
____ Same Day ____ Five Day
____ Next Day ____ 5 Day (Rad Only)
____ Two Day ____ 10 Day (Rad Only)
____ Three Day

Date Results Needed

L # L983365
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										*✓2	✓2		✓2		✓12			
MW-119	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-136	**Grab**	**GW**		**4/3/18**	**1750**	**11**	X	X	X		X	X	X	X	X			06
MW-126A	**Grab**	**GW**		**4/3/18**	**1355**	**10**	X	X	X	X	X	X	X					07
MW-126B	**Grab**	**GW**		**4/3/18**	**1435**	**10**	X	X	X	X	X	X	X					08
MW-127	**Grab**	**GW**		**4/3/18**	**1310**	**10**	X	X	X	X	X	X	X					09
MW-129	**Grab**	**GW**		**4/3/18**	**1220**	**10**	X	X	X	X	X	X	X					10
RW-#18A	**Grab**	**GW**		**4/3/18**	**1120**	**6**	X			X	X	X	X					11
KWB-1A	**Grab**	**GW**		**4/3/18**	**1035**	**9**	X	X			X	X	X	X	X			12
KWB-10R	**Grab**	**GW**		**4/3/18**	**0950**	**8**	X	X		X	X	X	X					13
MW-131	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeOH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.1 °C Bottles Received: 293	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	Hold: Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
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Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page 4 of 9

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12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project #: **249545.0000.0000 000001**
Lab Project #: **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID #: **REST (Navajo - Artesia)**
P.O. #: **119503**
Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Quote #
Date Results Needed
Immediately Packed on Ice N ___ Y ___

L# L983365
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
										*L2	L2		L2		712			
MW-58	Grab	GW		4/3/18	1635	9	X	X			X	X	X	X	X			14
KWB-13	Grab	GW		4/3/18	1545	9	X	X			X	X	X	X	X			15
MW-103	Grab	GW		4/3/18	1300	10	X	X	X	X	X	X	X					16
MW-104	Grab	GW		4/3/18	1200	10	X	X	X	X	X	X	X					17
MW-64	Grab	GW		4/3/18	1355	10	X	X	X	X	X	X	X					18
MW-65	Grab	GW		4/3/18	1450	10	X	X	X	X	X	X	X					19
RW-5R	Grab	GW				8	X	X		X	X	X	X					
MW-102	Grab	GW		4/3/18	1555	10	X	X	X	X	X	X	X					20
RW-4	Grab	GW				8	X	X		X	X	X	X					
RW-6	Grab	GW				8	X	X		X	X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP [✓ Y] __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0↓ °C Bottles Received: 243
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 5 of 9

ESC
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12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L# L983365

Table #

Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
						Pres Chk				*L7	L7		L7					
MW-137	Grab	GW				11	X	X	X		X	X	X	X	X			
MW-138	Grab	GW				11	X	X	X		X	X	X	X	X			
MW-23	Grab	GW				10	X	X	X	X	X	X	X					
MW-39	Grab	GW				10	X	X	X	X	X	X	X					
MW-98	Grab	GW		4/3/18	1320	10	X	X	X	X	X	X	X					21
RW-10	Grab	GW				10	X	X	X	X	X	X	X					
MW-40	Grab	GW				10	X	X	X	X	X	X	X					
MW-41	Grab	GW				10	X	X	X	X	X	X	X					
RW-9	Grab	GW				10	X	X	X	X	X	X	X					
MW-42	Grab	GW				10	X	X	X	X	X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP [✓ Y] __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] [✓ N]

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.1 °C Bottles Received: 293	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	Hold: Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX **505 E. Huntland Dr, Ste 250** **Austin, TX 78752**	Billing Information: **Accounts Payable** **21 Griffin Road North** **Windsor, CT 06095**	Chain of Custody Page 7 of 9 ESC L·A·B S·C·I·E·N·C·E·S YOUR LAB OF CHOICE 12065 Lebanon Rd Mount Juliet, TN 37122 Phone: 615-758-5858 Phone: 800-767-5859 Fax: 615-758-5859
Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**	L# L983365
Project Description: **REST Spring 2018**	City/State Collected: **Artesia, NM**	Table #
Phone: **512-684-3170** Fax:	Client Project # **249545.0000.0000 000001**	Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **REST (Navajo - Artesia)**	P.O. # **119503**
Collected by (signature):	*Rush?* (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day	Quote # Date Results Needed
Immediately Packed on Ice N ___ Y ___		

Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	Pres Chk / No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved) *<2	Cations (from "total metals" bottle) <2	Anions, TDS	NO2NO3 <2	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-29	Grab	GW				10	X	X	X	X	X	X	X					
RW-#16B	Grab	GW				8	X	X		X	X	X	X					
MW-106	Grab	GW		4/3/18	1415	10	X	X	X	X	X	X	X					22
MW-50	Grab	GW		4/3/18	1155	8	X	X		X	X	X	X					23
MW-97	Grab	GW				10	X	X	X	X	X	X	X					
MW-92	Grab	GW				10	X	X	X	X	X	X	X					
RW-1	Grab	GW		4/3/18	1310	10	X	X	X	X	X	X	X					24
MW-91	Grab	GW		4/3/18	1355	10	X	X	X	X	X	X	X					25
MW-90	Grab	GW		4/3/18	1435	10	X	X	X	X	X	X	X					26
MW-96	Grab	GW		4/3/18	1515	10	X	X	X	X	X	X	X					27

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: NP ✓Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: ✓Y _N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: ✓Y _N
Preservation Correct/Checked: ✓Y _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.1 °C Bottles Received: 293	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 945	Hold: Condition: NCF / [✓ OK]

Chain of Custody Page 8 of 9

ESC
L·A·B S·C·I·E·N·C·E·S
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Phone: 615-758-5858
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TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project #: **249545.0000.0000 000001**

Lab Project #: **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: **REST (Navajo - Artesia)**

P.O. #: **119503**

Collected by (signature):

Quote #

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L# L983365

Table #

Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										L2*	L2		L2		L2			
MW-94	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
RW-8	**Grab**	**GW**				**8**	X	X		X	X	X	X					
MW-67	**Grab**	**GW**		**4/3/18**	**1620**	**11**	X	X	X		X	X	X	X	X			28
MW-95	**Grab**	**GW**				**8**	X	X	X	X	X	X	X					
RW-7	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
RW-#17A	**Grab**	**GW**		**4/3/18**	**1845**	**10**	X	X	X	X	X	X	X					29
DUP-REST-01	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
DUP-REST-02	**Grab**	**GW**		**4/3/18**	**1300**	**10**	X	X	X	X	X	X	X					30
DUP-REST-03	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
DUP-REST-04	**Grab**	**GW**				**11**	X	X	X		X	X	X	X	X			

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.1 °C Bottles Received: 243	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	Hold: Condition: NCF / [✓ OK]

Chain of Custody Page 9 of 9

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project #: **249545.0000.0000 000001**

Lab Project #: **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: **REST (Navajo - Artesia)**

P.O. #: **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L# L983365

Table #

Acctnum: **TRCATX**

Template: **T133463**

Prelogin: **P643247**

TSR: **526**

PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										*<2	*<2		<2					
DUP-REST-05	**Grab**	**GW**				**11**	X	X	X		X	X	X	X	X			
EB-REST-01	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
EB-REST-02	**Grab**	**GW**		**4/3/18**	**1220**	**10**	X	X	X	X	X	X	X					-31
EB-REST-03	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
EB-REST-04	**Grab**	**GW**				**11**	X	X	X		X	X	X	X	X			
EB-REST-05	**Grab**	**GW**				**11**	X	X	X		X	X	X	X	X			
TRIP BLANK-REST-01	**Grab**	**GW**				**1**	X											
TRIP BLANK-REST-02	**Grab**	**GW**				**1**	X											
TRIP BLANK-REST-03	**Grab**	**GW**				**1**	X											
TRIP BLANK-REST-04	**Grab**	**GW**				**1**	X											

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP [✓ Y] __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] [✓ N]

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.1 °C Bottles Received: 293	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	Hold:

Condition: NCF / [✓ OK]

Chain of Custody Page 1 of 4

ESC
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YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# L983365
Table #
Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
Shipped Via:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer
Email To: jspeer@trcwsolutions.com
Project Description: REST Spring 2018
City/State Collected: Artesia, NM
Phone: 512-684-3170
Fax:
Client Project #
Lab Project #
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID #: REST (Navajo - Artesia)
P.O. #: 119503
Collected by (signature):
Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed
Email? ___No ✓ Yes
FAX? ___No ___Yes

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
RW-1	Grab	GW		4/3/18	1310		✓	✓	✓	✓		✓	✓	✓				
RW-#17A	Grab	GW		4/3/18	1845		✓	✓	✓	✓		✓	✓	✓				
MW-50	Grab	GW		4/3/18	1155		✓	✓		✓		✓	✓	✓				
MW-67	Grab	GW		4/3/18	1620		✓	✓	✓		✓	✓	✓	✓	✓			
MW-90	Grab	GW		4/3/18	1435		✓	✓	✓	✓		✓	✓	✓				
MW-91	Grab	GW		4/3/18	1355		✓	✓	✓	✓		✓	✓	✓				
MW-96	Grab	GW		4/3/18	1515		✓	✓	✓	✓		✓	✓	✓				
RA-4196	Grab	GW		4/3/18	1305		✓					✓	✓	✓				
RA-4798	Grab	GW		4/3/18	1335		✓					✓	✓	✓				
KWB-11A	Grab	GW		4/3/18	940		✓	✓	✓		✓	✓	✓	✓	✓			

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________
Flow ________ Other ________
Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/4/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ _____	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.5 °C Bottles Received:	COC Seal Intact: [✓ Y] ___N ___NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	pH Checked: NCF:

Chain of Custody Page 2 of 4

ESC
L·A·B S·C·I·E·N·C·E·S
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Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: REST Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #:

Lab Project #:

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes

FAX? ___ No ___ Yes

Immediately Packed on Ice N ___ Y ✓

L# L983365

Table #:

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
KWB-11B	Grab	GW		4/3/18	1025		✓	✓	✓		✓	✓	✓	✓	✓			
MW-135	Grab	GW		4/3/18	1135		✓	✓	✓	✓		✓	✓	✓				
MW-64	Grab	GW		4/3/18	1355		✓	✓	✓	✓		✓	✓	✓				
MW-65	Grab	GW		4/3/18	1450		✓	✓	✓	✓		✓	✓	✓				
MW-102	Grab	GW		4/3/18	1555		✓	✓	✓	✓		✓	✓	✓				
MW-103	Grab	GW		4/3/18	1300		✓	✓	✓	✓		✓	✓	✓				
MW-104	Grab	GW		4/3/18	1200		✓	✓	✓	✓		✓	✓	✓				
DUP-Rest-02	Grab	GW		4/3/18	1300		✓	✓	✓	✓		✓	✓	✓				
EB-Rest-02	Grab	GW		4/3/18	1220		✓	✓	✓	✓		✓	✓	✓				
MW-98	Grab	GW		4/3/18	1320		✓	✓	✓	✓		✓	✓	✓				

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ______

pH ______ Temp ______

Flow ______ Other ______

Remarks: Diss. metals are field-filtered.

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/4/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.5 °C Bottles Received:	COC Seal Intact: ✓ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	pH Checked: NCF:

Chain of Custody Page 3 of 4

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

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L# L983365
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Prelogin:
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Cooler:
Shipped Via:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer
Email To: jspeer@trcwsolutions.com
Project Description: REST Spring 2018
City/State Collected: Artesia, NM
Phone: 512-684-3170
Fax:
Client Project #
Lab Project #
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID #: REST (Navajo - Artesia)
P.O. #: 119503
Collected by (signature):
Immediately Packed on Ice N ____ Y ✓

Rush? (Lab MUST Be Notified)
____ Same Day 200%
____ Next Day 100%
____ Two Day 50%
____ Three Day 25%

Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-106	Grab	GW		4/3/18	1415		✓	✓	✓	✓		✓	✓	✓				
KWB-1A	Grab	GW		4/3/18	1035		✓	✓			✓	✓	✓	✓	✓			
KWB-10R	Grab	GW		4/3/18	950		✓	✓		✓		✓	✓	✓				
KWB-13	Grab	GW		4/3/18	1545		✓	✓			✓	✓	✓	✓	✓			
MW-58	Grab	GW		4/3/18	1635		✓	✓			✓	✓	✓	✓	✓			
MW-126A	Grab	GW		4/3/18	1355		✓	✓	✓	✓		✓	✓	✓				
MW-126B	Grab	GW		4/3/18	1435		✓	✓	✓	✓		✓	✓	✓				
MW-127	Grab	GW		4/3/18	1310		✓	✓	✓	✓		✓	✓	✓				
MW-129	Grab	GW		4/3/18	1220		✓	✓	✓	✓		✓	✓	✓				
MW-136	Grab	GW		4/3/18	1750		✓	✓	✓		✓	✓	✓	✓	✓			

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________
Flow ________ Other ________
Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/4/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ____	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.5 °C Bottles Received:	COC Seal Intact: [✓ Y] ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	pH Checked: NCF:

Chain of Custody Page 4 of 4

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

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Phone: 800-767-5859
Fax: 615-758-5859

L# L983365
Table #
Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
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Company Name/Address:
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Austin, TX 78752

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City/State Collected: Artesia, NM
Phone: 512-684-3170
Fax:
Client Project #
Lab Project #
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID #: REST (Navajo - Artesia)
P.O. #: 119503
Collected by (signature):
Immediately Packed on Ice N ____ Y ✓

Rush? (Lab MUST Be Notified)
- ____ Same Day 200%
- ____ Next Day 100%
- ____ Two Day 50%
- ____ Three Day 25%

Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
RW-#18A	Grab	GW		4/3/18	1120		✓			✓		✓	✓	✓				
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

pH ________ Temp ________
Flow ________ Other ________

Remarks: Diss. metals are field-filtered.

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/4/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ____	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.8 °C Bottles Received:	COC Seal Intact: ✓ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	pH Checked: NCF:

ANALYTICAL REPORT

April 17, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L983397
Samples Received:	04/05/2018
Project Number:	294318.0000.0000.
Description:	EP Spring 2018
Site:	EP NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-77 L983397-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 18:10	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 12:56	04/10/18 12:56	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 06:38	04/07/18 06:38	MAJ
Wet Chemistry by Method 9056A	WG1094674	100	04/07/18 06:51	04/07/18 06:51	MAJ
Wet Chemistry by Method 9056A	WG1095383	5	04/10/18 01:50	04/10/18 01:50	MAJ
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:07	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 22:39	LD
Metals (ICPMS) by Method 6020	WG1094257	2	04/05/18 20:54	04/13/18 00:47	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	5	04/06/18 15:18	04/06/18 15:18	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	10	04/06/18 15:25	04/06/18 15:25	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	10	04/06/18 23:47	04/11/18 00:12	TH

MW-75 L983397-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 17:25	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 12:58	04/10/18 12:58	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 07:03	04/07/18 07:03	MAJ
Wet Chemistry by Method 9056A	WG1094674	100	04/07/18 07:15	04/07/18 07:15	MAJ
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 22:44	LD
Metals (ICPMS) by Method 6020	WG1094257	2	04/05/18 20:54	04/13/18 00:51	LD
Metals (ICPMS) by Method 6020	WG1098665	1	04/16/18 20:43	04/17/18 01:58	LD
Metals (ICPMS) by Method 6020	WG1098704	1	04/16/18 09:10	04/16/18 13:52	LAT
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	10	04/06/18 15:40	04/06/18 15:40	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 15:45	04/06/18 15:45	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	10	04/06/18 23:47	04/11/18 00:29	TH

MW-88 L983397-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 10:15	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:00	04/10/18 13:00	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 07:28	04/07/18 07:28	MAJ
Wet Chemistry by Method 9056A	WG1094674	100	04/07/18 07:40	04/07/18 07:40	MAJ
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:15	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 21:08	LD
Metals (ICPMS) by Method 6020	WG1094257	2	04/05/18 20:54	04/12/18 22:10	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 16:02	04/06/18 16:02	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 16:06	04/06/18 16:06	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/10/18 23:55	TH

MW-22A L983397-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 11:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095810	1	04/10/18 14:40	04/10/18 15:08	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:05	04/10/18 13:05	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 07:53	04/07/18 07:53	MAJ
Wet Chemistry by Method 9056A	WG1094674	100	04/07/18 08:05	04/07/18 08:05	MAJ
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:19	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 22:48	LD

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-22A L983397-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 11:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1094257	2	04/05/18 20:54	04/13/18 00:56	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 16:24	04/06/18 16:24	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 16:27	04/06/18 16:27	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 16:13	LM

MW-10 L983397-05 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 12:05	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095812	1	04/10/18 15:14	04/10/18 15:40	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:06	04/10/18 13:06	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 08:17	04/07/18 08:17	MAJ
Wet Chemistry by Method 9056A	WG1094674	100	04/07/18 12:40	04/07/18 12:40	MAJ
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:23	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 22:53	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 16:46	04/06/18 16:46	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 16:47	04/06/18 16:47	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 16:30	LM

MW-123 L983397-06 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 12:50	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095812	1	04/10/18 15:14	04/10/18 15:40	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:07	04/10/18 13:07	JER
Wet Chemistry by Method 9056A	WG1094674	1	04/07/18 12:52	04/07/18 12:52	MAJ
Wet Chemistry by Method 9056A	WG1094674	100	04/07/18 13:04	04/07/18 13:04	MAJ
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:27	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 23:17	LD
Metals (ICPMS) by Method 6020	WG1094257	2	04/05/18 20:54	04/13/18 01:00	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 17:09	04/06/18 17:09	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 17:08	04/06/18 17:08	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 16:47	LM

MW-4A L983397-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 16:40	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095812	1	04/10/18 15:14	04/10/18 15:40	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:08	04/10/18 13:08	JER
Wet Chemistry by Method 9056A	WG1094675	1	04/08/18 09:27	04/08/18 09:27	DR
Wet Chemistry by Method 9056A	WG1094675	100	04/08/18 09:39	04/08/18 09:39	DR
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:43	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 23:21	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 17:31	04/06/18 17:31	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 17:29	04/06/18 17:29	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 17:04	LM

SAMPLE SUMMARY

MW-5A L983397-08 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 15:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095812	1	04/10/18 15:14	04/10/18 15:40	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:09	04/10/18 13:09	JER
Wet Chemistry by Method 9056A	WG1094675	1	04/08/18 09:53	04/08/18 09:53	DR
Wet Chemistry by Method 9056A	WG1094675	100	04/08/18 10:06	04/08/18 10:06	DR
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:47	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 23:26	LD
Metals (ICPMS) by Method 6020	WG1094257	5	04/05/18 20:54	04/13/18 01:04	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 17:53	04/06/18 17:53	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 17:50	04/06/18 17:50	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 17:20	LM

MW-7A L983397-09 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 13:35	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095812	1	04/10/18 15:14	04/10/18 15:40	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:10	04/10/18 13:10	JER
Wet Chemistry by Method 9056A	WG1094675	1	04/08/18 10:20	04/08/18 10:20	DR
Wet Chemistry by Method 9056A	WG1094675	100	04/08/18 10:33	04/08/18 10:33	DR
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:51	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 23:30	LD
Metals (ICPMS) by Method 6020	WG1094257	2	04/05/18 20:54	04/13/18 01:09	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 18:15	04/06/18 18:15	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 18:10	04/06/18 18:10	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 17:37	LM

OCD-8A L983397-10 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 14:45	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095812	1	04/10/18 15:14	04/10/18 15:40	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:11	04/10/18 13:11	JER
Wet Chemistry by Method 4500CN E-2011	WG1094972	1	04/06/18 22:07	04/09/18 15:40	KK
Wet Chemistry by Method 9056A	WG1094675	1	04/08/18 10:46	04/08/18 10:46	DR
Wet Chemistry by Method 9056A	WG1094675	100	04/08/18 11:26	04/08/18 11:26	DR
Mercury by Method 7470A	WG1094326	1	04/06/18 08:56	04/08/18 20:04	EL
Mercury by Method 7470A	WG1094610	1	04/06/18 11:25	04/08/18 16:13	EL
Metals (ICP) by Method 6010B	WG1094248	1	04/06/18 09:52	04/08/18 21:21	ST
Metals (ICP) by Method 6010B	WG1094698	1	04/10/18 06:38	04/10/18 10:25	CCE
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:55	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 23:34	LD
Metals (ICPMS) by Method 6020	WG1094257	5	04/05/18 20:54	04/13/18 01:13	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 18:38	04/06/18 18:38	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094680	1	04/06/18 18:31	04/06/18 18:31	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 17:54	LM

DUP-EP-01 L983397-11 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 12:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095812	1	04/10/18 15:14	04/10/18 15:40	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:13	04/10/18 13:13	JER
Wet Chemistry by Method 9056A	WG1094675	1	04/08/18 11:40	04/08/18 11:40	DR

DUP-EP-01 L983397-11 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 12:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Wet Chemistry by Method 9056A	WG1094675	100	04/08/18 11:53	04/08/18 11:53	DR
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 17:59	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 23:39	LD
Metals (ICPMS) by Method 6020	WG1094257	2	04/05/18 20:54	04/13/18 01:18	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 19:00	04/06/18 19:00	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094689	1	04/06/18 15:18	04/06/18 15:18	JBE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 18:11	LM

DUP-EP-02 L983397-12 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 10:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095812	1	04/10/18 15:14	04/10/18 15:40	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:14	04/10/18 13:14	JER
Wet Chemistry by Method 9056A	WG1094675	1	04/08/18 12:07	04/08/18 12:07	DR
Wet Chemistry by Method 9056A	WG1094675	100	04/08/18 12:20	04/08/18 12:20	DR
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 18:03	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 23:43	LD
Metals (ICPMS) by Method 6020	WG1094257	2	04/05/18 20:54	04/13/18 01:22	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 19:22	04/06/18 19:22	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094689	1	04/06/18 15:38	04/06/18 15:38	JBE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 18:27	LM

EB-EP-03 L983397-13 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 15:50	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1095027	1	04/10/18 17:40	04/10/18 18:38	EG
Wet Chemistry by Method 353.2	WG1095630	1	04/10/18 13:20	04/10/18 13:20	JER
Wet Chemistry by Method 9056A	WG1094675	1	04/08/18 12:33	04/08/18 12:33	DR
Metals (ICPMS) by Method 6020	WG1094247	1	04/06/18 09:45	04/11/18 18:07	LD
Metals (ICPMS) by Method 6020	WG1094257	1	04/05/18 20:54	04/12/18 23:48	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1094563	1	04/06/18 19:44	04/06/18 19:44	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094689	1	04/06/18 15:58	04/06/18 15:58	JBE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1094424	1	04/06/18 23:47	04/09/18 18:44	LM

TRIP BLANK-EP-02 L983397-14 GW

Collected by	Collected date/time	Received date/time
Scott Ude/HMI Team	04/03/18 00:00	04/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1094689	1	04/06/18 12:59	04/06/18 12:59	JBE

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	7230		2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.109		0.0197	0.100	1	04/10/2018 12:56	WG1095630

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	310		0.260	5.00	5	04/10/2018 01:50	WG1095383
Fluoride	2.56		0.00990	0.100	1	04/07/2018 06:38	WG1094674
Sulfate	3770		7.74	500	100	04/07/2018 06:51	WG1094674

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0431		0.000250	0.00200	1	04/12/2018 22:39	WG1094257
Arsenic,Dissolved	0.0423		0.000250	0.00200	1	04/11/2018 17:07	WG1094247
Barium	0.00992		0.000360	0.00500	1	04/12/2018 22:39	WG1094257
Barium,Dissolved	0.0108		0.000360	0.00500	1	04/11/2018 17:07	WG1094247
Calcium	521		0.0460	1.00	1	04/12/2018 22:39	WG1094257
Chromium	0.00946		0.000540	0.00200	1	04/12/2018 22:39	WG1094257
Chromium,Dissolved	0.00949		0.000540	0.00200	1	04/11/2018 17:07	WG1094247
Iron	5.64		0.0150	0.100	1	04/12/2018 22:39	WG1094257
Iron,Dissolved	5.47		0.0150	0.100	1	04/11/2018 17:07	WG1094247
Lead	0.000745	J	0.000240	0.00200	1	04/12/2018 22:39	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 17:07	WG1094247
Manganese	0.540		0.000250	0.00500	1	04/12/2018 22:39	WG1094257
Manganese,Dissolved	0.547		0.000250	0.00500	1	04/11/2018 17:07	WG1094247
Potassium	68.8		0.0370	1.00	1	04/12/2018 22:39	WG1094257
Selenium	0.00983		0.000380	0.00200	1	04/12/2018 22:39	WG1094257
Selenium,Dissolved	0.0112		0.000380	0.00200	1	04/11/2018 17:07	WG1094247
Sodium	1240		0.220	2.00	2	04/13/2018 00:47	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.15		0.157	0.500	5	04/06/2018 15:18	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*97.6*			*77.0-122*		*04/06/2018 15:18*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.100	0.500	10	04/06/2018 15:25	WG1094680
Benzene	U		0.00331	0.0100	10	04/06/2018 15:25	WG1094680
Bromodichloromethane	U		0.00380	0.0100	10	04/06/2018 15:25	WG1094680
Bromoform	U		0.00469	0.0100	10	04/06/2018 15:25	WG1094680
Bromomethane	U		0.00866	0.0500	10	04/06/2018 15:25	WG1094680
n-Butylbenzene	U		0.00361	0.0100	10	04/06/2018 15:25	WG1094680
sec-Butylbenzene	U		0.00365	0.0100	10	04/06/2018 15:25	WG1094680
Carbon disulfide	U		0.00275	0.0100	10	04/06/2018 15:25	WG1094680
Carbon tetrachloride	U		0.00379	0.0100	10	04/06/2018 15:25	WG1094680

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.00348	0.0100	10	04/06/2018 15:25	WG1094680
Chlorodibromomethane	U		0.00327	0.0100	10	04/06/2018 15:25	WG1094680
Chloroethane	U		0.00453	0.0500	10	04/06/2018 15:25	WG1094680
Chloroform	U		0.00324	0.0500	10	04/06/2018 15:25	WG1094680
Chloromethane	U		0.00276	0.0250	10	04/06/2018 15:25	WG1094680
1,2-Dibromoethane	U		0.00381	0.0100	10	04/06/2018 15:25	WG1094680
1,1-Dichloroethane	U		0.00259	0.0100	10	04/06/2018 15:25	WG1094680
1,2-Dichloroethane	U		0.00361	0.0100	10	04/06/2018 15:25	WG1094680
1,1-Dichloroethene	U		0.00398	0.0100	10	04/06/2018 15:25	WG1094680
cis-1,2-Dichloroethene	U		0.00260	0.0100	10	04/06/2018 15:25	WG1094680
trans-1,2-Dichloroethene	U		0.00396	0.0100	10	04/06/2018 15:25	WG1094680
1,2-Dichloropropane	U		0.00306	0.0100	10	04/06/2018 15:25	WG1094680
cis-1,3-Dichloropropene	U		0.00418	0.0100	10	04/06/2018 15:25	WG1094680
trans-1,3-Dichloropropene	U		0.00419	0.0100	10	04/06/2018 15:25	WG1094680
Ethylbenzene	U		0.00384	0.0100	10	04/06/2018 15:25	WG1094680
Isopropylbenzene	0.0131		0.00326	0.0100	10	04/06/2018 15:25	WG1094680
p-Isopropyltoluene	U		0.00350	0.0100	10	04/06/2018 15:25	WG1094680
2-Butanone (MEK)	U		0.0393	0.100	10	04/06/2018 15:25	WG1094680
2-Hexanone	U		0.0382	0.100	10	04/06/2018 15:25	WG1094680
Methylene Chloride	U		0.0100	0.0500	10	04/06/2018 15:25	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.0214	0.100	10	04/06/2018 15:25	WG1094680
Methyl tert-butyl ether	U		0.00367	0.0100	10	04/06/2018 15:25	WG1094680
Naphthalene	U		0.0100	0.0500	10	04/06/2018 15:25	WG1094680
n-Propylbenzene	U		0.00349	0.0100	10	04/06/2018 15:25	WG1094680
Styrene	U		0.00307	0.0100	10	04/06/2018 15:25	WG1094680
1,1,1,2-Tetrachloroethane	U		0.00385	0.0100	10	04/06/2018 15:25	WG1094680
1,1,2,2-Tetrachloroethane	U		0.00130	0.0100	10	04/06/2018 15:25	WG1094680
Tetrachloroethene	U		0.00372	0.0100	10	04/06/2018 15:25	WG1094680
Toluene	U		0.00412	0.0100	10	04/06/2018 15:25	WG1094680
1,1,1-Trichloroethane	U		0.00319	0.0100	10	04/06/2018 15:25	WG1094680
1,1,2-Trichloroethane	U		0.00383	0.0100	10	04/06/2018 15:25	WG1094680
Trichloroethene	U		0.00398	0.0100	10	04/06/2018 15:25	WG1094680
1,2,4-Trimethylbenzene	U		0.00373	0.0100	10	04/06/2018 15:25	WG1094680
1,3,5-Trimethylbenzene	U		0.00387	0.0100	10	04/06/2018 15:25	WG1094680
Vinyl chloride	U		0.00259	0.0100	10	04/06/2018 15:25	WG1094680
o-Xylene	U		0.00341	0.0100	10	04/06/2018 15:25	WG1094680
m&p-Xylene	U		0.00719	0.0200	10	04/06/2018 15:25	WG1094680
Xylenes, Total	U		0.0106	0.0300	10	04/06/2018 15:25	WG1094680
(S) Toluene-d8	*104*			*80.0-120*		*04/06/2018 15:25*	WG1094680
(S) Dibromofluoromethane	*90.4*			*76.0-123*		*04/06/2018 15:25*	WG1094680
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/06/2018 15:25*	WG1094680

Sample Narrative:

L983397-01 WG1094680: Lowest possible dilution due to sample foaming.

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	54.4		0.247	1.00	10	04/11/2018 00:12	WG1094424
(S) o-Terphenyl	*107*			*31.0-160*		*04/11/2018 00:12*	WG1094424

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4670		2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	1.00	J6	0.0197	0.100	1	04/10/2018 12:58	WG1095630

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1470		5.19	100	100	04/07/2018 07:15	WG1094674
Fluoride	7.64		0.00990	0.100	1	04/07/2018 07:03	WG1094674
Sulfate	2000		7.74	500	100	04/07/2018 07:15	WG1094674

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.104		0.000250	0.00200	1	04/12/2018 22:44	WG1094257
Arsenic,Dissolved	0.0891		0.000250	0.00200	1	04/16/2018 13:52	WG1098704
Barium	0.0167		0.000360	0.00500	1	04/12/2018 22:44	WG1094257
Barium,Dissolved	0.0160		0.000360	0.00500	1	04/16/2018 13:52	WG1098704
Calcium	340		0.0460	1.00	1	04/12/2018 22:44	WG1094257
Chromium	0.00325		0.000540	0.00200	1	04/12/2018 22:44	WG1094257
Chromium,Dissolved	0.000835	J	0.000540	0.00200	1	04/16/2018 13:52	WG1098704
Iron	0.523		0.0150	0.100	1	04/12/2018 22:44	WG1094257
Iron,Dissolved	0.175		0.0150	0.100	1	04/16/2018 13:52	WG1098704
Lead	0.000500	J	0.000240	0.00200	1	04/12/2018 22:44	WG1094257
Lead,Dissolved	0.000466	B J	0.000240	0.00200	1	04/16/2018 13:52	WG1098704
Manganese	0.877		0.000250	0.00500	1	04/12/2018 22:44	WG1094257
Manganese,Dissolved	0.876		0.000250	0.00500	1	04/16/2018 13:52	WG1098704
Potassium	17.9		0.0370	1.00	1	04/12/2018 22:44	WG1094257
Selenium	0.00178	J	0.000380	0.00200	1	04/12/2018 22:44	WG1094257
Selenium,Dissolved	0.00218		0.000380	0.00200	1	04/17/2018 01:58	WG1098665
Sodium	1350		0.220	2.00	2	04/13/2018 00:51	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	1.41		0.314	1.00	10	04/06/2018 15:40	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*95.7*			*77.0-122*		*04/06/2018 15:40*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 15:45	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 15:45	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 15:45	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 15:45	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 15:45	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 15:45	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 15:45	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 15:45	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 15:45	WG1094680

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 15:45	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 15:45	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 15:45	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 15:45	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 15:45	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 15:45	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 15:45	WG1094680
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 15:45	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 15:45	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 15:45	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 15:45	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 15:45	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 15:45	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 15:45	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 15:45	WG1094680
Isopropylbenzene	0.000617	J	0.000326	0.00100	1	04/06/2018 15:45	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 15:45	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 15:45	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 15:45	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 15:45	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 15:45	WG1094680
Methyl tert-butyl ether	0.00467		0.000367	0.00100	1	04/06/2018 15:45	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 15:45	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 15:45	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 15:45	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 15:45	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 15:45	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 15:45	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 15:45	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 15:45	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 15:45	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 15:45	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 15:45	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 15:45	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 15:45	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 15:45	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 15:45	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 15:45	WG1094680
(S) Toluene-d8	*105*			*80.0-120*		*04/06/2018 15:45*	WG1094680
(S) Dibromofluoromethane	*88.1*			*76.0-123*		*04/06/2018 15:45*	WG1094680
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/06/2018 15:45*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	9.88		0.247	1.00	10	04/11/2018 00:29	WG1094424
(S) o-Terphenyl	*105*			*31.0-160*		*04/11/2018 00:29*	WG1094424

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4640		2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0750	J	0.0197	0.100	1	04/10/2018 13:00	WG1095630

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1650		5.19	100	100	04/07/2018 07:40	WG1094674
Fluoride	1.15		0.00990	0.100	1	04/07/2018 07:28	WG1094674
Sulfate	2360		7.74	500	100	04/07/2018 07:40	WG1094674

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00806		0.000250	0.00200	1	04/12/2018 21:08	WG1094257
Arsenic,Dissolved	0.00679		0.000250	0.00200	1	04/11/2018 17:15	WG1094247
Barium	0.0112		0.000360	0.00500	1	04/12/2018 21:08	WG1094257
Barium,Dissolved	0.0111		0.000360	0.00500	1	04/11/2018 17:15	WG1094247
Calcium	421	V	0.0460	1.00	1	04/12/2018 21:08	WG1094257
Chromium	0.00119	J	0.000540	0.00200	1	04/12/2018 21:08	WG1094257
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 17:15	WG1094247
Iron	0.0352	J	0.0150	0.100	1	04/12/2018 21:08	WG1094257
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 17:15	WG1094247
Lead	0.000649	J	0.000240	0.00200	1	04/12/2018 21:08	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 17:15	WG1094247
Manganese	0.927	V	0.000250	0.00500	1	04/12/2018 21:08	WG1094257
Manganese,Dissolved	0.922		0.000250	0.00500	1	04/11/2018 17:15	WG1094247
Potassium	3.09		0.0370	1.00	1	04/12/2018 21:08	WG1094257
Selenium	U		0.000380	0.00200	1	04/12/2018 21:08	WG1094257
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 17:15	WG1094247
Sodium	1110		0.220	2.00	2	04/12/2018 22:10	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0540	J	0.0314	0.100	1	04/06/2018 16:02	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*92.0*			*77.0-122*		*04/06/2018 16:02*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 16:06	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 16:06	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 16:06	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 16:06	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 16:06	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 16:06	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 16:06	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 16:06	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 16:06	WG1094680

MW-88

Collected date/time: 04/03/18 10:15

SAMPLE RESULTS - 03

L983397

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 16:06	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 16:06	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 16:06	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 16:06	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 16:06	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 16:06	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 16:06	WG1094680
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 16:06	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 16:06	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 16:06	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 16:06	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 16:06	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 16:06	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 16:06	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 16:06	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 16:06	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 16:06	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 16:06	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 16:06	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 16:06	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 16:06	WG1094680
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 16:06	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 16:06	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 16:06	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 16:06	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 16:06	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 16:06	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 16:06	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 16:06	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 16:06	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 16:06	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 16:06	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 16:06	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 16:06	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 16:06	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 16:06	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 16:06	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 16:06	WG1094680
(S) Toluene-d8	*106*			*80.0-120*		*04/06/2018 16:06*	WG1094680
(S) Dibromofluoromethane	*88.0*			*76.0-123*		*04/06/2018 16:06*	WG1094680
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/06/2018 16:06*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.508		0.0247	0.100	1	04/10/2018 23:55	WG1094424
(S) o-Terphenyl	*100*			*31.0-160*		*04/10/2018 23:55*	WG1094424

MW-22A
Collected date/time: 04/03/18 11:00

SAMPLE RESULTS - 04

L983397

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4860	J3	2.82	10.0	1	04/10/2018 15:08	WG1095810

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0680	J	0.0197	0.100	1	04/10/2018 13:05	WG1095630

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1780		5.19	100	100	04/07/2018 08:05	WG1094674
Fluoride	0.687		0.00990	0.100	1	04/07/2018 07:53	WG1094674
Sulfate	2270		7.74	500	100	04/07/2018 08:05	WG1094674

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0386		0.000250	0.00200	1	04/12/2018 22:48	WG1094257
Arsenic,Dissolved	0.0298		0.000250	0.00200	1	04/11/2018 17:19	WG1094247
Barium	0.0170		0.000360	0.00500	1	04/12/2018 22:48	WG1094257
Barium,Dissolved	0.0161		0.000360	0.00500	1	04/11/2018 17:19	WG1094247
Calcium	473		0.0460	1.00	1	04/12/2018 22:48	WG1094257
Chromium	0.00141	J	0.000540	0.00200	1	04/12/2018 22:48	WG1094257
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 17:19	WG1094247
Iron	4.16		0.0150	0.100	1	04/12/2018 22:48	WG1094257
Iron,Dissolved	1.29		0.0150	0.100	1	04/11/2018 17:19	WG1094247
Lead	0.00101	J	0.000240	0.00200	1	04/12/2018 22:48	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 17:19	WG1094247
Manganese	6.12		0.000250	0.00500	1	04/12/2018 22:48	WG1094257
Manganese,Dissolved	6.15		0.000250	0.00500	1	04/11/2018 17:19	WG1094247
Potassium	3.67		0.0370	1.00	1	04/12/2018 22:48	WG1094257
Selenium	0.000962	J	0.000380	0.00200	1	04/12/2018 22:48	WG1094257
Selenium,Dissolved	0.000519	J	0.000380	0.00200	1	04/11/2018 17:19	WG1094247
Sodium	1290		0.220	2.00	2	04/13/2018 00:56	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	2.50		0.0314	0.100	1	04/06/2018 16:24	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*96.1*			*77.0-122*		*04/06/2018 16:24*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 16:27	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 16:27	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 16:27	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 16:27	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 16:27	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 16:27	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 16:27	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 16:27	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 16:27	WG1094680

MW-22A

Collected date/time: 04/03/18 11:00

SAMPLE RESULTS - 04

L983397

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 16:27	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 16:27	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 16:27	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 16:27	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 16:27	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 16:27	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 16:27	WG1094680
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 16:27	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 16:27	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 16:27	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 16:27	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 16:27	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 16:27	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 16:27	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 16:27	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 16:27	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 16:27	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 16:27	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 16:27	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 16:27	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 16:27	WG1094680
Methyl tert-butyl ether	0.00458		0.000367	0.00100	1	04/06/2018 16:27	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 16:27	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 16:27	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 16:27	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 16:27	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 16:27	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 16:27	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 16:27	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 16:27	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 16:27	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 16:27	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 16:27	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 16:27	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 16:27	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 16:27	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 16:27	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 16:27	WG1094680
(S) Toluene-d8	*105*			*80.0-120*		*04/06/2018 16:27*	WG1094680
(S) Dibromofluoromethane	*88.0*			*76.0-123*		*04/06/2018 16:27*	WG1094680
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/06/2018 16:27*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	4.86		0.0247	0.100	1	04/09/2018 16:13	WG1094424
(S) o-Terphenyl	*102*			*31.0-160*		*04/09/2018 16:13*	WG1094424

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3380		2.82	10.0	1	04/10/2018 15:40	WG1095812

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0550	J	0.0197	0.100	1	04/10/2018 13:06	WG1095630

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1300		5.19	100	100	04/07/2018 12:40	WG1094674
Fluoride	0.857		0.00990	0.100	1	04/07/2018 08:17	WG1094674
Sulfate	1920		7.74	500	100	04/07/2018 12:40	WG1094674

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0161		0.000250	0.00200	1	04/12/2018 22:53	WG1094257
Arsenic,Dissolved	0.0149		0.000250	0.00200	1	04/11/2018 17:23	WG1094247
Barium	0.0188		0.000360	0.00500	1	04/12/2018 22:53	WG1094257
Barium,Dissolved	0.0138		0.000360	0.00500	1	04/11/2018 17:23	WG1094247
Calcium	472		0.0460	1.00	1	04/12/2018 22:53	WG1094257
Chromium	0.000870	J	0.000540	0.00200	1	04/12/2018 22:53	WG1094257
Chromium,Dissolved	0.00545		0.000540	0.00200	1	04/11/2018 17:23	WG1094247
Iron	0.632		0.0150	0.100	1	04/12/2018 22:53	WG1094257
Iron,Dissolved	0.113		0.0150	0.100	1	04/11/2018 17:23	WG1094247
Lead	0.00180	J	0.000240	0.00200	1	04/12/2018 22:53	WG1094257
Lead,Dissolved	0.000258	J	0.000240	0.00200	1	04/11/2018 17:23	WG1094247
Manganese	2.62		0.000250	0.00500	1	04/12/2018 22:53	WG1094257
Manganese,Dissolved	2.73		0.000250	0.00500	1	04/11/2018 17:23	WG1094247
Potassium	3.75		0.0370	1.00	1	04/12/2018 22:53	WG1094257
Selenium	0.000478	J	0.000380	0.00200	1	04/12/2018 22:53	WG1094257
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 17:23	WG1094247
Sodium	977		0.110	1.00	1	04/12/2018 22:53	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.734		0.0314	0.100	1	04/06/2018 16:46	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*93.0*			*77.0-122*		*04/06/2018 16:46*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 16:47	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 16:47	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 16:47	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 16:47	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 16:47	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 16:47	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 16:47	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 16:47	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 16:47	WG1094680

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 16:47	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 16:47	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 16:47	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 16:47	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 16:47	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 16:47	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 16:47	WG1094680
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 16:47	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 16:47	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 16:47	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 16:47	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 16:47	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 16:47	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 16:47	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 16:47	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 16:47	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 16:47	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 16:47	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 16:47	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 16:47	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 16:47	WG1094680
Methyl tert-butyl ether	0.00141		0.000367	0.00100	1	04/06/2018 16:47	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 16:47	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 16:47	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 16:47	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 16:47	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 16:47	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 16:47	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 16:47	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 16:47	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 16:47	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 16:47	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 16:47	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 16:47	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 16:47	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 16:47	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 16:47	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 16:47	WG1094680
(S) Toluene-d8	*107*			*80.0-120*		*04/06/2018 16:47*	WG1094680
(S) Dibromofluoromethane	*88.1*			*76.0-123*		*04/06/2018 16:47*	WG1094680
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 16:47*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.28		0.0247	0.100	1	04/09/2018 16:30	WG1094424
(S) o-Terphenyl	*105*			*31.0-160*		*04/09/2018 16:30*	WG1094424

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4490		2.82	10.0	1	04/10/2018 15:40	WG1095812

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0660	J	0.0197	0.100	1	04/10/2018 13:07	WG1095630

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1570		5.19	100	100	04/07/2018 13:04	WG1094674
Fluoride	1.13		0.00990	0.100	1	04/07/2018 12:52	WG1094674
Sulfate	U		0.0774	5.00	1	04/07/2018 12:52	WG1094674

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0226		0.000250	0.00200	1	04/12/2018 23:17	WG1094257
Arsenic,Dissolved	0.0216		0.000250	0.00200	1	04/11/2018 17:27	WG1094247
Barium	0.0229		0.000360	0.00500	1	04/12/2018 23:17	WG1094257
Barium,Dissolved	0.0220		0.000360	0.00500	1	04/11/2018 17:27	WG1094247
Calcium	513		0.0460	1.00	1	04/12/2018 23:17	WG1094257
Chromium	U		0.000540	0.00200	1	04/12/2018 23:17	WG1094257
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 17:27	WG1094247
Iron	0.0493	J	0.0150	0.100	1	04/12/2018 23:17	WG1094257
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 17:27	WG1094247
Lead	0.000256	J	0.000240	0.00200	1	04/12/2018 23:17	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 17:27	WG1094247
Manganese	2.77		0.000250	0.00500	1	04/12/2018 23:17	WG1094257
Manganese,Dissolved	2.87		0.000250	0.00500	1	04/11/2018 17:27	WG1094247
Potassium	5.10		0.0370	1.00	1	04/12/2018 23:17	WG1094257
Selenium	U		0.000380	0.00200	1	04/12/2018 23:17	WG1094257
Selenium,Dissolved	0.000629	J	0.000380	0.00200	1	04/11/2018 17:27	WG1094247
Sodium	1080		0.220	2.00	2	04/13/2018 01:00	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	1.35		0.0314	0.100	1	04/06/2018 17:09	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*93.0*			*77.0-122*		*04/06/2018 17:09*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 17:08	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 17:08	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 17:08	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 17:08	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 17:08	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 17:08	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 17:08	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 17:08	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 17:08	WG1094680

MW-123

Collected date/time: 04/03/18 12:50

SAMPLE RESULTS - 06

L983397

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 17:08	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 17:08	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 17:08	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 17:08	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 17:08	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 17:08	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 17:08	WG1094680
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 17:08	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 17:08	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 17:08	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 17:08	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 17:08	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 17:08	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 17:08	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 17:08	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 17:08	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 17:08	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 17:08	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 17:08	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 17:08	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 17:08	WG1094680
Methyl tert-butyl ether	0.00122		0.000367	0.00100	1	04/06/2018 17:08	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 17:08	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 17:08	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 17:08	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 17:08	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 17:08	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 17:08	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 17:08	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 17:08	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 17:08	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 17:08	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 17:08	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 17:08	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 17:08	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 17:08	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 17:08	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 17:08	WG1094680
(S) Toluene-d8	*107*			*80.0-120*		*04/06/2018 17:08*	WG1094680
(S) Dibromofluoromethane	*85.7*			*76.0-123*		*04/06/2018 17:08*	WG1094680
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/06/2018 17:08*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.09		0.0247	0.100	1	04/09/2018 16:47	WG1094424
(S) o-Terphenyl	*101*			*31.0-160*		*04/09/2018 16:47*	WG1094424

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-4A

Collected date/time: 04/03/18 16:40

SAMPLE RESULTS - 07

L983397

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4170		2.82	10.0	1	04/10/2018 15:40	WG1095812

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0240	J	0.0197	0.100	1	04/10/2018 13:08	WG1095630

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1350		5.19	100	100	04/08/2018 09:39	WG1094675
Fluoride	1.99		0.00990	0.100	1	04/08/2018 09:27	WG1094675
Sulfate	1820		7.74	500	100	04/08/2018 09:39	WG1094675

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.105		0.000250	0.00200	1	04/12/2018 23:21	WG1094257
Arsenic,Dissolved	0.106		0.000250	0.00200	1	04/11/2018 17:43	WG1094247
Barium	0.0125		0.000360	0.00500	1	04/12/2018 23:21	WG1094257
Barium,Dissolved	0.0120		0.000360	0.00500	1	04/11/2018 17:43	WG1094247
Calcium	428		0.0460	1.00	1	04/12/2018 23:21	WG1094257
Chromium	0.00444		0.000540	0.00200	1	04/12/2018 23:21	WG1094257
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 17:43	WG1094247
Iron	9.18		0.0150	0.100	1	04/12/2018 23:21	WG1094257
Iron,Dissolved	1.49		0.0150	0.100	1	04/11/2018 17:43	WG1094247
Lead	0.00119	J	0.000240	0.00200	1	04/12/2018 23:21	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 17:43	WG1094247
Manganese	1.93		0.000250	0.00500	1	04/12/2018 23:21	WG1094257
Manganese,Dissolved	1.98		0.000250	0.00500	1	04/11/2018 17:43	WG1094247
Potassium	5.05		0.0370	1.00	1	04/12/2018 23:21	WG1094257
Selenium	0.000515	J	0.000380	0.00200	1	04/12/2018 23:21	WG1094257
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 17:43	WG1094247
Sodium	899		0.110	1.00	1	04/12/2018 23:21	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.448		0.0314	0.100	1	04/06/2018 17:31	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*98.3*			*77.0-122*		*04/06/2018 17:31*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 17:29	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 17:29	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 17:29	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 17:29	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 17:29	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 17:29	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 17:29	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 17:29	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 17:29	WG1094680

MW-4A

SAMPLE RESULTS - 07

Collected date/time: 04/03/18 16:40

L983397

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 17:29	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 17:29	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 17:29	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 17:29	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 17:29	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 17:29	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 17:29	WG1094680
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 17:29	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 17:29	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 17:29	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 17:29	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 17:29	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 17:29	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 17:29	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 17:29	WG1094680
Isopropylbenzene	0.00352		0.000326	0.00100	1	04/06/2018 17:29	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 17:29	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 17:29	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 17:29	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 17:29	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 17:29	WG1094680
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 17:29	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 17:29	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 17:29	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 17:29	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 17:29	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 17:29	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 17:29	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 17:29	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 17:29	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 17:29	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 17:29	WG1094680
1,2,4-Trimethylbenzene	0.000492	J	0.000373	0.00100	1	04/06/2018 17:29	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 17:29	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 17:29	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 17:29	WG1094680
m&p-Xylene	0.00266		0.000719	0.00200	1	04/06/2018 17:29	WG1094680
Xylenes, Total	0.00266	J	0.00106	0.00300	1	04/06/2018 17:29	WG1094680
(S) Toluene-d8	*105*			*80.0-120*		*04/06/2018 17:29*	WG1094680
(S) Dibromofluoromethane	*87.0*			*76.0-123*		*04/06/2018 17:29*	WG1094680
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/06/2018 17:29*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	5.10		0.0247	0.100	1	04/09/2018 17:04	WG1094424
(S) o-Terphenyl	*104*			*31.0-160*		*04/09/2018 17:04*	WG1094424

MW-5A

Collected date/time: 04/03/18 15:35

SAMPLE RESULTS - 08

L983397

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	13700		2.82	10.0	1	04/10/2018 15:40	WG1095812

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0530	J	0.0197	0.100	1	04/10/2018 13:09	WG1095630

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	3040		5.19	100	100	04/08/2018 10:06	WG1094675
Fluoride	2.83		0.00990	0.100	1	04/08/2018 09:53	WG1094675
Sulfate	6030		7.74	500	100	04/08/2018 10:06	WG1094675

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.187		0.000250	0.00200	1	04/12/2018 23:26	WG1094257
Arsenic,Dissolved	0.128		0.000250	0.00200	1	04/11/2018 17:47	WG1094247
Barium	0.0124		0.000360	0.00500	1	04/12/2018 23:26	WG1094257
Barium,Dissolved	0.0135		0.000360	0.00500	1	04/11/2018 17:47	WG1094247
Calcium	478		0.0460	1.00	1	04/12/2018 23:26	WG1094257
Chromium	U		0.000540	0.00200	1	04/12/2018 23:26	WG1094257
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 17:47	WG1094247
Iron	8.07		0.0150	0.100	1	04/12/2018 23:26	WG1094257
Iron,Dissolved	5.93		0.0150	0.100	1	04/11/2018 17:47	WG1094247
Lead	0.000629	J	0.000240	0.00200	1	04/12/2018 23:26	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 17:47	WG1094247
Manganese	1.15		0.000250	0.00500	1	04/12/2018 23:26	WG1094257
Manganese,Dissolved	1.14		0.000250	0.00500	1	04/11/2018 17:47	WG1094247
Potassium	7.82		0.0370	1.00	1	04/12/2018 23:26	WG1094257
Selenium	0.00121	J	0.000380	0.00200	1	04/12/2018 23:26	WG1094257
Selenium,Dissolved	0.00153	J	0.000380	0.00200	1	04/11/2018 17:47	WG1094247
Sodium	2890		0.550	5.00	5	04/13/2018 01:04	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.95		0.0314	0.100	1	04/06/2018 17:53	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*97.0*			*77.0-122*		*04/06/2018 17:53*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 17:50	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 17:50	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 17:50	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 17:50	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 17:50	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 17:50	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 17:50	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 17:50	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 17:50	WG1094680

MW-5A
Collected date/time: 04/03/18 15:35

SAMPLE RESULTS - 08

L983397

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 17:50	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 17:50	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 17:50	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 17:50	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 17:50	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 17:50	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 17:50	WG1094680
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 17:50	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 17:50	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 17:50	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 17:50	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 17:50	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 17:50	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 17:50	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 17:50	WG1094680
Isopropylbenzene	0.000503	J	0.000326	0.00100	1	04/06/2018 17:50	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 17:50	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 17:50	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 17:50	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 17:50	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 17:50	WG1094680
Methyl tert-butyl ether	0.00147		0.000367	0.00100	1	04/06/2018 17:50	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 17:50	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 17:50	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 17:50	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 17:50	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 17:50	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 17:50	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 17:50	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 17:50	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 17:50	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 17:50	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 17:50	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 17:50	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 17:50	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 17:50	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 17:50	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 17:50	WG1094680
(S) Toluene-d8	*107*			*80.0-120*		*04/06/2018 17:50*	WG1094680
(S) Dibromofluoromethane	*85.1*			*76.0-123*		*04/06/2018 17:50*	WG1094680
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/06/2018 17:50*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	6.89		0.0247	0.100	1	04/09/2018 17:20	WG1094424
(S) o-Terphenyl	*107*			*31.0-160*		*04/09/2018 17:20*	WG1094424

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5380		2.82	10.0	1	04/10/2018 15:40	WG1095812

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.140		0.0197	0.100	1	04/10/2018 13:10	WG1095630

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	2080		5.19	100	100	04/08/2018 10:33	WG1094675
Fluoride	1.40		0.00990	0.100	1	04/08/2018 10:20	WG1094675
Sulfate	2670		7.74	500	100	04/08/2018 10:33	WG1094675

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0348		0.000250	0.00200	1	04/12/2018 23:30	WG1094257
Arsenic,Dissolved	0.0254		0.000250	0.00200	1	04/11/2018 17:51	WG1094247
Barium	0.0162		0.000360	0.00500	1	04/12/2018 23:30	WG1094257
Barium,Dissolved	0.0152		0.000360	0.00500	1	04/11/2018 17:51	WG1094247
Calcium	358		0.0460	1.00	1	04/12/2018 23:30	WG1094257
Chromium	0.00319		0.000540	0.00200	1	04/12/2018 23:30	WG1094257
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 17:51	WG1094247
Iron	5.95		0.0150	0.100	1	04/12/2018 23:30	WG1094257
Iron,Dissolved	4.66		0.0150	0.100	1	04/11/2018 17:51	WG1094247
Lead	0.000534	J	0.000240	0.00200	1	04/12/2018 23:30	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 17:51	WG1094247
Manganese	0.483		0.000250	0.00500	1	04/12/2018 23:30	WG1094257
Manganese,Dissolved	0.499		0.000250	0.00500	1	04/11/2018 17:51	WG1094247
Potassium	3.91		0.0370	1.00	1	04/12/2018 23:30	WG1094257
Selenium	0.000393	J	0.000380	0.00200	1	04/12/2018 23:30	WG1094257
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 17:51	WG1094247
Sodium	1580		0.220	2.00	2	04/13/2018 01:09	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.378		0.0314	0.100	1	04/06/2018 18:15	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*93.0*			*77.0-122*		*04/06/2018 18:15*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 18:10	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 18:10	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 18:10	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 18:10	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 18:10	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 18:10	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 18:10	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 18:10	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 18:10	WG1094680

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 18:10	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 18:10	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 18:10	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 18:10	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 18:10	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 18:10	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 18:10	WG1094680
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 18:10	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 18:10	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 18:10	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 18:10	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 18:10	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 18:10	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 18:10	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 18:10	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 18:10	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 18:10	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 18:10	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 18:10	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 18:10	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 18:10	WG1094680
Methyl tert-butyl ether	0.00130		0.000367	0.00100	1	04/06/2018 18:10	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 18:10	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 18:10	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 18:10	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 18:10	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 18:10	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 18:10	WG1094680
Toluene	U		0.000412	0.00100	1	04/06/2018 18:10	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 18:10	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 18:10	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 18:10	WG1094680
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 18:10	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 18:10	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 18:10	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 18:10	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 18:10	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 18:10	WG1094680
(S) Toluene-d8	*109*			*80.0-120*		*04/06/2018 18:10*	WG1094680
(S) Dibromofluoromethane	*83.0*			*76.0-123*		*04/06/2018 18:10*	WG1094680
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/06/2018 18:10*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.26		0.0247	0.100	1	04/09/2018 17:37	WG1094424
(S) o-Terphenyl	*103*			*31.0-160*		*04/09/2018 17:37*	WG1094424

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	9840		2.82	10.0	1	04/10/2018 15:40	WG1095812

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.181		0.0197	0.100	1	04/10/2018 13:11	WG1095630

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/09/2018 15:40	WG1094972

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	2630		5.19	100	100	04/08/2018 11:26	WG1094675
Fluoride	2.87		0.00990	0.100	1	04/08/2018 10:46	WG1094675
Sulfate	3730		7.74	500	100	04/08/2018 11:26	WG1094675

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	0.000103	J	0.0000490	0.000200	1	04/08/2018 16:13	WG1094610
Mercury,Dissolved	U		0.0000490	0.000200	1	04/08/2018 20:04	WG1094326

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.770		0.0126	0.200	1	04/08/2018 21:21	WG1094248
Boron,Dissolved	0.798		0.0126	0.200	1	04/10/2018 10:25	WG1094698

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0847		0.000250	0.00200	1	04/12/2018 23:34	WG1094257
Arsenic,Dissolved	0.0830		0.000250	0.00200	1	04/11/2018 17:55	WG1094247
Barium	0.0174		0.000360	0.00500	1	04/12/2018 23:34	WG1094257
Barium,Dissolved	0.0186		0.000360	0.00500	1	04/11/2018 17:55	WG1094247
Cadmium	U		0.000160	0.00100	1	04/12/2018 23:34	WG1094257
Cadmium,Dissolved	U		0.000160	0.00100	1	04/11/2018 17:55	WG1094247
Calcium	680		0.0460	1.00	1	04/12/2018 23:34	WG1094257
Chromium	U		0.000540	0.00200	1	04/12/2018 23:34	WG1094257
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 17:55	WG1094247
Cobalt	0.000833	J	0.000260	0.00200	1	04/12/2018 23:34	WG1094257
Cobalt,Dissolved	0.000836	J	0.000260	0.00200	1	04/11/2018 17:55	WG1094247
Iron	6.63		0.0150	0.100	1	04/12/2018 23:34	WG1094257
Iron,Dissolved	6.88		0.0150	0.100	1	04/11/2018 17:55	WG1094247
Lead	0.000279	J	0.000240	0.00200	1	04/12/2018 23:34	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 17:55	WG1094247
Manganese	3.85		0.000250	0.00500	1	04/12/2018 23:34	WG1094257
Manganese,Dissolved	3.87		0.000250	0.00500	1	04/11/2018 17:55	WG1094247
Nickel	0.0234		0.000350	0.00200	1	04/12/2018 23:34	WG1094257
Nickel,Dissolved	0.0216		0.000350	0.00200	1	04/11/2018 17:55	WG1094247

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Potassium	8.52		0.0370	1.00	1	04/12/2018 23:34	WG1094257
Selenium	0.00112	J	0.000380	0.00200	1	04/12/2018 23:34	WG1094257
Selenium,Dissolved	0.000965	J	0.000380	0.00200	1	04/11/2018 17:55	WG1094247
Sodium	2090		0.550	5.00	5	04/13/2018 01:13	WG1094257
Uranium	0.000801	J	0.000330	0.0100	1	04/12/2018 23:34	WG1094257
Uranium,Dissolved	0.000903	J	0.000330	0.0100	1	04/11/2018 17:55	WG1094247
Vanadium	0.000500	J	0.000180	0.00500	1	04/12/2018 23:34	WG1094257
Vanadium,Dissolved	0.000582	J	0.000180	0.00500	1	04/11/2018 17:55	WG1094247

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.861		0.0314	0.100	1	04/06/2018 18:38	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*96.0*			*77.0-122*		*04/06/2018 18:38*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 18:31	WG1094680
Benzene	U		0.000331	0.00100	1	04/06/2018 18:31	WG1094680
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 18:31	WG1094680
Bromoform	U		0.000469	0.00100	1	04/06/2018 18:31	WG1094680
Bromomethane	U		0.000866	0.00500	1	04/06/2018 18:31	WG1094680
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 18:31	WG1094680
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 18:31	WG1094680
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 18:31	WG1094680
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 18:31	WG1094680
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 18:31	WG1094680
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 18:31	WG1094680
Chloroethane	U		0.000453	0.00500	1	04/06/2018 18:31	WG1094680
Chloroform	U		0.000324	0.00500	1	04/06/2018 18:31	WG1094680
Chloromethane	U		0.000276	0.00250	1	04/06/2018 18:31	WG1094680
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 18:31	WG1094680
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 18:31	WG1094680
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 18:31	WG1094680
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 18:31	WG1094680
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 18:31	WG1094680
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 18:31	WG1094680
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 18:31	WG1094680
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 18:31	WG1094680
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 18:31	WG1094680
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 18:31	WG1094680
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 18:31	WG1094680
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 18:31	WG1094680
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 18:31	WG1094680
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 18:31	WG1094680
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 18:31	WG1094680
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 18:31	WG1094680
Methyl tert-butyl ether	0.00380		0.000367	0.00100	1	04/06/2018 18:31	WG1094680
Naphthalene	U		0.00100	0.00500	1	04/06/2018 18:31	WG1094680
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 18:31	WG1094680
Styrene	U		0.000307	0.00100	1	04/06/2018 18:31	WG1094680
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 18:31	WG1094680
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 18:31	WG1094680
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 18:31	WG1094680

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	04/06/2018 18:31	WG1094680
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 18:31	WG1094680
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 18:31	WG1094680
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 18:31	WG1094680
1,2,4-Trimethylbenzene	0.000562	J	0.000373	0.00100	1	04/06/2018 18:31	WG1094680
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 18:31	WG1094680
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 18:31	WG1094680
o-Xylene	U		0.000341	0.00100	1	04/06/2018 18:31	WG1094680
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 18:31	WG1094680
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 18:31	WG1094680
(S) Toluene-d8	*109*			*80.0-120*		*04/06/2018 18:31*	WG1094680
(S) Dibromofluoromethane	*82.9*			*76.0-123*		*04/06/2018 18:31*	WG1094680
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/06/2018 18:31*	WG1094680

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	3.15		0.0247	0.100	1	04/09/2018 17:54	WG1094424
(S) o-Terphenyl	*97.3*			*31.0-160*		*04/09/2018 17:54*	WG1094424

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5430		2.82	10.0	1	04/10/2018 15:40	WG1095812

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0580	J	0.0197	0.100	1	04/10/2018 13:13	WG1095630

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	2170		5.19	100	100	04/08/2018 11:53	WG1094675
Fluoride	1.41		0.00990	0.100	1	04/08/2018 11:40	WG1094675
Sulfate	2780		7.74	500	100	04/08/2018 11:53	WG1094675

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0298		0.000250	0.00200	1	04/12/2018 23:39	WG1094257
Arsenic,Dissolved	0.0251		0.000250	0.00200	1	04/11/2018 17:59	WG1094247
Barium	0.0164		0.000360	0.00500	1	04/12/2018 23:39	WG1094257
Barium,Dissolved	0.0160		0.000360	0.00500	1	04/11/2018 17:59	WG1094247
Calcium	354		0.0460	1.00	1	04/12/2018 23:39	WG1094257
Chromium	0.00109	J	0.000540	0.00200	1	04/12/2018 23:39	WG1094257
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 17:59	WG1094247
Iron	5.05		0.0150	0.100	1	04/12/2018 23:39	WG1094257
Iron,Dissolved	4.57		0.0150	0.100	1	04/11/2018 17:59	WG1094247
Lead	0.000599	J	0.000240	0.00200	1	04/12/2018 23:39	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 17:59	WG1094247
Manganese	0.481		0.000250	0.00500	1	04/12/2018 23:39	WG1094257
Manganese,Dissolved	0.516		0.000250	0.00500	1	04/11/2018 17:59	WG1094247
Potassium	3.89		0.0370	1.00	1	04/12/2018 23:39	WG1094257
Selenium	U		0.000380	0.00200	1	04/12/2018 23:39	WG1094257
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 17:59	WG1094247
Sodium	1590		0.220	2.00	2	04/13/2018 01:18	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.379		0.0314	0.100	1	04/06/2018 19:00	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*93.3*			*77.0-122*		*04/06/2018 19:00*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 15:18	WG1094689
Benzene	U		0.000331	0.00100	1	04/06/2018 15:18	WG1094689
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 15:18	WG1094689
Bromoform	U		0.000469	0.00100	1	04/06/2018 15:18	WG1094689
Bromomethane	U		0.000866	0.00500	1	04/06/2018 15:18	WG1094689
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 15:18	WG1094689
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 15:18	WG1094689
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 15:18	WG1094689
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 15:18	WG1094689

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 15:18	WG1094689
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 15:18	WG1094689
Chloroethane	U		0.000453	0.00500	1	04/06/2018 15:18	WG1094689
Chloroform	U		0.000324	0.00500	1	04/06/2018 15:18	WG1094689
Chloromethane	U		0.000276	0.00250	1	04/06/2018 15:18	WG1094689
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 15:18	WG1094689
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 15:18	WG1094689
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 15:18	WG1094689
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 15:18	WG1094689
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 15:18	WG1094689
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 15:18	WG1094689
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 15:18	WG1094689
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 15:18	WG1094689
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 15:18	WG1094689
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 15:18	WG1094689
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 15:18	WG1094689
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 15:18	WG1094689
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 15:18	WG1094689
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 15:18	WG1094689
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 15:18	WG1094689
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 15:18	WG1094689
Methyl tert-butyl ether	0.00191		0.000367	0.00100	1	04/06/2018 15:18	WG1094689
Naphthalene	U		0.00100	0.00500	1	04/06/2018 15:18	WG1094689
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 15:18	WG1094689
Styrene	U		0.000307	0.00100	1	04/06/2018 15:18	WG1094689
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 15:18	WG1094689
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 15:18	WG1094689
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 15:18	WG1094689
Toluene	U		0.000412	0.00100	1	04/06/2018 15:18	WG1094689
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 15:18	WG1094689
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 15:18	WG1094689
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 15:18	WG1094689
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 15:18	WG1094689
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 15:18	WG1094689
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 15:18	WG1094689
o-Xylene	U		0.000341	0.00100	1	04/06/2018 15:18	WG1094689
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 15:18	WG1094689
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 15:18	WG1094689
(S) Toluene-d8	*98.7*			*80.0-120*		*04/06/2018 15:18*	WG1094689
(S) Dibromofluoromethane	*98.3*			*76.0-123*		*04/06/2018 15:18*	WG1094689
(S) 4-Bromofluorobenzene	*102*			*80.0-120*		*04/06/2018 15:18*	WG1094689

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.28		0.0247	0.100	1	04/09/2018 18:11	WG1094424
(S) o-Terphenyl	*103*			*31.0-160*		*04/09/2018 18:11*	WG1094424

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4320	J3	2.82	10.0	1	04/10/2018 15:40	WG1095812

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0660	J	0.0197	0.100	1	04/10/2018 13:14	WG1095630

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1840		5.19	100	100	04/08/2018 12:20	WG1094675
Fluoride	0.738		0.00990	0.100	1	04/08/2018 12:07	WG1094675
Sulfate	2380		7.74	500	100	04/08/2018 12:20	WG1094675

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0371		0.000250	0.00200	1	04/12/2018 23:43	WG1094257
Arsenic,Dissolved	0.0308		0.000250	0.00200	1	04/11/2018 18:03	WG1094247
Barium	0.0165		0.000360	0.00500	1	04/12/2018 23:43	WG1094257
Barium,Dissolved	0.0156		0.000360	0.00500	1	04/11/2018 18:03	WG1094247
Calcium	468		0.0460	1.00	1	04/12/2018 23:43	WG1094257
Chromium	U		0.000540	0.00200	1	04/12/2018 23:43	WG1094257
Chromium,Dissolved	U		0.000540	0.00200	1	04/11/2018 18:03	WG1094247
Iron	3.68		0.0150	0.100	1	04/12/2018 23:43	WG1094257
Iron,Dissolved	1.06		0.0150	0.100	1	04/11/2018 18:03	WG1094247
Lead	U		0.000240	0.00200	1	04/12/2018 23:43	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 18:03	WG1094247
Manganese	6.18		0.000250	0.00500	1	04/12/2018 23:43	WG1094257
Manganese,Dissolved	6.27		0.000250	0.00500	1	04/11/2018 18:03	WG1094247
Potassium	3.57		0.0370	1.00	1	04/12/2018 23:43	WG1094257
Selenium	0.000839	J	0.000380	0.00200	1	04/12/2018 23:43	WG1094257
Selenium,Dissolved	0.000837	J	0.000380	0.00200	1	04/11/2018 18:03	WG1094247
Sodium	1310		0.220	2.00	2	04/13/2018 01:22	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	3.30		0.0314	0.100	1	04/06/2018 19:22	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*96.1*			*77.0-122*		*04/06/2018 19:22*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/06/2018 15:38	WG1094689
Benzene	U		0.000331	0.00100	1	04/06/2018 15:38	WG1094689
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 15:38	WG1094689
Bromoform	U		0.000469	0.00100	1	04/06/2018 15:38	WG1094689
Bromomethane	U		0.000866	0.00500	1	04/06/2018 15:38	WG1094689
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 15:38	WG1094689
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 15:38	WG1094689
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 15:38	WG1094689
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 15:38	WG1094689

DUP-EP-02

Collected date/time: 04/03/18 10:00

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 15:38	WG1094689
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 15:38	WG1094689
Chloroethane	U		0.000453	0.00500	1	04/06/2018 15:38	WG1094689
Chloroform	U		0.000324	0.00500	1	04/06/2018 15:38	WG1094689
Chloromethane	U		0.000276	0.00250	1	04/06/2018 15:38	WG1094689
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 15:38	WG1094689
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 15:38	WG1094689
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 15:38	WG1094689
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 15:38	WG1094689
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 15:38	WG1094689
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 15:38	WG1094689
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 15:38	WG1094689
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 15:38	WG1094689
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 15:38	WG1094689
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 15:38	WG1094689
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 15:38	WG1094689
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 15:38	WG1094689
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 15:38	WG1094689
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 15:38	WG1094689
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 15:38	WG1094689
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 15:38	WG1094689
Methyl tert-butyl ether	0.00580		0.000367	0.00100	1	04/06/2018 15:38	WG1094689
Naphthalene	U		0.00100	0.00500	1	04/06/2018 15:38	WG1094689
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 15:38	WG1094689
Styrene	U		0.000307	0.00100	1	04/06/2018 15:38	WG1094689
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 15:38	WG1094689
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 15:38	WG1094689
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 15:38	WG1094689
Toluene	U		0.000412	0.00100	1	04/06/2018 15:38	WG1094689
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 15:38	WG1094689
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 15:38	WG1094689
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 15:38	WG1094689
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 15:38	WG1094689
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 15:38	WG1094689
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 15:38	WG1094689
o-Xylene	U		0.000341	0.00100	1	04/06/2018 15:38	WG1094689
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 15:38	WG1094689
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 15:38	WG1094689
(S) Toluene-d8	*98.3*			*80.0-120*		*04/06/2018 15:38*	WG1094689
(S) Dibromofluoromethane	*96.0*			*76.0-123*		*04/06/2018 15:38*	WG1094689
(S) 4-Bromofluorobenzene	*101*			*80.0-120*		*04/06/2018 15:38*	WG1094689

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	5.22		0.0247	0.100	1	04/09/2018 18:27	WG1094424
(S) o-Terphenyl	*103*			*31.0-160*		*04/09/2018 18:27*	WG1094424

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	13.0		2.82	10.0	1	04/10/2018 18:38	WG1095027

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	1.14	J6	0.0197	0.100	1	04/10/2018 13:20	WG1095630

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	0.104	B J P1	0.0519	1.00	1	04/08/2018 12:33	WG1094675
Fluoride	U		0.00990	0.100	1	04/08/2018 12:33	WG1094675
Sulfate	0.238	B J P1	0.0774	5.00	1	04/08/2018 12:33	WG1094675

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.000946	J	0.000250	0.00200	1	04/12/2018 23:48	WG1094257
Arsenic,Dissolved	U		0.000250	0.00200	1	04/11/2018 18:07	WG1094247
Barium	U		0.000360	0.00500	1	04/12/2018 23:48	WG1094257
Barium,Dissolved	U		0.000360	0.00500	1	04/11/2018 18:07	WG1094247
Calcium	0.0575	J	0.0460	1.00	1	04/12/2018 23:48	WG1094257
Chromium	0.00476		0.000540	0.00200	1	04/12/2018 23:48	WG1094257
Chromium,Dissolved	0.00109	J	0.000540	0.00200	1	04/11/2018 18:07	WG1094247
Iron	0.0346	J	0.0150	0.100	1	04/12/2018 23:48	WG1094257
Iron,Dissolved	U		0.0150	0.100	1	04/11/2018 18:07	WG1094247
Lead	U		0.000240	0.00200	1	04/12/2018 23:48	WG1094257
Lead,Dissolved	U		0.000240	0.00200	1	04/11/2018 18:07	WG1094247
Manganese	0.00183	J	0.000250	0.00500	1	04/12/2018 23:48	WG1094257
Manganese,Dissolved	0.0144		0.000250	0.00500	1	04/11/2018 18:07	WG1094247
Potassium	U		0.0370	1.00	1	04/12/2018 23:48	WG1094257
Selenium	U		0.000380	0.00200	1	04/12/2018 23:48	WG1094257
Selenium,Dissolved	U		0.000380	0.00200	1	04/11/2018 18:07	WG1094247
Sodium	0.904	J	0.110	1.00	1	04/12/2018 23:48	WG1094257

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.0335	J	0.0314	0.100	1	04/06/2018 19:44	WG1094563
(S) a,a,a-Trifluorotoluene(FID)	*92.7*			*77.0-122*		*04/06/2018 19:44*	WG1094563

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/06/2018 15:58	WG1094689
Benzene	U		0.000331	0.00100	1	04/06/2018 15:58	WG1094689
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 15:58	WG1094689
Bromoform	U		0.000469	0.00100	1	04/06/2018 15:58	WG1094689
Bromomethane	U		0.000866	0.00500	1	04/06/2018 15:58	WG1094689
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 15:58	WG1094689
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 15:58	WG1094689
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 15:58	WG1094689
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 15:58	WG1094689

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 15:58	WG1094689
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 15:58	WG1094689
Chloroethane	U		0.000453	0.00500	1	04/06/2018 15:58	WG1094689
Chloroform	U		0.000324	0.00500	1	04/06/2018 15:58	WG1094689
Chloromethane	U		0.000276	0.00250	1	04/06/2018 15:58	WG1094689
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 15:58	WG1094689
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 15:58	WG1094689
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 15:58	WG1094689
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 15:58	WG1094689
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 15:58	WG1094689
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 15:58	WG1094689
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 15:58	WG1094689
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 15:58	WG1094689
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 15:58	WG1094689
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 15:58	WG1094689
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 15:58	WG1094689
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 15:58	WG1094689
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 15:58	WG1094689
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 15:58	WG1094689
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 15:58	WG1094689
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 15:58	WG1094689
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 15:58	WG1094689
Naphthalene	U		0.00100	0.00500	1	04/06/2018 15:58	WG1094689
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 15:58	WG1094689
Styrene	U		0.000307	0.00100	1	04/06/2018 15:58	WG1094689
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 15:58	WG1094689
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 15:58	WG1094689
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 15:58	WG1094689
Toluene	U		0.000412	0.00100	1	04/06/2018 15:58	WG1094689
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 15:58	WG1094689
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 15:58	WG1094689
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 15:58	WG1094689
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 15:58	WG1094689
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 15:58	WG1094689
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 15:58	WG1094689
o-Xylene	U		0.000341	0.00100	1	04/06/2018 15:58	WG1094689
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 15:58	WG1094689
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 15:58	WG1094689
(S) Toluene-d8	*101*			*80.0-120*		*04/06/2018 15:58*	WG1094689
(S) Dibromofluoromethane	*96.5*			*76.0-123*		*04/06/2018 15:58*	WG1094689
(S) 4-Bromofluorobenzene	*102*			*80.0-120*		*04/06/2018 15:58*	WG1094689

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0366	J	0.0247	0.100	1	04/09/2018 18:44	WG1094424
(S) o-Terphenyl	*99.4*			*31.0-160*		*04/09/2018 18:44*	WG1094424

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	0.0160	J	0.0100	0.0500	1	04/06/2018 12:59	WG1094689
Benzene	U		0.000331	0.00100	1	04/06/2018 12:59	WG1094689
Bromodichloromethane	U		0.000380	0.00100	1	04/06/2018 12:59	WG1094689
Bromoform	U		0.000469	0.00100	1	04/06/2018 12:59	WG1094689
Bromomethane	U		0.000866	0.00500	1	04/06/2018 12:59	WG1094689
n-Butylbenzene	U		0.000361	0.00100	1	04/06/2018 12:59	WG1094689
sec-Butylbenzene	U		0.000365	0.00100	1	04/06/2018 12:59	WG1094689
Carbon disulfide	U		0.000275	0.00100	1	04/06/2018 12:59	WG1094689
Carbon tetrachloride	U		0.000379	0.00100	1	04/06/2018 12:59	WG1094689
Chlorobenzene	U		0.000348	0.00100	1	04/06/2018 12:59	WG1094689
Chlorodibromomethane	U		0.000327	0.00100	1	04/06/2018 12:59	WG1094689
Chloroethane	U		0.000453	0.00500	1	04/06/2018 12:59	WG1094689
Chloroform	U		0.000324	0.00500	1	04/06/2018 12:59	WG1094689
Chloromethane	U		0.000276	0.00250	1	04/06/2018 12:59	WG1094689
1,2-Dibromoethane	U		0.000381	0.00100	1	04/06/2018 12:59	WG1094689
1,1-Dichloroethane	U		0.000259	0.00100	1	04/06/2018 12:59	WG1094689
1,2-Dichloroethane	U		0.000361	0.00100	1	04/06/2018 12:59	WG1094689
1,1-Dichloroethene	U		0.000398	0.00100	1	04/06/2018 12:59	WG1094689
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/06/2018 12:59	WG1094689
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/06/2018 12:59	WG1094689
1,2-Dichloropropane	U		0.000306	0.00100	1	04/06/2018 12:59	WG1094689
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/06/2018 12:59	WG1094689
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/06/2018 12:59	WG1094689
Ethylbenzene	U		0.000384	0.00100	1	04/06/2018 12:59	WG1094689
Isopropylbenzene	U		0.000326	0.00100	1	04/06/2018 12:59	WG1094689
p-Isopropyltoluene	U		0.000350	0.00100	1	04/06/2018 12:59	WG1094689
2-Butanone (MEK)	U		0.00393	0.0100	1	04/06/2018 12:59	WG1094689
2-Hexanone	U		0.00382	0.0100	1	04/06/2018 12:59	WG1094689
Methylene Chloride	U		0.00100	0.00500	1	04/06/2018 12:59	WG1094689
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/06/2018 12:59	WG1094689
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/06/2018 12:59	WG1094689
Naphthalene	U		0.00100	0.00500	1	04/06/2018 12:59	WG1094689
n-Propylbenzene	U		0.000349	0.00100	1	04/06/2018 12:59	WG1094689
Styrene	U		0.000307	0.00100	1	04/06/2018 12:59	WG1094689
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/06/2018 12:59	WG1094689
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/06/2018 12:59	WG1094689
Tetrachloroethene	U		0.000372	0.00100	1	04/06/2018 12:59	WG1094689
Toluene	0.000596	J	0.000412	0.00100	1	04/06/2018 12:59	WG1094689
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/06/2018 12:59	WG1094689
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/06/2018 12:59	WG1094689
Trichloroethene	U		0.000398	0.00100	1	04/06/2018 12:59	WG1094689
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/06/2018 12:59	WG1094689
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/06/2018 12:59	WG1094689
Vinyl chloride	U		0.000259	0.00100	1	04/06/2018 12:59	WG1094689
o-Xylene	U		0.000341	0.00100	1	04/06/2018 12:59	WG1094689
m&p-Xylene	U		0.000719	0.00200	1	04/06/2018 12:59	WG1094689
Xylenes, Total	U		0.00106	0.00300	1	04/06/2018 12:59	WG1094689
(S) Toluene-d8	*101*			*80.0-120*		*04/06/2018 12:59*	WG1094689
(S) Dibromofluoromethane	*93.6*			*76.0-123*		*04/06/2018 12:59*	WG1094689
(S) 4-Bromofluorobenzene	*97.4*			*80.0-120*		*04/06/2018 12:59*	WG1094689

WG1095027

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983397-13

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300984-1 04/10/18 18:38

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Dissolved Solids	U		2.82	10.0

L983354-02 Original Sample (OS) • Duplicate (DUP)

(OS) L983354-02 04/10/18 18:38 • (DUP) R3300984-4 04/10/18 18:38

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	2560	2580	1	0.974		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300984-2 04/10/18 18:38 • (LCSD) R3300984-3 04/10/18 18:38

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Dissolved Solids	8800	8660	8340	98.4	94.8	85.0-115			3.76	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301029-1 04/10/18 15:08

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983397-04 Original Sample (OS) • Duplicate (DUP)

(OS) L983397-04 04/10/18 15:08 • (DUP) R3301029-4 04/10/18 15:08

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Dissolved Solids	4860	4460	1	8.58	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301029-2 04/10/18 15:08 • (LCSD) R3301029-3 04/10/18 15:08

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8560	8350	97.3	94.9	85.0-115			2.48	5

WG1095812

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983397-05,06,07,08,09,10,11,12

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301032-1 04/10/18 15:40

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983397-12 Original Sample (OS) • Duplicate (DUP)

(OS) L983397-12 04/10/18 15:40 • (DUP) R3301032-4 04/10/18 15:40

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	4320	4560	1	5.41	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301032-2 04/10/18 15:40 • (LCSD) R3301032-3 04/10/18 15:40

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8590	8560	97.6	97.3	85.0-115			0.350	5

Method Blank (MB)

(MB) R3300579-1 04/10/18 12:50

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983397-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983397-01 04/10/18 12:56 • (DUP) R3300579-4 04/10/18 12:57

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.109	0.112	1	2.71		20

L983397-12 Original Sample (OS) • Duplicate (DUP)

(OS) L983397-12 04/10/18 13:14 • (DUP) R3300579-6 04/10/18 13:15

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.0660	0.0700	1	5.88	J	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300579-2 04/10/18 12:51 • (LCSD) R3300579-3 04/10/18 12:52

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.85	3.90	96.1	97.4	90.0-110			1.29	20

L983397-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L983397-02 04/10/18 12:58 • (MS) R3300579-5 04/10/18 12:59

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	1.00	3.08	83.2	1	90.0-110	J6

L983397-13 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983397-13 04/10/18 13:20 • (MS) R3300579-7 04/10/18 13:21 • (MSD) R3300579-8 04/10/18 13:22

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	1.14	3.29	3.32	86.0	87.2	1	90.0-110	J6	J6	0.878	20

QUALITY CONTROL SUMMARY

L983397-10

Method Blank (MB)

(MB) R3300229-1 04/09/18 15:09

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L983251-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983251-01 04/09/18 15:26 • (DUP) R3300229-4 04/09/18 15:27

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L983365-14 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-14 04/09/18 15:36 • (DUP) R3300229-5 04/09/18 15:37

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300229-2 04/09/18 15:10 • (LCSD) R3300229-3 04/09/18 15:11

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.102	0.0900	102	90.0	85.0-115			12.5	20

L983397-10 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983397-10 04/09/18 15:40 • (MS) R3300229-6 04/09/18 15:41 • (MSD) R3300229-7 04/09/18 15:42

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	U	0.0896	0.0906	89.6	90.6	1	75.0-125			1.11	20

QUALITY CONTROL SUMMARY

L983397-01,02,03,04,05,06

Method Blank (MB)

(MB) R3299901-1 04/06/18 22:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	0.0857	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.145	J	0.0774	5.00

L983365-31 Original Sample (OS) • Duplicate (DUP)

(OS) L983365-31 04/07/18 03:19 • (DUP) R3299901-4 04/07/18 03:57

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.254	0.119	1	72.3	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	0.466	0.000	1	200	P1	15

L983370-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983370-03 04/07/18 04:59 • (DUP) R3299901-7 04/07/18 05:11

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	11.4	11.4	1	0.192		15
Fluoride	0.636	0.636	1	0.0315		15
Sulfate	8.90	8.95	1	0.489		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299901-2 04/06/18 23:11 • (LCSD) R3299901-3 04/06/18 23:24

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.6	39.6	99.1	99.1	80.0-120			0.0588	15
Fluoride	8.00	8.03	8.01	100	100	80.0-120			0.132	15
Sulfate	40.0	40.0	39.9	100	99.9	80.0-120			0.168	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983365-31 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-31 04/07/18 03:19 • (MS) R3299901-5 04/07/18 04:09 • (MSD) R3299901-6 04/07/18 04:22

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	0.254	51.6	51.4	103	102	1	80.0-120			0.413	15
Fluoride	5.00	U	5.35	5.22	107	104	1	80.0-120			2.53	15
Sulfate	50.0	0.466	52.6	51.5	104	102	1	80.0-120			2.03	15

L983370-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L983370-03 04/07/18 04:59 • (MS) R3299901-8 04/07/18 05:24

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	11.4	61.1	99.5	1	80.0-120	
Fluoride	5.00	0.636	5.55	98.2	1	80.0-120	
Sulfate	50.0	8.90	58.4	99.1	1	80.0-120	

QUALITY CONTROL SUMMARY

L983397-07,08,09,10,11,12,13

Method Blank (MB)

(MB) R3300270-1 04/08/18 08:16

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.0934	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.103	J	0.0774	5.00

L983397-13 Original Sample (OS) • Duplicate (DUP)

(OS) L983397-13 04/08/18 12:33 • (DUP) R3300270-4 04/08/18 12:47

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.104	0.0713	1	37.4	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	0.238	0.000	1	200	P1	15

L983454-08 Original Sample (OS) • Duplicate (DUP)

(OS) L983454-08 04/08/18 17:04 • (DUP) R3300270-7 04/08/18 17:17

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	55.9	55.8	1	0.151		15
Fluoride	3.03	3.10	1	2.31		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300270-2 04/08/18 08:30 • (LCSD) R3300270-3 04/08/18 08:43

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.6	39.6	98.9	98.9	80.0-120			0.0351	15
Fluoride	8.00	7.99	7.98	99.9	99.8	80.0-120			0.123	15
Sulfate	40.0	40.0	40.0	100	99.9	80.0-120			0.0598	15

L983397-13 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983397-13 04/08/18 12:33 • (MS) R3300270-5 04/08/18 13:00 • (MSD) R3300270-6 04/08/18 13:14

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Fluoride	5.00	U	5.28	5.19	106	104	1	80.0-120			1.70	15

L983454-08 Original Sample (OS) • Matrix Spike (MS)

(OS) L983454-08 04/08/18 17:04 • (MS) R3300270-8 04/08/18 17:30

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	55.9	105	97.2	1	80.0-120	E
Fluoride	5.00	3.03	7.84	96.2	1	80.0-120	

WG1095383

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983397-01

Method Blank (MB)

(MB) R3300437-1 04/09/18 18:14

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300437-2 04/09/18 18:30 • (LCSD) R3300437-3 04/09/18 18:45

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.0	39.1	97.6	97.8	80.0-120			0.211	15

L983318-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983318-06 04/09/18 22:45 • (MS) R3300437-5 04/09/18 23:31 • (MSD) R3300437-6 04/09/18 23:47

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	18.4	72.3	69.9	108	103	1	80.0-120			3.27	15

L983836-05 Original Sample (OS) • Matrix Spike (MS)

(OS) L983836-05 04/10/18 04:55 • (MS) R3300437-8 04/10/18 05:41

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	85.4	136	102	1	80.0-120	E

WG1094326

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983397-10

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300046-1 04/08/18 19:14

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury,Dissolved	0.0000591	J	0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300046-2 04/08/18 19:16 • (LCSD) R3300046-3 04/08/18 19:23

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	0.00311	0.00311	104	104	80.0-120			0.00322	20

L983365-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983365-05 04/08/18 19:25 • (MS) R3300046-4 04/08/18 19:28 • (MSD) R3300046-5 04/08/18 19:30

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	U	0.00284	0.00276	94.5	91.9	1	75.0-125			2.78	20

WG1094610

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983397-10

Method Blank (MB)

(MB) R3300007-6 04/08/18 16:17

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300007-2 04/08/18 15:43 • (LCSD) R3300007-3 04/08/18 15:45

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	0.00312	0.00310	104	103	80.0-120			0.428	20

L983370-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983370-01 04/08/18 15:48 • (MS) R3300007-4 04/08/18 15:50 • (MSD) R3300007-5 04/08/18 15:52

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	ND	0.00315	0.00297	102	95.6	1	75.0-125			5.74	20

WG1094248

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983397-10

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300026-1 04/08/18 20:04

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300026-2 04/08/18 20:06 • (LCSD) R3300026-3 04/08/18 20:08

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Boron	1.00	0.981	0.988	98.1	98.8	80.0-120			0.670	20

L983306-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983306-05 04/08/18 20:11 • (MS) R3300026-5 04/08/18 20:16 • (MSD) R3300026-6 04/08/18 20:19

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Boron	1.00	ND	1.05	1.08	98.0	101	1	75.0-125			2.54	20

WG1094698

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983397-10

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300526-1 04/10/18 09:32

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron,Dissolved	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300526-2 04/10/18 09:35 • (LCSD) R3300526-3 04/10/18 09:38

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	0.986	0.980	98.6	98.0	80.0-120			0.679	20

L983536-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983536-04 04/10/18 09:42 • (MS) R3300526-5 04/10/18 09:48 • (MSD) R3300526-6 04/10/18 09:51

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	0.150	1.15	1.15	99.9	99.9	1	75.0-125			0.0386	20

Method Blank (MB)

(MB) R3300990-1 04/11/18 16:07

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Chromium,Dissolved	U		0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	U		0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300990-2 04/11/18 16:11 • (LCSD) R3300990-3 04/11/18 16:15

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Arsenic,Dissolved	0.0500	0.0483	0.0487	96.6	97.5	80.0-120			0.905	20
Barium,Dissolved	0.0500	0.0480	0.0488	96.0	97.7	80.0-120			1.75	20
Cadmium,Dissolved	0.0500	0.0517	0.0522	103	104	80.0-120			0.984	20
Chromium,Dissolved	0.0500	0.0507	0.0502	101	100	80.0-120			0.990	20
Cobalt,Dissolved	0.0500	0.0526	0.0526	105	105	80.0-120			0.172	20
Iron,Dissolved	5.00	5.12	5.16	102	103	80.0-120			0.727	20
Lead,Dissolved	0.0500	0.0504	0.0503	101	101	80.0-120			0.127	20
Manganese,Dissolved	0.0500	0.0496	0.0477	99.2	95.5	80.0-120			3.84	20
Nickel,Dissolved	0.0500	0.0524	0.0530	105	106	80.0-120			1.14	20
Selenium,Dissolved	0.0500	0.0495	0.0555	99.1	111	80.0-120			11.4	20
Uranium,Dissolved	0.0500	0.0506	0.0507	101	101	80.0-120			0.369	20
Vanadium,Dissolved	0.0500	0.0503	0.0499	101	99.7	80.0-120			0.825	20

L983352-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983352-06 04/11/18 16:19 • (MS) R3300990-5 04/11/18 16:27 • (MSD) R3300990-6 04/11/18 16:31

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic,Dissolved	0.0500	U	0.0498	0.0487	99.5	97.4	1	75.0-125			2.14	20
Barium,Dissolved	0.0500	0.00137	0.0506	0.0501	98.5	97.4	1	75.0-125			1.17	20
Cadmium,Dissolved	0.0500	U	0.0539	0.0528	108	106	1	75.0-125			2.11	20

L983352-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983352-06 04/11/18 16:19 • (MS) R3300990-5 04/11/18 16:27 • (MSD) R3300990-6 04/11/18 16:31

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium,Dissolved	0.0500	0.00123	0.0505	0.0499	98.6	97.4	1	75.0-125			1.27	20
Cobalt,Dissolved	0.0500	U	0.0526	0.0520	105	104	1	75.0-125			1.10	20
Iron,Dissolved	5.00	0.0273	5.06	5.05	101	100	1	75.0-125			0.350	20
Lead,Dissolved	0.0500	U	0.0504	0.0505	101	101	1	75.0-125			0.254	20
Manganese,Dissolved	0.0500	U	0.0487	0.0490	97.4	98.1	1	75.0-125			0.668	20
Nickel,Dissolved	0.0500	U	0.0521	0.0520	104	104	1	75.0-125			0.127	20
Selenium,Dissolved	0.0500	U	0.0482	0.0526	96.5	105	1	75.0-125			8.71	20
Uranium,Dissolved	0.0500	U	0.0508	0.0503	102	101	1	75.0-125			0.910	20
Vanadium,Dissolved	0.0500	0.000310	0.0492	0.0497	97.7	98.7	1	75.0-125			0.946	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301471-1 04/12/18 20:55

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	0.132	J	0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301471-2 04/12/18 20:59 • (LCSD) R3301471-3 04/12/18 21:03

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0493	0.0487	98.6	97.5	80.0-120			1.13	20
Barium	0.0500	0.0489	0.0488	97.9	97.5	80.0-120			0.333	20
Cadmium	0.0500	0.0488	0.0481	97.7	96.1	80.0-120			1.60	20
Calcium	5.00	4.99	4.94	99.8	98.9	80.0-120			0.882	20
Chromium	0.0500	0.0489	0.0489	97.8	97.9	80.0-120			0.0454	20
Cobalt	0.0500	0.0494	0.0488	98.8	97.6	80.0-120			1.25	20
Iron	5.00	5.06	5.06	101	101	80.0-120			0.0957	20
Lead	0.0500	0.0498	0.0483	99.5	96.5	80.0-120			3.10	20
Manganese	0.0500	0.0488	0.0472	97.6	94.4	80.0-120			3.32	20
Nickel	0.0500	0.0510	0.0502	102	100	80.0-120			1.57	20
Potassium	5.00	4.90	4.85	97.9	97.0	80.0-120			0.925	20
Selenium	0.0500	0.0482	0.0498	96.3	99.6	80.0-120			3.34	20
Sodium	5.00	4.96	4.91	99.3	98.2	80.0-120			1.03	20
Uranium	0.0500	0.0478	0.0466	95.5	93.3	80.0-120			2.39	20
Vanadium	0.0500	0.0486	0.0484	97.2	96.8	80.0-120			0.457	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983397-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983397-03 04/12/18 21:08 • (MS) R3301471-5 04/12/18 21:16 • (MSD) R3301471-6 04/12/18 21:21

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00806	0.0569	0.0592	97.6	102	1	75.0-125			3.98	20
Barium	0.0500	0.0112	0.0629	0.0640	104	106	1	75.0-125			1.64	20
Cadmium	0.0500	U	0.0478	0.0487	95.7	97.5	1	75.0-125			1.85	20
Calcium	5.00	421	412	421	0.000	0.000	1	75.0-125	V	V	2.03	20
Chromium	0.0500	0.00119	0.0468	0.0491	91.3	95.8	1	75.0-125			4.70	20
Cobalt	0.0500	0.000640	0.0474	0.0485	93.5	95.7	1	75.0-125			2.25	20
Potassium	5.00	3.09	7.74	7.91	93.1	96.4	1	75.0-125			2.13	20
Iron	5.00	0.0352	4.94	5.07	98.0	101	1	75.0-125			2.64	20
Lead	0.0500	0.000649	0.0507	0.0512	100	101	1	75.0-125			1.03	20
Manganese	0.0500	0.927	0.949	0.966	44.7	79.2	1	75.0-125	V		1.80	20
Nickel	0.0500	0.00592	0.0528	0.0538	93.7	95.8	1	75.0-125			1.96	20
Selenium	0.0500	U	0.0514	0.0527	103	105	1	75.0-125			2.41	20
Sodium	5.00	1100	1060	1080	0.000	0.000	1	75.0-125	E V	E V	1.57	20
Uranium	0.0500	0.0113	0.0625	0.0639	103	105	1	75.0-125			2.14	20
Vanadium	0.0500	0.00914	0.0572	0.0591	96.1	99.9	1	75.0-125			3.24	20

WG1098665

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983397-02

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3302308-1 04/17/18 01:21

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Selenium,Dissolved	U		0.000380	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302308-2 04/17/18 01:25 • (LCSD) R3302308-3 04/17/18 01:31

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Selenium,Dissolved	0.0500	0.0542	0.0547	108	109	80.0-120			0.827	20

L985681-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L985681-02 04/17/18 01:35 • (MS) R3302308-5 04/17/18 01:44 • (MSD) R3302308-6 04/17/18 01:49

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Selenium,Dissolved	0.0500	ND	0.0537	0.0573	106	114	1	75.0-125			6.52	20

WG1098704

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983397-02

Method Blank (MB)

(MB) R3302207-1 04/16/18 13:20

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Chromium,Dissolved	U		0.000540	0.00200
Iron,Dissolved	U		0.0150	0.100
Lead,Dissolved	0.000784	J	0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302207-2 04/16/18 13:24 • (LCSD) R3302207-3 04/16/18 13:29

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Arsenic,Dissolved	0.0500	0.0413	0.0482	82.6	96.3	80.0-120			15.4	20
Barium,Dissolved	0.0500	0.0418	0.0498	83.6	99.6	80.0-120			17.4	20
Chromium,Dissolved	0.0500	0.0418	0.0499	83.6	99.7	80.0-120			17.5	20
Iron,Dissolved	5.00	4.23	4.98	84.6	99.5	80.0-120			16.2	20
Lead,Dissolved	0.0500	0.0488	0.0491	97.5	98.1	80.0-120			0.627	20
Manganese,Dissolved	0.0500	0.0413	0.0478	82.6	95.6	80.0-120			14.6	20

L983352-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983352-03 04/16/18 13:34 • (MS) R3302207-5 04/16/18 13:43 • (MSD) R3302207-6 04/16/18 13:47

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic,Dissolved	0.0500	0.0166	0.0648	0.0649	96.3	96.7	1	75.0-125			0.255	20
Barium,Dissolved	0.0500	0.0431	0.0921	0.0920	97.9	97.7	1	75.0-125			0.101	20
Chromium,Dissolved	0.0500	0.000859	0.0485	0.0468	95.3	92.0	1	75.0-125			3.45	20
Iron,Dissolved	5.00	U	5.00	4.78	99.9	95.6	1	75.0-125			4.42	20
Lead,Dissolved	0.0500	0.00255	0.0513	0.0510	97.6	96.9	1	75.0-125			0.697	20
Manganese,Dissolved	0.0500	0.0149	0.0609	0.0616	92.0	93.3	1	75.0-125			1.06	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299790-3 04/06/18 11:26

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*93.9*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299790-1 04/06/18 10:19 • (LCSD) R3299790-2 04/06/18 10:41

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) Low Fraction	5.50	5.21	4.85	94.7	88.1	71.0-136			7.23	20
(S) a,a,a-Trifluorotoluene(FID)				*106*	*104*	*77.0-122*				

L983082-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983082-08 04/06/18 13:04 • (MS) R3299790-4 04/06/18 20:06 • (MSD) R3299790-5 04/06/18 20:29

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l		mg/l	mg/l	%	%		%			%	%
TPH (GC/FID) Low Fraction	5.50		5.18	5.03	94.1	91.5	1	18.0-160			2.80	20
(S) a,a,a-Trifluorotoluene(FID)					*106*	*106*		*77.0-122*				

Method Blank (MB)

(MB) R3300632-2 04/06/18 12:29

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1094680

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983397-01,02,03,04,05,06,07,08,09,10

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300632-2 04/06/18 12:29

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*108*			*80.0-120*
(S) Dibromofluoromethane	*87.8*			*76.0-123*
(S) 4-Bromofluorobenzene	*104*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3300632-1 04/06/18 11:26

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.0779	62.3	10.0-160	
Benzene	0.0250	0.0229	91.6	69.0-123	
Bromodichloromethane	0.0250	0.0250	100	76.0-120	
Bromoform	0.0250	0.0258	103	67.0-132	
Bromomethane	0.0250	0.00903	36.1	18.0-160	
n-Butylbenzene	0.0250	0.0265	106	72.0-126	
sec-Butylbenzene	0.0250	0.0263	105	74.0-121	
Carbon disulfide	0.0250	0.0236	94.3	55.0-127	
Carbon tetrachloride	0.0250	0.0226	90.5	63.0-122	
Chlorobenzene	0.0250	0.0251	100	79.0-121	
Chlorodibromomethane	0.0250	0.0257	103	75.0-125	
Chloroethane	0.0250	0.0267	107	47.0-152	
Chloroform	0.0250	0.0226	90.4	72.0-121	
Chloromethane	0.0250	0.0203	81.0	48.0-139	
1,2-Dibromoethane	0.0250	0.0261	104	77.0-123	
1,1-Dichloroethane	0.0250	0.0230	92.2	70.0-126	
1,2-Dichloroethane	0.0250	0.0222	88.9	67.0-126	
1,1-Dichloroethene	0.0250	0.0233	93.2	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0226	90.4	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0235	94.2	71.0-121	
1,2-Dichloropropane	0.0250	0.0254	101	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0265	106	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0260	104	74.0-127	

QUALITY CONTROL SUMMARY

L983397-01,02,03,04,05,06,07,08,09,10

Laboratory Control Sample (LCS)

(LCS) R3300632-1 04/06/18 11:26

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.0250	0.0265	106	77.0-120	
2-Hexanone	0.125	0.132	105	58.0-147	
Isopropylbenzene	0.0250	0.0266	106	75.0-120	
p-Isopropyltoluene	0.0250	0.0265	106	74.0-126	
2-Butanone (MEK)	0.125	0.103	82.2	37.0-158	
Methylene Chloride	0.0250	0.0218	87.1	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.133	106	59.0-143	
Methyl tert-butyl ether	0.0250	0.0234	93.5	64.0-123	
Naphthalene	0.0250	0.0270	108	62.0-128	
n-Propylbenzene	0.0250	0.0259	104	79.0-120	
Styrene	0.0250	0.0268	107	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0261	104	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0266	106	71.0-122	
Tetrachloroethene	0.0250	0.0254	102	70.0-127	
Toluene	0.0250	0.0252	101	77.0-120	
1,1,1-Trichloroethane	0.0250	0.0235	93.9	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0259	103	78.0-120	
Trichloroethene	0.0250	0.0235	94.0	78.0-120	
1,2,4-Trimethylbenzene	0.0250	0.0256	102	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0258	103	75.0-120	
Vinyl chloride	0.0250	0.0232	92.6	64.0-133	
Xylenes, Total	0.0750	0.0796	106	77.0-120	
o-Xylene	0.0250	0.0264	106	78.0-120	
m&p-Xylenes	0.0500	0.0532	106	77.0-120	
(S) Toluene-d8			*103*	*80.0-120*	
(S) Dibromofluoromethane			*88.6*	*76.0-123*	
(S) 4-Bromofluorobenzene			*103*	*80.0-120*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300657-2 04/06/18 11:48

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300657-2 04/06/18 11:48

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
o-Xylene	U		0.000341	0.00100
Xylenes, Total	U		0.00106	0.00300
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*102*			*80.0-120*
(S) Dibromofluoromethane	*92.9*			*76.0-123*
(S) 4-Bromofluorobenzene	*99.5*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3300657-1 04/06/18 10:28

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.129	103	10.0-160	
Benzene	0.0250	0.0239	95.6	69.0-123	
Carbon disulfide	0.0250	0.0247	98.7	55.0-127	
Bromodichloromethane	0.0250	0.0262	105	76.0-120	
Bromoform	0.0250	0.0296	118	67.0-132	
Bromomethane	0.0250	0.0239	95.6	18.0-160	
n-Butylbenzene	0.0250	0.0274	110	72.0-126	
sec-Butylbenzene	0.0250	0.0262	105	74.0-121	
Carbon tetrachloride	0.0250	0.0258	103	63.0-122	
Chlorobenzene	0.0250	0.0270	108	79.0-121	
Chlorodibromomethane	0.0250	0.0293	117	75.0-125	
Chloroethane	0.0250	0.0232	92.7	47.0-152	
Chloroform	0.0250	0.0252	101	72.0-121	
Chloromethane	0.0250	0.0245	98.1	48.0-139	
1,2-Dibromoethane	0.0250	0.0287	115	77.0-123	
1,1-Dichloroethane	0.0250	0.0250	100	70.0-126	
1,2-Dichloroethane	0.0250	0.0263	105	67.0-126	
1,1-Dichloroethene	0.0250	0.0255	102	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0255	102	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0261	104	71.0-121	
1,2-Dichloropropane	0.0250	0.0246	98.4	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0280	112	79.0-123	
2-Hexanone	0.125	0.144	116	58.0-147	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS)

(LCS) R3300657-1 04/06/18 10:28

	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
Analyte	mg/l	mg/l	%	%	
trans-1,3-Dichloropropene	0.0250	0.0283	113	74.0-127	
Ethylbenzene	0.0250	0.0282	113	77.0-120	
Isopropylbenzene	0.0250	0.0265	106	75.0-120	
p-Isopropyltoluene	0.0250	0.0275	110	74.0-126	
2-Butanone (MEK)	0.125	0.141	113	37.0-158	
Methylene Chloride	0.0250	0.0235	94.0	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.122	97.8	59.0-143	
Methyl tert-butyl ether	0.0250	0.0248	99.0	64.0-123	
Naphthalene	0.0250	0.0253	101	62.0-128	
n-Propylbenzene	0.0250	0.0262	105	79.0-120	
Styrene	0.0250	0.0279	112	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0267	107	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0259	104	71.0-122	
Tetrachloroethene	0.0250	0.0292	117	70.0-127	
Toluene	0.0250	0.0270	108	77.0-120	
1,1,1-Trichloroethane	0.0250	0.0260	104	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0278	111	78.0-120	
Trichloroethene	0.0250	0.0264	106	78.0-120	
o-Xylene	0.0250	0.0270	108	78.0-120	
1,2,4-Trimethylbenzene	0.0250	0.0262	105	75.0-120	
m&p-Xylenes	0.0500	0.0553	111	77.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0260	104	75.0-120	
Vinyl chloride	0.0250	0.0253	101	64.0-133	
Xylenes, Total	0.0750	0.0823	110	77.0-120	
(S) Toluene-d8			*100*	*80.0-120*	
(S) Dibromofluoromethane			*93.8*	*76.0-123*	
(S) 4-Bromofluorobenzene			*99.2*	*80.0-120*	

WG1094424

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L983397-01,02,03,04,05,06,07,08,09,10,11,12,13

Method Blank (MB)

(MB) R3300543-1 04/09/18 11:29

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*99.6*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300543-2 04/09/18 11:46 • (LCSD) R3300543-3 04/09/18 12:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.57	1.62	105	108	50.0-150			3.16	20
(S) o-Terphenyl				*124*	*128*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1,6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1,4]	2006
Louisiana [1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

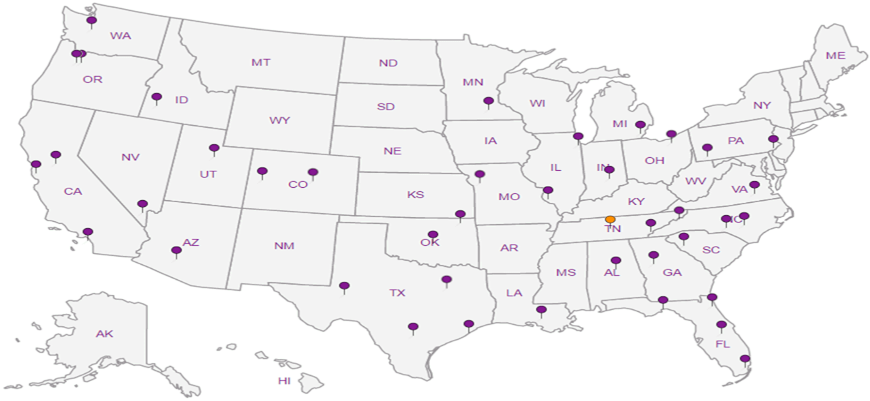
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page 1 of 5

ESC
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YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L # L983397
E046
Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:
Shipped Via:

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **EP Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-EP**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **EP (Navajo - Artesia)**
P.O. #
Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Quote # **119503**
Date Results Needed
Immediately Packed on Ice N ___ Y ___

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide	Remarks	Sample # (lab only)
											<2		<2				
MW-82	**Grab**	**GW**				**10**	X	X	X	X	X	X	X				
MW-74	**Grab**	**GW**				**10**	X	X	X	X	X	X	X				
MW-73	**Grab**	**GW**				**10**	X	X	X	X	X	X	X				
MW-2A	**Grab**	**GW**				**10**	X	X	X	X	X	X	X				
MW-72	**Grab**	**GW**				**10**	X	X	X	X	X	X	X				
OCD-6	**Grab**	**GW**				**10**	X	X	X	X	X	X	X				
OCD-7AR	**Grab**	**GW**				**10**	X	X	X	X	X	X	X				
MW-76	**Grab**	**GW**				**10**	X	X	X	X	X	X	X				
MW-77	**Grab**	**GW**		**4/3/18**	**1810**	**10**	X	X	X	X	X	X	X				-01
MW-78	**Grab**	**GW**				**10**	X	X	X	X	X	X	X				

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

pH _____ Temp _____
Flow _____ Other _____

Samples returned via:
__ UPS ✓ FedEx __ Courier __ _____

Tracking # 4269 9211 4863

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: ~~Yes~~ / No ~~HCL~~ / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 2.1 $^{9}_{0}$ °C	Bottles Received: 132
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) 8bo	Date: 4/5/18	Time: 845

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP ✓ Y __ N
COC Signed/Accurate: ✓ Y __ N
Bottles arrive intact: ✓ Y __ N
Correct bottles used: ✓ Y __ N
Sufficient volume sent: ✓ Y __ N
If Applicable
VOA Zero Headspace: ✓ Y __ N
Preservation Correct/Checked: ✓ Y ✓ N
pH adjusted in lab @ 1540
for FF Metals

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Chain of Custody Page 2 of 5

ESC L·A·B S·C·I·E·N·C·E·S

YOUR LAB OF CHOICE

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Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. #

Collected by (signature):

Immediately Packed on Ice N ____ Y ____

Rush? (Lab MUST Be Notified)
____ Same Day ____ Five Day
____ Next Day ____ 5 Day (Rad Only)
____ Two Day ____ 10 Day (Rad Only)
____ Three Day

Quote # **119503**

Date Results Needed

L # L983397

Table #

Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-75	**Grab**	**GW**		**4/3/18**	**1725**	**10**	X	X	X	X	X	X	X					-02
MW-83	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-3	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-88	**Grab**	**GW**		**4/3/18**	**1015**	**10**	X	X	X	X	X	X	X					03
MW-22A	**Grab**	**GW**		**4/3/18**	**1100**	**10**	X	X	X	X	X	X	X					04
MW-10	**Grab**	**GW**		**4/3/18**	**1205**	**10**	X	X	X	X	X	X	X					05
MW-123	**Grab**	**GW**		**4/3/18**	**1250**	**10**	X	X	X	X	X	X	X					06
MW-4A	**Grab**	**GW**		**4/3/18**	**1640**	**10**	X	X	X	X	X	X	X					07
MW-5A	**Grab**	**GW**		**4/3/18**	**1535**	**10**	X	X	X	X	X	X	X					08
MW-7A	**Grab**	**GW**		**4/3/18**	**1335**	**10**	X	X	X	X	X	X	X					09

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y ✓N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No [✓ HCl] / MeOH TBR 1
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 2.1 °C Bottles Received: 132
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Chain of Custody Page 3 of 5

ESC L·A·B S·C·I·E·N·C·E·S

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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. #

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote # **119503**

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L # L983347

Table #

Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
OCD-8A	Grab	GW		4/3/18	1445	11	X	X	X		X	X	X	X	X			10
MW-1R	Grab	GW				8	X	X		X	X	X	X					
MW-15	Grab	GW				10	X	X	X	X	X	X	X					
OCD-1R	Grab	GW				10	X	X	X	X	X	X	X					
OCD-2A	Grab	GW				10	X	X	X	X	X	X	X					
OCD-3	Grab	GW				10	X	X	X	X	X	X	X					
OCD-4	Grab	GW				10	X	X	X	X	X	X	X					
MW-11A	Grab	GW				10	X	X	X	X	X	X	X					
OCD-5	Grab	GW				10	X	X	X	X	X	X	X					
MW-87	Grab	GW				10	X	X	X	X	X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y ✓N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No [✓ HCL] / MeOH TBR 1	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 2.1 °C Bottles Received: 132	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	Hold: Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page 4 of 5

ESC
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YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
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Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ___

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote # **119503**

Date Results Needed

L# L983397

Table #

Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-18A	Grab	GW				9	X	X			X	X	X	X	X			
MW-70	Grab	GW				10	X	X	X	X	X	X	X					
MW-124	Grab	GW				10	X	X	X	X	X	X	X					
DUP-EP-01	Grab	GW		4/3/18	1200	10	X	X	X	X	X	X	X					11
DUP-EP-02	Grab	GW		4/3/18	1000	10	X	X	X	X	X	X	X					12
DUP-EP-03	Grab	GW				10	X	X	X	X	X	X	X					
EB-EP-01	Grab	GW				10	X	X	X	X	X	X	X					
EB-EP-02	Grab	GW				10	X	X	X	X	X	X	X					
EB-EP-03	Grab	GW		4/3/18	1550	10	X	X	X	X	X	X	X					13
EB-EP-04	Grab	GW				10	X	X	X	X	X	X	X					

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GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: _NP ✓Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: ✓Y _N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: ✓Y _N
Preservation Correct/Checked: ✓Y _N

Relinquished by : (Signature) Date: Time:
Received by: (Signature)
Trip Blank Received: [✓ Yes] No
1 [✓ HCL] / MeOH
TBR

Relinquished by : (Signature) Date: Time:
Received by: (Signature)
Temp: 2.1 °C Bottles Received: 132

If preservation required by Login: Date/Time

Relinquished by : (Signature) Date: Time:
Received for lab by: (Signature)
Date: 4/5/18 Time: 845

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
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Windsor, CT 06095

Pres Chk

Analysis / Container / Preservative

Chain of Custody Page 5 of 5

ESC
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Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. #

Collected by (signature):

Immediately Packed on Ice N ____ Y ____

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote # **119503**

Date Results Needed

L # L983397
Table #
Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:
Shipped Via:

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
TRIP BLANK-EP-01	**Grab**	**GW**				**1**	X											
TRIP BLANK-EP-02	**Grab**	**GW**		**4/3/18**	**-**	**1**	X											14
TRIP BLANK-EP-03	**Grab**	**GW**				**1**	X											

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y ✓N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 1 [✓ HCL] / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 2.1 °C Bottles Received: 132	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	Hold: Condition: NCF / [✓ OK]

Chain of Custody Page 1 of 2

ESC
L-A-B S-C-I-E-N-C-E-S
YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L # L983397
Table #
Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
Shipped Via:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer
Email To: jspeer@trcwsolutions.com
Project Description: EP Spring 2018
City/State Collected: Artesia, NM
Phone: 512-684-3170
Fax:
Client Project #
Lab Project #
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID #: EP (Navajo - Artesia)
P.O. #: 119503
Collected by (signature):
Immediately Packed on Ice N ___ [✓ Y]

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed
Email? ___ No [✓ Yes]
FAX? ___ No ___ Yes

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-4A	Grab	GW		4/3/18	1640		✓	✓	✓	✓		✓	✓	✓				
MW-5A	Grab	GW		4/3/18	1535		✓	✓	✓	✓		✓	✓	✓				
EB-EP-03	Grab	GW		4/3/18	1550		✓	✓	✓	✓		✓	✓	✓				
MW-7A	Grab	GW		4/3/18	1335		✓	✓	✓	✓		✓	✓	✓				
DUP-EP-01	Grab	GW		4/3/18	1200		✓	✓	✓	✓		✓	✓	✓				
MW-10	Grab	GW		4/3/18	1205		✓	✓	✓	✓		✓	✓	✓				
MW-22A	Grab	GW		4/3/18	1100		✓	✓	✓	✓		✓	✓	✓				
DUP-EP-02	Grab	GW		4/3/18	1000		✓	✓	✓	✓		✓	✓	✓				
MW-75	Grab	GW		4/3/18	1725		✓	✓	✓	✓		✓	✓	✓				
MW-77	Grab	GW		4/3/18	1810		✓	✓	✓	✓		✓	✓	✓				

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

pH ________ Temp ________

Remarks: Diss. metals are field-filtered.

Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/4/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only) OK
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.5 °C Bottles Received:	COC Seal Intact: [✓ Y] ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	pH Checked: NCF:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 2 of 2

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: EP Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: EP (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Immediately Packed on Ice N ____ Y ✓

Rush? (Lab MUST Be Notified)
- ____ Same Day 200%
- ____ Next Day 100%
- ____ Two Day 50%
- ____ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes

FAX? ___ No ___ Yes

L# L983397

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-88	Grab	GW		4/3/18	1015		✓	✓	✓	✓		✓	✓	✓				
MW-123	Grab	GW		4/3/18	1250		✓	✓	✓	✓		✓	✓	✓				
OCD-8A	Grab	GW		4/3/18	1445		✓	✓	✓		✓	✓	✓	✓	✓			
Trip Blank-EP-02	Grab	GW		4/3/18	—		✓											
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/4/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ____	Condition: (lab use only) (OK)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: [illegible] °C Bottles Received:	COC Seal Intact: ✓ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/5/18 Time: 845	pH Checked: NCF:

ESC LAB SCIENCES
a subsidiary of Pace Analytical

ANALYTICAL REPORT

April 24, 2018

myESC REAL TIME DATA ACCESS
a subsidiary of Pace Analytical

TRC Solutions - Austin, TX

Sample Delivery Group:	L983825
Samples Received:	04/06/2018
Project Number:	294318.0000.0000.
Description:	EP Spring 2018
Site:	EP NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
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9 Sc

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1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-6A L983825-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:30	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096340	1	04/12/18 12:50	04/12/18 13:25	EG
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 15:47	04/12/18 15:47	JER
Wet Chemistry by Method 9056A	WG1094922	1	04/08/18 01:21	04/08/18 01:21	DR
Wet Chemistry by Method 9056A	WG1094922	20	04/08/18 01:34	04/08/18 01:34	DR
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 18:07	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:00	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 17:45	04/09/18 17:45	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095135	1	04/10/18 16:39	04/10/18 16:39	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 00:54	TH

MW-120 L983825-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 10:15	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096340	1	04/12/18 12:50	04/12/18 13:25	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 12:53	04/11/18 12:53	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/09/18 19:24	04/09/18 19:24	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/09/18 19:36	04/09/18 19:36	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 18:11	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 08:56	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:04	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 18:07	04/09/18 18:07	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095135	1	04/10/18 16:58	04/10/18 16:58	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 01:15	TH

MW-121 L983825-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 11:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096340	1	04/12/18 12:50	04/12/18 13:25	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 12:55	04/11/18 12:55	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/09/18 19:49	04/09/18 19:49	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/09/18 20:01	04/09/18 20:01	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 18:56	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 09:01	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:20	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 18:29	04/09/18 18:29	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095135	1	04/08/18 00:06	04/08/18 00:06	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 01:35	TH

MW-84 L983825-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096148	1	04/10/18 22:50	04/10/18 23:19	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:20	04/11/18 13:20	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/09/18 20:13	04/09/18 20:13	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/09/18 20:26	04/09/18 20:26	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:00	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 09:06	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:24	WBD
Metals (ICPMS) by Method 6020	WG1098545	1	04/15/18 11:25	04/15/18 13:27	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/12/18 21:11	04/12/18 21:11	BMB

SAMPLE SUMMARY

MW-84 L983825-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095135	1	04/10/18 17:17	04/10/18 17:17	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	5	04/08/18 18:14	04/11/18 21:00	TH

MW-122 L983825-05 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096340	1	04/12/18 12:50	04/12/18 13:25	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 12:58	04/11/18 12:58	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/09/18 20:38	04/09/18 20:38	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/09/18 21:31	04/09/18 21:31	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:04	JDG
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 09:10	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:28	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 18:51	04/09/18 18:51	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/12/18 12:53	04/12/18 12:53	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/12/18 01:44	TH

MW-81 L983825-06 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096148	1	04/10/18 22:50	04/10/18 23:19	EG
Wet Chemistry by Method 353.2	WG1096180	5	04/11/18 13:00	04/11/18 13:00	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/09/18 21:43	04/09/18 21:43	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/09/18 21:56	04/09/18 21:56	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:08	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 09:15	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:32	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 19:13	04/09/18 19:13	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 13:15	04/07/18 13:15	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 02:36	TH

MW-80 L983825-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 15:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096148	1	04/10/18 22:50	04/10/18 23:19	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:05	04/11/18 13:05	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/09/18 22:08	04/09/18 22:08	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/09/18 22:20	04/09/18 22:20	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:12	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 09:20	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:36	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 19:35	04/09/18 19:35	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 13:36	04/07/18 13:36	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 02:56	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-79 L983825-08 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 16:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:06	04/11/18 13:06	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/09/18 22:33	04/09/18 22:33	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/09/18 22:45	04/09/18 22:45	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:15	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 09:24	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:40	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 19:56	04/09/18 19:56	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/12/18 13:12	04/12/18 13:12	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 03:16	TH

MW-82 L983825-09 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:07	04/11/18 13:07	JER
Wet Chemistry by Method 9056A	WG1094924	100	04/09/18 23:10	04/09/18 23:10	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:19	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 09:29	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:44	WBD
Metals (ICPMS) by Method 6020	WG1098545	1	04/15/18 11:25	04/15/18 12:50	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 20:19	04/09/18 20:19	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 14:19	04/07/18 14:19	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 03:36	TH

MW-74 L983825-10 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 09:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	5	04/11/18 13:08	04/11/18 13:08	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/09/18 23:22	04/09/18 23:22	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 00:00	04/10/18 00:00	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:23	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 09:43	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:48	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 20:41	04/09/18 20:41	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 14:40	04/07/18 14:40	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	5	04/08/18 18:14	04/11/18 21:20	TH

MW-73 L983825-11 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:09	04/11/18 13:09	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 00:12	04/10/18 00:12	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 00:24	04/10/18 00:24	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:28	WBD
Metals (ICPMS) by Method 6020	WG1095149	10	04/09/18 10:35	04/15/18 14:50	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 14:52	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 21:03	04/09/18 21:03	ACG

MW-73 L983825-11 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 15:01	04/07/18 15:01	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 04:17	TH

MW-2A L983825-12 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 10:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096340	1	04/12/18 12:50	04/12/18 13:25	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:10	04/11/18 13:10	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 00:37	04/10/18 00:37	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 00:49	04/10/18 00:49	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:40	WBD
Metals (ICPMS) by Method 6020	WG1095149	20	04/09/18 10:35	04/15/18 14:55	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 15:17	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 21:25	04/09/18 21:25	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/12/18 13:31	04/12/18 13:31	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 04:37	TH

MW-72 L983825-13 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 17:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:11	04/11/18 13:11	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 01:02	04/10/18 01:02	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 01:14	04/10/18 01:14	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:44	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 09:57	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 15:21	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 21:47	04/09/18 21:47	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 15:44	04/07/18 15:44	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 04:57	TH

OCD-6 L983825-14 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 17:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:12	04/11/18 13:12	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 01:27	04/10/18 01:27	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 01:39	04/10/18 01:39	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:47	WBD
Metals (ICPMS) by Method 6020	WG1095149	10	04/09/18 10:35	04/15/18 14:59	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 15:25	WBD
Metals (ICPMS) by Method 6020	WG1098545	1	04/15/18 11:25	04/15/18 13:31	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 22:09	04/09/18 22:09	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 16:05	04/07/18 16:05	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 05:17	TH

OCD-7AR L983825-15 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 18:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:13	04/11/18 13:13	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 01:51	04/10/18 01:51	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 02:29	04/10/18 02:29	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:52	WBD
Metals (ICPMS) by Method 6020	WG1095149	10	04/09/18 10:35	04/15/18 15:04	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 15:29	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095608	1	04/09/18 22:31	04/09/18 22:31	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 16:26	04/07/18 16:26	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 05:38	TH

MW-76 L983825-16 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:14	04/11/18 13:14	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 02:41	04/10/18 02:41	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 02:53	04/10/18 02:53	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 19:56	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 10:11	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 15:33	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 11:23	04/10/18 11:23	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 16:48	04/07/18 16:48	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	5	04/08/18 18:14	04/11/18 21:41	TH

MW-78 L983825-17 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:21	04/11/18 13:21	JER
Wet Chemistry by Method 9056A	WG1094924	10	04/10/18 03:18	04/10/18 03:18	MAJ
Wet Chemistry by Method 9056A	WG1096737	20	04/11/18 21:34	04/11/18 21:34	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 20:00	WBD
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/15/18 10:16	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 15:37	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	10	04/10/18 19:16	04/10/18 19:16	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/12/18 19:15	04/12/18 19:15	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	5	04/08/18 18:14	04/11/18 22:01	TH

MW-83 L983825-18 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096149	1	04/10/18 23:50	04/11/18 00:13	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:22	04/11/18 13:22	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 03:31	04/10/18 03:31	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 03:56	04/10/18 03:56	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 20:04	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 10:20	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 15:41	WBD
Metals (ICPMS) by Method 6020	WG1098545	1	04/15/18 11:25	04/15/18 13:36	WBD

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:40	04/06/18 08:45

MW-83 L983825-18 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 11:45	04/10/18 11:45	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/12/18 19:34	04/12/18 19:34	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095392	1	04/08/18 18:14	04/10/18 06:18	TH

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:25	04/06/18 08:45

MW-3 L983825-19 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:23	04/11/18 13:23	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 05:10	04/10/18 05:10	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 05:22	04/10/18 05:22	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 20:08	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 15:09	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 15:45	WBD
Metals (ICPMS) by Method 6020	WG1098545	1	04/15/18 11:25	04/15/18 13:40	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 12:07	04/10/18 12:07	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 17:51	04/07/18 17:51	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 15:08	LM

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:45	04/06/18 08:45

MW-1R L983825-20 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096180	1	04/11/18 13:24	04/11/18 13:24	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 05:35	04/10/18 05:35	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 05:47	04/10/18 05:47	MAJ
Metals (ICPMS) by Method 6020	WG1095149	1	04/09/18 10:35	04/13/18 17:51	WBD
Metals (ICPMS) by Method 6020	WG1095149	5	04/09/18 10:35	04/15/18 08:52	WBD
Metals (ICPMS) by Method 6020	WG1095178	1	04/09/18 13:11	04/13/18 13:44	WBD
Metals (ICPMS) by Method 6020	WG1098545	1	04/15/18 11:25	04/15/18 13:45	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 18:12	04/07/18 18:12	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 15:28	LM

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:30	04/06/18 08:45

MW-15 L983825-21 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:39	04/11/18 13:39	JER
Wet Chemistry by Method 9056A	WG1094924	1	04/10/18 06:00	04/10/18 06:00	MAJ
Wet Chemistry by Method 9056A	WG1094924	100	04/10/18 06:25	04/10/18 06:25	MAJ
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 17:34	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 12:42	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 16:49	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 12:29	04/10/18 12:29	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 18:34	04/07/18 18:34	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 17:09	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

OCD-1R L983825-22 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:41	04/11/18 13:41	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/07/18 19:31	04/07/18 19:31	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/07/18 19:47	04/07/18 19:47	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 17:38	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 12:46	JPD
Metals (ICPMS) by Method 6020	WG1095151	5	04/09/18 08:55	04/10/18 18:06	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 16:53	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 12:51	04/10/18 12:51	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 18:55	04/07/18 18:55	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 17:29	TH

OCD-2A L983825-23 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 15:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:43	04/11/18 13:43	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/07/18 20:02	04/07/18 20:02	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/07/18 20:49	04/07/18 20:49	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 17:42	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 12:50	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 16:57	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 14:30	04/10/18 14:30	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 19:17	04/07/18 19:17	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 17:49	TH

OCD-3 L983825-24 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 15:50	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:44	04/11/18 13:44	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/07/18 21:04	04/07/18 21:04	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/07/18 21:19	04/07/18 21:19	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 17:46	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 12:54	JPD
Metals (ICPMS) by Method 6020	WG1095151	5	04/09/18 08:55	04/10/18 18:10	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:01	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 14:52	04/10/18 14:52	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095141	1	04/07/18 19:38	04/07/18 19:38	ACE
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 18:10	TH

OCD-4 L983825-25 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 16:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:45	04/11/18 13:45	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/07/18 21:35	04/07/18 21:35	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/07/18 21:50	04/07/18 21:50	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 17:50	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 12:58	JPD

OCD-4 L983825-25 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 16:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1095151	5	04/09/18 08:55	04/10/18 19:00	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:05	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 15:14	04/10/18 15:14	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 13:38	04/07/18 13:38	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 18:30	TH

MW-11A L983825-26 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 18:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:50	04/11/18 13:50	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/07/18 22:06	04/07/18 22:06	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/07/18 22:21	04/07/18 22:21	DR
Wet Chemistry by Method 9056A	WG1095384	200	04/09/18 22:00	04/09/18 22:00	MAJ
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 17:54	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:02	JPD
Metals (ICPMS) by Method 6020	WG1095151	10	04/09/18 08:55	04/10/18 19:04	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:08	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 15:36	04/10/18 15:36	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 13:57	04/07/18 13:57	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 18:50	TH

OCD-5 L983825-27 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 17:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:51	04/11/18 13:51	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/07/18 22:36	04/07/18 22:36	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/07/18 22:52	04/07/18 22:52	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 17:58	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:06	JPD
Metals (ICPMS) by Method 6020	WG1095151	5	04/09/18 08:55	04/10/18 19:24	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:12	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 15:58	04/10/18 15:58	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 14:16	04/07/18 14:16	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 19:10	TH

MW-87 L983825-28 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096151	1	04/10/18 23:25	04/10/18 23:42	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:52	04/11/18 13:52	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/07/18 23:07	04/07/18 23:07	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/07/18 23:54	04/07/18 23:54	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 18:02	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:10	JPD
Metals (ICPMS) by Method 6020	WG1095151	5	04/09/18 08:55	04/10/18 19:29	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:30	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 16:20	04/10/18 16:20	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 14:35	04/07/18 14:35	BMB

MW-87 L983825-28 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 19:31	TH

MW-18A L983825-29 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 09:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:53	04/11/18 13:53	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	1	04/07/18 10:38	04/09/18 17:16	KK
Wet Chemistry by Method 9056A	WG1094925	1	04/08/18 00:09	04/08/18 00:09	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/08/18 00:24	04/08/18 00:24	DR
Mercury by Method 7470A	WG1095322	1	04/09/18 07:03	04/09/18 14:42	EL
Mercury by Method 7470A	WG1095325	1	04/09/18 11:28	04/10/18 11:05	ABL
Metals (ICP) by Method 6010B	WG1095146	1	04/09/18 19:49	04/10/18 01:03	TRB
Metals (ICP) by Method 6010B	WG1095189	1	04/10/18 08:21	04/10/18 14:53	ST
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 18:27	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:14	JPD
Metals (ICPMS) by Method 6020	WG1095151	10	04/09/18 08:55	04/10/18 19:33	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:34	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 14:54	04/07/18 14:54	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 19:51	TH

MW-70 L983825-30 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:54	04/11/18 13:54	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/08/18 00:40	04/08/18 00:40	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/08/18 00:55	04/08/18 00:55	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 18:31	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:27	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:38	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 16:42	04/10/18 16:42	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 15:13	04/07/18 15:13	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 20:11	TH

MW-124 L983825-31 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:55	04/11/18 13:55	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/08/18 01:11	04/08/18 01:11	DR
Wet Chemistry by Method 9056A	WG1102213	100	04/24/18 13:51	04/24/18 13:51	MAJ
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 18:35	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:31	JPD
Metals (ICPMS) by Method 6020	WG1095151	5	04/09/18 08:55	04/10/18 19:36	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:42	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 17:04	04/10/18 17:04	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 15:32	04/07/18 15:32	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 20:31	TH

DUP-EP-03 L983825-32 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:56	04/11/18 13:56	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/08/18 01:41	04/08/18 01:41	DR
Wet Chemistry by Method 9056A	WG1094925	100	04/08/18 01:57	04/08/18 01:57	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 18:40	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:35	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:46	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 17:26	04/10/18 17:26	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 15:51	04/07/18 15:51	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 20:51	TH

EB-EP-01 L983825-33 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 09:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:57	04/11/18 13:57	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/07/18 18:30	04/07/18 18:30	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 18:43	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:39	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:50	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 17:48	04/10/18 17:48	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 16:10	04/07/18 16:10	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 21:12	TH

EB-EP-02 L983825-34 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:15	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 13:59	04/11/18 13:59	JER
Wet Chemistry by Method 9056A	WG1094925	1	04/08/18 02:12	04/08/18 02:12	DR
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 18:47	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:43	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:54	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 18:10	04/10/18 18:10	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 16:29	04/07/18 16:29	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 21:32	TH

EB-EP-04 L983825-35 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 16:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 14:00	04/11/18 14:00	JER
Wet Chemistry by Method 9056A	WG1095384	1	04/09/18 22:13	04/09/18 22:13	MAJ
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 18:52	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 14:03	JPD
Metals (ICPMS) by Method 6020	WG1095180	1	04/09/18 12:07	04/12/18 17:58	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	1	04/10/18 18:31	04/10/18 18:31	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 16:48	04/07/18 16:48	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 21:52	TH

TRIP BLANK-EP-01 L983825-36 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 00:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 13:00	04/07/18 13:00	BMB

TRIP BLANK-EP-03 L983825-37 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 00:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095144	1	04/07/18 13:19	04/07/18 13:19	BMB

CASE NARRATIVE

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3330		2.82	10.0	1	04/12/2018 13:25	WG1096340

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0800	J	0.0197	0.100	1	04/12/2018 15:47	WG1096783

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	763		1.04	20.0	20	04/08/2018 01:34	WG1094922
Fluoride	1.59		0.00990	0.100	1	04/08/2018 01:21	WG1094922
Sulfate	1690		1.55	100	20	04/08/2018 01:34	WG1094922

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00960		0.000250	0.00200	1	04/13/2018 18:07	WG1095149
Arsenic,Dissolved	0.00829		0.000250	0.00200	1	04/13/2018 14:00	WG1095178
Barium	0.0132		0.000360	0.00500	1	04/13/2018 18:07	WG1095149
Barium,Dissolved	0.0127		0.000360	0.00500	1	04/13/2018 14:00	WG1095178
Calcium	303		0.0460	1.00	1	04/13/2018 18:07	WG1095149
Chromium	0.00136	B J	0.000540	0.00200	1	04/13/2018 18:07	WG1095149
Chromium,Dissolved	0.000902	J	0.000540	0.00200	1	04/13/2018 14:00	WG1095178
Iron	0.275	B	0.0150	0.100	1	04/13/2018 18:07	WG1095149
Iron,Dissolved	0.186		0.0150	0.100	1	04/13/2018 14:00	WG1095178
Lead	0.000553	J	0.000240	0.00200	1	04/13/2018 18:07	WG1095149
Lead,Dissolved	0.000497	J	0.000240	0.00200	1	04/13/2018 14:00	WG1095178
Manganese	0.301		0.000250	0.00500	1	04/13/2018 18:07	WG1095149
Manganese,Dissolved	0.294		0.000250	0.00500	1	04/13/2018 14:00	WG1095178
Potassium	1.31		0.0370	1.00	1	04/13/2018 18:07	WG1095149
Selenium	0.000614	J	0.000380	0.00200	1	04/13/2018 18:07	WG1095149
Selenium,Dissolved	0.000905	J	0.000380	0.00200	1	04/13/2018 14:00	WG1095178
Sodium	776		0.110	1.00	1	04/13/2018 18:07	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.406		0.0314	0.100	1	04/09/2018 17:45	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*99.0*			*77.0-122*		*04/09/2018 17:45*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/10/2018 16:39	WG1095135
Benzene	U		0.000331	0.00100	1	04/10/2018 16:39	WG1095135
Bromodichloromethane	U		0.000380	0.00100	1	04/10/2018 16:39	WG1095135
Bromoform	U		0.000469	0.00100	1	04/10/2018 16:39	WG1095135
Bromomethane	U		0.000866	0.00500	1	04/10/2018 16:39	WG1095135
n-Butylbenzene	U		0.000361	0.00100	1	04/10/2018 16:39	WG1095135
sec-Butylbenzene	U		0.000365	0.00100	1	04/10/2018 16:39	WG1095135
Carbon disulfide	U		0.000275	0.00100	1	04/10/2018 16:39	WG1095135
Carbon tetrachloride	U		0.000379	0.00100	1	04/10/2018 16:39	WG1095135

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/10/2018 16:39	WG1095135
Chlorodibromomethane	U		0.000327	0.00100	1	04/10/2018 16:39	WG1095135
Chloroethane	U	J4	0.000453	0.00500	1	04/10/2018 16:39	WG1095135
Chloroform	U		0.000324	0.00500	1	04/10/2018 16:39	WG1095135
Chloromethane	U		0.000276	0.00250	1	04/10/2018 16:39	WG1095135
1,2-Dibromoethane	U		0.000381	0.00100	1	04/10/2018 16:39	WG1095135
1,1-Dichloroethane	U		0.000259	0.00100	1	04/10/2018 16:39	WG1095135
1,2-Dichloroethane	U		0.000361	0.00100	1	04/10/2018 16:39	WG1095135
1,1-Dichloroethene	U		0.000398	0.00100	1	04/10/2018 16:39	WG1095135
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/10/2018 16:39	WG1095135
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/10/2018 16:39	WG1095135
1,2-Dichloropropane	U		0.000306	0.00100	1	04/10/2018 16:39	WG1095135
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/10/2018 16:39	WG1095135
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/10/2018 16:39	WG1095135
Ethylbenzene	0.00117		0.000384	0.00100	1	04/10/2018 16:39	WG1095135
Isopropylbenzene	0.000931	J	0.000326	0.00100	1	04/10/2018 16:39	WG1095135
p-Isopropyltoluene	U		0.000350	0.00100	1	04/10/2018 16:39	WG1095135
2-Butanone (MEK)	U		0.00393	0.0100	1	04/10/2018 16:39	WG1095135
2-Hexanone	U		0.00382	0.0100	1	04/10/2018 16:39	WG1095135
Methylene Chloride	U		0.00100	0.00500	1	04/10/2018 16:39	WG1095135
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/10/2018 16:39	WG1095135
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/10/2018 16:39	WG1095135
Naphthalene	U		0.00100	0.00500	1	04/10/2018 16:39	WG1095135
n-Propylbenzene	0.000460	J	0.000349	0.00100	1	04/10/2018 16:39	WG1095135
Styrene	U		0.000307	0.00100	1	04/10/2018 16:39	WG1095135
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/10/2018 16:39	WG1095135
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/10/2018 16:39	WG1095135
Tetrachloroethene	U		0.000372	0.00100	1	04/10/2018 16:39	WG1095135
Toluene	0.00139		0.000412	0.00100	1	04/10/2018 16:39	WG1095135
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/10/2018 16:39	WG1095135
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/10/2018 16:39	WG1095135
Trichloroethene	U		0.000398	0.00100	1	04/10/2018 16:39	WG1095135
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/10/2018 16:39	WG1095135
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/10/2018 16:39	WG1095135
Vinyl chloride	U		0.000259	0.00100	1	04/10/2018 16:39	WG1095135
o-Xylene	0.00192		0.000341	0.00100	1	04/10/2018 16:39	WG1095135
m&p-Xylene	0.00167	J	0.000719	0.00200	1	04/10/2018 16:39	WG1095135
Xylenes, Total	0.00360		0.00106	0.00300	1	04/10/2018 16:39	WG1095135
(S) Toluene-d8	*100*			*80.0-120*		*04/10/2018 16:39*	WG1095135
(S) Dibromofluoromethane	*106*			*76.0-123*		*04/10/2018 16:39*	WG1095135
(S) 4-Bromofluorobenzene	*90.1*			*80.0-120*		*04/10/2018 16:39*	WG1095135

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	9.27		0.0247	0.100	1	04/10/2018 00:54	WG1095392
(S) o-Terphenyl	*114*			*31.0-160*		*04/10/2018 00:54*	WG1095392

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	6480		2.82	10.0	1	04/12/2018 13:25	WG1096340

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0720	J	0.0197	0.100	1	04/11/2018 12:53	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1760		5.19	100	100	04/09/2018 19:36	WG1094924
Fluoride	2.79		0.00990	0.100	1	04/09/2018 19:24	WG1094924
Sulfate	2670		7.74	500	100	04/09/2018 19:36	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0117		0.000250	0.00200	1	04/13/2018 18:11	WG1095149
Arsenic,Dissolved	0.0107		0.000250	0.00200	1	04/13/2018 14:04	WG1095178
Barium	0.0104		0.000360	0.00500	1	04/13/2018 18:11	WG1095149
Barium,Dissolved	0.0110		0.000360	0.00500	1	04/13/2018 14:04	WG1095178
Calcium	556		0.0460	1.00	1	04/13/2018 18:11	WG1095149
Chromium	U		0.000540	0.00200	1	04/13/2018 18:11	WG1095149
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 14:04	WG1095178
Iron	3.78		0.0150	0.100	1	04/13/2018 18:11	WG1095149
Iron,Dissolved	3.72		0.0150	0.100	1	04/13/2018 14:04	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 18:11	WG1095149
Lead,Dissolved	0.000518	J	0.000240	0.00200	1	04/13/2018 14:04	WG1095178
Manganese	1.24		0.000250	0.00500	1	04/13/2018 18:11	WG1095149
Manganese,Dissolved	1.25		0.000250	0.00500	1	04/13/2018 14:04	WG1095178
Potassium	6.26		0.0370	1.00	1	04/13/2018 18:11	WG1095149
Selenium	0.000466	J	0.000380	0.00200	1	04/13/2018 18:11	WG1095149
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 14:04	WG1095178
Sodium	1310		0.550	5.00	5	04/15/2018 08:56	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.124		0.0314	0.100	1	04/09/2018 18:07	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*97.5*			*77.0-122*		*04/09/2018 18:07*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/10/2018 16:58	WG1095135
Benzene	U		0.000331	0.00100	1	04/10/2018 16:58	WG1095135
Bromodichloromethane	U		0.000380	0.00100	1	04/10/2018 16:58	WG1095135
Bromoform	U		0.000469	0.00100	1	04/10/2018 16:58	WG1095135
Bromomethane	U		0.000866	0.00500	1	04/10/2018 16:58	WG1095135
n-Butylbenzene	U		0.000361	0.00100	1	04/10/2018 16:58	WG1095135
sec-Butylbenzene	U		0.000365	0.00100	1	04/10/2018 16:58	WG1095135
Carbon disulfide	U		0.000275	0.00100	1	04/10/2018 16:58	WG1095135
Carbon tetrachloride	U		0.000379	0.00100	1	04/10/2018 16:58	WG1095135

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/10/2018 16:58	WG1095135
Chlorodibromomethane	U		0.000327	0.00100	1	04/10/2018 16:58	WG1095135
Chloroethane	U	J4	0.000453	0.00500	1	04/10/2018 16:58	WG1095135
Chloroform	U		0.000324	0.00500	1	04/10/2018 16:58	WG1095135
Chloromethane	U		0.000276	0.00250	1	04/10/2018 16:58	WG1095135
1,2-Dibromoethane	U		0.000381	0.00100	1	04/10/2018 16:58	WG1095135
1,1-Dichloroethane	U		0.000259	0.00100	1	04/10/2018 16:58	WG1095135
1,2-Dichloroethane	U		0.000361	0.00100	1	04/10/2018 16:58	WG1095135
1,1-Dichloroethene	U		0.000398	0.00100	1	04/10/2018 16:58	WG1095135
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/10/2018 16:58	WG1095135
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/10/2018 16:58	WG1095135
1,2-Dichloropropane	U		0.000306	0.00100	1	04/10/2018 16:58	WG1095135
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/10/2018 16:58	WG1095135
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/10/2018 16:58	WG1095135
Ethylbenzene	U		0.000384	0.00100	1	04/10/2018 16:58	WG1095135
Isopropylbenzene	U		0.000326	0.00100	1	04/10/2018 16:58	WG1095135
p-Isopropyltoluene	U		0.000350	0.00100	1	04/10/2018 16:58	WG1095135
2-Butanone (MEK)	U		0.00393	0.0100	1	04/10/2018 16:58	WG1095135
2-Hexanone	U		0.00382	0.0100	1	04/10/2018 16:58	WG1095135
Methylene Chloride	U		0.00100	0.00500	1	04/10/2018 16:58	WG1095135
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/10/2018 16:58	WG1095135
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/10/2018 16:58	WG1095135
Naphthalene	U		0.00100	0.00500	1	04/10/2018 16:58	WG1095135
n-Propylbenzene	U		0.000349	0.00100	1	04/10/2018 16:58	WG1095135
Styrene	U		0.000307	0.00100	1	04/10/2018 16:58	WG1095135
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/10/2018 16:58	WG1095135
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/10/2018 16:58	WG1095135
Tetrachloroethene	U		0.000372	0.00100	1	04/10/2018 16:58	WG1095135
Toluene	U		0.000412	0.00100	1	04/10/2018 16:58	WG1095135
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/10/2018 16:58	WG1095135
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/10/2018 16:58	WG1095135
Trichloroethene	U		0.000398	0.00100	1	04/10/2018 16:58	WG1095135
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/10/2018 16:58	WG1095135
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/10/2018 16:58	WG1095135
Vinyl chloride	U		0.000259	0.00100	1	04/10/2018 16:58	WG1095135
o-Xylene	U		0.000341	0.00100	1	04/10/2018 16:58	WG1095135
m&p-Xylene	U		0.000719	0.00200	1	04/10/2018 16:58	WG1095135
Xylenes, Total	U		0.00106	0.00300	1	04/10/2018 16:58	WG1095135
(S) Toluene-d8	*98.5*			*80.0-120*		*04/10/2018 16:58*	WG1095135
(S) Dibromofluoromethane	*105*			*76.0-123*		*04/10/2018 16:58*	WG1095135
(S) 4-Bromofluorobenzene	*89.3*			*80.0-120*		*04/10/2018 16:58*	WG1095135

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.540		0.0247	0.100	1	04/10/2018 01:15	WG1095392
(S) o-Terphenyl	*106*			*31.0-160*		*04/10/2018 01:15*	WG1095392

MW-121

Collected date/time: 04/05/18 11:00

SAMPLE RESULTS - 03

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5430		2.82	10.0	1	04/12/2018 13:25	WG1096340

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	1.15	J6	0.0197	0.100	1	04/11/2018 12:55	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	999		5.19	100	100	04/09/2018 20:01	WG1094924
Fluoride	4.29		0.00990	0.100	1	04/09/2018 19:49	WG1094924
Sulfate	2820		7.74	500	100	04/09/2018 20:01	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0373		0.000250	0.00200	1	04/13/2018 18:56	WG1095149
Arsenic,Dissolved	0.0291		0.000250	0.00200	1	04/13/2018 14:20	WG1095178
Barium	0.0122		0.000360	0.00500	1	04/13/2018 18:56	WG1095149
Barium,Dissolved	0.0107		0.000360	0.00500	1	04/13/2018 14:20	WG1095178
Calcium	594		0.0460	1.00	1	04/13/2018 18:56	WG1095149
Chromium	U		0.000540	0.00200	1	04/13/2018 18:56	WG1095149
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 14:20	WG1095178
Iron	0.519		0.0150	0.100	1	04/13/2018 18:56	WG1095149
Iron,Dissolved	0.235		0.0150	0.100	1	04/13/2018 14:20	WG1095178
Lead	0.000325	J	0.000240	0.00200	1	04/13/2018 18:56	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 14:20	WG1095178
Manganese	2.57		0.000250	0.00500	1	04/13/2018 18:56	WG1095149
Manganese,Dissolved	2.42		0.000250	0.00500	1	04/13/2018 14:20	WG1095178
Potassium	2.88		0.0370	1.00	1	04/13/2018 18:56	WG1095149
Selenium	0.00485		0.000380	0.00200	1	04/13/2018 18:56	WG1095149
Selenium,Dissolved	0.00498		0.000380	0.00200	1	04/13/2018 14:20	WG1095178
Sodium	859		0.550	5.00	5	04/15/2018 09:01	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/09/2018 18:29	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.2*			*77.0-122*		*04/09/2018 18:29*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 00:06	WG1095135
Benzene	U		0.000331	0.00100	1	04/08/2018 00:06	WG1095135
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 00:06	WG1095135
Bromoform	U		0.000469	0.00100	1	04/08/2018 00:06	WG1095135
Bromomethane	U		0.000866	0.00500	1	04/08/2018 00:06	WG1095135
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 00:06	WG1095135
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 00:06	WG1095135
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 00:06	WG1095135
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 00:06	WG1095135

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 00:06	WG1095135
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 00:06	WG1095135
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 00:06	WG1095135
Chloroform	U		0.000324	0.00500	1	04/08/2018 00:06	WG1095135
Chloromethane	U		0.000276	0.00250	1	04/08/2018 00:06	WG1095135
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 00:06	WG1095135
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 00:06	WG1095135
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 00:06	WG1095135
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 00:06	WG1095135
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 00:06	WG1095135
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 00:06	WG1095135
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 00:06	WG1095135
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 00:06	WG1095135
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 00:06	WG1095135
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 00:06	WG1095135
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 00:06	WG1095135
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 00:06	WG1095135
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 00:06	WG1095135
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 00:06	WG1095135
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 00:06	WG1095135
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 00:06	WG1095135
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 00:06	WG1095135
Naphthalene	U		0.00100	0.00500	1	04/08/2018 00:06	WG1095135
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 00:06	WG1095135
Styrene	U		0.000307	0.00100	1	04/08/2018 00:06	WG1095135
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 00:06	WG1095135
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 00:06	WG1095135
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 00:06	WG1095135
Toluene	U		0.000412	0.00100	1	04/08/2018 00:06	WG1095135
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 00:06	WG1095135
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 00:06	WG1095135
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 00:06	WG1095135
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 00:06	WG1095135
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 00:06	WG1095135
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 00:06	WG1095135
o-Xylene	U		0.000341	0.00100	1	04/08/2018 00:06	WG1095135
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 00:06	WG1095135
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 00:06	WG1095135
(S) Toluene-d8	*106*			*80.0-120*		*04/08/2018 00:06*	WG1095135
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/08/2018 00:06*	WG1095135
(S) 4-Bromofluorobenzene	*92.7*			*80.0-120*		*04/08/2018 00:06*	WG1095135

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.395		0.0247	0.100	1	04/10/2018 01:35	WG1095392
(S) o-Terphenyl	*100*			*31.0-160*		*04/10/2018 01:35*	WG1095392

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	9640		2.82	10.0	1	04/10/2018 23:19	WG1096148

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0630	J	0.0197	0.100	1	04/11/2018 13:20	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1710		5.19	100	100	04/09/2018 20:26	WG1094924
Fluoride	4.49		0.00990	0.100	1	04/09/2018 20:13	WG1094924
Sulfate	4220		7.74	500	100	04/09/2018 20:26	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0904		0.000250	0.00200	1	04/13/2018 19:00	WG1095149
Arsenic,Dissolved	0.0777		0.000250	0.00200	1	04/13/2018 14:24	WG1095178
Barium	0.0126		0.000360	0.00500	1	04/13/2018 19:00	WG1095149
Barium,Dissolved	0.0129		0.000360	0.00500	1	04/13/2018 14:24	WG1095178
Calcium	595		0.0460	1.00	1	04/13/2018 19:00	WG1095149
Chromium	0.00224		0.000540	0.00200	1	04/15/2018 13:27	WG1098545
Chromium,Dissolved	0.00224		0.000540	0.00200	1	04/13/2018 14:24	WG1095178
Iron	1.30		0.0150	0.100	1	04/13/2018 19:00	WG1095149
Iron,Dissolved	0.378		0.0150	0.100	1	04/13/2018 14:24	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:00	WG1095149
Lead,Dissolved	0.000259	J	0.000240	0.00200	1	04/13/2018 14:24	WG1095178
Manganese	2.66		0.000250	0.00500	1	04/13/2018 19:00	WG1095149
Manganese,Dissolved	2.67		0.000250	0.00500	1	04/13/2018 14:24	WG1095178
Potassium	7.29		0.0370	1.00	1	04/13/2018 19:00	WG1095149
Selenium	0.00438		0.000380	0.00200	1	04/13/2018 19:00	WG1095149
Selenium,Dissolved	0.00450		0.000380	0.00200	1	04/13/2018 14:24	WG1095178
Sodium	1630		0.550	5.00	5	04/15/2018 09:06	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.765		0.0314	0.100	1	04/12/2018 21:11	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*99.4*			*77.0-122*		*04/12/2018 21:11*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/10/2018 17:17	WG1095135
Benzene	U		0.000331	0.00100	1	04/10/2018 17:17	WG1095135
Bromodichloromethane	U		0.000380	0.00100	1	04/10/2018 17:17	WG1095135
Bromoform	U		0.000469	0.00100	1	04/10/2018 17:17	WG1095135
Bromomethane	U		0.000866	0.00500	1	04/10/2018 17:17	WG1095135
n-Butylbenzene	U		0.000361	0.00100	1	04/10/2018 17:17	WG1095135
sec-Butylbenzene	U		0.000365	0.00100	1	04/10/2018 17:17	WG1095135
Carbon disulfide	U		0.000275	0.00100	1	04/10/2018 17:17	WG1095135
Carbon tetrachloride	U		0.000379	0.00100	1	04/10/2018 17:17	WG1095135

MW-84
Collected date/time: 04/04/18 14:10

SAMPLE RESULTS - 04

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/10/2018 17:17	WG1095135
Chlorodibromomethane	U		0.000327	0.00100	1	04/10/2018 17:17	WG1095135
Chloroethane	U	J4	0.000453	0.00500	1	04/10/2018 17:17	WG1095135
Chloroform	U		0.000324	0.00500	1	04/10/2018 17:17	WG1095135
Chloromethane	U		0.000276	0.00250	1	04/10/2018 17:17	WG1095135
1,2-Dibromoethane	U		0.000381	0.00100	1	04/10/2018 17:17	WG1095135
1,1-Dichloroethane	U		0.000259	0.00100	1	04/10/2018 17:17	WG1095135
1,2-Dichloroethane	U		0.000361	0.00100	1	04/10/2018 17:17	WG1095135
1,1-Dichloroethene	U		0.000398	0.00100	1	04/10/2018 17:17	WG1095135
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/10/2018 17:17	WG1095135
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/10/2018 17:17	WG1095135
1,2-Dichloropropane	U		0.000306	0.00100	1	04/10/2018 17:17	WG1095135
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/10/2018 17:17	WG1095135
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/10/2018 17:17	WG1095135
Ethylbenzene	U		0.000384	0.00100	1	04/10/2018 17:17	WG1095135
Isopropylbenzene	U		0.000326	0.00100	1	04/10/2018 17:17	WG1095135
p-Isopropyltoluene	U		0.000350	0.00100	1	04/10/2018 17:17	WG1095135
2-Butanone (MEK)	U		0.00393	0.0100	1	04/10/2018 17:17	WG1095135
2-Hexanone	U		0.00382	0.0100	1	04/10/2018 17:17	WG1095135
Methylene Chloride	U		0.00100	0.00500	1	04/10/2018 17:17	WG1095135
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/10/2018 17:17	WG1095135
Methyl tert-butyl ether	0.00124		0.000367	0.00100	1	04/10/2018 17:17	WG1095135
Naphthalene	U		0.00100	0.00500	1	04/10/2018 17:17	WG1095135
n-Propylbenzene	U		0.000349	0.00100	1	04/10/2018 17:17	WG1095135
Styrene	U		0.000307	0.00100	1	04/10/2018 17:17	WG1095135
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/10/2018 17:17	WG1095135
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/10/2018 17:17	WG1095135
Tetrachloroethene	U		0.000372	0.00100	1	04/10/2018 17:17	WG1095135
Toluene	U		0.000412	0.00100	1	04/10/2018 17:17	WG1095135
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/10/2018 17:17	WG1095135
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/10/2018 17:17	WG1095135
Trichloroethene	U		0.000398	0.00100	1	04/10/2018 17:17	WG1095135
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/10/2018 17:17	WG1095135
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/10/2018 17:17	WG1095135
Vinyl chloride	U		0.000259	0.00100	1	04/10/2018 17:17	WG1095135
o-Xylene	U		0.000341	0.00100	1	04/10/2018 17:17	WG1095135
m&p-Xylene	U		0.000719	0.00200	1	04/10/2018 17:17	WG1095135
Xylenes, Total	U		0.00106	0.00300	1	04/10/2018 17:17	WG1095135
(S) Toluene-d8	*97.3*			*80.0-120*		*04/10/2018 17:17*	WG1095135
(S) Dibromofluoromethane	*105*			*76.0-123*		*04/10/2018 17:17*	WG1095135
(S) 4-Bromofluorobenzene	*88.0*			*80.0-120*		*04/10/2018 17:17*	WG1095135

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	22.3		0.124	0.500	5	04/11/2018 21:00	WG1095392
(S) o-Terphenyl	*102*			*31.0-160*		*04/11/2018 21:00*	WG1095392

MW-122

Collected date/time: 04/05/18 09:20

SAMPLE RESULTS - 05

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4830		2.82	10.0	1	04/12/2018 13:25	WG1096340

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.137		0.0197	0.100	1	04/11/2018 12:58	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1170		5.19	100	100	04/09/2018 21:31	WG1094924
Fluoride	3.20		0.00990	0.100	1	04/09/2018 20:38	WG1094924
Sulfate	1980		7.74	500	100	04/09/2018 21:31	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00252		0.000250	0.00200	1	04/13/2018 19:04	WG1095149
Arsenic,Dissolved	0.00138	J	0.000250	0.00200	1	04/13/2018 14:28	WG1095178
Barium	0.0198		0.000360	0.00500	1	04/13/2018 19:04	WG1095149
Barium,Dissolved	0.0201		0.000360	0.00500	1	04/13/2018 14:28	WG1095178
Calcium	368		0.0460	1.00	1	04/13/2018 19:04	WG1095149
Chromium	0.00136	B J	0.000540	0.00200	1	04/13/2018 19:04	WG1095149
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 14:28	WG1095178
Iron	0.860		0.0150	0.100	1	04/13/2018 19:04	WG1095149
Iron,Dissolved	0.305		0.0150	0.100	1	04/13/2018 14:28	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:04	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 14:28	WG1095178
Manganese	0.763		0.000250	0.00500	1	04/13/2018 19:04	WG1095149
Manganese,Dissolved	0.741		0.000250	0.00500	1	04/13/2018 14:28	WG1095178
Potassium	3.73		0.0370	1.00	1	04/13/2018 19:04	WG1095149
Selenium	U		0.000380	0.00200	1	04/13/2018 19:04	WG1095149
Selenium,Dissolved	0.000579	J	0.000380	0.00200	1	04/13/2018 14:28	WG1095178
Sodium	1050		0.550	5.00	5	04/15/2018 09:10	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/09/2018 18:51	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.7*			*77.0-122*		*04/09/2018 18:51*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/12/2018 12:53	WG1095141
Benzene	U		0.000331	0.00100	1	04/12/2018 12:53	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/12/2018 12:53	WG1095141
Bromoform	U		0.000469	0.00100	1	04/12/2018 12:53	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/12/2018 12:53	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/12/2018 12:53	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/12/2018 12:53	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/12/2018 12:53	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/12/2018 12:53	WG1095141

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/12/2018 12:53	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/12/2018 12:53	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/12/2018 12:53	WG1095141
Chloroform	U		0.000324	0.00500	1	04/12/2018 12:53	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/12/2018 12:53	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/12/2018 12:53	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/12/2018 12:53	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/12/2018 12:53	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/12/2018 12:53	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 12:53	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/12/2018 12:53	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/12/2018 12:53	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/12/2018 12:53	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/12/2018 12:53	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/12/2018 12:53	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/12/2018 12:53	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/12/2018 12:53	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/12/2018 12:53	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/12/2018 12:53	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/12/2018 12:53	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/12/2018 12:53	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/12/2018 12:53	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/12/2018 12:53	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/12/2018 12:53	WG1095141
Styrene	U		0.000307	0.00100	1	04/12/2018 12:53	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/12/2018 12:53	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/12/2018 12:53	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/12/2018 12:53	WG1095141
Toluene	U		0.000412	0.00100	1	04/12/2018 12:53	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/12/2018 12:53	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/12/2018 12:53	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/12/2018 12:53	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/12/2018 12:53	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/12/2018 12:53	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/12/2018 12:53	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/12/2018 12:53	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/12/2018 12:53	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/12/2018 12:53	WG1095141
(S) Toluene-d8	*102*			*80.0-120*		*04/12/2018 12:53*	WG1095141
(S) Dibromofluoromethane	*104*			*76.0-123*		*04/12/2018 12:53*	WG1095141
(S) 4-Bromofluorobenzene	*92.3*			*80.0-120*		*04/12/2018 12:53*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.211		0.0247	0.100	1	04/12/2018 01:44	WG1095392
(S) o-Terphenyl	*91.0*			*31.0-160*		*04/12/2018 01:44*	WG1095392

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5600		2.82	10.0	1	04/10/2018 23:19	WG1096148

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	19.8		0.0985	0.500	5	04/11/2018 13:00	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1270		5.19	100	100	04/09/2018 21:56	WG1094924
Fluoride	6.69		0.00990	0.100	1	04/09/2018 21:43	WG1094924
Sulfate	2340		7.74	500	100	04/09/2018 21:56	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00875		0.000250	0.00200	1	04/13/2018 19:08	WG1095149
Arsenic,Dissolved	0.00772		0.000250	0.00200	1	04/13/2018 14:32	WG1095178
Barium	0.0154		0.000360	0.00500	1	04/13/2018 19:08	WG1095149
Barium,Dissolved	0.0129		0.000360	0.00500	1	04/13/2018 14:32	WG1095178
Calcium	542		0.0460	1.00	1	04/13/2018 19:08	WG1095149
Chromium	0.000676	B J	0.000540	0.00200	1	04/13/2018 19:08	WG1095149
Chromium,Dissolved	0.000790	J	0.000540	0.00200	1	04/13/2018 14:32	WG1095178
Iron	U		0.0150	0.100	1	04/13/2018 19:08	WG1095149
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 14:32	WG1095178
Lead	0.000245	J	0.000240	0.00200	1	04/13/2018 19:08	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 14:32	WG1095178
Manganese	0.0200		0.000250	0.00500	1	04/13/2018 19:08	WG1095149
Manganese,Dissolved	0.0233		0.000250	0.00500	1	04/13/2018 14:32	WG1095178
Potassium	17.9		0.0370	1.00	1	04/13/2018 19:08	WG1095149
Selenium	0.00666		0.000380	0.00200	1	04/13/2018 19:08	WG1095149
Selenium,Dissolved	0.00569		0.000380	0.00200	1	04/13/2018 14:32	WG1095178
Sodium	1170		0.550	5.00	5	04/15/2018 09:15	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/09/2018 19:13	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.3*			*77.0-122*		*04/09/2018 19:13*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 13:15	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 13:15	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 13:15	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 13:15	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 13:15	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 13:15	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 13:15	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 13:15	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 13:15	WG1095141

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 13:15	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 13:15	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 13:15	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 13:15	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 13:15	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 13:15	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 13:15	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 13:15	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 13:15	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 13:15	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 13:15	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 13:15	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 13:15	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 13:15	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 13:15	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 13:15	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 13:15	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 13:15	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 13:15	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 13:15	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 13:15	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 13:15	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 13:15	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 13:15	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 13:15	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 13:15	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 13:15	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 13:15	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 13:15	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 13:15	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 13:15	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 13:15	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 13:15	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 13:15	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 13:15	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 13:15	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 13:15	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 13:15	WG1095141
(S) Toluene-d8	*96.9*			*80.0-120*		*04/07/2018 13:15*	WG1095141
(S) Dibromofluoromethane	*110*			*76.0-123*		*04/07/2018 13:15*	WG1095141
(S) 4-Bromofluorobenzene	*92.8*			*80.0-120*		*04/07/2018 13:15*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.922		0.0247	0.100	1	04/10/2018 02:36	WG1095392
(S) o-Terphenyl	*107*			*31.0-160*		*04/10/2018 02:36*	WG1095392

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5180	J3	2.82	10.0	1	04/10/2018 23:19	WG1096148

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.461		0.0197	0.100	1	04/11/2018 13:05	WG1096180

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1190		5.19	100	100	04/09/2018 22:20	WG1094924
Fluoride	2.97		0.00990	0.100	1	04/09/2018 22:08	WG1094924
Sulfate	2310		7.74	500	100	04/09/2018 22:20	WG1094924

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00302		0.000250	0.00200	1	04/13/2018 19:12	WG1095149
Arsenic,Dissolved	0.00206		0.000250	0.00200	1	04/13/2018 14:36	WG1095178
Barium	0.0110		0.000360	0.00500	1	04/13/2018 19:12	WG1095149
Barium,Dissolved	0.0123		0.000360	0.00500	1	04/13/2018 14:36	WG1095178
Calcium	506		0.0460	1.00	1	04/13/2018 19:12	WG1095149
Chromium	0.00109	B J	0.000540	0.00200	1	04/13/2018 19:12	WG1095149
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 14:36	WG1095178
Iron	0.139	B	0.0150	0.100	1	04/13/2018 19:12	WG1095149
Iron,Dissolved	0.0447	J	0.0150	0.100	1	04/13/2018 14:36	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:12	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 14:36	WG1095178
Manganese	0.129		0.000250	0.00500	1	04/13/2018 19:12	WG1095149
Manganese,Dissolved	0.105		0.000250	0.00500	1	04/13/2018 14:36	WG1095178
Potassium	7.13		0.0370	1.00	1	04/13/2018 19:12	WG1095149
Selenium	0.00111	J	0.000380	0.00200	1	04/13/2018 19:12	WG1095149
Selenium,Dissolved	0.00106	J	0.000380	0.00200	1	04/13/2018 14:36	WG1095178
Sodium	1110		0.550	5.00	5	04/15/2018 09:20	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/09/2018 19:35	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.2*			*77.0-122*		*04/09/2018 19:35*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 13:36	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 13:36	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 13:36	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 13:36	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 13:36	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 13:36	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 13:36	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 13:36	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 13:36	WG1095141

MW-80

Collected date/time: 04/04/18 15:40

SAMPLE RESULTS - 07

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 13:36	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 13:36	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 13:36	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 13:36	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 13:36	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 13:36	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 13:36	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 13:36	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 13:36	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 13:36	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 13:36	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 13:36	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 13:36	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 13:36	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 13:36	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 13:36	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 13:36	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 13:36	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 13:36	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 13:36	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 13:36	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 13:36	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 13:36	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 13:36	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 13:36	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 13:36	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 13:36	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 13:36	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 13:36	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 13:36	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 13:36	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 13:36	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 13:36	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 13:36	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 13:36	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 13:36	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 13:36	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 13:36	WG1095141
(S) Toluene-d8	*97.0*			*80.0-120*		*04/07/2018 13:36*	WG1095141
(S) Dibromofluoromethane	*111*			*76.0-123*		*04/07/2018 13:36*	WG1095141
(S) 4-Bromofluorobenzene	*94.2*			*80.0-120*		*04/07/2018 13:36*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.150		0.0247	0.100	1	04/10/2018 02:56	WG1095392
(S) o-Terphenyl	*93.2*			*31.0-160*		*04/10/2018 02:56*	WG1095392

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5390	J3	2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	2.16		0.0197	0.100	1	04/11/2018 13:06	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1700		5.19	100	100	04/09/2018 22:45	WG1094924
Fluoride	6.56		0.00990	0.100	1	04/09/2018 22:33	WG1094924
Sulfate	2240		7.74	500	100	04/09/2018 22:45	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00536		0.000250	0.00200	1	04/13/2018 19:15	WG1095149
Arsenic,Dissolved	0.00395		0.000250	0.00200	1	04/13/2018 14:40	WG1095178
Barium	0.0160		0.000360	0.00500	1	04/13/2018 19:15	WG1095149
Barium,Dissolved	0.0155		0.000360	0.00500	1	04/13/2018 14:40	WG1095178
Calcium	586		0.0460	1.00	1	04/13/2018 19:15	WG1095149
Chromium	0.000558	B J	0.000540	0.00200	1	04/13/2018 19:15	WG1095149
Chromium,Dissolved	0.000671	J	0.000540	0.00200	1	04/13/2018 14:40	WG1095178
Iron	0.0528	B J	0.0150	0.100	1	04/13/2018 19:15	WG1095149
Iron,Dissolved	0.0154	J	0.0150	0.100	1	04/13/2018 14:40	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:15	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 14:40	WG1095178
Manganese	0.227		0.000250	0.00500	1	04/13/2018 19:15	WG1095149
Manganese,Dissolved	0.267		0.000250	0.00500	1	04/13/2018 14:40	WG1095178
Potassium	7.90		0.0370	1.00	1	04/13/2018 19:15	WG1095149
Selenium	0.000902	J	0.000380	0.00200	1	04/13/2018 19:15	WG1095149
Selenium,Dissolved	0.000757	J	0.000380	0.00200	1	04/13/2018 14:40	WG1095178
Sodium	1130		0.550	5.00	5	04/15/2018 09:24	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0414	J	0.0314	0.100	1	04/09/2018 19:56	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.1*			*77.0-122*		*04/09/2018 19:56*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/12/2018 13:12	WG1095141
Benzene	U		0.000331	0.00100	1	04/12/2018 13:12	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/12/2018 13:12	WG1095141
Bromoform	U		0.000469	0.00100	1	04/12/2018 13:12	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/12/2018 13:12	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/12/2018 13:12	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/12/2018 13:12	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/12/2018 13:12	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/12/2018 13:12	WG1095141

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/12/2018 13:12	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/12/2018 13:12	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/12/2018 13:12	WG1095141
Chloroform	U		0.000324	0.00500	1	04/12/2018 13:12	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/12/2018 13:12	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/12/2018 13:12	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/12/2018 13:12	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/12/2018 13:12	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/12/2018 13:12	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 13:12	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/12/2018 13:12	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/12/2018 13:12	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/12/2018 13:12	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/12/2018 13:12	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/12/2018 13:12	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/12/2018 13:12	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/12/2018 13:12	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/12/2018 13:12	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/12/2018 13:12	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/12/2018 13:12	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/12/2018 13:12	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/12/2018 13:12	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/12/2018 13:12	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/12/2018 13:12	WG1095141
Styrene	U		0.000307	0.00100	1	04/12/2018 13:12	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/12/2018 13:12	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/12/2018 13:12	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/12/2018 13:12	WG1095141
Toluene	U		0.000412	0.00100	1	04/12/2018 13:12	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/12/2018 13:12	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/12/2018 13:12	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/12/2018 13:12	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/12/2018 13:12	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/12/2018 13:12	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/12/2018 13:12	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/12/2018 13:12	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/12/2018 13:12	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/12/2018 13:12	WG1095141
(S) Toluene-d8	*103*			*80.0-120*		*04/12/2018 13:12*	WG1095141
(S) Dibromofluoromethane	*106*			*76.0-123*		*04/12/2018 13:12*	WG1095141
(S) 4-Bromofluorobenzene	*89.7*			*80.0-120*		*04/12/2018 13:12*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.389		0.0247	0.100	1	04/10/2018 03:16	WG1095392
(S) o-Terphenyl	*101*			*31.0-160*		*04/10/2018 03:16*	WG1095392

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5460		2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.734		0.0197	0.100	1	04/11/2018 13:07	WG1096180

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1420		5.19	100	100	04/09/2018 23:10	WG1094924
Fluoride	11.4		0.990	10.0	100	04/09/2018 23:10	WG1094924
Sulfate	2350		7.74	500	100	04/09/2018 23:10	WG1094924

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0297		0.000250	0.00200	1	04/13/2018 19:19	WG1095149
Arsenic,Dissolved	0.0274		0.000250	0.00200	1	04/13/2018 14:44	WG1095178
Barium	0.0260		0.000360	0.00500	1	04/13/2018 19:19	WG1095149
Barium,Dissolved	0.0232		0.000360	0.00500	1	04/13/2018 14:44	WG1095178
Calcium	391		0.0460	1.00	1	04/13/2018 19:19	WG1095149
Chromium	0.00125	J	0.000540	0.00200	1	04/15/2018 12:50	WG1098545
Chromium,Dissolved	0.00115	J	0.000540	0.00200	1	04/13/2018 14:44	WG1095178
Iron	0.0904	B J	0.0150	0.100	1	04/13/2018 19:19	WG1095149
Iron,Dissolved	0.0685	J	0.0150	0.100	1	04/13/2018 14:44	WG1095178
Lead	0.000271	J	0.000240	0.00200	1	04/13/2018 19:19	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 14:44	WG1095178
Manganese	2.00		0.000250	0.00500	1	04/13/2018 19:19	WG1095149
Manganese,Dissolved	1.99		0.000250	0.00500	1	04/13/2018 14:44	WG1095178
Potassium	9.36		0.0370	1.00	1	04/13/2018 19:19	WG1095149
Selenium	0.00146	J	0.000380	0.00200	1	04/13/2018 19:19	WG1095149
Selenium,Dissolved	0.000871	J	0.000380	0.00200	1	04/13/2018 14:44	WG1095178
Sodium	1510		0.550	5.00	5	04/15/2018 09:29	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.432		0.0314	0.100	1	04/09/2018 20:19	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.4*			*77.0-122*		*04/09/2018 20:19*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 14:19	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 14:19	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 14:19	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 14:19	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 14:19	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 14:19	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 14:19	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 14:19	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 14:19	WG1095141

MW-82 SAMPLE RESULTS - 09

Collected date/time: 04/04/18 13:25

L983825

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 14:19	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 14:19	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 14:19	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 14:19	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 14:19	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 14:19	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 14:19	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 14:19	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 14:19	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 14:19	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 14:19	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 14:19	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 14:19	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 14:19	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 14:19	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 14:19	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 14:19	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 14:19	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 14:19	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 14:19	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 14:19	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 14:19	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 14:19	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 14:19	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 14:19	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 14:19	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 14:19	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 14:19	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 14:19	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 14:19	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 14:19	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 14:19	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 14:19	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 14:19	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 14:19	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 14:19	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 14:19	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 14:19	WG1095141
(S) Toluene-d8	*97.3*			*80.0-120*		*04/07/2018 14:19*	WG1095141
(S) Dibromofluoromethane	*111*			*76.0-123*		*04/07/2018 14:19*	WG1095141
(S) 4-Bromofluorobenzene	*95.0*			*80.0-120*		*04/07/2018 14:19*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	3.03		0.0247	0.100	1	04/10/2018 03:36	WG1095392
(S) o-Terphenyl	*114*			*31.0-160*		*04/10/2018 03:36*	WG1095392

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	7860		2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	6.72		0.0985	0.500	5	04/11/2018 13:08	WG1096180

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1950		5.19	100	100	04/10/2018 00:00	WG1094924
Fluoride	7.01		0.00990	0.100	1	04/09/2018 23:22	WG1094924
Sulfate	3700		7.74	500	100	04/10/2018 00:00	WG1094924

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0956		0.000250	0.00200	1	04/13/2018 19:23	WG1095149
Arsenic,Dissolved	0.0944		0.000250	0.00200	1	04/13/2018 14:48	WG1095178
Barium	0.0129		0.000360	0.00500	1	04/13/2018 19:23	WG1095149
Barium,Dissolved	0.0129		0.000360	0.00500	1	04/13/2018 14:48	WG1095178
Calcium	600		0.0460	1.00	1	04/13/2018 19:23	WG1095149
Chromium	0.00199	B J	0.000540	0.00200	1	04/13/2018 19:23	WG1095149
Chromium,Dissolved	0.000610	J	0.000540	0.00200	1	04/13/2018 14:48	WG1095178
Iron	0.0666	B J	0.0150	0.100	1	04/13/2018 19:23	WG1095149
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 14:48	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:23	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 14:48	WG1095178
Manganese	1.22		0.000250	0.00500	1	04/13/2018 19:23	WG1095149
Manganese,Dissolved	1.22		0.000250	0.00500	1	04/13/2018 14:48	WG1095178
Potassium	37.3		0.0370	1.00	1	04/13/2018 19:23	WG1095149
Selenium	0.0335		0.000380	0.00200	1	04/13/2018 19:23	WG1095149
Selenium,Dissolved	0.0323		0.000380	0.00200	1	04/13/2018 14:48	WG1095178
Sodium	2280		0.550	5.00	5	04/15/2018 09:43	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	1.18		0.0314	0.100	1	04/09/2018 20:41	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.4*			*77.0-122*		*04/09/2018 20:41*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 14:40	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 14:40	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 14:40	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 14:40	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 14:40	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 14:40	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 14:40	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 14:40	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 14:40	WG1095141

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 14:40	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 14:40	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 14:40	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 14:40	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 14:40	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 14:40	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 14:40	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 14:40	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 14:40	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 14:40	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 14:40	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 14:40	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 14:40	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 14:40	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 14:40	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 14:40	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 14:40	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 14:40	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 14:40	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 14:40	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 14:40	WG1095141
Methyl tert-butyl ether	0.000608	J	0.000367	0.00100	1	04/07/2018 14:40	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 14:40	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 14:40	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 14:40	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 14:40	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 14:40	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 14:40	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 14:40	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 14:40	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 14:40	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 14:40	WG1095141
1,2,4-Trimethylbenzene	0.000852	J	0.000373	0.00100	1	04/07/2018 14:40	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 14:40	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 14:40	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 14:40	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 14:40	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 14:40	WG1095141
(S) Toluene-d8	*96.9*			*80.0-120*		*04/07/2018 14:40*	WG1095141
(S) Dibromofluoromethane	*110*			*76.0-123*		*04/07/2018 14:40*	WG1095141
(S) 4-Bromofluorobenzene	*746*	J1		*80.0-120*		*04/07/2018 14:40*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	14.1		0.124	0.500	5	04/11/2018 21:20	WG1095392
(S) o-Terphenyl	*108*			*31.0-160*		*04/11/2018 21:20*	WG1095392

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	8360		2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.348		0.0197	0.100	1	04/11/2018 13:09	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	2350		5.19	100	100	04/10/2018 00:24	WG1094924
Fluoride	1.95		0.00990	0.100	1	04/10/2018 00:12	WG1094924
Sulfate	4020		7.74	500	100	04/10/2018 00:24	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0614		0.000250	0.00200	1	04/13/2018 19:28	WG1095149
Arsenic,Dissolved	0.0639		0.000250	0.00200	1	04/13/2018 14:52	WG1095178
Barium	0.00806		0.000360	0.00500	1	04/13/2018 19:28	WG1095149
Barium,Dissolved	0.00845		0.000360	0.00500	1	04/13/2018 14:52	WG1095178
Calcium	589		0.0460	1.00	1	04/13/2018 19:28	WG1095149
Chromium	0.00109	B J	0.000540	0.00200	1	04/13/2018 19:28	WG1095149
Chromium,Dissolved	0.000722	J	0.000540	0.00200	1	04/13/2018 14:52	WG1095178
Iron	0.932		0.0150	0.100	1	04/13/2018 19:28	WG1095149
Iron,Dissolved	1.07		0.0150	0.100	1	04/13/2018 14:52	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:28	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 14:52	WG1095178
Manganese	1.84		0.000250	0.00500	1	04/13/2018 19:28	WG1095149
Manganese,Dissolved	1.97		0.000250	0.00500	1	04/13/2018 14:52	WG1095178
Potassium	2.48		0.0370	1.00	1	04/13/2018 19:28	WG1095149
Selenium	0.00147	J	0.000380	0.00200	1	04/13/2018 19:28	WG1095149
Selenium,Dissolved	0.00148	J	0.000380	0.00200	1	04/13/2018 14:52	WG1095178
Sodium	2490		1.10	10.0	10	04/15/2018 14:50	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.575		0.0314	0.100	1	04/09/2018 21:03	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.2*			*77.0-122*		*04/09/2018 21:03*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 15:01	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 15:01	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 15:01	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 15:01	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 15:01	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 15:01	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 15:01	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 15:01	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 15:01	WG1095141

MW-73
Collected date/time: 04/04/18 08:40

SAMPLE RESULTS - 11

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 15:01	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 15:01	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 15:01	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 15:01	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 15:01	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 15:01	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 15:01	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 15:01	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 15:01	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 15:01	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 15:01	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 15:01	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 15:01	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 15:01	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 15:01	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 15:01	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 15:01	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 15:01	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 15:01	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 15:01	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 15:01	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 15:01	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 15:01	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 15:01	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 15:01	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 15:01	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 15:01	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 15:01	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 15:01	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 15:01	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 15:01	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 15:01	WG1095141
1,2,4-Trimethylbenzene	0.000735	J	0.000373	0.00100	1	04/07/2018 15:01	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 15:01	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 15:01	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 15:01	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 15:01	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 15:01	WG1095141
(S) Toluene-d8	*94.8*			*80.0-120*		*04/07/2018 15:01*	WG1095141
(S) Dibromofluoromethane	*112*			*76.0-123*		*04/07/2018 15:01*	WG1095141
(S) 4-Bromofluorobenzene	*94.9*			*80.0-120*		*04/07/2018 15:01*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.85		0.0247	0.100	1	04/10/2018 04:17	WG1095392
(S) o-Terphenyl	*113*			*31.0-160*		*04/10/2018 04:17*	WG1095392

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	18800		2.82	10.0	1	04/12/2018 13:25	WG1096340

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0470	J	0.0197	0.100	1	04/11/2018 13:10	WG1096180

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	6270		5.19	100	100	04/10/2018 00:49	WG1094924
Fluoride	1.35		0.00990	0.100	1	04/10/2018 00:37	WG1094924
Sulfate	5800		7.74	500	100	04/10/2018 00:49	WG1094924

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00931		0.000250	0.00200	1	04/13/2018 19:40	WG1095149
Arsenic,Dissolved	0.00772		0.000250	0.00200	1	04/13/2018 15:17	WG1095178
Barium	0.0225		0.000360	0.00500	1	04/13/2018 19:40	WG1095149
Barium,Dissolved	0.0232		0.000360	0.00500	1	04/13/2018 15:17	WG1095178
Calcium	702		0.0460	1.00	1	04/13/2018 19:40	WG1095149
Chromium	0.000609	B J	0.000540	0.00200	1	04/13/2018 19:40	WG1095149
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 15:17	WG1095178
Iron	2.94		0.0150	0.100	1	04/13/2018 19:40	WG1095149
Iron,Dissolved	2.71		0.0150	0.100	1	04/13/2018 15:17	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:40	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 15:17	WG1095178
Manganese	1.28		0.000250	0.00500	1	04/13/2018 19:40	WG1095149
Manganese,Dissolved	1.23		0.000250	0.00500	1	04/13/2018 15:17	WG1095178
Potassium	5.75		0.0370	1.00	1	04/13/2018 19:40	WG1095149
Selenium	0.00199	J	0.000380	0.00200	1	04/13/2018 19:40	WG1095149
Selenium,Dissolved	0.00148	J	0.000380	0.00200	1	04/13/2018 15:17	WG1095178
Sodium	4870		2.20	20.0	20	04/15/2018 14:55	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/09/2018 21:25	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*97.9*			*77.0-122*		*04/09/2018 21:25*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/12/2018 13:31	WG1095141
Benzene	U		0.000331	0.00100	1	04/12/2018 13:31	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/12/2018 13:31	WG1095141
Bromoform	U		0.000469	0.00100	1	04/12/2018 13:31	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/12/2018 13:31	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/12/2018 13:31	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/12/2018 13:31	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/12/2018 13:31	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/12/2018 13:31	WG1095141

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/12/2018 13:31	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/12/2018 13:31	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/12/2018 13:31	WG1095141
Chloroform	U		0.000324	0.00500	1	04/12/2018 13:31	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/12/2018 13:31	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/12/2018 13:31	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/12/2018 13:31	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/12/2018 13:31	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/12/2018 13:31	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 13:31	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/12/2018 13:31	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/12/2018 13:31	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/12/2018 13:31	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/12/2018 13:31	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/12/2018 13:31	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/12/2018 13:31	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/12/2018 13:31	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/12/2018 13:31	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/12/2018 13:31	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/12/2018 13:31	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/12/2018 13:31	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/12/2018 13:31	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/12/2018 13:31	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/12/2018 13:31	WG1095141
Styrene	U		0.000307	0.00100	1	04/12/2018 13:31	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/12/2018 13:31	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/12/2018 13:31	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/12/2018 13:31	WG1095141
Toluene	U		0.000412	0.00100	1	04/12/2018 13:31	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/12/2018 13:31	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/12/2018 13:31	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/12/2018 13:31	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/12/2018 13:31	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/12/2018 13:31	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/12/2018 13:31	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/12/2018 13:31	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/12/2018 13:31	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/12/2018 13:31	WG1095141
(S) Toluene-d8	*103*			*80.0-120*		*04/12/2018 13:31*	WG1095141
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/12/2018 13:31*	WG1095141
(S) 4-Bromofluorobenzene	*93.8*			*80.0-120*		*04/12/2018 13:31*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.132		0.0247	0.100	1	04/10/2018 04:37	WG1095392
(S) o-Terphenyl	*91.6*			*31.0-160*		*04/10/2018 04:37*	WG1095392

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	8800		2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	2.99		0.0197	0.100	1	04/11/2018 13:11	WG1096180

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	3540		5.19	100	100	04/10/2018 01:14	WG1094924
Fluoride	5.82		0.00990	0.100	1	04/10/2018 01:02	WG1094924
Sulfate	3010		7.74	500	100	04/10/2018 01:14	WG1094924

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0175		0.000250	0.00200	1	04/13/2018 19:44	WG1095149
Arsenic,Dissolved	0.0149		0.000250	0.00200	1	04/13/2018 15:21	WG1095178
Barium	0.0155		0.000360	0.00500	1	04/13/2018 19:44	WG1095149
Barium,Dissolved	0.0148		0.000360	0.00500	1	04/13/2018 15:21	WG1095178
Calcium	707		0.0460	1.00	1	04/13/2018 19:44	WG1095149
Chromium	0.000688	B J	0.000540	0.00200	1	04/13/2018 19:44	WG1095149
Chromium,Dissolved	0.000774	J	0.000540	0.00200	1	04/13/2018 15:21	WG1095178
Iron	2.04		0.0150	0.100	1	04/13/2018 19:44	WG1095149
Iron,Dissolved	1.78		0.0150	0.100	1	04/13/2018 15:21	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:44	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 15:21	WG1095178
Manganese	3.04		0.000250	0.00500	1	04/13/2018 19:44	WG1095149
Manganese,Dissolved	3.04		0.000250	0.00500	1	04/13/2018 15:21	WG1095178
Potassium	8.82		0.0370	1.00	1	04/13/2018 19:44	WG1095149
Selenium	0.00173	J	0.000380	0.00200	1	04/13/2018 19:44	WG1095149
Selenium,Dissolved	0.00213		0.000380	0.00200	1	04/13/2018 15:21	WG1095178
Sodium	2490		0.550	5.00	5	04/15/2018 09:57	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.0713	J	0.0314	0.100	1	04/09/2018 21:47	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.3*			*77.0-122*		*04/09/2018 21:47*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 15:44	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 15:44	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 15:44	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 15:44	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 15:44	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 15:44	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 15:44	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 15:44	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 15:44	WG1095141

MW-72
Collected date/time: 04/04/18 17:10

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 15:44	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 15:44	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 15:44	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 15:44	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 15:44	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 15:44	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 15:44	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 15:44	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 15:44	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 15:44	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 15:44	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 15:44	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 15:44	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 15:44	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 15:44	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 15:44	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 15:44	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 15:44	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 15:44	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 15:44	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 15:44	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 15:44	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 15:44	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 15:44	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 15:44	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 15:44	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 15:44	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 15:44	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 15:44	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 15:44	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 15:44	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 15:44	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 15:44	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 15:44	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 15:44	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 15:44	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 15:44	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 15:44	WG1095141
(S) Toluene-d8	*97.0*			*80.0-120*		*04/07/2018 15:44*	WG1095141
(S) Dibromofluoromethane	*115*			*76.0-123*		*04/07/2018 15:44*	WG1095141
(S) 4-Bromofluorobenzene	*93.4*			*80.0-120*		*04/07/2018 15:44*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.555		0.0247	0.100	1	04/10/2018 04:57	WG1095392
(S) o-Terphenyl	*104*			*31.0-160*		*04/10/2018 04:57*	WG1095392

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	10800		2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	1.06		0.0197	0.100	1	04/11/2018 13:12	WG1096180

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	4510		5.19	100	100	04/10/2018 01:39	WG1094924
Fluoride	2.15		0.00990	0.100	1	04/10/2018 01:27	WG1094924
Sulfate	2960		7.74	500	100	04/10/2018 01:39	WG1094924

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00951		0.000250	0.00200	1	04/13/2018 19:47	WG1095149
Arsenic,Dissolved	0.00734		0.000250	0.00200	1	04/13/2018 15:25	WG1095178
Barium	0.0203		0.000360	0.00500	1	04/13/2018 19:47	WG1095149
Barium,Dissolved	0.0217		0.000360	0.00500	1	04/13/2018 15:25	WG1095178
Calcium	881		0.0460	1.00	1	04/13/2018 19:47	WG1095149
Chromium	U		0.000540	0.00200	1	04/15/2018 13:31	WG1098545
Chromium,Dissolved	0.00324		0.000540	0.00200	1	04/13/2018 15:25	WG1095178
Iron	2.17		0.0150	0.100	1	04/13/2018 19:47	WG1095149
Iron,Dissolved	1.03		0.0150	0.100	1	04/13/2018 15:25	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:47	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 15:25	WG1095178
Manganese	2.26		0.000250	0.00500	1	04/13/2018 19:47	WG1095149
Manganese,Dissolved	2.25		0.000250	0.00500	1	04/13/2018 15:25	WG1095178
Potassium	16.6		0.0370	1.00	1	04/13/2018 19:47	WG1095149
Selenium	0.000743	J	0.000380	0.00200	1	04/13/2018 19:47	WG1095149
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 15:25	WG1095178
Sodium	2800		1.10	10.0	10	04/15/2018 14:59	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.218		0.0314	0.100	1	04/09/2018 22:09	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*97.9*			*77.0-122*		*04/09/2018 22:09*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 16:05	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 16:05	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:05	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:05	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:05	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:05	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:05	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:05	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:05	WG1095141

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:05	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:05	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 16:05	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:05	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:05	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:05	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:05	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:05	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:05	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 16:05	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:05	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:05	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:05	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:05	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:05	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:05	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:05	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:05	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:05	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:05	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:05	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 16:05	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:05	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:05	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 16:05	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:05	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:05	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:05	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 16:05	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:05	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:05	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:05	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:05	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:05	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:05	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:05	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:05	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:05	WG1095141
(S) Toluene-d8	*96.4*			*80.0-120*		*04/07/2018 16:05*	WG1095141
(S) Dibromofluoromethane	*108*			*76.0-123*		*04/07/2018 16:05*	WG1095141
(S) 4-Bromofluorobenzene	*93.5*			*80.0-120*		*04/07/2018 16:05*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.585		0.0247	0.100	1	04/10/2018 05:17	WG1095392
(S) o-Terphenyl	*104*			*31.0-160*		*04/10/2018 05:17*	WG1095392

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	8960		2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0620	J	0.0197	0.100	1	04/11/2018 13:13	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	2400		5.19	100	100	04/10/2018 02:29	WG1094924
Fluoride	2.77		0.00990	0.100	1	04/10/2018 01:51	WG1094924
Sulfate	3830		7.74	500	100	04/10/2018 02:29	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.110		0.000250	0.00200	1	04/13/2018 19:52	WG1095149
Arsenic,Dissolved	0.103		0.000250	0.00200	1	04/13/2018 15:29	WG1095178
Barium	0.0133		0.000360	0.00500	1	04/13/2018 19:52	WG1095149
Barium,Dissolved	0.0131		0.000360	0.00500	1	04/13/2018 15:29	WG1095178
Calcium	603		0.0460	1.00	1	04/13/2018 19:52	WG1095149
Chromium	0.00180	B J	0.000540	0.00200	1	04/13/2018 19:52	WG1095149
Chromium,Dissolved	0.000685	J	0.000540	0.00200	1	04/13/2018 15:29	WG1095178
Iron	1.42		0.0150	0.100	1	04/13/2018 19:52	WG1095149
Iron,Dissolved	0.471		0.0150	0.100	1	04/13/2018 15:29	WG1095178
Lead	0.000318	J	0.000240	0.00200	1	04/13/2018 19:52	WG1095149
Lead,Dissolved	0.000266	J	0.000240	0.00200	1	04/13/2018 15:29	WG1095178
Manganese	2.49		0.000250	0.00500	1	04/13/2018 19:52	WG1095149
Manganese,Dissolved	2.53		0.000250	0.00500	1	04/13/2018 15:29	WG1095178
Potassium	5.90		0.0370	1.00	1	04/13/2018 19:52	WG1095149
Selenium	0.00181	J	0.000380	0.00200	1	04/13/2018 19:52	WG1095149
Selenium,Dissolved	0.00179	J	0.000380	0.00200	1	04/13/2018 15:29	WG1095178
Sodium	2790		1.10	10.0	10	04/15/2018 15:04	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.808		0.0314	0.100	1	04/09/2018 22:31	WG1095608
(S) a,a,a-Trifluorotoluene(FID)	*98.4*			*77.0-122*		*04/09/2018 22:31*	WG1095608

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 16:26	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 16:26	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:26	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:26	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:26	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:26	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:26	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:26	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:26	WG1095141

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:26	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:26	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 16:26	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:26	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:26	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:26	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:26	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:26	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:26	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 16:26	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:26	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:26	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:26	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:26	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:26	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:26	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:26	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:26	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:26	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:26	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:26	WG1095141
Methyl tert-butyl ether	0.00124		0.000367	0.00100	1	04/07/2018 16:26	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:26	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:26	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 16:26	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:26	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:26	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:26	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 16:26	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:26	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:26	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:26	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:26	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:26	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:26	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:26	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:26	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:26	WG1095141
(S) Toluene-d8	*97.1*			*80.0-120*		*04/07/2018 16:26*	WG1095141
(S) Dibromofluoromethane	*109*			*76.0-123*		*04/07/2018 16:26*	WG1095141
(S) 4-Bromofluorobenzene	*97.1*			*80.0-120*		*04/07/2018 16:26*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.30		0.0247	0.100	1	04/10/2018 05:38	WG1095392
(S) o-Terphenyl	*112*			*31.0-160*		*04/10/2018 05:38*	WG1095392

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5240		2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0790	J	0.0197	0.100	1	04/11/2018 13:14	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1220		5.19	100	100	04/10/2018 02:53	WG1094924
Fluoride	2.86		0.00990	0.100	1	04/10/2018 02:41	WG1094924
Sulfate	2300		7.74	500	100	04/10/2018 02:53	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0549		0.000250	0.00200	1	04/13/2018 19:56	WG1095149
Arsenic,Dissolved	0.0504		0.000250	0.00200	1	04/13/2018 15:33	WG1095178
Barium	0.0166		0.000360	0.00500	1	04/13/2018 19:56	WG1095149
Barium,Dissolved	0.0109		0.000360	0.00500	1	04/13/2018 15:33	WG1095178
Calcium	468		0.0460	1.00	1	04/13/2018 19:56	WG1095149
Chromium	0.00166	B J	0.000540	0.00200	1	04/13/2018 19:56	WG1095149
Chromium,Dissolved	0.00187	J	0.000540	0.00200	1	04/13/2018 15:33	WG1095178
Iron	3.51		0.0150	0.100	1	04/13/2018 19:56	WG1095149
Iron,Dissolved	3.00		0.0150	0.100	1	04/13/2018 15:33	WG1095178
Lead	U		0.000240	0.00200	1	04/13/2018 19:56	WG1095149
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 15:33	WG1095178
Manganese	0.688		0.000250	0.00500	1	04/13/2018 19:56	WG1095149
Manganese,Dissolved	0.686		0.000250	0.00500	1	04/13/2018 15:33	WG1095178
Potassium	26.5		0.0370	1.00	1	04/13/2018 19:56	WG1095149
Selenium	0.00321		0.000380	0.00200	1	04/13/2018 19:56	WG1095149
Selenium,Dissolved	0.00271		0.000380	0.00200	1	04/13/2018 15:33	WG1095178
Sodium	1200		0.550	5.00	5	04/15/2018 10:11	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.52		0.0314	0.100	1	04/10/2018 11:23	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*97.9*			*77.0-122*		*04/10/2018 11:23*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 16:48	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 16:48	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:48	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:48	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:48	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:48	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:48	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:48	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:48	WG1095141

MW-76

Collected date/time: 04/04/18 10:55

SAMPLE RESULTS - 16

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:48	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:48	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 16:48	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:48	WG1095141
Chloromethane	0.000307	J	0.000276	0.00250	1	04/07/2018 16:48	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:48	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:48	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:48	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:48	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 16:48	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:48	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:48	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:48	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:48	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:48	WG1095141
Isopropylbenzene	0.0130		0.000326	0.00100	1	04/07/2018 16:48	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:48	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:48	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:48	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:48	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:48	WG1095141
Methyl tert-butyl ether	0.0127		0.000367	0.00100	1	04/07/2018 16:48	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:48	WG1095141
n-Propylbenzene	0.000427	J	0.000349	0.00100	1	04/07/2018 16:48	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 16:48	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:48	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:48	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:48	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 16:48	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:48	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:48	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:48	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:48	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:48	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:48	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:48	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:48	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:48	WG1095141
(S) Toluene-d8	*96.2*			*80.0-120*		*04/07/2018 16:48*	WG1095141
(S) Dibromofluoromethane	*121*			*76.0-123*		*04/07/2018 16:48*	WG1095141
(S) 4-Bromofluorobenzene	*96.4*			*80.0-120*		*04/07/2018 16:48*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	15.1		0.124	0.500	5	04/11/2018 21:41	WG1095392
(S) o-Terphenyl	*107*			*31.0-160*		*04/11/2018 21:41*	WG1095392

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3730		2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	2.70		0.0197	0.100	1	04/11/2018 13:21	WG1096180

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	239		0.519	10.0	10	04/10/2018 03:18	WG1094924
Fluoride	15.3		0.0990	1.00	10	04/10/2018 03:18	WG1094924
Sulfate	1800		1.55	100	20	04/11/2018 21:34	WG1096737

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0100		0.000250	0.00200	1	04/13/2018 20:00	WG1095149
Arsenic,Dissolved	0.00899		0.000250	0.00200	1	04/13/2018 15:37	WG1095178
Barium	0.0459		0.000360	0.00500	1	04/13/2018 20:00	WG1095149
Barium,Dissolved	0.0443		0.000360	0.00500	1	04/13/2018 15:37	WG1095178
Calcium	331		0.0460	1.00	1	04/13/2018 20:00	WG1095149
Chromium	0.142		0.000540	0.00200	1	04/13/2018 20:00	WG1095149
Chromium,Dissolved	0.132		0.000540	0.00200	1	04/13/2018 15:37	WG1095178
Iron	0.185	B	0.0150	0.100	1	04/13/2018 20:00	WG1095149
Iron,Dissolved	0.0392	J	0.0150	0.100	1	04/13/2018 15:37	WG1095178
Lead	0.000249	J	0.000240	0.00200	1	04/13/2018 20:00	WG1095149
Lead,Dissolved	0.000479	J	0.000240	0.00200	1	04/13/2018 15:37	WG1095178
Manganese	0.198		0.000250	0.00500	1	04/13/2018 20:00	WG1095149
Manganese,Dissolved	0.196		0.000250	0.00500	1	04/13/2018 15:37	WG1095178
Potassium	19.2		0.0370	1.00	1	04/13/2018 20:00	WG1095149
Selenium	0.0119		0.000380	0.00200	1	04/13/2018 20:00	WG1095149
Selenium,Dissolved	0.0125		0.000380	0.00200	1	04/13/2018 15:37	WG1095178
Sodium	393		0.110	1.00	1	04/15/2018 10:16	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.314	1.00	10	04/10/2018 19:16	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.3*			*77.0-122*		*04/10/2018 19:16*	WG1095730

Sample Narrative:

L983825-17 WG1095730: Lowest possible dilution due to sample foaming.

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	0.0139	J	0.0100	0.0500	1	04/12/2018 19:15	WG1095141
Benzene	U		0.000331	0.00100	1	04/12/2018 19:15	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/12/2018 19:15	WG1095141
Bromoform	U		0.000469	0.00100	1	04/12/2018 19:15	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/12/2018 19:15	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/12/2018 19:15	WG1095141

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	U		0.000365	0.00100	1	04/12/2018 19:15	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/12/2018 19:15	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/12/2018 19:15	WG1095141
Chlorobenzene	U		0.000348	0.00100	1	04/12/2018 19:15	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/12/2018 19:15	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/12/2018 19:15	WG1095141
Chloroform	U		0.000324	0.00500	1	04/12/2018 19:15	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/12/2018 19:15	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/12/2018 19:15	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/12/2018 19:15	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/12/2018 19:15	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/12/2018 19:15	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 19:15	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/12/2018 19:15	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/12/2018 19:15	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/12/2018 19:15	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/12/2018 19:15	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/12/2018 19:15	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/12/2018 19:15	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/12/2018 19:15	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/12/2018 19:15	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/12/2018 19:15	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/12/2018 19:15	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/12/2018 19:15	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/12/2018 19:15	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/12/2018 19:15	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/12/2018 19:15	WG1095141
Styrene	U		0.000307	0.00100	1	04/12/2018 19:15	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/12/2018 19:15	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/12/2018 19:15	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/12/2018 19:15	WG1095141
Toluene	U		0.000412	0.00100	1	04/12/2018 19:15	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/12/2018 19:15	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/12/2018 19:15	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/12/2018 19:15	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/12/2018 19:15	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/12/2018 19:15	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/12/2018 19:15	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/12/2018 19:15	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/12/2018 19:15	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/12/2018 19:15	WG1095141
(S) Toluene-d8	*102*			*80.0-120*		*04/12/2018 19:15*	WG1095141
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/12/2018 19:15*	WG1095141
(S) 4-Bromofluorobenzene	*90.5*			*80.0-120*		*04/12/2018 19:15*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	26.4		0.124	0.500	5	04/11/2018 22:01	WG1095392
(S) o-Terphenyl	*116*			*31.0-160*		*04/11/2018 22:01*	WG1095392

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4190		2.82	10.0	1	04/11/2018 00:13	WG1096149

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0680	J	0.0197	0.100	1	04/11/2018 13:22	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1360	J3	5.19	100	100	04/10/2018 03:56	WG1094924
Fluoride	4.80		0.00990	0.100	1	04/10/2018 03:31	WG1094924
Sulfate	2220	P1	7.74	500	100	04/10/2018 03:56	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0562		0.000250	0.00200	1	04/13/2018 20:04	WG1095149
Arsenic,Dissolved	0.0522		0.000250	0.00200	1	04/13/2018 15:41	WG1095178
Barium	0.0316		0.000360	0.00500	1	04/13/2018 20:04	WG1095149
Barium,Dissolved	0.0314		0.000360	0.00500	1	04/13/2018 15:41	WG1095178
Calcium	309		0.0460	1.00	1	04/13/2018 20:04	WG1095149
Chromium	0.0137		0.000540	0.00200	1	04/15/2018 13:36	WG1098545
Chromium,Dissolved	0.00788		0.000540	0.00200	1	04/13/2018 15:41	WG1095178
Iron	4.08		0.0150	0.100	1	04/13/2018 20:04	WG1095149
Iron,Dissolved	3.11		0.0150	0.100	1	04/13/2018 15:41	WG1095178
Lead	0.00133	J	0.000240	0.00200	1	04/13/2018 20:04	WG1095149
Lead,Dissolved	0.000452	J	0.000240	0.00200	1	04/13/2018 15:41	WG1095178
Manganese	0.342		0.000250	0.00500	1	04/13/2018 20:04	WG1095149
Manganese,Dissolved	0.336		0.000250	0.00500	1	04/13/2018 15:41	WG1095178
Potassium	28.2		0.0370	1.00	1	04/13/2018 20:04	WG1095149
Selenium	0.00218		0.000380	0.00200	1	04/13/2018 20:04	WG1095149
Selenium,Dissolved	0.00203		0.000380	0.00200	1	04/13/2018 15:41	WG1095178
Sodium	965		0.550	5.00	5	04/15/2018 10:20	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.18		0.0314	0.100	1	04/10/2018 11:45	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*97.9*			*77.0-122*		*04/10/2018 11:45*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/12/2018 19:34	WG1095141
Benzene	0.00166		0.000331	0.00100	1	04/12/2018 19:34	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/12/2018 19:34	WG1095141
Bromoform	U		0.000469	0.00100	1	04/12/2018 19:34	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/12/2018 19:34	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/12/2018 19:34	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/12/2018 19:34	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/12/2018 19:34	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/12/2018 19:34	WG1095141

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/12/2018 19:34	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/12/2018 19:34	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/12/2018 19:34	WG1095141
Chloroform	U		0.000324	0.00500	1	04/12/2018 19:34	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/12/2018 19:34	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/12/2018 19:34	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/12/2018 19:34	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/12/2018 19:34	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/12/2018 19:34	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 19:34	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/12/2018 19:34	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/12/2018 19:34	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/12/2018 19:34	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/12/2018 19:34	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/12/2018 19:34	WG1095141
Isopropylbenzene	0.00202		0.000326	0.00100	1	04/12/2018 19:34	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/12/2018 19:34	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/12/2018 19:34	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/12/2018 19:34	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/12/2018 19:34	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/12/2018 19:34	WG1095141
Methyl tert-butyl ether	0.000465	J	0.000367	0.00100	1	04/12/2018 19:34	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/12/2018 19:34	WG1095141
n-Propylbenzene	0.000438	J	0.000349	0.00100	1	04/12/2018 19:34	WG1095141
Styrene	U		0.000307	0.00100	1	04/12/2018 19:34	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/12/2018 19:34	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/12/2018 19:34	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/12/2018 19:34	WG1095141
Toluene	U		0.000412	0.00100	1	04/12/2018 19:34	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/12/2018 19:34	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/12/2018 19:34	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/12/2018 19:34	WG1095141
1,2,4-Trimethylbenzene	0.000650	J	0.000373	0.00100	1	04/12/2018 19:34	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/12/2018 19:34	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/12/2018 19:34	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/12/2018 19:34	WG1095141
m&p-Xylene	0.00258		0.000719	0.00200	1	04/12/2018 19:34	WG1095141
Xylenes, Total	0.00258	J	0.00106	0.00300	1	04/12/2018 19:34	WG1095141
(S) Toluene-d8	*103*			*80.0-120*		*04/12/2018 19:34*	WG1095141
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/12/2018 19:34*	WG1095141
(S) 4-Bromofluorobenzene	*87.8*			*80.0-120*		*04/12/2018 19:34*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	7.92		0.0247	0.100	1	04/10/2018 06:18	WG1095392
(S) o-Terphenyl	*119*			*31.0-160*		*04/10/2018 06:18*	WG1095392

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5030		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.249		0.0197	0.100	1	04/11/2018 13:23	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1170		5.19	100	100	04/10/2018 05:22	WG1094924
Fluoride	1.90		0.00990	0.100	1	04/10/2018 05:10	WG1094924
Sulfate	2420		7.74	500	100	04/10/2018 05:22	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0291		0.000250	0.00200	1	04/13/2018 20:08	WG1095149
Arsenic,Dissolved	0.0228		0.000250	0.00200	1	04/13/2018 15:45	WG1095178
Barium	0.0143		0.000360	0.00500	1	04/13/2018 20:08	WG1095149
Barium,Dissolved	0.0125		0.000360	0.00500	1	04/13/2018 15:45	WG1095178
Calcium	606		0.0460	1.00	1	04/13/2018 20:08	WG1095149
Chromium	0.00246		0.000540	0.00200	1	04/15/2018 13:40	WG1098545
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 15:45	WG1095178
Iron	0.472	B	0.0150	0.100	1	04/13/2018 20:08	WG1095149
Iron,Dissolved	0.213		0.0150	0.100	1	04/13/2018 15:45	WG1095178
Lead	0.000534	J	0.000240	0.00200	1	04/13/2018 20:08	WG1095149
Lead,Dissolved	0.000366	J	0.000240	0.00200	1	04/13/2018 15:45	WG1095178
Manganese	0.694		0.000250	0.00500	1	04/13/2018 20:08	WG1095149
Manganese,Dissolved	0.668		0.000250	0.00500	1	04/13/2018 15:45	WG1095178
Potassium	4.99		0.0370	1.00	1	04/13/2018 20:08	WG1095149
Selenium	0.00605		0.000380	0.00200	1	04/13/2018 20:08	WG1095149
Selenium,Dissolved	0.00562		0.000380	0.00200	1	04/13/2018 15:45	WG1095178
Sodium	916		0.550	5.00	5	04/15/2018 15:09	WG1095149

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.245		0.0314	0.100	1	04/10/2018 12:07	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.2*			*77.0-122*		*04/10/2018 12:07*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 17:51	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 17:51	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 17:51	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 17:51	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 17:51	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 17:51	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 17:51	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 17:51	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 17:51	WG1095141

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 17:51	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 17:51	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 17:51	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 17:51	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 17:51	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 17:51	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 17:51	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 17:51	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 17:51	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 17:51	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 17:51	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 17:51	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 17:51	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 17:51	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 17:51	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 17:51	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 17:51	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 17:51	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 17:51	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 17:51	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 17:51	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 17:51	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 17:51	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 17:51	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 17:51	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 17:51	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 17:51	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 17:51	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 17:51	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 17:51	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 17:51	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 17:51	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 17:51	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 17:51	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 17:51	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 17:51	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 17:51	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 17:51	WG1095141
(S) Toluene-d8	*97.3*			*80.0-120*		*04/07/2018 17:51*	WG1095141
(S) Dibromofluoromethane	*110*			*76.0-123*		*04/07/2018 17:51*	WG1095141
(S) 4-Bromofluorobenzene	*91.4*			*80.0-120*		*04/07/2018 17:51*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	5.43		0.0247	0.100	1	04/09/2018 15:08	WG1095393
(S) o-Terphenyl	*114*			*31.0-160*		*04/09/2018 15:08*	WG1095393

MW-1R

Collected date/time: 04/04/18 12:45

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	6900		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0640	J	0.0197	0.100	1	04/11/2018 13:24	WG1096180

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	2200		5.19	100	100	04/10/2018 05:47	WG1094924
Fluoride	0.679		0.00990	0.100	1	04/10/2018 05:35	WG1094924
Sulfate	2740		7.74	500	100	04/10/2018 05:47	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00180	J	0.000250	0.00200	1	04/13/2018 17:51	WG1095149
Arsenic,Dissolved	0.00160	J	0.000250	0.00200	1	04/13/2018 13:44	WG1095178
Barium	0.0224		0.000360	0.00500	1	04/13/2018 17:51	WG1095149
Barium,Dissolved	0.0232		0.000360	0.00500	1	04/13/2018 13:44	WG1095178
Calcium	623	V	0.0460	1.00	1	04/13/2018 17:51	WG1095149
Chromium	U		0.000540	0.00200	1	04/15/2018 13:45	WG1098545
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 13:44	WG1095178
Iron	3.42		0.0150	0.100	1	04/13/2018 17:51	WG1095149
Iron,Dissolved	3.40		0.0150	0.100	1	04/13/2018 13:44	WG1095178
Lead	0.000344	J	0.000240	0.00200	1	04/13/2018 17:51	WG1095149
Lead,Dissolved	0.000491	J	0.000240	0.00200	1	04/13/2018 13:44	WG1095178
Manganese	1.71		0.000250	0.00500	1	04/13/2018 17:51	WG1095149
Manganese,Dissolved	1.72	V	0.000250	0.00500	1	04/13/2018 13:44	WG1095178
Potassium	4.56		0.0370	1.00	1	04/13/2018 17:51	WG1095149
Selenium	0.000380	J	0.000380	0.00200	1	04/13/2018 17:51	WG1095149
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 13:44	WG1095178
Sodium	1520	V	0.550	5.00	5	04/15/2018 08:52	WG1095149

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 18:12	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 18:12	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 18:12	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 18:12	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 18:12	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 18:12	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 18:12	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 18:12	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 18:12	WG1095141
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 18:12	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 18:12	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 18:12	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 18:12	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 18:12	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 18:12	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 18:12	WG1095141

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 18:12	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 18:12	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 18:12	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 18:12	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 18:12	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 18:12	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 18:12	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 18:12	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 18:12	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 18:12	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 18:12	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 18:12	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 18:12	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 18:12	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 18:12	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 18:12	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 18:12	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 18:12	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 18:12	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 18:12	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 18:12	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 18:12	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 18:12	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 18:12	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 18:12	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 18:12	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 18:12	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 18:12	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 18:12	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 18:12	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 18:12	WG1095141
(S) Toluene-d8	*96.7*			*80.0-120*		*04/07/2018 18:12*	WG1095141
(S) Dibromofluoromethane	*118*			*76.0-123*		*04/07/2018 18:12*	WG1095141
(S) 4-Bromofluorobenzene	*91.5*			*80.0-120*		*04/07/2018 18:12*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0624	J	0.0247	0.100	1	04/09/2018 15:28	WG1095393
(S) o-Terphenyl	*105*			*31.0-160*		*04/09/2018 15:28*	WG1095393

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3580		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.758		0.0197	0.100	1	04/11/2018 13:39	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1040		5.19	100	100	04/10/2018 06:25	WG1094924
Fluoride	1.70	J5	0.00990	0.100	1	04/10/2018 06:00	WG1094924
Sulfate	1720		7.74	500	100	04/10/2018 06:25	WG1094924

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0165		0.000250	0.00200	1	04/10/2018 17:34	WG1095151
Arsenic,Dissolved	0.0171		0.000250	0.00200	1	04/12/2018 16:49	WG1095180
Barium	0.0225		0.000360	0.00500	1	04/10/2018 17:34	WG1095151
Barium,Dissolved	0.0210		0.000360	0.00500	1	04/12/2018 16:49	WG1095180
Calcium	477		0.0460	1.00	1	04/10/2018 17:34	WG1095151
Chromium	0.00926		0.000540	0.00200	1	04/10/2018 17:34	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 16:49	WG1095180
Iron	0.0730	J	0.0150	0.100	1	04/10/2018 17:34	WG1095151
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 16:49	WG1095180
Lead	0.000357	B J	0.000240	0.00200	1	04/11/2018 12:42	WG1095151
Lead,Dissolved	0.000498	J	0.000240	0.00200	1	04/12/2018 16:49	WG1095180
Manganese	0.394		0.000250	0.00500	1	04/10/2018 17:34	WG1095151
Manganese,Dissolved	0.388		0.000250	0.00500	1	04/12/2018 16:49	WG1095180
Potassium	5.35		0.0370	1.00	1	04/10/2018 17:34	WG1095151
Selenium	0.00128	J	0.000380	0.00200	1	04/10/2018 17:34	WG1095151
Selenium,Dissolved	0.00122	J	0.000380	0.00200	1	04/12/2018 16:49	WG1095180
Sodium	657		0.110	1.00	1	04/10/2018 17:34	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.328		0.0314	0.100	1	04/10/2018 12:29	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.3*			*77.0-122*		*04/10/2018 12:29*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 18:34	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 18:34	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 18:34	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 18:34	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 18:34	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 18:34	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 18:34	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 18:34	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 18:34	WG1095141

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 18:34	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 18:34	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 18:34	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 18:34	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 18:34	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 18:34	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 18:34	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 18:34	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 18:34	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 18:34	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 18:34	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 18:34	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 18:34	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 18:34	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 18:34	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 18:34	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 18:34	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 18:34	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 18:34	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 18:34	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 18:34	WG1095141
Methyl tert-butyl ether	0.000836	J	0.000367	0.00100	1	04/07/2018 18:34	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 18:34	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 18:34	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 18:34	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 18:34	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 18:34	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 18:34	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 18:34	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 18:34	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 18:34	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 18:34	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 18:34	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 18:34	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 18:34	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 18:34	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 18:34	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 18:34	WG1095141
(S) Toluene-d8	*95.8*			*80.0-120*		*04/07/2018 18:34*	WG1095141
(S) Dibromofluoromethane	*114*			*76.0-123*		*04/07/2018 18:34*	WG1095141
(S) 4-Bromofluorobenzene	*93.8*			*80.0-120*		*04/07/2018 18:34*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.479		0.0247	0.100	1	04/09/2018 17:09	WG1095393
(S) o-Terphenyl	*109*			*31.0-160*		*04/09/2018 17:09*	WG1095393

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	6760		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.599		0.0197	0.100	1	04/11/2018 13:41	WG1096182

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1870		5.19	100	100	04/07/2018 19:47	WG1094925
Fluoride	3.48		0.00990	0.100	1	04/07/2018 19:31	WG1094925
Sulfate	3100		7.74	500	100	04/07/2018 19:47	WG1094925

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00396		0.000250	0.00200	1	04/10/2018 17:38	WG1095151
Arsenic,Dissolved	0.00359		0.000250	0.00200	1	04/12/2018 16:53	WG1095180
Barium	0.0155		0.000360	0.00500	1	04/10/2018 17:38	WG1095151
Barium,Dissolved	0.0154		0.000360	0.00500	1	04/12/2018 16:53	WG1095180
Calcium	493		0.0460	1.00	1	04/10/2018 17:38	WG1095151
Chromium	0.00148	J	0.000540	0.00200	1	04/10/2018 17:38	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 16:53	WG1095180
Iron	0.246		0.0150	0.100	1	04/10/2018 17:38	WG1095151
Iron,Dissolved	0.0172	B J	0.0150	0.100	1	04/12/2018 16:53	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 12:46	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 16:53	WG1095180
Manganese	0.306		0.000250	0.00500	1	04/10/2018 17:38	WG1095151
Manganese,Dissolved	0.288		0.000250	0.00500	1	04/12/2018 16:53	WG1095180
Potassium	3.79		0.0370	1.00	1	04/10/2018 17:38	WG1095151
Selenium	0.00143	J	0.000380	0.00200	1	04/10/2018 17:38	WG1095151
Selenium,Dissolved	0.00152	J	0.000380	0.00200	1	04/12/2018 16:53	WG1095180
Sodium	1740		0.550	5.00	5	04/10/2018 18:06	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 12:51	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.4*			*77.0-122*		*04/10/2018 12:51*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 18:55	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 18:55	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 18:55	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 18:55	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 18:55	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 18:55	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 18:55	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 18:55	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 18:55	WG1095141

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 18:55	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 18:55	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 18:55	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 18:55	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 18:55	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 18:55	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 18:55	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 18:55	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 18:55	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 18:55	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 18:55	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 18:55	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 18:55	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 18:55	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 18:55	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 18:55	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 18:55	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 18:55	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 18:55	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 18:55	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 18:55	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 18:55	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 18:55	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 18:55	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 18:55	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 18:55	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 18:55	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 18:55	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 18:55	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 18:55	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 18:55	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 18:55	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 18:55	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 18:55	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 18:55	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 18:55	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 18:55	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 18:55	WG1095141
(S) Toluene-d8	*96.6*			*80.0-120*		*04/07/2018 18:55*	WG1095141
(S) Dibromofluoromethane	*110*			*76.0-123*		*04/07/2018 18:55*	WG1095141
(S) 4-Bromofluorobenzene	*92.2*			*80.0-120*		*04/07/2018 18:55*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.187		0.0247	0.100	1	04/09/2018 17:29	WG1095393
(S) o-Terphenyl	*105*			*31.0-160*		*04/09/2018 17:29*	WG1095393

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4530		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.187		0.0197	0.100	1	04/11/2018 13:43	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1160		5.19	100	100	04/07/2018 20:49	WG1094925
Fluoride	0.813		0.00990	0.100	1	04/07/2018 20:02	WG1094925
Sulfate	1990		7.74	500	100	04/07/2018 20:49	WG1094925

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0112		0.000250	0.00200	1	04/10/2018 17:42	WG1095151
Arsenic,Dissolved	0.00192	J	0.000250	0.00200	1	04/12/2018 16:57	WG1095180
Barium	0.0201		0.000360	0.00500	1	04/10/2018 17:42	WG1095151
Barium,Dissolved	0.0167		0.000360	0.00500	1	04/12/2018 16:57	WG1095180
Calcium	530		0.0460	1.00	1	04/10/2018 17:42	WG1095151
Chromium	U		0.000540	0.00200	1	04/10/2018 17:42	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 16:57	WG1095180
Iron	8.58		0.0150	0.100	1	04/10/2018 17:42	WG1095151
Iron,Dissolved	1.93		0.0150	0.100	1	04/12/2018 16:57	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 12:50	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 16:57	WG1095180
Manganese	1.02		0.000250	0.00500	1	04/10/2018 17:42	WG1095151
Manganese,Dissolved	0.651		0.000250	0.00500	1	04/12/2018 16:57	WG1095180
Potassium	4.88		0.0370	1.00	1	04/10/2018 17:42	WG1095151
Selenium	0.000730	J	0.000380	0.00200	1	04/10/2018 17:42	WG1095151
Selenium,Dissolved	0.000595	J	0.000380	0.00200	1	04/12/2018 16:57	WG1095180
Sodium	825		0.110	1.00	1	04/10/2018 17:42	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 14:30	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.7*			*77.0-122*		*04/10/2018 14:30*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 19:17	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 19:17	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 19:17	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 19:17	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 19:17	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 19:17	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 19:17	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 19:17	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 19:17	WG1095141

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 19:17	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 19:17	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 19:17	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 19:17	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 19:17	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 19:17	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 19:17	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 19:17	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 19:17	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 19:17	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 19:17	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 19:17	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 19:17	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 19:17	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 19:17	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 19:17	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 19:17	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 19:17	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 19:17	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 19:17	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 19:17	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 19:17	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 19:17	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 19:17	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 19:17	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 19:17	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 19:17	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 19:17	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 19:17	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 19:17	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 19:17	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 19:17	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 19:17	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 19:17	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 19:17	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 19:17	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 19:17	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 19:17	WG1095141
(S) Toluene-d8	*96.8*			*80.0-120*		*04/07/2018 19:17*	WG1095141
(S) Dibromofluoromethane	*110*			*76.0-123*		*04/07/2018 19:17*	WG1095141
(S) 4-Bromofluorobenzene	*92.3*			*80.0-120*		*04/07/2018 19:17*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0703	J	0.0247	0.100	1	04/09/2018 17:49	WG1095393
(S) o-Terphenyl	*96.6*			*31.0-160*		*04/09/2018 17:49*	WG1095393

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	6220		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.194		0.0197	0.100	1	04/11/2018 13:44	WG1096182

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	2110		5.19	100	100	04/07/2018 21:19	WG1094925
Fluoride	0.845		0.00990	0.100	1	04/07/2018 21:04	WG1094925
Sulfate	2750		7.74	500	100	04/07/2018 21:19	WG1094925

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00258		0.000250	0.00200	1	04/10/2018 17:46	WG1095151
Arsenic,Dissolved	0.000894	J	0.000250	0.00200	1	04/12/2018 17:01	WG1095180
Barium	0.0219		0.000360	0.00500	1	04/10/2018 17:46	WG1095151
Barium,Dissolved	0.0236		0.000360	0.00500	1	04/12/2018 17:01	WG1095180
Calcium	842		0.0460	1.00	1	04/10/2018 17:46	WG1095151
Chromium	U		0.000540	0.00200	1	04/10/2018 17:46	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 17:01	WG1095180
Iron	1.82		0.0150	0.100	1	04/10/2018 17:46	WG1095151
Iron,Dissolved	0.823		0.0150	0.100	1	04/12/2018 17:01	WG1095180
Lead	0.000364	B J	0.000240	0.00200	1	04/11/2018 12:54	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:01	WG1095180
Manganese	0.412		0.000250	0.00500	1	04/10/2018 17:46	WG1095151
Manganese,Dissolved	0.392		0.000250	0.00500	1	04/12/2018 17:01	WG1095180
Potassium	14.7		0.0370	1.00	1	04/10/2018 17:46	WG1095151
Selenium	U		0.000380	0.00200	1	04/10/2018 17:46	WG1095151
Selenium,Dissolved	0.000544	J	0.000380	0.00200	1	04/12/2018 17:01	WG1095180
Sodium	1070		0.550	5.00	5	04/10/2018 18:10	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 14:52	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.4*			*77.0-122*		*04/10/2018 14:52*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 19:38	WG1095141
Benzene	U		0.000331	0.00100	1	04/07/2018 19:38	WG1095141
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 19:38	WG1095141
Bromoform	U		0.000469	0.00100	1	04/07/2018 19:38	WG1095141
Bromomethane	U		0.000866	0.00500	1	04/07/2018 19:38	WG1095141
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 19:38	WG1095141
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 19:38	WG1095141
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 19:38	WG1095141
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 19:38	WG1095141

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 19:38	WG1095141
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 19:38	WG1095141
Chloroethane	U		0.000453	0.00500	1	04/07/2018 19:38	WG1095141
Chloroform	U		0.000324	0.00500	1	04/07/2018 19:38	WG1095141
Chloromethane	U		0.000276	0.00250	1	04/07/2018 19:38	WG1095141
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 19:38	WG1095141
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 19:38	WG1095141
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 19:38	WG1095141
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 19:38	WG1095141
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 19:38	WG1095141
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 19:38	WG1095141
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 19:38	WG1095141
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 19:38	WG1095141
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 19:38	WG1095141
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 19:38	WG1095141
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 19:38	WG1095141
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 19:38	WG1095141
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 19:38	WG1095141
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 19:38	WG1095141
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 19:38	WG1095141
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 19:38	WG1095141
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 19:38	WG1095141
Naphthalene	U		0.00100	0.00500	1	04/07/2018 19:38	WG1095141
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 19:38	WG1095141
Styrene	U		0.000307	0.00100	1	04/07/2018 19:38	WG1095141
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 19:38	WG1095141
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 19:38	WG1095141
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 19:38	WG1095141
Toluene	U		0.000412	0.00100	1	04/07/2018 19:38	WG1095141
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 19:38	WG1095141
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 19:38	WG1095141
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 19:38	WG1095141
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 19:38	WG1095141
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 19:38	WG1095141
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 19:38	WG1095141
o-Xylene	U		0.000341	0.00100	1	04/07/2018 19:38	WG1095141
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 19:38	WG1095141
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 19:38	WG1095141
(S) Toluene-d8	*96.5*			*80.0-120*		*04/07/2018 19:38*	WG1095141
(S) Dibromofluoromethane	*110*			*76.0-123*		*04/07/2018 19:38*	WG1095141
(S) 4-Bromofluorobenzene	*91.4*			*80.0-120*		*04/07/2018 19:38*	WG1095141

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0510	J	0.0247	0.100	1	04/09/2018 18:10	WG1095393
(S) o-Terphenyl	*101*			*31.0-160*		*04/09/2018 18:10*	WG1095393

OCD-4
Collected date/time: 04/04/18 16:35

SAMPLE RESULTS - 25

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	9500		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.101		0.0197	0.100	1	04/11/2018 13:45	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	4550		5.19	100	100	04/07/2018 21:50	WG1094925
Fluoride	0.759		0.00990	0.100	1	04/07/2018 21:35	WG1094925
Sulfate	3430		7.74	500	100	04/07/2018 21:50	WG1094925

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00167	J	0.000250	0.00200	1	04/10/2018 17:50	WG1095151
Arsenic,Dissolved	0.00102	J	0.000250	0.00200	1	04/12/2018 17:05	WG1095180
Barium	0.0223		0.000360	0.00500	1	04/10/2018 17:50	WG1095151
Barium,Dissolved	0.0231		0.000360	0.00500	1	04/12/2018 17:05	WG1095180
Calcium	847		0.0460	1.00	1	04/10/2018 17:50	WG1095151
Chromium	0.00361		0.000540	0.00200	1	04/10/2018 17:50	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 17:05	WG1095180
Iron	1.15		0.0150	0.100	1	04/10/2018 17:50	WG1095151
Iron,Dissolved	0.519		0.0150	0.100	1	04/12/2018 17:05	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 12:58	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:05	WG1095180
Manganese	0.0438		0.000250	0.00500	1	04/10/2018 17:50	WG1095151
Manganese,Dissolved	0.0541		0.000250	0.00500	1	04/12/2018 17:05	WG1095180
Potassium	34.0		0.0370	1.00	1	04/10/2018 17:50	WG1095151
Selenium	0.000780	J	0.000380	0.00200	1	04/10/2018 17:50	WG1095151
Selenium,Dissolved	0.000539	J	0.000380	0.00200	1	04/12/2018 17:05	WG1095180
Sodium	2540		0.550	5.00	5	04/10/2018 19:00	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 15:14	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.4*			*77.0-122*		*04/10/2018 15:14*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 13:38	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 13:38	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 13:38	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 13:38	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 13:38	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 13:38	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 13:38	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 13:38	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 13:38	WG1095144

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 13:38	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 13:38	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 13:38	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 13:38	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 13:38	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 13:38	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 13:38	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 13:38	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 13:38	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 13:38	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 13:38	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 13:38	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 13:38	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 13:38	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 13:38	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 13:38	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 13:38	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 13:38	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 13:38	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 13:38	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 13:38	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 13:38	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 13:38	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 13:38	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 13:38	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 13:38	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 13:38	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 13:38	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 13:38	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 13:38	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 13:38	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 13:38	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 13:38	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 13:38	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 13:38	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 13:38	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 13:38	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 13:38	WG1095144
(S) Toluene-d8	*102*			*80.0-120*		*04/07/2018 13:38*	WG1095144
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/07/2018 13:38*	WG1095144
(S) 4-Bromofluorobenzene	*93.1*			*80.0-120*		*04/07/2018 13:38*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0255	J	0.0247	0.100	1	04/09/2018 18:30	WG1095393
(S) o-Terphenyl	*94.7*			*31.0-160*		*04/09/2018 18:30*	WG1095393

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	14900		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.562		0.0197	0.100	1	04/11/2018 13:50	WG1096182

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	9560		10.4	200	200	04/09/2018 22:00	WG1095384
Fluoride	0.601		0.00990	0.100	1	04/07/2018 22:06	WG1094925
Sulfate	3570		7.74	500	100	04/07/2018 22:21	WG1094925

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.000457	J	0.000250	0.00200	1	04/10/2018 17:54	WG1095151
Arsenic,Dissolved	0.000357	J	0.000250	0.00200	1	04/12/2018 17:08	WG1095180
Barium	0.0321		0.000360	0.00500	1	04/10/2018 17:54	WG1095151
Barium,Dissolved	0.0309		0.000360	0.00500	1	04/12/2018 17:08	WG1095180
Calcium	1250		0.460	10.0	10	04/10/2018 19:04	WG1095151
Chromium	0.00104	J	0.000540	0.00200	1	04/10/2018 17:54	WG1095151
Chromium,Dissolved	0.00200	B J	0.000540	0.00200	1	04/12/2018 17:08	WG1095180
Iron	1.02		0.0150	0.100	1	04/10/2018 17:54	WG1095151
Iron,Dissolved	0.536		0.0150	0.100	1	04/12/2018 17:08	WG1095180
Lead	0.00146	B J	0.000240	0.00200	1	04/11/2018 13:02	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:08	WG1095180
Manganese	0.294		0.000250	0.00500	1	04/10/2018 17:54	WG1095151
Manganese,Dissolved	0.306		0.000250	0.00500	1	04/12/2018 17:08	WG1095180
Potassium	20.1		0.0370	1.00	1	04/10/2018 17:54	WG1095151
Selenium	U		0.000380	0.00200	1	04/10/2018 17:54	WG1095151
Selenium,Dissolved	0.000600	J	0.000380	0.00200	1	04/12/2018 17:08	WG1095180
Sodium	5210		1.10	10.0	10	04/10/2018 19:04	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 15:36	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.4*			*77.0-122*		*04/10/2018 15:36*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 13:57	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 13:57	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 13:57	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 13:57	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 13:57	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 13:57	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 13:57	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 13:57	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 13:57	WG1095144

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 13:57	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 13:57	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 13:57	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 13:57	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 13:57	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 13:57	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 13:57	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 13:57	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 13:57	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 13:57	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 13:57	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 13:57	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 13:57	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 13:57	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 13:57	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 13:57	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 13:57	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 13:57	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 13:57	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 13:57	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 13:57	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 13:57	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 13:57	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 13:57	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 13:57	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 13:57	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 13:57	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 13:57	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 13:57	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 13:57	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 13:57	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 13:57	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 13:57	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 13:57	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 13:57	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 13:57	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 13:57	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 13:57	WG1095144
(S) Toluene-d8	*101*			*80.0-120*		*04/07/2018 13:57*	WG1095144
(S) Dibromofluoromethane	*104*			*76.0-123*		*04/07/2018 13:57*	WG1095144
(S) 4-Bromofluorobenzene	*93.3*			*80.0-120*		*04/07/2018 13:57*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/09/2018 18:50	WG1095393
(S) o-Terphenyl	*89.5*			*31.0-160*		*04/09/2018 18:50*	WG1095393

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	11300		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0860	J	0.0197	0.100	1	04/11/2018 13:51	WG1096182

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	5050		5.19	100	100	04/07/2018 22:52	WG1094925
Fluoride	0.765		0.00990	0.100	1	04/07/2018 22:36	WG1094925
Sulfate	3440		7.74	500	100	04/07/2018 22:52	WG1094925

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00513		0.000250	0.00200	1	04/10/2018 17:58	WG1095151
Arsenic,Dissolved	0.00319		0.000250	0.00200	1	04/12/2018 17:12	WG1095180
Barium	0.0257		0.000360	0.00500	1	04/10/2018 17:58	WG1095151
Barium,Dissolved	0.0233		0.000360	0.00500	1	04/12/2018 17:12	WG1095180
Calcium	882		0.0460	1.00	1	04/10/2018 17:58	WG1095151
Chromium	U		0.000540	0.00200	1	04/10/2018 17:58	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 17:12	WG1095180
Iron	4.65		0.0150	0.100	1	04/10/2018 17:58	WG1095151
Iron,Dissolved	0.830		0.0150	0.100	1	04/12/2018 17:12	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 13:06	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:12	WG1095180
Manganese	0.182		0.000250	0.00500	1	04/10/2018 17:58	WG1095151
Manganese,Dissolved	0.176		0.000250	0.00500	1	04/12/2018 17:12	WG1095180
Potassium	40.7		0.0370	1.00	1	04/10/2018 17:58	WG1095151
Selenium	U		0.000380	0.00200	1	04/10/2018 17:58	WG1095151
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 17:12	WG1095180
Sodium	2990		0.550	5.00	5	04/10/2018 19:24	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.194		0.0314	0.100	1	04/10/2018 15:58	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.4*			*77.0-122*		*04/10/2018 15:58*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 14:16	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 14:16	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 14:16	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 14:16	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 14:16	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 14:16	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 14:16	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 14:16	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 14:16	WG1095144

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 14:16	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 14:16	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 14:16	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 14:16	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 14:16	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 14:16	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 14:16	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 14:16	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 14:16	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 14:16	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 14:16	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 14:16	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 14:16	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 14:16	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 14:16	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 14:16	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 14:16	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 14:16	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 14:16	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 14:16	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 14:16	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 14:16	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 14:16	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 14:16	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 14:16	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 14:16	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 14:16	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 14:16	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 14:16	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 14:16	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 14:16	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 14:16	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 14:16	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 14:16	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 14:16	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 14:16	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 14:16	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 14:16	WG1095144
(S) Toluene-d8	*102*			*80.0-120*		*04/07/2018 14:16*	WG1095144
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/07/2018 14:16*	WG1095144
(S) 4-Bromofluorobenzene	*91.4*			*80.0-120*		*04/07/2018 14:16*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.249		0.0247	0.100	1	04/09/2018 19:10	WG1095393
(S) o-Terphenyl	*105*			*31.0-160*		*04/09/2018 19:10*	WG1095393

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	11600		2.82	10.0	1	04/10/2018 23:42	WG1096151

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0610	J	0.0197	0.100	1	04/11/2018 13:52	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	4150		5.19	100	100	04/07/2018 23:54	WG1094925
Fluoride	1.48		0.00990	0.100	1	04/07/2018 23:07	WG1094925
Sulfate	4570		7.74	500	100	04/07/2018 23:54	WG1094925

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00609		0.000250	0.00200	1	04/10/2018 18:02	WG1095151
Arsenic,Dissolved	0.00587		0.000250	0.00200	1	04/12/2018 17:30	WG1095180
Barium	0.0145		0.000360	0.00500	1	04/10/2018 18:02	WG1095151
Barium,Dissolved	0.0158		0.000360	0.00500	1	04/12/2018 17:30	WG1095180
Calcium	677		0.0460	1.00	1	04/10/2018 18:02	WG1095151
Chromium	U		0.000540	0.00200	1	04/10/2018 18:02	WG1095151
Chromium,Dissolved	0.000970	B J	0.000540	0.00200	1	04/12/2018 17:30	WG1095180
Iron	0.924		0.0150	0.100	1	04/10/2018 18:02	WG1095151
Iron,Dissolved	0.986		0.0150	0.100	1	04/12/2018 17:30	WG1095180
Lead	0.000262	B J	0.000240	0.00200	1	04/11/2018 13:10	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:30	WG1095180
Manganese	0.686		0.000250	0.00500	1	04/10/2018 18:02	WG1095151
Manganese,Dissolved	0.689		0.000250	0.00500	1	04/12/2018 17:30	WG1095180
Potassium	24.2		0.0370	1.00	1	04/10/2018 18:02	WG1095151
Selenium	0.000502	J	0.000380	0.00200	1	04/10/2018 18:02	WG1095151
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 17:30	WG1095180
Sodium	2930		0.550	5.00	5	04/10/2018 19:29	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 16:20	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.5*			*77.0-122*		*04/10/2018 16:20*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 14:35	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 14:35	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 14:35	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 14:35	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 14:35	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 14:35	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 14:35	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 14:35	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 14:35	WG1095144

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 14:35	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 14:35	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 14:35	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 14:35	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 14:35	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 14:35	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 14:35	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 14:35	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 14:35	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 14:35	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 14:35	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 14:35	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 14:35	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 14:35	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 14:35	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 14:35	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 14:35	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 14:35	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 14:35	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 14:35	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 14:35	WG1095144
Methyl tert-butyl ether	0.000710	J	0.000367	0.00100	1	04/07/2018 14:35	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 14:35	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 14:35	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 14:35	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 14:35	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 14:35	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 14:35	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 14:35	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 14:35	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 14:35	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 14:35	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 14:35	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 14:35	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 14:35	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 14:35	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 14:35	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 14:35	WG1095144
(S) Toluene-d8	*103*			*80.0-120*		*04/07/2018 14:35*	WG1095144
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/07/2018 14:35*	WG1095144
(S) 4-Bromofluorobenzene	*93.2*			*80.0-120*		*04/07/2018 14:35*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.288		0.0247	0.100	1	04/09/2018 19:31	WG1095393
(S) o-Terphenyl	*110*			*31.0-160*		*04/09/2018 19:31*	WG1095393

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	13100		2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0720	J	0.0197	0.100	1	04/11/2018 13:53	WG1096182

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 17:16	WG1094975

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	6680		5.19	100	100	04/08/2018 00:24	WG1094925
Fluoride	2.44		0.00990	0.100	1	04/08/2018 00:09	WG1094925
Sulfate	6780		7.74	500	100	04/08/2018 00:24	WG1094925

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/09/2018 14:42	WG1095322
Mercury,Dissolved	U		0.0000490	0.000200	1	04/10/2018 11:05	WG1095325

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	2.31		0.0126	0.200	1	04/10/2018 01:03	WG1095146
Boron,Dissolved	2.23		0.0126	0.200	1	04/10/2018 14:53	WG1095189

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00489		0.000250	0.00200	1	04/10/2018 18:27	WG1095151
Arsenic,Dissolved	0.00509		0.000250	0.00200	1	04/12/2018 17:34	WG1095180
Barium	0.0173		0.000360	0.00500	1	04/10/2018 18:27	WG1095151
Barium,Dissolved	0.0165		0.000360	0.00500	1	04/12/2018 17:34	WG1095180
Cadmium	U		0.000160	0.00100	1	04/10/2018 18:27	WG1095151
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 17:34	WG1095180
Calcium	683		0.0460	1.00	1	04/10/2018 18:27	WG1095151
Chromium	0.00488		0.000540	0.00200	1	04/10/2018 18:27	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 17:34	WG1095180
Cobalt	0.00108	J	0.000260	0.00200	1	04/10/2018 18:27	WG1095151
Cobalt,Dissolved	0.00107	J	0.000260	0.00200	1	04/12/2018 17:34	WG1095180
Iron	0.148		0.0150	0.100	1	04/10/2018 18:27	WG1095151
Iron,Dissolved	0.0239	B J	0.0150	0.100	1	04/12/2018 17:34	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 13:14	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:34	WG1095180
Manganese	0.533		0.000250	0.00500	1	04/10/2018 18:27	WG1095151
Manganese,Dissolved	0.527		0.000250	0.00500	1	04/12/2018 17:34	WG1095180
Nickel	0.00947		0.000350	0.00200	1	04/10/2018 18:27	WG1095151
Nickel,Dissolved	0.00883		0.000350	0.00200	1	04/12/2018 17:34	WG1095180

MW-18A

Collected date/time: 04/04/18 09:25

SAMPLE RESULTS - 29

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	42.1		0.0370	1.00	1	04/10/2018 18:27	WG1095151
Selenium	0.00120	J	0.000380	0.00200	1	04/10/2018 18:27	WG1095151
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 17:34	WG1095180
Sodium	4260		1.10	10.0	10	04/10/2018 19:33	WG1095151
Uranium	0.0314		0.000330	0.0100	1	04/11/2018 13:14	WG1095151
Uranium,Dissolved	0.0362		0.000330	0.0100	1	04/12/2018 17:34	WG1095180
Vanadium	0.000459	J	0.000180	0.00500	1	04/10/2018 18:27	WG1095151
Vanadium,Dissolved	0.000373	J	0.000180	0.00500	1	04/12/2018 17:34	WG1095180

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 14:54	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 14:54	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 14:54	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 14:54	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 14:54	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 14:54	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 14:54	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 14:54	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 14:54	WG1095144
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 14:54	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 14:54	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 14:54	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 14:54	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 14:54	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 14:54	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 14:54	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 14:54	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 14:54	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 14:54	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 14:54	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 14:54	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 14:54	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 14:54	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 14:54	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 14:54	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 14:54	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 14:54	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 14:54	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 14:54	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 14:54	WG1095144
Methyl tert-butyl ether	0.000589	J	0.000367	0.00100	1	04/07/2018 14:54	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 14:54	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 14:54	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 14:54	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 14:54	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 14:54	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 14:54	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 14:54	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 14:54	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 14:54	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 14:54	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 14:54	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 14:54	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 14:54	WG1095144

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
o-Xylene	U		0.000341	0.00100	1	04/07/2018 14:54	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 14:54	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 14:54	WG1095144
(S) Toluene-d8	*98.9*			*80.0-120*		*04/07/2018 14:54*	WG1095144
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/07/2018 14:54*	WG1095144
(S) 4-Bromofluorobenzene	*93.0*			*80.0-120*		*04/07/2018 14:54*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.349		0.0247	0.100	1	04/09/2018 19:51	WG1095393
(S) o-Terphenyl	*106*			*31.0-160*		*04/09/2018 19:51*	WG1095393

MW-70
Collected date/time: 04/04/18 10:10

SAMPLE RESULTS - 30

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5810		2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0660	J	0.0197	0.100	1	04/11/2018 13:54	WG1096182

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1490		5.19	100	100	04/08/2018 00:55	WG1094925
Fluoride	0.694		0.00990	0.100	1	04/08/2018 00:40	WG1094925
Sulfate	2720		7.74	500	100	04/08/2018 00:55	WG1094925

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0508		0.000250	0.00200	1	04/10/2018 18:31	WG1095151
Arsenic,Dissolved	0.0179		0.000250	0.00200	1	04/12/2018 17:38	WG1095180
Barium	0.0212		0.000360	0.00500	1	04/10/2018 18:31	WG1095151
Barium,Dissolved	0.0165		0.000360	0.00500	1	04/12/2018 17:38	WG1095180
Calcium	766		0.0460	1.00	1	04/10/2018 18:31	WG1095151
Chromium	U		0.000540	0.00200	1	04/10/2018 18:31	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 17:38	WG1095180
Iron	46.3		0.0150	0.100	1	04/10/2018 18:31	WG1095151
Iron,Dissolved	0.780		0.0150	0.100	1	04/12/2018 17:38	WG1095180
Lead	0.000270	B J	0.000240	0.00200	1	04/11/2018 13:27	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:38	WG1095180
Manganese	0.425		0.000250	0.00500	1	04/10/2018 18:31	WG1095151
Manganese,Dissolved	0.420		0.000250	0.00500	1	04/12/2018 17:38	WG1095180
Potassium	5.51		0.0370	1.00	1	04/10/2018 18:31	WG1095151
Selenium	0.000479	J	0.000380	0.00200	1	04/10/2018 18:31	WG1095151
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 17:38	WG1095180
Sodium	825		0.110	1.00	1	04/10/2018 18:31	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	1.97		0.0314	0.100	1	04/10/2018 16:42	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.9*			*77.0-122*		*04/10/2018 16:42*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 15:13	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 15:13	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 15:13	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 15:13	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 15:13	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 15:13	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 15:13	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 15:13	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 15:13	WG1095144

MW-70

Collected date/time: 04/04/18 10:10

SAMPLE RESULTS - 30

L983825

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 15:13	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 15:13	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 15:13	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 15:13	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 15:13	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 15:13	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 15:13	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 15:13	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 15:13	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 15:13	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 15:13	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 15:13	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 15:13	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 15:13	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 15:13	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 15:13	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 15:13	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 15:13	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 15:13	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 15:13	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 15:13	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 15:13	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 15:13	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 15:13	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 15:13	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 15:13	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 15:13	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 15:13	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 15:13	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 15:13	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 15:13	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 15:13	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 15:13	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 15:13	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 15:13	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 15:13	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 15:13	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 15:13	WG1095144
(S) Toluene-d8	*102*			*80.0-120*		*04/07/2018 15:13*	WG1095144
(S) Dibromofluoromethane	*104*			*76.0-123*		*04/07/2018 15:13*	WG1095144
(S) 4-Bromofluorobenzene	*89.0*			*80.0-120*		*04/07/2018 15:13*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.749		0.0247	0.100	1	04/09/2018 20:11	WG1095393
(S) o-Terphenyl	*106*			*31.0-160*		*04/09/2018 20:11*	WG1095393

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	8980		2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/11/2018 13:55	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	3110		5.19	100	100	04/24/2018 13:51	WG1102213
Fluoride	1.02		0.00990	0.100	1	04/08/2018 01:11	WG1094925
Sulfate	3700		7.74	500	100	04/24/2018 13:51	WG1102213

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00179	J	0.000250	0.00200	1	04/10/2018 18:35	WG1095151
Arsenic,Dissolved	0.00155	J	0.000250	0.00200	1	04/12/2018 17:42	WG1095180
Barium	0.0203		0.000360	0.00500	1	04/10/2018 18:35	WG1095151
Barium,Dissolved	0.0185		0.000360	0.00500	1	04/12/2018 17:42	WG1095180
Calcium	786		0.0460	1.00	1	04/10/2018 18:35	WG1095151
Chromium	U		0.000540	0.00200	1	04/10/2018 18:35	WG1095151
Chromium,Dissolved	0.000834	B J	0.000540	0.00200	1	04/12/2018 17:42	WG1095180
Iron	3.58		0.0150	0.100	1	04/10/2018 18:35	WG1095151
Iron,Dissolved	3.49		0.0150	0.100	1	04/12/2018 17:42	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 13:31	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:42	WG1095180
Manganese	0.506		0.000250	0.00500	1	04/10/2018 18:35	WG1095151
Manganese,Dissolved	0.530		0.000250	0.00500	1	04/12/2018 17:42	WG1095180
Potassium	6.67		0.0370	1.00	1	04/10/2018 18:35	WG1095151
Selenium	U		0.000380	0.00200	1	04/10/2018 18:35	WG1095151
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 17:42	WG1095180
Sodium	1820		0.550	5.00	5	04/10/2018 19:36	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 17:04	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.9*			*77.0-122*		*04/10/2018 17:04*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 15:32	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 15:32	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 15:32	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 15:32	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 15:32	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 15:32	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 15:32	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 15:32	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 15:32	WG1095144

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 15:32	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 15:32	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 15:32	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 15:32	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 15:32	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 15:32	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 15:32	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 15:32	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 15:32	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 15:32	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 15:32	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 15:32	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 15:32	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 15:32	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 15:32	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 15:32	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 15:32	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 15:32	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 15:32	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 15:32	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 15:32	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 15:32	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 15:32	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 15:32	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 15:32	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 15:32	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 15:32	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 15:32	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 15:32	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 15:32	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 15:32	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 15:32	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 15:32	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 15:32	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 15:32	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 15:32	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 15:32	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 15:32	WG1095144
(S) Toluene-d8	*102*			*80.0-120*		*04/07/2018 15:32*	WG1095144
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/07/2018 15:32*	WG1095144
(S) 4-Bromofluorobenzene	*94.9*			*80.0-120*		*04/07/2018 15:32*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0328	J	0.0247	0.100	1	04/09/2018 20:31	WG1095393
(S) o-Terphenyl	*97.0*			*31.0-160*		*04/09/2018 20:31*	WG1095393

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5040		2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.212		0.0197	0.100	1	04/11/2018 13:56	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1150		5.19	100	100	04/08/2018 01:57	WG1094925
Fluoride	1.87		0.00990	0.100	1	04/08/2018 01:41	WG1094925
Sulfate	2520		7.74	500	100	04/08/2018 01:57	WG1094925

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0281		0.000250	0.00200	1	04/10/2018 18:40	WG1095151
Arsenic,Dissolved	0.0239		0.000250	0.00200	1	04/12/2018 17:46	WG1095180
Barium	0.0159		0.000360	0.00500	1	04/10/2018 18:40	WG1095151
Barium,Dissolved	0.0153		0.000360	0.00500	1	04/12/2018 17:46	WG1095180
Calcium	626		0.0460	1.00	1	04/10/2018 18:40	WG1095151
Chromium	0.00326		0.000540	0.00200	1	04/10/2018 18:40	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 17:46	WG1095180
Iron	0.418		0.0150	0.100	1	04/10/2018 18:40	WG1095151
Iron,Dissolved	0.239	B	0.0150	0.100	1	04/12/2018 17:46	WG1095180
Lead	0.000369	B J	0.000240	0.00200	1	04/11/2018 13:35	WG1095151
Lead,Dissolved	0.000318	J	0.000240	0.00200	1	04/12/2018 17:46	WG1095180
Manganese	0.686		0.000250	0.00500	1	04/10/2018 18:40	WG1095151
Manganese,Dissolved	0.706		0.000250	0.00500	1	04/12/2018 17:46	WG1095180
Potassium	5.03		0.0370	1.00	1	04/10/2018 18:40	WG1095151
Selenium	0.00725		0.000380	0.00200	1	04/10/2018 18:40	WG1095151
Selenium,Dissolved	0.00414		0.000380	0.00200	1	04/12/2018 17:46	WG1095180
Sodium	869		0.110	1.00	1	04/10/2018 18:40	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.237		0.0314	0.100	1	04/10/2018 17:26	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.0*			*77.0-122*		*04/10/2018 17:26*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 15:51	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 15:51	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 15:51	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 15:51	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 15:51	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 15:51	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 15:51	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 15:51	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 15:51	WG1095144

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 15:51	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 15:51	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 15:51	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 15:51	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 15:51	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 15:51	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 15:51	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 15:51	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 15:51	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 15:51	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 15:51	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 15:51	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 15:51	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 15:51	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 15:51	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 15:51	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 15:51	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 15:51	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 15:51	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 15:51	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 15:51	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 15:51	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 15:51	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 15:51	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 15:51	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 15:51	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 15:51	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 15:51	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 15:51	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 15:51	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 15:51	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 15:51	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 15:51	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 15:51	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 15:51	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 15:51	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 15:51	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 15:51	WG1095144
(S) Toluene-d8	*101*			*80.0-120*		*04/07/2018 15:51*	WG1095144
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/07/2018 15:51*	WG1095144
(S) 4-Bromofluorobenzene	*92.2*			*80.0-120*		*04/07/2018 15:51*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	6.52		0.0247	0.100	1	04/09/2018 20:51	WG1095393
(S) o-Terphenyl	*112*			*31.0-160*		*04/09/2018 20:51*	WG1095393

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	17.0		2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0570	J	0.0197	0.100	1	04/11/2018 13:57	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	U		0.0519	1.00	1	04/07/2018 18:30	WG1094925
Fluoride	U		0.00990	0.100	1	04/07/2018 18:30	WG1094925
Sulfate	U		0.0774	5.00	1	04/07/2018 18:30	WG1094925

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	04/10/2018 18:43	WG1095151
Arsenic,Dissolved	U		0.000250	0.00200	1	04/12/2018 17:50	WG1095180
Barium	U		0.000360	0.00500	1	04/10/2018 18:43	WG1095151
Barium,Dissolved	U		0.000360	0.00500	1	04/12/2018 17:50	WG1095180
Calcium	0.670	J	0.0460	1.00	1	04/10/2018 18:43	WG1095151
Chromium	0.00102	J	0.000540	0.00200	1	04/10/2018 18:43	WG1095151
Chromium,Dissolved	0.00533	B	0.000540	0.00200	1	04/12/2018 17:50	WG1095180
Iron	U		0.0150	0.100	1	04/10/2018 18:43	WG1095151
Iron,Dissolved	0.0421	B J	0.0150	0.100	1	04/12/2018 17:50	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 13:39	WG1095151
Lead,Dissolved	0.000338	J	0.000240	0.00200	1	04/12/2018 17:50	WG1095180
Manganese	0.000868	J	0.000250	0.00500	1	04/10/2018 18:43	WG1095151
Manganese,Dissolved	0.00257	J	0.000250	0.00500	1	04/12/2018 17:50	WG1095180
Potassium	0.0527	J	0.0370	1.00	1	04/10/2018 18:43	WG1095151
Selenium	U		0.000380	0.00200	1	04/10/2018 18:43	WG1095151
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 17:50	WG1095180
Sodium	1.73		0.110	1.00	1	04/10/2018 18:43	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 17:48	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*99.1*			*77.0-122*		*04/10/2018 17:48*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 16:10	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 16:10	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:10	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:10	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:10	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:10	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:10	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:10	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:10	WG1095144

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:10	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:10	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 16:10	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:10	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:10	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:10	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:10	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:10	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:10	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 16:10	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:10	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:10	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:10	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:10	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:10	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:10	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:10	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:10	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:10	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:10	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:10	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 16:10	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:10	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:10	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 16:10	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:10	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:10	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:10	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 16:10	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:10	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:10	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:10	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:10	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:10	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:10	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:10	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:10	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:10	WG1095144
(S) Toluene-d8	*104*			*80.0-120*		*04/07/2018 16:10*	WG1095144
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/07/2018 16:10*	WG1095144
(S) 4-Bromofluorobenzene	*93.6*			*80.0-120*		*04/07/2018 16:10*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0320	J	0.0247	0.100	1	04/09/2018 21:12	WG1095393
(S) o-Terphenyl	*93.9*			*31.0-160*		*04/09/2018 21:12*	WG1095393

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	U		2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0620	J	0.0197	0.100	1	04/11/2018 13:59	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.515	J	0.0519	1.00	1	04/08/2018 02:12	WG1094925
Fluoride	U		0.00990	0.100	1	04/08/2018 02:12	WG1094925
Sulfate	0.718	J	0.0774	5.00	1	04/08/2018 02:12	WG1094925

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	04/10/2018 18:47	WG1095151
Arsenic,Dissolved	U		0.000250	0.00200	1	04/12/2018 17:54	WG1095180
Barium	U		0.000360	0.00500	1	04/10/2018 18:47	WG1095151
Barium,Dissolved	U		0.000360	0.00500	1	04/12/2018 17:54	WG1095180
Calcium	0.0523	B J	0.0460	1.00	1	04/10/2018 18:47	WG1095151
Chromium	U		0.000540	0.00200	1	04/10/2018 18:47	WG1095151
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 17:54	WG1095180
Iron	U		0.0150	0.100	1	04/10/2018 18:47	WG1095151
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 17:54	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 13:43	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:54	WG1095180
Manganese	0.000277	J	0.000250	0.00500	1	04/10/2018 18:47	WG1095151
Manganese,Dissolved	0.000721	J	0.000250	0.00500	1	04/12/2018 17:54	WG1095180
Potassium	U		0.0370	1.00	1	04/10/2018 18:47	WG1095151
Selenium	U		0.000380	0.00200	1	04/10/2018 18:47	WG1095151
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 17:54	WG1095180
Sodium	0.805	J	0.110	1.00	1	04/10/2018 18:47	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 18:10	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*98.8*			*77.0-122*		*04/10/2018 18:10*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 16:29	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 16:29	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:29	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:29	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:29	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:29	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:29	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:29	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:29	WG1095144

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:29	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:29	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 16:29	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:29	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:29	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:29	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:29	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:29	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:29	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 16:29	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:29	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:29	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:29	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:29	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:29	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:29	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:29	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:29	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:29	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:29	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:29	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 16:29	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:29	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:29	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 16:29	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:29	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:29	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:29	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 16:29	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:29	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:29	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:29	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:29	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:29	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:29	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:29	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:29	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:29	WG1095144
(S) Toluene-d8	*103*			*80.0-120*		*04/07/2018 16:29*	WG1095144
(S) Dibromofluoromethane	*100*			*76.0-123*		*04/07/2018 16:29*	WG1095144
(S) 4-Bromofluorobenzene	*92.8*			*80.0-120*		*04/07/2018 16:29*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/09/2018 21:32	WG1095393
(S) o-Terphenyl	*90.2*			*31.0-160*		*04/09/2018 21:32*	WG1095393

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4.00	J	2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.139		0.0197	0.100	1	04/11/2018 14:00	WG1096182

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	0.0730	B J	0.0519	1.00	1	04/09/2018 22:13	WG1095384
Fluoride	U		0.00990	0.100	1	04/09/2018 22:13	WG1095384
Sulfate	0.211	B J	0.0774	5.00	1	04/09/2018 22:13	WG1095384

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	U		0.000250	0.00200	1	04/10/2018 18:52	WG1095151
Arsenic,Dissolved	U		0.000250	0.00200	1	04/12/2018 17:58	WG1095180
Barium	U		0.000360	0.00500	1	04/10/2018 18:52	WG1095151
Barium,Dissolved	U		0.000360	0.00500	1	04/12/2018 17:58	WG1095180
Calcium	0.0700	B J	0.0460	1.00	1	04/10/2018 18:52	WG1095151
Chromium	U		0.000540	0.00200	1	04/10/2018 18:52	WG1095151
Chromium,Dissolved	0.000668	B J	0.000540	0.00200	1	04/12/2018 17:58	WG1095180
Iron	U		0.0150	0.100	1	04/10/2018 18:52	WG1095151
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 17:58	WG1095180
Lead	U		0.000240	0.00200	1	04/11/2018 14:03	WG1095151
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 17:58	WG1095180
Manganese	0.000392	J	0.000250	0.00500	1	04/10/2018 18:52	WG1095151
Manganese,Dissolved	0.000598	J	0.000250	0.00500	1	04/12/2018 17:58	WG1095180
Potassium	U		0.0370	1.00	1	04/10/2018 18:52	WG1095151
Selenium	U		0.000380	0.00200	1	04/10/2018 18:52	WG1095151
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 17:58	WG1095180
Sodium	0.630	J	0.110	1.00	1	04/10/2018 18:52	WG1095151

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 18:31	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*99.2*			*77.0-122*		*04/10/2018 18:31*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 16:48	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 16:48	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:48	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:48	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:48	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:48	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:48	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:48	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:48	WG1095144

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:48	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:48	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 16:48	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:48	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:48	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:48	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:48	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:48	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:48	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 16:48	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:48	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:48	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:48	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:48	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:48	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:48	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:48	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:48	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:48	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:48	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:48	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 16:48	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:48	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:48	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 16:48	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:48	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:48	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:48	WG1095144
Toluene	U		0.000412	0.00100	1	04/07/2018 16:48	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:48	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:48	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:48	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:48	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:48	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:48	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:48	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:48	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:48	WG1095144
(S) Toluene-d8	*102*			*80.0-120*		*04/07/2018 16:48*	WG1095144
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/07/2018 16:48*	WG1095144
(S) 4-Bromofluorobenzene	*94.8*			*80.0-120*		*04/07/2018 16:48*	WG1095144

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/09/2018 21:52	WG1095393
(S) o-Terphenyl	*95.8*			*31.0-160*		*04/09/2018 21:52*	WG1095393

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 13:00	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 13:00	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 13:00	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 13:00	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 13:00	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 13:00	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 13:00	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 13:00	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 13:00	WG1095144
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 13:00	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 13:00	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 13:00	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 13:00	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 13:00	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 13:00	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 13:00	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 13:00	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 13:00	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 13:00	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 13:00	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 13:00	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 13:00	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 13:00	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 13:00	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 13:00	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 13:00	WG1095144
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 13:00	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 13:00	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 13:00	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 13:00	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 13:00	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 13:00	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 13:00	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 13:00	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 13:00	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 13:00	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 13:00	WG1095144
Toluene	0.000573	J	0.000412	0.00100	1	04/07/2018 13:00	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 13:00	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 13:00	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 13:00	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 13:00	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 13:00	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 13:00	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 13:00	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 13:00	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 13:00	WG1095144
(S) Toluene-d8	*101*			*80.0-120*		*04/07/2018 13:00*	WG1095144
(S) Dibromofluoromethane	*100*			*76.0-123*		*04/07/2018 13:00*	WG1095144
(S) 4-Bromofluorobenzene	*88.4*			*80.0-120*		*04/07/2018 13:00*	WG1095144

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 13:19	WG1095144
Benzene	U		0.000331	0.00100	1	04/07/2018 13:19	WG1095144
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 13:19	WG1095144
Bromoform	U		0.000469	0.00100	1	04/07/2018 13:19	WG1095144
Bromomethane	U		0.000866	0.00500	1	04/07/2018 13:19	WG1095144
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 13:19	WG1095144
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 13:19	WG1095144
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 13:19	WG1095144
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 13:19	WG1095144
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 13:19	WG1095144
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 13:19	WG1095144
Chloroethane	U	J4	0.000453	0.00500	1	04/07/2018 13:19	WG1095144
Chloroform	U		0.000324	0.00500	1	04/07/2018 13:19	WG1095144
Chloromethane	U		0.000276	0.00250	1	04/07/2018 13:19	WG1095144
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 13:19	WG1095144
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 13:19	WG1095144
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 13:19	WG1095144
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 13:19	WG1095144
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 13:19	WG1095144
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 13:19	WG1095144
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 13:19	WG1095144
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 13:19	WG1095144
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 13:19	WG1095144
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 13:19	WG1095144
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 13:19	WG1095144
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 13:19	WG1095144
2-Butanone (MEK)	0.00415	J	0.00393	0.0100	1	04/07/2018 13:19	WG1095144
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 13:19	WG1095144
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 13:19	WG1095144
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 13:19	WG1095144
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 13:19	WG1095144
Naphthalene	U		0.00100	0.00500	1	04/07/2018 13:19	WG1095144
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 13:19	WG1095144
Styrene	U		0.000307	0.00100	1	04/07/2018 13:19	WG1095144
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 13:19	WG1095144
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 13:19	WG1095144
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 13:19	WG1095144
Toluene	0.00128		0.000412	0.00100	1	04/07/2018 13:19	WG1095144
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 13:19	WG1095144
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 13:19	WG1095144
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 13:19	WG1095144
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 13:19	WG1095144
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 13:19	WG1095144
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 13:19	WG1095144
o-Xylene	U		0.000341	0.00100	1	04/07/2018 13:19	WG1095144
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 13:19	WG1095144
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 13:19	WG1095144
(S) Toluene-d8	*102*			*80.0-120*		*04/07/2018 13:19*	WG1095144
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/07/2018 13:19*	WG1095144
(S) 4-Bromofluorobenzene	*91.9*			*80.0-120*		*04/07/2018 13:19*	WG1095144

WG1096148

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983825-04,06,07

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301024-1 04/10/18 23:19

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983825-07 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-07 04/10/18 23:19 • (DUP) R3301024-4 04/10/18 23:19

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	5180	4820	1	7.20	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301024-2 04/10/18 23:19 • (LCSD) R3301024-3 04/10/18 23:19

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8610	8580	97.8	97.5	85.0-115			0.349	5

WG1096149

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983825-08,09,10,11,13,14,15,16,17,18

Method Blank (MB)

(MB) R3301007-1 04/11/18 00:13

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983825-08 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-08 04/11/18 00:13 • (DUP) R3301007-4 04/11/18 00:13

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	5390	5780	1	6.98	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301007-2 04/11/18 00:13 • (LCSD) R3301007-3 04/11/18 00:13

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8340	8430	94.8	95.8	85.0-115			1.07	5

WG1096151

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983825-19,20,21,22,23,24,25,26,27,28

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300978-1 04/10/18 23:42

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983825-19 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-19 04/10/18 23:42 • (DUP) R3300978-4 04/10/18 23:42

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	5030	5130	1	1.97		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300978-2 04/10/18 23:42 • (LCSD) R3300978-3 04/10/18 23:42

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8530	8530	96.9	96.9	85.0-115			0.000	5

WG1096152

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983825-29,30,31,32,33,34,35

Method Blank (MB)

(MB) R3301374-1 04/11/18 15:53

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983849-02 Original Sample (OS) • Duplicate (DUP)

(OS) L983849-02 04/11/18 15:53 • (DUP) R3301374-4 04/11/18 15:53

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	4700	5090	1	7.97	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301374-2 04/11/18 15:53 • (LCSD) R3301374-3 04/11/18 15:53

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8640	8780	98.2	99.8	85.0-115			1.61	5

WG1096340

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983825-01,02,03,05,12

Method Blank (MB)

(MB) R3301714-1 04/12/18 13:25

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983865-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-03 04/12/18 13:25 • (DUP) R3301714-4 04/12/18 13:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2230	2270	1	1.56		5

L983865-04 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-04 04/12/18 13:25 • (DUP) R3301714-5 04/12/18 13:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2100	2070	1	1.44		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301714-2 04/12/18 13:25 • (LCSD) R3301714-3 04/12/18 13:25

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8970	8610	102	97.8	85.0-115			4.10	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300908-1 04/11/18 12:50

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983825-02 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-02 04/11/18 12:53 • (DUP) R3300908-4 04/11/18 12:54

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.0720	0.000	1	0.000	J	20

L983825-20 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-20 04/11/18 13:24 • (DUP) R3300908-6 04/11/18 13:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.0640	0.000	1	16.9	J	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300908-2 04/11/18 12:51 • (LCSD) R3300908-3 04/11/18 12:52

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.93	3.99	98.1	99.7	90.0-110			1.62	20

L983825-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L983825-03 04/11/18 12:55 • (MS) R3300908-5 04/11/18 12:56

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	1.15	3.36	88.2	1	90.0-110	J6

L984498-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984498-01 04/11/18 13:26 • (MS) R3300908-7 04/11/18 13:27 • (MSD) R3300908-8 04/11/18 13:28

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	ND	2.28	2.30	91.2	92.0	1	90.0-110			0.873	20

WG1096182

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L983825-21,22,23,24,25,26,27,28,29,30,31,32,33,34,35

Method Blank (MB)

(MB) R3300907-1 04/11/18 13:35

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983825-21 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-21 04/11/18 13:39 • (DUP) R3300907-4 04/11/18 13:40

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.758	0.757	1	0.132		20

L983855-04 Original Sample (OS) • Duplicate (DUP)

(OS) L983855-04 04/11/18 14:08 • (DUP) R3300907-6 04/11/18 14:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300907-2 04/11/18 13:36 • (LCSD) R3300907-3 04/11/18 13:37

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.91	4.02	97.7	101	90.0-110			2.88	20

L983825-22 Original Sample (OS) • Matrix Spike (MS)

(OS) L983825-22 04/11/18 13:41 • (MS) R3300907-5 04/11/18 13:42

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	0.599	2.90	92.1	1	90.0-110	

L983855-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-05 04/11/18 14:10 • (MS) R3300907-7 04/11/18 14:11 • (MSD) R3300907-8 04/11/18 14:12

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	U	1.80	2.25	72.2	90.1	1	90.0-110	J6	J3	22.1	20

WG1096783

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L983825-01

Method Blank (MB)

(MB) R3301410-1 04/12/18 15:43

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983825-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-01 04/12/18 15:47 • (DUP) R3301410-4 04/12/18 15:48

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	0.0800	0.0870	1	8.38	J	20

L983865-45 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-45 04/12/18 16:15 • (DUP) R3301410-9 04/12/18 16:16

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301410-2 04/12/18 15:45 • (LCSD) R3301410-3 04/12/18 15:46

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.91	3.96	97.7	98.9	90.0-110			1.25	20

L983865-29 Original Sample (OS) • Matrix Spike (MS)

(OS) L983865-29 04/12/18 15:49 • (MS) R3301410-6 04/12/18 15:50

Analyte	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	U	0.154	6.16	1	90.0-110	J6

Sample Narrative:

OS: Low spike recovery, sample had some sulfide interference

MS: Low spike recovery, sample had some sulfide interference

WG1096783

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L983825-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983865-47 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-47 04/12/18 16:18 • (MS) R3301410-10 04/12/18 16:19 • (MSD) R3301410-11 04/12/18 16:20

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	0.0310	0.132	0.138	4.04	4.28	1	90.0-110	J6	J6	4.44	20

Sample Narrative:

OS: Low spike recovery, sample had some sulfide interference

MS: Low spike recovery, sample had some sulfide interference

MSD: Low spike recovery, sample had some sulfide interference

WG1094975

Wet Chemistry by Method 4500CN E-2011

QUALITY CONTROL SUMMARY

L983825-29

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300284-1 04/09/18 17:03

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L983514-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983514-01 04/09/18 17:08 • (DUP) R3300284-4 04/09/18 17:09

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L983865-22 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-22 04/09/18 17:24 • (DUP) R3300284-5 04/09/18 17:25

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Cyanide	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300284-2 04/09/18 17:04 • (LCSD) R3300284-3 04/09/18 17:05

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0992	0.0906	99.2	90.6	85.0-115			9.06	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299938-1 04/07/18 14:49

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	0.0857	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.142	J	0.0774	5.00

L983693-12 Original Sample (OS) • Duplicate (DUP)

(OS) L983693-12 04/07/18 18:44 • (DUP) R3299938-4 04/07/18 18:56

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	26.3	26.3	1	0.0346		15
Fluoride	0.383	0.379	1	1.21		15
Sulfate	17.7	17.7	1	0.0656		15

L983791-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983791-01 04/07/18 23:42 • (DUP) R3299938-6 04/07/18 23:54

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	5.24	5.57	1	6.02		15
Fluoride	0.233	0.225	1	3.53		15
Sulfate	18.7	18.8	1	0.486		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299938-2 04/07/18 15:02 • (LCSD) R3299938-3 04/07/18 15:14

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.7	39.6	99.2	99.0	80.0-120			0.202	15
Fluoride	8.00	8.05	8.05	101	101	80.0-120			0.0845	15
Sulfate	40.0	40.1	40.0	100	100	80.0-120			0.230	15

QUALITY CONTROL SUMMARY

L983693-12 Original Sample (OS) • Matrix Spike (MS)

(OS) L983693-12 04/07/18 18:44 • (MS) R3299938-5 04/07/18 19:09

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	26.3	75.8	98.9	1	80.0-120	
Fluoride	5.00	0.383	5.35	99.3	1	80.0-120	
Sulfate	50.0	17.7	67.3	99.1	1	80.0-120	

L983791-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983791-01 04/07/18 23:42 • (MS) R3299938-7 04/08/18 00:07 • (MSD) R3299938-8 04/08/18 00:19

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	5.24	55.8	55.6	101	101	1	80.0-120			0.359	15
Fluoride	5.00	0.233	5.25	5.25	100	100	1	80.0-120			0.0647	15
Sulfate	50.0	18.7	68.3	68.2	99.2	99.0	1	80.0-120			0.189	15

WG1094924

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983825-02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20,21

Method Blank (MB)

(MB) R3300426-1 04/09/18 18:06

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.0584	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983825-18 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-18 04/10/18 03:31 • (DUP) R3300426-4 04/10/18 03:43

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	4.80	5.47	1	13.1		15

L983825-18 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-18 04/10/18 03:56 • (DUP) R3300426-5 04/10/18 04:08

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	1360	1100	100	21.1	J3	15
Sulfate	2220	1790	100	21.6	P1	15

L983825-21 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-21 04/10/18 06:00 • (DUP) R3300426-8 04/10/18 06:12

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	1.70	1.86	1	9.26		15

L983825-21 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-21 04/10/18 06:25 • (DUP) R3300426-9 04/10/18 06:37

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	1040	1000	100	4.06		15
Sulfate	1720	1600	100	7.69		15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300426-2 04/09/18 18:19 • (LCSD) R3300426-3 04/09/18 18:31

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.4	39.4	98.6	98.4	80.0-120			0.201	15
Fluoride	8.00	8.05	8.04	101	100	80.0-120			0.144	15
Sulfate	40.0	39.8	39.8	99.6	99.5	80.0-120			0.0756	15

L983825-18 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-18 04/10/18 03:31 • (MS) R3300426-6 04/10/18 04:20 • (MSD) R3300426-7 04/10/18 04:58

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Fluoride	5.00	4.80	9.57	9.94	95.4	103	1	80.0-120			3.85	15

L983825-21 Original Sample (OS) • Matrix Spike (MS)

(OS) L983825-21 04/10/18 06:00 • (MS) R3300426-10 04/10/18 06:49

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Fluoride	5.00	1.70	10.7	181	1	80.0-120	E J5

Method Blank (MB)

(MB) R3299947-1 04/07/18 13:57

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983825-33 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-33 04/07/18 18:30 • (DUP) R3299947-4 04/07/18 18:45

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	U	0.000	1	0.000		15
Fluoride	U	0.000	1	0.000		15
Sulfate	U	0.000	1	0.000		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299947-2 04/07/18 14:12 • (LCSD) R3299947-3 04/07/18 14:27

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.3	39.2	98.3	98.1	80.0-120			0.209	15
Fluoride	8.00	8.06	8.04	101	100	80.0-120			0.309	15
Sulfate	40.0	38.9	38.9	97.2	97.3	80.0-120			0.112	15

L983825-33 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-33 04/07/18 18:30 • (MS) R3299947-5 04/07/18 19:01 • (MSD) R3299947-6 04/07/18 19:16

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	U	50.3	51.0	101	102	1	80.0-120			1.37	15
Fluoride	5.00	U	5.22	5.09	104	102	1	80.0-120			2.42	15
Sulfate	50.0	U	50.5	50.2	101	100	1	80.0-120			0.473	15

Method Blank (MB)

(MB) R3300408-1 04/09/18 18:09

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.0824	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.112	J	0.0774	5.00

L984001-02 Original Sample (OS) • Duplicate (DUP)

(OS) L984001-02 04/10/18 01:17 • (DUP) R3300408-4 04/10/18 01:30

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	1830	2590	100	34.2	J3	15

L984001-10 Original Sample (OS) • Duplicate (DUP)

(OS) L984001-10 04/10/18 04:47 • (DUP) R3300408-7 04/10/18 05:00

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	128	128	5	0.357		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300408-2 04/09/18 18:22 • (LCSD) R3300408-3 04/09/18 18:36

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.5	39.5	98.7	98.6	80.0-120			0.106	15
Fluoride	8.00	7.97	7.97	99.7	99.6	80.0-120			0.0439	15
Sulfate	40.0	40.0	39.9	99.9	99.7	80.0-120			0.195	15

L984001-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984001-02 04/10/18 01:00 • (MS) R3300408-5 04/10/18 01:43 • (MSD) R3300408-6 04/10/18 01:57

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Fluoride	5.00	0.321	4.69	5.09	87.3	95.3	1	80.0-120			8.16	15
Sulfate	50.0	67.4	115	115	94.2	95.5	1	80.0-120	E	E	0.578	15

WG1095384

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983825-26,35

L984001-10 Original Sample (OS) • Matrix Spike (MS)

(OS) L984001-10 04/10/18 04:33 • (MS) R3300408-8 04/10/18 05:46

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Fluoride	5.00	0.357	5.58	105	1	80.0-120	
Sulfate	50.0	1.80	51.5	99.4	1	80.0-120	

WG1096737

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983825-17

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301138-1 04/11/18 19:20

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L984480-01 Original Sample (OS) • Duplicate (DUP)

(OS) L984480-01 04/11/18 22:20 • (DUP) R3301138-4 04/11/18 22:36

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	50.4	50.1	1	0.688		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301138-2 04/11/18 19:35 • (LCSD) R3301138-3 04/11/18 19:51

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	39.4	39.3	98.6	98.1	80.0-120			0.410	15

L984480-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984480-01 04/11/18 22:20 • (MS) R3301138-5 04/11/18 22:51 • (MSD) R3301138-6 04/11/18 23:38

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	50.4	98.5	98.7	96.1	96.6	1	80.0-120			0.276	15

WG1102213

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983825-31

Method Blank (MB)

(MB) R3304319-1 04/24/18 11:37

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	U		0.0519	1.00
Sulfate	U		0.0774	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3304319-2 04/24/18 11:53 • (LCSD) R3304319-3 04/24/18 12:10

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.4	39.7	98.6	99.1	80.0-120			0.519	15
Sulfate	40.0	39.5	39.5	98.6	98.7	80.0-120			0.0266	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300321-1 04/09/18 14:13

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300321-2 04/09/18 14:15 • (LCSD) R3300321-3 04/09/18 14:17

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury	0.00300	0.00290	0.00295	96.8	98.2	80.0-120			1.46	20

L983497-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983497-01 04/09/18 14:20 • (MS) R3300321-4 04/09/18 14:22 • (MSD) R3300321-5 04/09/18 14:24

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury	0.00300	ND	0.00310	0.00306	103	102	1	75.0-125			1.09	20

WG1095325

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983825-29

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300467-1 04/10/18 10:58

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury,Dissolved	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300467-2 04/10/18 11:00 • (LCSD) R3300467-3 04/10/18 11:03

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	0.00317	0.00311	106	104	80.0-120			1.70	20

L983825-29 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-29 04/10/18 11:05 • (MS) R3300467-4 04/10/18 11:12 • (MSD) R3300467-5 04/10/18 11:14

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	U	0.00282	0.00300	94.2	100	1	75.0-125			6.06	20

WG1095146

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983825-29

Method Blank (MB)

(MB) R3300326-1 04/10/18 00:21

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron	0.0169	J	0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300326-2 04/10/18 00:23 • (LCSD) R3300326-3 04/10/18 00:26

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron	1.00	1.02	1.04	102	104	80.0-120			1.82	20

L983841-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983841-01 04/10/18 00:28 • (MS) R3300326-5 04/10/18 00:34 • (MSD) R3300326-6 04/10/18 00:36

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1.00	ND	1.06	1.08	101	103	1	75.0-125			1.83	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1095189

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983825-29

Method Blank (MB)

(MB) R3300622-1 04/10/18 14:35

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron,Dissolved	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300622-2 04/10/18 14:37 • (LCSD) R3300622-3 04/10/18 14:40

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	1.01	1.03	101	103	80.0-120			2.74	20

L983860-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983860-05 04/10/18 14:42 • (MS) R3300622-5 04/10/18 14:47 • (MSD) R3300622-6 04/10/18 14:50

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	0.147	1.17	1.15	102	99.9	1	75.0-125			1.70	20

WG1095149

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983825-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301893-1 04/13/18 17:39

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	0.00655		0.000540	0.00200
Iron	0.0492	J	0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	0.000651	J	0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	0.279	J	0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301893-2 04/13/18 17:43 • (LCSD) R3301893-3 04/13/18 17:47

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0490	0.0497	98.1	99.4	80.0-120			1.33	20
Barium	0.0500	0.0449	0.0441	89.7	88.3	80.0-120			1.60	20
Calcium	5.00	4.83	5.05	96.7	101	80.0-120			4.46	20
Chromium	0.0500	0.0521	0.0577	104	115	80.0-120			10.2	20
Iron	5.00	5.11	5.17	102	103	80.0-120			1.03	20
Lead	0.0500	0.0488	0.0488	97.5	97.6	80.0-120			0.137	20
Manganese	0.0500	0.0481	0.0498	96.2	99.7	80.0-120			3.54	20
Potassium	5.00	4.76	4.87	95.3	97.4	80.0-120			2.20	20
Selenium	0.0500	0.0513	0.0507	103	101	80.0-120			1.28	20
Sodium	5.00	5.35	5.59	107	112	80.0-120			4.48	20

L983825-20 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-20 04/13/18 17:51 • (MS) R3301893-5 04/13/18 17:59 • (MSD) R3301893-6 04/13/18 18:03

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00180	0.0506	0.0496	97.7	95.6	1	75.0-125			2.04	20
Barium	0.0500	0.0224	0.0684	0.0701	92.0	95.4	1	75.0-125			2.43	20
Calcium	5.00	623	618	624	0.000	28.5	1	75.0-125	V	V	0.917	20
Potassium	5.00	4.56	9.09	10.6	90.5	120	1	75.0-125			15.2	20
Iron	5.00	3.42	8.34	8.37	98.5	99.1	1	75.0-125			0.385	20
Lead	0.0500	0.000344	0.0502	0.0508	99.8	101	1	75.0-125			1.04	20
Manganese	0.0500	1.71	1.76	1.76	101	111	1	75.0-125			0.270	20

WG1095149

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983825-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

L983825-20 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-20 04/13/18 17:51 • (MS) R3301893-5 04/13/18 17:59 • (MSD) R3301893-6 04/13/18 18:03

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Selenium	0.0500	0.000380	0.0551	0.0530	109	105	1	75.0-125			3.94	20
Sodium	5.00	1480	1470	1470	0.000	0.000	1	75.0-125	E V	E V	0.139	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300627-1 04/10/18 16:41

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	0.0640	J	0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Vanadium	U		0.000180	0.00500

Method Blank (MB)

(MB) R3300910-1 04/11/18 11:53

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Lead	0.000587	J	0.000240	0.00200
Uranium	U		0.000330	0.0100

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300627-2 04/10/18 16:45 • (LCSD) R3300627-3 04/10/18 16:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0502	0.0507	100	101	80.0-120			1.06	20
Barium	0.0500	0.0484	0.0487	96.7	97.4	80.0-120			0.746	20
Cadmium	0.0500	0.0503	0.0479	101	95.7	80.0-120			4.90	20
Calcium	5.00	5.26	5.08	105	102	80.0-120			3.57	20
Chromium	0.0500	0.0506	0.0478	101	95.6	80.0-120			5.75	20
Cobalt	0.0500	0.0511	0.0513	102	103	80.0-120			0.392	20
Iron	5.00	5.03	4.98	101	99.6	80.0-120			1.01	20
Manganese	0.0500	0.0497	0.0479	99.4	95.8	80.0-120			3.65	20
Nickel	0.0500	0.0518	0.0509	104	102	80.0-120			1.66	20
Potassium	5.00	5.57	5.00	111	99.9	80.0-120			10.9	20
Selenium	0.0500	0.0504	0.0486	101	97.1	80.0-120			3.66	20
Sodium	5.00	5.15	4.94	103	98.7	80.0-120			4.17	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300627-2 04/10/18 16:45 • (LCSD) R3300627-3 04/10/18 16:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Vanadium	0.0500	0.0494	0.0487	98.8	97.4	80.0-120			1.47	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300910-2 04/11/18 11:57 • (LCSD) R3300910-3 04/11/18 12:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Lead	0.0500	0.0486	0.0478	97.2	95.5	80.0-120			1.79	20
Uranium	0.0500	0.0476	0.0467	95.2	93.5	80.0-120			1.88	20

L983754-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983754-02 04/10/18 16:53 • (MS) R3300627-5 04/10/18 17:01 • (MSD) R3300627-6 04/10/18 17:05

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	U	0.0499	0.0498	99.7	99.6	1	75.0-125			0.115	20
Barium	0.0500	0.0150	0.0632	0.0640	96.5	98.0	1	75.0-125			1.19	20
Cadmium	0.0500	U	0.0498	0.0499	99.6	99.7	1	75.0-125			0.109	20
Calcium	5.00	35.4	40.0	40.3	91.8	96.5	1	75.0-125			0.582	20
Chromium	0.0500	U	0.0485	0.0473	97.0	94.6	1	75.0-125			2.59	20
Cobalt	0.0500	U	0.0502	0.0511	100	102	1	75.0-125			1.73	20
Potassium	5.00	5.33	9.26	9.24	78.6	78.3	1	75.0-125			0.144	20
Iron	5.00	1.75	6.64	6.65	97.9	98.0	1	75.0-125			0.0736	20
Manganese	0.0500	0.174	0.223	0.225	98.6	102	1	75.0-125			0.852	20
Nickel	0.0500	U	0.0512	0.0501	102	100	1	75.0-125			2.18	20
Selenium	0.0500	U	0.0519	0.0523	104	105	1	75.0-125			0.784	20
Sodium	5.00	52.2	56.7	56.6	89.0	88.3	1	75.0-125			0.0593	20
Vanadium	0.0500	U	0.0491	0.0488	98.1	97.5	1	75.0-125			0.620	20

L983754-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983754-02 04/11/18 12:05 • (MS) R3300910-5 04/11/18 12:14 • (MSD) R3300910-6 04/11/18 12:18

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Lead	0.0500	U	0.0475	0.0472	94.9	94.3	1	75.0-125			0.640	20
Uranium	0.0500	U	0.0469	0.0472	93.7	94.3	1	75.0-125			0.624	20

Method Blank (MB)

(MB) R3301747-1 04/13/18 13:32

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Chromium,Dissolved	U		0.000540	0.00200
Iron,Dissolved	U		0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Selenium,Dissolved	U		0.000380	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301747-2 04/13/18 13:36 • (LCSD) R3301747-3 04/13/18 13:40

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0474	0.0489	94.8	97.7	80.0-120			3.10	20
Barium,Dissolved	0.0500	0.0458	0.0446	91.6	89.2	80.0-120			2.65	20
Chromium,Dissolved	0.0500	0.0498	0.0506	99.7	101	80.0-120			1.45	20
Iron,Dissolved	5.00	4.99	4.99	99.8	99.8	80.0-120			0.0382	20
Lead,Dissolved	0.0500	0.0476	0.0481	95.3	96.3	80.0-120			1.03	20
Manganese,Dissolved	0.0500	0.0467	0.0465	93.4	92.9	80.0-120			0.544	20
Selenium,Dissolved	0.0500	0.0469	0.0481	93.7	96.1	80.0-120			2.53	20

L983825-20 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-20 04/13/18 13:44 • (MS) R3301747-5 04/13/18 13:52 • (MSD) R3301747-6 04/13/18 13:56

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.00160	0.0491	0.0501	95.0	97.1	1	75.0-125			2.05	20
Barium,Dissolved	0.0500	0.0232	0.0697	0.0710	93.1	95.5	1	75.0-125			1.73	20
Chromium,Dissolved	0.0500	U	0.0480	0.0498	96.1	99.5	1	75.0-125			3.52	20
Iron,Dissolved	5.00	3.40	8.12	8.26	94.3	97.1	1	75.0-125			1.74	20
Lead,Dissolved	0.0500	0.000491	0.0485	0.0498	96.1	98.7	1	75.0-125			2.61	20
Manganese,Dissolved	0.0500	1.72	1.74	1.75	39.3	61.2	1	75.0-125	V	V	0.627	20
Selenium,Dissolved	0.0500	U	0.0496	0.0504	99.3	101	1	75.0-125			1.42	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301420-1 04/12/18 15:55

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Chromium,Dissolved	0.000907	J	0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	0.0322	J	0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301420-2 04/12/18 15:59 • (LCSD) R3301420-3 04/12/18 16:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0505	0.0510	101	102	80.0-120			0.868	20
Barium,Dissolved	0.0500	0.0479	0.0495	95.9	99.0	80.0-120			3.25	20
Cadmium,Dissolved	0.0500	0.0503	0.0503	101	101	80.0-120			0.107	20
Chromium,Dissolved	0.0500	0.0499	0.0510	99.8	102	80.0-120			2.10	20
Cobalt,Dissolved	0.0500	0.0524	0.0526	105	105	80.0-120			0.411	20
Iron,Dissolved	5.00	5.08	5.11	102	102	80.0-120			0.686	20
Lead,Dissolved	0.0500	0.0519	0.0501	104	100	80.0-120			3.47	20
Manganese,Dissolved	0.0500	0.0492	0.0493	98.5	98.7	80.0-120			0.189	20
Nickel,Dissolved	0.0500	0.0523	0.0520	105	104	80.0-120			0.532	20
Selenium,Dissolved	0.0500	0.0510	0.0522	102	104	80.0-120			2.27	20
Uranium,Dissolved	0.0500	0.0508	0.0510	102	102	80.0-120			0.419	20
Vanadium,Dissolved	0.0500	0.0492	0.0507	98.3	101	80.0-120			2.97	20

L983360-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983360-01 04/12/18 16:06 • (MS) R3301420-5 04/12/18 16:14 • (MSD) R3301420-6 04/12/18 16:18

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.00252	0.0523	0.0529	99.5	101	1	75.0-125			1.16	20
Barium,Dissolved	0.0500	0.0113	0.0643	0.0615	106	100	1	75.0-125			4.54	20
Cadmium,Dissolved	0.0500	U	0.0505	0.0505	101	101	1	75.0-125			0.102	20

L983360-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983360-01 04/12/18 16:06 • (MS) R3301420-5 04/12/18 16:14 • (MSD) R3301420-6 04/12/18 16:18

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium,Dissolved	0.0500	U	0.0498	0.0500	99.6	99.9	1	75.0-125			0.298	20
Cobalt,Dissolved	0.0500	0.000341	0.0509	0.0510	101	101	1	75.0-125			0.279	20
Iron,Dissolved	5.00	0.0205	4.97	4.98	99.0	99.2	1	75.0-125			0.229	20
Lead,Dissolved	0.0500	0.000713	0.0510	0.0510	101	101	1	75.0-125			0.00218	20
Manganese,Dissolved	0.0500	0.0527	0.0988	0.0999	92.2	94.4	1	75.0-125			1.11	20
Nickel,Dissolved	0.0500	0.00479	0.0557	0.0574	102	105	1	75.0-125			2.91	20
Selenium,Dissolved	0.0500	0.00800	0.0605	0.0584	105	101	1	75.0-125			3.48	20
Uranium,Dissolved	0.0500	0.0186	0.0716	0.0710	106	105	1	75.0-125			0.872	20
Vanadium,Dissolved	0.0500	0.0151	0.0659	0.0660	102	102	1	75.0-125			0.142	20

WG1098545

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983825-04,09,14,18,19,20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301990-1 04/15/18 12:36

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chromium	U		0.000540	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301990-2 04/15/18 12:40 • (LCSD) R3301990-3 04/15/18 12:45

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chromium	0.0500	0.0520	0.0494	104	98.8	80.0-120			5.19	20

L983825-09 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-09 04/15/18 12:50 • (MS) R3301990-4 04/15/18 12:59 • (MSD) R3301990-5 04/15/18 13:04

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium	0.0500	0.00125	0.0482	0.0489	94.0	95.3	1	75.0-125			1.38	20

WG1095608

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L983825-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15

Method Blank (MB)

(MB) R3300911-3 04/09/18 15:04

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*98.2*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300911-2 04/09/18 14:20 • (LCSD) R3300911-1 04/09/18 13:52

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.16	6.23	112	113	71.0-136			1.12	20
(S) a,a,a-Trifluorotoluene(FID)				*106*	*106*	*77.0-122*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300512-3 04/10/18 10:28

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*98.7*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300512-1 04/10/18 09:22 • (LCSD) R3300512-2 04/10/18 09:44

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.26	6.16	114	112	71.0-136			1.66	20
(S) a,a,a-Trifluorotoluene(FID)				*106*	*108*	*77.0-122*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300436-3 04/07/18 20:55

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Isopropylbenzene	U		0.000326	0.00100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3300436-3 04/07/18 20:55

Analyte	MB Result mg/l	**MB Qualifier**	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
Xylenes, Total	U		0.00106	0.00300
(S) Toluene-d8	*101*			*80.0-120*
(S) Dibromofluoromethane	*101*			*76.0-123*
(S) 4-Bromofluorobenzene	*93.0*			*80.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300436-1 04/07/18 19:58 • (LCSD) R3300436-2 04/07/18 20:17

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	**LCS Qualifier**	**LCSD Qualifier**	RPD %	RPD Limits %
Acetone	0.125	0.108	0.105	86.4	83.7	10.0-160			3.13	23
Bromodichloromethane	0.0250	0.0225	0.0230	90.2	91.8	76.0-120			1.83	20
Bromoform	0.0250	0.0245	0.0249	98.1	99.5	67.0-132			1.48	20
Bromomethane	0.0250	0.0351	0.0393	140	157	18.0-160			11.3	20
n-Butylbenzene	0.0250	0.0239	0.0240	95.6	96.2	72.0-126			0.610	20
sec-Butylbenzene	0.0250	0.0245	0.0253	97.9	101	74.0-121			3.39	20
Carbon disulfide	0.0250	0.0222	0.0230	88.6	92.1	55.0-127			3.77	20
Carbon tetrachloride	0.0250	0.0231	0.0240	92.4	96.1	63.0-122			3.88	20
Benzene	0.0250	0.0243	0.0251	97.1	100	69.0-123			3.22	20
Chlorobenzene	0.0250	0.0265	0.0276	106	111	79.0-121			4.31	20
Chlorodibromomethane	0.0250	0.0257	0.0268	103	107	75.0-125			3.97	20
Chloroethane	0.0250	0.0374	0.0387	150	155	47.0-152		J4	3.43	20
Chloroform	0.0250	0.0243	0.0247	97.2	98.8	72.0-121			1.63	20
Chloromethane	0.0250	0.0212	0.0217	84.7	86.9	48.0-139			2.55	20
1,2-Dibromoethane	0.0250	0.0266	0.0275	106	110	77.0-123			3.46	20
1,1-Dichloroethane	0.0250	0.0235	0.0243	94.0	97.1	70.0-126			3.25	20
1,2-Dichloroethane	0.0250	0.0236	0.0244	94.4	97.7	67.0-126			3.45	20
1,1-Dichloroethene	0.0250	0.0225	0.0239	89.8	95.5	64.0-129			6.13	20
cis-1,2-Dichloroethene	0.0250	0.0246	0.0255	98.5	102	73.0-120			3.32	20
trans-1,2-Dichloroethene	0.0250	0.0241	0.0252	96.6	101	71.0-121			4.28	20
1,2-Dichloropropane	0.0250	0.0235	0.0244	94.1	97.7	75.0-125			3.80	20
cis-1,3-Dichloropropene	0.0250	0.0249	0.0266	99.8	106	79.0-123			6.33	20
trans-1,3-Dichloropropene	0.0250	0.0264	0.0276	106	110	74.0-127			4.41	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300436-1 04/07/18 19:58 • (LCSD) R3300436-2 04/07/18 20:17

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
2-Hexanone	0.125	0.129	0.127	103	102	58.0-147			1.34	20
p-Isopropyltoluene	0.0250	0.0258	0.0264	103	106	74.0-126			2.49	20
2-Butanone (MEK)	0.125	0.122	0.116	97.5	93.1	37.0-158			4.60	20
Methylene Chloride	0.0250	0.0249	0.0255	99.8	102	66.0-121			2.15	20
4-Methyl-2-pentanone (MIBK)	0.125	0.128	0.127	102	102	59.0-143			0.230	20
Ethylbenzene	0.0250	0.0265	0.0281	106	112	77.0-120			5.79	20
n-Propylbenzene	0.0250	0.0233	0.0241	93.3	96.5	79.0-120			3.35	20
Styrene	0.0250	0.0253	0.0258	101	103	78.0-124			2.27	20
1,1,1,2-Tetrachloroethane	0.0250	0.0265	0.0278	106	111	75.0-122			4.85	20
1,1,2,2-Tetrachloroethane	0.0250	0.0221	0.0224	88.2	89.6	71.0-122			1.53	20
Isopropylbenzene	0.0250	0.0233	0.0245	93.2	97.9	75.0-120			4.94	20
Tetrachloroethene	0.0250	0.0270	0.0287	108	115	70.0-127			5.89	20
1,1,1-Trichloroethane	0.0250	0.0227	0.0236	90.7	94.4	68.0-122			3.94	20
Methyl tert-butyl ether	0.0250	0.0227	0.0230	91.0	91.9	64.0-123			1.01	20
1,1,2-Trichloroethane	0.0250	0.0263	0.0272	105	109	78.0-120			3.50	20
Trichloroethene	0.0250	0.0270	0.0281	108	112	78.0-120			3.91	20
Naphthalene	0.0250	0.0265	0.0266	106	106	62.0-128			0.399	20
Vinyl chloride	0.0250	0.0244	0.0253	97.7	101	64.0-133			3.44	20
Toluene	0.0250	0.0251	0.0265	101	106	77.0-120			5.15	20
o-Xylene	0.0250	0.0276	0.0283	110	113	78.0-120			2.55	20
m&p-Xylenes	0.0500	0.0549	0.0563	110	113	77.0-120			2.67	20
1,2,4-Trimethylbenzene	0.0250	0.0240	0.0244	96.1	97.6	75.0-120			1.56	20
1,3,5-Trimethylbenzene	0.0250	0.0234	0.0242	93.7	96.7	75.0-120			3.12	20
Xylenes, Total	0.0750	0.0825	0.0846	110	113	77.0-120			2.51	20
(S) Toluene-d8				*99.8*	*102*	*80.0-120*				
(S) Dibromofluoromethane				*96.2*	*96.1*	*76.0-123*				
(S) 4-Bromofluorobenzene				*87.7*	*86.8*	*80.0-120*				

WG1095141

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983825-05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20,21,22,23,24

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301057-3 04/07/18 11:56

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1095141

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983825-05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20,21,22,23,24

Method Blank (MB)

(MB) R3301057-3 04/07/18 11:56

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*96.9*			*80.0-120*
(S) Dibromofluoromethane	*111*			*76.0-123*
(S) 4-Bromofluorobenzene	*92.2*			*80.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301057-1 04/07/18 10:31 • (LCSD) R3301057-2 04/07/18 10:52

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.155	0.154	124	123	10.0-160			0.957	23
Benzene	0.0250	0.0287	0.0278	115	111	69.0-123			3.33	20
Bromodichloromethane	0.0250	0.0254	0.0247	102	98.9	76.0-120			2.68	20
Bromoform	0.0250	0.0226	0.0225	90.5	90.0	67.0-132			0.478	20
Bromomethane	0.0250	0.0342	0.0339	137	136	18.0-160			1.07	20
n-Butylbenzene	0.0250	0.0287	0.0286	115	114	72.0-126			0.259	20
sec-Butylbenzene	0.0250	0.0258	0.0257	103	103	74.0-121			0.626	20
Carbon disulfide	0.0250	0.0285	0.0277	114	111	55.0-127			2.99	20
Carbon tetrachloride	0.0250	0.0282	0.0283	113	113	63.0-122			0.209	20
Chlorobenzene	0.0250	0.0247	0.0244	99.0	97.6	79.0-121			1.36	20
Chlorodibromomethane	0.0250	0.0250	0.0250	99.9	100	75.0-125			0.147	20
Chloroethane	0.0250	0.0320	0.0313	128	125	47.0-152			2.29	20
Chloroform	0.0250	0.0270	0.0263	108	105	72.0-121			2.81	20
Chloromethane	0.0250	0.0264	0.0265	105	106	48.0-139			0.650	20
1,2-Dibromoethane	0.0250	0.0251	0.0246	101	98.5	77.0-123			2.06	20
1,1-Dichloroethane	0.0250	0.0302	0.0295	121	118	70.0-126			2.43	20
1,2-Dichloroethane	0.0250	0.0297	0.0289	119	115	67.0-126			2.98	20
1,1-Dichloroethene	0.0250	0.0268	0.0266	107	107	64.0-129			0.799	20
cis-1,2-Dichloroethene	0.0250	0.0274	0.0270	110	108	73.0-120			1.39	20
trans-1,2-Dichloroethene	0.0250	0.0279	0.0269	112	107	71.0-121			3.67	20
1,2-Dichloropropane	0.0250	0.0276	0.0269	110	108	75.0-125			2.43	20
cis-1,3-Dichloropropene	0.0250	0.0267	0.0263	107	105	79.0-123			1.65	20
trans-1,3-Dichloropropene	0.0250	0.0260	0.0255	104	102	74.0-127			1.96	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301057-1 04/07/18 10:31 • (LCSD) R3301057-2 04/07/18 10:52

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0247	0.0240	98.9	96.1	77.0-120			2.91	20
2-Hexanone	0.125	0.131	0.124	104	99.6	58.0-147			4.74	20
Isopropylbenzene	0.0250	0.0246	0.0243	98.5	97.3	75.0-120			1.20	20
p-Isopropyltoluene	0.0250	0.0251	0.0248	100	99.0	74.0-126			1.24	20
2-Butanone (MEK)	0.125	0.163	0.154	130	123	37.0-158			5.49	20
Methylene Chloride	0.0250	0.0272	0.0271	109	108	66.0-121			0.657	20
4-Methyl-2-pentanone (MIBK)	0.125	0.139	0.134	111	107	59.0-143			3.74	20
Methyl tert-butyl ether	0.0250	0.0295	0.0287	118	115	64.0-123			2.58	20
Naphthalene	0.0250	0.0254	0.0271	102	108	62.0-128			6.32	20
n-Propylbenzene	0.0250	0.0244	0.0240	97.8	95.9	79.0-120			1.92	20
Styrene	0.0250	0.0238	0.0232	95.3	92.6	78.0-124			2.86	20
1,1,1,2-Tetrachloroethane	0.0250	0.0244	0.0249	97.5	99.5	75.0-122			2.01	20
1,1,2,2-Tetrachloroethane	0.0250	0.0231	0.0227	92.5	90.9	71.0-122			1.71	20
Tetrachloroethene	0.0250	0.0247	0.0240	98.7	95.9	70.0-127			2.89	20
Toluene	0.0250	0.0249	0.0245	99.8	97.8	77.0-120			1.95	20
1,1,1-Trichloroethane	0.0250	0.0283	0.0283	113	113	68.0-122			0.00644	20
1,1,2-Trichloroethane	0.0250	0.0235	0.0231	94.1	92.3	78.0-120			1.94	20
Trichloroethene	0.0250	0.0259	0.0253	103	101	78.0-120			2.31	20
1,2,4-Trimethylbenzene	0.0250	0.0240	0.0242	96.2	96.7	75.0-120			0.584	20
1,3,5-Trimethylbenzene	0.0250	0.0244	0.0242	97.5	96.8	75.0-120			0.786	20
Vinyl chloride	0.0250	0.0296	0.0286	118	114	64.0-133			3.52	20
Xylenes, Total	0.0750	0.0752	0.0740	100	98.7	77.0-120			1.61	20
o-Xylene	0.0250	0.0252	0.0250	101	99.8	78.0-120			1.06	20
m&p-Xylenes	0.0500	0.0500	0.0490	100	98.0	77.0-120			2.04	20
(S) Toluene-d8				*94.8*	*95.9*	*80.0-120*				
(S) Dibromofluoromethane				*108*	*108*	*76.0-123*				
(S) 4-Bromofluorobenzene				*87.0*	*86.8*	*80.0-120*				

WG1095144

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983825-25,26,27,28,29,30,31,32,33,34,35,36,37

Method Blank (MB)

(MB) R3301366-3 04/07/18 11:21

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3301366-3 04/07/18 11:21

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*103*			*80.0-120*
(S) Dibromofluoromethane	*101*			*76.0-123*
(S) 4-Bromofluorobenzene	*91.8*			*80.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301366-1 04/07/18 10:24 • (LCSD) R3301366-2 04/07/18 10:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.106	0.107	84.4	85.3	10.0-160			1.07	23
Benzene	0.0250	0.0248	0.0246	99.3	98.3	69.0-123			0.959	20
Bromodichloromethane	0.0250	0.0234	0.0229	93.4	91.6	76.0-120			1.94	20
Bromoform	0.0250	0.0254	0.0258	102	103	67.0-132			1.54	20
Bromomethane	0.0250	0.0304	0.0355	122	142	18.0-160			15.4	20
n-Butylbenzene	0.0250	0.0241	0.0250	96.3	100	72.0-126			3.73	20
sec-Butylbenzene	0.0250	0.0253	0.0251	101	100	74.0-121			0.684	20
Carbon disulfide	0.0250	0.0235	0.0231	93.9	92.6	55.0-127			1.45	20
Carbon tetrachloride	0.0250	0.0249	0.0252	99.8	101	63.0-122			1.05	20
Chlorobenzene	0.0250	0.0269	0.0276	108	110	79.0-121			2.51	20
Chlorodibromomethane	0.0250	0.0272	0.0269	109	107	75.0-125			1.16	20
Chloroethane	0.0250	0.0391	0.0373	156	149	47.0-152	J4		4.58	20
Chloroform	0.0250	0.0245	0.0247	98.2	98.7	72.0-121			0.494	20
Chloromethane	0.0250	0.0200	0.0207	80.1	82.9	48.0-139			3.45	20
1,2-Dibromoethane	0.0250	0.0275	0.0277	110	111	77.0-123			0.562	20
1,1-Dichloroethane	0.0250	0.0241	0.0239	96.2	95.7	70.0-126			0.622	20
1,2-Dichloroethane	0.0250	0.0250	0.0243	99.9	97.0	67.0-126			2.92	20
1,1-Dichloroethene	0.0250	0.0242	0.0233	96.7	93.2	64.0-129			3.61	20
cis-1,2-Dichloroethene	0.0250	0.0248	0.0250	99.3	99.8	73.0-120			0.477	20
trans-1,2-Dichloroethene	0.0250	0.0254	0.0249	102	99.6	71.0-121			1.97	20
1,2-Dichloropropane	0.0250	0.0238	0.0240	95.1	95.9	75.0-125			0.814	20
cis-1,3-Dichloropropene	0.0250	0.0266	0.0266	106	107	79.0-123			0.225	20
trans-1,3-Dichloropropene	0.0250	0.0279	0.0277	112	111	74.0-127			0.709	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301366-1 04/07/18 10:24 • (LCSD) R3301366-2 04/07/18 10:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0275	0.0278	110	111	77.0-120			1.13	20
2-Hexanone	0.125	0.130	0.131	104	105	58.0-147			1.05	20
Isopropylbenzene	0.0250	0.0235	0.0241	93.9	96.4	75.0-120			2.59	20
p-Isopropyltoluene	0.0250	0.0260	0.0267	104	107	74.0-126			2.52	20
2-Butanone (MEK)	0.125	0.120	0.120	96.2	96.0	37.0-158			0.173	20
Methylene Chloride	0.0250	0.0252	0.0249	101	99.5	66.0-121			1.45	20
4-Methyl-2-pentanone (MIBK)	0.125	0.130	0.131	104	104	59.0-143			0.0554	20
Methyl tert-butyl ether	0.0250	0.0231	0.0229	92.5	91.6	64.0-123			0.931	20
Naphthalene	0.0250	0.0258	0.0264	103	106	62.0-128			2.27	20
n-Propylbenzene	0.0250	0.0236	0.0238	94.5	95.1	79.0-120			0.665	20
Styrene	0.0250	0.0248	0.0253	99.1	101	78.0-124			2.20	20
1,1,1,2-Tetrachloroethane	0.0250	0.0273	0.0272	109	109	75.0-122			0.306	20
1,1,2,2-Tetrachloroethane	0.0250	0.0233	0.0234	93.3	93.5	71.0-122			0.305	20
Tetrachloroethene	0.0250	0.0284	0.0291	114	116	70.0-127			2.43	20
Toluene	0.0250	0.0258	0.0261	103	104	77.0-120			0.890	20
1,1,1-Trichloroethane	0.0250	0.0232	0.0231	92.7	92.2	68.0-122			0.491	20
1,1,2-Trichloroethane	0.0250	0.0271	0.0267	108	107	78.0-120			1.47	20
Trichloroethene	0.0250	0.0272	0.0272	109	109	78.0-120			0.00276	20
1,2,4-Trimethylbenzene	0.0250	0.0241	0.0244	96.5	97.4	75.0-120			0.904	20
1,3,5-Trimethylbenzene	0.0250	0.0238	0.0237	95.4	94.8	75.0-120			0.568	20
Vinyl chloride	0.0250	0.0250	0.0251	99.8	100	64.0-133			0.652	20
Xylenes, Total	0.0750	0.0827	0.0845	110	113	77.0-120			2.15	20
o-Xylene	0.0250	0.0272	0.0278	109	111	78.0-120			2.31	20
m&p-Xylenes	0.0500	0.0555	0.0567	111	113	77.0-120			2.19	20
(S) Toluene-d8				*101*	*100*	*80.0-120*				
(S) Dibromofluoromethane				*96.5*	*94.3*	*76.0-123*				
(S) 4-Bromofluorobenzene				*84.2*	*85.0*	*80.0-120*				

WG1095392

QUALITY CONTROL SUMMARY

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

L983825-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18

Method Blank (MB)

(MB) R3300272-1 04/09/18 14:07

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*87.3*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300272-2 04/09/18 14:27 • (LCSD) R3300272-3 04/09/18 14:47

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.34	1.41	89.2	94.2	50.0-150			5.44	20
(S) o-Terphenyl				*116*	*120*	*31.0-160*				

WG1095393

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L983825-19,20,21,22,23,24,25,26,27,28,29,30,31,32,33,34,35

Method Blank (MB)

(MB) R3300273-1 04/09/18 13:06

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*98.9*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300273-2 04/09/18 13:26 • (LCSD) R3300273-3 04/09/18 13:47

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.50	1.48	99.8	98.7	50.0-150			1.16	20
(S) o-Terphenyl				*125*	*122*	*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J1	Surrogate recovery limits have been exceeded; values are outside upper control limits.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J5	The sample matrix interfered with the ability to make any accurate determination; spike value is high.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia [1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky [1,6]	90010
Kentucky [2]	16
Louisiana	AI30792
Louisiana [1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086

Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico [1]	n/a
New York	11742
North Carolina	Env375
North Carolina [1]	DW21704
North Carolina [3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee [1,4]	2006
Texas	T 104704245-17-14
Texas [5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

Third Party Federal Accreditations

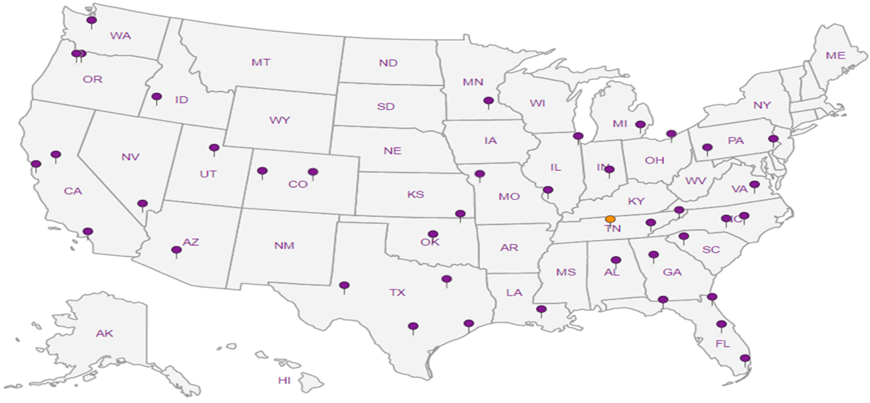
A2LA – ISO 17025	1461.01
A2LA – ISO 17025 [5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003

AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



Chain of Custody Page 1 of 6

ESC L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# 983825
1087
Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:
Shipped Via:

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **EP Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-EP**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **EP (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Quote #
Date Results Needed
Immediately Packed on Ice N ___ Y ___
Pres Chk

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
										v2				o2				
MW-6A	**Grab**	**GW**		**4/5/18**	**0930**	**10**	X	X	X	X	X	X	X					01
MW-85	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-86	**Grab**	**GW**				**11**	X	X	X		X	X	X	X	X			
MW-120	**Grab**	**GW**		**4/5/18**	**1015**	**10**	X	X	X	X	X	X	X					02
MW-121	**Grab**	**GW**		**4/5/18**	**1100**	**10**	X	X	X	X	X	X	X					03
MW-84	**Grab**	**GW**		**4/4/18**	**1410**	**10**	X	X	X	X	X	X	X					04
MW-122	**Grab**	**GW**		**4/5/18**	**0920**	**10**	X	X	X	X	X	X	X					05
MW-81	**Grab**	**GW**		**4/4/18**	**1455**	**10**	X	X	X	X	X	X	X					06
MW-80	**Grab**	**GW**		**4/4/18**	**1540**	**10**	X	X	X	X	X	X	X					07
MW-79	**Grab**	**GW**		**4/4/18**	**1625**	**10**	X	X	X	X	X	X	X					08

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP _Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: ✓Y _N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: ✓Y _N
Preservation Correct/Checked: ✓Y _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 2 [✓ HCL] / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach. °C	Bottles Received: 327
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18	Time: 0845

If preservation required by Login: Date/Time
Diss metals pH adj @ 1715 on 4/6/18

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page 2 of 6

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-EP**

L# 583825

Table #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. #

Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote # **119503**

Date Results Needed

Immediately Packed on Ice N ___ Y ___

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-82	**Grab**	**GW**		**4/4/18**	**1325**	**10**	X	X	X	X	X	X	X					09
MW-74	**Grab**	**GW**		**4/4/18**	**0925**	**10**	X	X	X	X	X	X	X					10
MW-73	**Grab**	**GW**		**4/4/18**	**0840**	**10**	X	X	X	X	X	X	X					11
MW-2A	**Grab**	**GW**		**4/5/18**	**1005**	**10**	X	X	X	X	X	X	X					12
MW-72	**Grab**	**GW**		**4/4/18**	**1710**	**10**	X	X	X	X	X	X	X					13
OCD-6	**Grab**	**GW**		**4/4/18**	**1755**	**10**	X	X	X	X	X	X	X					14
OCD-7AR	**Grab**	**GW**		**4/4/18**	**1840**	**10**	X	X	X	X	X	X	X					15
MW-76	**Grab**	**GW**		**4/4/18**	**1055**	**10**	X	X	X	X	X	X	X					16
MW-77	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-78	**Grab**	**GW**		**4/4/18**	**1010**	**10**	X	X	X	X	X	X	X					17

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_________

Remarks:

pH _______ Temp _______

Flow _______ Other _______

Samples returned via:
___ UPS ___ FedEx ___ Courier ___ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] [✓ Y] _N
COC Signed/Accurate: [✓ Y] _N
Bottles arrive intact: [✓ Y] _N
Correct bottles used: [✓ Y] _N
Sufficient volume sent: [✓ Y] _N
If Applicable
VOA Zero Headspace: [✓ Y] _N
Preservation Correct/Checked: [✓ Y] _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: [✓ Yes] / No
2 [✓ HCL] / MeoH
TBR

~~Temp~~ AdHc °C Bottles Received: 327

Date: 4/6/18 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX **505 E. Huntland Dr, Ste 250** **Austin, TX 78752**	Billing Information: **Accounts Payable** **21 Griffin Road North** **Windsor, CT 06095**	Pres Chk
Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**	
Project Description: **EP Spring 2018**	City/State Collected: **Artesia, NM**	
Phone: **512-684-3170** Fax:	Client Project # **249545.0000.0000 000001**	Lab Project # **TRCATX-EP**
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **EP (Navajo - Artesia)**	P.O. #
Collected by (signature): Immediately Packed on Ice N ____ Y ____	***Rush?*** (Lab MUST Be Notified) ____ Same Day ____ Five Day ____ Next Day ____ 5 Day (Rad Only) ____ Two Day ____ 10 Day (Rad Only) ____ Three Day	Quote # **119503** Date Results Needed

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-75	Grab	GW				10	X	X	X	X	X	X	X					
MW-83	Grab	GW		4/4/18	1140	10	X	X	X	X	X	X	X					
MW-3	Grab	GW		4/4/18	1225	10	X	X	X	X	X	X	X					18
MW-88	Grab	GW				10	X	X	X	X	X	X	X					19
MW-22A	Grab	GW				10	X	X	X	X	X	X	X					
MW-10	Grab	GW				10	X	X	X	X	X	X	X					
MW-123	Grab	GW				10	X	X	X	X	X	X	X					
MW-4A	Grab	GW				10	X	X	X	X	X	X	X					
MW-5A	Grab	GW				10	X	X	X	X	X	X	X					
MW-7A	Grab	GW				10	X	X	X	X	X	X	X					

Chain of Custody Page 3 of 6

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L # 983825

Table #

Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:

Shipped Via:

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP __Y __N
COC Signed/Accurate: ✓ Y __N
Bottles arrive intact: ✓ Y __N
Correct bottles used: ✓ Y __N
Sufficient volume sent: ✓ Y __N
If Applicable
VOA Zero Headspace: ✓ Y __N
Preservation Correct/Checked: ✓ Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 2 [✓ HCl] / MeOH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See [illegible] °C	Bottles Received: 327
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18	Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page 4 of 6

ESC L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-EP**

L# 983825

Table #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. #

Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:

Collected by (signature):

Immediately Packed on Ice N ____ Y ____

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote # **119503**

Date Results Needed

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
OCD-8A	Grab	GW				11	X	X	X		X	X	X	X	X			
MW-1R	Grab	GW		4/4/18	1245	8	X	X		X	X	X	X					
MW-15	Grab	GW		4/4/18	1330	10	X	X	X	X	X	X	X					20
OCD-1R	Grab	GW		4/4/18	1420	10	X	X	X	X	X	X	X					21
OCD-2A	Grab	GW		4/4/18	1505	10	X	X	X	X	X	X	X					22
OCD-3	Grab	GW		4/4/18	1550	10	X	X	X	X	X	X	X					23
OCD-4	Grab	GW		4/4/18	1635	10	X	X	X	X	X	X	X					24
MW-11A	Grab	GW		4/4/18	1800	10	X	X	X	X	X	X	X					25
OCD-5	Grab	GW		4/4/18	1720	10	X	X	X	X	X	X	X					26
MW-87	Grab	GW		4/4/18	0835	10	X	X	X	X	X	X	X					27
																		28

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: NP __Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach °C Bottles Received: 327
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Chain of Custody Page 5 of 6

ESC
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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

TRC Solutions - Austin, TX **505 E. Huntland Dr, Ste 250** **Austin, TX 78752**	Billing Information: **Accounts Payable** **21 Griffin Road North** **Windsor, CT 06095**
Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**
Project Description: **EP Spring 2018**	City/State Collected: **Artesia, NM**
Phone: **512-684-3170** Fax:	Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-EP**	
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **EP (Navajo - Artesia)**
P.O. #	Quote # **119503**
Collected by (signature):	Date Results Needed
Immediately Packed on Ice N ____ Y ____	

Rush? (Lab MUST Be Notified)
____ Same Day ____ Five Day
____ Next Day ____ 5 Day (Rad Only)
____ Two Day ____ 10 Day (Rad Only)
____ Three Day

L # 983825
Table #
Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:
Shipped Via:

Pres Chk

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-18A	**Grab**	**GW**		**4/4/18**	**0925**	**9**	X	X			X	X	X	X	X			29
MW-70	**Grab**	**GW**		**4/4/18**	**1010**	**10**	X	X	X	X	X	X	X					30
MW-124	**Grab**	**GW**		**4/4/18**	**1055**	**10**	X	X	X	X	X	X	X					31
DUP-EP-01	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
DUP-EP-02	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
DUP-EP-03	**Grab**	**GW**		**4/4/18**	**1100**	**10**	X	X	X	X	X	X	X					32
EB-EP-01	**Grab**	**GW**		**4/4/18**	**0935**	**10**	X	X	X	X	X	X	X					33
EB-EP-02	**Grab**	**GW**		**4/4/18**	**1115**	**10**	X	X	X	X	X	X	X					34
EB-EP-03	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
EB-EP-04	**Grab**	**GW**		**4/4/18**	**1635**	**10**	X	X	X	X	X	X	X					35

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP __Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 2 [✓ HCL] / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attn °C	Bottles Received: 327
If preservation required by Login: Date/Time					
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18	Time: 0845
Hold:	Condition: NCF / [✓ OK]				

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page 6 of 6

ESC
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YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. #

Collected by (signature):

Immediately Packed on Ice N ____ Y ____

Rush? (Lab MUST Be Notified)
____ Same Day ____ Five Day
____ Next Day ____ 5 Day (Rad Only)
____ Two Day ____ 10 Day (Rad Only)
____ Three Day

Quote # **119503**

Date Results Needed

L# 983825
Table #
Acctnum: **TRCATX**
Template: **T133265**
Prelogin: **P641326**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
TRIP BLANK-EP-01	**Grab**	**GW**		**4/4/18**	-	**1**	X											36
TRIP BLANK-EP-02	**Grab**	**GW**				**1**	X											
TRIP BLANK-EP-03	**Grab**	**GW**		**4/4/18**	-	**1**	X											37

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ~~NP~~ __Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 2 [✓ HCl] / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach °C Bottles Received: 327	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	Hold: Condition: NCF / [✓ OK]

Chain of Custody Page 1 of 4

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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: EP Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: EP (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
- ___ Same Day 200%
- ___ Next Day 100%
- ___ Two Day 50%
- ___ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

Immediately Packed on Ice N ___ Y ✓

L #

Table #

Acctnum: **TRCATX**

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-1R	Grab	GW		4/4/18	1245		✓	✓		✓		✓	✓	✓				
MW-3	Grab	GW		4/4/18	1225		✓	✓	✓	✓		✓	✓	✓				
DUP-EP-03	Grab	GW		4/4/18	1100		✓	✓	✓	✓		✓	✓	✓				
MW-11A	Grab	GW		4/4/18	1800		✓	✓	✓	✓		✓	✓	✓				
MW-15	Grab	GW		4/4/18	1330		✓	✓	✓	✓		✓	✓	✓				
MW-18A	Grab	GW		4/4/18	925		✓	✓			✓	✓	✓	✓	✓			
MW-70	Grab	GW		4/4/18	1010		✓	✓	✓	✓		✓	✓	✓				
MW-72	Grab	GW		4/4/18	1710		✓	✓	✓	✓		✓	✓	✓				
MW-73	Grab	GW		4/4/18	840		✓	✓	✓	✓		✓	✓	✓				
Trip Blank- EP-01	Grab	GW		4/4/18	—		✓											

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ________	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: [illegible] °C Bottles Received: 327	COC Seal Intact: ___ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	pH Checked: NCF:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 2 of 4

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: Julie Speer
Email To: jspeer@trcwsolutions.com
Project Description: EP Spring 2018
City/State Collected: Artesia, NM
Phone: 512-684-3170
Fax:
Client Project #
Lab Project #
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID #: EP (Navajo - Artesia)
P.O. #: 119503
Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%
Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes
Immediately Packed on Ice N ___ Y ✓

L #
Table #
Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-74	Grab	GW		4/4/18	925		✓	✓	✓	✓		✓	✓	✓				
EB-EP-01	Grab	GW		4/4/18	935		✓	✓	✓	✓		✓	✓	✓				
MW-76	Grab	GW		4/4/18	1055		✓	✓	✓	✓		✓	✓	✓				
MW-78	Grab	GW		4/4/18	1010		✓	✓	✓	✓		✓	✓	✓				
MW-79	Grab	GW		4/4/18	1625		✓	✓	✓	✓		✓	✓	✓				
EB-EP-04	Grab	GW		4/4/18	1635		✓	✓	✓	✓		✓	✓	✓				
MW-80	Grab	GW		4/4/18	1540		✓	✓	✓	✓		✓	✓	✓				
MW-81	Grab	GW		4/4/18	1455		✓	✓	✓	✓		✓	✓	✓				
MW-82	Grab	GW		4/4/18	1325		✓	✓	✓	✓		✓	✓	✓				
MW-83	Grab	GW		4/4/18	1140		✓	✓	✓	✓		✓	✓	✓				

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ___________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________
Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach °C Bottles Received: 327
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845

Condition: (lab use only)
COC Seal Intact: ___ Y ___ N ___ NA
pH Checked:
NCF:

Chain of Custody Page 3 of 4

ESC
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YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer
Email To: jspeer@trcwsolutions.com
Project Description: EP Spring 2018
City/State Collected: Artesia, NM
Phone: 512-684-3170
Fax:
Client Project #
Lab Project #
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID #: EP (Navajo - Artesia)
P.O. #: 119503
Collected by (signature):
Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

L #
Table #
Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-84	Grab	GW		4/4/18	1410		✓	✓	✓	✓		✓	✓	✓				
MW-87	Grab	GW		4/4/18	835		✓	✓	✓	✓		✓	✓	✓				
MW-124	Grab	GW		4/4/18	1055		✓	✓	✓	✓		✓	✓	✓				
EB-EP-02	Grab	GW		4/4/18	1115		✓	✓	✓	✓		✓	✓	✓				
OCD-1R	Grab	GW		4/4/18	1420		✓	✓	✓	✓		✓	✓	✓				
Trip Blank- EP-03	Grab	GW		4/4/18	—		✓											
OCD-2A	Grab	GW		4/4/18	1505		✓	✓	✓	✓		✓	✓	✓				
OCD-3	Grab	GW		4/4/18	1550		✓	✓	✓	✓		✓	✓	✓				
OCD-4	Grab	GW		4/4/18	1635		✓	✓	✓	✓		✓	✓	✓				
OCD-5	Grab	GW		4/4/18	1720		✓	✓	✓	✓		✓	✓	✓				

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

pH ________ Temp ________
Flow ________ Other ________

Remarks: Diss. metals are field-filtered.

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach °C Bottles Received: 327	COC Seal Intact: ___ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	pH Checked: NCF:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 4 of 4

ESC
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YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: EP Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

L #

Table #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: EP (Navajo - Artesia)

P.O. #: 119503

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
OCD-6	Grab	GW		4/4/18	1755		✓	✓	✓	✓		✓	✓	✓				
OCD-7AR	Grab	GW		4/4/18	1840		✓	✓	✓	✓		✓	✓	✓				
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ___________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C Bottles Received: 3-7	COC Seal Intact: ___ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 845	pH Checked: NCF:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 1 of 1

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: EP Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170
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Client Project #

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Site/Facility ID #: EP (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

L #
Table #
Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-2A	Grab	GW		4/5/18	1005		✓	✓	✓	✓		✓	✓	✓				
MW-6A	Grab	GW		4/5/18	930		✓	✓	✓	✓		✓	✓	✓				
MW-120	Grab	GW		4/5/18	1015		✓	✓	✓	✓		✓	✓	✓				
MW-121	Grab	GW		4/5/18	1100		✓	✓	✓	✓		✓	✓	✓				
MW-122	Grab	GW		4/5/18	920		✓	✓	✓	✓		✓	✓	✓				
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________
Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18 GS	Time: 17:20 GS	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ________	Condition: (lab use only)
Relinquished by : (Signature)	Date: per email	Time:	Received by: (Signature)	Temp: See attl °C Bottles Received: 327	COC Seal Intact: ___ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	pH Checked: NCF:

① 4269 9211 4819 (1.7)
② 4269 9213 4020 (2.3)
③ 4269 9213 4111 (.2)
④ 4269 9213 4155 (1.7)
⑤ 4269 9211 4820 (2.4)
⑥ 4269 9211 4808 (1.7)
⑦ 4269 9211 4830 (1.2)
⑧ 4269 9211 4852 (.5)
⑨ 4269 9211 4841 (.6)
⑩ 4269 9213 4052 (1.1)
⑪ 4269 9213 1763 (.9)
⑫ 4269 9213 4074 (.2)
⑬ 4269 9213 4019 (1.5)
⑭ 4269 9213 4144 (3.2)
⑮ 4269 9213 4041 (2.1)
⑯ 4269 9212 1660 (.1)
⑰ 4269 9212 1589 (3.1)
⑱ 4269 9213 4035 (.9)
⑲ 4269 9213 1774 (2.1)
⑳ 4269 9213 4063 (1.3)

ANALYTICAL REPORT

April 16, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L983842
Samples Received:	04/06/2018
Project Number:	294318.0000.0000.
Description:	TEL Spring 2018
Site:	TEL - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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	Collected by	Collected date/time	Received date/time
MW-49 L983842-01 GW	Scott Ude / HMI Team	04/04/18 09:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1095633	50	04/10/18 14:52	04/10/18 14:52	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	10	04/07/18 10:38	04/09/18 17:17	KK
Wet Chemistry by Method 9056A	WG1094925	1	04/08/18 05:02	04/08/18 05:02	DR
Wet Chemistry by Method 9056A	WG1094925	10	04/08/18 05:17	04/08/18 05:17	DR
Mercury by Method 7470A	WG1095322	1	04/09/18 07:03	04/09/18 14:45	EL
Mercury by Method 7470A	WG1095325	1	04/09/18 11:28	04/10/18 11:28	ABL
Metals (ICP) by Method 6010B	WG1095146	1	04/09/18 19:49	04/10/18 01:06	TRB
Metals (ICP) by Method 6010B	WG1095189	1	04/10/18 08:21	04/10/18 14:55	ST
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/10/18 18:56	JPD
Metals (ICPMS) by Method 6020	WG1095151	1	04/09/18 08:55	04/11/18 13:51	JPD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 19:16	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095730	5	04/10/18 18:54	04/10/18 18:54	ACE
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095169	10	04/07/18 22:08	04/07/18 22:08	JHH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095393	1	04/08/18 18:16	04/09/18 22:12	TH

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1870		2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	04/10/2018 14:52	WG1095633

Sample Narrative:

L983842-01 WG1095633: Diluted due to sulfide interference

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.0180	0.0500	10	04/09/2018 17:17	WG1094975

Sample Narrative:

L983842-01 WG1094975: diluted to matrix interference. high sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	379		0.519	10.0	10	04/08/2018 05:17	WG1094925
Fluoride	1.42		0.00990	0.100	1	04/08/2018 05:02	WG1094925
Sulfate	585		0.774	50.0	10	04/08/2018 05:17	WG1094925

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/09/2018 14:45	WG1095322
Mercury,Dissolved	U		0.0000490	0.000200	1	04/10/2018 11:28	WG1095325

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.740		0.0126	0.200	1	04/10/2018 01:06	WG1095146
Boron,Dissolved	0.764		0.0126	0.200	1	04/10/2018 14:55	WG1095189

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00627		0.000250	0.00200	1	04/10/2018 18:56	WG1095151
Arsenic,Dissolved	0.00484		0.000250	0.00200	1	04/12/2018 19:16	WG1095157
Barium	0.0565		0.000360	0.00500	1	04/10/2018 18:56	WG1095151
Barium,Dissolved	0.0515		0.000360	0.00500	1	04/12/2018 19:16	WG1095157
Cadmium	U		0.000160	0.00100	1	04/10/2018 18:56	WG1095151
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 19:16	WG1095157
Calcium	226		0.0460	1.00	1	04/10/2018 18:56	WG1095151
Chromium	U		0.000540	0.00200	1	04/10/2018 18:56	WG1095151
Chromium,Dissolved	0.00163	B J	0.000540	0.00200	1	04/12/2018 19:16	WG1095157
Cobalt	U		0.000260	0.00200	1	04/10/2018 18:56	WG1095151
Cobalt,Dissolved	U		0.000260	0.00200	1	04/12/2018 19:16	WG1095157
Iron	0.321		0.0150	0.100	1	04/10/2018 18:56	WG1095151
Iron,Dissolved	0.0200	B J	0.0150	0.100	1	04/12/2018 19:16	WG1095157

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Lead	0.00122	B J	0.000240	0.00200	1	04/11/2018 13:51	WG1095151
Lead,Dissolved	0.000500	J	0.000240	0.00200	1	04/12/2018 19:16	WG1095157
Manganese	0.197		0.000250	0.00500	1	04/10/2018 18:56	WG1095151
Manganese,Dissolved	0.196		0.000250	0.00500	1	04/12/2018 19:16	WG1095157
Nickel	0.00655		0.000350	0.00200	1	04/10/2018 18:56	WG1095151
Nickel,Dissolved	0.00712		0.000350	0.00200	1	04/12/2018 19:16	WG1095157
Potassium	3.12		0.0370	1.00	1	04/10/2018 18:56	WG1095151
Selenium	0.000591	J	0.000380	0.00200	1	04/10/2018 18:56	WG1095151
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 19:16	WG1095157
Sodium	341		0.110	1.00	1	04/10/2018 18:56	WG1095151
Uranium	U		0.000330	0.0100	1	04/11/2018 13:51	WG1095151
Uranium,Dissolved	U		0.000330	0.0100	1	04/12/2018 19:16	WG1095157
Vanadium	0.00110	J	0.000180	0.00500	1	04/10/2018 18:56	WG1095151
Vanadium,Dissolved	0.000384	J	0.000180	0.00500	1	04/12/2018 19:16	WG1095157

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	4.42		0.157	0.500	5	04/10/2018 18:54	WG1095730
(S) a,a,a-Trifluorotoluene(FID)	*99.2*			*77.0-122*		*04/10/2018 18:54*	WG1095730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.100	0.500	10	04/07/2018 22:08	WG1095169
Benzene	0.542		0.00331	0.0100	10	04/07/2018 22:08	WG1095169
Bromodichloromethane	U		0.00380	0.0100	10	04/07/2018 22:08	WG1095169
Bromoform	U		0.00469	0.0100	10	04/07/2018 22:08	WG1095169
Bromomethane	U		0.00866	0.0500	10	04/07/2018 22:08	WG1095169
n-Butylbenzene	0.00413	J	0.00361	0.0100	10	04/07/2018 22:08	WG1095169
sec-Butylbenzene	0.00648	J	0.00365	0.0100	10	04/07/2018 22:08	WG1095169
Carbon disulfide	0.00351	J	0.00275	0.0100	10	04/07/2018 22:08	WG1095169
Carbon tetrachloride	U		0.00379	0.0100	10	04/07/2018 22:08	WG1095169
Chlorobenzene	U		0.00348	0.0100	10	04/07/2018 22:08	WG1095169
Chlorodibromomethane	U		0.00327	0.0100	10	04/07/2018 22:08	WG1095169
Chloroethane	U		0.00453	0.0500	10	04/07/2018 22:08	WG1095169
Chloroform	U		0.00324	0.0500	10	04/07/2018 22:08	WG1095169
Chloromethane	U		0.00276	0.0250	10	04/07/2018 22:08	WG1095169
1,2-Dibromoethane	U		0.00381	0.0100	10	04/07/2018 22:08	WG1095169
1,1-Dichloroethane	U		0.00259	0.0100	10	04/07/2018 22:08	WG1095169
1,2-Dichloroethane	U		0.00361	0.0100	10	04/07/2018 22:08	WG1095169
1,1-Dichloroethene	U		0.00398	0.0100	10	04/07/2018 22:08	WG1095169
cis-1,2-Dichloroethene	U		0.00260	0.0100	10	04/07/2018 22:08	WG1095169
trans-1,2-Dichloroethene	U		0.00396	0.0100	10	04/07/2018 22:08	WG1095169
1,2-Dichloropropane	U		0.00306	0.0100	10	04/07/2018 22:08	WG1095169
cis-1,3-Dichloropropene	U		0.00418	0.0100	10	04/07/2018 22:08	WG1095169
trans-1,3-Dichloropropene	U		0.00419	0.0100	10	04/07/2018 22:08	WG1095169
Ethylbenzene	0.0135		0.00384	0.0100	10	04/07/2018 22:08	WG1095169
Isopropylbenzene	0.0393		0.00326	0.0100	10	04/07/2018 22:08	WG1095169
p-Isopropyltoluene	U		0.00350	0.0100	10	04/07/2018 22:08	WG1095169
2-Butanone (MEK)	U		0.0393	0.100	10	04/07/2018 22:08	WG1095169
2-Hexanone	U		0.0382	0.100	10	04/07/2018 22:08	WG1095169
Methylene Chloride	U		0.0100	0.0500	10	04/07/2018 22:08	WG1095169
4-Methyl-2-pentanone (MIBK)	U		0.0214	0.100	10	04/07/2018 22:08	WG1095169
Methyl tert-butyl ether	0.113		0.00367	0.0100	10	04/07/2018 22:08	WG1095169

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Naphthalene	0.0159	J	0.0100	0.0500	10	04/07/2018 22:08	WG1095169
n-Propylbenzene	0.0427		0.00349	0.0100	10	04/07/2018 22:08	WG1095169
Styrene	U		0.00307	0.0100	10	04/07/2018 22:08	WG1095169
1,1,1,2-Tetrachloroethane	U		0.00385	0.0100	10	04/07/2018 22:08	WG1095169
1,1,2,2-Tetrachloroethane	U		0.00130	0.0100	10	04/07/2018 22:08	WG1095169
Tetrachloroethene	U		0.00372	0.0100	10	04/07/2018 22:08	WG1095169
Toluene	0.00637	J	0.00412	0.0100	10	04/07/2018 22:08	WG1095169
1,1,1-Trichloroethane	U		0.00319	0.0100	10	04/07/2018 22:08	WG1095169
1,1,2-Trichloroethane	U		0.00383	0.0100	10	04/07/2018 22:08	WG1095169
Trichloroethene	U		0.00398	0.0100	10	04/07/2018 22:08	WG1095169
1,2,4-Trimethylbenzene	0.0861		0.00373	0.0100	10	04/07/2018 22:08	WG1095169
1,3,5-Trimethylbenzene	0.0151		0.00387	0.0100	10	04/07/2018 22:08	WG1095169
Vinyl chloride	U		0.00259	0.0100	10	04/07/2018 22:08	WG1095169
o-Xylene	U		0.00341	0.0100	10	04/07/2018 22:08	WG1095169
m&p-Xylene	0.133		0.00719	0.0200	10	04/07/2018 22:08	WG1095169
Xylenes, Total	0.133		0.0106	0.0300	10	04/07/2018 22:08	WG1095169
(S) Toluene-d8	*97.8*			*80.0-120*		*04/07/2018 22:08*	WG1095169
(S) Dibromofluoromethane	*105*			*76.0-123*		*04/07/2018 22:08*	WG1095169
(S) 4-Bromofluorobenzene	*93.1*			*80.0-120*		*04/07/2018 22:08*	WG1095169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	4.48		0.0247	0.100	1	04/09/2018 22:12	WG1095393
(S) o-Terphenyl	*123*			*31.0-160*		*04/09/2018 22:12*	WG1095393

WG1096152

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983842-01

Method Blank (MB)

(MB) R3301374-1 04/11/18 15:53

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983849-02 Original Sample (OS) • Duplicate (DUP)

(OS) L983849-02 04/11/18 15:53 • (DUP) R3301374-4 04/11/18 15:53

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	4700	5090	1	7.97	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301374-2 04/11/18 15:53 • (LCSD) R3301374-3 04/11/18 15:53

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8640	8780	98.2	99.8	85.0-115			1.61	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1095633

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L983842-01

Method Blank (MB)

(MB) R3300578-1 04/10/18 14:19

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983842-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983842-01 04/10/18 14:52 • (DUP) R3300578-6 04/10/18 14:53

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	50	0.000		20

Sample Narrative:

OS: Diluted due to sulfide interference

L983693-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983693-01 04/10/18 14:22 • (DUP) R3300578-4 04/10/18 14:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300578-2 04/10/18 14:20 • (LCSD) R3300578-3 04/10/18 14:21

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.62	3.75	90.5	93.8	90.0-110			3.53	20

L983693-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L983693-03 04/10/18 14:25 • (MS) R3300578-5 04/10/18 14:26

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	ND	2.09	82.4	1	90.0-110	J6

WG1095633

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L983842-01

L983846-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983846-01 04/10/18 14:54 • (MS) R3300578-7 04/10/18 14:55 • (MSD) R3300578-8 04/10/18 14:56

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	2.50	0.201	2.15	2.10	77.9	76.0	1	90.0-110	J6	J6	2.26	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1094975

Wet Chemistry by Method 4500CN E-2011

QUALITY CONTROL SUMMARY

L983842-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300284-1 04/09/18 17:03

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L983514-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983514-01 04/09/18 17:08 • (DUP) R3300284-4 04/09/18 17:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L983865-22 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-22 04/09/18 17:24 • (DUP) R3300284-5 04/09/18 17:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300284-2 04/09/18 17:04 • (LCSD) R3300284-3 04/09/18 17:05

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0992	0.0906	99.2	90.6	85.0-115			9.06	20

QUALITY CONTROL SUMMARY

L983842-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299947-1 04/07/18 13:57

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983825-33 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-33 04/07/18 18:30 • (DUP) R3299947-4 04/07/18 18:45

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	U	0.000	1	0.000		15
Fluoride	U	0.000	1	0.000		15
Sulfate	U	0.000	1	0.000		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299947-2 04/07/18 14:12 • (LCSD) R3299947-3 04/07/18 14:27

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.3	39.2	98.3	98.1	80.0-120			0.209	15
Fluoride	8.00	8.06	8.04	101	100	80.0-120			0.309	15
Sulfate	40.0	38.9	38.9	97.2	97.3	80.0-120			0.112	15

L983825-33 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-33 04/07/18 18:30 • (MS) R3299947-5 04/07/18 19:01 • (MSD) R3299947-6 04/07/18 19:16

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	U	50.3	51.0	101	102	1	80.0-120			1.37	15
Fluoride	5.00	U	5.22	5.09	104	102	1	80.0-120			2.42	15
Sulfate	50.0	U	50.5	50.2	101	100	1	80.0-120			0.473	15

WG1095322

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983842-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300321-1 04/09/18 14:13

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300321-2 04/09/18 14:15 • (LCSD) R3300321-3 04/09/18 14:17

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	0.00290	0.00295	96.8	98.2	80.0-120			1.46	20

L983497-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983497-01 04/09/18 14:20 • (MS) R3300321-4 04/09/18 14:22 • (MSD) R3300321-5 04/09/18 14:24

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	ND	0.00310	0.00306	103	102	1	75.0-125			1.09	20

WG1095325

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983842-01

Method Blank (MB)

(MB) R3300467-1 04/10/18 10:58

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury,Dissolved	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300467-2 04/10/18 11:00 • (LCSD) R3300467-3 04/10/18 11:03

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury,Dissolved	0.00300	0.00317	0.00311	106	104	80.0-120			1.70	20

L983825-29 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-29 04/10/18 11:05 • (MS) R3300467-4 04/10/18 11:12 • (MSD) R3300467-5 04/10/18 11:14

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury,Dissolved	0.00300	U	0.00282	0.00300	94.2	100	1	75.0-125			6.06	20

WG1095146

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983842-01

Method Blank (MB)

(MB) R3300326-1 04/10/18 00:21

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron	0.0169	J	0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300326-2 04/10/18 00:23 • (LCSD) R3300326-3 04/10/18 00:26

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron	1.00	1.02	1.04	102	104	80.0-120			1.82	20

L983841-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983841-01 04/10/18 00:28 • (MS) R3300326-5 04/10/18 00:34 • (MSD) R3300326-6 04/10/18 00:36

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1.00	ND	1.06	1.08	101	103	1	75.0-125			1.83	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1095189

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983842-01

Method Blank (MB)

(MB) R3300622-1 04/10/18 14:35

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron,Dissolved	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300622-2 04/10/18 14:37 • (LCSD) R3300622-3 04/10/18 14:40

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	1.01	1.03	101	103	80.0-120			2.74	20

L983860-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983860-05 04/10/18 14:42 • (MS) R3300622-5 04/10/18 14:47 • (MSD) R3300622-6 04/10/18 14:50

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	0.147	1.17	1.15	102	99.9	1	75.0-125			1.70	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

QUALITY CONTROL SUMMARY

L983842-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300627-1 04/10/18 16:41

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	0.0640	J	0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Vanadium	U		0.000180	0.00500

Method Blank (MB)

(MB) R3300910-1 04/11/18 11:53

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Lead	0.000587	J	0.000240	0.00200
Uranium	U		0.000330	0.0100

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300627-2 04/10/18 16:45 • (LCSD) R3300627-3 04/10/18 16:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0502	0.0507	100	101	80.0-120			1.06	20
Barium	0.0500	0.0484	0.0487	96.7	97.4	80.0-120			0.746	20
Cadmium	0.0500	0.0503	0.0479	101	95.7	80.0-120			4.90	20
Calcium	5.00	5.26	5.08	105	102	80.0-120			3.57	20
Chromium	0.0500	0.0506	0.0478	101	95.6	80.0-120			5.75	20
Cobalt	0.0500	0.0511	0.0513	102	103	80.0-120			0.392	20
Iron	5.00	5.03	4.98	101	99.6	80.0-120			1.01	20
Manganese	0.0500	0.0497	0.0479	99.4	95.8	80.0-120			3.65	20
Nickel	0.0500	0.0518	0.0509	104	102	80.0-120			1.66	20
Potassium	5.00	5.57	5.00	111	99.9	80.0-120			10.9	20
Selenium	0.0500	0.0504	0.0486	101	97.1	80.0-120			3.66	20
Sodium	5.00	5.15	4.94	103	98.7	80.0-120			4.17	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300627-2 04/10/18 16:45 • (LCSD) R3300627-3 04/10/18 16:49

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Vanadium	0.0500	0.0494	0.0487	98.8	97.4	80.0-120			1.47	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300910-2 04/11/18 11:57 • (LCSD) R3300910-3 04/11/18 12:01

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Lead	0.0500	0.0486	0.0478	97.2	95.5	80.0-120			1.79	20
Uranium	0.0500	0.0476	0.0467	95.2	93.5	80.0-120			1.88	20

L983754-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983754-02 04/10/18 16:53 • (MS) R3300627-5 04/10/18 17:01 • (MSD) R3300627-6 04/10/18 17:05

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	U	0.0499	0.0498	99.7	99.6	1	75.0-125			0.115	20
Barium	0.0500	0.0150	0.0632	0.0640	96.5	98.0	1	75.0-125			1.19	20
Cadmium	0.0500	U	0.0498	0.0499	99.6	99.7	1	75.0-125			0.109	20
Calcium	5.00	35.4	40.0	40.3	91.8	96.5	1	75.0-125			0.582	20
Chromium	0.0500	U	0.0485	0.0473	97.0	94.6	1	75.0-125			2.59	20
Cobalt	0.0500	U	0.0502	0.0511	100	102	1	75.0-125			1.73	20
Potassium	5.00	5.33	9.26	9.24	78.6	78.3	1	75.0-125			0.144	20
Iron	5.00	1.75	6.64	6.65	97.9	98.0	1	75.0-125			0.0736	20
Manganese	0.0500	0.174	0.223	0.225	98.6	102	1	75.0-125			0.852	20
Nickel	0.0500	U	0.0512	0.0501	102	100	1	75.0-125			2.18	20
Selenium	0.0500	U	0.0519	0.0523	104	105	1	75.0-125			0.784	20
Sodium	5.00	52.2	56.7	56.6	89.0	88.3	1	75.0-125			0.0593	20
Vanadium	0.0500	U	0.0491	0.0488	98.1	97.5	1	75.0-125			0.620	20

L983754-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983754-02 04/11/18 12:05 • (MS) R3300910-5 04/11/18 12:14 • (MSD) R3300910-6 04/11/18 12:18

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Lead	0.0500	U	0.0475	0.0472	94.9	94.3	1	75.0-125			0.640	20
Uranium	0.0500	U	0.0469	0.0472	93.7	94.3	1	75.0-125			0.624	20

QUALITY CONTROL SUMMARY

L983842-01

Method Blank (MB)

(MB) R3301434-1 04/12/18 18:40

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Chromium,Dissolved	0.000737	J	0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	0.0330	J	0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301434-2 04/12/18 18:44 • (LCSD) R3301434-3 04/12/18 18:48

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Arsenic,Dissolved	0.0500	0.0511	0.0510	102	102	80.0-120			0.233	20
Barium,Dissolved	0.0500	0.0505	0.0488	101	97.7	80.0-120			3.39	20
Cadmium,Dissolved	0.0500	0.0538	0.0541	108	108	80.0-120			0.581	20
Chromium,Dissolved	0.0500	0.0515	0.0525	103	105	80.0-120			1.96	20
Cobalt,Dissolved	0.0500	0.0541	0.0547	108	109	80.0-120			1.12	20
Iron,Dissolved	5.00	5.21	5.27	104	105	80.0-120			1.20	20
Lead,Dissolved	0.0500	0.0511	0.0517	102	103	80.0-120			1.11	20
Manganese,Dissolved	0.0500	0.0505	0.0504	101	101	80.0-120			0.231	20
Nickel,Dissolved	0.0500	0.0547	0.0546	109	109	80.0-120			0.123	20
Selenium,Dissolved	0.0500	0.0501	0.0512	100	102	80.0-120			2.31	20
Uranium,Dissolved	0.0500	0.0512	0.0518	102	104	80.0-120			1.05	20
Vanadium,Dissolved	0.0500	0.0505	0.0519	101	104	80.0-120			2.61	20

L983855-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-11 04/12/18 18:52 • (MS) R3301434-5 04/12/18 19:00 • (MSD) R3301434-6 04/12/18 19:04

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic,Dissolved	0.0500	U	0.0521	0.0514	104	103	1	75.0-125			1.35	20
Barium,Dissolved	0.0500	U	0.0522	0.0493	104	98.7	1	75.0-125			5.55	20
Cadmium,Dissolved	0.0500	U	0.0546	0.0531	109	106	1	75.0-125			2.82	20

WG1095157

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983842-01

L983855-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-11 04/12/18 18:52 • (MS) R3301434-5 04/12/18 19:00 • (MSD) R3301434-6 04/12/18 19:04

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium,Dissolved	0.0500	0.00157	0.0535	0.0523	104	101	1	75.0-125			2.32	20
Cobalt,Dissolved	0.0500	U	0.0549	0.0548	110	110	1	75.0-125			0.112	20
Iron,Dissolved	5.00	0.0224	5.28	5.28	105	105	1	75.0-125			0.125	20
Lead,Dissolved	0.0500	U	0.0534	0.0517	107	103	1	75.0-125			3.11	20
Manganese,Dissolved	0.0500	0.000348	0.0513	0.0513	102	102	1	75.0-125			0.0270	20
Nickel,Dissolved	0.0500	0.000565	0.0562	0.0554	111	110	1	75.0-125			1.41	20
Selenium,Dissolved	0.0500	U	0.0544	0.0508	109	102	1	75.0-125			6.95	20
Uranium,Dissolved	0.0500	U	0.0525	0.0520	105	104	1	75.0-125			1.06	20
Vanadium,Dissolved	0.0500	0.000226	0.0521	0.0520	104	104	1	75.0-125			0.187	20

WG1095730

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L983842-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300512-3 04/10/18 10:28

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*98.7*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300512-1 04/10/18 09:22 • (LCSD) R3300512-2 04/10/18 09:44

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) Low Fraction	5.50	6.26	6.16	114	112	71.0-136			1.66	20
(S) a,a,a-Trifluorotoluene(FID)				*106*	*108*	*77.0-122*				

WG1095169

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983842-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301130-2 04/07/18 21:46

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3301130-2 04/07/18 21:46

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*96.5*			*80.0-120*
(S) Dibromofluoromethane	*106*			*76.0-123*
(S) 4-Bromofluorobenzene	*92.0*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3301130-1 04/07/18 20:42

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.120	95.8	10.0-160	
Benzene	0.0250	0.0273	109	69.0-123	
Bromodichloromethane	0.0250	0.0245	98.1	76.0-120	
Bromoform	0.0250	0.0227	90.8	67.0-132	
Bromomethane	0.0250	0.0326	130	18.0-160	
n-Butylbenzene	0.0250	0.0270	108	72.0-126	
sec-Butylbenzene	0.0250	0.0251	100	74.0-121	
Carbon disulfide	0.0250	0.0277	111	55.0-127	
Carbon tetrachloride	0.0250	0.0278	111	63.0-122	
Chlorobenzene	0.0250	0.0247	98.8	79.0-121	
Chlorodibromomethane	0.0250	0.0250	99.8	75.0-125	
Chloroethane	0.0250	0.0312	125	47.0-152	
Chloroform	0.0250	0.0259	104	72.0-121	
Chloromethane	0.0250	0.0265	106	48.0-139	
1,2-Dibromoethane	0.0250	0.0247	98.8	77.0-123	
1,1-Dichloroethane	0.0250	0.0295	118	70.0-126	
1,2-Dichloroethane	0.0250	0.0286	114	67.0-126	
1,1-Dichloroethene	0.0250	0.0262	105	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0269	108	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0273	109	71.0-121	
1,2-Dichloropropane	0.0250	0.0263	105	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0259	103	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0248	99.0	74.0-127	

WG1095169

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983842-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS)

(LCS) R3301130-1 04/07/18 20:42

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.0250	0.0240	96.1	77.0-120	
2-Hexanone	0.125	0.122	97.9	58.0-147	
Isopropylbenzene	0.0250	0.0247	98.6	75.0-120	
p-Isopropyltoluene	0.0250	0.0243	97.2	74.0-126	
2-Butanone (MEK)	0.125	0.142	114	37.0-158	
Methylene Chloride	0.0250	0.0266	107	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.131	105	59.0-143	
Methyl tert-butyl ether	0.0250	0.0286	114	64.0-123	
Naphthalene	0.0250	0.0261	105	62.0-128	
n-Propylbenzene	0.0250	0.0243	97.1	79.0-120	
Styrene	0.0250	0.0241	96.4	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0248	99.0	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0225	90.0	71.0-122	
Tetrachloroethene	0.0250	0.0245	97.9	70.0-127	
Toluene	0.0250	0.0246	98.3	77.0-120	
1,1,1-Trichloroethane	0.0250	0.0278	111	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0231	92.5	78.0-120	
Trichloroethene	0.0250	0.0256	102	78.0-120	
1,2,4-Trimethylbenzene	0.0250	0.0236	94.6	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0242	96.8	75.0-120	
Vinyl chloride	0.0250	0.0282	113	64.0-133	
Xylenes, Total	0.0750	0.0748	99.7	77.0-120	
o-Xylene	0.0250	0.0255	102	78.0-120	
m&p-Xylenes	0.0500	0.0493	98.6	77.0-120	
(S) Toluene-d8			*95.8*	*80.0-120*	
(S) Dibromofluoromethane			*109*	*76.0-123*	
(S) 4-Bromofluorobenzene			*89.3*	*80.0-120*	

QUALITY CONTROL SUMMARY

L983842-01

Method Blank (MB)

(MB) R3300273-1 04/09/18 13:06

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*98.9*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300273-2 04/09/18 13:26 • (LCSD) R3300273-3 04/09/18 13:47

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.50	1.48	99.8	98.7	50.0-150			1.16	20
(S) o-Terphenyl				*125*	*122*	*31.0-160*				

GLOSSARY OF TERMS

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia[1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky[1,6]	90010
Kentucky[2]	16
Louisiana	AI30792
Louisiana[1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086
Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico[1]	n/a
New York	11742
North Carolina	Env375
North Carolina[1]	DW21704
North Carolina[3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee[1,4]	2006
Texas	T 104704245-17-14
Texas[5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

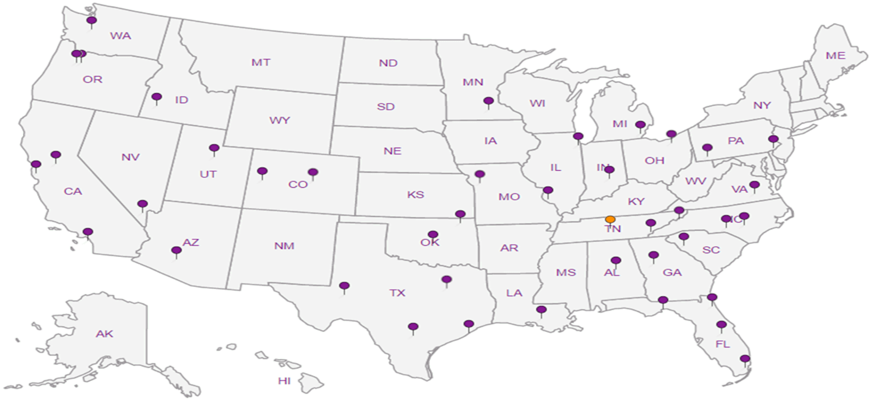
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01
A2LA – ISO 17025[5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003
AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page 1 of 1

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# 983842
M057

Acctnum: **TRCATX**
Template: **T118731**
Prelogin: **P643084**
TSR: **526**
PB:
Shipped Via:

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **TEL Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-TEL**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **TEL (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N___ Y___

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide	Remarks	Sample # (lab only)
										c2				v2			
TEL-4	Grab	GW				10	X	X	X	X	X	X	X				
TEL-3	Grab	GW				10	X	X	X	X	X	X	X				
TEL-2	Grab	GW				10	X	X	X	X	X	X	X				
TEL-1	Grab	GW				10	X	X	X	X	X	X	X				
MW-49	Grab	GW		4/4/18	0955	11	X	X	X		X	X	X	X	X		01
DUP-TEL-01	Grab	GW				10	X	X	X	X	X	X	X				
EB-TEL-01	Grab	GW				10	X	X	X	X	X	X	X				
TRIP BLANK-TEL-01	Grab	GW				1	X										

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP __Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR 0	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach °C	Bottles Received: 11
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18	Time: 0845

If preservation required by Login: Date/Time
Diss Metals 4/6 1726

Hold:

Condition: NCF / [✓ OK]

Company Name/Address:

TRC Solutions - Austin, TX

505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:

Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 1 of 1

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: TEL Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

L# 983842

Table #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: TEL (Navajo - Artesia)

P.O. #: 119503

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
- ___ Same Day 200%
- ___ Next Day 100%
- ___ Two Day 50%
- ___ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes

FAX? ___ No ___ Yes

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	**Cyanide**		Rem./Contaminant	Sample # (lab only)
MW-49	Grab	GW		4/4/18	955		✓	✓	✓		✓	✓	✓	✓	✓			01
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attch °C Bottles Received: 11	COC Seal Intact: ___ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 845	pH Checked: NCF:

① 4269 9211 4819 (1.7)
② 4269 9213 4020 (2.3)
③ 4269 9213 4111 (.2)
④ 4269 9213 4155 (1.7)
⑤ 4269 9211 4320 (2.4)
⑥ 4269 9211 4808 (1.7)
⑦ 4269 9211 4830 (1.2)
⑧ 4269 9211 4252 (.5)
⑨ 4269 9211 4741 (.6)
⑩ 4269 9213 4052 (1.1)
⑪ 4269 9213 1763 (.9)
⑫ 4269 9213 4074 (.2)
⑬ 4269 9213 4619 (1.5)
⑭ 4269 9213 4144 (3.2)
⑮ 4269 9213 4041 (2.1)
⑯ 4269 9212 4660 (.1)
⑰ 4269 9212 1589 (3.1)
⑱ 4269 9213 4035 (.9)
⑲ 4269 9213 1774 (2.1)
⑳ 4269 9213 4063 (1.3)

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LAB SCIENCES
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ANALYTICAL REPORT

April 16, 2018

myESC
REAL TIME DATA ACCESS
a subsidiary of Pace Analytical

TRC Solutions - Austin, TX

Sample Delivery Group:	L983849
Samples Received:	04/06/2018
Project Number:	294318.0000.0000.
Description:	TMD Spring 2018
Site:	TMD - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By:

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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SAMPLE SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-25 L983849-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:18	04/11/18 15:18	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 17:18	04/07/18 17:18	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 17:31	04/07/18 17:31	DR
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 20:28	RDS
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 19:32	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095236	1	04/07/18 20:43	04/07/18 20:43	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095663	1	04/09/18 21:55	04/11/18 21:13	TH

MW-20 L983849-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096152	1	04/11/18 15:15	04/11/18 15:53	EG
Wet Chemistry by Method 353.2	WG1096185	5	04/11/18 15:20	04/11/18 15:20	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 18:13	04/07/18 18:13	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 18:26	04/07/18 18:26	DR
Wet Chemistry by Method 9056A	WG1095384	50	04/09/18 22:43	04/09/18 22:43	MAJ
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 20:47	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 19:36	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095236	1	04/07/18 21:03	04/07/18 21:03	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095663	1	04/09/18 21:55	04/11/18 21:29	TH

NP-1 L983849-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 09:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096185	5	04/11/18 15:21	04/11/18 15:21	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 18:40	04/07/18 18:40	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 18:53	04/07/18 18:53	DR
Wet Chemistry by Method 9056A	WG1095384	50	04/09/18 22:57	04/09/18 22:57	MAJ
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 20:52	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095236	1	04/07/18 21:23	04/07/18 21:23	JAH

MW-8 L983849-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:30	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096185	5	04/11/18 15:22	04/11/18 15:22	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 19:07	04/07/18 19:07	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 19:20	04/07/18 19:20	DR
Wet Chemistry by Method 9056A	WG1095384	50	04/09/18 23:10	04/09/18 23:10	MAJ
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 20:56	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 19:40	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095828	1	04/10/18 18:20	04/10/18 18:20	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095236	1	04/07/18 21:43	04/07/18 21:43	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095663	1	04/09/18 21:55	04/11/18 21:46	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-21 L983849-05 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 17:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096185	5	04/11/18 15:23	04/11/18 15:23	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 19:33	04/07/18 19:33	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 19:47	04/07/18 19:47	DR
Wet Chemistry by Method 9056A	WG1095384	50	04/09/18 23:50	04/09/18 23:50	MAJ
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 21:15	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 19:44	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095828	1	04/10/18 18:41	04/10/18 18:41	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095236	1	04/07/18 22:03	04/07/18 22:03	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095663	1	04/09/18 21:55	04/11/18 22:02	TH

MW-71 L983849-06 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096185	20	04/11/18 15:24	04/11/18 15:24	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	1	04/07/18 10:38	04/09/18 17:18	KK
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 20:00	04/07/18 20:00	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 20:13	04/07/18 20:13	DR
Wet Chemistry by Method 9056A	WG1095384	50	04/10/18 00:03	04/10/18 00:03	MAJ
Mercury by Method 7470A	WG1095322	1	04/09/18 07:03	04/09/18 14:47	EL
Mercury by Method 7470A	WG1095325	1	04/09/18 11:28	04/10/18 11:30	ABL
Metals (ICP) by Method 6010B	WG1095146	1	04/09/18 19:49	04/10/18 01:09	TRB
Metals (ICP) by Method 6010B	WG1095189	1	04/10/18 08:21	04/10/18 14:59	ST
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 22:15	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 19:48	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095236	1	04/07/18 22:22	04/07/18 22:22	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095663	1	04/09/18 21:55	04/11/18 22:19	TH

TRIP BLANK-TMD-01 L983849-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 00:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095236	1	04/07/18 16:28	04/07/18 16:28	JAH

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4080		2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.156		0.0197	0.100	1	04/11/2018 15:18	WG1096185

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1230		1.04	20.0	20	04/07/2018 17:31	WG1095122
Fluoride	1.25		0.00990	0.100	1	04/07/2018 17:18	WG1095122
Sulfate	1770		1.55	100	20	04/07/2018 17:31	WG1095122

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00338		0.000250	0.00200	1	04/15/2018 20:28	WG1095153
Arsenic,Dissolved	0.00236		0.000250	0.00200	1	04/12/2018 19:32	WG1095157
Barium	0.0128		0.000360	0.00500	1	04/15/2018 20:28	WG1095153
Barium,Dissolved	0.0117		0.000360	0.00500	1	04/12/2018 19:32	WG1095157
Calcium	368	V	0.0460	1.00	1	04/15/2018 20:28	WG1095153
Chromium	0.000687	J	0.000540	0.00200	1	04/15/2018 20:28	WG1095153
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 19:32	WG1095157
Iron	0.0314	J	0.0150	0.100	1	04/15/2018 20:28	WG1095153
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 19:32	WG1095157
Lead	0.000330	J	0.000240	0.00200	1	04/15/2018 20:28	WG1095153
Lead,Dissolved	0.000260	J	0.000240	0.00200	1	04/12/2018 19:32	WG1095157
Manganese	0.676	J3 V	0.000250	0.00500	1	04/15/2018 20:28	WG1095153
Manganese,Dissolved	0.228		0.000250	0.00500	1	04/12/2018 19:32	WG1095157
Potassium	4.32		0.0370	1.00	1	04/15/2018 20:28	WG1095153
Selenium	0.00337		0.000380	0.00200	1	04/15/2018 20:28	WG1095153
Selenium,Dissolved	0.00292		0.000380	0.00200	1	04/12/2018 19:32	WG1095157
Sodium	875	V	0.110	1.00	1	04/15/2018 20:28	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 20:43	WG1095236
Benzene	U		0.000331	0.00100	1	04/07/2018 20:43	WG1095236
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 20:43	WG1095236
Bromoform	U		0.000469	0.00100	1	04/07/2018 20:43	WG1095236
Bromomethane	U		0.000866	0.00500	1	04/07/2018 20:43	WG1095236
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 20:43	WG1095236
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 20:43	WG1095236
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 20:43	WG1095236
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 20:43	WG1095236
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 20:43	WG1095236
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 20:43	WG1095236
Chloroethane	U		0.000453	0.00500	1	04/07/2018 20:43	WG1095236
Chloroform	U		0.000324	0.00500	1	04/07/2018 20:43	WG1095236
Chloromethane	U		0.000276	0.00250	1	04/07/2018 20:43	WG1095236
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 20:43	WG1095236
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 20:43	WG1095236

MW-25

Collected date/time: 04/04/18 12:00

SAMPLE RESULTS - 01

L983849

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 20:43	WG1095236
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 20:43	WG1095236
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 20:43	WG1095236
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 20:43	WG1095236
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 20:43	WG1095236
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 20:43	WG1095236
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 20:43	WG1095236
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 20:43	WG1095236
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 20:43	WG1095236
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 20:43	WG1095236
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 20:43	WG1095236
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 20:43	WG1095236
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 20:43	WG1095236
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 20:43	WG1095236
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 20:43	WG1095236
Naphthalene	U		0.00100	0.00500	1	04/07/2018 20:43	WG1095236
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 20:43	WG1095236
Styrene	U		0.000307	0.00100	1	04/07/2018 20:43	WG1095236
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 20:43	WG1095236
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 20:43	WG1095236
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 20:43	WG1095236
Toluene	U		0.000412	0.00100	1	04/07/2018 20:43	WG1095236
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 20:43	WG1095236
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 20:43	WG1095236
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 20:43	WG1095236
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 20:43	WG1095236
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 20:43	WG1095236
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 20:43	WG1095236
o-Xylene	U		0.000341	0.00100	1	04/07/2018 20:43	WG1095236
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 20:43	WG1095236
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 20:43	WG1095236
(S) Toluene-d8	*101*			*80.0-120*		*04/07/2018 20:43*	WG1095236
(S) Dibromofluoromethane	*93.5*			*76.0-123*		*04/07/2018 20:43*	WG1095236
(S) 4-Bromofluorobenzene	*101*			*80.0-120*		*04/07/2018 20:43*	WG1095236

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0327	J	0.0247	0.100	1	04/11/2018 21:13	WG1095663
(S) o-Terphenyl	*92.1*			*31.0-160*		*04/11/2018 21:13*	WG1095663

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4700	J3	2.82	10.0	1	04/11/2018 15:53	WG1096152

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	4.56		0.0985	0.500	5	04/11/2018 15:20	WG1096185

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	525		1.04	20.0	20	04/07/2018 18:26	WG1095122
Fluoride	2.13		0.00990	0.100	1	04/07/2018 18:13	WG1095122
Sulfate	2790		3.87	250	50	04/09/2018 22:43	WG1095384

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00700		0.000250	0.00200	1	04/15/2018 20:47	WG1095153
Arsenic,Dissolved	0.00603		0.000250	0.00200	1	04/12/2018 19:36	WG1095157
Barium	0.0104		0.000360	0.00500	1	04/15/2018 20:47	WG1095153
Barium,Dissolved	0.0107		0.000360	0.00500	1	04/12/2018 19:36	WG1095157
Calcium	537		0.0460	1.00	1	04/15/2018 20:47	WG1095153
Chromium	U		0.000540	0.00200	1	04/15/2018 20:47	WG1095153
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 19:36	WG1095157
Iron	U		0.0150	0.100	1	04/15/2018 20:47	WG1095153
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 19:36	WG1095157
Lead	U		0.000240	0.00200	1	04/15/2018 20:47	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 19:36	WG1095157
Manganese	0.0197		0.000250	0.00500	1	04/15/2018 20:47	WG1095153
Manganese,Dissolved	0.0107		0.000250	0.00500	1	04/12/2018 19:36	WG1095157
Potassium	0.562	J	0.0370	1.00	1	04/15/2018 20:47	WG1095153
Selenium	0.0147		0.000380	0.00200	1	04/15/2018 20:47	WG1095153
Selenium,Dissolved	0.0122		0.000380	0.00200	1	04/12/2018 19:36	WG1095157
Sodium	291		0.110	1.00	1	04/15/2018 20:47	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 21:03	WG1095236
Benzene	U		0.000331	0.00100	1	04/07/2018 21:03	WG1095236
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 21:03	WG1095236
Bromoform	U		0.000469	0.00100	1	04/07/2018 21:03	WG1095236
Bromomethane	U		0.000866	0.00500	1	04/07/2018 21:03	WG1095236
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 21:03	WG1095236
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 21:03	WG1095236
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 21:03	WG1095236
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 21:03	WG1095236
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 21:03	WG1095236
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 21:03	WG1095236
Chloroethane	U		0.000453	0.00500	1	04/07/2018 21:03	WG1095236
Chloroform	U		0.000324	0.00500	1	04/07/2018 21:03	WG1095236
Chloromethane	U		0.000276	0.00250	1	04/07/2018 21:03	WG1095236
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 21:03	WG1095236
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 21:03	WG1095236

MW-20

Collected date/time: 04/04/18 13:40

SAMPLE RESULTS - 02

L983849

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 21:03	WG1095236
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 21:03	WG1095236
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 21:03	WG1095236
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 21:03	WG1095236
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 21:03	WG1095236
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 21:03	WG1095236
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 21:03	WG1095236
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 21:03	WG1095236
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 21:03	WG1095236
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 21:03	WG1095236
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 21:03	WG1095236
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 21:03	WG1095236
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 21:03	WG1095236
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 21:03	WG1095236
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 21:03	WG1095236
Naphthalene	U		0.00100	0.00500	1	04/07/2018 21:03	WG1095236
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 21:03	WG1095236
Styrene	U		0.000307	0.00100	1	04/07/2018 21:03	WG1095236
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 21:03	WG1095236
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 21:03	WG1095236
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 21:03	WG1095236
Toluene	U		0.000412	0.00100	1	04/07/2018 21:03	WG1095236
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 21:03	WG1095236
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 21:03	WG1095236
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 21:03	WG1095236
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 21:03	WG1095236
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 21:03	WG1095236
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 21:03	WG1095236
o-Xylene	U		0.000341	0.00100	1	04/07/2018 21:03	WG1095236
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 21:03	WG1095236
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 21:03	WG1095236
(S) Toluene-d8	*101*			*80.0-120*		*04/07/2018 21:03*	WG1095236
(S) Dibromofluoromethane	*91.7*			*76.0-123*		*04/07/2018 21:03*	WG1095236
(S) 4-Bromofluorobenzene	*98.3*			*80.0-120*		*04/07/2018 21:03*	WG1095236

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0810	J	0.0247	0.100	1	04/11/2018 21:29	WG1095663
(S) o-Terphenyl	*89.3*			*31.0-160*		*04/11/2018 21:29*	WG1095663

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3660		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	5.66		0.0985	0.500	5	04/11/2018 15:21	WG1096185

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	395		1.04	20.0	20	04/07/2018 18:53	WG1095122
Fluoride	2.00		0.00990	0.100	1	04/07/2018 18:40	WG1095122
Sulfate	2210		3.87	250	50	04/09/2018 22:57	WG1095384

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Calcium	421		0.0460	1.00	1	04/15/2018 20:52	WG1095153
Potassium	4.52		0.0370	1.00	1	04/15/2018 20:52	WG1095153
Sodium	342		0.110	1.00	1	04/15/2018 20:52	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 21:23	WG1095236
Benzene	U		0.000331	0.00100	1	04/07/2018 21:23	WG1095236
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 21:23	WG1095236
Bromoform	U		0.000469	0.00100	1	04/07/2018 21:23	WG1095236
Bromomethane	U		0.000866	0.00500	1	04/07/2018 21:23	WG1095236
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 21:23	WG1095236
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 21:23	WG1095236
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 21:23	WG1095236
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 21:23	WG1095236
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 21:23	WG1095236
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 21:23	WG1095236
Chloroethane	U		0.000453	0.00500	1	04/07/2018 21:23	WG1095236
Chloroform	U		0.000324	0.00500	1	04/07/2018 21:23	WG1095236
Chloromethane	U		0.000276	0.00250	1	04/07/2018 21:23	WG1095236
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 21:23	WG1095236
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 21:23	WG1095236
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 21:23	WG1095236
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 21:23	WG1095236
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 21:23	WG1095236
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 21:23	WG1095236
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 21:23	WG1095236
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 21:23	WG1095236
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 21:23	WG1095236
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 21:23	WG1095236
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 21:23	WG1095236
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 21:23	WG1095236
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 21:23	WG1095236
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 21:23	WG1095236
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 21:23	WG1095236
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 21:23	WG1095236

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	0.132		0.000367	0.00100	1	04/07/2018 21:23	WG1095236
Naphthalene	U		0.00100	0.00500	1	04/07/2018 21:23	WG1095236
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 21:23	WG1095236
Styrene	U		0.000307	0.00100	1	04/07/2018 21:23	WG1095236
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 21:23	WG1095236
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 21:23	WG1095236
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 21:23	WG1095236
Toluene	U		0.000412	0.00100	1	04/07/2018 21:23	WG1095236
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 21:23	WG1095236
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 21:23	WG1095236
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 21:23	WG1095236
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 21:23	WG1095236
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 21:23	WG1095236
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 21:23	WG1095236
o-Xylene	U		0.000341	0.00100	1	04/07/2018 21:23	WG1095236
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 21:23	WG1095236
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 21:23	WG1095236
(S) Toluene-d8	*105*			*80.0-120*		*04/07/2018 21:23*	WG1095236
(S) Dibromofluoromethane	*92.1*			*76.0-123*		*04/07/2018 21:23*	WG1095236
(S) 4-Bromofluorobenzene	*101*			*80.0-120*		*04/07/2018 21:23*	WG1095236

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4040		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	8.72		0.0985	0.500	5	04/11/2018 15:22	WG1096185

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	443		1.04	20.0	20	04/07/2018 19:20	WG1095122
Fluoride	1.99		0.00990	0.100	1	04/07/2018 19:07	WG1095122
Sulfate	2470		3.87	250	50	04/09/2018 23:10	WG1095384

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00948		0.000250	0.00200	1	04/15/2018 20:56	WG1095153
Arsenic,Dissolved	0.00655		0.000250	0.00200	1	04/12/2018 19:40	WG1095157
Barium	0.0110		0.000360	0.00500	1	04/15/2018 20:56	WG1095153
Barium,Dissolved	0.0130		0.000360	0.00500	1	04/12/2018 19:40	WG1095157
Calcium	450		0.0460	1.00	1	04/15/2018 20:56	WG1095153
Chromium	0.0627		0.000540	0.00200	1	04/15/2018 20:56	WG1095153
Chromium,Dissolved	0.00334	B	0.000540	0.00200	1	04/12/2018 19:40	WG1095157
Iron	0.462		0.0150	0.100	1	04/15/2018 20:56	WG1095153
Iron,Dissolved	0.0225	B J	0.0150	0.100	1	04/12/2018 19:40	WG1095157
Lead	0.000387	J	0.000240	0.00200	1	04/15/2018 20:56	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 19:40	WG1095157
Manganese	0.702		0.000250	0.00500	1	04/15/2018 20:56	WG1095153
Manganese,Dissolved	0.635		0.000250	0.00500	1	04/12/2018 19:40	WG1095157
Potassium	1.76		0.0370	1.00	1	04/15/2018 20:56	WG1095153
Selenium	0.0181		0.000380	0.00200	1	04/15/2018 20:56	WG1095153
Selenium,Dissolved	0.0166		0.000380	0.00200	1	04/12/2018 19:40	WG1095157
Sodium	320		0.110	1.00	1	04/15/2018 20:56	WG1095153

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.0561	J	0.0314	0.100	1	04/10/2018 18:20	WG1095828
(S) a,a,a-Trifluorotoluene(FID)	*98.5*			*77.0-122*		*04/10/2018 18:20*	WG1095828

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 21:43	WG1095236
Benzene	U		0.000331	0.00100	1	04/07/2018 21:43	WG1095236
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 21:43	WG1095236
Bromoform	U		0.000469	0.00100	1	04/07/2018 21:43	WG1095236
Bromomethane	U		0.000866	0.00500	1	04/07/2018 21:43	WG1095236
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 21:43	WG1095236
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 21:43	WG1095236
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 21:43	WG1095236
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 21:43	WG1095236

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 21:43	WG1095236
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 21:43	WG1095236
Chloroethane	U		0.000453	0.00500	1	04/07/2018 21:43	WG1095236
Chloroform	U		0.000324	0.00500	1	04/07/2018 21:43	WG1095236
Chloromethane	U		0.000276	0.00250	1	04/07/2018 21:43	WG1095236
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 21:43	WG1095236
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 21:43	WG1095236
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 21:43	WG1095236
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 21:43	WG1095236
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 21:43	WG1095236
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 21:43	WG1095236
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 21:43	WG1095236
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 21:43	WG1095236
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 21:43	WG1095236
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 21:43	WG1095236
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 21:43	WG1095236
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 21:43	WG1095236
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 21:43	WG1095236
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 21:43	WG1095236
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 21:43	WG1095236
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 21:43	WG1095236
Methyl tert-butyl ether	0.0388		0.000367	0.00100	1	04/07/2018 21:43	WG1095236
Naphthalene	U		0.00100	0.00500	1	04/07/2018 21:43	WG1095236
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 21:43	WG1095236
Styrene	U		0.000307	0.00100	1	04/07/2018 21:43	WG1095236
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 21:43	WG1095236
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 21:43	WG1095236
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 21:43	WG1095236
Toluene	U		0.000412	0.00100	1	04/07/2018 21:43	WG1095236
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 21:43	WG1095236
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 21:43	WG1095236
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 21:43	WG1095236
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 21:43	WG1095236
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 21:43	WG1095236
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 21:43	WG1095236
o-Xylene	U		0.000341	0.00100	1	04/07/2018 21:43	WG1095236
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 21:43	WG1095236
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 21:43	WG1095236
(S) Toluene-d8	*102*			*80.0-120*		*04/07/2018 21:43*	WG1095236
(S) Dibromofluoromethane	*93.5*			*76.0-123*		*04/07/2018 21:43*	WG1095236
(S) 4-Bromofluorobenzene	*99.3*			*80.0-120*		*04/07/2018 21:43*	WG1095236

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.112		0.0247	0.100	1	04/11/2018 21:46	WG1095663
(S) o-Terphenyl	*93.2*			*31.0-160*		*04/11/2018 21:46*	WG1095663

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4820		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	18.5		0.0985	0.500	5	04/11/2018 15:23	WG1096185

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	636		1.04	20.0	20	04/07/2018 19:47	WG1095122
Fluoride	1.85		0.00990	0.100	1	04/07/2018 19:33	WG1095122
Sulfate	2900		3.87	250	50	04/09/2018 23:50	WG1095384

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00656		0.000250	0.00200	1	04/15/2018 21:15	WG1095153
Arsenic,Dissolved	0.00528		0.000250	0.00200	1	04/12/2018 19:44	WG1095157
Barium	0.00782		0.000360	0.00500	1	04/15/2018 21:15	WG1095153
Barium,Dissolved	0.00984		0.000360	0.00500	1	04/12/2018 19:44	WG1095157
Calcium	550		0.0460	1.00	1	04/15/2018 21:15	WG1095153
Chromium	U		0.000540	0.00200	1	04/15/2018 21:15	WG1095153
Chromium,Dissolved	0.000979	B J	0.000540	0.00200	1	04/12/2018 19:44	WG1095157
Iron	U		0.0150	0.100	1	04/15/2018 21:15	WG1095153
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 19:44	WG1095157
Lead	U		0.000240	0.00200	1	04/15/2018 21:15	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 19:44	WG1095157
Manganese	0.290		0.000250	0.00500	1	04/15/2018 21:15	WG1095153
Manganese,Dissolved	0.269		0.000250	0.00500	1	04/12/2018 19:44	WG1095157
Potassium	2.03		0.0370	1.00	1	04/15/2018 21:15	WG1095153
Selenium	0.0284		0.000380	0.00200	1	04/15/2018 21:15	WG1095153
Selenium,Dissolved	0.0276		0.000380	0.00200	1	04/12/2018 19:44	WG1095157
Sodium	425		0.110	1.00	1	04/15/2018 21:15	WG1095153

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0452	J	0.0314	0.100	1	04/10/2018 18:41	WG1095828
(S) a,a,a-Trifluorotoluene(FID)	*101*			*77.0-122*		*04/10/2018 18:41*	WG1095828

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 22:03	WG1095236
Benzene	U		0.000331	0.00100	1	04/07/2018 22:03	WG1095236
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 22:03	WG1095236
Bromoform	U		0.000469	0.00100	1	04/07/2018 22:03	WG1095236
Bromomethane	U		0.000866	0.00500	1	04/07/2018 22:03	WG1095236
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 22:03	WG1095236
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 22:03	WG1095236
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 22:03	WG1095236
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 22:03	WG1095236

MW-21
Collected date/time: 04/04/18 17:20

SAMPLE RESULTS - 05

L983849

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 22:03	WG1095236
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 22:03	WG1095236
Chloroethane	U		0.000453	0.00500	1	04/07/2018 22:03	WG1095236
Chloroform	U		0.000324	0.00500	1	04/07/2018 22:03	WG1095236
Chloromethane	U		0.000276	0.00250	1	04/07/2018 22:03	WG1095236
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 22:03	WG1095236
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 22:03	WG1095236
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 22:03	WG1095236
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 22:03	WG1095236
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 22:03	WG1095236
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 22:03	WG1095236
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 22:03	WG1095236
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 22:03	WG1095236
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 22:03	WG1095236
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 22:03	WG1095236
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 22:03	WG1095236
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 22:03	WG1095236
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 22:03	WG1095236
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 22:03	WG1095236
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 22:03	WG1095236
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 22:03	WG1095236
Methyl tert-butyl ether	0.0382		0.000367	0.00100	1	04/07/2018 22:03	WG1095236
Naphthalene	U		0.00100	0.00500	1	04/07/2018 22:03	WG1095236
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 22:03	WG1095236
Styrene	U		0.000307	0.00100	1	04/07/2018 22:03	WG1095236
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 22:03	WG1095236
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 22:03	WG1095236
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 22:03	WG1095236
Toluene	U		0.000412	0.00100	1	04/07/2018 22:03	WG1095236
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 22:03	WG1095236
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 22:03	WG1095236
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 22:03	WG1095236
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 22:03	WG1095236
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 22:03	WG1095236
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 22:03	WG1095236
o-Xylene	U		0.000341	0.00100	1	04/07/2018 22:03	WG1095236
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 22:03	WG1095236
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 22:03	WG1095236
(S) Toluene-d8	*108*			*80.0-120*		*04/07/2018 22:03*	WG1095236
(S) Dibromofluoromethane	*94.1*			*76.0-123*		*04/07/2018 22:03*	WG1095236
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/07/2018 22:03*	WG1095236

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0542	J	0.0247	0.100	1	04/11/2018 22:02	WG1095663
(S) o-Terphenyl	*88.1*			*31.0-160*		*04/11/2018 22:02*	WG1095663

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5280		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	39.5		0.394	2.00	20	04/11/2018 15:24	WG1096185

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/09/2018 17:18	WG1094975

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	809		1.04	20.0	20	04/07/2018 20:13	WG1095122
Fluoride	1.51		0.00990	0.100	1	04/07/2018 20:00	WG1095122
Sulfate	2970		3.87	250	50	04/10/2018 00:03	WG1095384

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	04/09/2018 14:47	WG1095322
Mercury,Dissolved	U		0.0000490	0.000200	1	04/10/2018 11:30	WG1095325

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.673		0.0126	0.200	1	04/10/2018 01:09	WG1095146
Boron,Dissolved	0.662		0.0126	0.200	1	04/10/2018 14:59	WG1095189

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00500		0.000250	0.00200	1	04/15/2018 22:15	WG1095153
Arsenic,Dissolved	0.00370		0.000250	0.00200	1	04/12/2018 19:48	WG1095157
Barium	0.00896		0.000360	0.00500	1	04/15/2018 22:15	WG1095153
Barium,Dissolved	0.00985		0.000360	0.00500	1	04/12/2018 19:48	WG1095157
Cadmium	U		0.000160	0.00100	1	04/15/2018 22:15	WG1095153
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 19:48	WG1095157
Calcium	638		0.0460	1.00	1	04/15/2018 22:15	WG1095153
Chromium	0.00106	J	0.000540	0.00200	1	04/15/2018 22:15	WG1095153
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 19:48	WG1095157
Cobalt	U		0.000260	0.00200	1	04/15/2018 22:15	WG1095153
Cobalt,Dissolved	U		0.000260	0.00200	1	04/12/2018 19:48	WG1095157
Iron	U		0.0150	0.100	1	04/15/2018 22:15	WG1095153
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 19:48	WG1095157
Lead	U		0.000240	0.00200	1	04/15/2018 22:15	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 19:48	WG1095157
Manganese	0.000412	J	0.000250	0.00500	1	04/15/2018 22:15	WG1095153
Manganese,Dissolved	0.00159	J	0.000250	0.00500	1	04/12/2018 19:48	WG1095157
Nickel	0.00115	J	0.000350	0.00200	1	04/15/2018 22:15	WG1095153
Nickel,Dissolved	0.00168	J	0.000350	0.00200	1	04/12/2018 19:48	WG1095157

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Potassium	3.77		0.0370	1.00	1	04/15/2018 22:15	WG1095153
Selenium	0.0321		0.000380	0.00200	1	04/15/2018 22:15	WG1095153
Selenium,Dissolved	0.0328		0.000380	0.00200	1	04/12/2018 19:48	WG1095157
Sodium	516		0.110	1.00	1	04/15/2018 22:15	WG1095153
Uranium	0.0594		0.000330	0.0100	1	04/15/2018 22:15	WG1095153
Uranium,Dissolved	0.0634		0.000330	0.0100	1	04/12/2018 19:48	WG1095157
Vanadium	0.0255		0.000180	0.00500	1	04/15/2018 22:15	WG1095153
Vanadium,Dissolved	0.0255		0.000180	0.00500	1	04/12/2018 19:48	WG1095157

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 22:22	WG1095236
Benzene	U		0.000331	0.00100	1	04/07/2018 22:22	WG1095236
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 22:22	WG1095236
Bromoform	U		0.000469	0.00100	1	04/07/2018 22:22	WG1095236
Bromomethane	U		0.000866	0.00500	1	04/07/2018 22:22	WG1095236
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 22:22	WG1095236
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 22:22	WG1095236
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 22:22	WG1095236
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 22:22	WG1095236
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 22:22	WG1095236
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 22:22	WG1095236
Chloroethane	U		0.000453	0.00500	1	04/07/2018 22:22	WG1095236
Chloroform	U		0.000324	0.00500	1	04/07/2018 22:22	WG1095236
Chloromethane	U		0.000276	0.00250	1	04/07/2018 22:22	WG1095236
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 22:22	WG1095236
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 22:22	WG1095236
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 22:22	WG1095236
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 22:22	WG1095236
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 22:22	WG1095236
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 22:22	WG1095236
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 22:22	WG1095236
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 22:22	WG1095236
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 22:22	WG1095236
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 22:22	WG1095236
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 22:22	WG1095236
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 22:22	WG1095236
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 22:22	WG1095236
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 22:22	WG1095236
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 22:22	WG1095236
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 22:22	WG1095236
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 22:22	WG1095236
Naphthalene	U		0.00100	0.00500	1	04/07/2018 22:22	WG1095236
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 22:22	WG1095236
Styrene	U		0.000307	0.00100	1	04/07/2018 22:22	WG1095236
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 22:22	WG1095236
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 22:22	WG1095236
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 22:22	WG1095236
Toluene	U		0.000412	0.00100	1	04/07/2018 22:22	WG1095236
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 22:22	WG1095236
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 22:22	WG1095236
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 22:22	WG1095236
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 22:22	WG1095236
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 22:22	WG1095236
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 22:22	WG1095236

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
o-Xylene	U		0.000341	0.00100	1	04/07/2018 22:22	WG1095236
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 22:22	WG1095236
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 22:22	WG1095236
(S) Toluene-d8	*103*			*80.0-120*		*04/07/2018 22:22*	WG1095236
(S) Dibromofluoromethane	*92.4*			*76.0-123*		*04/07/2018 22:22*	WG1095236
(S) 4-Bromofluorobenzene	*100*			*80.0-120*		*04/07/2018 22:22*	WG1095236

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/11/2018 22:19	WG1095663
(S) o-Terphenyl	*88.7*			*31.0-160*		*04/11/2018 22:19*	WG1095663

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 16:28	WG1095236
Benzene	U		0.000331	0.00100	1	04/07/2018 16:28	WG1095236
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:28	WG1095236
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:28	WG1095236
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:28	WG1095236
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:28	WG1095236
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:28	WG1095236
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:28	WG1095236
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:28	WG1095236
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:28	WG1095236
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:28	WG1095236
Chloroethane	U		0.000453	0.00500	1	04/07/2018 16:28	WG1095236
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:28	WG1095236
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:28	WG1095236
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:28	WG1095236
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:28	WG1095236
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:28	WG1095236
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:28	WG1095236
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 16:28	WG1095236
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:28	WG1095236
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:28	WG1095236
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:28	WG1095236
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:28	WG1095236
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:28	WG1095236
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:28	WG1095236
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:28	WG1095236
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:28	WG1095236
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:28	WG1095236
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:28	WG1095236
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:28	WG1095236
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 16:28	WG1095236
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:28	WG1095236
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:28	WG1095236
Styrene	U		0.000307	0.00100	1	04/07/2018 16:28	WG1095236
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:28	WG1095236
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:28	WG1095236
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:28	WG1095236
Toluene	U		0.000412	0.00100	1	04/07/2018 16:28	WG1095236
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:28	WG1095236
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:28	WG1095236
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:28	WG1095236
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:28	WG1095236
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:28	WG1095236
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:28	WG1095236
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:28	WG1095236
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:28	WG1095236
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:28	WG1095236
(S) Toluene-d8	*101*			*80.0-120*		*04/07/2018 16:28*	WG1095236
(S) Dibromofluoromethane	*96.2*			*76.0-123*		*04/07/2018 16:28*	WG1095236
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/07/2018 16:28*	WG1095236

WG1096152

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983849-01,02

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301374-1 04/11/18 15:53

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983849-02 Original Sample (OS) • Duplicate (DUP)

(OS) L983849-02 04/11/18 15:53 • (DUP) R3301374-4 04/11/18 15:53

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	4700	5090	1	7.97	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301374-2 04/11/18 15:53 • (LCSD) R3301374-3 04/11/18 15:53

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8640	8780	98.2	99.8	85.0-115			1.61	5

WG1096154

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983849-03,04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301367-1 04/11/18 17:00

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Dissolved Solids	U		2.82	10.0

L983849-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983849-03 04/11/18 17:00 • (DUP) R3301367-4 04/11/18 17:00

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	3660	3700	1	0.952		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301367-2 04/11/18 17:00 • (LCSD) R3301367-3 04/11/18 17:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Dissolved Solids	8800	8590	8230	97.6	93.5	85.0-115			4.28	5

QUALITY CONTROL SUMMARY

L983849-01,02,03,04,05,06

Method Blank (MB)

(MB) R3300964-1 04/11/18 15:15

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983849-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983849-01 04/11/18 15:18 • (DUP) R3300964-4 04/11/18 15:19

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	0.156	0.165	1	5.61		20

L983865-07 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-07 04/11/18 15:47 • (DUP) R3300964-6 04/11/18 15:48

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300964-2 04/11/18 15:16 • (LCSD) R3300964-3 04/11/18 15:17

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.89	3.96	97.2	98.9	90.0-110			1.73	20

L983855-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L983855-06 04/11/18 15:29 • (MS) R3300964-5 04/11/18 15:31

Analyte	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	2.72	4.71	79.3	1	90.0-110	J6

L983865-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-08 04/11/18 15:49 • (MS) R3300964-7 04/11/18 15:51 • (MSD) R3300964-8 04/11/18 15:52

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	0.0350	2.37	2.41	93.3	94.8	1	90.0-110			1.55	20

WG1094975

Wet Chemistry by Method 4500CN E-2011

QUALITY CONTROL SUMMARY

L983849-06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300284-1 04/09/18 17:03

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L983514-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983514-01 04/09/18 17:08 • (DUP) R3300284-4 04/09/18 17:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L983865-22 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-22 04/09/18 17:24 • (DUP) R3300284-5 04/09/18 17:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300284-2 04/09/18 17:04 • (LCSD) R3300284-3 04/09/18 17:05

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0992	0.0906	99.2	90.6	85.0-115			9.06	20

QUALITY CONTROL SUMMARY

L983849-01,02,03,04,05,06

Method Blank (MB)

(MB) R3299939-1 04/07/18 07:40

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	0.0743	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983855-11 Original Sample (OS) • Duplicate (DUP)

(OS) L983855-11 04/07/18 16:25 • (DUP) R3299939-4 04/07/18 16:38

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.0722	0.000	1	200	P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	0.286	0.000	1	200	P1	15

L983951-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983951-01 04/08/18 02:56 • (DUP) R3299939-7 04/08/18 03:09

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	1.12	1.02	1	9.13		15
Fluoride	0.0249	0.0247	1	0.806	J	15
Sulfate	5.49	5.49	1	0.0765		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299939-2 04/07/18 07:54 • (LCSD) R3299939-3 04/07/18 08:07

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.8	39.7	99.4	99.3	80.0-120			0.0526	15
Fluoride	8.00	8.03	8.04	100	101	80.0-120			0.174	15
Sulfate	40.0	40.1	40.1	100	100	80.0-120			0.0459	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983855-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-11 04/07/18 16:25 • (MS) R3299939-5 04/07/18 16:51 • (MSD) R3299939-6 04/07/18 17:05

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Fluoride	5.00	U	5.36	5.17	107	103	1	80.0-120			3.51	15

L983951-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L983951-01 04/08/18 02:56 • (MS) R3299939-8 04/08/18 03:22

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	1.12	51.2	100	1	80.0-120	
Fluoride	5.00	0.0249	5.11	102	1	80.0-120	
Sulfate	50.0	5.49	55.5	100	1	80.0-120	

WG1095384

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983849-02,03,04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300408-1 04/09/18 18:09

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	0.112	J	0.0774	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300408-2 04/09/18 18:22 • (LCSD) R3300408-3 04/09/18 18:36

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	40.0	39.9	99.9	99.7	80.0-120			0.195	15

L984001-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984001-02 04/10/18 01:00 • (MS) R3300408-5 04/10/18 01:43 • (MSD) R3300408-6 04/10/18 01:57

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	67.4	115	115	94.2	95.5	1	80.0-120	E	E	0.578	15

L984001-10 Original Sample (OS) • Matrix Spike (MS)

(OS) L984001-10 04/10/18 04:33 • (MS) R3300408-8 04/10/18 05:46

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	1.80	51.5	99.4	1	80.0-120	

WG1095322

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983849-06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300321-1 04/09/18 14:13

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300321-2 04/09/18 14:15 • (LCSD) R3300321-3 04/09/18 14:17

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury	0.00300	0.00290	0.00295	96.8	98.2	80.0-120			1.46	20

L983497-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983497-01 04/09/18 14:20 • (MS) R3300321-4 04/09/18 14:22 • (MSD) R3300321-5 04/09/18 14:24

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury	0.00300	ND	0.00310	0.00306	103	102	1	75.0-125			1.09	20

WG1095325

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983849-06

Method Blank (MB)

(MB) R3300467-1 04/10/18 10:58

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury,Dissolved	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300467-2 04/10/18 11:00 • (LCSD) R3300467-3 04/10/18 11:03

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	0.00317	0.00311	106	104	80.0-120			1.70	20

L983825-29 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-29 04/10/18 11:05 • (MS) R3300467-4 04/10/18 11:12 • (MSD) R3300467-5 04/10/18 11:14

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	U	0.00282	0.00300	94.2	100	1	75.0-125			6.06	20

WG1095146

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983849-06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300326-1 04/10/18 00:21

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron	0.0169	J	0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300326-2 04/10/18 00:23 • (LCSD) R3300326-3 04/10/18 00:26

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron	1.00	1.02	1.04	102	104	80.0-120			1.82	20

L983841-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983841-01 04/10/18 00:28 • (MS) R3300326-5 04/10/18 00:34 • (MSD) R3300326-6 04/10/18 00:36

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1.00	ND	1.06	1.08	101	103	1	75.0-125			1.83	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300622-1 04/10/18 14:35

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron,Dissolved	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300622-2 04/10/18 14:37 • (LCSD) R3300622-3 04/10/18 14:40

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	1.01	1.03	101	103	80.0-120			2.74	20

L983860-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983860-05 04/10/18 14:42 • (MS) R3300622-5 04/10/18 14:47 • (MSD) R3300622-6 04/10/18 14:50

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	0.147	1.17	1.15	102	99.9	1	75.0-125			1.70	20

WG1095153

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983849-01,02,03,04,05,06

Method Blank (MB)

(MB) R3302048-1 04/15/18 20:14

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302048-2 04/15/18 20:19 • (LCSD) R3302048-3 04/15/18 20:23

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Arsenic	0.0500	0.0503	0.0508	101	102	80.0-120			1.07	20
Barium	0.0500	0.0476	0.0474	95.3	94.9	80.0-120			0.405	20
Cadmium	0.0500	0.0512	0.0517	102	103	80.0-120			0.930	20
Calcium	5.00	5.06	5.02	101	100	80.0-120			0.905	20
Chromium	0.0500	0.0509	0.0518	102	104	80.0-120			1.84	20
Cobalt	0.0500	0.0530	0.0532	106	106	80.0-120			0.376	20
Iron	5.00	5.32	5.39	106	108	80.0-120			1.30	20
Lead	0.0500	0.0500	0.0506	100	101	80.0-120			1.19	20
Manganese	0.0500	0.0502	0.0508	100	102	80.0-120			1.20	20
Nickel	0.0500	0.0538	0.0533	108	107	80.0-120			0.905	20
Potassium	5.00	5.20	5.08	104	102	80.0-120			2.41	20
Selenium	0.0500	0.0506	0.0519	101	104	80.0-120			2.65	20
Sodium	5.00	5.30	5.27	106	105	80.0-120			0.685	20
Uranium	0.0500	0.0499	0.0498	99.7	99.5	80.0-120			0.208	20
Vanadium	0.0500	0.0504	0.0511	101	102	80.0-120			1.41	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983849-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983849-01 04/15/18 20:28 • (MS) R3302048-5 04/15/18 20:37 • (MSD) R3302048-6 04/15/18 20:42

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.00338	0.0554	0.0541	104	101	1	75.0-125			2.30	20
Barium	0.0500	0.0128	0.0637	0.0610	102	96.4	1	75.0-125			4.34	20
Cadmium	0.0500	U	0.0520	0.0506	104	101	1	75.0-125			2.66	20
Calcium	5.00	368	370	361	39.3	0.000	1	75.0-125	V	V	2.33	20
Chromium	0.0500	0.000687	0.0516	0.0497	102	98.0	1	75.0-125			3.70	20
Cobalt	0.0500	0.00250	0.0536	0.0511	102	97.1	1	75.0-125			4.86	20
Potassium	5.00	4.32	9.42	9.28	102	99.3	1	75.0-125			1.48	20
Iron	5.00	0.0314	5.32	5.10	106	101	1	75.0-125			4.20	20
Lead	0.0500	0.000330	0.0522	0.0504	104	100	1	75.0-125			3.48	20
Manganese	0.0500	0.676	0.700	0.538	47.3	0.000	1	75.0-125	V	J3 V	26.2	20
Nickel	0.0500	0.00291	0.0547	0.0517	104	97.5	1	75.0-125			5.79	20
Selenium	0.0500	0.00337	0.0563	0.0552	106	104	1	75.0-125			1.85	20
Sodium	5.00	875	875	856	0.000	0.000	1	75.0-125	V	V	2.21	20
Uranium	0.0500	0.00549	0.0592	0.0573	107	104	1	75.0-125			3.25	20
Vanadium	0.0500	0.0103	0.0633	0.0605	106	100	1	75.0-125			4.52	20

Method Blank (MB)

(MB) R3301434-1 04/12/18 18:40

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Chromium,Dissolved	0.000737	J	0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	0.0330	J	0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301434-2 04/12/18 18:44 • (LCSD) R3301434-3 04/12/18 18:48

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0511	0.0510	102	102	80.0-120			0.233	20
Barium,Dissolved	0.0500	0.0505	0.0488	101	97.7	80.0-120			3.39	20
Cadmium,Dissolved	0.0500	0.0538	0.0541	108	108	80.0-120			0.581	20
Chromium,Dissolved	0.0500	0.0515	0.0525	103	105	80.0-120			1.96	20
Cobalt,Dissolved	0.0500	0.0541	0.0547	108	109	80.0-120			1.12	20
Iron,Dissolved	5.00	5.21	5.27	104	105	80.0-120			1.20	20
Lead,Dissolved	0.0500	0.0511	0.0517	102	103	80.0-120			1.11	20
Manganese,Dissolved	0.0500	0.0505	0.0504	101	101	80.0-120			0.231	20
Nickel,Dissolved	0.0500	0.0547	0.0546	109	109	80.0-120			0.123	20
Selenium,Dissolved	0.0500	0.0501	0.0512	100	102	80.0-120			2.31	20
Uranium,Dissolved	0.0500	0.0512	0.0518	102	104	80.0-120			1.05	20
Vanadium,Dissolved	0.0500	0.0505	0.0519	101	104	80.0-120			2.61	20

L983855-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-11 04/12/18 18:52 • (MS) R3301434-5 04/12/18 19:00 • (MSD) R3301434-6 04/12/18 19:04

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	U	0.0521	0.0514	104	103	1	75.0-125			1.35	20
Barium,Dissolved	0.0500	U	0.0522	0.0493	104	98.7	1	75.0-125			5.55	20
Cadmium,Dissolved	0.0500	U	0.0546	0.0531	109	106	1	75.0-125			2.82	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983855-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-11 04/12/18 18:52 • (MS) R3301434-5 04/12/18 19:00 • (MSD) R3301434-6 04/12/18 19:04

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chromium,Dissolved	0.0500	0.00157	0.0535	0.0523	104	101	1	75.0-125			2.32	20
Cobalt,Dissolved	0.0500	U	0.0549	0.0548	110	110	1	75.0-125			0.112	20
Iron,Dissolved	5.00	0.0224	5.28	5.28	105	105	1	75.0-125			0.125	20
Lead,Dissolved	0.0500	U	0.0534	0.0517	107	103	1	75.0-125			3.11	20
Manganese,Dissolved	0.0500	0.000348	0.0513	0.0513	102	102	1	75.0-125			0.0270	20
Nickel,Dissolved	0.0500	0.000565	0.0562	0.0554	111	110	1	75.0-125			1.41	20
Selenium,Dissolved	0.0500	U	0.0544	0.0508	109	102	1	75.0-125			6.95	20
Uranium,Dissolved	0.0500	U	0.0525	0.0520	105	104	1	75.0-125			1.06	20
Vanadium,Dissolved	0.0500	0.000226	0.0521	0.0520	104	104	1	75.0-125			0.187	20

Method Blank (MB)

(MB) R3301217-3 04/10/18 12:14

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*101*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301217-1 04/10/18 11:08 • (LCSD) R3301217-2 04/10/18 11:30

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	5.22	5.28	94.9	96.0	71.0-136			1.19	20
(S) a,a,a-Trifluorotoluene(FID)				*97.4*	*97.0*	*77.0-122*				

L983828-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983828-01 04/10/18 14:00 • (MS) R3301217-4 04/10/18 21:14 • (MSD) R3301217-5 04/10/18 21:36

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	3.60	3.14	2.51	0.000	0.000	1	18.0-160	J6	J3 J6	22.5	20
(S) a,a,a-Trifluorotoluene(FID)					*103*	*93.1*		*77.0-122*				

Method Blank (MB)

(MB) R3300246-4 04/07/18 15:49

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

QUALITY CONTROL SUMMARY

L983849-01,02,03,04,05,06,07

Method Blank (MB)

(MB) R3300246-4 04/07/18 15:49

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
Xylenes, Total	U		0.00106	0.00300
(S) Toluene-d8	*101*			*80.0-120*
(S) Dibromofluoromethane	*90.9*			*76.0-123*
(S) 4-Bromofluorobenzene	*108*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3300246-1 04/07/18 14:30

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.172	138	10.0-160	
Bromodichloromethane	0.0250	0.0254	101	76.0-120	
Bromoform	0.0250	0.0294	117	67.0-132	
Bromomethane	0.0250	0.0260	104	18.0-160	
n-Butylbenzene	0.0250	0.0272	109	72.0-126	
sec-Butylbenzene	0.0250	0.0267	107	74.0-121	
Carbon disulfide	0.0250	0.0264	106	55.0-127	
Carbon tetrachloride	0.0250	0.0253	101	63.0-122	
Benzene	0.0250	0.0249	99.4	69.0-123	
Chlorobenzene	0.0250	0.0249	99.6	79.0-121	
Chlorodibromomethane	0.0250	0.0262	105	75.0-125	
Chloroethane	0.0250	0.0250	99.9	47.0-152	
Chloroform	0.0250	0.0249	99.5	72.0-121	
Chloromethane	0.0250	0.0204	81.6	48.0-139	
1,2-Dibromoethane	0.0250	0.0260	104	77.0-123	
1,1-Dichloroethane	0.0250	0.0255	102	70.0-126	
1,2-Dichloroethane	0.0250	0.0251	100	67.0-126	
1,1-Dichloroethene	0.0250	0.0258	103	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0258	103	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0258	103	71.0-121	
1,2-Dichloropropane	0.0250	0.0255	102	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0259	103	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0258	103	74.0-127	

Laboratory Control Sample (LCS)

(LCS) R3300246-1 04/07/18 14:30

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
2-Hexanone	0.125	0.142	113	58.0-147	
Isopropylbenzene	0.0250	0.0263	105	75.0-120	
p-Isopropyltoluene	0.0250	0.0278	111	74.0-126	
2-Butanone (MEK)	0.125	0.174	139	37.0-158	
Methylene Chloride	0.0250	0.0249	99.7	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.123	98.1	59.0-143	
Methyl tert-butyl ether	0.0250	0.0269	107	64.0-123	
Ethylbenzene	0.0250	0.0259	104	77.0-120	
n-Propylbenzene	0.0250	0.0265	106	79.0-120	
Styrene	0.0250	0.0279	112	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0251	100	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0278	111	71.0-122	
Tetrachloroethene	0.0250	0.0259	104	70.0-127	
1,1,1-Trichloroethane	0.0250	0.0256	102	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0253	101	78.0-120	
Trichloroethene	0.0250	0.0251	101	78.0-120	
Naphthalene	0.0250	0.0263	105	62.0-128	
1,2,4-Trimethylbenzene	0.0250	0.0266	106	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0266	106	75.0-120	
Vinyl chloride	0.0250	0.0222	88.8	64.0-133	
Toluene	0.0250	0.0251	101	77.0-120	
o-Xylene	0.0250	0.0255	102	78.0-120	
m&p-Xylenes	0.0500	0.0507	101	77.0-120	
Xylenes, Total	0.0750	0.0762	102	77.0-120	
(S) Toluene-d8			*95.2*	*80.0-120*	
(S) Dibromofluoromethane			*95.1*	*76.0-123*	
(S) 4-Bromofluorobenzene			*99.5*	*80.0-120*	

QUALITY CONTROL SUMMARY

L983849-01,02,04,05,06

Method Blank (MB)

(MB) R3300825-1 04/11/18 06:59

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*87.2*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300825-2 04/11/18 07:15 • (LCSD) R3300825-3 04/11/18 07:32

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.43	1.43	95.3	95.1	50.0-150			0.176	20
(S) o-Terphenyl				*121*	*116*	*31.0-160*				

L984044-15 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984044-15 04/11/18 22:51 • (MS) R3300825-4 04/11/18 23:08 • (MSD) R3300825-5 04/11/18 23:24

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
TPH (GC/FID) High Fraction	1.50	0.0495	1.42	1.39	91.2	89.5	1	50.0-150			1.77	20
(S) o-Terphenyl					*123*	*118*		*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1,6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1,4]	2006
Louisiana [1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

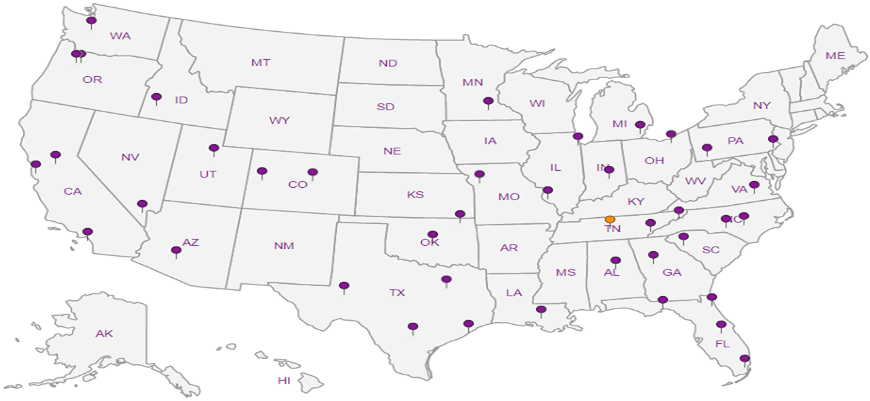
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 1 of 2

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12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L # 983849
M056

Acctnum: **TRCATX**
Template: **T133687**
Prelogin: **P643798**
TSR: **526**
PB:
Shipped Via:

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **TMD Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-TMD**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **TMD (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Quote #
Date Results Needed
Immediately Packed on Ice N ___ Y ___

Pres Chk

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
										12				2				
MW-25	Grab	GW		4/4/18	1200	8	X	X		X	X	X	X					01
MW-20	Grab	GW		4/4/18	1340	8	X	X		X	X	X	X					02
NP-1	Grab	GW		4/4/18	0920	5	X				X	X	X					03
MW-8	Grab	GW		4/4/18	1430	10	X	X	X	X	X	X	X					04
MW-21	Grab	GW		4/4/18	1720	10	X	X	X	X	X	X	X					05
MW-71	Grab	GW		4/4/18	0855	~~9~~ 8	X	X			X	X	X	X	X			06
MW-68	Grab	GW				8	X	X		X	X	X	X					
MW-27	Grab	GW				8	X	X		X	X	X	X					
MW-89	Grab	GW				8	X	X		X	X	X	X					
MW-16	Grab	GW				8	X	X		X	X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks: MS

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP __Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: __Y ✓N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach °C	Bottles Received: 45	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18	Time: 0845	Hold:	Condition: [✓ NCF] / OK

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Pres Chk

Chain of Custody Page 2 of 2

ESC
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YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **TMD Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-TMD**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **TMD (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L # 983849

Table #

Acctnum: **TRCATX**
Template: **T133687**
Prelogin: **P643798**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-26	Grab	GW				8	X	X		X	X	X	X					
MW-46R	Grab	GW				8	X	X		X	X	X	X					
TRIP BLANK-TMD-01	Grab	GW		4/4/18	-	1	X											07

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] _Y _N
COC Signed/Accurate: [✓ Y] _N
Bottles arrive intact: _Y [✓ N]
Correct bottles used: [✓ Y] _N
Sufficient volume sent: [✓ Y] _N
If Applicable
VOA Zero Headspace: [✓ Y] _N
Preservation Correct/Checked: [✓ Y] _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No [✓ HCL] / MeoH TBR 1	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach °C Bottles Received: 45	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0945	Hold: Condition: [✓ NCF] / OK

Chain of Custody Page 1 of 1

ESC
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12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L # 923845

Table #

Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
Shipped Via:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: TMD Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170
Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: TMD (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
mw-8	Grab	GW		4/4/18	1430		✓	✓	✓	✓		✓	✓	✓				04
mw-21	Grab	GW		4/4/18	1720		✓	✓	✓	✓		✓	✓	✓				05
mw-25	Grab	GW		4/4/18	1200		✓	✓		✓		✓	✓	✓				01
Trip Blank-TMD-01	Grab	GW		4/4/18	—		✓											07
NP-1	Grab	GW		4/4/18	920		✓					✓	✓	✓				03 ~~02~~
MW-20	Grab	GW		4/4/18	1340		✓	✓		✓		✓	✓	✓				02
MW-71	Grab	GW		4/4/18	855		✓	✓			✓	✓	✓	✓	✓			06
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________
Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp °C Bottles Received: 45	COC Seal Intact: ___ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	pH Checked: NCF:

① 4269 9211 4819 (1.7)
② 4269 9213 4020 (2.3)
③ 4269 9213 4111 (.2)
④ 4269 9213 4155 (1.7)
⑤ 4269 9211 4820 (2.4)
⑥ 4269 9211 4808 (1.7)
⑦ 4269 9211 4830 (1.2)
⑧ 4269 9211 4852 (.5)
⑨ 4269 9211 4741 (.6)
⑩ 4269 9213 4052 (1.1)
⑪ 4269 9213 1763 (.9)
⑫ 4269 9213 4074 (.2)
⑬ 4269 9213 4619 (1.5)
⑭ 4269 9213 4144 (3.2)
⑮ 4269 9213 4041 (2.1)
⑯ 4269 9212 1660 (.1)
⑰ 4269 9212 1589 (3.1)
⑱ 4269 9213 4035 (.9)
⑲ 4269 9213 1774 (2.1)
⑳ 4269 9213 4063 (1.3)

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Login #:983849	**Client:** TRCATX	**Date:4/6**	**Evaluated by:Matt S**

Non-Conformance (check applicable items)

	Sample Integrity		**Chain of Custody Clarification**		
	Parameter(s) past holding time		Login Clarification Needed		**If Broken Container:**
	Improper temperature		Chain of custody is incomplete		Insufficient packing material around container
	Improper container type		Please specify Metals requested.		Insufficient packing material inside cooler
	Improper preservation		Please specify TCLP requested.		Improper handling by carrier (FedEx / UPS / Courie
	Insufficient sample volume.		Received additional samples not listed on coc.		Sample was frozen
	Sample is biphasic.		Sample ids on containers do not match ids on coc		Container lid not intact
	Vials received with headspace.		Trip Blank not received.		**If no Chain of Custody:**
	Broken container		Client did not "X" analysis.		Received by:
x	Broken container:		Chain of Custody is missing		Date/Time:
	Sufficient sample remains				Temp./Cont. Rec./pH:
					Carrier:
					Tracking#

Login Comments: 1of 2 DROLVI vial received broken for MW-71

Client informed by:		Call		Email		Voice Mail		Date: 4/6/18	Time: 17:40
TSR Initials: CM	Client Contact:								

Login Instructions:

Analyze from remaining vial.

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a subsidiary of Pace Analytical

ANALYTICAL REPORT

April 16, 2018

myESC
REAL TIME DATA ACCESS
a subsidiary of Pace Analytical

TRC Solutions - Austin, TX

Sample Delivery Group:	L983855
Samples Received:	04/06/2018
Project Number:	294318.0000.0000.
Description:	NCL Spring 2018
Site:	NCL (NAVAJO-ARTESIA)
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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1 Cp
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MW-56 L983855-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 18:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 14:05	04/11/18 14:05	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 20:54	04/07/18 20:54	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 21:07	04/07/18 21:07	DR
Wet Chemistry by Method 9056A	WG1095384	50	04/10/18 00:17	04/10/18 00:17	MAJ
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 21:24	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 19:52	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 16:31	04/07/18 16:31	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/12/18 20:25	04/12/18 20:25	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/11/18 19:39	TH

MW-45 L983855-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 14:06	04/11/18 14:06	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	1	04/07/18 10:38	04/09/18 17:19	KK
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 21:20	04/07/18 21:20	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 21:34	04/07/18 21:34	DR
Wet Chemistry by Method 9056A	WG1095384	50	04/10/18 00:33	04/10/18 00:33	MAJ
Mercury by Method 7470A	WG1095322	1	04/09/18 07:03	04/09/18 14:49	EL
Mercury by Method 7470A	WG1095325	1	04/09/18 11:28	04/10/18 11:32	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 16:09	ST
Metals (ICP) by Method 6010B	WG1095189	1	04/10/18 08:21	04/10/18 15:07	ST
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 22:20	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 19:56	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 16:52	04/07/18 16:52	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/12/18 20:45	04/12/18 20:45	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/11/18 19:59	TH

NCL-34A L983855-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096182	10	04/11/18 14:07	04/11/18 14:07	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 21:47	04/07/18 21:47	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 22:01	04/07/18 22:01	DR
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 21:34	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 20:00	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	10	04/12/18 21:05	04/12/18 21:05	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/11/18 20:20	TH

NCL-33 L983855-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 14:08	04/11/18 14:08	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 22:14	04/07/18 22:14	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 22:27	04/07/18 22:27	DR
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 21:39	LD

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

NCL-33 L983855-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 20:03	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 17:34	04/07/18 17:34	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/12/18 02:04	TH

NCL-44 L983855-05 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096182	1	04/11/18 14:10	04/11/18 14:10	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 22:41	04/07/18 22:41	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 22:54	04/07/18 22:54	DR
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 21:43	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 20:07	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 17:54	04/07/18 17:54	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/12/18 02:24	TH

NCL-32 L983855-06 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096154	1	04/11/18 16:42	04/11/18 17:00	MMF
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:29	04/11/18 15:29	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 23:34	04/07/18 23:34	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/07/18 23:48	04/07/18 23:48	DR
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 21:48	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 20:26	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 18:15	04/07/18 18:15	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/12/18 02:44	TH

MW-108 L983855-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:50	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096185	20	04/11/18 15:32	04/11/18 15:32	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/08/18 00:01	04/08/18 00:01	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/08/18 00:15	04/08/18 00:15	DR
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 21:53	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 20:30	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	25	04/07/18 18:35	04/07/18 18:35	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/12/18 03:05	TH

NCL-31 L983855-08 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:33	04/11/18 15:33	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/08/18 00:28	04/08/18 00:28	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/08/18 00:41	04/08/18 00:41	DR
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 21:57	LD

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

NCL-31 L983855-08 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 20:34	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 18:56	04/07/18 18:56	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/12/18 03:25	TH

MW-55 L983855-09 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 15:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:34	04/11/18 15:34	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	1	04/07/18 10:38	04/09/18 17:20	KK
Wet Chemistry by Method 9056A	WG1095122	1	04/08/18 00:55	04/08/18 00:55	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/08/18 01:08	04/08/18 01:08	DR
Mercury by Method 7470A	WG1095322	1	04/09/18 07:03	04/09/18 14:51	EL
Mercury by Method 7470A	WG1095325	1	04/09/18 11:28	04/10/18 11:41	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 16:23	ST
Metals (ICP) by Method 6010B	WG1095189	1	04/10/18 08:21	04/10/18 15:10	ST
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 22:25	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 20:38	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095828	1	04/10/18 19:03	04/10/18 19:03	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 19:17	04/07/18 19:17	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/12/18 03:45	TH

MW-18 L983855-10 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096185	20	04/11/18 15:35	04/11/18 15:35	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	1	04/07/18 10:38	04/09/18 17:22	KK
Wet Chemistry by Method 9056A	WG1095122	1	04/08/18 01:22	04/08/18 01:22	DR
Wet Chemistry by Method 9056A	WG1095122	20	04/08/18 01:35	04/08/18 01:35	DR
Mercury by Method 7470A	WG1095322	1	04/09/18 07:03	04/09/18 14:54	EL
Mercury by Method 7470A	WG1095325	1	04/09/18 11:28	04/10/18 11:44	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 16:27	ST
Metals (ICP) by Method 6010B	WG1095189	1	04/10/18 08:21	04/10/18 15:12	ST
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 22:30	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 20:42	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 19:37	04/07/18 19:37	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095662	1	04/09/18 21:54	04/12/18 04:05	TH

EB-NCL-01 L983855-11 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:36	04/11/18 15:36	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/07/18 16:25	04/07/18 16:25	DR
Metals (ICPMS) by Method 6020	WG1095153	1	04/10/18 10:33	04/15/18 22:35	LD
Metals (ICPMS) by Method 6020	WG1095157	1	04/11/18 14:00	04/12/18 18:52	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 19:58	04/07/18 19:58	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095663	1	04/09/18 21:55	04/11/18 22:35	TH

CASE NARRATIVE

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3080		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/11/2018 14:05	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	242		1.04	20.0	20	04/07/2018 21:07	WG1095122
Fluoride	1.25		0.00990	0.100	1	04/07/2018 20:54	WG1095122
Sulfate	2000		3.87	250	50	04/10/2018 00:17	WG1095384

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00731		0.000250	0.00200	1	04/15/2018 21:24	WG1095153
Arsenic,Dissolved	0.00638		0.000250	0.00200	1	04/12/2018 19:52	WG1095157
Barium	0.0119		0.000360	0.00500	1	04/15/2018 21:24	WG1095153
Barium,Dissolved	0.0139		0.000360	0.00500	1	04/12/2018 19:52	WG1095157
Calcium	485		0.0460	1.00	1	04/15/2018 21:24	WG1095153
Chromium	0.0102		0.000540	0.00200	1	04/15/2018 21:24	WG1095153
Chromium,Dissolved	0.000557	B J	0.000540	0.00200	1	04/12/2018 19:52	WG1095157
Iron	0.0355	J	0.0150	0.100	1	04/15/2018 21:24	WG1095153
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 19:52	WG1095157
Lead	0.000487	J	0.000240	0.00200	1	04/15/2018 21:24	WG1095153
Lead,Dissolved	0.000333	J	0.000240	0.00200	1	04/12/2018 19:52	WG1095157
Manganese	0.307		0.000250	0.00500	1	04/15/2018 21:24	WG1095153
Manganese,Dissolved	0.305		0.000250	0.00500	1	04/12/2018 19:52	WG1095157
Potassium	2.14		0.0370	1.00	1	04/15/2018 21:24	WG1095153
Selenium	0.000796	J	0.000380	0.00200	1	04/15/2018 21:24	WG1095153
Selenium,Dissolved	0.000537	J	0.000380	0.00200	1	04/12/2018 19:52	WG1095157
Sodium	252		0.110	1.00	1	04/15/2018 21:24	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 16:31	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 16:31	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:31	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:31	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:31	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:31	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:31	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:31	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:31	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:31	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:31	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 16:31	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:31	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:31	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:31	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:31	WG1095245

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:31	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:31	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 20:25	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:31	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:31	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:31	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:31	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:31	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:31	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:31	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:31	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:31	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:31	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:31	WG1095245
Methyl tert-butyl ether	0.00328		0.000367	0.00100	1	04/07/2018 16:31	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:31	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:31	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 16:31	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:31	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:31	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:31	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 16:31	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:31	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:31	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:31	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:31	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:31	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:31	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:31	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:31	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:31	WG1095245
(S) Toluene-d8	*96.2*			*80.0-120*		*04/12/2018 20:25*	WG1095245
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 16:31*	WG1095245
(S) Dibromofluoromethane	*85.0*			*76.0-123*		*04/07/2018 16:31*	WG1095245
(S) Dibromofluoromethane	*96.1*			*76.0-123*		*04/12/2018 20:25*	WG1095245
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/12/2018 20:25*	WG1095245
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/07/2018 16:31*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.287		0.0247	0.100	1	04/11/2018 19:39	WG1095662
(S) o-Terphenyl	*97.9*			*31.0-160*		*04/11/2018 19:39*	WG1095662

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4480		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0220	J	0.0197	0.100	1	04/11/2018 14:06	WG1096182

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/09/2018 17:19	WG1094975

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	523		1.04	20.0	20	04/07/2018 21:34	WG1095122
Fluoride	1.62		0.00990	0.100	1	04/07/2018 21:20	WG1095122
Sulfate	2590		3.87	250	50	04/10/2018 00:33	WG1095384

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	04/09/2018 14:49	WG1095322
Mercury,Dissolved	U		0.0000490	0.000200	1	04/10/2018 11:32	WG1095325

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.611		0.0126	0.200	1	04/09/2018 16:09	WG1095148
Boron,Dissolved	0.631		0.0126	0.200	1	04/10/2018 15:07	WG1095189

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00591		0.000250	0.00200	1	04/15/2018 22:20	WG1095153
Arsenic,Dissolved	0.00359		0.000250	0.00200	1	04/12/2018 19:56	WG1095157
Barium	0.0141		0.000360	0.00500	1	04/15/2018 22:20	WG1095153
Barium,Dissolved	0.0158		0.000360	0.00500	1	04/12/2018 19:56	WG1095157
Cadmium	U		0.000160	0.00100	1	04/15/2018 22:20	WG1095153
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 19:56	WG1095157
Calcium	651		0.0460	1.00	1	04/15/2018 22:20	WG1095153
Chromium	U		0.000540	0.00200	1	04/15/2018 22:20	WG1095153
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 19:56	WG1095157
Cobalt	U		0.000260	0.00200	1	04/15/2018 22:20	WG1095153
Cobalt,Dissolved	U		0.000260	0.00200	1	04/12/2018 19:56	WG1095157
Iron	1.33		0.0150	0.100	1	04/15/2018 22:20	WG1095153
Iron,Dissolved	0.734		0.0150	0.100	1	04/12/2018 19:56	WG1095157
Lead	0.00179	J	0.000240	0.00200	1	04/15/2018 22:20	WG1095153
Lead,Dissolved	0.000338	J	0.000240	0.00200	1	04/12/2018 19:56	WG1095157
Manganese	0.457		0.000250	0.00500	1	04/15/2018 22:20	WG1095153
Manganese,Dissolved	0.474		0.000250	0.00500	1	04/12/2018 19:56	WG1095157
Nickel	0.00452		0.000350	0.00200	1	04/15/2018 22:20	WG1095153
Nickel,Dissolved	0.00433		0.000350	0.00200	1	04/12/2018 19:56	WG1095157

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	6.27		0.0370	1.00	1	04/15/2018 22:20	WG1095153
Selenium	U		0.000380	0.00200	1	04/15/2018 22:20	WG1095153
Selenium,Dissolved	0.000617	J	0.000380	0.00200	1	04/12/2018 19:56	WG1095157
Sodium	371		0.110	1.00	1	04/15/2018 22:20	WG1095153
Uranium	0.000779	J	0.000330	0.0100	1	04/15/2018 22:20	WG1095153
Uranium,Dissolved	0.000930	J	0.000330	0.0100	1	04/12/2018 19:56	WG1095157
Vanadium	0.000586	J	0.000180	0.00500	1	04/15/2018 22:20	WG1095153
Vanadium,Dissolved	0.000441	J	0.000180	0.00500	1	04/12/2018 19:56	WG1095157

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 16:52	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 16:52	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:52	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:52	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:52	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:52	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:52	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:52	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:52	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:52	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:52	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 16:52	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:52	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:52	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:52	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:52	WG1095245
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:52	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:52	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 20:45	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:52	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:52	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:52	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:52	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:52	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:52	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:52	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:52	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:52	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:52	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:52	WG1095245
Methyl tert-butyl ether	0.00506		0.000367	0.00100	1	04/07/2018 16:52	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:52	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:52	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 16:52	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:52	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:52	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:52	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 16:52	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:52	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:52	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:52	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:52	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:52	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:52	WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:52	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:52	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:52	WG1095245
(S) Toluene-d8	*110*			*80.0-120*		*04/07/2018 16:52*	WG1095245
(S) Toluene-d8	*98.4*			*80.0-120*		*04/12/2018 20:45*	WG1095245
(S) Dibromofluoromethane	*99.3*			*76.0-123*		*04/12/2018 20:45*	WG1095245
(S) Dibromofluoromethane	*86.2*			*76.0-123*		*04/07/2018 16:52*	WG1095245
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/07/2018 16:52*	WG1095245
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/12/2018 20:45*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.502		0.0247	0.100	1	04/11/2018 19:59	WG1095662
(S) o-Terphenyl	*94.7*			*31.0-160*		*04/11/2018 19:59*	WG1095662

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1520		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.197	1.00	10	04/11/2018 14:07	WG1096182

Sample Narrative:

L983855-03 WG1096182: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	323		1.04	20.0	20	04/07/2018 22:01	WG1095122
Fluoride	1.36		0.00990	0.100	1	04/07/2018 21:47	WG1095122
Sulfate	85.2		0.0774	5.00	1	04/07/2018 21:47	WG1095122

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00175	J	0.000250	0.00200	1	04/15/2018 21:34	WG1095153
Arsenic,Dissolved	0.000682	J	0.000250	0.00200	1	04/12/2018 20:00	WG1095157
Barium	0.452		0.000360	0.00500	1	04/15/2018 21:34	WG1095153
Barium,Dissolved	0.472		0.000360	0.00500	1	04/12/2018 20:00	WG1095157
Calcium	276		0.0460	1.00	1	04/15/2018 21:34	WG1095153
Chromium	U		0.000540	0.00200	1	04/15/2018 21:34	WG1095153
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 20:00	WG1095157
Iron	0.0183	J	0.0150	0.100	1	04/15/2018 21:34	WG1095153
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 20:00	WG1095157
Lead	0.000440	J	0.000240	0.00200	1	04/15/2018 21:34	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 20:00	WG1095157
Manganese	0.0204		0.000250	0.00500	1	04/15/2018 21:34	WG1095153
Manganese,Dissolved	0.0224		0.000250	0.00500	1	04/12/2018 20:00	WG1095157
Potassium	1.32		0.0370	1.00	1	04/15/2018 21:34	WG1095153
Selenium	0.000485	J	0.000380	0.00200	1	04/15/2018 21:34	WG1095153
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 20:00	WG1095157
Sodium	113		0.110	1.00	1	04/15/2018 21:34	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.100	0.500	10	04/12/2018 21:05	WG1095245
Benzene	1.02		0.00331	0.0100	10	04/12/2018 21:05	WG1095245
Bromodichloromethane	U		0.00380	0.0100	10	04/12/2018 21:05	WG1095245
Bromoform	U		0.00469	0.0100	10	04/12/2018 21:05	WG1095245
Bromomethane	U		0.00866	0.0500	10	04/12/2018 21:05	WG1095245
n-Butylbenzene	0.00788	J	0.00361	0.0100	10	04/12/2018 21:05	WG1095245
sec-Butylbenzene	0.0188		0.00365	0.0100	10	04/12/2018 21:05	WG1095245
Carbon disulfide	U		0.00275	0.0100	10	04/12/2018 21:05	WG1095245
Carbon tetrachloride	U		0.00379	0.0100	10	04/12/2018 21:05	WG1095245
Chlorobenzene	U		0.00348	0.0100	10	04/12/2018 21:05	WG1095245
Chlorodibromomethane	U		0.00327	0.0100	10	04/12/2018 21:05	WG1095245
Chloroethane	U		0.00453	0.0500	10	04/12/2018 21:05	WG1095245
Chloroform	U		0.00324	0.0500	10	04/12/2018 21:05	WG1095245

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.00276	0.0250	10	04/12/2018 21:05	WG1095245
1,2-Dibromoethane	U		0.00381	0.0100	10	04/12/2018 21:05	WG1095245
1,1-Dichloroethane	U		0.00259	0.0100	10	04/12/2018 21:05	WG1095245
1,2-Dichloroethane	U		0.00361	0.0100	10	04/12/2018 21:05	WG1095245
1,1-Dichloroethene	U		0.00398	0.0100	10	04/12/2018 21:05	WG1095245
cis-1,2-Dichloroethene	U		0.00260	0.0100	10	04/12/2018 21:05	WG1095245
trans-1,2-Dichloroethene	U		0.00396	0.0100	10	04/12/2018 21:05	WG1095245
1,2-Dichloropropane	U		0.00306	0.0100	10	04/12/2018 21:05	WG1095245
cis-1,3-Dichloropropene	U		0.00418	0.0100	10	04/12/2018 21:05	WG1095245
trans-1,3-Dichloropropene	U		0.00419	0.0100	10	04/12/2018 21:05	WG1095245
Ethylbenzene	U		0.00384	0.0100	10	04/12/2018 21:05	WG1095245
Isopropylbenzene	0.0979		0.00326	0.0100	10	04/12/2018 21:05	WG1095245
p-Isopropyltoluene	0.00522	J	0.00350	0.0100	10	04/12/2018 21:05	WG1095245
2-Butanone (MEK)	U		0.0393	0.100	10	04/12/2018 21:05	WG1095245
2-Hexanone	U		0.0382	0.100	10	04/12/2018 21:05	WG1095245
Methylene Chloride	U		0.0100	0.0500	10	04/12/2018 21:05	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.0214	0.100	10	04/12/2018 21:05	WG1095245
Methyl tert-butyl ether	U		0.00367	0.0100	10	04/12/2018 21:05	WG1095245
Naphthalene	U		0.0100	0.0500	10	04/12/2018 21:05	WG1095245
n-Propylbenzene	0.100		0.00349	0.0100	10	04/12/2018 21:05	WG1095245
Styrene	U		0.00307	0.0100	10	04/12/2018 21:05	WG1095245
1,1,1,2-Tetrachloroethane	U		0.00385	0.0100	10	04/12/2018 21:05	WG1095245
1,1,2,2-Tetrachloroethane	U		0.00130	0.0100	10	04/12/2018 21:05	WG1095245
Tetrachloroethene	U		0.00372	0.0100	10	04/12/2018 21:05	WG1095245
Toluene	U		0.00412	0.0100	10	04/12/2018 21:05	WG1095245
1,1,1-Trichloroethane	U		0.00319	0.0100	10	04/12/2018 21:05	WG1095245
1,1,2-Trichloroethane	U		0.00383	0.0100	10	04/12/2018 21:05	WG1095245
Trichloroethene	U		0.00398	0.0100	10	04/12/2018 21:05	WG1095245
1,2,4-Trimethylbenzene	0.0123		0.00373	0.0100	10	04/12/2018 21:05	WG1095245
1,3,5-Trimethylbenzene	U		0.00387	0.0100	10	04/12/2018 21:05	WG1095245
Vinyl chloride	U		0.00259	0.0100	10	04/12/2018 21:05	WG1095245
o-Xylene	U		0.00341	0.0100	10	04/12/2018 21:05	WG1095245
m&p-Xylene	0.0390		0.00719	0.0200	10	04/12/2018 21:05	WG1095245
Xylenes, Total	0.0390		0.0106	0.0300	10	04/12/2018 21:05	WG1095245
(S) Toluene-d8	*103*			*80.0-120*		*04/12/2018 21:05*	WG1095245
(S) Dibromofluoromethane	*94.8*			*76.0-123*		*04/12/2018 21:05*	WG1095245
(S) 4-Bromofluorobenzene	*99.3*			*80.0-120*		*04/12/2018 21:05*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	5.16		0.0247	0.100	1	04/11/2018 20:20	WG1095662
(S) o-Terphenyl	*107*			*31.0-160*		*04/11/2018 20:20*	WG1095662

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2180		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/11/2018 14:08	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	486		1.04	20.0	20	04/07/2018 22:27	WG1095122
Fluoride	2.63		0.00990	0.100	1	04/07/2018 22:14	WG1095122
Sulfate	870		1.55	100	20	04/07/2018 22:27	WG1095122

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00382		0.000250	0.00200	1	04/15/2018 21:39	WG1095153
Arsenic,Dissolved	0.00221		0.000250	0.00200	1	04/12/2018 20:03	WG1095157
Barium	0.0223		0.000360	0.00500	1	04/15/2018 21:39	WG1095153
Barium,Dissolved	0.0217		0.000360	0.00500	1	04/12/2018 20:03	WG1095157
Calcium	473		0.0460	1.00	1	04/15/2018 21:39	WG1095153
Chromium	U		0.000540	0.00200	1	04/15/2018 21:39	WG1095153
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 20:03	WG1095157
Iron	1.64		0.0150	0.100	1	04/15/2018 21:39	WG1095153
Iron,Dissolved	0.695		0.0150	0.100	1	04/12/2018 20:03	WG1095157
Lead	U		0.000240	0.00200	1	04/15/2018 21:39	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 20:03	WG1095157
Manganese	0.117		0.000250	0.00500	1	04/15/2018 21:39	WG1095153
Manganese,Dissolved	0.117		0.000250	0.00500	1	04/12/2018 20:03	WG1095157
Potassium	5.70		0.0370	1.00	1	04/15/2018 21:39	WG1095153
Selenium	0.000746	J	0.000380	0.00200	1	04/15/2018 21:39	WG1095153
Selenium,Dissolved	0.000554	J	0.000380	0.00200	1	04/12/2018 20:03	WG1095157
Sodium	122		0.110	1.00	1	04/15/2018 21:39	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 17:34	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 17:34	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 17:34	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 17:34	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 17:34	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 17:34	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 17:34	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 17:34	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 17:34	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 17:34	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 17:34	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 17:34	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 17:34	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 17:34	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 17:34	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 17:34	WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 17:34	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 17:34	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 17:34	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 17:34	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 17:34	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 17:34	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 17:34	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 17:34	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 17:34	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 17:34	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 17:34	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 17:34	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 17:34	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 17:34	WG1095245
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 17:34	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 17:34	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 17:34	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 17:34	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 17:34	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 17:34	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 17:34	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 17:34	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 17:34	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 17:34	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 17:34	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 17:34	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 17:34	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 17:34	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 17:34	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 17:34	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 17:34	WG1095245
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 17:34*	WG1095245
(S) Dibromofluoromethane	*85.0*			*76.0-123*		*04/07/2018 17:34*	WG1095245
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/07/2018 17:34*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.44		0.0247	0.100	1	04/12/2018 02:04	WG1095662
(S) o-Terphenyl	*104*			*31.0-160*		*04/12/2018 02:04*	WG1095662

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2200		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U	J3 J6	0.0197	0.100	1	04/11/2018 14:10	WG1096182

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	144		1.04	20.0	20	04/07/2018 22:54	WG1095122
Fluoride	1.88		0.00990	0.100	1	04/07/2018 22:41	WG1095122
Sulfate	1280		1.55	100	20	04/07/2018 22:54	WG1095122

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0387		0.000250	0.00200	1	04/15/2018 21:43	WG1095153
Arsenic,Dissolved	0.0310		0.000250	0.00200	1	04/12/2018 20:07	WG1095157
Barium	0.0230		0.000360	0.00500	1	04/15/2018 21:43	WG1095153
Barium,Dissolved	0.0234		0.000360	0.00500	1	04/12/2018 20:07	WG1095157
Calcium	361		0.0460	1.00	1	04/15/2018 21:43	WG1095153
Chromium	0.00120	J	0.000540	0.00200	1	04/15/2018 21:43	WG1095153
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 20:07	WG1095157
Iron	1.03		0.0150	0.100	1	04/15/2018 21:43	WG1095153
Iron,Dissolved	0.828		0.0150	0.100	1	04/12/2018 20:07	WG1095157
Lead	0.000489	J	0.000240	0.00200	1	04/15/2018 21:43	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 20:07	WG1095157
Manganese	0.884		0.000250	0.00500	1	04/15/2018 21:43	WG1095153
Manganese,Dissolved	0.887		0.000250	0.00500	1	04/12/2018 20:07	WG1095157
Potassium	2.44		0.0370	1.00	1	04/15/2018 21:43	WG1095153
Selenium	U		0.000380	0.00200	1	04/15/2018 21:43	WG1095153
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 20:07	WG1095157
Sodium	129		0.110	1.00	1	04/15/2018 21:43	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 17:54	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 17:54	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 17:54	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 17:54	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 17:54	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 17:54	WG1095245
sec-Butylbenzene	0.000372	J	0.000365	0.00100	1	04/07/2018 17:54	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 17:54	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 17:54	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 17:54	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 17:54	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 17:54	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 17:54	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 17:54	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 17:54	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 17:54	WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 17:54	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 17:54	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 17:54	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 17:54	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 17:54	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 17:54	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 17:54	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 17:54	WG1095245
Isopropylbenzene	0.00122		0.000326	0.00100	1	04/07/2018 17:54	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 17:54	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 17:54	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 17:54	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 17:54	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 17:54	WG1095245
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 17:54	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 17:54	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 17:54	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 17:54	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 17:54	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 17:54	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 17:54	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 17:54	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 17:54	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 17:54	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 17:54	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 17:54	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 17:54	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 17:54	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 17:54	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 17:54	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 17:54	WG1095245
(S) Toluene-d8	*110*			*80.0-120*		*04/07/2018 17:54*	WG1095245
(S) Dibromofluoromethane	*86.5*			*76.0-123*		*04/07/2018 17:54*	WG1095245
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/07/2018 17:54*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.65		0.0247	0.100	1	04/12/2018 02:24	WG1095662
(S) o-Terphenyl	*124*			*31.0-160*		*04/12/2018 02:24*	WG1095662

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2450		2.82	10.0	1	04/11/2018 17:00	WG1096154

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	2.72	J6	0.0197	0.100	1	04/11/2018 15:29	WG1096185

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	130		1.04	20.0	20	04/07/2018 23:48	WG1095122
Fluoride	1.51		0.00990	0.100	1	04/07/2018 23:34	WG1095122
Sulfate	1450		1.55	100	20	04/07/2018 23:48	WG1095122

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00443		0.000250	0.00200	1	04/15/2018 21:48	WG1095153
Arsenic,Dissolved	0.00327		0.000250	0.00200	1	04/12/2018 20:26	WG1095157
Barium	0.0199		0.000360	0.00500	1	04/15/2018 21:48	WG1095153
Barium,Dissolved	0.0189		0.000360	0.00500	1	04/12/2018 20:26	WG1095157
Calcium	425		0.0460	1.00	1	04/15/2018 21:48	WG1095153
Chromium	0.000813	J	0.000540	0.00200	1	04/15/2018 21:48	WG1095153
Chromium,Dissolved	0.00348	B	0.000540	0.00200	1	04/12/2018 20:26	WG1095157
Iron	0.0806	J	0.0150	0.100	1	04/15/2018 21:48	WG1095153
Iron,Dissolved	0.0315	B J	0.0150	0.100	1	04/12/2018 20:26	WG1095157
Lead	0.000723	J	0.000240	0.00200	1	04/15/2018 21:48	WG1095153
Lead,Dissolved	0.000265	J	0.000240	0.00200	1	04/12/2018 20:26	WG1095157
Manganese	0.926		0.000250	0.00500	1	04/15/2018 21:48	WG1095153
Manganese,Dissolved	0.954		0.000250	0.00500	1	04/12/2018 20:26	WG1095157
Potassium	3.41		0.0370	1.00	1	04/15/2018 21:48	WG1095153
Selenium	0.00138	J	0.000380	0.00200	1	04/15/2018 21:48	WG1095153
Selenium,Dissolved	0.00189	J	0.000380	0.00200	1	04/12/2018 20:26	WG1095157
Sodium	116		0.110	1.00	1	04/15/2018 21:48	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 18:15	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 18:15	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 18:15	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 18:15	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 18:15	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 18:15	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 18:15	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 18:15	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 18:15	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 18:15	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 18:15	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 18:15	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 18:15	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 18:15	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 18:15	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 18:15	WG1095245

NCL-32

Collected date/time: 04/04/18 13:20

SAMPLE RESULTS - 06

L983855

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 18:15	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 18:15	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 18:15	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 18:15	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 18:15	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 18:15	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 18:15	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 18:15	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 18:15	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 18:15	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 18:15	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 18:15	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 18:15	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 18:15	WG1095245
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 18:15	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 18:15	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 18:15	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 18:15	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 18:15	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 18:15	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 18:15	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 18:15	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 18:15	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 18:15	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 18:15	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 18:15	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 18:15	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 18:15	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 18:15	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 18:15	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 18:15	WG1095245
(S) Toluene-d8	*111*			*80.0-120*		*04/07/2018 18:15*	WG1095245
(S) Dibromofluoromethane	*84.2*			*76.0-123*		*04/07/2018 18:15*	WG1095245
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/07/2018 18:15*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.971		0.0247	0.100	1	04/12/2018 02:44	WG1095662
(S) o-Terphenyl	*95.9*			*31.0-160*		*04/12/2018 02:44*	WG1095662

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2730	J3	2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.394	2.00	20	04/11/2018 15:32	WG1096185

Sample Narrative:

L983855-07 WG1096185: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	71.0		0.0519	1.00	1	04/08/2018 00:01	WG1095122
Fluoride	2.68		0.00990	0.100	1	04/08/2018 00:01	WG1095122
Sulfate	1790		1.55	100	20	04/08/2018 00:15	WG1095122

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00398		0.000250	0.00200	1	04/15/2018 21:53	WG1095153
Arsenic,Dissolved	0.00287		0.000250	0.00200	1	04/12/2018 20:30	WG1095157
Barium	0.0468		0.000360	0.00500	1	04/15/2018 21:53	WG1095153
Barium,Dissolved	0.0467		0.000360	0.00500	1	04/12/2018 20:30	WG1095157
Calcium	426		0.0460	1.00	1	04/15/2018 21:53	WG1095153
Chromium	0.00323		0.000540	0.00200	1	04/15/2018 21:53	WG1095153
Chromium,Dissolved	0.00517	B	0.000540	0.00200	1	04/12/2018 20:30	WG1095157
Iron	0.174		0.0150	0.100	1	04/15/2018 21:53	WG1095153
Iron,Dissolved	0.0524	B J	0.0150	0.100	1	04/12/2018 20:30	WG1095157
Lead	0.00243		0.000240	0.00200	1	04/15/2018 21:53	WG1095153
Lead,Dissolved	0.00141	J	0.000240	0.00200	1	04/12/2018 20:30	WG1095157
Manganese	0.0342		0.000250	0.00500	1	04/15/2018 21:53	WG1095153
Manganese,Dissolved	0.0347		0.000250	0.00500	1	04/12/2018 20:30	WG1095157
Potassium	3.17		0.0370	1.00	1	04/15/2018 21:53	WG1095153
Selenium	0.000702	J	0.000380	0.00200	1	04/15/2018 21:53	WG1095153
Selenium,Dissolved	0.000610	J	0.000380	0.00200	1	04/12/2018 20:30	WG1095157
Sodium	137		0.110	1.00	1	04/15/2018 21:53	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.250	1.25	25	04/07/2018 18:35	WG1095245
Benzene	0.265		0.00828	0.0250	25	04/07/2018 18:35	WG1095245
Bromodichloromethane	U		0.00950	0.0250	25	04/07/2018 18:35	WG1095245
Bromoform	U		0.0117	0.0250	25	04/07/2018 18:35	WG1095245
Bromomethane	U		0.0216	0.125	25	04/07/2018 18:35	WG1095245
n-Butylbenzene	U		0.00902	0.0250	25	04/07/2018 18:35	WG1095245
sec-Butylbenzene	U		0.00912	0.0250	25	04/07/2018 18:35	WG1095245
Carbon disulfide	U		0.00688	0.0250	25	04/07/2018 18:35	WG1095245
Carbon tetrachloride	U		0.00948	0.0250	25	04/07/2018 18:35	WG1095245
Chlorobenzene	U		0.00870	0.0250	25	04/07/2018 18:35	WG1095245
Chlorodibromomethane	U		0.00818	0.0250	25	04/07/2018 18:35	WG1095245
Chloroethane	U		0.0113	0.125	25	04/07/2018 18:35	WG1095245
Chloroform	U		0.00810	0.125	25	04/07/2018 18:35	WG1095245

MW-108

Collected date/time: 04/04/18 11:50

SAMPLE RESULTS - 07

L983855

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.00690	0.0625	25	04/07/2018 18:35	WG1095245
1,2-Dibromoethane	U		0.00952	0.0250	25	04/07/2018 18:35	WG1095245
1,1-Dichloroethane	U		0.00648	0.0250	25	04/07/2018 18:35	WG1095245
1,2-Dichloroethane	U		0.00902	0.0250	25	04/07/2018 18:35	WG1095245
1,1-Dichloroethene	U		0.00995	0.0250	25	04/07/2018 18:35	WG1095245
cis-1,2-Dichloroethene	U		0.00650	0.0250	25	04/07/2018 18:35	WG1095245
trans-1,2-Dichloroethene	U		0.00990	0.0250	25	04/07/2018 18:35	WG1095245
1,2-Dichloropropane	U		0.00765	0.0250	25	04/07/2018 18:35	WG1095245
cis-1,3-Dichloropropene	U		0.0104	0.0250	25	04/07/2018 18:35	WG1095245
trans-1,3-Dichloropropene	U		0.0105	0.0250	25	04/07/2018 18:35	WG1095245
Ethylbenzene	U		0.00960	0.0250	25	04/07/2018 18:35	WG1095245
Isopropylbenzene	0.0302		0.00815	0.0250	25	04/07/2018 18:35	WG1095245
p-Isopropyltoluene	U		0.00875	0.0250	25	04/07/2018 18:35	WG1095245
2-Butanone (MEK)	U		0.0982	0.250	25	04/07/2018 18:35	WG1095245
2-Hexanone	U		0.0955	0.250	25	04/07/2018 18:35	WG1095245
Methylene Chloride	U		0.0250	0.125	25	04/07/2018 18:35	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.0535	0.250	25	04/07/2018 18:35	WG1095245
Methyl tert-butyl ether	U		0.00918	0.0250	25	04/07/2018 18:35	WG1095245
Naphthalene	U		0.0250	0.125	25	04/07/2018 18:35	WG1095245
n-Propylbenzene	0.0319		0.00872	0.0250	25	04/07/2018 18:35	WG1095245
Styrene	U		0.00768	0.0250	25	04/07/2018 18:35	WG1095245
1,1,1,2-Tetrachloroethane	U		0.00962	0.0250	25	04/07/2018 18:35	WG1095245
1,1,2,2-Tetrachloroethane	U		0.00325	0.0250	25	04/07/2018 18:35	WG1095245
Tetrachloroethene	U		0.00930	0.0250	25	04/07/2018 18:35	WG1095245
Toluene	U		0.0103	0.0250	25	04/07/2018 18:35	WG1095245
1,1,1-Trichloroethane	U		0.00798	0.0250	25	04/07/2018 18:35	WG1095245
1,1,2-Trichloroethane	U		0.00958	0.0250	25	04/07/2018 18:35	WG1095245
Trichloroethene	U		0.00995	0.0250	25	04/07/2018 18:35	WG1095245
1,2,4-Trimethylbenzene	0.0462		0.00932	0.0250	25	04/07/2018 18:35	WG1095245
1,3,5-Trimethylbenzene	U		0.00968	0.0250	25	04/07/2018 18:35	WG1095245
Vinyl chloride	U		0.00648	0.0250	25	04/07/2018 18:35	WG1095245
o-Xylene	U		0.00852	0.0250	25	04/07/2018 18:35	WG1095245
m&p-Xylene	0.0646		0.0180	0.0500	25	04/07/2018 18:35	WG1095245
Xylenes, Total	0.0646	J	0.0265	0.0750	25	04/07/2018 18:35	WG1095245
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 18:35*	WG1095245
(S) Dibromofluoromethane	*86.4*			*76.0-123*		*04/07/2018 18:35*	WG1095245
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/07/2018 18:35*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	8.78		0.0247	0.100	1	04/12/2018 03:05	WG1095662
(S) o-Terphenyl	*113*			*31.0-160*		*04/12/2018 03:05*	WG1095662

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2100		2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0940	J	0.0197	0.100	1	04/11/2018 15:33	WG1096185

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	53.0		0.0519	1.00	1	04/08/2018 00:28	WG1095122
Fluoride	1.39		0.00990	0.100	1	04/08/2018 00:28	WG1095122
Sulfate	1600		1.55	100	20	04/08/2018 00:41	WG1095122

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0129		0.000250	0.00200	1	04/15/2018 21:57	WG1095153
Arsenic,Dissolved	0.0115		0.000250	0.00200	1	04/12/2018 20:34	WG1095157
Barium	0.0150		0.000360	0.00500	1	04/15/2018 21:57	WG1095153
Barium,Dissolved	0.0141		0.000360	0.00500	1	04/12/2018 20:34	WG1095157
Calcium	325		0.0460	1.00	1	04/15/2018 21:57	WG1095153
Chromium	0.00375		0.000540	0.00200	1	04/15/2018 21:57	WG1095153
Chromium,Dissolved	0.00103	B J	0.000540	0.00200	1	04/12/2018 20:34	WG1095157
Iron	0.998		0.0150	0.100	1	04/15/2018 21:57	WG1095153
Iron,Dissolved	0.899		0.0150	0.100	1	04/12/2018 20:34	WG1095157
Lead	0.000361	J	0.000240	0.00200	1	04/15/2018 21:57	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 20:34	WG1095157
Manganese	2.05		0.000250	0.00500	1	04/15/2018 21:57	WG1095153
Manganese,Dissolved	2.04		0.000250	0.00500	1	04/12/2018 20:34	WG1095157
Potassium	0.422	J	0.0370	1.00	1	04/15/2018 21:57	WG1095153
Selenium	U		0.000380	0.00200	1	04/15/2018 21:57	WG1095153
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 20:34	WG1095157
Sodium	97.4		0.110	1.00	1	04/15/2018 21:57	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 18:56	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 18:56	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 18:56	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 18:56	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 18:56	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 18:56	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 18:56	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 18:56	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 18:56	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 18:56	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 18:56	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 18:56	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 18:56	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 18:56	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 18:56	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 18:56	WG1095245

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 18:56	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 18:56	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 18:56	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 18:56	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 18:56	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 18:56	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 18:56	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 18:56	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 18:56	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 18:56	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 18:56	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 18:56	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 18:56	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 18:56	WG1095245
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 18:56	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 18:56	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 18:56	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 18:56	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 18:56	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 18:56	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 18:56	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 18:56	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 18:56	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 18:56	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 18:56	WG1095245
1,2,4-Trimethylbenzene	0.000514	J	0.000373	0.00100	1	04/07/2018 18:56	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 18:56	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 18:56	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 18:56	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 18:56	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 18:56	WG1095245
(S) Toluene-d8	*111*			*80.0-120*		*04/07/2018 18:56*	WG1095245
(S) Dibromofluoromethane	*86.7*			*76.0-123*		*04/07/2018 18:56*	WG1095245
(S) 4-Bromofluorobenzene	*107*			*80.0-120*		*04/07/2018 18:56*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.927		0.0247	0.100	1	04/12/2018 03:25	WG1095662
(S) o-Terphenyl	*105*			*31.0-160*		*04/12/2018 03:25*	WG1095662

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3670		2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	1.41		0.0197	0.100	1	04/11/2018 15:34	WG1096185

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 17:20	WG1094975

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	523		1.04	20.0	20	04/08/2018 01:08	WG1095122
Fluoride	1.58		0.00990	0.100	1	04/08/2018 00:55	WG1095122
Sulfate	1770		1.55	100	20	04/08/2018 01:08	WG1095122

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.000151	J	0.0000490	0.000200	1	04/09/2018 14:51	WG1095322
Mercury,Dissolved	U		0.0000490	0.000200	1	04/10/2018 11:41	WG1095325

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	1.50		0.0126	0.200	1	04/09/2018 16:23	WG1095148
Boron,Dissolved	1.50		0.0126	0.200	1	04/10/2018 15:10	WG1095189

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00661		0.000250	0.00200	1	04/15/2018 22:25	WG1095153
Arsenic,Dissolved	0.00562		0.000250	0.00200	1	04/12/2018 20:38	WG1095157
Barium	0.0128		0.000360	0.00500	1	04/15/2018 22:25	WG1095153
Barium,Dissolved	0.0120		0.000360	0.00500	1	04/12/2018 20:38	WG1095157
Cadmium	U		0.000160	0.00100	1	04/15/2018 22:25	WG1095153
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 20:38	WG1095157
Calcium	455		0.0460	1.00	1	04/15/2018 22:25	WG1095153
Chromium	0.000955	J	0.000540	0.00200	1	04/15/2018 22:25	WG1095153
Chromium,Dissolved	U		0.000540	0.00200	1	04/12/2018 20:38	WG1095157
Cobalt	0.000359	J	0.000260	0.00200	1	04/15/2018 22:25	WG1095153
Cobalt,Dissolved	U		0.000260	0.00200	1	04/12/2018 20:38	WG1095157
Iron	0.0331	J	0.0150	0.100	1	04/15/2018 22:25	WG1095153
Iron,Dissolved	U		0.0150	0.100	1	04/12/2018 20:38	WG1095157
Lead	0.000370	J	0.000240	0.00200	1	04/15/2018 22:25	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 20:38	WG1095157
Manganese	0.139		0.000250	0.00500	1	04/15/2018 22:25	WG1095153
Manganese,Dissolved	0.114		0.000250	0.00500	1	04/12/2018 20:38	WG1095157
Nickel	0.00581		0.000350	0.00200	1	04/15/2018 22:25	WG1095153
Nickel,Dissolved	0.00608		0.000350	0.00200	1	04/12/2018 20:38	WG1095157

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Potassium	0.838	J	0.0370	1.00	1	04/15/2018 22:25	WG1095153
Selenium	0.00444		0.000380	0.00200	1	04/15/2018 22:25	WG1095153
Selenium,Dissolved	0.00365		0.000380	0.00200	1	04/12/2018 20:38	WG1095157
Sodium	214		0.110	1.00	1	04/15/2018 22:25	WG1095153
Uranium	0.0503		0.000330	0.0100	1	04/15/2018 22:25	WG1095153
Uranium,Dissolved	0.0518		0.000330	0.0100	1	04/12/2018 20:38	WG1095157
Vanadium	0.0190		0.000180	0.00500	1	04/15/2018 22:25	WG1095153
Vanadium,Dissolved	0.0189		0.000180	0.00500	1	04/12/2018 20:38	WG1095157

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.0479	J	0.0314	0.100	1	04/10/2018 19:03	WG1095828
(S) a,a,a-Trifluorotoluene(FID)	*100*			*77.0-122*		*04/10/2018 19:03*	WG1095828

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 19:17	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 19:17	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 19:17	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 19:17	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 19:17	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 19:17	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 19:17	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 19:17	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 19:17	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 19:17	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 19:17	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 19:17	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 19:17	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 19:17	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 19:17	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 19:17	WG1095245
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 19:17	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 19:17	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 19:17	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 19:17	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 19:17	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 19:17	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 19:17	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 19:17	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 19:17	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 19:17	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 19:17	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 19:17	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 19:17	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 19:17	WG1095245
Methyl tert-butyl ether	0.0302		0.000367	0.00100	1	04/07/2018 19:17	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 19:17	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 19:17	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 19:17	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 19:17	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 19:17	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 19:17	WG1095245

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	04/07/2018 19:17	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 19:17	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 19:17	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 19:17	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 19:17	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 19:17	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 19:17	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 19:17	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 19:17	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 19:17	WG1095245
(S) Toluene-d8	*112*			*80.0-120*		*04/07/2018 19:17*	WG1095245
(S) Dibromofluoromethane	*84.0*			*76.0-123*		*04/07/2018 19:17*	WG1095245
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/07/2018 19:17*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.518		0.0247	0.100	1	04/12/2018 03:45	WG1095662
(S) o-Terphenyl	*100*			*31.0-160*		*04/12/2018 03:45*	WG1095662

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2580		2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	37.9		0.394	2.00	20	04/11/2018 15:35	WG1096185

Wet Chemistry by Method 4500CN E-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 17:22	WG1094975

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Chloride	154		1.04	20.0	20	04/08/2018 01:35	WG1095122
Fluoride	1.59		0.00990	0.100	1	04/08/2018 01:22	WG1095122
Sulfate	1820		1.55	100	20	04/08/2018 01:35	WG1095122

Mercury by Method 7470A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/09/2018 14:54	WG1095322
Mercury,Dissolved	U		0.0000490	0.000200	1	04/10/2018 11:44	WG1095325

Metals (ICP) by Method 6010B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Boron	1.40		0.0126	0.200	1	04/09/2018 16:27	WG1095148
Boron,Dissolved	1.39		0.0126	0.200	1	04/10/2018 15:12	WG1095189

Metals (ICPMS) by Method 6020

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00413		0.000250	0.00200	1	04/15/2018 22:30	WG1095153
Arsenic,Dissolved	0.00297		0.000250	0.00200	1	04/12/2018 20:42	WG1095157
Barium	0.0130		0.000360	0.00500	1	04/15/2018 22:30	WG1095153
Barium,Dissolved	0.0148		0.000360	0.00500	1	04/12/2018 20:42	WG1095157
Cadmium	U		0.000160	0.00100	1	04/15/2018 22:30	WG1095153
Cadmium,Dissolved	U		0.000160	0.00100	1	04/12/2018 20:42	WG1095157
Calcium	472		0.0460	1.00	1	04/15/2018 22:30	WG1095153
Chromium	0.000973	J	0.000540	0.00200	1	04/15/2018 22:30	WG1095153
Chromium,Dissolved	0.0156		0.000540	0.00200	1	04/12/2018 20:42	WG1095157
Cobalt	U		0.000260	0.00200	1	04/15/2018 22:30	WG1095153
Cobalt,Dissolved	U		0.000260	0.00200	1	04/12/2018 20:42	WG1095157
Iron	U		0.0150	0.100	1	04/15/2018 22:30	WG1095153
Iron,Dissolved	0.113	B	0.0150	0.100	1	04/12/2018 20:42	WG1095157
Lead	0.000243	J	0.000240	0.00200	1	04/15/2018 22:30	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 20:42	WG1095157
Manganese	0.0125		0.000250	0.00500	1	04/15/2018 22:30	WG1095153
Manganese,Dissolved	0.00722		0.000250	0.00500	1	04/12/2018 20:42	WG1095157
Nickel	0.00198	J	0.000350	0.00200	1	04/15/2018 22:30	WG1095153
Nickel,Dissolved	0.00204		0.000350	0.00200	1	04/12/2018 20:42	WG1095157

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Potassium	3.05		0.0370	1.00	1	04/15/2018 22:30	WG1095153
Selenium	0.0148		0.000380	0.00200	1	04/15/2018 22:30	WG1095153
Selenium,Dissolved	0.0155		0.000380	0.00200	1	04/12/2018 20:42	WG1095157
Sodium	90.2		0.110	1.00	1	04/15/2018 22:30	WG1095153
Uranium	0.0378		0.000330	0.0100	1	04/15/2018 22:30	WG1095153
Uranium,Dissolved	0.0403		0.000330	0.0100	1	04/12/2018 20:42	WG1095157
Vanadium	0.0178		0.000180	0.00500	1	04/15/2018 22:30	WG1095153
Vanadium,Dissolved	0.0177		0.000180	0.00500	1	04/12/2018 20:42	WG1095157

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 19:37	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 19:37	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 19:37	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 19:37	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 19:37	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 19:37	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 19:37	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 19:37	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 19:37	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 19:37	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 19:37	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 19:37	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 19:37	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 19:37	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 19:37	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 19:37	WG1095245
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 19:37	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 19:37	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 19:37	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 19:37	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 19:37	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 19:37	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 19:37	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 19:37	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 19:37	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 19:37	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 19:37	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 19:37	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 19:37	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 19:37	WG1095245
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 19:37	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 19:37	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 19:37	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 19:37	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 19:37	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 19:37	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 19:37	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 19:37	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 19:37	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 19:37	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 19:37	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 19:37	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 19:37	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 19:37	WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
o-Xylene	U		0.000341	0.00100	1	04/07/2018 19:37	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 19:37	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 19:37	WG1095245
(S) Toluene-d8	*110*			*80.0-120*		*04/07/2018 19:37*	WG1095245
(S) Dibromofluoromethane	*84.0*			*76.0-123*		*04/07/2018 19:37*	WG1095245
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/07/2018 19:37*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.672		0.0247	0.100	1	04/12/2018 04:05	WG1095662
(S) o-Terphenyl	*93.0*			*31.0-160*		*04/12/2018 04:05*	WG1095662

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

EB-NCL-01

Collected date/time: 04/04/18 13:35

SAMPLE RESULTS - 11

L983855

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	11.0		2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/11/2018 15:36	WG1096185

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.0722	B J P1	0.0519	1.00	1	04/07/2018 16:25	WG1095122
Fluoride	U		0.00990	0.100	1	04/07/2018 16:25	WG1095122
Sulfate	0.286	J P1	0.0774	5.00	1	04/07/2018 16:25	WG1095122

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00101	J	0.000250	0.00200	1	04/15/2018 22:35	WG1095153
Arsenic,Dissolved	U		0.000250	0.00200	1	04/12/2018 18:52	WG1095157
Barium	U		0.000360	0.00500	1	04/15/2018 22:35	WG1095153
Barium,Dissolved	U		0.000360	0.00500	1	04/12/2018 18:52	WG1095157
Calcium	0.0681	J	0.0460	1.00	1	04/15/2018 22:35	WG1095153
Chromium	0.00105	J	0.000540	0.00200	1	04/15/2018 22:35	WG1095153
Chromium,Dissolved	0.00157	B J	0.000540	0.00200	1	04/12/2018 18:52	WG1095157
Iron	U		0.0150	0.100	1	04/15/2018 22:35	WG1095153
Iron,Dissolved	0.0224	B J	0.0150	0.100	1	04/12/2018 18:52	WG1095157
Lead	U		0.000240	0.00200	1	04/15/2018 22:35	WG1095153
Lead,Dissolved	U		0.000240	0.00200	1	04/12/2018 18:52	WG1095157
Manganese	0.000278	J	0.000250	0.00500	1	04/15/2018 22:35	WG1095153
Manganese,Dissolved	0.000348	J	0.000250	0.00500	1	04/12/2018 18:52	WG1095157
Potassium	0.0479	J	0.0370	1.00	1	04/15/2018 22:35	WG1095153
Selenium	U		0.000380	0.00200	1	04/15/2018 22:35	WG1095153
Selenium,Dissolved	U		0.000380	0.00200	1	04/12/2018 18:52	WG1095157
Sodium	0.282	J	0.110	1.00	1	04/15/2018 22:35	WG1095153

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 19:58	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 19:58	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 19:58	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 19:58	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 19:58	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 19:58	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 19:58	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 19:58	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 19:58	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 19:58	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 19:58	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 19:58	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 19:58	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 19:58	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 19:58	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 19:58	WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 19:58	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 19:58	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 19:58	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 19:58	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 19:58	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 19:58	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 19:58	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 19:58	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 19:58	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 19:58	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 19:58	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 19:58	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 19:58	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 19:58	WG1095245
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 19:58	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 19:58	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 19:58	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 19:58	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 19:58	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 19:58	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 19:58	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 19:58	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 19:58	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 19:58	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 19:58	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 19:58	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 19:58	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 19:58	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 19:58	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 19:58	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 19:58	WG1095245
(S) Toluene-d8	*112*			*80.0-120*		*04/07/2018 19:58*	WG1095245
(S) Dibromofluoromethane	*83.8*			*76.0-123*		*04/07/2018 19:58*	WG1095245
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/07/2018 19:58*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/11/2018 22:35	WG1095663
(S) o-Terphenyl	*88.4*			*31.0-160*		*04/11/2018 22:35*	WG1095663

WG1096154

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983855-01,02,03,04,05,06

Method Blank (MB)

(MB) R3301367-1 04/11/18 17:00

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983849-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983849-03 04/11/18 17:00 • (DUP) R3301367-4 04/11/18 17:00

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	3660	3700	1	0.952		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301367-2 04/11/18 17:00 • (LCSD) R3301367-3 04/11/18 17:00

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8590	8230	97.6	93.5	85.0-115			4.28	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1096155

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983855-07,08,09,10,11

Method Blank (MB)

(MB) R3301384-1 04/11/18 16:21

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	4.00	J	2.82	10.0

L983855-07 Original Sample (OS) • Duplicate (DUP)

(OS) L983855-07 04/11/18 16:21 • (DUP) R3301384-4 04/11/18 16:21

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2730	3280	1	18.2	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301384-2 04/11/18 16:21 • (LCSD) R3301384-3 04/11/18 16:21

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8610	8590	97.8	97.6	85.0-115			0.233	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1096182

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L983855-01,02,03,04,05

Method Blank (MB)

(MB) R3300907-1 04/11/18 13:35

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983825-21 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-21 04/11/18 13:39 • (DUP) R3300907-4 04/11/18 13:40

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.758	0.757	1	0.132		20

L983855-04 Original Sample (OS) • Duplicate (DUP)

(OS) L983855-04 04/11/18 14:08 • (DUP) R3300907-6 04/11/18 14:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300907-2 04/11/18 13:36 • (LCSD) R3300907-3 04/11/18 13:37

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.91	4.02	97.7	101	90.0-110			2.88	20

L983825-22 Original Sample (OS) • Matrix Spike (MS)

(OS) L983825-22 04/11/18 13:41 • (MS) R3300907-5 04/11/18 13:42

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	0.599	2.90	92.1	1	90.0-110	

L983855-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-05 04/11/18 14:10 • (MS) R3300907-7 04/11/18 14:11 • (MSD) R3300907-8 04/11/18 14:12

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	U	1.80	2.25	72.2	90.1	1	90.0-110	J6	J3	22.1	20

QUALITY CONTROL SUMMARY

L983855-06,07,08,09,10,11

Method Blank (MB)

(MB) R3300964-1 04/11/18 15:15

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983849-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983849-01 04/11/18 15:18 • (DUP) R3300964-4 04/11/18 15:19

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	0.156	0.165	1	5.61		20

L983865-07 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-07 04/11/18 15:47 • (DUP) R3300964-6 04/11/18 15:48

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300964-2 04/11/18 15:16 • (LCSD) R3300964-3 04/11/18 15:17

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.89	3.96	97.2	98.9	90.0-110			1.73	20

L983855-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L983855-06 04/11/18 15:29 • (MS) R3300964-5 04/11/18 15:31

Analyte	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	2.72	4.71	79.3	1	90.0-110	J6

L983865-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-08 04/11/18 15:49 • (MS) R3300964-7 04/11/18 15:51 • (MSD) R3300964-8 04/11/18 15:52

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	0.0350	2.37	2.41	93.3	94.8	1	90.0-110			1.55	20

WG1094975

Wet Chemistry by Method 4500CN E-2011

QUALITY CONTROL SUMMARY

L983855-02,09,10

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300284-1 04/09/18 17:03

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L983514-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983514-01 04/09/18 17:08 • (DUP) R3300284-4 04/09/18 17:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L983865-22 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-22 04/09/18 17:24 • (DUP) R3300284-5 04/09/18 17:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300284-2 04/09/18 17:04 • (LCSD) R3300284-3 04/09/18 17:05

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0992	0.0906	99.2	90.6	85.0-115			9.06	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3299939-1 04/07/18 07:40

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.0743	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983855-11 Original Sample (OS) • Duplicate (DUP)

(OS) L983855-11 04/07/18 16:25 • (DUP) R3299939-4 04/07/18 16:38

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.0722	0.000	1	200	P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	0.286	0.000	1	200	P1	15

L983951-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983951-01 04/08/18 02:56 • (DUP) R3299939-7 04/08/18 03:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	1.12	1.02	1	9.13		15
Fluoride	0.0249	0.0247	1	0.806	J	15
Sulfate	5.49	5.49	1	0.0765		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299939-2 04/07/18 07:54 • (LCSD) R3299939-3 04/07/18 08:07

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.8	39.7	99.4	99.3	80.0-120			0.0526	15
Fluoride	8.00	8.03	8.04	100	101	80.0-120			0.174	15
Sulfate	40.0	40.1	40.1	100	100	80.0-120			0.0459	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983855-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-11 04/07/18 16:25 • (MS) R3299939-5 04/07/18 16:51 • (MSD) R3299939-6 04/07/18 17:05

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Fluoride	5.00	U	5.36	5.17	107	103	1	80.0-120			3.51	15

L983951-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L983951-01 04/08/18 02:56 • (MS) R3299939-8 04/08/18 03:22

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	1.12	51.2	100	1	80.0-120	
Fluoride	5.00	0.0249	5.11	102	1	80.0-120	
Sulfate	50.0	5.49	55.5	100	1	80.0-120	

QUALITY CONTROL SUMMARY

L983855-01,02

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300408-1 04/09/18 18:09

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	0.112	J	0.0774	5.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300408-2 04/09/18 18:22 • (LCSD) R3300408-3 04/09/18 18:36

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	40.0	39.9	99.9	99.7	80.0-120			0.195	15

L984001-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984001-02 04/10/18 01:00 • (MS) R3300408-5 04/10/18 01:43 • (MSD) R3300408-6 04/10/18 01:57

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	67.4	115	115	94.2	95.5	1	80.0-120	E	E	0.578	15

L984001-10 Original Sample (OS) • Matrix Spike (MS)

(OS) L984001-10 04/10/18 04:33 • (MS) R3300408-8 04/10/18 05:46

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	1.80	51.5	99.4	1	80.0-120	

QUALITY CONTROL SUMMARY

L983855-02,09,10

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300321-1 04/09/18 14:13

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300321-2 04/09/18 14:15 • (LCSD) R3300321-3 04/09/18 14:17

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury	0.00300	0.00290	0.00295	96.8	98.2	80.0-120			1.46	20

L983497-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983497-01 04/09/18 14:20 • (MS) R3300321-4 04/09/18 14:22 • (MSD) R3300321-5 04/09/18 14:24

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury	0.00300	ND	0.00310	0.00306	103	102	1	75.0-125			1.09	20

QUALITY CONTROL SUMMARY

L983855-02,09,10

Method Blank (MB)

(MB) R3300467-1 04/10/18 10:58

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury,Dissolved	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300467-2 04/10/18 11:00 • (LCSD) R3300467-3 04/10/18 11:03

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury,Dissolved	0.00300	0.00317	0.00311	106	104	80.0-120			1.70	20

L983825-29 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983825-29 04/10/18 11:05 • (MS) R3300467-4 04/10/18 11:12 • (MSD) R3300467-5 04/10/18 11:14

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury,Dissolved	0.00300	U	0.00282	0.00300	94.2	100	1	75.0-125			6.06	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300299-8 04/09/18 21:23

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300299-2 04/09/18 16:02 • (LCSD) R3300299-3 04/09/18 16:05

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Boron	1.00	0.983	0.977	98.3	97.7	80.0-120			0.604	20

L983855-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-02 04/09/18 16:09 • (MS) R3300299-5 04/09/18 16:16 • (MSD) R3300299-6 04/09/18 16:20

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Boron	1.00	0.611	1.60	1.61	99.2	100	1	75.0-125			0.662	20

QUALITY CONTROL SUMMARY

L983855-02,09,10

Method Blank (MB)

(MB) R3300622-1 04/10/18 14:35

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Boron,Dissolved	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300622-2 04/10/18 14:37 • (LCSD) R3300622-3 04/10/18 14:40

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Boron,Dissolved	1.00	1.01	1.03	101	103	80.0-120			2.74	20

L983860-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983860-05 04/10/18 14:42 • (MS) R3300622-5 04/10/18 14:47 • (MSD) R3300622-6 04/10/18 14:50

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Boron,Dissolved	1.00	0.147	1.17	1.15	102	99.9	1	75.0-125			1.70	20

WG1095153

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983855-01,02,03,04,05,06,07,08,09,10,11

Method Blank (MB)

(MB) R3302048-1 04/15/18 20:14

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302048-2 04/15/18 20:19 • (LCSD) R3302048-3 04/15/18 20:23

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0503	0.0508	101	102	80.0-120			1.07	20
Barium	0.0500	0.0476	0.0474	95.3	94.9	80.0-120			0.405	20
Cadmium	0.0500	0.0512	0.0517	102	103	80.0-120			0.930	20
Calcium	5.00	5.06	5.02	101	100	80.0-120			0.905	20
Chromium	0.0500	0.0509	0.0518	102	104	80.0-120			1.84	20
Cobalt	0.0500	0.0530	0.0532	106	106	80.0-120			0.376	20
Iron	5.00	5.32	5.39	106	108	80.0-120			1.30	20
Lead	0.0500	0.0500	0.0506	100	101	80.0-120			1.19	20
Manganese	0.0500	0.0502	0.0508	100	102	80.0-120			1.20	20
Nickel	0.0500	0.0538	0.0533	108	107	80.0-120			0.905	20
Potassium	5.00	5.20	5.08	104	102	80.0-120			2.41	20
Selenium	0.0500	0.0506	0.0519	101	104	80.0-120			2.65	20
Sodium	5.00	5.30	5.27	106	105	80.0-120			0.685	20
Uranium	0.0500	0.0499	0.0498	99.7	99.5	80.0-120			0.208	20
Vanadium	0.0500	0.0504	0.0511	101	102	80.0-120			1.41	20

WG1095153

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983855-01,02,03,04,05,06,07,08,09,10,11

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983849-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983849-01 04/15/18 20:28 • (MS) R3302048-5 04/15/18 20:37 • (MSD) R3302048-6 04/15/18 20:42

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.00338	0.0554	0.0541	104	101	1	75.0-125			2.30	20
Barium	0.0500	0.0128	0.0637	0.0610	102	96.4	1	75.0-125			4.34	20
Cadmium	0.0500	U	0.0520	0.0506	104	101	1	75.0-125			2.66	20
Calcium	5.00	368	370	361	39.3	0.000	1	75.0-125	V	V	2.33	20
Chromium	0.0500	0.000687	0.0516	0.0497	102	98.0	1	75.0-125			3.70	20
Cobalt	0.0500	0.00250	0.0536	0.0511	102	97.1	1	75.0-125			4.86	20
Potassium	5.00	4.32	9.42	9.28	102	99.3	1	75.0-125			1.48	20
Iron	5.00	0.0314	5.32	5.10	106	101	1	75.0-125			4.20	20
Lead	0.0500	0.000330	0.0522	0.0504	104	100	1	75.0-125			3.48	20
Manganese	0.0500	0.676	0.700	0.538	47.3	0.000	1	75.0-125	V	J3 V	26.2	20
Nickel	0.0500	0.00291	0.0547	0.0517	104	97.5	1	75.0-125			5.79	20
Selenium	0.0500	0.00337	0.0563	0.0552	106	104	1	75.0-125			1.85	20
Sodium	5.00	875	875	856	0.000	0.000	1	75.0-125	V	V	2.21	20
Uranium	0.0500	0.00549	0.0592	0.0573	107	104	1	75.0-125			3.25	20
Vanadium	0.0500	0.0103	0.0633	0.0605	106	100	1	75.0-125			4.52	20

QUALITY CONTROL SUMMARY

L983855-01,02,03,04,05,06,07,08,09,10,11

Method Blank (MB)

(MB) R3301434-1 04/12/18 18:40

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Chromium,Dissolved	0.000737	J	0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	0.0330	J	0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301434-2 04/12/18 18:44 • (LCSD) R3301434-3 04/12/18 18:48

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0511	0.0510	102	102	80.0-120			0.233	20
Barium,Dissolved	0.0500	0.0505	0.0488	101	97.7	80.0-120			3.39	20
Cadmium,Dissolved	0.0500	0.0538	0.0541	108	108	80.0-120			0.581	20
Chromium,Dissolved	0.0500	0.0515	0.0525	103	105	80.0-120			1.96	20
Cobalt,Dissolved	0.0500	0.0541	0.0547	108	109	80.0-120			1.12	20
Iron,Dissolved	5.00	5.21	5.27	104	105	80.0-120			1.20	20
Lead,Dissolved	0.0500	0.0511	0.0517	102	103	80.0-120			1.11	20
Manganese,Dissolved	0.0500	0.0505	0.0504	101	101	80.0-120			0.231	20
Nickel,Dissolved	0.0500	0.0547	0.0546	109	109	80.0-120			0.123	20
Selenium,Dissolved	0.0500	0.0501	0.0512	100	102	80.0-120			2.31	20
Uranium,Dissolved	0.0500	0.0512	0.0518	102	104	80.0-120			1.05	20
Vanadium,Dissolved	0.0500	0.0505	0.0519	101	104	80.0-120			2.61	20

L983855-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-11 04/12/18 18:52 • (MS) R3301434-5 04/12/18 19:00 • (MSD) R3301434-6 04/12/18 19:04

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	U	0.0521	0.0514	104	103	1	75.0-125			1.35	20
Barium,Dissolved	0.0500	U	0.0522	0.0493	104	98.7	1	75.0-125			5.55	20
Cadmium,Dissolved	0.0500	U	0.0546	0.0531	109	106	1	75.0-125			2.82	20

WG1095157

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983855-01,02,03,04,05,06,07,08,09,10,11

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983855-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-11 04/12/18 18:52 • (MS) R3301434-5 04/12/18 19:00 • (MSD) R3301434-6 04/12/18 19:04

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chromium,Dissolved	0.0500	0.00157	0.0535	0.0523	104	101	1	75.0-125			2.32	20
Cobalt,Dissolved	0.0500	U	0.0549	0.0548	110	110	1	75.0-125			0.112	20
Iron,Dissolved	5.00	0.0224	5.28	5.28	105	105	1	75.0-125			0.125	20
Lead,Dissolved	0.0500	U	0.0534	0.0517	107	103	1	75.0-125			3.11	20
Manganese,Dissolved	0.0500	0.000348	0.0513	0.0513	102	102	1	75.0-125			0.0270	20
Nickel,Dissolved	0.0500	0.000565	0.0562	0.0554	111	110	1	75.0-125			1.41	20
Selenium,Dissolved	0.0500	U	0.0544	0.0508	109	102	1	75.0-125			6.95	20
Uranium,Dissolved	0.0500	U	0.0525	0.0520	105	104	1	75.0-125			1.06	20
Vanadium,Dissolved	0.0500	0.000226	0.0521	0.0520	104	104	1	75.0-125			0.187	20

WG1095828

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L983855-09

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301217-3 04/10/18 12:14

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*101*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301217-1 04/10/18 11:08 • (LCSD) R3301217-2 04/10/18 11:30

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) Low Fraction	5.50	5.22	5.28	94.9	96.0	71.0-136			1.19	20
(S) a,a,a-Trifluorotoluene(FID)				*97.4*	*97.0*	*77.0-122*				

L983828-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983828-01 04/10/18 14:00 • (MS) R3301217-4 04/10/18 21:14 • (MSD) R3301217-5 04/10/18 21:36

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
TPH (GC/FID) Low Fraction	5.50	3.60	3.14	2.51	0.000	0.000	1	18.0-160	J6	J3 J6	22.5	20
(S) a,a,a-Trifluorotoluene(FID)					*103*	*93.1*		*77.0-122*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301324-3 04/07/18 15:20

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301324-3 04/07/18 15:20

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*108*			*80.0-120*
(S) Dibromofluoromethane	*85.9*			*76.0-123*
(S) 4-Bromofluorobenzene	*104*			*80.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301324-1 04/07/18 13:57 • (LCSD) R3301324-2 04/07/18 14:18

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.0617	0.0710	49.4	56.8	10.0-160			13.9	23
Benzene	0.0250	0.0225	0.0228	90.0	91.3	69.0-123			1.42	20
Bromodichloromethane	0.0250	0.0237	0.0241	95.0	96.4	76.0-120			1.52	20
Bromoform	0.0250	0.0241	0.0252	96.3	101	67.0-132			4.56	20
Bromomethane	0.0250	0.00902	0.00993	36.1	39.7	18.0-160			9.62	20
n-Butylbenzene	0.0250	0.0253	0.0257	101	103	72.0-126			1.89	20
sec-Butylbenzene	0.0250	0.0257	0.0263	103	105	74.0-121			2.36	20
Carbon disulfide	0.0250	0.0233	0.0233	93.2	93.0	55.0-127			0.245	20
Carbon tetrachloride	0.0250	0.0217	0.0219	86.7	87.5	63.0-122			0.932	20
Chlorobenzene	0.0250	0.0247	0.0255	98.9	102	79.0-121			3.07	20
Chlorodibromomethane	0.0250	0.0242	0.0253	96.6	101	75.0-125			4.54	20
Chloroethane	0.0250	0.0223	0.0213	89.1	85.4	47.0-152			4.29	20
Chloroform	0.0250	0.0220	0.0221	87.9	88.6	72.0-121			0.792	20
Chloromethane	0.0250	0.0188	0.0189	75.2	75.7	48.0-139			0.641	20
1,2-Dibromoethane	0.0250	0.0251	0.0261	101	105	77.0-123			3.89	20
1,1-Dichloroethane	0.0250	0.0225	0.0227	90.1	90.9	70.0-126			0.886	20
1,2-Dichloroethane	0.0250	0.0210	0.0214	83.9	85.5	67.0-126			1.90	20
1,1-Dichloroethene	0.0250	0.0235	0.0234	94.1	93.7	64.0-129			0.363	20
cis-1,2-Dichloroethene	0.0250	0.0223	0.0226	89.2	90.3	73.0-120			1.23	20
trans-1,2-Dichloroethene	0.0250	0.0233	0.0232	93.0	92.8	71.0-121			0.187	20
1,2-Dichloropropane	0.0250	0.0243	0.0248	97.4	99.2	75.0-125			1.86	20
cis-1,3-Dichloropropene	0.0250	0.0253	0.0267	101	107	79.0-123			5.51	20
trans-1,3-Dichloropropene	0.0250	0.0249	0.0257	99.6	103	74.0-127			3.11	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301324-1 04/07/18 13:57 • (LCSD) R3301324-2 04/07/18 14:18

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0263	0.0269	105	108	77.0-120			2.37	20
2-Hexanone	0.125	0.131	0.139	104	111	58.0-147			6.46	20
Isopropylbenzene	0.0250	0.0263	0.0269	105	107	75.0-120			2.16	20
p-Isopropyltoluene	0.0250	0.0258	0.0262	103	105	74.0-126			1.48	20
2-Butanone (MEK)	0.125	0.0957	0.102	76.6	81.9	37.0-158			6.75	20
Methylene Chloride	0.0250	0.0215	0.0215	85.9	86.0	66.0-121			0.0988	20
4-Methyl-2-pentanone (MIBK)	0.125	0.134	0.139	107	112	59.0-143			4.30	20
Methyl tert-butyl ether	0.0250	0.0224	0.0224	89.5	89.7	64.0-123			0.193	20
Naphthalene	0.0250	0.0266	0.0280	107	112	62.0-128			5.02	20
n-Propylbenzene	0.0250	0.0258	0.0261	103	104	79.0-120			0.814	20
Styrene	0.0250	0.0268	0.0270	107	108	78.0-124			0.853	20
1,1,1,2-Tetrachloroethane	0.0250	0.0253	0.0259	101	104	75.0-122			2.34	20
1,1,2,2-Tetrachloroethane	0.0250	0.0262	0.0267	105	107	71.0-122			1.65	20
Tetrachloroethene	0.0250	0.0250	0.0258	100	103	70.0-127			3.30	20
Toluene	0.0250	0.0251	0.0257	100	103	77.0-120			2.59	20
1,1,1-Trichloroethane	0.0250	0.0223	0.0229	89.3	91.6	68.0-122			2.63	20
1,1,2-Trichloroethane	0.0250	0.0250	0.0260	100	104	78.0-120			3.90	20
Trichloroethene	0.0250	0.0232	0.0233	92.8	93.1	78.0-120			0.271	20
1,2,4-Trimethylbenzene	0.0250	0.0256	0.0259	103	103	75.0-120			0.883	20
1,3,5-Trimethylbenzene	0.0250	0.0256	0.0258	103	103	75.0-120			0.817	20
Vinyl chloride	0.0250	0.0222	0.0227	88.8	90.9	64.0-133			2.32	20
Xylenes, Total	0.0750	0.0784	0.0807	105	108	77.0-120			2.89	20
o-Xylene	0.0250	0.0260	0.0266	104	106	78.0-120			2.49	20
m&p-Xylenes	0.0500	0.0524	0.0541	105	108	77.0-120			3.19	20
(S) Toluene-d8				*104*	*106*	*80.0-120*				
(S) Dibromofluoromethane				*88.7*	*88.9*	*76.0-123*				
(S) 4-Bromofluorobenzene				*104*	*103*	*80.0-120*				

WG1095662

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L983855-01,02,03,04,05,06,07,08,09,10

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300761-1 04/10/18 20:35

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*63.3*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300761-2 04/10/18 20:56 • (LCSD) R3300761-3 04/10/18 21:16

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.23	1.27	81.7	84.9	50.0-150			3.89	20
(S) o-Terphenyl				*99.1*	*94.8*	*31.0-160*				

QUALITY CONTROL SUMMARY

L983855-11

Method Blank (MB)

(MB) R3300825-1 04/11/18 06:59

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*87.2*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300825-2 04/11/18 07:15 • (LCSD) R3300825-3 04/11/18 07:32

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.43	1.43	95.3	95.1	50.0-150			0.176	20
(S) o-Terphenyl				*121*	*116*	*31.0-160*				

L984044-15 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984044-15 04/11/18 22:51 • (MS) R3300825-4 04/11/18 23:08 • (MSD) R3300825-5 04/11/18 23:24

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
TPH (GC/FID) High Fraction	1.50	0.0495	1.42	1.39	91.2	89.5	1	50.0-150			1.77	20
(S) o-Terphenyl					*123*	*118*		*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia [1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky [1,6]	90010
Kentucky [2]	16
Louisiana	AI30792
Louisiana [1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086

Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico [1]	n/a
New York	11742
North Carolina	Env375
North Carolina [1]	DW21704
North Carolina [3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee [1,4]	2006
Texas	T 104704245-17-14
Texas [5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

Third Party Federal Accreditations

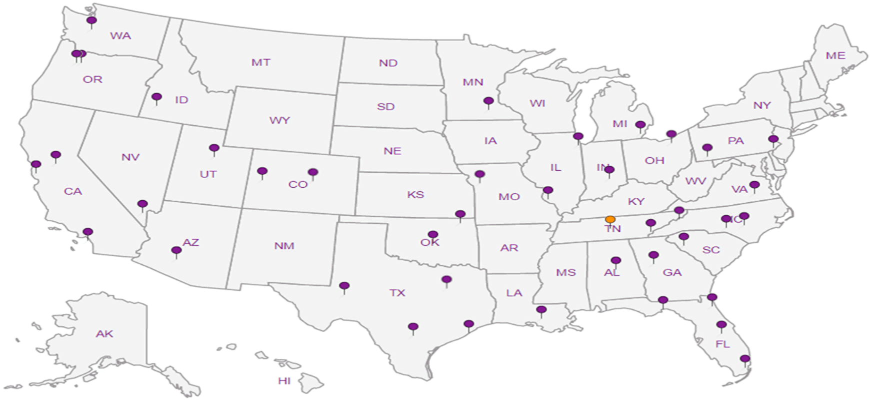
A2LA – ISO 17025	1461.01
A2LA – ISO 17025 [5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003

AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 1 of 2

ESC L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **NCL Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-NCL**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **NCL (NAVAJO-ARTESIA)**

P.O. # **119503**

Collected by (signature):

Quote #

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L# 983855
M058
Acctnum: **TRCATX**
Template: **T133457**
Prelogin: **P643095**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Pres Chk

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved) ✓	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved) ✓	Cyanide		Remarks	Sample # (lab only)
MW-56	Grab	GW		4/4/18	1800	8 ~~10~~	X	X	X	X	X	X	X					01
MW-45	Grab	GW		4/4/18	0825	9	X	X			X	X	X	X	X			02
NCL-34A	Grab	GW		4/4/18	1025	8	X	X		X	X	X	X					03
NCL-33	Grab	GW		4/4/18	1105	8	X	X		X	X	X	X					04
NCL-44	Grab	GW		4/4/18	1410	8	X	X		X	X	X	X					05
NCL-32	Grab	GW		4/4/18	1320	8	X	X		X	X	X	X					06
MW-108	Grab	GW		4/4/18	1150	8	X	X		X	X	X	X					07
NCL-31	Grab	GW		4/4/18	1235	8	X	X		X	X	X	X					08
MW-55	Grab	GW		4/4/18	1540	11	X	X	X		X	X	X	X	X			09
MW-18	Grab	GW		4/4/18	1455	9	X	X			X	X	X	X	X			10

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ___ FedEx ___ Courier ___ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP ___ Y ___ N
COC Signed/Accurate: ✓ Y ___ N
Bottles arrive intact: ✓ Y ___ N
Correct bottles used: ✓ Y ___ N
Sufficient volume sent: ✓ Y ___ N
If Applicable
VOA Zero Headspace: ✓ Y ___ N
Preservation Correct/Checked: ✓ Y ___ N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: AttAch °C	Bottles Received: 93
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18	Time: 0845

If preservation required by Login: Date/Time
Diss Metals ad; @ 1745 4/6

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 2 of 2

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Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**		Email To: **jspeer@trcsolutions.com**	
Project Description: **NCL Spring 2018**		City/State Collected: **Artesia, NM**	
Phone: **512-684-3170** Fax:	Client Project # **249545.0000.0000 000001**	Lab Project # **TRCATX-NCL**	L# 983855
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **NCL (NAVAJO-ARTESIA)**	P.O. # **119503**	Table #
Collected by (signature):	***Rush?*** (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day	Quote # Date Results Needed	Acctnum: **TRCATX** Template: **T133457** Prelogin: **P643095** TSR: **526** PB:
Immediately Packed on Ice N ___ Y ___			Shipped Via:

Pres Chk

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
MW-54A	Grab	GW				8	X	X		X	X	X	X					
NCL-49	Grab	GW				8	X	X		X	X	X	X					
MW-53	Grab	GW				8	X	X		X	X	X	X					
DUP-NCL-01	Grab	GW				8	X	X		X	X	X	X					
EB-NCL-01	Grab	GW		4/4/18	1335	8	X	X		X	X	X	X					11
TRIP BLANK-NCL-01	Grab	GW				1	X											

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH _______ Temp _______
Flow _______ Other _______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP _Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: ✓Y _N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: ✓Y _N
Preservation Correct/Checked: _Y _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp Amb °C Bottles Received: 53	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	Hold:
					Condition: NCF / [✓ OK]

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 1 of 1

ESC
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YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: NCL Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: NCL (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
- ___ Same Day 200%
- ___ Next Day 100%
- ___ Two Day 50%
- ___ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

L # 983855

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem /Contaminant	Sample # (lab only)
MW-18	Grab	GW		4/4/18	1455		✓	✓			✓	✓	✓	✓	✓			10
NCL-31	Grab	GW		4/4/18	1235		✓	✓		✓		✓	✓	✓				08
NCL-32	Grab	GW		4/4/18	1320		✓	✓		✓		✓	✓	✓				06
EB-NCL-01	Grab	GW		4/4/18	1335		✓	✓		✓		✓	✓	✓				11
NCL-33	Grab	GW		4/4/18	1105		✓	✓		✓		✓	✓	✓				04
NCL-34A	Grab	GW		4/4/18	1025		✓	✓		✓		✓	✓	✓				03
NCL-44	Grab	GW		4/4/18	1410		✓	✓		✓		✓	✓	✓				05
MW-45	Grab	GW		4/4/18	825		✓	✓			✓	✓	✓	✓	✓			02
MW-55 MW-56	Grab	GW		4/4/18 4/4/18	1540 1800		✓ ✓	✓ ✓	✓	 ✓	✓	✓ ✓	✓ ✓	✓ ✓	✓			09 13
MW-108	Grab	GW		4/4/18	1150		✓	✓		✓		✓	✓	✓				07

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	~~Temp~~: Amad °C Bottles Received: 93	COC Seal Intact: ___ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0846	pH Checked: NCF:

① 4269 9211 4819 (1.7)
② 4269 9213 4020 (2.3)
③ 4269 9213 4111 (.2)
④ 4269 9213 4155 (1.7)
⑤ 4269 9211 4820 (2.1)
⑥ 4269 9211 4808 (1.7)
⑦ 4269 9211 4830 (1.2)
⑧ 4269 9211 4852 (.5)
⑨ 4269 9211 4841 (.6)
⑩ 4269 9213 4052 (1.1)
⑪ 4269 9213 1763 (.9)
⑫ 4269 9213 4074 (.2)
⑬ 4269 9213 4619 (1.5)
⑭ 4269 9213 4144 (3.2)
⑮ 4269 9213 4641 (2.1)
⑯ 4269 9212 1660 (.1)
⑰ 4269 9212 1589 (3.1)
⑱ 4269 9213 4085 (.9)
⑲ 4269 9213 1774 (2.1)
⑳ 4269 9213 4063 (1.3)

ANALYTICAL REPORT

April 24, 2018

TRC Solutions - Austin, TX

Sample Delivery Group: L983865

Samples Received: 04/06/2018

Project Number: 294318.0000.0000.

Description: REST Spring 2018

Site: REST (NAVAJO-ARTESIA)

Report To: Julie Speer
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Technical Service Representative

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

SAMPLE SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

RW-#15C L983865-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096340	1	04/12/18 12:50	04/12/18 13:25	EG
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:37	04/11/18 15:37	JER
Wet Chemistry by Method 9056A	WG1095122	1	04/08/18 02:15	04/08/18 02:15	NJM
Wet Chemistry by Method 9056A	WG1095122	20	04/08/18 02:29	04/08/18 02:29	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 13:44	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/17/18 12:39	RDS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1096656	1	04/11/18 14:10	04/11/18 14:10	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1096656	500	04/13/18 12:25	04/13/18 12:25	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 00:46	TH

MW-48 L983865-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096340	1	04/12/18 12:50	04/12/18 13:25	EG
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:38	04/11/18 15:38	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 10:55	04/08/18 10:55	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 11:10	04/08/18 11:10	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 13:56	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/17/18 12:57	RDS
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	10	04/10/18 20:16	04/10/18 20:16	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	250	04/07/18 15:44	04/07/18 15:44	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 01:03	TH

MW-130 L983865-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096340	1	04/12/18 12:50	04/12/18 13:25	EG
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:39	04/11/18 15:39	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 11:26	04/08/18 11:26	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 11:41	04/08/18 11:41	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 13:59	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/17/18 13:01	RDS
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 13:31	04/10/18 13:31	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 16:03	04/07/18 16:03	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 01:21	TH

MW-52 L983865-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096340	1	04/12/18 12:50	04/12/18 13:25	EG
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:44	04/11/18 15:44	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	1	04/07/18 10:38	04/09/18 17:23	KK
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 11:56	04/08/18 11:56	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 12:12	04/08/18 12:12	DR
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:28	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:27	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 16:44	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 15:58	ST
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 14:03	LD
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/19/18 12:11	LAT

MW-52 L983865-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/17/18 13:07	RDS
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 13:54	04/10/18 13:54	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 16:22	04/07/18 16:22	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 01:38	TH

MW-109 L983865-05 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096341	1	04/12/18 15:28	04/12/18 16:05	EG
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:45	04/11/18 15:45	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 12:27	04/08/18 12:27	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 14:12	04/08/18 14:12	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 14:07	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/17/18 18:41	LAT
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	20	04/10/18 20:40	04/10/18 20:40	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	20	04/07/18 16:41	04/07/18 16:41	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 01:55	TH

MW-110 L983865-06 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:45	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096341	1	04/12/18 15:28	04/12/18 16:05	EG
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:46	04/11/18 15:46	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 14:27	04/08/18 14:27	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 14:43	04/08/18 14:43	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/22/18 15:07	JDG
Metals (ICPMS) by Method 6020	WG1095181	5	04/09/18 13:11	04/17/18 18:46	LAT
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 14:18	04/10/18 14:18	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 17:01	04/07/18 17:01	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	10	04/12/18 16:15	04/12/18 16:15	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 02:12	TH

RW-12R L983865-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:47	04/11/18 15:47	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 14:58	04/08/18 14:58	DR
Wet Chemistry by Method 9056A	WG1095124	10	04/08/18 15:14	04/08/18 15:14	DR
Wet Chemistry by Method 9056A	WG1095827	20	04/10/18 16:23	04/10/18 16:23	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 14:37	LD
Metals (ICPMS) by Method 6020	WG1095181	5	04/09/18 13:11	04/17/18 18:50	LAT
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 17:20	04/07/18 17:20	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 02:29	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-113 L983865-08 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096185	1	04/11/18 15:49	04/11/18 15:49	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 15:29	04/08/18 15:29	DR
Wet Chemistry by Method 9056A	WG1095124	10	04/08/18 15:44	04/08/18 15:44	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 14:41	LD
Metals (ICPMS) by Method 6020	WG1095181	5	04/09/18 13:11	04/17/18 18:54	LAT
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 14:42	04/10/18 14:42	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 17:39	04/07/18 17:39	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 02:46	TH

RW-13R L983865-09 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:50	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:02	04/11/18 16:02	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 16:00	04/08/18 16:00	DR
Wet Chemistry by Method 9056A	WG1095124	10	04/08/18 16:15	04/08/18 16:15	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 14:45	LD
Metals (ICPMS) by Method 6020	WG1095181	5	04/09/18 13:11	04/17/18 18:59	LAT
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 17:58	04/07/18 17:58	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 03:03	TH

MW-134 L983865-10 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096186	5	04/11/18 16:04	04/11/18 16:04	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 16:31	04/08/18 16:31	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 17:17	04/08/18 17:17	DR
Wet Chemistry by Method 9056A	WG1095827	50	04/10/18 16:36	04/10/18 16:36	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 14:49	LD
Metals (ICPMS) by Method 6020	WG1095181	5	04/09/18 13:11	04/17/18 19:24	LAT
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 15:06	04/10/18 15:06	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 18:18	04/07/18 18:18	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1096452	1	04/10/18 21:06	04/12/18 21:37	LM

RA-3156 L983865-11 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096155	1	04/11/18 16:02	04/11/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:05	04/11/18 16:05	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 17:32	04/08/18 17:32	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 17:48	04/08/18 17:48	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 14:53	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 18:37	04/07/18 18:37	ACG

RA-313 L983865-12 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 18:30	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:07	04/11/18 16:07	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 18:03	04/08/18 18:03	DR
Wet Chemistry by Method 9056A	WG1095827	10	04/10/18 16:50	04/10/18 16:50	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 14:57	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 18:56	04/07/18 18:56	ACG

MW-115 L983865-13 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 15:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:08	04/11/18 16:08	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 19:05	04/08/18 19:05	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 19:20	04/08/18 19:20	DR
Wet Chemistry by Method 9056A	WG1095124	50	04/13/18 17:19	04/13/18 17:19	MAJ
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 15:01	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/22/18 14:30	JDG
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 15:30	04/10/18 15:30	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 19:15	04/07/18 19:15	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 03:20	TH

MW-114 L983865-14 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 16:50	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:14	04/11/18 16:14	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 19:36	04/08/18 19:36	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 20:22	04/08/18 20:22	DR
Wet Chemistry by Method 9056A	WG1095827	50	04/10/18 17:03	04/10/18 17:03	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 15:04	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/22/18 14:34	JDG
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 15:54	04/10/18 15:54	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 19:35	04/07/18 19:35	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/10/18 17:03	TH

MW-117 L983865-15 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:50	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:15	04/11/18 16:15	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 20:37	04/08/18 20:37	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 20:53	04/08/18 20:53	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 15:08	LD
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/19/18 12:16	LAT
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/22/18 14:39	JDG
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 16:17	04/10/18 16:17	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 19:54	04/07/18 19:54	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/10/18 17:21	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-118 L983865-16 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 09:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:16	04/11/18 16:16	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 21:08	04/08/18 21:08	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 21:24	04/08/18 21:24	DR
Wet Chemistry by Method 9056A	WG1095827	50	04/10/18 17:16	04/10/18 17:16	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 15:29	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/22/18 14:44	JDG
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 16:41	04/10/18 16:41	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 20:13	04/07/18 20:13	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1.14	04/08/18 18:20	04/10/18 17:38	LM

MW-119 L983865-17 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:17	04/11/18 16:17	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 21:39	04/08/18 21:39	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 21:54	04/08/18 21:54	DR
Wet Chemistry by Method 9056A	WG1095827	50	04/10/18 17:29	04/10/18 17:29	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 15:33	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/22/18 14:48	JDG
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 17:05	04/10/18 17:05	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	1	04/07/18 20:33	04/07/18 20:33	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/10/18 17:56	TH

KWB-5 L983865-18 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:18	04/11/18 16:18	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 22:10	04/08/18 22:10	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 22:25	04/08/18 22:25	DR
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/22/18 14:53	JDG
Metals (ICPMS) by Method 6020	WG1095826	1	04/10/18 12:25	04/15/18 09:18	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	250	04/07/18 20:52	04/07/18 20:52	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 03:37	TH

MW-111 L983865-19 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:19	04/11/18 16:19	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 22:41	04/08/18 22:41	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 23:27	04/08/18 23:27	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 15:37	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/22/18 14:58	JDG
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 17:29	04/10/18 17:29	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	25	04/12/18 16:35	04/12/18 16:35	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 03:53	TH

KWB-6 L983865-20 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:20	04/11/18 16:20	JER
Wet Chemistry by Method 9056A	WG1095124	1	04/08/18 23:42	04/08/18 23:42	DR
Wet Chemistry by Method 9056A	WG1095124	20	04/08/18 23:58	04/08/18 23:58	DR
Metals (ICPMS) by Method 6020	WG1095154	1	04/09/18 13:34	04/18/18 15:41	LD
Metals (ICPMS) by Method 6020	WG1095181	1	04/09/18 13:11	04/22/18 15:02	JDG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	20	04/07/18 21:31	04/07/18 21:31	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095231	20	04/12/18 16:55	04/12/18 16:55	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 04:10	TH

MW-57 L983865-21 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:50	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096156	1	04/11/18 16:23	04/11/18 16:40	EG
Wet Chemistry by Method 353.2	WG1096186	5	04/11/18 16:21	04/11/18 16:21	JER
Wet Chemistry by Method 9056A	WG1095827	1	04/10/18 17:43	04/10/18 17:43	DR
Wet Chemistry by Method 9056A	WG1095827	50	04/10/18 17:56	04/10/18 17:56	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 11:36	LD
Metals (ICPMS) by Method 6020	WG1095155	5	04/10/18 09:19	04/17/18 13:29	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:03	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 17:53	04/10/18 17:53	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 20:39	04/07/18 20:39	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 04:27	TH

KWB-12B L983865-22 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096186	5	04/11/18 16:22	04/11/18 16:22	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	1	04/07/18 10:38	04/09/18 17:24	KK
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 12:22	04/08/18 12:22	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 12:37	04/08/18 12:37	DR
Wet Chemistry by Method 9056A	WG1095827	50	04/10/18 18:09	04/10/18 18:09	DR
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:39	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:34	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 16:48	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:02	ST
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 11:39	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:19	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 18:17	04/10/18 18:17	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 21:00	04/07/18 21:00	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095394	1	04/08/18 18:20	04/11/18 04:44	TH

RW-4 L983865-23 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:23	04/11/18 16:23	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 12:53	04/08/18 12:53	DR
Wet Chemistry by Method 9056A	WG1095125	10	04/08/18 13:08	04/08/18 13:08	DR

RW-4 L983865-23 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 11:43	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:23	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 21:20	04/07/18 21:20	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/10/18 23:58	TH

RW-6 L983865-24 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 09:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:28	04/11/18 16:28	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 13:23	04/08/18 13:23	DR
Wet Chemistry by Method 9056A	WG1095125	10	04/08/18 13:39	04/08/18 13:39	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:09	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:27	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	1	04/07/18 21:41	04/07/18 21:41	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	20	04/12/18 21:24	04/12/18 21:24	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 00:18	TH

MW-99 L983865-25 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:30	04/11/18 16:30	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 13:54	04/08/18 13:54	DR
Wet Chemistry by Method 9056A	WG1095125	10	04/08/18 14:57	04/08/18 14:57	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:13	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:39	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	5	04/10/18 21:03	04/10/18 21:03	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	100	04/07/18 22:02	04/07/18 22:02	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 00:38	TH

MW-66 L983865-26 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:31	04/11/18 16:31	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	1	04/07/18 10:38	04/09/18 17:28	KK
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 15:11	04/08/18 15:11	DR
Wet Chemistry by Method 9056A	WG1095125	10	04/08/18 15:27	04/08/18 15:27	DR
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:42	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:37	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 16:52	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:06	ST
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:17	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:43	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 18:41	04/10/18 18:41	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	10	04/07/18 22:23	04/07/18 22:23	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	25	04/12/18 21:44	04/12/18 21:44	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 00:59	TH

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:05	04/06/18 08:45

MW-28 L983865-27 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096186	20	04/11/18 16:32	04/11/18 16:32	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	10	04/07/18 10:38	04/09/18 17:29	KK
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 15:42	04/08/18 15:42	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 15:58	04/08/18 15:58	DR
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:44	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:39	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 16:55	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:16	ST
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:21	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:47	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 19:04	04/10/18 19:04	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095245	50	04/07/18 22:44	04/07/18 22:44	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 01:19	TH

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:00	04/06/18 08:45

MW-59 L983865-28 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096186	1	04/11/18 16:34	04/11/18 16:34	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 16:13	04/08/18 16:13	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 16:29	04/08/18 16:29	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:25	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:51	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 19:28	04/10/18 19:28	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/08/18 01:12	04/08/18 01:12	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 01:39	TH

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:50	04/06/18 08:45

MW-60 L983865-29 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 15:49	04/12/18 15:49	JER
Wet Chemistry by Method 4500CN E-2011	WG1094975	10	04/07/18 10:38	04/09/18 17:30	KK
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 16:44	04/08/18 16:44	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 16:59	04/08/18 16:59	DR
Wet Chemistry by Method 9056A	WG1095827	50	04/10/18 18:49	04/10/18 18:49	DR
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:46	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:41	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 16:59	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:20	ST
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:29	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:55	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095731	1	04/10/18 19:52	04/10/18 19:52	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/08/18 01:33	04/08/18 01:33	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 01:59	TH

SAMPLE SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-107 L983865-30 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 15:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 15:51	04/12/18 15:51	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 17:15	04/08/18 17:15	DR
Wet Chemistry by Method 9056A	WG1095125	10	04/08/18 18:01	04/08/18 18:01	DR
Wet Chemistry by Method 9056A	WG1095827	1	04/10/18 19:03	04/10/18 19:03	CSU
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:32	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 03:59	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	5	04/12/18 22:55	04/12/18 22:55	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/08/18 01:54	04/08/18 01:54	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	25	04/12/18 21:34	04/12/18 21:34	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	250	04/13/18 11:16	04/13/18 11:16	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 02:20	TH

MW-128 L983865-31 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 16:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 15:52	04/12/18 15:52	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 18:17	04/08/18 18:17	DR
Wet Chemistry by Method 9056A	WG1095125	10	04/08/18 18:32	04/08/18 18:32	DR
Wet Chemistry by Method 9056A	WG1095827	10	04/10/18 19:56	04/10/18 19:56	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:36	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:03	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/12/18 23:19	04/12/18 23:19	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	20	04/08/18 02:15	04/08/18 02:15	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 02:40	TH

MW-101 L983865-32 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 09:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 16:21	04/12/18 16:21	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 18:47	04/08/18 18:47	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 19:18	04/08/18 19:18	DR
Wet Chemistry by Method 9056A	WG1095827	10	04/10/18 20:09	04/10/18 20:09	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:40	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:07	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	10	04/12/18 23:43	04/12/18 23:43	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/08/18 02:36	04/08/18 02:36	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 03:00	TH

MW-105 L983865-33 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 10:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096341	1	04/12/18 15:28	04/12/18 16:05	EG
Wet Chemistry by Method 353.2	WG1096783	20	04/12/18 15:58	04/12/18 15:58	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 20:20	04/08/18 20:20	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 21:06	04/08/18 21:06	DR
Wet Chemistry by Method 9056A	WG1095827	5	04/10/18 20:23	04/10/18 20:23	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 12:44	LD

MW-105 L983865-33 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 10:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:11	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	5	04/09/18 23:11	04/09/18 23:11	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	100	04/08/18 02:57	04/08/18 02:57	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	5	04/09/18 21:51	04/11/18 22:21	TH

RW-2 L983865-34 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 17:15	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	20	04/12/18 15:59	04/12/18 15:59	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 21:22	04/08/18 21:22	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 21:37	04/08/18 21:37	DR
Wet Chemistry by Method 9056A	WG1095827	20	04/10/18 20:36	04/10/18 20:36	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 13:04	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:15	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	25	04/13/18 00:07	04/13/18 00:07	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/08/18 03:18	04/08/18 03:18	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	25	04/12/18 21:53	04/12/18 21:53	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	250	04/13/18 11:36	04/13/18 11:36	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 03:41	TH

MW-61 L983865-35 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096341	1	04/12/18 15:28	04/12/18 16:05	EG
Wet Chemistry by Method 353.2	WG1096783	20	04/12/18 16:00	04/12/18 16:00	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 21:53	04/08/18 21:53	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 22:08	04/08/18 22:08	DR
Wet Chemistry by Method 9056A	WG1095827	20	04/10/18 20:49	04/10/18 20:49	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 11:20	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:27	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/13/18 00:31	04/13/18 00:31	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	50	04/08/18 03:39	04/08/18 03:39	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 04:01	TH

MW-62 L983865-36 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 08:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096341	1	04/12/18 15:28	04/12/18 16:05	EG
Wet Chemistry by Method 353.2	WG1096783	20	04/12/18 16:01	04/12/18 16:01	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 22:23	04/08/18 22:23	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 22:39	04/08/18 22:39	DR
Wet Chemistry by Method 9056A	WG1095827	20	04/10/18 21:29	04/10/18 21:29	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 13:08	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:31	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/13/18 00:55	04/13/18 00:55	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	100	04/08/18 04:00	04/08/18 04:00	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 04:21	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-93 L983865-37 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 18:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	10	04/12/18 16:02	04/12/18 16:02	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 22:54	04/08/18 22:54	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/08/18 23:10	04/08/18 23:10	DR
Wet Chemistry by Method 9056A	WG1095827	50	04/10/18 21:43	04/10/18 21:43	DR
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 13:12	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:35	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/10/18 10:24	04/10/18 10:24	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/08/18 04:21	04/08/18 04:21	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	20	04/12/18 22:13	04/12/18 22:13	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 04:41	TH

MW-43 L983865-38 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 16:30	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	50	04/12/18 16:04	04/12/18 16:04	JER
Wet Chemistry by Method 4500CN E-2011	WG1095350	100	04/08/18 12:16	04/09/18 16:16	NJM
Wet Chemistry by Method 9056A	WG1095125	1	04/08/18 23:25	04/08/18 23:25	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/09/18 00:11	04/09/18 00:11	DR
Wet Chemistry by Method 9056A	WG1095833	20	04/10/18 23:50	04/10/18 23:50	MAJ
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:43	RDS
Mercury by Method 7470A	WG1095972	1	04/10/18 14:24	04/11/18 08:44	ABL
Metals (ICP) by Method 6010B	WG1095823	1	04/10/18 11:17	04/10/18 21:34	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 15:45	ST
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 13:16	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:39	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	10	04/10/18 11:11	04/10/18 11:11	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	200	04/12/18 22:33	04/12/18 22:33	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	50	04/08/18 04:42	04/08/18 04:42	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 05:01	TH

MW-137 L983865-39 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:50	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096341	1	04/12/18 15:28	04/12/18 16:05	EG
Wet Chemistry by Method 353.2	WG1096783	50	04/12/18 16:05	04/12/18 16:05	JER
Wet Chemistry by Method 4500CN E-2011	WG1095350	100	04/08/18 12:16	04/09/18 16:17	NJM
Wet Chemistry by Method 9056A	WG1095125	1	04/09/18 00:27	04/09/18 00:27	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/09/18 00:42	04/09/18 00:42	DR
Wet Chemistry by Method 9056A	WG1095833	20	04/11/18 00:05	04/11/18 00:05	MAJ
Mercury by Method 7470A	WG1095576	10	04/10/18 14:26	04/11/18 09:46	RDS
Mercury by Method 7470A	WG1095972	1	04/10/18 14:24	04/11/18 08:47	ABL
Metals (ICP) by Method 6010B	WG1095823	1	04/10/18 11:17	04/10/18 21:36	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:24	ST
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 13:20	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:43	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	20	04/10/18 11:34	04/10/18 11:34	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	200	04/08/18 05:03	04/08/18 05:03	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	5	04/09/18 21:51	04/11/18 22:41	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/05/18 09:05	04/06/18 08:45

MW-138 L983865-40 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096341	1	04/12/18 15:28	04/12/18 16:05	EG
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 16:06	04/12/18 16:06	JER
Wet Chemistry by Method 4500CN E-2011	WG1095350	1	04/08/18 12:16	04/09/18 16:18	NJM
Wet Chemistry by Method 9056A	WG1095125	1	04/09/18 00:58	04/09/18 00:58	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/09/18 01:29	04/09/18 01:29	DR
Wet Chemistry by Method 9056A	WG1095833	1	04/11/18 00:21	04/11/18 00:21	MAJ
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:48	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:48	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 17:03	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:27	ST
Metals (ICPMS) by Method 6020	WG1095155	1	04/10/18 09:19	04/17/18 13:24	LD
Metals (ICPMS) by Method 6020	WG1095182	1	04/09/18 12:50	04/13/18 04:47	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/10/18 11:58	04/10/18 11:58	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	5	04/08/18 05:24	04/08/18 05:24	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 05:42	TH

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 19:00	04/06/18 08:45

MW-23 L983865-41 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 16:07	04/12/18 16:07	JER
Wet Chemistry by Method 9056A	WG1095125	1	04/09/18 02:15	04/09/18 02:15	DR
Wet Chemistry by Method 9056A	WG1095125	20	04/09/18 02:30	04/09/18 02:30	DR
Wet Chemistry by Method 9056A	WG1095833	1	04/11/18 08:59	04/11/18 08:59	MAJ
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 15:34	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/15/18 23:54	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	10	04/10/18 12:23	04/10/18 12:23	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	100	04/08/18 05:46	04/08/18 05:46	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	2	04/09/18 21:51	04/11/18 06:02	TH

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:45	04/06/18 08:45

MW-39 L983865-42 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 16:08	04/12/18 16:08	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 07:25	04/08/18 07:25	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 07:37	04/08/18 07:37	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 15:39	WBD
Metals (ICPMS) by Method 6020	WG1095156	5	04/09/18 13:28	04/15/18 17:26	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/15/18 23:58	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/10/18 12:47	04/10/18 12:47	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/12/18 22:53	04/12/18 22:53	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095660	1	04/09/18 21:51	04/11/18 06:22	TH

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:35	04/06/18 08:45

RW-10 L983865-43 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	50	04/12/18 16:13	04/12/18 16:13	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 07:50	04/08/18 07:50	DR

RW-10 L983865-43 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:35	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 08:02	04/08/18 08:02	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 15:43	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 00:23	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/13/18 01:19	04/13/18 01:19	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/12/18 23:13	04/12/18 23:13	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 07:49	TH

MW-40 L983865-44 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	50	04/12/18 16:14	04/12/18 16:14	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 08:14	04/08/18 08:14	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 08:27	04/08/18 08:27	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 15:48	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 00:28	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/13/18 01:43	04/13/18 01:43	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/12/18 23:33	04/12/18 23:33	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 08:06	TH

MW-41 L983865-45 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 15:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 16:15	04/12/18 16:15	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 08:39	04/08/18 08:39	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 09:16	04/08/18 09:16	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 15:52	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 00:33	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/10/18 14:44	04/10/18 14:44	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/08/18 07:10	04/08/18 07:10	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 08:22	TH

RW-9 L983865-46 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096158	1	04/11/18 14:54	04/11/18 15:48	BS
Wet Chemistry by Method 353.2	WG1096783	50	04/12/18 16:17	04/12/18 16:17	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 09:29	04/08/18 09:29	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 09:41	04/08/18 09:41	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 15:57	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 00:37	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/13/18 02:07	04/13/18 02:07	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/12/18 23:53	04/12/18 23:53	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	10	04/13/18 11:56	04/13/18 11:56	JAH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 12:40	LM

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-42 L983865-47 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 16:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096783	1	04/12/18 16:18	04/12/18 16:18	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 09:54	04/08/18 09:54	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 10:06	04/08/18 10:06	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:02	RDS
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 00:42	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/13/18 02:31	04/13/18 02:31	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095247	1	04/13/18 00:13	04/13/18 00:13	ACG
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 12:56	LM

MW-29 L983865-48 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 13:25	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	1	04/12/18 16:34	04/12/18 16:34	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 10:19	04/08/18 10:19	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 10:31	04/08/18 10:31	DR
Wet Chemistry by Method 9056A	WG1095833	50	04/11/18 09:17	04/11/18 09:17	MAJ
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:06	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 00:47	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/10/18 16:16	04/10/18 16:16	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 07:45	04/08/18 07:45	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 13:13	LM

RW-#16B L983865-49 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 17:05	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	1	04/12/18 16:36	04/12/18 16:36	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 10:43	04/08/18 10:43	DR
Wet Chemistry by Method 9056A	WG1095833	50	04/11/18 01:38	04/11/18 01:38	MAJ
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:11	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 00:52	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 08:04	04/08/18 08:04	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 13:30	LM

MW-95 L983865-50 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 08:55	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	1	04/12/18 16:38	04/12/18 16:38	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 11:08	04/08/18 11:08	DR
Wet Chemistry by Method 9056A	WG1095127	5	04/08/18 11:58	04/08/18 11:58	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:16	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 00:56	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095732	1	04/10/18 16:46	04/10/18 16:46	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 08:23	04/08/18 08:23	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 13:46	LM

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

RW-7 L983865-51 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 09:40	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	50	04/12/18 16:44	04/12/18 16:44	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 12:35	04/08/18 12:35	DR
Wet Chemistry by Method 9056A	WG1095127	5	04/08/18 12:48	04/08/18 12:48	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:33	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 01:01	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095828	1	04/12/18 18:00	04/12/18 18:00	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/10/18 22:24	04/10/18 22:24	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	5	04/09/18 21:52	04/13/18 06:17	LM

DUP-REST-01 L983865-52 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	1	04/12/18 16:45	04/12/18 16:45	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 13:00	04/08/18 13:00	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 13:12	04/08/18 13:12	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:38	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 01:06	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095828	1	04/10/18 19:47	04/10/18 19:47	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 09:01	04/08/18 09:01	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 14:20	LM

DUP-REST-03 L983865-53 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	5	04/12/18 16:46	04/12/18 16:46	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 13:25	04/08/18 13:25	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 13:37	04/08/18 13:37	DR
Wet Chemistry by Method 9056A	WG1095833	50	04/11/18 01:53	04/11/18 01:53	MAJ
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 14:57	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 01:21	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095828	1	04/10/18 20:09	04/10/18 20:09	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 09:20	04/08/18 09:20	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 16:56	LM

DUP-REST-04 L983865-54 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	1	04/12/18 16:47	04/12/18 16:47	JER
Wet Chemistry by Method 4500CN E-2011	WG1095350	100	04/08/18 12:16	04/09/18 16:19	NJM
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 14:14	04/08/18 14:14	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 14:27	04/08/18 14:27	DR
Wet Chemistry by Method 9056A	WG1095833	50	04/11/18 02:08	04/11/18 02:08	MAJ
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:51	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:55	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 17:07	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:31	ST

DUP-REST-04 L983865-54 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:43	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 01:26	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 20:35	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095828	1	04/10/18 20:30	04/10/18 20:30	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 09:39	04/08/18 09:39	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 17:22	LM

DUP-REST-05 L983865-55 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 12:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	5	04/12/18 16:48	04/12/18 16:48	JER
Wet Chemistry by Method 4500CN E-2011	WG1095350	1	04/08/18 12:16	04/09/18 16:20	NJM
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 14:39	04/08/18 14:39	DR
Wet Chemistry by Method 9056A	WG1095127	20	04/08/18 14:52	04/08/18 14:52	DR
Wet Chemistry by Method 9056A	WG1095833	50	04/11/18 02:24	04/11/18 02:24	MAJ
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:53	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:57	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 17:11	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:35	ST
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:47	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 01:31	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 21:06	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095828	1	04/10/18 20:52	04/10/18 20:52	RAS
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 09:58	04/08/18 09:58	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 17:39	LM

EB-REST-01 L983865-56 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 11:10	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	1	04/12/18 16:49	04/12/18 16:49	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 15:04	04/08/18 15:04	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:52	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 01:35	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095836	1	04/12/18 06:38	04/12/18 06:38	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 10:17	04/08/18 10:17	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 17:55	LM

EB-REST-03 L983865-57 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 10:20	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	1	04/12/18 16:50	04/12/18 16:50	JER
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 15:17	04/08/18 15:17	DR
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 16:57	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 01:40	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095836	1	04/11/18 02:35	04/11/18 02:35	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 10:36	04/08/18 10:36	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 18:12	LM

EB-REST-04 L983865-58 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:15	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	1	04/12/18 16:51	04/12/18 16:51	JER
Wet Chemistry by Method 4500CN E-2011	WG1095350	1	04/08/18 12:16	04/09/18 16:21	NJM
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 16:06	04/08/18 16:06	DR
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:55	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 09:59	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 17:14	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:39	ST
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 17:01	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 01:45	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 21:11	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095836	1	04/11/18 02:58	04/11/18 02:58	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 10:55	04/08/18 10:55	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 18:28	LM

EB-REST-05 L983865-59 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 14:50	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1096160	1	04/11/18 15:54	04/11/18 16:25	MMF
Wet Chemistry by Method 353.2	WG1096784	1	04/12/18 16:52	04/12/18 16:52	JER
Wet Chemistry by Method 4500CN E-2011	WG1095350	1	04/08/18 12:16	04/09/18 16:22	NJM
Wet Chemistry by Method 9056A	WG1095127	1	04/08/18 16:43	04/08/18 16:43	DR
Mercury by Method 7470A	WG1095323	1	04/09/18 07:06	04/09/18 15:58	EL
Mercury by Method 7470A	WG1095576	1	04/10/18 14:26	04/11/18 10:01	ABL
Metals (ICP) by Method 6010B	WG1095148	1	04/09/18 07:41	04/09/18 17:24	ST
Metals (ICP) by Method 6010B	WG1095851	1	04/11/18 08:12	04/11/18 16:42	ST
Metals (ICPMS) by Method 6020	WG1095156	1	04/09/18 13:28	04/15/18 17:06	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/15/18 23:30	WBD
Metals (ICPMS) by Method 6020	WG1095184	1	04/09/18 09:50	04/16/18 20:07	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1095836	1	04/11/18 03:22	04/11/18 03:22	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 11:14	04/08/18 11:14	LRL
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1095661	1	04/09/18 21:52	04/11/18 18:45	LM

TRIP BLANK-REST-01 L983865-60 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 00:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 05:12	04/08/18 05:12	LRL

TRIP BLANK-REST-02 L983865-61 GW

Collected by	Collected date/time	Received date/time
Scott Ude / HMI Team	04/04/18 00:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 05:31	04/08/18 05:31	LRL

	Collected by	Collected date/time	Received date/time
TRIP BLANK-REST-04 L983865-62 GW	Scott Ude / HMI Team	04/04/18 00:00	04/06/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1095249	1	04/08/18 05:50	04/08/18 05:50	LRL

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All radiochemical sample results for solids are reported on a dry weight basis with the exception of tritium, carbon-14 and radon, unless wet weight was requested by the client. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Technical Service Representative

Sample Handling and Receiving

VOC pH outside of method requirement.

ESC Sample ID	Project Sample ID	Method
L983865-02	MW-48	8015D/GRO
L983865-05	MW-109	8015D/GRO
L983865-13	MW-115	8015D/GRO
L983865-14	MW-114	8015D/GRO
L983865-29	MW-60	8015D/GRO
L983865-38	MW-43	8260B, 8015D/GRO
L983865-39	MW-137	8015D/GRO
L983865-42	MW-39	8015D/GRO, 8260B

The following analysis were performed from an unpreserved, insufficiently or inadequately preserved sample.

ESC Sample ID	Project Sample ID	Method
L983865-38	MW-43	4500CN E-2011
L983865-39	MW-137	4500CN E-2011

RW-#15C

Collected date/time: 04/05/18 09:05

SAMPLE RESULTS - 01

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1850		2.82	10.0	1	04/12/2018 13:25	WG1096340

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/11/2018 15:37	WG1096185

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	652		1.04	20.0	20	04/08/2018 02:29	WG1095122
Fluoride	0.868		0.00990	0.100	1	04/08/2018 02:15	WG1095122
Sulfate	0.754	J	0.0774	5.00	1	04/08/2018 02:15	WG1095122

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0239		0.000250	0.00200	1	04/18/2018 13:44	WG1095154
Arsenic,Dissolved	0.0264		0.000250	0.00200	1	04/17/2018 12:39	WG1095181
Barium	1.19		0.000360	0.00500	1	04/18/2018 13:44	WG1095154
Barium,Dissolved	1.27	V	0.000360	0.00500	1	04/17/2018 12:39	WG1095181
Calcium	211	V	0.0460	1.00	1	04/18/2018 13:44	WG1095154
Chromium	0.000699	J	0.000540	0.00200	1	04/18/2018 13:44	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/17/2018 12:39	WG1095181
Iron	0.264		0.0150	0.100	1	04/18/2018 13:44	WG1095154
Iron,Dissolved	0.197		0.0150	0.100	1	04/17/2018 12:39	WG1095181
Lead	0.000822	J	0.000240	0.00200	1	04/18/2018 13:44	WG1095154
Lead,Dissolved	0.000585	J	0.000240	0.00200	1	04/17/2018 12:39	WG1095181
Manganese	0.372		0.000250	0.00500	1	04/18/2018 13:44	WG1095154
Manganese,Dissolved	0.399		0.000250	0.00500	1	04/17/2018 12:39	WG1095181
Potassium	1.28		0.0370	1.00	1	04/18/2018 13:44	WG1095154
Selenium	0.000836	J	0.000380	0.00200	1	04/18/2018 13:44	WG1095154
Selenium,Dissolved	0.000675	J	0.000380	0.00200	1	04/17/2018 12:39	WG1095181
Sodium	349	V	0.110	1.00	1	04/18/2018 13:44	WG1095154

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/11/2018 14:10	WG1096656
Benzene	21.9		0.166	0.500	500	04/13/2018 12:25	WG1096656
Bromodichloromethane	U		0.000380	0.00100	1	04/11/2018 14:10	WG1096656
Bromoform	U		0.000469	0.00100	1	04/11/2018 14:10	WG1096656
Bromomethane	U		0.000866	0.00500	1	04/11/2018 14:10	WG1096656
n-Butylbenzene	0.00683		0.000361	0.00100	1	04/11/2018 14:10	WG1096656
sec-Butylbenzene	0.0114		0.000365	0.00100	1	04/11/2018 14:10	WG1096656
Carbon disulfide	0.000650	J V3	0.000275	0.00100	1	04/11/2018 14:10	WG1096656
Carbon tetrachloride	U		0.000379	0.00100	1	04/11/2018 14:10	WG1096656
Chlorobenzene	U		0.000348	0.00100	1	04/11/2018 14:10	WG1096656
Chlorodibromomethane	U		0.000327	0.00100	1	04/11/2018 14:10	WG1096656
Chloroethane	U		0.000453	0.00500	1	04/11/2018 14:10	WG1096656
Chloroform	U		0.000324	0.00500	1	04/11/2018 14:10	WG1096656
Chloromethane	U		0.000276	0.00250	1	04/11/2018 14:10	WG1096656
1,2-Dibromoethane	U		0.000381	0.00100	1	04/11/2018 14:10	WG1096656
1,1-Dichloroethane	U		0.000259	0.00100	1	04/11/2018 14:10	WG1096656

RW-#15C

Collected date/time: 04/05/18 09:05

SAMPLE RESULTS - 01

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/11/2018 14:10	WG1096656
1,1-Dichloroethene	U		0.000398	0.00100	1	04/11/2018 14:10	WG1096656
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/11/2018 14:10	WG1096656
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/11/2018 14:10	WG1096656
1,2-Dichloropropane	U		0.000306	0.00100	1	04/11/2018 14:10	WG1096656
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/11/2018 14:10	WG1096656
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/11/2018 14:10	WG1096656
Ethylbenzene	3.93		0.192	0.500	500	04/13/2018 12:25	WG1096656
Isopropylbenzene	0.114		0.000326	0.00100	1	04/11/2018 14:10	WG1096656
p-Isopropyltoluene	0.00545		0.000350	0.00100	1	04/11/2018 14:10	WG1096656
2-Butanone (MEK)	U		0.00393	0.0100	1	04/11/2018 14:10	WG1096656
2-Hexanone	U		0.00382	0.0100	1	04/11/2018 14:10	WG1096656
Methylene Chloride	U		0.00100	0.00500	1	04/11/2018 14:10	WG1096656
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/11/2018 14:10	WG1096656
Methyl tert-butyl ether	3.02		0.184	0.500	500	04/13/2018 12:25	WG1096656
Naphthalene	U		0.500	2.50	500	04/13/2018 12:25	WG1096656
n-Propylbenzene	0.190		0.000349	0.00100	1	04/11/2018 14:10	WG1096656
Styrene	U		0.000307	0.00100	1	04/11/2018 14:10	WG1096656
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/11/2018 14:10	WG1096656
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/11/2018 14:10	WG1096656
Tetrachloroethene	U		0.000372	0.00100	1	04/11/2018 14:10	WG1096656
Toluene	0.111		0.000412	0.00100	1	04/11/2018 14:10	WG1096656
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/11/2018 14:10	WG1096656
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/11/2018 14:10	WG1096656
Trichloroethene	U		0.000398	0.00100	1	04/11/2018 14:10	WG1096656
1,2,4-Trimethylbenzene	1.06		0.186	0.500	500	04/13/2018 12:25	WG1096656
1,3,5-Trimethylbenzene	0.138		0.000387	0.00100	1	04/11/2018 14:10	WG1096656
Vinyl chloride	U		0.000259	0.00100	1	04/11/2018 14:10	WG1096656
o-Xylene	0.0285		0.000341	0.00100	1	04/11/2018 14:10	WG1096656
m&p-Xylene	2.98		0.360	1.00	500	04/13/2018 12:25	WG1096656
Xylenes, Total	3.01		0.530	1.50	500	04/13/2018 12:25	WG1096656
(S) Toluene-d8	*98.8*			*80.0-120*		*04/13/2018 12:25*	WG1096656
(S) Toluene-d8	*102*			*80.0-120*		*04/11/2018 14:10*	WG1096656
(S) Dibromofluoromethane	*93.9*			*76.0-123*		*04/13/2018 12:25*	WG1096656
(S) Dibromofluoromethane	*217*	J1		*76.0-123*		*04/11/2018 14:10*	WG1096656
(S) 4-Bromofluorobenzene	*94.7*			*80.0-120*		*04/13/2018 12:25*	WG1096656
(S) 4-Bromofluorobenzene	*89.1*			*80.0-120*		*04/11/2018 14:10*	WG1096656

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	9.27		0.0247	0.100	1	04/11/2018 00:46	WG1095394
(S) o-Terphenyl	*103*			*31.0-160*		*04/11/2018 00:46*	WG1095394

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2490		2.82	10.0	1	04/12/2018 13:25	WG1096340

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0860	J	0.0197	0.100	1	04/11/2018 15:38	WG1096185

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	689		1.04	20.0	20	04/08/2018 11:10	WG1095124
Fluoride	1.90		0.00990	0.100	1	04/08/2018 10:55	WG1095124
Sulfate	9.52		0.0774	5.00	1	04/08/2018 10:55	WG1095124

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00554		0.000250	0.00200	1	04/18/2018 13:56	WG1095154
Arsenic,Dissolved	0.00747		0.000250	0.00200	1	04/17/2018 12:57	WG1095181
Barium	1.82		0.000360	0.00500	1	04/18/2018 13:56	WG1095154
Barium,Dissolved	1.97		0.000360	0.00500	1	04/17/2018 12:57	WG1095181
Calcium	200		0.0460	1.00	1	04/18/2018 13:56	WG1095154
Chromium	U		0.000540	0.00200	1	04/18/2018 13:56	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/17/2018 12:57	WG1095181
Iron	0.105		0.0150	0.100	1	04/18/2018 13:56	WG1095154
Iron,Dissolved	U		0.0150	0.100	1	04/17/2018 12:57	WG1095181
Lead	0.00142	J	0.000240	0.00200	1	04/18/2018 13:56	WG1095154
Lead,Dissolved	0.000847	J	0.000240	0.00200	1	04/17/2018 12:57	WG1095181
Manganese	0.136		0.000250	0.00500	1	04/18/2018 13:56	WG1095154
Manganese,Dissolved	0.154		0.000250	0.00500	1	04/17/2018 12:57	WG1095181
Potassium	0.776	J	0.0370	1.00	1	04/18/2018 13:56	WG1095154
Selenium	0.247		0.000380	0.00200	1	04/18/2018 13:56	WG1095154
Selenium,Dissolved	0.000669	J	0.000380	0.00200	1	04/17/2018 12:57	WG1095181
Sodium	269		0.110	1.00	1	04/18/2018 13:56	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	45.6		0.314	1.00	10	04/10/2018 20:16	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*105*			*77.0-122*		*04/10/2018 20:16*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		2.50	12.5	250	04/07/2018 15:44	WG1095231
Benzene	14.9		0.0828	0.250	250	04/07/2018 15:44	WG1095231
Bromodichloromethane	U		0.0950	0.250	250	04/07/2018 15:44	WG1095231
Bromoform	U		0.117	0.250	250	04/07/2018 15:44	WG1095231
Bromomethane	U		0.216	1.25	250	04/07/2018 15:44	WG1095231
n-Butylbenzene	U		0.0902	0.250	250	04/07/2018 15:44	WG1095231
sec-Butylbenzene	U		0.0912	0.250	250	04/07/2018 15:44	WG1095231
Carbon disulfide	U		0.0688	0.250	250	04/07/2018 15:44	WG1095231
Carbon tetrachloride	U		0.0948	0.250	250	04/07/2018 15:44	WG1095231

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.0870	0.250	250	04/07/2018 15:44	WG1095231
Chlorodibromomethane	U		0.0818	0.250	250	04/07/2018 15:44	WG1095231
Chloroethane	U		0.113	1.25	250	04/07/2018 15:44	WG1095231
Chloroform	U		0.0810	1.25	250	04/07/2018 15:44	WG1095231
Chloromethane	U		0.0690	0.625	250	04/07/2018 15:44	WG1095231
1,2-Dibromoethane	U		0.0952	0.250	250	04/07/2018 15:44	WG1095231
1,1-Dichloroethane	U		0.0648	0.250	250	04/07/2018 15:44	WG1095231
1,2-Dichloroethane	U		0.0902	0.250	250	04/07/2018 15:44	WG1095231
1,1-Dichloroethene	U		0.0995	0.250	250	04/07/2018 15:44	WG1095231
cis-1,2-Dichloroethene	U		0.0650	0.250	250	04/07/2018 15:44	WG1095231
trans-1,2-Dichloroethene	U		0.0990	0.250	250	04/07/2018 15:44	WG1095231
1,2-Dichloropropane	U		0.0765	0.250	250	04/07/2018 15:44	WG1095231
cis-1,3-Dichloropropene	U		0.104	0.250	250	04/07/2018 15:44	WG1095231
trans-1,3-Dichloropropene	U		0.105	0.250	250	04/07/2018 15:44	WG1095231
Ethylbenzene	1.36		0.0960	0.250	250	04/07/2018 15:44	WG1095231
Isopropylbenzene	U		0.0815	0.250	250	04/07/2018 15:44	WG1095231
p-Isopropyltoluene	U		0.0875	0.250	250	04/07/2018 15:44	WG1095231
2-Butanone (MEK)	U		0.982	2.50	250	04/07/2018 15:44	WG1095231
2-Hexanone	U		0.955	2.50	250	04/07/2018 15:44	WG1095231
Methylene Chloride	U		0.250	1.25	250	04/07/2018 15:44	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.535	2.50	250	04/07/2018 15:44	WG1095231
Methyl tert-butyl ether	0.171	J	0.0918	0.250	250	04/07/2018 15:44	WG1095231
Naphthalene	U		0.250	1.25	250	04/07/2018 15:44	WG1095231
n-Propylbenzene	0.118	J	0.0872	0.250	250	04/07/2018 15:44	WG1095231
Styrene	U		0.0768	0.250	250	04/07/2018 15:44	WG1095231
1,1,1,2-Tetrachloroethane	U		0.0962	0.250	250	04/07/2018 15:44	WG1095231
1,1,2,2-Tetrachloroethane	U		0.0325	0.250	250	04/07/2018 15:44	WG1095231
Tetrachloroethene	U		0.0930	0.250	250	04/07/2018 15:44	WG1095231
Toluene	1.02		0.103	0.250	250	04/07/2018 15:44	WG1095231
1,1,1-Trichloroethane	U		0.0798	0.250	250	04/07/2018 15:44	WG1095231
1,1,2-Trichloroethane	U		0.0958	0.250	250	04/07/2018 15:44	WG1095231
Trichloroethene	U		0.0995	0.250	250	04/07/2018 15:44	WG1095231
1,2,4-Trimethylbenzene	0.381		0.0932	0.250	250	04/07/2018 15:44	WG1095231
1,3,5-Trimethylbenzene	U		0.0968	0.250	250	04/07/2018 15:44	WG1095231
Vinyl chloride	U		0.0648	0.250	250	04/07/2018 15:44	WG1095231
o-Xylene	U		0.0852	0.250	250	04/07/2018 15:44	WG1095231
m&p-Xylene	0.954		0.180	0.500	250	04/07/2018 15:44	WG1095231
Xylenes, Total	0.955		0.265	0.750	250	04/07/2018 15:44	WG1095231
(S) Toluene-d8	*110*			*80.0-120*		*04/07/2018 15:44*	WG1095231
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/07/2018 15:44*	WG1095231
(S) 4-Bromofluorobenzene	*99.1*			*80.0-120*		*04/07/2018 15:44*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	6.50		0.0247	0.100	1	04/11/2018 01:03	WG1095394
(S) o-Terphenyl	*45.5*			*31.0-160*		*04/11/2018 01:03*	WG1095394

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2230		2.82	10.0	1	04/12/2018 13:25	WG1096340

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	1.87		0.0197	0.100	1	04/11/2018 15:39	WG1096185

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	235		1.04	20.0	20	04/08/2018 11:41	WG1095124
Fluoride	0.841		0.00990	0.100	1	04/08/2018 11:26	WG1095124
Sulfate	999		1.55	100	20	04/08/2018 11:41	WG1095124

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00400		0.000250	0.00200	1	04/18/2018 13:59	WG1095154
Arsenic,Dissolved	0.00432		0.000250	0.00200	1	04/17/2018 13:01	WG1095181
Barium	0.0179		0.000360	0.00500	1	04/18/2018 13:59	WG1095154
Barium,Dissolved	0.0195		0.000360	0.00500	1	04/17/2018 13:01	WG1095181
Calcium	256		0.0460	1.00	1	04/18/2018 13:59	WG1095154
Chromium	U		0.000540	0.00200	1	04/18/2018 13:59	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/17/2018 13:01	WG1095181
Iron	0.0297	J	0.0150	0.100	1	04/18/2018 13:59	WG1095154
Iron,Dissolved	0.0377	J	0.0150	0.100	1	04/17/2018 13:01	WG1095181
Lead	U		0.000240	0.00200	1	04/18/2018 13:59	WG1095154
Lead,Dissolved	0.000283	J	0.000240	0.00200	1	04/17/2018 13:01	WG1095181
Manganese	0.0937		0.000250	0.00500	1	04/18/2018 13:59	WG1095154
Manganese,Dissolved	0.103		0.000250	0.00500	1	04/17/2018 13:01	WG1095181
Potassium	0.644	J	0.0370	1.00	1	04/18/2018 13:59	WG1095154
Selenium	0.0162		0.000380	0.00200	1	04/18/2018 13:59	WG1095154
Selenium,Dissolved	0.00698		0.000380	0.00200	1	04/17/2018 13:01	WG1095181
Sodium	299		0.110	1.00	1	04/18/2018 13:59	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0327	J	0.0314	0.100	1	04/10/2018 13:31	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*108*			*77.0-122*		*04/10/2018 13:31*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 16:03	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 16:03	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:03	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:03	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:03	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:03	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:03	WG1095231
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:03	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:03	WG1095231

MW-130

Collected date/time: 04/05/18 09:55

SAMPLE RESULTS - 03

L983865

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:03	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:03	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 16:03	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:03	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:03	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:03	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:03	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:03	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:03	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 16:03	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:03	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:03	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:03	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:03	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:03	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:03	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:03	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:03	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:03	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:03	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:03	WG1095231
Methyl tert-butyl ether	0.00134		0.000367	0.00100	1	04/07/2018 16:03	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:03	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:03	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 16:03	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:03	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:03	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:03	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 16:03	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:03	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:03	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:03	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:03	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:03	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:03	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:03	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:03	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:03	WG1095231
(S) Toluene-d8	*107*			*80.0-120*		*04/07/2018 16:03*	WG1095231
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/07/2018 16:03*	WG1095231
(S) 4-Bromofluorobenzene	*97.2*			*80.0-120*		*04/07/2018 16:03*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.756	B	0.0247	0.100	1	04/11/2018 01:21	WG1095394
(S) o-Terphenyl	*99.3*			*31.0-160*		*04/11/2018 01:21*	WG1095394

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2100		2.82	10.0	1	04/12/2018 13:25	WG1096340

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.893		0.0197	0.100	1	04/11/2018 15:44	WG1096185

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/09/2018 17:23	WG1094975

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	119		1.04	20.0	20	04/08/2018 12:12	WG1095124
Fluoride	1.81		0.00990	0.100	1	04/08/2018 11:56	WG1095124
Sulfate	1090		1.55	100	20	04/08/2018 12:12	WG1095124

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	04/09/2018 15:28	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:27	WG1095576

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.728		0.0126	0.200	1	04/09/2018 16:44	WG1095148
Boron,Dissolved	0.724		0.0126	0.200	1	04/11/2018 15:58	WG1095851

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00363		0.000250	0.00200	1	04/18/2018 14:03	WG1095154
Arsenic,Dissolved	0.00390		0.000250	0.00200	1	04/17/2018 13:07	WG1095181
Barium	0.0108		0.000360	0.00500	1	04/18/2018 14:03	WG1095154
Barium,Dissolved	0.0114		0.000360	0.00500	1	04/17/2018 13:07	WG1095181
Cadmium	U		0.000160	0.00100	1	04/19/2018 12:11	WG1095154
Cadmium,Dissolved	U		0.000160	0.00100	1	04/17/2018 13:07	WG1095181
Calcium	195		0.0460	1.00	1	04/18/2018 14:03	WG1095154
Chromium	U		0.000540	0.00200	1	04/18/2018 14:03	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/17/2018 13:07	WG1095181
Cobalt	0.000378	J	0.000260	0.00200	1	04/18/2018 14:03	WG1095154
Cobalt,Dissolved	0.000509	J	0.000260	0.00200	1	04/17/2018 13:07	WG1095181
Iron	U		0.0150	0.100	1	04/18/2018 14:03	WG1095154
Iron,Dissolved	U		0.0150	0.100	1	04/17/2018 13:07	WG1095181
Lead	U		0.000240	0.00200	1	04/18/2018 14:03	WG1095154
Lead,Dissolved	0.000369	J	0.000240	0.00200	1	04/17/2018 13:07	WG1095181
Manganese	0.0435		0.000250	0.00500	1	04/18/2018 14:03	WG1095154
Manganese,Dissolved	0.0472		0.000250	0.00500	1	04/17/2018 13:07	WG1095181
Nickel	0.00628		0.000350	0.00200	1	04/19/2018 12:11	WG1095154
Nickel,Dissolved	0.00721		0.000350	0.00200	1	04/17/2018 13:07	WG1095181

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	0.193	J	0.0370	1.00	1	04/18/2018 14:03	WG1095154
Selenium	0.00799		0.000380	0.00200	1	04/18/2018 14:03	WG1095154
Selenium,Dissolved	0.00412		0.000380	0.00200	1	04/17/2018 13:07	WG1095181
Sodium	301		0.110	1.00	1	04/18/2018 14:03	WG1095154
Uranium	0.0105		0.000330	0.0100	1	04/18/2018 14:03	WG1095154
Uranium,Dissolved	0.0112		0.000330	0.0100	1	04/17/2018 13:07	WG1095181
Vanadium	0.0259		0.000180	0.00500	1	04/18/2018 14:03	WG1095154
Vanadium,Dissolved	0.0280		0.000180	0.00500	1	04/17/2018 13:07	WG1095181

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 13:54	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*		*04/10/2018 13:54*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 16:22	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 16:22	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 16:22	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 16:22	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 16:22	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 16:22	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 16:22	WG1095231
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 16:22	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 16:22	WG1095231
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 16:22	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 16:22	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 16:22	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 16:22	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 16:22	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 16:22	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 16:22	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 16:22	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 16:22	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 16:22	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 16:22	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 16:22	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 16:22	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 16:22	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 16:22	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 16:22	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 16:22	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 16:22	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 16:22	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 16:22	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 16:22	WG1095231
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 16:22	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 16:22	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 16:22	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 16:22	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 16:22	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 16:22	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 16:22	WG1095231

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Toluene	U		0.000412	0.00100	1	04/07/2018 16:22	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 16:22	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 16:22	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 16:22	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 16:22	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 16:22	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 16:22	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 16:22	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 16:22	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 16:22	WG1095231
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 16:22*	WG1095231
(S) Dibromofluoromethane	*98.8*			*76.0-123*		*04/07/2018 16:22*	WG1095231
(S) 4-Bromofluorobenzene	*98.6*			*80.0-120*		*04/07/2018 16:22*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.231	B	0.0247	0.100	1	04/11/2018 01:38	WG1095394
(S) o-Terphenyl	*94.9*			*31.0-160*		*04/11/2018 01:38*	WG1095394

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2220		2.82	10.0	1	04/12/2018 16:05	WG1096341

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0460	J	0.0197	0.100	1	04/11/2018 15:45	WG1096185

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	170		1.04	20.0	20	04/08/2018 14:12	WG1095124
Fluoride	2.25		0.00990	0.100	1	04/08/2018 12:27	WG1095124
Sulfate	864		1.55	100	20	04/08/2018 14:12	WG1095124

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00144	J	0.000250	0.00200	1	04/18/2018 14:07	WG1095154
Arsenic,Dissolved	0.00185	J	0.000250	0.00200	1	04/17/2018 18:41	WG1095181
Barium	0.0441		0.000360	0.00500	1	04/18/2018 14:07	WG1095154
Barium,Dissolved	0.0320		0.000360	0.00500	1	04/17/2018 18:41	WG1095181
Calcium	173		0.0460	1.00	1	04/18/2018 14:07	WG1095154
Chromium	U		0.000540	0.00200	1	04/18/2018 14:07	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/17/2018 18:41	WG1095181
Iron	0.0641	J	0.0150	0.100	1	04/18/2018 14:07	WG1095154
Iron,Dissolved	U		0.0150	0.100	1	04/17/2018 18:41	WG1095181
Lead	U		0.000240	0.00200	1	04/18/2018 14:07	WG1095154
Lead,Dissolved	0.000253	J	0.000240	0.00200	1	04/17/2018 18:41	WG1095181
Manganese	0.0265		0.000250	0.00500	1	04/18/2018 14:07	WG1095154
Manganese,Dissolved	0.0497		0.000250	0.00500	1	04/17/2018 18:41	WG1095181
Potassium	0.992	J	0.0370	1.00	1	04/18/2018 14:07	WG1095154
Selenium	0.00300		0.000380	0.00200	1	04/18/2018 14:07	WG1095154
Selenium,Dissolved	U		0.000380	0.00200	1	04/17/2018 18:41	WG1095181
Sodium	395		0.110	1.00	1	04/18/2018 14:07	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	5.96		0.628	2.00	20	04/10/2018 20:40	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*106*			*77.0-122*		*04/10/2018 20:40*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.200	1.00	20	04/07/2018 16:41	WG1095231
Benzene	1.54		0.00662	0.0200	20	04/07/2018 16:41	WG1095231
Bromodichloromethane	U		0.00760	0.0200	20	04/07/2018 16:41	WG1095231
Bromoform	U		0.00938	0.0200	20	04/07/2018 16:41	WG1095231
Bromomethane	U		0.0173	0.100	20	04/07/2018 16:41	WG1095231
n-Butylbenzene	U		0.00722	0.0200	20	04/07/2018 16:41	WG1095231
sec-Butylbenzene	0.00760	J	0.00730	0.0200	20	04/07/2018 16:41	WG1095231
Carbon disulfide	U		0.00550	0.0200	20	04/07/2018 16:41	WG1095231
Carbon tetrachloride	U		0.00758	0.0200	20	04/07/2018 16:41	WG1095231

MW-109

Collected date/time: 04/05/18 09:05

SAMPLE RESULTS - 05

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.00696	0.0200	20	04/07/2018 16:41	WG1095231
Chlorodibromomethane	U		0.00654	0.0200	20	04/07/2018 16:41	WG1095231
Chloroethane	U		0.00906	0.100	20	04/07/2018 16:41	WG1095231
Chloroform	U		0.00648	0.100	20	04/07/2018 16:41	WG1095231
Chloromethane	U		0.00552	0.0500	20	04/07/2018 16:41	WG1095231
1,2-Dibromoethane	U		0.00762	0.0200	20	04/07/2018 16:41	WG1095231
1,1-Dichloroethane	U		0.00518	0.0200	20	04/07/2018 16:41	WG1095231
1,2-Dichloroethane	U		0.00722	0.0200	20	04/07/2018 16:41	WG1095231
1,1-Dichloroethene	U		0.00796	0.0200	20	04/07/2018 16:41	WG1095231
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	04/07/2018 16:41	WG1095231
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	04/07/2018 16:41	WG1095231
1,2-Dichloropropane	U		0.00612	0.0200	20	04/07/2018 16:41	WG1095231
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	04/07/2018 16:41	WG1095231
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	04/07/2018 16:41	WG1095231
Ethylbenzene	0.0122	J	0.00768	0.0200	20	04/07/2018 16:41	WG1095231
Isopropylbenzene	0.0632		0.00652	0.0200	20	04/07/2018 16:41	WG1095231
p-Isopropyltoluene	U		0.00700	0.0200	20	04/07/2018 16:41	WG1095231
2-Butanone (MEK)	U		0.0786	0.200	20	04/07/2018 16:41	WG1095231
2-Hexanone	U		0.0764	0.200	20	04/07/2018 16:41	WG1095231
Methylene Chloride	U		0.0200	0.100	20	04/07/2018 16:41	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	04/07/2018 16:41	WG1095231
Methyl tert-butyl ether	U		0.00734	0.0200	20	04/07/2018 16:41	WG1095231
Naphthalene	U		0.0200	0.100	20	04/07/2018 16:41	WG1095231
n-Propylbenzene	0.0646		0.00698	0.0200	20	04/07/2018 16:41	WG1095231
Styrene	U		0.00614	0.0200	20	04/07/2018 16:41	WG1095231
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	04/07/2018 16:41	WG1095231
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	04/07/2018 16:41	WG1095231
Tetrachloroethene	U		0.00744	0.0200	20	04/07/2018 16:41	WG1095231
Toluene	0.0208		0.00824	0.0200	20	04/07/2018 16:41	WG1095231
1,1,1-Trichloroethane	U		0.00638	0.0200	20	04/07/2018 16:41	WG1095231
1,1,2-Trichloroethane	U		0.00766	0.0200	20	04/07/2018 16:41	WG1095231
Trichloroethene	U		0.00796	0.0200	20	04/07/2018 16:41	WG1095231
1,2,4-Trimethylbenzene	U		0.00746	0.0200	20	04/07/2018 16:41	WG1095231
1,3,5-Trimethylbenzene	U		0.00774	0.0200	20	04/07/2018 16:41	WG1095231
Vinyl chloride	U		0.00518	0.0200	20	04/07/2018 16:41	WG1095231
o-Xylene	U		0.00682	0.0200	20	04/07/2018 16:41	WG1095231
m&p-Xylene	0.0257	J	0.0144	0.0400	20	04/07/2018 16:41	WG1095231
Xylenes, Total	0.0257	J	0.0212	0.0600	20	04/07/2018 16:41	WG1095231
(S) Toluene-d8	*108*			*80.0-120*		*04/07/2018 16:41*	WG1095231
(S) Dibromofluoromethane	*100*			*76.0-123*		*04/07/2018 16:41*	WG1095231
(S) 4-Bromofluorobenzene	*96.9*			*80.0-120*		*04/07/2018 16:41*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.84		0.0247	0.100	1	04/11/2018 01:55	WG1095394
(S) o-Terphenyl	*100*			*31.0-160*		*04/11/2018 01:55*	WG1095394

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1170		2.82	10.0	1	04/12/2018 16:05	WG1096341

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0410	J	0.0197	0.100	1	04/11/2018 15:46	WG1096185

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	102		1.04	20.0	20	04/08/2018 14:43	WG1095124
Fluoride	1.46		0.00990	0.100	1	04/08/2018 14:27	WG1095124
Sulfate	138		1.55	100	20	04/08/2018 14:43	WG1095124

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00965		0.000250	0.00200	1	04/22/2018 15:07	WG1095154
Arsenic,Dissolved	0.00229	J	0.00125	0.0100	5	04/17/2018 18:46	WG1095181
Barium	0.0887		0.000360	0.00500	1	04/22/2018 15:07	WG1095154
Barium,Dissolved	0.0717		0.00180	0.0250	5	04/17/2018 18:46	WG1095181
Calcium	99.2		0.0460	1.00	1	04/22/2018 15:07	WG1095154
Chromium	0.00152	J	0.000540	0.00200	1	04/22/2018 15:07	WG1095154
Chromium,Dissolved	U		0.00270	0.0100	5	04/17/2018 18:46	WG1095181
Iron	1.26		0.0150	0.100	1	04/22/2018 15:07	WG1095154
Iron,Dissolved	U		0.0750	0.500	5	04/17/2018 18:46	WG1095181
Lead	0.00123	J	0.000240	0.00200	1	04/22/2018 15:07	WG1095154
Lead,Dissolved	U		0.00120	0.0100	5	04/17/2018 18:46	WG1095181
Manganese	0.451		0.000250	0.00500	1	04/22/2018 15:07	WG1095154
Manganese,Dissolved	0.468		0.00125	0.0250	5	04/17/2018 18:46	WG1095181
Potassium	0.381	J	0.0370	1.00	1	04/22/2018 15:07	WG1095154
Selenium	U		0.000380	0.00200	1	04/22/2018 15:07	WG1095154
Selenium,Dissolved	U		0.00190	0.0100	5	04/17/2018 18:46	WG1095181
Sodium	286		0.110	1.00	1	04/22/2018 15:07	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	2.04		0.0314	0.100	1	04/10/2018 14:18	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*93.3*			*77.0-122*		*04/10/2018 14:18*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	0.0253	J	0.0100	0.0500	1	04/07/2018 17:01	WG1095231
Benzene	0.173		0.00331	0.0100	10	04/12/2018 16:15	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 17:01	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 17:01	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 17:01	WG1095231
n-Butylbenzene	0.00395		0.000361	0.00100	1	04/07/2018 17:01	WG1095231
sec-Butylbenzene	0.00884		0.000365	0.00100	1	04/07/2018 17:01	WG1095231
Carbon disulfide	0.000511	J	0.000275	0.00100	1	04/07/2018 17:01	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 17:01	WG1095231

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 17:01	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 17:01	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 17:01	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 17:01	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 17:01	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 17:01	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 17:01	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 17:01	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 17:01	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 17:01	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 17:01	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 17:01	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 17:01	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 17:01	WG1095231
Ethylbenzene	0.109		0.000384	0.00100	1	04/07/2018 17:01	WG1095231
Isopropylbenzene	0.0533		0.000326	0.00100	1	04/07/2018 17:01	WG1095231
p-Isopropyltoluene	0.00136		0.000350	0.00100	1	04/07/2018 17:01	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 17:01	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 17:01	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 17:01	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 17:01	WG1095231
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 17:01	WG1095231
Naphthalene	0.0135		0.00100	0.00500	1	04/07/2018 17:01	WG1095231
n-Propylbenzene	0.0577		0.000349	0.00100	1	04/07/2018 17:01	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 17:01	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 17:01	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 17:01	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 17:01	WG1095231
Toluene	0.00447		0.000412	0.00100	1	04/07/2018 17:01	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 17:01	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 17:01	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 17:01	WG1095231
1,2,4-Trimethylbenzene	0.0445		0.000373	0.00100	1	04/07/2018 17:01	WG1095231
1,3,5-Trimethylbenzene	0.00247		0.000387	0.00100	1	04/07/2018 17:01	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 17:01	WG1095231
o-Xylene	0.000580	J	0.000341	0.00100	1	04/07/2018 17:01	WG1095231
m&p-Xylene	0.0576		0.000719	0.00200	1	04/07/2018 17:01	WG1095231
Xylenes, Total	0.0582		0.00106	0.00300	1	04/07/2018 17:01	WG1095231
(S) Toluene-d8	*99.7*			*80.0-120*		*04/07/2018 17:01*	WG1095231
(S) Toluene-d8	*108*			*80.0-120*		*04/12/2018 16:15*	WG1095231
(S) Dibromofluoromethane	*89.7*			*76.0-123*		*04/12/2018 16:15*	WG1095231
(S) Dibromofluoromethane	*100*			*76.0-123*		*04/07/2018 17:01*	WG1095231
(S) 4-Bromofluorobenzene	*102*			*80.0-120*		*04/12/2018 16:15*	WG1095231
(S) 4-Bromofluorobenzene	*96.8*			*80.0-120*		*04/07/2018 17:01*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.27		0.0247	0.100	1	04/11/2018 02:12	WG1095394
(S) o-Terphenyl	*96.6*			*31.0-160*		*04/11/2018 02:12*	WG1095394

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2400		2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/11/2018 15:47	WG1096185

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	155		0.519	10.0	10	04/08/2018 15:14	WG1095124
Fluoride	0.700		0.00990	0.100	1	04/08/2018 14:58	WG1095124
Sulfate	1400		1.55	100	20	04/10/2018 16:23	WG1095827

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.000291	J	0.000250	0.00200	1	04/18/2018 14:37	WG1095154
Arsenic,Dissolved	U		0.00125	0.0100	5	04/17/2018 18:50	WG1095181
Barium	0.0387		0.000360	0.00500	1	04/18/2018 14:37	WG1095154
Barium,Dissolved	0.0341		0.00180	0.0250	5	04/17/2018 18:50	WG1095181
Calcium	378		0.0460	1.00	1	04/18/2018 14:37	WG1095154
Chromium	0.00973		0.000540	0.00200	1	04/18/2018 14:37	WG1095154
Chromium,Dissolved	0.00339	J	0.00270	0.0100	5	04/17/2018 18:50	WG1095181
Iron	0.0459	J	0.0150	0.100	1	04/18/2018 14:37	WG1095154
Iron,Dissolved	U		0.0750	0.500	5	04/17/2018 18:50	WG1095181
Lead	0.00104	J	0.000240	0.00200	1	04/18/2018 14:37	WG1095154
Lead,Dissolved	U		0.00120	0.0100	5	04/17/2018 18:50	WG1095181
Manganese	0.718		0.000250	0.00500	1	04/18/2018 14:37	WG1095154
Manganese,Dissolved	0.760		0.00125	0.0250	5	04/17/2018 18:50	WG1095181
Potassium	0.220	J	0.0370	1.00	1	04/18/2018 14:37	WG1095154
Selenium	0.000554	J	0.000380	0.00200	1	04/18/2018 14:37	WG1095154
Selenium,Dissolved	U		0.00190	0.0100	5	04/17/2018 18:50	WG1095181
Sodium	171		0.110	1.00	1	04/18/2018 14:37	WG1095154

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	0.0352	J	0.0100	0.0500	1	04/07/2018 17:20	WG1095231
Benzene	0.0358		0.000331	0.00100	1	04/07/2018 17:20	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 17:20	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 17:20	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 17:20	WG1095231
n-Butylbenzene	0.00125		0.000361	0.00100	1	04/07/2018 17:20	WG1095231
sec-Butylbenzene	0.00564		0.000365	0.00100	1	04/07/2018 17:20	WG1095231
Carbon disulfide	0.00104		0.000275	0.00100	1	04/07/2018 17:20	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 17:20	WG1095231
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 17:20	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 17:20	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 17:20	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 17:20	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 17:20	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 17:20	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 17:20	WG1095231

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 17:20	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 17:20	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 17:20	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 17:20	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 17:20	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 17:20	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 17:20	WG1095231
Ethylbenzene	0.00269		0.000384	0.00100	1	04/07/2018 17:20	WG1095231
Isopropylbenzene	0.0459		0.000326	0.00100	1	04/07/2018 17:20	WG1095231
p-Isopropyltoluene	0.000372	J	0.000350	0.00100	1	04/07/2018 17:20	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 17:20	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 17:20	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 17:20	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 17:20	WG1095231
Methyl tert-butyl ether	0.00315		0.000367	0.00100	1	04/07/2018 17:20	WG1095231
Naphthalene	0.00130	J	0.00100	0.00500	1	04/07/2018 17:20	WG1095231
n-Propylbenzene	0.0634		0.000349	0.00100	1	04/07/2018 17:20	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 17:20	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 17:20	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 17:20	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 17:20	WG1095231
Toluene	0.00157		0.000412	0.00100	1	04/07/2018 17:20	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 17:20	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 17:20	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 17:20	WG1095231
1,2,4-Trimethylbenzene	0.00448		0.000373	0.00100	1	04/07/2018 17:20	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 17:20	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 17:20	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 17:20	WG1095231
m&p-Xylene	0.00648		0.000719	0.00200	1	04/07/2018 17:20	WG1095231
Xylenes, Total	0.00648		0.00106	0.00300	1	04/07/2018 17:20	WG1095231
(S) Toluene-d8	*104*			*80.0-120*		*04/07/2018 17:20*	WG1095231
(S) Dibromofluoromethane	*99.8*			*76.0-123*		*04/07/2018 17:20*	WG1095231
(S) 4-Bromofluorobenzene	*96.6*			*80.0-120*		*04/07/2018 17:20*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.514	B	0.0247	0.100	1	04/11/2018 02:29	WG1095394
(S) o-Terphenyl	*96.5*			*31.0-160*		*04/11/2018 02:29*	WG1095394

MW-113

Collected date/time: 04/04/18 11:00

SAMPLE RESULTS - 08

L983865

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2210		2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0350	J	0.0197	0.100	1	04/11/2018 15:49	WG1096185

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	174		0.519	10.0	10	04/08/2018 15:44	WG1095124
Fluoride	0.515		0.00990	0.100	1	04/08/2018 15:29	WG1095124
Sulfate	985		0.774	50.0	10	04/08/2018 15:44	WG1095124

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00199	J	0.000250	0.00200	1	04/18/2018 14:41	WG1095154
Arsenic,Dissolved	0.00275	J	0.00125	0.0100	5	04/17/2018 18:54	WG1095181
Barium	0.0212		0.000360	0.00500	1	04/18/2018 14:41	WG1095154
Barium,Dissolved	0.0214	J	0.00180	0.0250	5	04/17/2018 18:54	WG1095181
Calcium	318		0.0460	1.00	1	04/18/2018 14:41	WG1095154
Chromium	0.00154	J	0.000540	0.00200	1	04/18/2018 14:41	WG1095154
Chromium,Dissolved	U		0.00270	0.0100	5	04/17/2018 18:54	WG1095181
Iron	0.454		0.0150	0.100	1	04/18/2018 14:41	WG1095154
Iron,Dissolved	0.498	J	0.0750	0.500	5	04/17/2018 18:54	WG1095181
Lead	U		0.000240	0.00200	1	04/18/2018 14:41	WG1095154
Lead,Dissolved	U		0.00120	0.0100	5	04/17/2018 18:54	WG1095181
Manganese	0.856		0.000250	0.00500	1	04/18/2018 14:41	WG1095154
Manganese,Dissolved	0.960		0.00125	0.0250	5	04/17/2018 18:54	WG1095181
Potassium	0.538	J	0.0370	1.00	1	04/18/2018 14:41	WG1095154
Selenium	U		0.000380	0.00200	1	04/18/2018 14:41	WG1095154
Selenium,Dissolved	U		0.00190	0.0100	5	04/17/2018 18:54	WG1095181
Sodium	164		0.110	1.00	1	04/18/2018 14:41	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.683		0.0314	0.100	1	04/10/2018 14:42	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*104*			*77.0-122*		*04/10/2018 14:42*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	0.0307	J	0.0100	0.0500	1	04/07/2018 17:39	WG1095231
Benzene	0.00908		0.000331	0.00100	1	04/07/2018 17:39	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 17:39	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 17:39	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 17:39	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 17:39	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 17:39	WG1095231
Carbon disulfide	0.000571	J	0.000275	0.00100	1	04/07/2018 17:39	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 17:39	WG1095231

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 17:39	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 17:39	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 17:39	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 17:39	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 17:39	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 17:39	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 17:39	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 17:39	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 17:39	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 17:39	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 17:39	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 17:39	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 17:39	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 17:39	WG1095231
Ethylbenzene	0.00604		0.000384	0.00100	1	04/07/2018 17:39	WG1095231
Isopropylbenzene	0.000518	J	0.000326	0.00100	1	04/07/2018 17:39	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 17:39	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 17:39	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 17:39	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 17:39	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 17:39	WG1095231
Methyl tert-butyl ether	0.0114		0.000367	0.00100	1	04/07/2018 17:39	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 17:39	WG1095231
n-Propylbenzene	0.000598	J	0.000349	0.00100	1	04/07/2018 17:39	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 17:39	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 17:39	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 17:39	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 17:39	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 17:39	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 17:39	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 17:39	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 17:39	WG1095231
1,2,4-Trimethylbenzene	0.00240		0.000373	0.00100	1	04/07/2018 17:39	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 17:39	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 17:39	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 17:39	WG1095231
m&p-Xylene	0.00849		0.000719	0.00200	1	04/07/2018 17:39	WG1095231
Xylenes, Total	0.00849		0.00106	0.00300	1	04/07/2018 17:39	WG1095231
(S) Toluene-d8	*108*			*80.0-120*		*04/07/2018 17:39*	WG1095231
(S) Dibromofluoromethane	*99.3*			*76.0-123*		*04/07/2018 17:39*	WG1095231
(S) 4-Bromofluorobenzene	*97.6*			*80.0-120*		*04/07/2018 17:39*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.142	B	0.0247	0.100	1	04/11/2018 02:46	WG1095394
(S) o-Terphenyl	*91.5*			*31.0-160*		*04/11/2018 02:46*	WG1095394

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1700		2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0260	J P1	0.0197	0.100	1	04/11/2018 16:02	WG1096186

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	207		0.519	10.0	10	04/08/2018 16:15	WG1095124
Fluoride	0.650		0.00990	0.100	1	04/08/2018 16:00	WG1095124
Sulfate	525		0.774	50.0	10	04/08/2018 16:15	WG1095124

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.000839	J	0.000250	0.00200	1	04/18/2018 14:45	WG1095154
Arsenic,Dissolved	U		0.00125	0.0100	5	04/17/2018 18:59	WG1095181
Barium	0.0475		0.000360	0.00500	1	04/18/2018 14:45	WG1095154
Barium,Dissolved	0.0490		0.00180	0.0250	5	04/17/2018 18:59	WG1095181
Calcium	242		0.0460	1.00	1	04/18/2018 14:45	WG1095154
Chromium	0.00357		0.000540	0.00200	1	04/18/2018 14:45	WG1095154
Chromium,Dissolved	U		0.00270	0.0100	5	04/17/2018 18:59	WG1095181
Iron	0.349		0.0150	0.100	1	04/18/2018 14:45	WG1095154
Iron,Dissolved	0.352	J	0.0750	0.500	5	04/17/2018 18:59	WG1095181
Lead	0.000602	J	0.000240	0.00200	1	04/18/2018 14:45	WG1095154
Lead,Dissolved	U		0.00120	0.0100	5	04/17/2018 18:59	WG1095181
Manganese	0.985		0.000250	0.00500	1	04/18/2018 14:45	WG1095154
Manganese,Dissolved	1.03		0.00125	0.0250	5	04/17/2018 18:59	WG1095181
Potassium	0.378	J	0.0370	1.00	1	04/18/2018 14:45	WG1095154
Selenium	0.00161	J	0.000380	0.00200	1	04/18/2018 14:45	WG1095154
Selenium,Dissolved	U		0.00190	0.0100	5	04/17/2018 18:59	WG1095181
Sodium	183		0.110	1.00	1	04/18/2018 14:45	WG1095154

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	0.0281	J	0.0100	0.0500	1	04/07/2018 17:58	WG1095231
Benzene	0.0770		0.000331	0.00100	1	04/07/2018 17:58	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 17:58	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 17:58	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 17:58	WG1095231
n-Butylbenzene	0.00193		0.000361	0.00100	1	04/07/2018 17:58	WG1095231
sec-Butylbenzene	0.00378		0.000365	0.00100	1	04/07/2018 17:58	WG1095231
Carbon disulfide	0.000455	J	0.000275	0.00100	1	04/07/2018 17:58	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 17:58	WG1095231
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 17:58	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 17:58	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 17:58	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 17:58	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 17:58	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 17:58	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 17:58	WG1095231

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	0.000655	J	0.000361	0.00100	1	04/07/2018 17:58	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 17:58	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 17:58	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 17:58	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 17:58	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 17:58	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 17:58	WG1095231
Ethylbenzene	0.00855		0.000384	0.00100	1	04/07/2018 17:58	WG1095231
Isopropylbenzene	0.0177		0.000326	0.00100	1	04/07/2018 17:58	WG1095231
p-Isopropyltoluene	0.00134		0.000350	0.00100	1	04/07/2018 17:58	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 17:58	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 17:58	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 17:58	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 17:58	WG1095231
Methyl tert-butyl ether	0.0559		0.000367	0.00100	1	04/07/2018 17:58	WG1095231
Naphthalene	0.00114	J	0.00100	0.00500	1	04/07/2018 17:58	WG1095231
n-Propylbenzene	0.0319		0.000349	0.00100	1	04/07/2018 17:58	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 17:58	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 17:58	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 17:58	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 17:58	WG1095231
Toluene	0.00322		0.000412	0.00100	1	04/07/2018 17:58	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 17:58	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 17:58	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 17:58	WG1095231
1,2,4-Trimethylbenzene	0.0443		0.000373	0.00100	1	04/07/2018 17:58	WG1095231
1,3,5-Trimethylbenzene	0.000443	J	0.000387	0.00100	1	04/07/2018 17:58	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 17:58	WG1095231
o-Xylene	0.00159		0.000341	0.00100	1	04/07/2018 17:58	WG1095231
m&p-Xylene	0.0283		0.000719	0.00200	1	04/07/2018 17:58	WG1095231
Xylenes, Total	0.0299		0.00106	0.00300	1	04/07/2018 17:58	WG1095231
(S) Toluene-d8	*108*			*80.0-120*		*04/07/2018 17:58*	WG1095231
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/07/2018 17:58*	WG1095231
(S) 4-Bromofluorobenzene	*97.2*			*80.0-120*		*04/07/2018 17:58*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.526	B	0.0247	0.100	1	04/11/2018 03:03	WG1095394
(S) o-Terphenyl	*96.5*			*31.0-160*		*04/11/2018 03:03*	WG1095394

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4480		2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	3.89		0.0985	0.500	5	04/11/2018 16:04	WG1096186

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	441		1.04	20.0	20	04/08/2018 17:17	WG1095124
Fluoride	1.11		0.00990	0.100	1	04/08/2018 16:31	WG1095124
Sulfate	2790		3.87	250	50	04/10/2018 16:36	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00410		0.000250	0.00200	1	04/18/2018 14:49	WG1095154
Arsenic,Dissolved	0.00542	J	0.00125	0.0100	5	04/17/2018 19:24	WG1095181
Barium	0.00963		0.000360	0.00500	1	04/18/2018 14:49	WG1095154
Barium,Dissolved	0.0102	J	0.00180	0.0250	5	04/17/2018 19:24	WG1095181
Calcium	555		0.0460	1.00	1	04/18/2018 14:49	WG1095154
Chromium	U		0.000540	0.00200	1	04/18/2018 14:49	WG1095154
Chromium,Dissolved	0.00337	J	0.00270	0.0100	5	04/17/2018 19:24	WG1095181
Iron	U		0.0150	0.100	1	04/18/2018 14:49	WG1095154
Iron,Dissolved	U		0.0750	0.500	5	04/17/2018 19:24	WG1095181
Lead	U		0.000240	0.00200	1	04/18/2018 14:49	WG1095154
Lead,Dissolved	0.00129	J	0.00120	0.0100	5	04/17/2018 19:24	WG1095181
Manganese	0.0144		0.000250	0.00500	1	04/18/2018 14:49	WG1095154
Manganese,Dissolved	0.0157	J	0.00125	0.0250	5	04/17/2018 19:24	WG1095181
Potassium	1.65		0.0370	1.00	1	04/18/2018 14:49	WG1095154
Selenium	0.00560		0.000380	0.00200	1	04/18/2018 14:49	WG1095154
Selenium,Dissolved	0.00603	J	0.00190	0.0100	5	04/17/2018 19:24	WG1095181
Sodium	270		0.110	1.00	1	04/18/2018 14:49	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 15:06	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*		*04/10/2018 15:06*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 18:18	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 18:18	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 18:18	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 18:18	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 18:18	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 18:18	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 18:18	WG1095231
Carbon disulfide	0.000386	J	0.000275	0.00100	1	04/07/2018 18:18	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 18:18	WG1095231

MW-134
Collected date/time: 04/04/18 10:10

SAMPLE RESULTS - 10

L983865

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 18:18	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 18:18	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 18:18	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 18:18	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 18:18	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 18:18	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 18:18	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 18:18	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 18:18	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 18:18	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 18:18	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 18:18	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 18:18	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 18:18	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 18:18	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 18:18	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 18:18	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 18:18	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 18:18	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 18:18	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 18:18	WG1095231
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 18:18	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 18:18	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 18:18	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 18:18	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 18:18	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 18:18	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 18:18	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 18:18	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 18:18	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 18:18	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 18:18	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 18:18	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 18:18	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 18:18	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 18:18	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 18:18	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 18:18	WG1095231
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 18:18*	WG1095231
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/07/2018 18:18*	WG1095231
(S) 4-Bromofluorobenzene	*96.7*			*80.0-120*		*04/07/2018 18:18*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0533	J	0.0247	0.100	1	04/12/2018 21:37	WG1096452
(S) o-Terphenyl	*97.3*			*31.0-160*		*04/12/2018 21:37*	WG1096452

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2580		2.82	10.0	1	04/11/2018 16:21	WG1096155

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U	J6	0.0197	0.100	1	04/11/2018 16:05	WG1096186

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	813		1.04	20.0	20	04/08/2018 17:48	WG1095124
Fluoride	0.470		0.00990	0.100	1	04/08/2018 17:32	WG1095124
Sulfate	1020		1.55	100	20	04/08/2018 17:48	WG1095124

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Calcium	341		0.0460	1.00	1	04/18/2018 14:53	WG1095154
Potassium	2.63		0.0370	1.00	1	04/18/2018 14:53	WG1095154
Sodium	444		0.110	1.00	1	04/18/2018 14:53	WG1095154

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 18:37	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 18:37	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 18:37	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 18:37	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 18:37	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 18:37	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 18:37	WG1095231
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 18:37	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 18:37	WG1095231
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 18:37	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 18:37	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 18:37	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 18:37	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 18:37	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 18:37	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 18:37	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 18:37	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 18:37	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 18:37	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 18:37	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 18:37	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 18:37	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 18:37	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 18:37	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 18:37	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 18:37	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 18:37	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 18:37	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 18:37	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 18:37	WG1095231

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 18:37	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 18:37	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 18:37	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 18:37	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 18:37	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 18:37	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 18:37	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 18:37	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 18:37	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 18:37	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 18:37	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 18:37	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 18:37	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 18:37	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 18:37	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 18:37	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 18:37	WG1095231
(S) Toluene-d8	*108*			*80.0-120*		*04/07/2018 18:37*	WG1095231
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/07/2018 18:37*	WG1095231
(S) 4-Bromofluorobenzene	*97.6*			*80.0-120*		*04/07/2018 18:37*	WG1095231

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	819		2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.507		0.0197	0.100	1	04/11/2018 16:07	WG1096186

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	15.3		0.0519	1.00	1	04/08/2018 18:03	WG1095124
Fluoride	0.888		0.00990	0.100	1	04/08/2018 18:03	WG1095124
Sulfate	467		0.774	50.0	10	04/10/2018 16:50	WG1095827

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Calcium	181		0.0460	1.00	1	04/18/2018 14:57	WG1095154
Potassium	0.954	J	0.0370	1.00	1	04/18/2018 14:57	WG1095154
Sodium	18.0		0.110	1.00	1	04/18/2018 14:57	WG1095154

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 18:56	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 18:56	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 18:56	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 18:56	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 18:56	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 18:56	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 18:56	WG1095231
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 18:56	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 18:56	WG1095231
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 18:56	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 18:56	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 18:56	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 18:56	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 18:56	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 18:56	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 18:56	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 18:56	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 18:56	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 18:56	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 18:56	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 18:56	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 18:56	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 18:56	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 18:56	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 18:56	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 18:56	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 18:56	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 18:56	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 18:56	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 18:56	WG1095231

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 18:56	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 18:56	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 18:56	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 18:56	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 18:56	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 18:56	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 18:56	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 18:56	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 18:56	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 18:56	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 18:56	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 18:56	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 18:56	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 18:56	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 18:56	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 18:56	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 18:56	WG1095231
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 18:56*	WG1095231
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/07/2018 18:56*	WG1095231
(S) 4-Bromofluorobenzene	*96.9*			*80.0-120*		*04/07/2018 18:56*	WG1095231

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3420		2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0750	J	0.0197	0.100	1	04/11/2018 16:08	WG1096186

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	262		1.04	20.0	20	04/08/2018 19:20	WG1095124
Fluoride	1.76		0.00990	0.100	1	04/08/2018 19:05	WG1095124
Sulfate	2830		3.87	250	50	04/13/2018 17:19	WG1095124

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00333		0.000250	0.00200	1	04/18/2018 15:01	WG1095154
Arsenic,Dissolved	0.00249		0.000250	0.00200	1	04/22/2018 14:30	WG1095181
Barium	0.00824		0.000360	0.00500	1	04/18/2018 15:01	WG1095154
Barium,Dissolved	0.00618		0.000360	0.00500	1	04/22/2018 14:30	WG1095181
Calcium	455		0.0460	1.00	1	04/18/2018 15:01	WG1095154
Chromium	U		0.000540	0.00200	1	04/18/2018 15:01	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/22/2018 14:30	WG1095181
Iron	0.0246	J	0.0150	0.100	1	04/18/2018 15:01	WG1095154
Iron,Dissolved	U		0.0150	0.100	1	04/22/2018 14:30	WG1095181
Lead	U		0.000240	0.00200	1	04/18/2018 15:01	WG1095154
Lead,Dissolved	0.000247	J	0.000240	0.00200	1	04/22/2018 14:30	WG1095181
Manganese	0.0564		0.000250	0.00500	1	04/18/2018 15:01	WG1095154
Manganese,Dissolved	0.0439		0.000250	0.00500	1	04/22/2018 14:30	WG1095181
Potassium	0.580	J	0.0370	1.00	1	04/18/2018 15:01	WG1095154
Selenium	0.00159	J	0.000380	0.00200	1	04/18/2018 15:01	WG1095154
Selenium,Dissolved	U		0.000380	0.00200	1	04/22/2018 14:30	WG1095181
Sodium	232		0.110	1.00	1	04/18/2018 15:01	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 15:30	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*		*04/10/2018 15:30*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 19:15	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 19:15	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 19:15	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 19:15	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 19:15	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 19:15	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 19:15	WG1095231
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 19:15	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 19:15	WG1095231

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 19:15	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 19:15	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 19:15	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 19:15	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 19:15	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 19:15	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 19:15	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 19:15	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 19:15	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 19:15	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 19:15	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 19:15	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 19:15	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 19:15	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 19:15	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 19:15	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 19:15	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 19:15	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 19:15	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 19:15	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 19:15	WG1095231
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 19:15	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 19:15	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 19:15	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 19:15	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 19:15	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 19:15	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 19:15	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 19:15	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 19:15	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 19:15	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 19:15	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 19:15	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 19:15	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 19:15	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 19:15	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 19:15	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 19:15	WG1095231
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 19:15*	WG1095231
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/07/2018 19:15*	WG1095231
(S) 4-Bromofluorobenzene	*97.5*			*80.0-120*		*04/07/2018 19:15*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0341	B J	0.0247	0.100	1	04/11/2018 03:20	WG1095394
(S) o-Terphenyl	*88.2*			*31.0-160*		*04/11/2018 03:20*	WG1095394

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3000		2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	1.50		0.0197	0.100	1	04/11/2018 16:14	WG1096186

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	181		1.04	20.0	20	04/08/2018 20:22	WG1095124
Fluoride	1.97		0.00990	0.100	1	04/08/2018 19:36	WG1095124
Sulfate	2260		3.87	250	50	04/10/2018 17:03	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00226		0.000250	0.00200	1	04/18/2018 15:04	WG1095154
Arsenic,Dissolved	0.00169	J	0.000250	0.00200	1	04/22/2018 14:34	WG1095181
Barium	0.0129		0.000360	0.00500	1	04/18/2018 15:04	WG1095154
Barium,Dissolved	0.0106		0.000360	0.00500	1	04/22/2018 14:34	WG1095181
Calcium	665		0.0460	1.00	1	04/18/2018 15:04	WG1095154
Chromium	0.00708		0.000540	0.00200	1	04/18/2018 15:04	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/22/2018 14:34	WG1095181
Iron	0.0871	J	0.0150	0.100	1	04/18/2018 15:04	WG1095154
Iron,Dissolved	U		0.0150	0.100	1	04/22/2018 14:34	WG1095181
Lead	U		0.000240	0.00200	1	04/18/2018 15:04	WG1095154
Lead,Dissolved	0.000269	J	0.000240	0.00200	1	04/22/2018 14:34	WG1095181
Manganese	0.900		0.000250	0.00500	1	04/18/2018 15:04	WG1095154
Manganese,Dissolved	0.672		0.000250	0.00500	1	04/22/2018 14:34	WG1095181
Potassium	2.74		0.0370	1.00	1	04/18/2018 15:04	WG1095154
Selenium	0.0105		0.000380	0.00200	1	04/18/2018 15:04	WG1095154
Selenium,Dissolved	0.00926		0.000380	0.00200	1	04/22/2018 14:34	WG1095181
Sodium	138		0.110	1.00	1	04/18/2018 15:04	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 15:54	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*		*04/10/2018 15:54*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 19:35	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 19:35	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 19:35	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 19:35	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 19:35	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 19:35	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 19:35	WG1095231
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 19:35	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 19:35	WG1095231

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 19:35	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 19:35	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 19:35	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 19:35	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 19:35	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 19:35	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 19:35	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 19:35	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 19:35	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 19:35	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 19:35	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 19:35	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 19:35	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 19:35	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 19:35	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 19:35	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 19:35	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 19:35	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 19:35	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 19:35	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 19:35	WG1095231
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 19:35	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 19:35	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 19:35	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 19:35	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 19:35	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 19:35	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 19:35	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 19:35	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 19:35	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 19:35	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 19:35	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 19:35	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 19:35	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 19:35	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 19:35	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 19:35	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 19:35	WG1095231
(S) Toluene-d8	*107*			*80.0-120*		*04/07/2018 19:35*	WG1095231
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/07/2018 19:35*	WG1095231
(S) 4-Bromofluorobenzene	*97.0*			*80.0-120*		*04/07/2018 19:35*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/10/2018 17:03	WG1095394
(S) o-Terphenyl	*84.5*			*31.0-160*		*04/10/2018 17:03*	WG1095394

MW-117

Collected date/time: 04/04/18 08:50

SAMPLE RESULTS - 15

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2920		2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.207		0.0197	0.100	1	04/11/2018 16:15	WG1096186

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	124		1.04	20.0	20	04/08/2018 20:53	WG1095124
Fluoride	3.20		0.00990	0.100	1	04/08/2018 20:37	WG1095124
Sulfate	1070		1.55	100	20	04/08/2018 20:53	WG1095124

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00236		0.000250	0.00200	1	04/18/2018 15:08	WG1095154
Arsenic,Dissolved	0.00176	J	0.000250	0.00200	1	04/22/2018 14:39	WG1095181
Barium	0.0110		0.000360	0.00500	1	04/18/2018 15:08	WG1095154
Barium,Dissolved	0.00815		0.000360	0.00500	1	04/22/2018 14:39	WG1095181
Calcium	604		0.0460	1.00	1	04/18/2018 15:08	WG1095154
Chromium	0.000952	J	0.000540	0.00200	1	04/18/2018 15:08	WG1095154
Chromium,Dissolved	0.000583	J	0.000540	0.00200	1	04/22/2018 14:39	WG1095181
Iron	0.200		0.0150	0.100	1	04/18/2018 15:08	WG1095154
Iron,Dissolved	0.0309	J	0.0150	0.100	1	04/22/2018 14:39	WG1095181
Lead	0.000293	J	0.000240	0.00200	1	04/18/2018 15:08	WG1095154
Lead,Dissolved	0.000252	J	0.000240	0.00200	1	04/22/2018 14:39	WG1095181
Manganese	0.00405	J	0.000250	0.00500	1	04/18/2018 15:08	WG1095154
Manganese,Dissolved	0.00132	J	0.000250	0.00500	1	04/22/2018 14:39	WG1095181
Potassium	6.30		0.0370	1.00	1	04/18/2018 15:08	WG1095154
Selenium	0.0126		0.000380	0.00200	1	04/19/2018 12:16	WG1095154
Sodium	111		0.110	1.00	1	04/18/2018 15:08	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 16:17	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*		*04/10/2018 16:17*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 19:54	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 19:54	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 19:54	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 19:54	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 19:54	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 19:54	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 19:54	WG1095231
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 19:54	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 19:54	WG1095231
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 19:54	WG1095231

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 19:54	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 19:54	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 19:54	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 19:54	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 19:54	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 19:54	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 19:54	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 19:54	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 19:54	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 19:54	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 19:54	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 19:54	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 19:54	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 19:54	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 19:54	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 19:54	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 19:54	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 19:54	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 19:54	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 19:54	WG1095231
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 19:54	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 19:54	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 19:54	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 19:54	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 19:54	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 19:54	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 19:54	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 19:54	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 19:54	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 19:54	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 19:54	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 19:54	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 19:54	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 19:54	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 19:54	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 19:54	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 19:54	WG1095231
(S) Toluene-d8	*106*			*80.0-120*		*04/07/2018 19:54*	WG1095231
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/07/2018 19:54*	WG1095231
(S) 4-Bromofluorobenzene	*99.5*			*80.0-120*		*04/07/2018 19:54*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/10/2018 17:21	WG1095394
(S) o-Terphenyl	*86.4*			*31.0-160*		*04/10/2018 17:21*	WG1095394

MW-118

Collected date/time: 04/04/18 09:35

SAMPLE RESULTS - 16

L983865

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3300		2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	1.21		0.0197	0.100	1	04/11/2018 16:16	WG1096186

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	292		1.04	20.0	20	04/08/2018 21:24	WG1095124
Fluoride	5.55		0.00990	0.100	1	04/08/2018 21:08	WG1095124
Sulfate	2480		3.87	250	50	04/10/2018 17:16	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00991		0.000250	0.00200	1	04/18/2018 15:29	WG1095154
Arsenic,Dissolved	0.00818		0.000250	0.00200	1	04/22/2018 14:44	WG1095181
Barium	0.00943		0.000360	0.00500	1	04/18/2018 15:29	WG1095154
Barium,Dissolved	0.00656		0.000360	0.00500	1	04/22/2018 14:44	WG1095181
Calcium	607		0.0460	1.00	1	04/18/2018 15:29	WG1095154
Chromium	U		0.000540	0.00200	1	04/18/2018 15:29	WG1095154
Chromium,Dissolved	0.00117	J	0.000540	0.00200	1	04/22/2018 14:44	WG1095181
Iron	0.0223	J	0.0150	0.100	1	04/18/2018 15:29	WG1095154
Iron,Dissolved	U		0.0150	0.100	1	04/22/2018 14:44	WG1095181
Lead	0.000430	J	0.000240	0.00200	1	04/18/2018 15:29	WG1095154
Lead,Dissolved	U		0.000240	0.00200	1	04/22/2018 14:44	WG1095181
Manganese	0.000501	J	0.000250	0.00500	1	04/18/2018 15:29	WG1095154
Manganese,Dissolved	0.000531	J	0.000250	0.00500	1	04/22/2018 14:44	WG1095181
Potassium	4.86		0.0370	1.00	1	04/18/2018 15:29	WG1095154
Selenium	0.00851		0.000380	0.00200	1	04/18/2018 15:29	WG1095154
Selenium,Dissolved	0.00696		0.000380	0.00200	1	04/22/2018 14:44	WG1095181
Sodium	136		0.110	1.00	1	04/18/2018 15:29	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 16:41	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*		*04/10/2018 16:41*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 20:13	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 20:13	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 20:13	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 20:13	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 20:13	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 20:13	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 20:13	WG1095231
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 20:13	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 20:13	WG1095231

MW-118

Collected date/time: 04/04/18 09:35

SAMPLE RESULTS - 16

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 20:13	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 20:13	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 20:13	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 20:13	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 20:13	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 20:13	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 20:13	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 20:13	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 20:13	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 20:13	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 20:13	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 20:13	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 20:13	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 20:13	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 20:13	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 20:13	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 20:13	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 20:13	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 20:13	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 20:13	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 20:13	WG1095231
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 20:13	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 20:13	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 20:13	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 20:13	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 20:13	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 20:13	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 20:13	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 20:13	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 20:13	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 20:13	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 20:13	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 20:13	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 20:13	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 20:13	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 20:13	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 20:13	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 20:13	WG1095231
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 20:13*	WG1095231
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/07/2018 20:13*	WG1095231
(S) 4-Bromofluorobenzene	*96.5*			*80.0-120*		*04/07/2018 20:13*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0282	0.114	1.14	04/10/2018 17:38	WG1095394
(S) o-Terphenyl	*81.6*			*31.0-160*		*04/10/2018 17:38*	WG1095394

Sample Narrative:

L983865-16 WG1095394: Dilution due to sample volume

MW-119

Collected date/time: 04/04/18 10:20

SAMPLE RESULTS - 17

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2620		2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.288		0.0197	0.100	1	04/11/2018 16:17	WG1096186

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	251		1.04	20.0	20	04/08/2018 21:54	WG1095124
Fluoride	2.75		0.00990	0.100	1	04/08/2018 21:39	WG1095124
Sulfate	2240		3.87	250	50	04/10/2018 17:29	WG1095827

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00392		0.000250	0.00200	1	04/18/2018 15:33	WG1095154
Arsenic,Dissolved	0.00300		0.000250	0.00200	1	04/22/2018 14:48	WG1095181
Barium	0.00951		0.000360	0.00500	1	04/18/2018 15:33	WG1095154
Barium,Dissolved	0.00773		0.000360	0.00500	1	04/22/2018 14:48	WG1095181
Calcium	616		0.0460	1.00	1	04/18/2018 15:33	WG1095154
Chromium	U		0.000540	0.00200	1	04/18/2018 15:33	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/22/2018 14:48	WG1095181
Iron	0.0347	J	0.0150	0.100	1	04/18/2018 15:33	WG1095154
Iron,Dissolved	U		0.0150	0.100	1	04/22/2018 14:48	WG1095181
Lead	0.000502	J	0.000240	0.00200	1	04/18/2018 15:33	WG1095154
Lead,Dissolved	0.000254	J	0.000240	0.00200	1	04/22/2018 14:48	WG1095181
Manganese	0.00250	J	0.000250	0.00500	1	04/18/2018 15:33	WG1095154
Manganese,Dissolved	0.00159	J	0.000250	0.00500	1	04/22/2018 14:48	WG1095181
Potassium	1.10		0.0370	1.00	1	04/18/2018 15:33	WG1095154
Selenium	0.00324		0.000380	0.00200	1	04/18/2018 15:33	WG1095154
Selenium,Dissolved	0.00299		0.000380	0.00200	1	04/22/2018 14:48	WG1095181
Sodium	177		0.110	1.00	1	04/18/2018 15:33	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 17:05	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*		*04/10/2018 17:05*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/07/2018 20:33	WG1095231
Benzene	U		0.000331	0.00100	1	04/07/2018 20:33	WG1095231
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 20:33	WG1095231
Bromoform	U		0.000469	0.00100	1	04/07/2018 20:33	WG1095231
Bromomethane	U		0.000866	0.00500	1	04/07/2018 20:33	WG1095231
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 20:33	WG1095231
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 20:33	WG1095231
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 20:33	WG1095231
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 20:33	WG1095231

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 20:33	WG1095231
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 20:33	WG1095231
Chloroethane	U		0.000453	0.00500	1	04/07/2018 20:33	WG1095231
Chloroform	U		0.000324	0.00500	1	04/07/2018 20:33	WG1095231
Chloromethane	U		0.000276	0.00250	1	04/07/2018 20:33	WG1095231
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 20:33	WG1095231
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 20:33	WG1095231
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 20:33	WG1095231
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 20:33	WG1095231
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 20:33	WG1095231
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 20:33	WG1095231
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 20:33	WG1095231
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 20:33	WG1095231
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 20:33	WG1095231
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 20:33	WG1095231
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 20:33	WG1095231
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 20:33	WG1095231
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 20:33	WG1095231
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 20:33	WG1095231
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 20:33	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 20:33	WG1095231
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 20:33	WG1095231
Naphthalene	U		0.00100	0.00500	1	04/07/2018 20:33	WG1095231
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 20:33	WG1095231
Styrene	U		0.000307	0.00100	1	04/07/2018 20:33	WG1095231
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 20:33	WG1095231
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 20:33	WG1095231
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 20:33	WG1095231
Toluene	U		0.000412	0.00100	1	04/07/2018 20:33	WG1095231
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 20:33	WG1095231
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 20:33	WG1095231
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 20:33	WG1095231
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 20:33	WG1095231
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 20:33	WG1095231
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 20:33	WG1095231
o-Xylene	U		0.000341	0.00100	1	04/07/2018 20:33	WG1095231
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 20:33	WG1095231
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 20:33	WG1095231
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 20:33*	WG1095231
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/07/2018 20:33*	WG1095231
(S) 4-Bromofluorobenzene	*97.1*			*80.0-120*		*04/07/2018 20:33*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/10/2018 17:56	WG1095394
(S) o-Terphenyl	*89.5*			*31.0-160*		*04/10/2018 17:56*	WG1095394

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1730		2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	1.93		0.0197	0.100	1	04/11/2018 16:18	WG1096186

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	546		1.04	20.0	20	04/08/2018 22:25	WG1095124
Fluoride	0.861		0.00990	0.100	1	04/08/2018 22:10	WG1095124
Sulfate	9.96		0.0774	5.00	1	04/08/2018 22:10	WG1095124

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0201		0.000250	0.00200	1	04/15/2018 09:18	WG1095826
Arsenic,Dissolved	0.0152		0.000250	0.00200	1	04/22/2018 14:53	WG1095181
Barium	5.09		0.000360	0.00500	1	04/15/2018 09:18	WG1095826
Barium,Dissolved	3.15		0.000360	0.00500	1	04/22/2018 14:53	WG1095181
Calcium	233		0.0460	1.00	1	04/15/2018 09:18	WG1095826
Chromium	U		0.000540	0.00200	1	04/15/2018 09:18	WG1095826
Chromium,Dissolved	0.00359		0.000540	0.00200	1	04/22/2018 14:53	WG1095181
Iron	1.21		0.0150	0.100	1	04/15/2018 09:18	WG1095826
Iron,Dissolved	1.89		0.0150	0.100	1	04/22/2018 14:53	WG1095181
Lead	0.000758	B J	0.000240	0.00200	1	04/15/2018 09:18	WG1095826
Lead,Dissolved	U		0.000240	0.00200	1	04/22/2018 14:53	WG1095181
Manganese	1.29		0.000250	0.00500	1	04/15/2018 09:18	WG1095826
Manganese,Dissolved	1.14		0.000250	0.00500	1	04/22/2018 14:53	WG1095181
Potassium	1.95		0.0370	1.00	1	04/15/2018 09:18	WG1095826
Selenium	U		0.000380	0.00200	1	04/15/2018 09:18	WG1095826
Selenium,Dissolved	U		0.000380	0.00200	1	04/22/2018 14:53	WG1095181
Sodium	215		0.110	1.00	1	04/15/2018 09:18	WG1095826

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		2.50	12.5	250	04/07/2018 20:52	WG1095231
Benzene	0.411		0.0828	0.250	250	04/07/2018 20:52	WG1095231
Bromodichloromethane	U		0.0950	0.250	250	04/07/2018 20:52	WG1095231
Bromoform	U		0.117	0.250	250	04/07/2018 20:52	WG1095231
Bromomethane	U		0.216	1.25	250	04/07/2018 20:52	WG1095231
n-Butylbenzene	U		0.0902	0.250	250	04/07/2018 20:52	WG1095231
sec-Butylbenzene	U		0.0912	0.250	250	04/07/2018 20:52	WG1095231
Carbon disulfide	U		0.0688	0.250	250	04/07/2018 20:52	WG1095231
Carbon tetrachloride	U		0.0948	0.250	250	04/07/2018 20:52	WG1095231
Chlorobenzene	U		0.0870	0.250	250	04/07/2018 20:52	WG1095231
Chlorodibromomethane	U		0.0818	0.250	250	04/07/2018 20:52	WG1095231
Chloroethane	U		0.113	1.25	250	04/07/2018 20:52	WG1095231
Chloroform	U		0.0810	1.25	250	04/07/2018 20:52	WG1095231
Chloromethane	U		0.0690	0.625	250	04/07/2018 20:52	WG1095231
1,2-Dibromoethane	U		0.0952	0.250	250	04/07/2018 20:52	WG1095231
1,1-Dichloroethane	U		0.0648	0.250	250	04/07/2018 20:52	WG1095231

KWB-5

Collected date/time: 04/04/18 11:25

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L983865

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.0902	0.250	250	04/07/2018 20:52	WG1095231
1,1-Dichloroethene	U		0.0995	0.250	250	04/07/2018 20:52	WG1095231
cis-1,2-Dichloroethene	U		0.0650	0.250	250	04/07/2018 20:52	WG1095231
trans-1,2-Dichloroethene	U		0.0990	0.250	250	04/07/2018 20:52	WG1095231
1,2-Dichloropropane	U		0.0765	0.250	250	04/07/2018 20:52	WG1095231
cis-1,3-Dichloropropene	U		0.104	0.250	250	04/07/2018 20:52	WG1095231
trans-1,3-Dichloropropene	U		0.105	0.250	250	04/07/2018 20:52	WG1095231
Ethylbenzene	U		0.0960	0.250	250	04/07/2018 20:52	WG1095231
Isopropylbenzene	U		0.0815	0.250	250	04/07/2018 20:52	WG1095231
p-Isopropyltoluene	U		0.0875	0.250	250	04/07/2018 20:52	WG1095231
2-Butanone (MEK)	U		0.982	2.50	250	04/07/2018 20:52	WG1095231
2-Hexanone	U		0.955	2.50	250	04/07/2018 20:52	WG1095231
Methylene Chloride	U		0.250	1.25	250	04/07/2018 20:52	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.535	2.50	250	04/07/2018 20:52	WG1095231
Methyl tert-butyl ether	10.3		0.0918	0.250	250	04/07/2018 20:52	WG1095231
Naphthalene	U		0.250	1.25	250	04/07/2018 20:52	WG1095231
n-Propylbenzene	U		0.0872	0.250	250	04/07/2018 20:52	WG1095231
Styrene	U		0.0768	0.250	250	04/07/2018 20:52	WG1095231
1,1,1,2-Tetrachloroethane	U		0.0962	0.250	250	04/07/2018 20:52	WG1095231
1,1,2,2-Tetrachloroethane	U		0.0325	0.250	250	04/07/2018 20:52	WG1095231
Tetrachloroethene	U		0.0930	0.250	250	04/07/2018 20:52	WG1095231
Toluene	U		0.103	0.250	250	04/07/2018 20:52	WG1095231
1,1,1-Trichloroethane	U		0.0798	0.250	250	04/07/2018 20:52	WG1095231
1,1,2-Trichloroethane	U		0.0958	0.250	250	04/07/2018 20:52	WG1095231
Trichloroethene	U		0.0995	0.250	250	04/07/2018 20:52	WG1095231
1,2,4-Trimethylbenzene	U		0.0932	0.250	250	04/07/2018 20:52	WG1095231
1,3,5-Trimethylbenzene	U		0.0968	0.250	250	04/07/2018 20:52	WG1095231
Vinyl chloride	U		0.0648	0.250	250	04/07/2018 20:52	WG1095231
o-Xylene	U		0.0852	0.250	250	04/07/2018 20:52	WG1095231
m&p-Xylene	U		0.180	0.500	250	04/07/2018 20:52	WG1095231
Xylenes, Total	U		0.265	0.750	250	04/07/2018 20:52	WG1095231
(S) Toluene-d8	*107*			*80.0-120*		*04/07/2018 20:52*	WG1095231
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/07/2018 20:52*	WG1095231
(S) 4-Bromofluorobenzene	*95.1*			*80.0-120*		*04/07/2018 20:52*	WG1095231

Sample Narrative:

L983865-18 WG1095231: Non-target compounds too high to run at a lower dilution.

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.70		0.0247	0.100	1	04/11/2018 03:37	WG1095394
(S) o-Terphenyl	*115*			*31.0-160*		*04/11/2018 03:37*	WG1095394

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1630		2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/11/2018 16:19	WG1096186

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	421		1.04	20.0	20	04/08/2018 23:27	WG1095124
Fluoride	0.830		0.00990	0.100	1	04/08/2018 22:41	WG1095124
Sulfate	435		1.55	100	20	04/08/2018 23:27	WG1095124

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0137		0.000250	0.00200	1	04/18/2018 15:37	WG1095154
Arsenic,Dissolved	0.00961		0.000250	0.00200	1	04/22/2018 14:58	WG1095181
Barium	0.0620		0.000360	0.00500	1	04/18/2018 15:37	WG1095154
Barium,Dissolved	0.0522		0.000360	0.00500	1	04/22/2018 14:58	WG1095181
Calcium	242		0.0460	1.00	1	04/18/2018 15:37	WG1095154
Chromium	U		0.000540	0.00200	1	04/18/2018 15:37	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/22/2018 14:58	WG1095181
Iron	6.30		0.0150	0.100	1	04/18/2018 15:37	WG1095154
Iron,Dissolved	4.79		0.0150	0.100	1	04/22/2018 14:58	WG1095181
Lead	U		0.000240	0.00200	1	04/18/2018 15:37	WG1095154
Lead,Dissolved	0.000253	J	0.000240	0.00200	1	04/22/2018 14:58	WG1095181
Manganese	1.68		0.000250	0.00500	1	04/18/2018 15:37	WG1095154
Manganese,Dissolved	1.25		0.000250	0.00500	1	04/22/2018 14:58	WG1095181
Potassium	0.158	J	0.0370	1.00	1	04/18/2018 15:37	WG1095154
Selenium	0.000847	J	0.000380	0.00200	1	04/18/2018 15:37	WG1095154
Selenium,Dissolved	U		0.000380	0.00200	1	04/22/2018 14:58	WG1095181
Sodium	240		0.110	1.00	1	04/18/2018 15:37	WG1095154

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.69		0.0314	0.100	1	04/10/2018 17:29	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*107*			*77.0-122*		*04/10/2018 17:29*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.250	1.25	25	04/12/2018 16:35	WG1095231
Benzene	0.0216	J	0.00828	0.0250	25	04/12/2018 16:35	WG1095231
Bromodichloromethane	U		0.00950	0.0250	25	04/12/2018 16:35	WG1095231
Bromoform	U		0.0117	0.0250	25	04/12/2018 16:35	WG1095231
Bromomethane	U		0.0216	0.125	25	04/12/2018 16:35	WG1095231
n-Butylbenzene	U		0.00902	0.0250	25	04/12/2018 16:35	WG1095231
sec-Butylbenzene	U		0.00912	0.0250	25	04/12/2018 16:35	WG1095231
Carbon disulfide	U		0.00688	0.0250	25	04/12/2018 16:35	WG1095231
Carbon tetrachloride	U		0.00948	0.0250	25	04/12/2018 16:35	WG1095231

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.00870	0.0250	25	04/12/2018 16:35	WG1095231
Chlorodibromomethane	U		0.00818	0.0250	25	04/12/2018 16:35	WG1095231
Chloroethane	U		0.0113	0.125	25	04/12/2018 16:35	WG1095231
Chloroform	U		0.00810	0.125	25	04/12/2018 16:35	WG1095231
Chloromethane	U		0.00690	0.0625	25	04/12/2018 16:35	WG1095231
1,2-Dibromoethane	U		0.00952	0.0250	25	04/12/2018 16:35	WG1095231
1,1-Dichloroethane	U		0.00648	0.0250	25	04/12/2018 16:35	WG1095231
1,2-Dichloroethane	U		0.00902	0.0250	25	04/12/2018 16:35	WG1095231
1,1-Dichloroethene	U		0.00995	0.0250	25	04/12/2018 16:35	WG1095231
cis-1,2-Dichloroethene	U		0.00650	0.0250	25	04/12/2018 16:35	WG1095231
trans-1,2-Dichloroethene	U		0.00990	0.0250	25	04/12/2018 16:35	WG1095231
1,2-Dichloropropane	U		0.00765	0.0250	25	04/12/2018 16:35	WG1095231
cis-1,3-Dichloropropene	U		0.0104	0.0250	25	04/12/2018 16:35	WG1095231
trans-1,3-Dichloropropene	U		0.0105	0.0250	25	04/12/2018 16:35	WG1095231
Ethylbenzene	U		0.00960	0.0250	25	04/12/2018 16:35	WG1095231
Isopropylbenzene	U		0.00815	0.0250	25	04/12/2018 16:35	WG1095231
p-Isopropyltoluene	U		0.00875	0.0250	25	04/12/2018 16:35	WG1095231
2-Butanone (MEK)	U		0.0982	0.250	25	04/12/2018 16:35	WG1095231
2-Hexanone	U		0.0955	0.250	25	04/12/2018 16:35	WG1095231
Methylene Chloride	U		0.0250	0.125	25	04/12/2018 16:35	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.0535	0.250	25	04/12/2018 16:35	WG1095231
Methyl tert-butyl ether	1.25		0.00918	0.0250	25	04/12/2018 16:35	WG1095231
Naphthalene	U		0.0250	0.125	25	04/12/2018 16:35	WG1095231
n-Propylbenzene	U		0.00872	0.0250	25	04/12/2018 16:35	WG1095231
Styrene	U		0.00768	0.0250	25	04/12/2018 16:35	WG1095231
1,1,1,2-Tetrachloroethane	U		0.00962	0.0250	25	04/12/2018 16:35	WG1095231
1,1,2,2-Tetrachloroethane	U		0.00325	0.0250	25	04/12/2018 16:35	WG1095231
Tetrachloroethene	U		0.00930	0.0250	25	04/12/2018 16:35	WG1095231
Toluene	U		0.0103	0.0250	25	04/12/2018 16:35	WG1095231
1,1,1-Trichloroethane	U		0.00798	0.0250	25	04/12/2018 16:35	WG1095231
1,1,2-Trichloroethane	U		0.00958	0.0250	25	04/12/2018 16:35	WG1095231
Trichloroethene	U		0.00995	0.0250	25	04/12/2018 16:35	WG1095231
1,2,4-Trimethylbenzene	U		0.00932	0.0250	25	04/12/2018 16:35	WG1095231
1,3,5-Trimethylbenzene	U		0.00968	0.0250	25	04/12/2018 16:35	WG1095231
Vinyl chloride	U		0.00648	0.0250	25	04/12/2018 16:35	WG1095231
o-Xylene	U		0.00852	0.0250	25	04/12/2018 16:35	WG1095231
m&p-Xylene	U		0.0180	0.0500	25	04/12/2018 16:35	WG1095231
Xylenes, Total	U		0.0265	0.0750	25	04/12/2018 16:35	WG1095231
(S) Toluene-d8	*107*			*80.0-120*		*04/12/2018 16:35*	WG1095231
(S) Dibromofluoromethane	*90.8*			*76.0-123*		*04/12/2018 16:35*	WG1095231
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/12/2018 16:35*	WG1095231

Sample Narrative:

L983865-19 WG1095231: Target compounds too high to run at a lower dilution.

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.52		0.0247	0.100	1	04/11/2018 03:53	WG1095394
(S) o-Terphenyl	*102*			*31.0-160*		*04/11/2018 03:53*	WG1095394

KWB-6

Collected date/time: 04/04/18 13:00

SAMPLE RESULTS - 20

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1600		2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0380	J	0.0197	0.100	1	04/11/2018 16:20	WG1096186

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	248		1.04	20.0	20	04/08/2018 23:58	WG1095124
Fluoride	0.897		0.00990	0.100	1	04/08/2018 23:42	WG1095124
Sulfate	272		1.55	100	20	04/08/2018 23:58	WG1095124

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0251		0.000250	0.00200	1	04/18/2018 15:41	WG1095154
Arsenic,Dissolved	0.00437		0.000250	0.00200	1	04/22/2018 15:02	WG1095181
Barium	0.120		0.000360	0.00500	1	04/18/2018 15:41	WG1095154
Barium,Dissolved	0.0911		0.000360	0.00500	1	04/22/2018 15:02	WG1095181
Calcium	248		0.0460	1.00	1	04/18/2018 15:41	WG1095154
Chromium	0.00170	J	0.000540	0.00200	1	04/18/2018 15:41	WG1095154
Chromium,Dissolved	U		0.000540	0.00200	1	04/22/2018 15:02	WG1095181
Iron	4.68		0.0150	0.100	1	04/18/2018 15:41	WG1095154
Iron,Dissolved	0.103		0.0150	0.100	1	04/22/2018 15:02	WG1095181
Lead	0.00564		0.000240	0.00200	1	04/18/2018 15:41	WG1095154
Lead,Dissolved	0.000429	J	0.000240	0.00200	1	04/22/2018 15:02	WG1095181
Manganese	2.03		0.000250	0.00500	1	04/18/2018 15:41	WG1095154
Manganese,Dissolved	1.51		0.000250	0.00500	1	04/22/2018 15:02	WG1095181
Potassium	0.268	J	0.0370	1.00	1	04/18/2018 15:41	WG1095154
Selenium	U		0.000380	0.00200	1	04/18/2018 15:41	WG1095154
Selenium,Dissolved	U		0.000380	0.00200	1	04/22/2018 15:02	WG1095181
Sodium	138		0.110	1.00	1	04/18/2018 15:41	WG1095154

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.200	1.00	20	04/07/2018 21:31	WG1095231
Benzene	3.88		0.00662	0.0200	20	04/12/2018 16:55	WG1095231
Bromodichloromethane	U		0.00760	0.0200	20	04/07/2018 21:31	WG1095231
Bromoform	U		0.00938	0.0200	20	04/07/2018 21:31	WG1095231
Bromomethane	U		0.0173	0.100	20	04/07/2018 21:31	WG1095231
n-Butylbenzene	U		0.00722	0.0200	20	04/07/2018 21:31	WG1095231
sec-Butylbenzene	U		0.00730	0.0200	20	04/07/2018 21:31	WG1095231
Carbon disulfide	U		0.00550	0.0200	20	04/07/2018 21:31	WG1095231
Carbon tetrachloride	U		0.00758	0.0200	20	04/07/2018 21:31	WG1095231
Chlorobenzene	U		0.00696	0.0200	20	04/07/2018 21:31	WG1095231
Chlorodibromomethane	U		0.00654	0.0200	20	04/07/2018 21:31	WG1095231
Chloroethane	U		0.00906	0.100	20	04/07/2018 21:31	WG1095231
Chloroform	U		0.00648	0.100	20	04/07/2018 21:31	WG1095231
Chloromethane	U		0.00552	0.0500	20	04/07/2018 21:31	WG1095231
1,2-Dibromoethane	U		0.00762	0.0200	20	04/07/2018 21:31	WG1095231
1,1-Dichloroethane	U		0.00518	0.0200	20	04/07/2018 21:31	WG1095231

KWB-6
Collected date/time: 04/04/18 13:00

SAMPLE RESULTS - 20
L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.00722	0.0200	20	04/07/2018 21:31	WG1095231
1,1-Dichloroethene	U		0.00796	0.0200	20	04/07/2018 21:31	WG1095231
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	04/07/2018 21:31	WG1095231
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	04/07/2018 21:31	WG1095231
1,2-Dichloropropane	U		0.00612	0.0200	20	04/07/2018 21:31	WG1095231
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	04/07/2018 21:31	WG1095231
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	04/07/2018 21:31	WG1095231
Ethylbenzene	0.156		0.00768	0.0200	20	04/07/2018 21:31	WG1095231
Isopropylbenzene	0.0252		0.00652	0.0200	20	04/07/2018 21:31	WG1095231
p-Isopropyltoluene	0.00807	J	0.00700	0.0200	20	04/07/2018 21:31	WG1095231
2-Butanone (MEK)	U		0.0786	0.200	20	04/07/2018 21:31	WG1095231
2-Hexanone	U		0.0764	0.200	20	04/07/2018 21:31	WG1095231
Methylene Chloride	U		0.0200	0.100	20	04/07/2018 21:31	WG1095231
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	04/07/2018 21:31	WG1095231
Methyl tert-butyl ether	0.122		0.00734	0.0200	20	04/07/2018 21:31	WG1095231
Naphthalene	0.0587	J	0.0200	0.100	20	04/07/2018 21:31	WG1095231
n-Propylbenzene	0.0486		0.00698	0.0200	20	04/07/2018 21:31	WG1095231
Styrene	U		0.00614	0.0200	20	04/07/2018 21:31	WG1095231
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	04/07/2018 21:31	WG1095231
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	04/07/2018 21:31	WG1095231
Tetrachloroethene	U		0.00744	0.0200	20	04/07/2018 21:31	WG1095231
Toluene	0.00879	J	0.00824	0.0200	20	04/07/2018 21:31	WG1095231
1,1,1-Trichloroethane	U		0.00638	0.0200	20	04/07/2018 21:31	WG1095231
1,1,2-Trichloroethane	U		0.00766	0.0200	20	04/07/2018 21:31	WG1095231
Trichloroethene	U		0.00796	0.0200	20	04/07/2018 21:31	WG1095231
1,2,4-Trimethylbenzene	0.164		0.00746	0.0200	20	04/07/2018 21:31	WG1095231
1,3,5-Trimethylbenzene	0.0557		0.00774	0.0200	20	04/07/2018 21:31	WG1095231
Vinyl chloride	U		0.00518	0.0200	20	04/07/2018 21:31	WG1095231
o-Xylene	0.0350		0.00682	0.0200	20	04/07/2018 21:31	WG1095231
m&p-Xylene	0.223		0.0144	0.0400	20	04/07/2018 21:31	WG1095231
Xylenes, Total	0.258		0.0212	0.0600	20	04/07/2018 21:31	WG1095231
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 21:31*	WG1095231
(S) Toluene-d8	*108*			*80.0-120*		*04/12/2018 16:55*	WG1095231
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/07/2018 21:31*	WG1095231
(S) Dibromofluoromethane	*85.9*			*76.0-123*		*04/12/2018 16:55*	WG1095231
(S) 4-Bromofluorobenzene	*102*			*80.0-120*		*04/12/2018 16:55*	WG1095231
(S) 4-Bromofluorobenzene	*97.9*			*80.0-120*		*04/07/2018 21:31*	WG1095231

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.77		0.0247	0.100	1	04/11/2018 04:10	WG1095394
(S) o-Terphenyl	*95.1*			*31.0-160*		*04/11/2018 04:10*	WG1095394

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3660	J3	2.82	10.0	1	04/11/2018 16:40	WG1096156

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	7.42		0.0985	0.500	5	04/11/2018 16:21	WG1096186

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	185		2.60	50.0	50	04/10/2018 17:56	WG1095827
Fluoride	2.22		0.00990	0.100	1	04/10/2018 17:43	WG1095827
Sulfate	2430		3.87	250	50	04/10/2018 17:56	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00550		0.000250	0.00200	1	04/17/2018 11:36	WG1095155
Arsenic,Dissolved	0.00602		0.000250	0.00200	1	04/13/2018 03:03	WG1095182
Barium	0.0169		0.000360	0.00500	1	04/17/2018 11:36	WG1095155
Barium,Dissolved	0.0145		0.000360	0.00500	1	04/13/2018 03:03	WG1095182
Calcium	506		0.0460	1.00	1	04/17/2018 11:36	WG1095155
Chromium	U		0.000540	0.00200	1	04/17/2018 11:36	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:03	WG1095182
Iron	0.120	B	0.0150	0.100	1	04/17/2018 11:36	WG1095155
Iron,Dissolved	0.0979	B J	0.0150	0.100	1	04/13/2018 03:03	WG1095182
Lead	0.000325	B J	0.000240	0.00200	1	04/17/2018 11:36	WG1095155
Lead,Dissolved	0.000638	B J	0.000240	0.00200	1	04/13/2018 03:03	WG1095182
Manganese	0.481		0.000250	0.00500	1	04/17/2018 11:36	WG1095155
Manganese,Dissolved	0.525		0.000250	0.00500	1	04/13/2018 03:03	WG1095182
Potassium	1.57		0.0370	1.00	1	04/17/2018 11:36	WG1095155
Selenium	0.0140	B	0.00190	0.0100	5	04/17/2018 13:29	WG1095155
Selenium,Dissolved	0.0108		0.000380	0.00200	1	04/13/2018 03:03	WG1095182
Sodium	315		0.110	1.00	1	04/17/2018 11:36	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 17:53	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*		*04/10/2018 17:53*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 20:39	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 20:39	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 20:39	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 20:39	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 20:39	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 20:39	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 20:39	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 20:39	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 20:39	WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 20:39	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 20:39	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 20:39	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 20:39	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 20:39	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 20:39	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 20:39	WG1095245
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 20:39	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 20:39	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 20:39	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 20:39	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 20:39	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 20:39	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 20:39	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 20:39	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 20:39	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 20:39	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 20:39	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 20:39	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 20:39	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 20:39	WG1095245
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 20:39	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 20:39	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 20:39	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 20:39	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 20:39	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 20:39	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 20:39	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 20:39	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 20:39	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 20:39	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 20:39	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 20:39	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 20:39	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 20:39	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 20:39	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 20:39	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 20:39	WG1095245
(S) Toluene-d8	*112*			*80.0-120*		*04/07/2018 20:39*	WG1095245
(S) Dibromofluoromethane	*86.5*			*76.0-123*		*04/07/2018 20:39*	WG1095245
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/07/2018 20:39*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.103	B	0.0247	0.100	1	04/11/2018 04:27	WG1095394
(S) o-Terphenyl	*94.8*			*31.0-160*		*04/11/2018 04:27*	WG1095394

KWB-12B

Collected date/time: 04/04/18 14:35

SAMPLE RESULTS - 22

L983865

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3560		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	7.78		0.0985	0.500	5	04/11/2018 16:22	WG1096186

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/09/2018 17:24	WG1094975

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	121		1.04	20.0	20	04/08/2018 12:37	WG1095125
Fluoride	0.346		0.00990	0.100	1	04/08/2018 12:22	WG1095125
Sulfate	2390		3.87	250	50	04/10/2018 18:09	WG1095827

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	0.0000606	J	0.0000490	0.000200	1	04/09/2018 15:39	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:34	WG1095576

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.609		0.0126	0.200	1	04/09/2018 16:48	WG1095148
Boron,Dissolved	0.594		0.0126	0.200	1	04/11/2018 16:02	WG1095851

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00155	J	0.000250	0.00200	1	04/17/2018 11:39	WG1095155
Arsenic,Dissolved	0.00167	J	0.000250	0.00200	1	04/13/2018 03:19	WG1095182
Barium	0.00991		0.000360	0.00500	1	04/17/2018 11:39	WG1095155
Barium,Dissolved	0.00890		0.000360	0.00500	1	04/13/2018 03:19	WG1095182
Cadmium	U		0.000160	0.00100	1	04/17/2018 11:39	WG1095155
Cadmium,Dissolved	0.000179	J	0.000160	0.00100	1	04/13/2018 03:19	WG1095182
Calcium	571		0.0460	1.00	1	04/17/2018 11:39	WG1095155
Chromium	0.00116	J	0.000540	0.00200	1	04/17/2018 11:39	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:19	WG1095182
Cobalt	U		0.000260	0.00200	1	04/17/2018 11:39	WG1095155
Cobalt,Dissolved	U		0.000260	0.00200	1	04/13/2018 03:19	WG1095182
Iron	0.0689	B J	0.0150	0.100	1	04/17/2018 11:39	WG1095155
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 03:19	WG1095182
Lead	0.000700	B J	0.000240	0.00200	1	04/17/2018 11:39	WG1095155
Lead,Dissolved	0.000469	B J	0.000240	0.00200	1	04/13/2018 03:19	WG1095182
Manganese	0.00277	B J	0.000250	0.00500	1	04/17/2018 11:39	WG1095155
Manganese,Dissolved	0.00191	J	0.000250	0.00500	1	04/13/2018 03:19	WG1095182
Nickel	0.000382	J	0.000350	0.00200	1	04/17/2018 11:39	WG1095155
Nickel,Dissolved	0.00122	J	0.000350	0.00200	1	04/13/2018 03:19	WG1095182

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	0.699	J	0.0370	1.00	1	04/17/2018 11:39	WG1095155
Selenium	0.00311	B	0.000380	0.00200	1	04/17/2018 11:39	WG1095155
Selenium,Dissolved	0.00352		0.000380	0.00200	1	04/13/2018 03:19	WG1095182
Sodium	150		0.110	1.00	1	04/17/2018 11:39	WG1095155
Uranium	0.0301		0.000330	0.0100	1	04/17/2018 11:39	WG1095155
Uranium,Dissolved	0.0294		0.000330	0.0100	1	04/13/2018 03:19	WG1095182
Vanadium	0.0125		0.000180	0.00500	1	04/17/2018 11:39	WG1095155
Vanadium,Dissolved	0.0122		0.000180	0.00500	1	04/13/2018 03:19	WG1095182

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 18:17	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*		*04/10/2018 18:17*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 21:00	WG1095245
Benzene	U		0.000331	0.00100	1	04/07/2018 21:00	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 21:00	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 21:00	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 21:00	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 21:00	WG1095245
sec-Butylbenzene	U		0.000365	0.00100	1	04/07/2018 21:00	WG1095245
Carbon disulfide	U		0.000275	0.00100	1	04/07/2018 21:00	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 21:00	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 21:00	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 21:00	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 21:00	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 21:00	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 21:00	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 21:00	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 21:00	WG1095245
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 21:00	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 21:00	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 21:00	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 21:00	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 21:00	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 21:00	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 21:00	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 21:00	WG1095245
Isopropylbenzene	U		0.000326	0.00100	1	04/07/2018 21:00	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 21:00	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 21:00	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 21:00	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 21:00	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 21:00	WG1095245
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 21:00	WG1095245
Naphthalene	U		0.00100	0.00500	1	04/07/2018 21:00	WG1095245
n-Propylbenzene	U		0.000349	0.00100	1	04/07/2018 21:00	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 21:00	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 21:00	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 21:00	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 21:00	WG1095245

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	04/07/2018 21:00	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 21:00	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 21:00	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 21:00	WG1095245
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/07/2018 21:00	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 21:00	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 21:00	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 21:00	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 21:00	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 21:00	WG1095245
(S) Toluene-d8	*113*			*80.0-120*		*04/07/2018 21:00*	WG1095245
(S) Dibromofluoromethane	*83.2*			*76.0-123*		*04/07/2018 21:00*	WG1095245
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/07/2018 21:00*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0354	B J	0.0247	0.100	1	04/11/2018 04:44	WG1095394
(S) o-Terphenyl	*93.3*			*31.0-160*		*04/11/2018 04:44*	WG1095394

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1550		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/11/2018 16:23	WG1096186

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	242		0.519	10.0	10	04/08/2018 13:08	WG1095125
Fluoride	0.909		0.00990	0.100	1	04/08/2018 12:53	WG1095125
Sulfate	410		0.774	50.0	10	04/08/2018 13:08	WG1095125

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00293		0.000250	0.00200	1	04/17/2018 11:43	WG1095155
Arsenic,Dissolved	0.00301		0.000250	0.00200	1	04/13/2018 03:23	WG1095182
Barium	0.0671		0.000360	0.00500	1	04/17/2018 11:43	WG1095155
Barium,Dissolved	0.0675		0.000360	0.00500	1	04/13/2018 03:23	WG1095182
Calcium	181		0.0460	1.00	1	04/17/2018 11:43	WG1095155
Chromium	0.000673	J	0.000540	0.00200	1	04/17/2018 11:43	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:23	WG1095182
Iron	0.0270	B J	0.0150	0.100	1	04/17/2018 11:43	WG1095155
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 03:23	WG1095182
Lead	0.000685	B J	0.000240	0.00200	1	04/17/2018 11:43	WG1095155
Lead,Dissolved	0.000410	B J	0.000240	0.00200	1	04/13/2018 03:23	WG1095182
Manganese	0.0548		0.000250	0.00500	1	04/17/2018 11:43	WG1095155
Manganese,Dissolved	0.0535		0.000250	0.00500	1	04/13/2018 03:23	WG1095182
Potassium	1.52		0.0370	1.00	1	04/17/2018 11:43	WG1095155
Selenium	0.000499	B J	0.000380	0.00200	1	04/17/2018 11:43	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 03:23	WG1095182
Sodium	172		0.110	1.00	1	04/17/2018 11:43	WG1095155

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 21:20	WG1095245
Benzene	0.00821		0.000331	0.00100	1	04/07/2018 21:20	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 21:20	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 21:20	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 21:20	WG1095245
n-Butylbenzene	U		0.000361	0.00100	1	04/07/2018 21:20	WG1095245
sec-Butylbenzene	0.00254		0.000365	0.00100	1	04/07/2018 21:20	WG1095245
Carbon disulfide	0.000447	J	0.000275	0.00100	1	04/07/2018 21:20	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 21:20	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 21:20	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 21:20	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 21:20	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 21:20	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 21:20	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 21:20	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 21:20	WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 21:20	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 21:20	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 21:20	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 21:20	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 21:20	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 21:20	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 21:20	WG1095245
Ethylbenzene	U		0.000384	0.00100	1	04/07/2018 21:20	WG1095245
Isopropylbenzene	0.00618		0.000326	0.00100	1	04/07/2018 21:20	WG1095245
p-Isopropyltoluene	U		0.000350	0.00100	1	04/07/2018 21:20	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 21:20	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 21:20	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 21:20	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 21:20	WG1095245
Methyl tert-butyl ether	0.0583		0.000367	0.00100	1	04/07/2018 21:20	WG1095245
Naphthalene	0.00103	J	0.00100	0.00500	1	04/07/2018 21:20	WG1095245
n-Propylbenzene	0.00113		0.000349	0.00100	1	04/07/2018 21:20	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 21:20	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 21:20	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 21:20	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 21:20	WG1095245
Toluene	U		0.000412	0.00100	1	04/07/2018 21:20	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 21:20	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 21:20	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 21:20	WG1095245
1,2,4-Trimethylbenzene	0.000659	J	0.000373	0.00100	1	04/07/2018 21:20	WG1095245
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/07/2018 21:20	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 21:20	WG1095245
o-Xylene	U		0.000341	0.00100	1	04/07/2018 21:20	WG1095245
m&p-Xylene	U		0.000719	0.00200	1	04/07/2018 21:20	WG1095245
Xylenes, Total	U		0.00106	0.00300	1	04/07/2018 21:20	WG1095245
(S) Toluene-d8	*109*			*80.0-120*		*04/07/2018 21:20*	WG1095245
(S) Dibromofluoromethane	*82.6*			*76.0-123*		*04/07/2018 21:20*	WG1095245
(S) 4-Bromofluorobenzene	*107*			*80.0-120*		*04/07/2018 21:20*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.02		0.0247	0.100	1	04/10/2018 23:58	WG1095660
(S) o-Terphenyl	*99.2*			*31.0-160*		*04/10/2018 23:58*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1530		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0460	J	0.0197	0.100	1	04/11/2018 16:28	WG1096186

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	409		0.519	10.0	10	04/08/2018 13:39	WG1095125
Fluoride	0.804		0.00990	0.100	1	04/08/2018 13:23	WG1095125
Sulfate	45.6		0.0774	5.00	1	04/08/2018 13:23	WG1095125

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0170		0.000250	0.00200	1	04/17/2018 12:09	WG1095155
Arsenic,Dissolved	0.0141		0.000250	0.00200	1	04/13/2018 03:27	WG1095182
Barium	1.94		0.000360	0.00500	1	04/17/2018 12:09	WG1095155
Barium,Dissolved	1.90		0.000360	0.00500	1	04/13/2018 03:27	WG1095182
Calcium	183		0.0460	1.00	1	04/17/2018 12:09	WG1095155
Chromium	0.00106	J	0.000540	0.00200	1	04/17/2018 12:09	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:27	WG1095182
Iron	1.59		0.0150	0.100	1	04/17/2018 12:09	WG1095155
Iron,Dissolved	1.32		0.0150	0.100	1	04/13/2018 03:27	WG1095182
Lead	0.000764	B J	0.000240	0.00200	1	04/17/2018 12:09	WG1095155
Lead,Dissolved	0.000568	B J	0.000240	0.00200	1	04/13/2018 03:27	WG1095182
Manganese	0.298		0.000250	0.00500	1	04/17/2018 12:09	WG1095155
Manganese,Dissolved	0.279		0.000250	0.00500	1	04/13/2018 03:27	WG1095182
Potassium	0.684	J	0.0370	1.00	1	04/17/2018 12:09	WG1095155
Selenium	U		0.000380	0.00200	1	04/17/2018 12:09	WG1095155
Selenium,Dissolved	0.000513	J	0.000380	0.00200	1	04/13/2018 03:27	WG1095182
Sodium	224		0.110	1.00	1	04/17/2018 12:09	WG1095155

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/07/2018 21:41	WG1095245
Benzene	2.67		0.00662	0.0200	20	04/12/2018 21:24	WG1095245
Bromodichloromethane	U		0.000380	0.00100	1	04/07/2018 21:41	WG1095245
Bromoform	U		0.000469	0.00100	1	04/07/2018 21:41	WG1095245
Bromomethane	U		0.000866	0.00500	1	04/07/2018 21:41	WG1095245
n-Butylbenzene	0.00631		0.000361	0.00100	1	04/07/2018 21:41	WG1095245
sec-Butylbenzene	0.0148		0.000365	0.00100	1	04/07/2018 21:41	WG1095245
Carbon disulfide	0.000533	J	0.000275	0.00100	1	04/07/2018 21:41	WG1095245
Carbon tetrachloride	U		0.000379	0.00100	1	04/07/2018 21:41	WG1095245
Chlorobenzene	U		0.000348	0.00100	1	04/07/2018 21:41	WG1095245
Chlorodibromomethane	U		0.000327	0.00100	1	04/07/2018 21:41	WG1095245
Chloroethane	U		0.000453	0.00500	1	04/07/2018 21:41	WG1095245
Chloroform	U		0.000324	0.00500	1	04/07/2018 21:41	WG1095245
Chloromethane	U		0.000276	0.00250	1	04/07/2018 21:41	WG1095245
1,2-Dibromoethane	U		0.000381	0.00100	1	04/07/2018 21:41	WG1095245
1,1-Dichloroethane	U		0.000259	0.00100	1	04/07/2018 21:41	WG1095245

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/07/2018 21:41	WG1095245
1,1-Dichloroethene	U		0.000398	0.00100	1	04/07/2018 21:41	WG1095245
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/07/2018 21:41	WG1095245
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/07/2018 21:41	WG1095245
1,2-Dichloropropane	U		0.000306	0.00100	1	04/07/2018 21:41	WG1095245
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/07/2018 21:41	WG1095245
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/07/2018 21:41	WG1095245
Ethylbenzene	0.0838		0.000384	0.00100	1	04/07/2018 21:41	WG1095245
Isopropylbenzene	0.0299		0.000326	0.00100	1	04/07/2018 21:41	WG1095245
p-Isopropyltoluene	0.000996	J	0.000350	0.00100	1	04/07/2018 21:41	WG1095245
2-Butanone (MEK)	U		0.00393	0.0100	1	04/07/2018 21:41	WG1095245
2-Hexanone	U		0.00382	0.0100	1	04/07/2018 21:41	WG1095245
Methylene Chloride	U		0.00100	0.00500	1	04/07/2018 21:41	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/07/2018 21:41	WG1095245
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/07/2018 21:41	WG1095245
Naphthalene	0.0290		0.00100	0.00500	1	04/07/2018 21:41	WG1095245
n-Propylbenzene	0.0329		0.000349	0.00100	1	04/07/2018 21:41	WG1095245
Styrene	U		0.000307	0.00100	1	04/07/2018 21:41	WG1095245
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/07/2018 21:41	WG1095245
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/07/2018 21:41	WG1095245
Tetrachloroethene	U		0.000372	0.00100	1	04/07/2018 21:41	WG1095245
Toluene	0.448		0.00824	0.0200	20	04/12/2018 21:24	WG1095245
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/07/2018 21:41	WG1095245
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/07/2018 21:41	WG1095245
Trichloroethene	U		0.000398	0.00100	1	04/07/2018 21:41	WG1095245
1,2,4-Trimethylbenzene	0.0143		0.000373	0.00100	1	04/07/2018 21:41	WG1095245
1,3,5-Trimethylbenzene	0.00259		0.000387	0.00100	1	04/07/2018 21:41	WG1095245
Vinyl chloride	U		0.000259	0.00100	1	04/07/2018 21:41	WG1095245
o-Xylene	0.0570		0.000341	0.00100	1	04/07/2018 21:41	WG1095245
m&p-Xylene	0.0926		0.000719	0.00200	1	04/07/2018 21:41	WG1095245
Xylenes, Total	0.150		0.00106	0.00300	1	04/07/2018 21:41	WG1095245
(S) Toluene-d8	*101*			*80.0-120*		*04/12/2018 21:24*	WG1095245
(S) Toluene-d8	*108*			*80.0-120*		*04/07/2018 21:41*	WG1095245
(S) Dibromofluoromethane	*85.0*			*76.0-123*		*04/07/2018 21:41*	WG1095245
(S) Dibromofluoromethane	*96.1*			*76.0-123*		*04/12/2018 21:24*	WG1095245
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/07/2018 21:41*	WG1095245
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/12/2018 21:24*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.04		0.0247	0.100	1	04/11/2018 00:18	WG1095660
(S) o-Terphenyl	*104*			*31.0-160*		*04/11/2018 00:18*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1410		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0540	J	0.0197	0.100	1	04/11/2018 16:30	WG1096186

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	256		0.519	10.0	10	04/08/2018 14:57	WG1095125
Fluoride	0.686		0.00990	0.100	1	04/08/2018 13:54	WG1095125
Sulfate	128		0.774	50.0	10	04/08/2018 14:57	WG1095125

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00900		0.000250	0.00200	1	04/17/2018 12:13	WG1095155
Arsenic,Dissolved	0.00813		0.000250	0.00200	1	04/13/2018 03:39	WG1095182
Barium	0.311		0.000360	0.00500	1	04/17/2018 12:13	WG1095155
Barium,Dissolved	0.323		0.000360	0.00500	1	04/13/2018 03:39	WG1095182
Calcium	179		0.0460	1.00	1	04/17/2018 12:13	WG1095155
Chromium	0.000544	J	0.000540	0.00200	1	04/17/2018 12:13	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:39	WG1095182
Iron	0.143	B	0.0150	0.100	1	04/17/2018 12:13	WG1095155
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 03:39	WG1095182
Lead	0.000673	B J	0.000240	0.00200	1	04/17/2018 12:13	WG1095155
Lead,Dissolved	0.000684	B J	0.000240	0.00200	1	04/13/2018 03:39	WG1095182
Manganese	0.244		0.000250	0.00500	1	04/17/2018 12:13	WG1095155
Manganese,Dissolved	0.233		0.000250	0.00500	1	04/13/2018 03:39	WG1095182
Potassium	0.745	J	0.0370	1.00	1	04/17/2018 12:13	WG1095155
Selenium	U		0.000380	0.00200	1	04/17/2018 12:13	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 03:39	WG1095182
Sodium	237		0.110	1.00	1	04/17/2018 12:13	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	11.9		0.157	0.500	5	04/10/2018 21:03	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*107*			*77.0-122*		*04/10/2018 21:03*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		1.00	5.00	100	04/07/2018 22:02	WG1095245
Benzene	2.15		0.0331	0.100	100	04/07/2018 22:02	WG1095245
Bromodichloromethane	U		0.0380	0.100	100	04/07/2018 22:02	WG1095245
Bromoform	U		0.0469	0.100	100	04/07/2018 22:02	WG1095245
Bromomethane	U		0.0866	0.500	100	04/07/2018 22:02	WG1095245
n-Butylbenzene	U		0.0361	0.100	100	04/07/2018 22:02	WG1095245
sec-Butylbenzene	U		0.0365	0.100	100	04/07/2018 22:02	WG1095245
Carbon disulfide	U		0.0275	0.100	100	04/07/2018 22:02	WG1095245
Carbon tetrachloride	U		0.0379	0.100	100	04/07/2018 22:02	WG1095245

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.0348	0.100	100	04/07/2018 22:02	WG1095245
Chlorodibromomethane	U		0.0327	0.100	100	04/07/2018 22:02	WG1095245
Chloroethane	U		0.0453	0.500	100	04/07/2018 22:02	WG1095245
Chloroform	U		0.0324	0.500	100	04/07/2018 22:02	WG1095245
Chloromethane	U		0.0276	0.250	100	04/07/2018 22:02	WG1095245
1,2-Dibromoethane	U		0.0381	0.100	100	04/07/2018 22:02	WG1095245
1,1-Dichloroethane	U		0.0259	0.100	100	04/07/2018 22:02	WG1095245
1,2-Dichloroethane	U		0.0361	0.100	100	04/07/2018 22:02	WG1095245
1,1-Dichloroethene	U		0.0398	0.100	100	04/07/2018 22:02	WG1095245
cis-1,2-Dichloroethene	U		0.0260	0.100	100	04/07/2018 22:02	WG1095245
trans-1,2-Dichloroethene	U		0.0396	0.100	100	04/07/2018 22:02	WG1095245
1,2-Dichloropropane	U		0.0306	0.100	100	04/07/2018 22:02	WG1095245
cis-1,3-Dichloropropene	U		0.0418	0.100	100	04/07/2018 22:02	WG1095245
trans-1,3-Dichloropropene	U		0.0419	0.100	100	04/07/2018 22:02	WG1095245
Ethylbenzene	0.275		0.0384	0.100	100	04/07/2018 22:02	WG1095245
Isopropylbenzene	0.0594	J	0.0326	0.100	100	04/07/2018 22:02	WG1095245
p-Isopropyltoluene	U		0.0350	0.100	100	04/07/2018 22:02	WG1095245
2-Butanone (MEK)	U		0.393	1.00	100	04/07/2018 22:02	WG1095245
2-Hexanone	U		0.382	1.00	100	04/07/2018 22:02	WG1095245
Methylene Chloride	U		0.100	0.500	100	04/07/2018 22:02	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	04/07/2018 22:02	WG1095245
Methyl tert-butyl ether	2.99		0.0367	0.100	100	04/07/2018 22:02	WG1095245
Naphthalene	U		0.100	0.500	100	04/07/2018 22:02	WG1095245
n-Propylbenzene	0.0695	J	0.0349	0.100	100	04/07/2018 22:02	WG1095245
Styrene	U		0.0307	0.100	100	04/07/2018 22:02	WG1095245
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	04/07/2018 22:02	WG1095245
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	04/07/2018 22:02	WG1095245
Tetrachloroethene	U		0.0372	0.100	100	04/07/2018 22:02	WG1095245
Toluene	0.0896	J	0.0412	0.100	100	04/07/2018 22:02	WG1095245
1,1,1-Trichloroethane	U		0.0319	0.100	100	04/07/2018 22:02	WG1095245
1,1,2-Trichloroethane	U		0.0383	0.100	100	04/07/2018 22:02	WG1095245
Trichloroethene	U		0.0398	0.100	100	04/07/2018 22:02	WG1095245
1,2,4-Trimethylbenzene	0.168		0.0373	0.100	100	04/07/2018 22:02	WG1095245
1,3,5-Trimethylbenzene	U		0.0387	0.100	100	04/07/2018 22:02	WG1095245
Vinyl chloride	U		0.0259	0.100	100	04/07/2018 22:02	WG1095245
o-Xylene	0.0467	J	0.0341	0.100	100	04/07/2018 22:02	WG1095245
m&p-Xylene	0.285		0.0719	0.200	100	04/07/2018 22:02	WG1095245
Xylenes, Total	0.332		0.106	0.300	100	04/07/2018 22:02	WG1095245
(S) Toluene-d8	*105*			*80.0-120*		*04/07/2018 22:02*	WG1095245
(S) Dibromofluoromethane	*89.3*			*76.0-123*		*04/07/2018 22:02*	WG1095245
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/07/2018 22:02*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.52		0.0247	0.100	1	04/11/2018 00:38	WG1095660
(S) o-Terphenyl	*97.8*			*31.0-160*		*04/11/2018 00:38*	WG1095660

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1110		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/11/2018 16:31	WG1096186

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 17:28	WG1094975

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	196		0.519	10.0	10	04/08/2018 15:27	WG1095125
Fluoride	1.38		0.00990	0.100	1	04/08/2018 15:11	WG1095125
Sulfate	U		0.0774	5.00	1	04/08/2018 15:11	WG1095125

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/09/2018 15:42	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:37	WG1095576

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.309		0.0126	0.200	1	04/09/2018 16:52	WG1095148
Boron,Dissolved	0.306		0.0126	0.200	1	04/11/2018 16:06	WG1095851

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00275		0.000250	0.00200	1	04/17/2018 12:17	WG1095155
Arsenic,Dissolved	0.00247		0.000250	0.00200	1	04/13/2018 03:43	WG1095182
Barium	2.17		0.000360	0.00500	1	04/17/2018 12:17	WG1095155
Barium,Dissolved	2.18		0.000360	0.00500	1	04/13/2018 03:43	WG1095182
Cadmium	U		0.000160	0.00100	1	04/17/2018 12:17	WG1095155
Cadmium,Dissolved	U		0.000160	0.00100	1	04/13/2018 03:43	WG1095182
Calcium	147		0.0460	1.00	1	04/17/2018 12:17	WG1095155
Chromium	U		0.000540	0.00200	1	04/17/2018 12:17	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:43	WG1095182
Cobalt	U		0.000260	0.00200	1	04/17/2018 12:17	WG1095155
Cobalt,Dissolved	U		0.000260	0.00200	1	04/13/2018 03:43	WG1095182
Iron	0.820		0.0150	0.100	1	04/17/2018 12:17	WG1095155
Iron,Dissolved	0.683		0.0150	0.100	1	04/13/2018 03:43	WG1095182
Lead	0.000939	B J	0.000240	0.00200	1	04/17/2018 12:17	WG1095155
Lead,Dissolved	0.000405	B J	0.000240	0.00200	1	04/13/2018 03:43	WG1095182
Manganese	0.293		0.000250	0.00500	1	04/17/2018 12:17	WG1095155
Manganese,Dissolved	0.277		0.000250	0.00500	1	04/13/2018 03:43	WG1095182
Nickel	0.00678		0.000350	0.00200	1	04/17/2018 12:17	WG1095155
Nickel,Dissolved	0.00666		0.000350	0.00200	1	04/13/2018 03:43	WG1095182

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	0.867	J	0.0370	1.00	1	04/17/2018 12:17	WG1095155
Selenium	0.000509	B J	0.000380	0.00200	1	04/17/2018 12:17	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 03:43	WG1095182
Sodium	191		0.110	1.00	1	04/17/2018 12:17	WG1095155
Uranium	U		0.000330	0.0100	1	04/17/2018 12:17	WG1095155
Uranium,Dissolved	U		0.000330	0.0100	1	04/13/2018 03:43	WG1095182
Vanadium	0.000530	J	0.000180	0.00500	1	04/17/2018 12:17	WG1095155
Vanadium,Dissolved	0.000478	J	0.000180	0.00500	1	04/13/2018 03:43	WG1095182

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	9.68		0.0314	0.100	1	04/10/2018 18:41	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*98.5*			*77.0-122*		*04/10/2018 18:41*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.100	0.500	10	04/07/2018 22:23	WG1095245
Benzene	2.27		0.00828	0.0250	25	04/12/2018 21:44	WG1095245
Bromodichloromethane	U		0.00380	0.0100	10	04/07/2018 22:23	WG1095245
Bromoform	U		0.00469	0.0100	10	04/07/2018 22:23	WG1095245
Bromomethane	U		0.00866	0.0500	10	04/07/2018 22:23	WG1095245
n-Butylbenzene	0.0110		0.00361	0.0100	10	04/07/2018 22:23	WG1095245
sec-Butylbenzene	0.0124		0.00365	0.0100	10	04/07/2018 22:23	WG1095245
Carbon disulfide	U		0.00275	0.0100	10	04/07/2018 22:23	WG1095245
Carbon tetrachloride	U		0.00379	0.0100	10	04/07/2018 22:23	WG1095245
Chlorobenzene	U		0.00348	0.0100	10	04/07/2018 22:23	WG1095245
Chlorodibromomethane	U		0.00327	0.0100	10	04/07/2018 22:23	WG1095245
Chloroethane	U		0.00453	0.0500	10	04/07/2018 22:23	WG1095245
Chloroform	U		0.00324	0.0500	10	04/07/2018 22:23	WG1095245
Chloromethane	U		0.00276	0.0250	10	04/07/2018 22:23	WG1095245
1,2-Dibromoethane	U		0.00381	0.0100	10	04/07/2018 22:23	WG1095245
1,1-Dichloroethane	U		0.00259	0.0100	10	04/07/2018 22:23	WG1095245
1,2-Dichloroethane	U		0.00361	0.0100	10	04/07/2018 22:23	WG1095245
1,1-Dichloroethene	U		0.00398	0.0100	10	04/07/2018 22:23	WG1095245
cis-1,2-Dichloroethene	U		0.00260	0.0100	10	04/07/2018 22:23	WG1095245
trans-1,2-Dichloroethene	U		0.00396	0.0100	10	04/07/2018 22:23	WG1095245
1,2-Dichloropropane	U		0.00306	0.0100	10	04/07/2018 22:23	WG1095245
cis-1,3-Dichloropropene	U		0.00418	0.0100	10	04/07/2018 22:23	WG1095245
trans-1,3-Dichloropropene	U		0.00419	0.0100	10	04/07/2018 22:23	WG1095245
Ethylbenzene	0.00776	J	0.00384	0.0100	10	04/07/2018 22:23	WG1095245
Isopropylbenzene	0.0694		0.00326	0.0100	10	04/07/2018 22:23	WG1095245
p-Isopropyltoluene	U		0.00350	0.0100	10	04/07/2018 22:23	WG1095245
2-Butanone (MEK)	U		0.0393	0.100	10	04/07/2018 22:23	WG1095245
2-Hexanone	U		0.0382	0.100	10	04/07/2018 22:23	WG1095245
Methylene Chloride	U		0.0100	0.0500	10	04/07/2018 22:23	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.0214	0.100	10	04/07/2018 22:23	WG1095245
Methyl tert-butyl ether	1.78		0.00367	0.0100	10	04/07/2018 22:23	WG1095245
Naphthalene	0.186		0.0100	0.0500	10	04/07/2018 22:23	WG1095245
n-Propylbenzene	0.114		0.00349	0.0100	10	04/07/2018 22:23	WG1095245
Styrene	U		0.00307	0.0100	10	04/07/2018 22:23	WG1095245
1,1,1,2-Tetrachloroethane	U		0.00385	0.0100	10	04/07/2018 22:23	WG1095245
1,1,2,2-Tetrachloroethane	U		0.00130	0.0100	10	04/07/2018 22:23	WG1095245
Tetrachloroethene	U		0.00372	0.0100	10	04/07/2018 22:23	WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	0.00814	J	0.00412	0.0100	10	04/07/2018 22:23	WG1095245
1,1,1-Trichloroethane	U		0.00319	0.0100	10	04/07/2018 22:23	WG1095245
1,1,2-Trichloroethane	U		0.00383	0.0100	10	04/07/2018 22:23	WG1095245
Trichloroethene	U		0.00398	0.0100	10	04/07/2018 22:23	WG1095245
1,2,4-Trimethylbenzene	U		0.00373	0.0100	10	04/07/2018 22:23	WG1095245
1,3,5-Trimethylbenzene	U		0.00387	0.0100	10	04/07/2018 22:23	WG1095245
Vinyl chloride	U		0.00259	0.0100	10	04/07/2018 22:23	WG1095245
o-Xylene	U		0.00341	0.0100	10	04/07/2018 22:23	WG1095245
m&p-Xylene	0.0118	J	0.00719	0.0200	10	04/07/2018 22:23	WG1095245
Xylenes, Total	0.0118	J	0.0106	0.0300	10	04/07/2018 22:23	WG1095245
(S) Toluene-d8	*105*			*80.0-120*		*04/07/2018 22:23*	WG1095245
(S) Toluene-d8	*95.2*			*80.0-120*		*04/12/2018 21:44*	WG1095245
(S) Dibromofluoromethane	*87.5*			*76.0-123*		*04/07/2018 22:23*	WG1095245
(S) Dibromofluoromethane	*99.5*			*76.0-123*		*04/12/2018 21:44*	WG1095245
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/12/2018 21:44*	WG1095245
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/07/2018 22:23*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.97		0.0247	0.100	1	04/11/2018 00:59	WG1095660
(S) o-Terphenyl	*97.2*			*31.0-160*		*04/11/2018 00:59*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2290		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.394	2.00	20	04/11/2018 16:32	WG1096186

Sample Narrative:

L983865-27 WG1096186: Diluted due to sulfide interference

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.0180	0.0500	10	04/09/2018 17:29	WG1094975

Sample Narrative:

L983865-27 WG1094975: diluted to matrix interference. high sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	149		1.04	20.0	20	04/08/2018 15:58	WG1095125
Fluoride	1.33		0.00990	0.100	1	04/08/2018 15:42	WG1095125
Sulfate	1380		1.55	100	20	04/08/2018 15:58	WG1095125

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/09/2018 15:44	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:39	WG1095576

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	1.29		0.0126	0.200	1	04/09/2018 16:55	WG1095148
Boron,Dissolved	1.27		0.0126	0.200	1	04/11/2018 16:16	WG1095851

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00749		0.000250	0.00200	1	04/17/2018 12:21	WG1095155
Arsenic,Dissolved	0.00632		0.000250	0.00200	1	04/13/2018 03:47	WG1095182
Barium	0.0581		0.000360	0.00500	1	04/17/2018 12:21	WG1095155
Barium,Dissolved	0.0625		0.000360	0.00500	1	04/13/2018 03:47	WG1095182
Cadmium	U		0.000160	0.00100	1	04/17/2018 12:21	WG1095155
Cadmium,Dissolved	U		0.000160	0.00100	1	04/13/2018 03:47	WG1095182
Calcium	319		0.0460	1.00	1	04/17/2018 12:21	WG1095155
Chromium	U		0.000540	0.00200	1	04/17/2018 12:21	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:47	WG1095182
Cobalt	U		0.000260	0.00200	1	04/17/2018 12:21	WG1095155
Cobalt,Dissolved	U		0.000260	0.00200	1	04/13/2018 03:47	WG1095182
Iron	0.156	B	0.0150	0.100	1	04/17/2018 12:21	WG1095155
Iron,Dissolved	0.0591	B J	0.0150	0.100	1	04/13/2018 03:47	WG1095182

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Lead	0.0134		0.000240	0.00200	1	04/17/2018 12:21	WG1095155
Lead,Dissolved	0.00618		0.000240	0.00200	1	04/13/2018 03:47	WG1095182
Manganese	0.0370		0.000250	0.00500	1	04/17/2018 12:21	WG1095155
Manganese,Dissolved	0.0349		0.000250	0.00500	1	04/13/2018 03:47	WG1095182
Nickel	0.00415		0.000350	0.00200	1	04/17/2018 12:21	WG1095155
Nickel,Dissolved	0.00445		0.000350	0.00200	1	04/13/2018 03:47	WG1095182
Potassium	1.05		0.0370	1.00	1	04/17/2018 12:21	WG1095155
Selenium	0.000588	B J	0.000380	0.00200	1	04/17/2018 12:21	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 03:47	WG1095182
Sodium	107		0.110	1.00	1	04/17/2018 12:21	WG1095155
Uranium	U		0.000330	0.0100	1	04/17/2018 12:21	WG1095155
Uranium,Dissolved	0.000368	J	0.000330	0.0100	1	04/13/2018 03:47	WG1095182
Vanadium	0.00230	J	0.000180	0.00500	1	04/17/2018 12:21	WG1095155
Vanadium,Dissolved	0.00160	J	0.000180	0.00500	1	04/13/2018 03:47	WG1095182

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	5.55		0.0314	0.100	1	04/10/2018 19:04	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*103*			*77.0-122*		*04/10/2018 19:04*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.500	2.50	50	04/07/2018 22:44	WG1095245
Benzene	0.959		0.0166	0.0500	50	04/07/2018 22:44	WG1095245
Bromodichloromethane	U		0.0190	0.0500	50	04/07/2018 22:44	WG1095245
Bromoform	U		0.0234	0.0500	50	04/07/2018 22:44	WG1095245
Bromomethane	U		0.0433	0.250	50	04/07/2018 22:44	WG1095245
n-Butylbenzene	U		0.0180	0.0500	50	04/07/2018 22:44	WG1095245
sec-Butylbenzene	U		0.0182	0.0500	50	04/07/2018 22:44	WG1095245
Carbon disulfide	U		0.0138	0.0500	50	04/07/2018 22:44	WG1095245
Carbon tetrachloride	U		0.0190	0.0500	50	04/07/2018 22:44	WG1095245
Chlorobenzene	U		0.0174	0.0500	50	04/07/2018 22:44	WG1095245
Chlorodibromomethane	U		0.0164	0.0500	50	04/07/2018 22:44	WG1095245
Chloroethane	U		0.0226	0.250	50	04/07/2018 22:44	WG1095245
Chloroform	U		0.0162	0.250	50	04/07/2018 22:44	WG1095245
Chloromethane	U		0.0138	0.125	50	04/07/2018 22:44	WG1095245
1,2-Dibromoethane	U		0.0190	0.0500	50	04/07/2018 22:44	WG1095245
1,1-Dichloroethane	U		0.0130	0.0500	50	04/07/2018 22:44	WG1095245
1,2-Dichloroethane	U		0.0180	0.0500	50	04/07/2018 22:44	WG1095245
1,1-Dichloroethene	U		0.0199	0.0500	50	04/07/2018 22:44	WG1095245
cis-1,2-Dichloroethene	U		0.0130	0.0500	50	04/07/2018 22:44	WG1095245
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	04/07/2018 22:44	WG1095245
1,2-Dichloropropane	U		0.0153	0.0500	50	04/07/2018 22:44	WG1095245
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	04/07/2018 22:44	WG1095245
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	04/07/2018 22:44	WG1095245
Ethylbenzene	0.0408	J	0.0192	0.0500	50	04/07/2018 22:44	WG1095245
Isopropylbenzene	0.0361	J	0.0163	0.0500	50	04/07/2018 22:44	WG1095245
p-Isopropyltoluene	U		0.0175	0.0500	50	04/07/2018 22:44	WG1095245
2-Butanone (MEK)	U		0.196	0.500	50	04/07/2018 22:44	WG1095245
2-Hexanone	U		0.191	0.500	50	04/07/2018 22:44	WG1095245
Methylene Chloride	U		0.0500	0.250	50	04/07/2018 22:44	WG1095245
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	04/07/2018 22:44	WG1095245
Methyl tert-butyl ether	0.0977		0.0184	0.0500	50	04/07/2018 22:44	WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Naphthalene	0.0604	J	0.0500	0.250	50	04/07/2018 22:44	WG1095245
n-Propylbenzene	0.0501		0.0174	0.0500	50	04/07/2018 22:44	WG1095245
Styrene	U		0.0154	0.0500	50	04/07/2018 22:44	WG1095245
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	04/07/2018 22:44	WG1095245
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	04/07/2018 22:44	WG1095245
Tetrachloroethene	U		0.0186	0.0500	50	04/07/2018 22:44	WG1095245
Toluene	0.0316	J	0.0206	0.0500	50	04/07/2018 22:44	WG1095245
1,1,1-Trichloroethane	U		0.0160	0.0500	50	04/07/2018 22:44	WG1095245
1,1,2-Trichloroethane	U		0.0192	0.0500	50	04/07/2018 22:44	WG1095245
Trichloroethene	U		0.0199	0.0500	50	04/07/2018 22:44	WG1095245
1,2,4-Trimethylbenzene	0.110		0.0186	0.0500	50	04/07/2018 22:44	WG1095245
1,3,5-Trimethylbenzene	U		0.0194	0.0500	50	04/07/2018 22:44	WG1095245
Vinyl chloride	U		0.0130	0.0500	50	04/07/2018 22:44	WG1095245
o-Xylene	U		0.0170	0.0500	50	04/07/2018 22:44	WG1095245
m&p-Xylene	0.144		0.0360	0.100	50	04/07/2018 22:44	WG1095245
Xylenes, Total	0.144	J	0.0530	0.150	50	04/07/2018 22:44	WG1095245
(S) Toluene-d8	*106*			*80.0-120*		*04/07/2018 22:44*	WG1095245
(S) Dibromofluoromethane	*88.5*			*76.0-123*		*04/07/2018 22:44*	WG1095245
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/07/2018 22:44*	WG1095245

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	3.62		0.0247	0.100	1	04/11/2018 01:19	WG1095660
(S) o-Terphenyl	*109*			*31.0-160*		*04/11/2018 01:19*	WG1095660

MW-59
Collected date/time: 04/04/18 13:00

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L983865

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2760		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U	J6	0.0197	0.100	1	04/11/2018 16:34	WG1096186

Sample Narrative:

L983865-28 WG1096186: Low spike recovery due to sulfide in the sample.

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	180		1.04	20.0	20	04/08/2018 16:29	WG1095125
Fluoride	1.31		0.00990	0.100	1	04/08/2018 16:13	WG1095125
Sulfate	1680		1.55	100	20	04/08/2018 16:29	WG1095125

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0240		0.000250	0.00200	1	04/17/2018 12:25	WG1095155
Arsenic,Dissolved	0.0223		0.000250	0.00200	1	04/13/2018 03:51	WG1095182
Barium	0.0236		0.000360	0.00500	1	04/17/2018 12:25	WG1095155
Barium,Dissolved	0.0246		0.000360	0.00500	1	04/13/2018 03:51	WG1095182
Calcium	492		0.0460	1.00	1	04/17/2018 12:25	WG1095155
Chromium	U		0.000540	0.00200	1	04/17/2018 12:25	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:51	WG1095182
Iron	0.102	B	0.0150	0.100	1	04/17/2018 12:25	WG1095155
Iron,Dissolved	0.0876	B J	0.0150	0.100	1	04/13/2018 03:51	WG1095182
Lead	U		0.000240	0.00200	1	04/17/2018 12:25	WG1095155
Lead,Dissolved	0.000405	B J	0.000240	0.00200	1	04/13/2018 03:51	WG1095182
Manganese	0.448		0.000250	0.00500	1	04/17/2018 12:25	WG1095155
Manganese,Dissolved	0.427		0.000250	0.00500	1	04/13/2018 03:51	WG1095182
Potassium	0.507	J	0.0370	1.00	1	04/17/2018 12:25	WG1095155
Selenium	U		0.000380	0.00200	1	04/17/2018 12:25	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 03:51	WG1095182
Sodium	151		0.110	1.00	1	04/17/2018 12:25	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.232		0.0314	0.100	1	04/10/2018 19:28	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*105*			*77.0-122*		*04/10/2018 19:28*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 01:12	WG1095247
Benzene	0.00105		0.000331	0.00100	1	04/08/2018 01:12	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 01:12	WG1095247
Bromoform	U		0.000469	0.00100	1	04/08/2018 01:12	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/08/2018 01:12	WG1095247
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 01:12	WG1095247

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.00348		0.000365	0.00100	1	04/08/2018 01:12	WG1095247
Carbon disulfide	0.000371	J	0.000275	0.00100	1	04/08/2018 01:12	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 01:12	WG1095247
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 01:12	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 01:12	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/08/2018 01:12	WG1095247
Chloroform	U		0.000324	0.00500	1	04/08/2018 01:12	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/08/2018 01:12	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 01:12	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 01:12	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 01:12	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 01:12	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 01:12	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 01:12	WG1095247
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 01:12	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 01:12	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 01:12	WG1095247
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 01:12	WG1095247
Isopropylbenzene	0.0236		0.000326	0.00100	1	04/08/2018 01:12	WG1095247
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 01:12	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 01:12	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 01:12	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 01:12	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 01:12	WG1095247
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 01:12	WG1095247
Naphthalene	U		0.00100	0.00500	1	04/08/2018 01:12	WG1095247
n-Propylbenzene	0.00246		0.000349	0.00100	1	04/08/2018 01:12	WG1095247
Styrene	U		0.000307	0.00100	1	04/08/2018 01:12	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 01:12	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 01:12	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 01:12	WG1095247
Toluene	U		0.000412	0.00100	1	04/08/2018 01:12	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 01:12	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 01:12	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 01:12	WG1095247
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 01:12	WG1095247
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 01:12	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 01:12	WG1095247
o-Xylene	U		0.000341	0.00100	1	04/08/2018 01:12	WG1095247
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 01:12	WG1095247
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 01:12	WG1095247
(S) Toluene-d8	*104*			*80.0-120*		*04/08/2018 01:12*	WG1095247
(S) Dibromofluoromethane	*88.6*			*76.0-123*		*04/08/2018 01:12*	WG1095247
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/08/2018 01:12*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.576		0.0247	0.100	1	04/11/2018 01:39	WG1095660
(S) o-Terphenyl	*103*			*31.0-160*		*04/11/2018 01:39*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3850		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U	J6	0.0197	0.100	1	04/12/2018 15:49	WG1096783

Sample Narrative:

L983865-29 WG1096783: Low spike recovery, sample had some sulfide interference

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.0180	0.0500	10	04/09/2018 17:30	WG1094975

Sample Narrative:

L983865-29 WG1094975: diluted to matrix interference. high sulfide content

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	221		1.04	20.0	20	04/08/2018 16:59	WG1095125
Fluoride	0.974		0.00990	0.100	1	04/08/2018 16:44	WG1095125
Sulfate	2080		3.87	250	50	04/10/2018 18:49	WG1095827

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	04/09/2018 15:46	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:41	WG1095576

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.537		0.0126	0.200	1	04/09/2018 16:59	WG1095148
Boron,Dissolved	0.526		0.0126	0.200	1	04/11/2018 16:20	WG1095851

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00895		0.000250	0.00200	1	04/17/2018 12:29	WG1095155
Arsenic,Dissolved	0.00496		0.000250	0.00200	1	04/13/2018 03:55	WG1095182
Barium	0.0188		0.000360	0.00500	1	04/17/2018 12:29	WG1095155
Barium,Dissolved	0.0192		0.000360	0.00500	1	04/13/2018 03:55	WG1095182
Cadmium	U		0.000160	0.00100	1	04/17/2018 12:29	WG1095155
Cadmium,Dissolved	U		0.000160	0.00100	1	04/13/2018 03:55	WG1095182
Calcium	444		0.0460	1.00	1	04/17/2018 12:29	WG1095155
Chromium	U		0.000540	0.00200	1	04/17/2018 12:29	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:55	WG1095182
Cobalt	0.000365	J	0.000260	0.00200	1	04/17/2018 12:29	WG1095155
Cobalt,Dissolved	U		0.000260	0.00200	1	04/13/2018 03:55	WG1095182
Iron	0.0975	B J	0.0150	0.100	1	04/17/2018 12:29	WG1095155
Iron,Dissolved	0.0194	B J	0.0150	0.100	1	04/13/2018 03:55	WG1095182

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Lead	0.000342	B J	0.000240	0.00200	1	04/17/2018 12:29	WG1095155
Lead,Dissolved	0.000505	B J	0.000240	0.00200	1	04/13/2018 03:55	WG1095182
Manganese	0.291		0.000250	0.00500	1	04/17/2018 12:29	WG1095155
Manganese,Dissolved	0.274		0.000250	0.00500	1	04/13/2018 03:55	WG1095182
Nickel	0.000820	J	0.000350	0.00200	1	04/17/2018 12:29	WG1095155
Nickel,Dissolved	0.000576	J	0.000350	0.00200	1	04/13/2018 03:55	WG1095182
Potassium	0.769	J	0.0370	1.00	1	04/17/2018 12:29	WG1095155
Selenium	U		0.000380	0.00200	1	04/17/2018 12:29	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 03:55	WG1095182
Sodium	233		0.110	1.00	1	04/17/2018 12:29	WG1095155
Uranium	0.00208	J	0.000330	0.0100	1	04/17/2018 12:29	WG1095155
Uranium,Dissolved	0.00203	J	0.000330	0.0100	1	04/13/2018 03:55	WG1095182
Vanadium	0.000298	J	0.000180	0.00500	1	04/17/2018 12:29	WG1095155
Vanadium,Dissolved	0.000221	J	0.000180	0.00500	1	04/13/2018 03:55	WG1095182

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.319		0.0314	0.100	1	04/10/2018 19:52	WG1095731
(S) a,a,a-Trifluorotoluene(FID)	*104*			*77.0-122*		*04/10/2018 19:52*	WG1095731

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 01:33	WG1095247
Benzene	0.00261		0.000331	0.00100	1	04/08/2018 01:33	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 01:33	WG1095247
Bromoform	U		0.000469	0.00100	1	04/08/2018 01:33	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/08/2018 01:33	WG1095247
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 01:33	WG1095247
sec-Butylbenzene	0.00378		0.000365	0.00100	1	04/08/2018 01:33	WG1095247
Carbon disulfide	0.000496	J	0.000275	0.00100	1	04/08/2018 01:33	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 01:33	WG1095247
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 01:33	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 01:33	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/08/2018 01:33	WG1095247
Chloroform	U		0.000324	0.00500	1	04/08/2018 01:33	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/08/2018 01:33	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 01:33	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 01:33	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 01:33	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 01:33	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 01:33	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 01:33	WG1095247
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 01:33	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 01:33	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 01:33	WG1095247
Ethylbenzene	0.000526	J	0.000384	0.00100	1	04/08/2018 01:33	WG1095247
Isopropylbenzene	0.0205		0.000326	0.00100	1	04/08/2018 01:33	WG1095247
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 01:33	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 01:33	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 01:33	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 01:33	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 01:33	WG1095247
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 01:33	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Naphthalene	U		0.00100	0.00500	1	04/08/2018 01:33	WG1095247
n-Propylbenzene	0.00118		0.000349	0.00100	1	04/08/2018 01:33	WG1095247
Styrene	U		0.000307	0.00100	1	04/08/2018 01:33	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 01:33	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 01:33	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 01:33	WG1095247
Toluene	U		0.000412	0.00100	1	04/08/2018 01:33	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 01:33	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 01:33	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 01:33	WG1095247
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 01:33	WG1095247
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 01:33	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 01:33	WG1095247
o-Xylene	U		0.000341	0.00100	1	04/08/2018 01:33	WG1095247
m&p-Xylene	0.00229		0.000719	0.00200	1	04/08/2018 01:33	WG1095247
Xylenes, Total	0.00229	J	0.00106	0.00300	1	04/08/2018 01:33	WG1095247
(S) Toluene-d8	*103*			*80.0-120*		*04/08/2018 01:33*	WG1095247
(S) Dibromofluoromethane	*88.6*			*76.0-123*		*04/08/2018 01:33*	WG1095247
(S) 4-Bromofluorobenzene	*107*			*80.0-120*		*04/08/2018 01:33*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.633		0.0247	0.100	1	04/11/2018 01:59	WG1095660
(S) o-Terphenyl	*105*			*31.0-160*		*04/11/2018 01:59*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1370		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0410	J	0.0197	0.100	1	04/12/2018 15:51	WG1096783

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	269		0.519	10.0	10	04/08/2018 18:01	WG1095125
Fluoride	1.66		0.00990	0.100	1	04/08/2018 17:15	WG1095125
Sulfate	1.08	J	0.0774	5.00	1	04/10/2018 19:03	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00157	J	0.000250	0.00200	1	04/17/2018 12:32	WG1095155
Arsenic,Dissolved	0.00157	J	0.000250	0.00200	1	04/13/2018 03:59	WG1095182
Barium	2.32		0.000360	0.00500	1	04/17/2018 12:32	WG1095155
Barium,Dissolved	2.34		0.000360	0.00500	1	04/13/2018 03:59	WG1095182
Calcium	147		0.0460	1.00	1	04/17/2018 12:32	WG1095155
Chromium	U		0.000540	0.00200	1	04/17/2018 12:32	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 03:59	WG1095182
Iron	4.54		0.0150	0.100	1	04/17/2018 12:32	WG1095155
Iron,Dissolved	4.47		0.0150	0.100	1	04/13/2018 03:59	WG1095182
Lead	0.000427	B J	0.000240	0.00200	1	04/17/2018 12:32	WG1095155
Lead,Dissolved	0.000418	B J	0.000240	0.00200	1	04/13/2018 03:59	WG1095182
Manganese	0.146		0.000250	0.00500	1	04/17/2018 12:32	WG1095155
Manganese,Dissolved	0.152		0.000250	0.00500	1	04/13/2018 03:59	WG1095182
Potassium	0.555	J	0.0370	1.00	1	04/17/2018 12:32	WG1095155
Selenium	U		0.000380	0.00200	1	04/17/2018 12:32	WG1095155
Selenium,Dissolved	0.000426	J	0.000380	0.00200	1	04/13/2018 03:59	WG1095182
Sodium	81.7		0.110	1.00	1	04/17/2018 12:32	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	21.6		0.157	0.500	5	04/12/2018 22:55	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*103*			*77.0-122*		*04/12/2018 22:55*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 01:54	WG1095247
Benzene	6.55		0.0828	0.250	250	04/13/2018 11:16	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 01:54	WG1095247
Bromoform	U		0.000469	0.00100	1	04/08/2018 01:54	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/08/2018 01:54	WG1095247
n-Butylbenzene	0.00377		0.000361	0.00100	1	04/08/2018 01:54	WG1095247
sec-Butylbenzene	0.00830		0.000365	0.00100	1	04/08/2018 01:54	WG1095247
Carbon disulfide	0.000332	J	0.000275	0.00100	1	04/08/2018 01:54	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 01:54	WG1095247

MW-107

SAMPLE RESULTS - 30

Collected date/time: 04/04/18 15:20

L983865

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 01:54	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 01:54	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/08/2018 01:54	WG1095247
Chloroform	U		0.000324	0.00500	1	04/08/2018 01:54	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/08/2018 01:54	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 01:54	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 01:54	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 01:54	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 01:54	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 01:54	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 01:54	WG1095247
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 01:54	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 01:54	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 01:54	WG1095247
Ethylbenzene	0.0382		0.000384	0.00100	1	04/08/2018 01:54	WG1095247
Isopropylbenzene	0.0576		0.000326	0.00100	1	04/08/2018 01:54	WG1095247
p-Isopropyltoluene	0.000710	J	0.000350	0.00100	1	04/08/2018 01:54	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 01:54	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 01:54	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 01:54	WG1095247
4-Methyl-2-pentanone (MIBK)	0.00375	J	0.00214	0.0100	1	04/08/2018 01:54	WG1095247
Methyl tert-butyl ether	3.02		0.00918	0.0250	25	04/12/2018 21:34	WG1095247
Naphthalene	0.143		0.00100	0.00500	1	04/08/2018 01:54	WG1095247
n-Propylbenzene	0.0857		0.000349	0.00100	1	04/08/2018 01:54	WG1095247
Styrene	U		0.000307	0.00100	1	04/08/2018 01:54	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 01:54	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 01:54	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 01:54	WG1095247
Toluene	0.0142		0.000412	0.00100	1	04/08/2018 01:54	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 01:54	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 01:54	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 01:54	WG1095247
1,2,4-Trimethylbenzene	0.00228		0.000373	0.00100	1	04/08/2018 01:54	WG1095247
1,3,5-Trimethylbenzene	0.00425		0.000387	0.00100	1	04/08/2018 01:54	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 01:54	WG1095247
o-Xylene	0.00279		0.000341	0.00100	1	04/08/2018 01:54	WG1095247
m&p-Xylene	0.0130		0.000719	0.00200	1	04/08/2018 01:54	WG1095247
Xylenes, Total	0.0159		0.00106	0.00300	1	04/08/2018 01:54	WG1095247
(S) Toluene-d8	*113*			*80.0-120*		*04/12/2018 21:34*	WG1095247
(S) Toluene-d8	*100*			*80.0-120*		*04/13/2018 11:16*	WG1095247
(S) Toluene-d8	*98.7*			*80.0-120*		*04/08/2018 01:54*	WG1095247
(S) Dibromofluoromethane	*85.2*			*76.0-123*		*04/12/2018 21:34*	WG1095247
(S) Dibromofluoromethane	*134*	J1		*76.0-123*		*04/08/2018 01:54*	WG1095247
(S) Dibromofluoromethane	*99.7*			*76.0-123*		*04/13/2018 11:16*	WG1095247
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/08/2018 01:54*	WG1095247
(S) 4-Bromofluorobenzene	*98.9*			*80.0-120*		*04/12/2018 21:34*	WG1095247
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/13/2018 11:16*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	4.50		0.0247	0.100	1	04/11/2018 02:20	WG1095660
(S) o-Terphenyl	*107*			*31.0-160*		*04/11/2018 02:20*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1280		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 15:52	WG1096783

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	175		0.519	10.0	10	04/08/2018 18:32	WG1095125
Fluoride	1.23		0.00990	0.100	1	04/08/2018 18:17	WG1095125
Sulfate	207		0.774	50.0	10	04/10/2018 19:56	WG1095827

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0566		0.000250	0.00200	1	04/17/2018 12:36	WG1095155
Arsenic,Dissolved	0.0530		0.000250	0.00200	1	04/13/2018 04:03	WG1095182
Barium	0.0728		0.000360	0.00500	1	04/17/2018 12:36	WG1095155
Barium,Dissolved	0.0634		0.000360	0.00500	1	04/13/2018 04:03	WG1095182
Calcium	181		0.0460	1.00	1	04/17/2018 12:36	WG1095155
Chromium	0.00278		0.000540	0.00200	1	04/17/2018 12:36	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 04:03	WG1095182
Iron	4.19		0.0150	0.100	1	04/17/2018 12:36	WG1095155
Iron,Dissolved	2.60		0.0150	0.100	1	04/13/2018 04:03	WG1095182
Lead	0.00257	B	0.000240	0.00200	1	04/17/2018 12:36	WG1095155
Lead,Dissolved	0.000403	B J	0.000240	0.00200	1	04/13/2018 04:03	WG1095182
Manganese	2.04		0.000250	0.00500	1	04/17/2018 12:36	WG1095155
Manganese,Dissolved	1.93		0.000250	0.00500	1	04/13/2018 04:03	WG1095182
Potassium	0.764	J	0.0370	1.00	1	04/17/2018 12:36	WG1095155
Selenium	0.000436	B J	0.000380	0.00200	1	04/17/2018 12:36	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 04:03	WG1095182
Sodium	115		0.110	1.00	1	04/17/2018 12:36	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.932		0.0314	0.100	1	04/12/2018 23:19	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*106*			*77.0-122*		*04/12/2018 23:19*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.200	1.00	20	04/08/2018 02:15	WG1095247
Benzene	0.122		0.00662	0.0200	20	04/08/2018 02:15	WG1095247
Bromodichloromethane	U		0.00760	0.0200	20	04/08/2018 02:15	WG1095247
Bromoform	U		0.00938	0.0200	20	04/08/2018 02:15	WG1095247
Bromomethane	U		0.0173	0.100	20	04/08/2018 02:15	WG1095247
n-Butylbenzene	U		0.00722	0.0200	20	04/08/2018 02:15	WG1095247
sec-Butylbenzene	U		0.00730	0.0200	20	04/08/2018 02:15	WG1095247
Carbon disulfide	U		0.00550	0.0200	20	04/08/2018 02:15	WG1095247
Carbon tetrachloride	U		0.00758	0.0200	20	04/08/2018 02:15	WG1095247

MW-128
Collected date/time: 04/04/18 16:40

SAMPLE RESULTS - 31

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.00696	0.0200	20	04/08/2018 02:15	WG1095247
Chlorodibromomethane	U		0.00654	0.0200	20	04/08/2018 02:15	WG1095247
Chloroethane	U		0.00906	0.100	20	04/08/2018 02:15	WG1095247
Chloroform	U		0.00648	0.100	20	04/08/2018 02:15	WG1095247
Chloromethane	U		0.00552	0.0500	20	04/08/2018 02:15	WG1095247
1,2-Dibromoethane	U		0.00762	0.0200	20	04/08/2018 02:15	WG1095247
1,1-Dichloroethane	U		0.00518	0.0200	20	04/08/2018 02:15	WG1095247
1,2-Dichloroethane	U		0.00722	0.0200	20	04/08/2018 02:15	WG1095247
1,1-Dichloroethene	U		0.00796	0.0200	20	04/08/2018 02:15	WG1095247
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	04/08/2018 02:15	WG1095247
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	04/08/2018 02:15	WG1095247
1,2-Dichloropropane	U		0.00612	0.0200	20	04/08/2018 02:15	WG1095247
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	04/08/2018 02:15	WG1095247
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	04/08/2018 02:15	WG1095247
Ethylbenzene	U		0.00768	0.0200	20	04/08/2018 02:15	WG1095247
Isopropylbenzene	U		0.00652	0.0200	20	04/08/2018 02:15	WG1095247
p-Isopropyltoluene	U		0.00700	0.0200	20	04/08/2018 02:15	WG1095247
2-Butanone (MEK)	U		0.0786	0.200	20	04/08/2018 02:15	WG1095247
2-Hexanone	U		0.0764	0.200	20	04/08/2018 02:15	WG1095247
Methylene Chloride	U		0.0200	0.100	20	04/08/2018 02:15	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	04/08/2018 02:15	WG1095247
Methyl tert-butyl ether	0.961		0.00734	0.0200	20	04/08/2018 02:15	WG1095247
Naphthalene	0.0422	J	0.0200	0.100	20	04/08/2018 02:15	WG1095247
n-Propylbenzene	U		0.00698	0.0200	20	04/08/2018 02:15	WG1095247
Styrene	U		0.00614	0.0200	20	04/08/2018 02:15	WG1095247
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	04/08/2018 02:15	WG1095247
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	04/08/2018 02:15	WG1095247
Tetrachloroethene	U		0.00744	0.0200	20	04/08/2018 02:15	WG1095247
Toluene	U		0.00824	0.0200	20	04/08/2018 02:15	WG1095247
1,1,1-Trichloroethane	U		0.00638	0.0200	20	04/08/2018 02:15	WG1095247
1,1,2-Trichloroethane	U		0.00766	0.0200	20	04/08/2018 02:15	WG1095247
Trichloroethene	U		0.00796	0.0200	20	04/08/2018 02:15	WG1095247
1,2,4-Trimethylbenzene	U		0.00746	0.0200	20	04/08/2018 02:15	WG1095247
1,3,5-Trimethylbenzene	U		0.00774	0.0200	20	04/08/2018 02:15	WG1095247
Vinyl chloride	U		0.00518	0.0200	20	04/08/2018 02:15	WG1095247
o-Xylene	U		0.00682	0.0200	20	04/08/2018 02:15	WG1095247
m&p-Xylene	U		0.0144	0.0400	20	04/08/2018 02:15	WG1095247
Xylenes, Total	U		0.0212	0.0600	20	04/08/2018 02:15	WG1095247
(S) Toluene-d8	*104*			*80.0-120*		*04/08/2018 02:15*	WG1095247
(S) Dibromofluoromethane	*87.1*			*76.0-123*		*04/08/2018 02:15*	WG1095247
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/08/2018 02:15*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.58		0.0247	0.100	1	04/11/2018 02:40	WG1095660
(S) o-Terphenyl	*120*			*31.0-160*		*04/11/2018 02:40*	WG1095660

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1380		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:21	WG1096783

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	228		1.04	20.0	20	04/08/2018 19:18	WG1095125
Fluoride	0.909		0.00990	0.100	1	04/08/2018 18:47	WG1095125
Sulfate	173		0.774	50.0	10	04/10/2018 20:09	WG1095827

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0754		0.000250	0.00200	1	04/17/2018 12:40	WG1095155
Arsenic,Dissolved	0.0700		0.000250	0.00200	1	04/13/2018 04:07	WG1095182
Barium	0.0518		0.000360	0.00500	1	04/17/2018 12:40	WG1095155
Barium,Dissolved	0.0506		0.000360	0.00500	1	04/13/2018 04:07	WG1095182
Calcium	197		0.0460	1.00	1	04/17/2018 12:40	WG1095155
Chromium	U		0.000540	0.00200	1	04/17/2018 12:40	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 04:07	WG1095182
Iron	2.27		0.0150	0.100	1	04/17/2018 12:40	WG1095155
Iron,Dissolved	1.89		0.0150	0.100	1	04/13/2018 04:07	WG1095182
Lead	U		0.000240	0.00200	1	04/17/2018 12:40	WG1095155
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 04:07	WG1095182
Manganese	1.21		0.000250	0.00500	1	04/17/2018 12:40	WG1095155
Manganese,Dissolved	1.18		0.000250	0.00500	1	04/13/2018 04:07	WG1095182
Potassium	0.538	J	0.0370	1.00	1	04/17/2018 12:40	WG1095155
Selenium	0.000442	B J	0.000380	0.00200	1	04/17/2018 12:40	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 04:07	WG1095182
Sodium	154		0.110	1.00	1	04/17/2018 12:40	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.485	J	0.314	1.00	10	04/12/2018 23:43	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*107*			*77.0-122*		*04/12/2018 23:43*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 02:36	WG1095247
Benzene	0.00149		0.000331	0.00100	1	04/08/2018 02:36	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 02:36	WG1095247
Bromoform	U		0.000469	0.00100	1	04/08/2018 02:36	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/08/2018 02:36	WG1095247
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 02:36	WG1095247
sec-Butylbenzene	0.00111		0.000365	0.00100	1	04/08/2018 02:36	WG1095247
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 02:36	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 02:36	WG1095247

MW-101

Collected date/time: 04/04/18 09:10

SAMPLE RESULTS - 32

L983865

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 02:36	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 02:36	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/08/2018 02:36	WG1095247
Chloroform	U		0.000324	0.00500	1	04/08/2018 02:36	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/08/2018 02:36	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 02:36	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 02:36	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 02:36	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 02:36	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 02:36	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 02:36	WG1095247
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 02:36	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 02:36	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 02:36	WG1095247
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 02:36	WG1095247
Isopropylbenzene	0.00192		0.000326	0.00100	1	04/08/2018 02:36	WG1095247
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 02:36	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 02:36	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 02:36	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 02:36	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 02:36	WG1095247
Methyl tert-butyl ether	0.0900		0.000367	0.00100	1	04/08/2018 02:36	WG1095247
Naphthalene	U		0.00100	0.00500	1	04/08/2018 02:36	WG1095247
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 02:36	WG1095247
Styrene	U		0.000307	0.00100	1	04/08/2018 02:36	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 02:36	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 02:36	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 02:36	WG1095247
Toluene	U		0.000412	0.00100	1	04/08/2018 02:36	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 02:36	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 02:36	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 02:36	WG1095247
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 02:36	WG1095247
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 02:36	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 02:36	WG1095247
o-Xylene	U		0.000341	0.00100	1	04/08/2018 02:36	WG1095247
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 02:36	WG1095247
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 02:36	WG1095247
(S) Toluene-d8	*103*			*80.0-120*		*04/08/2018 02:36*	WG1095247
(S) Dibromofluoromethane	*87.8*			*76.0-123*		*04/08/2018 02:36*	WG1095247
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/08/2018 02:36*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	3.21		0.0247	0.100	1	04/11/2018 03:00	WG1095660
(S) o-Terphenyl	*119*			*31.0-160*		*04/11/2018 03:00*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1400		2.82	10.0	1	04/12/2018 16:05	WG1096341

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.394	2.00	20	04/12/2018 15:58	WG1096783

Sample Narrative:

L983865-33 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	129		1.04	20.0	20	04/08/2018 21:06	WG1095125
Fluoride	1.96		0.00990	0.100	1	04/08/2018 20:20	WG1095125
Sulfate	226		0.387	25.0	5	04/10/2018 20:23	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0220		0.000250	0.00200	1	04/17/2018 12:44	WG1095155
Arsenic,Dissolved	0.0160		0.000250	0.00200	1	04/13/2018 04:11	WG1095182
Barium	4.29		0.000360	0.00500	1	04/17/2018 12:44	WG1095155
Barium,Dissolved	0.944		0.000360	0.00500	1	04/13/2018 04:11	WG1095182
Calcium	279		0.0460	1.00	1	04/17/2018 12:44	WG1095155
Chromium	0.0165		0.000540	0.00200	1	04/17/2018 12:44	WG1095155
Chromium,Dissolved	0.00192	J	0.000540	0.00200	1	04/13/2018 04:11	WG1095182
Iron	10.1		0.0150	0.100	1	04/17/2018 12:44	WG1095155
Iron,Dissolved	0.0327	B J	0.0150	0.100	1	04/13/2018 04:11	WG1095182
Lead	0.0326		0.000240	0.00200	1	04/17/2018 12:44	WG1095155
Lead,Dissolved	0.000440	B J	0.000240	0.00200	1	04/13/2018 04:11	WG1095182
Manganese	0.285		0.000250	0.00500	1	04/17/2018 12:44	WG1095155
Manganese,Dissolved	0.165		0.000250	0.00500	1	04/13/2018 04:11	WG1095182
Potassium	6.16		0.0370	1.00	1	04/17/2018 12:44	WG1095155
Selenium	0.00123	B J	0.000380	0.00200	1	04/17/2018 12:44	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 04:11	WG1095182
Sodium	120		0.110	1.00	1	04/17/2018 12:44	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	21.4		0.157	0.500	5	04/09/2018 23:11	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*91.9*			*77.0-122*		*04/09/2018 23:11*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		1.00	5.00	100	04/08/2018 02:57	WG1095247
Benzene	8.04		0.0331	0.100	100	04/08/2018 02:57	WG1095247
Bromodichloromethane	U		0.0380	0.100	100	04/08/2018 02:57	WG1095247
Bromoform	U		0.0469	0.100	100	04/08/2018 02:57	WG1095247
Bromomethane	U		0.0866	0.500	100	04/08/2018 02:57	WG1095247
n-Butylbenzene	U		0.0361	0.100	100	04/08/2018 02:57	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	U		0.0365	0.100	100	04/08/2018 02:57	WG1095247
Carbon disulfide	U		0.0275	0.100	100	04/08/2018 02:57	WG1095247
Carbon tetrachloride	U		0.0379	0.100	100	04/08/2018 02:57	WG1095247
Chlorobenzene	U		0.0348	0.100	100	04/08/2018 02:57	WG1095247
Chlorodibromomethane	U		0.0327	0.100	100	04/08/2018 02:57	WG1095247
Chloroethane	U		0.0453	0.500	100	04/08/2018 02:57	WG1095247
Chloroform	U		0.0324	0.500	100	04/08/2018 02:57	WG1095247
Chloromethane	U		0.0276	0.250	100	04/08/2018 02:57	WG1095247
1,2-Dibromoethane	U		0.0381	0.100	100	04/08/2018 02:57	WG1095247
1,1-Dichloroethane	U		0.0259	0.100	100	04/08/2018 02:57	WG1095247
1,2-Dichloroethane	U		0.0361	0.100	100	04/08/2018 02:57	WG1095247
1,1-Dichloroethene	U		0.0398	0.100	100	04/08/2018 02:57	WG1095247
cis-1,2-Dichloroethene	U		0.0260	0.100	100	04/08/2018 02:57	WG1095247
trans-1,2-Dichloroethene	U		0.0396	0.100	100	04/08/2018 02:57	WG1095247
1,2-Dichloropropane	U		0.0306	0.100	100	04/08/2018 02:57	WG1095247
cis-1,3-Dichloropropene	U		0.0418	0.100	100	04/08/2018 02:57	WG1095247
trans-1,3-Dichloropropene	U		0.0419	0.100	100	04/08/2018 02:57	WG1095247
Ethylbenzene	0.517		0.0384	0.100	100	04/08/2018 02:57	WG1095247
Isopropylbenzene	0.0722	J	0.0326	0.100	100	04/08/2018 02:57	WG1095247
p-Isopropyltoluene	U		0.0350	0.100	100	04/08/2018 02:57	WG1095247
2-Butanone (MEK)	U		0.393	1.00	100	04/08/2018 02:57	WG1095247
2-Hexanone	U		0.382	1.00	100	04/08/2018 02:57	WG1095247
Methylene Chloride	U		0.100	0.500	100	04/08/2018 02:57	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	04/08/2018 02:57	WG1095247
Methyl tert-butyl ether	U		0.0367	0.100	100	04/08/2018 02:57	WG1095247
Naphthalene	0.106	J	0.100	0.500	100	04/08/2018 02:57	WG1095247
n-Propylbenzene	0.0758	J	0.0349	0.100	100	04/08/2018 02:57	WG1095247
Styrene	U		0.0307	0.100	100	04/08/2018 02:57	WG1095247
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	04/08/2018 02:57	WG1095247
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	04/08/2018 02:57	WG1095247
Tetrachloroethene	U		0.0372	0.100	100	04/08/2018 02:57	WG1095247
Toluene	U		0.0412	0.100	100	04/08/2018 02:57	WG1095247
1,1,1-Trichloroethane	U		0.0319	0.100	100	04/08/2018 02:57	WG1095247
1,1,2-Trichloroethane	U		0.0383	0.100	100	04/08/2018 02:57	WG1095247
Trichloroethene	U		0.0398	0.100	100	04/08/2018 02:57	WG1095247
1,2,4-Trimethylbenzene	0.0805	J	0.0373	0.100	100	04/08/2018 02:57	WG1095247
1,3,5-Trimethylbenzene	U		0.0387	0.100	100	04/08/2018 02:57	WG1095247
Vinyl chloride	U		0.0259	0.100	100	04/08/2018 02:57	WG1095247
o-Xylene	U		0.0341	0.100	100	04/08/2018 02:57	WG1095247
m&p-Xylene	0.304		0.0719	0.200	100	04/08/2018 02:57	WG1095247
Xylenes, Total	0.304		0.106	0.300	100	04/08/2018 02:57	WG1095247
(S) Toluene-d8	*106*			*80.0-120*		*04/08/2018 02:57*	WG1095247
(S) Dibromofluoromethane	*87.5*			*76.0-123*		*04/08/2018 02:57*	WG1095247
(S) 4-Bromofluorobenzene	*107*			*80.0-120*		*04/08/2018 02:57*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	11.4		0.124	0.500	5	04/11/2018 22:21	WG1095660
(S) o-Terphenyl	*120*			*31.0-160*		*04/11/2018 22:21*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2600		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.394	2.00	20	04/12/2018 15:59	WG1096783

Sample Narrative:

L983865-34 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	317		1.04	20.0	20	04/08/2018 21:37	WG1095125
Fluoride	1.75		0.00990	0.100	1	04/08/2018 21:22	WG1095125
Sulfate	731		1.55	100	20	04/10/2018 20:36	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00374		0.000250	0.00200	1	04/17/2018 13:04	WG1095155
Arsenic,Dissolved	0.00314		0.000250	0.00200	1	04/13/2018 04:15	WG1095182
Barium	0.139		0.000360	0.00500	1	04/17/2018 13:04	WG1095155
Barium,Dissolved	0.131		0.000360	0.00500	1	04/13/2018 04:15	WG1095182
Calcium	402		0.0460	1.00	1	04/17/2018 13:04	WG1095155
Chromium	0.00362		0.000540	0.00200	1	04/17/2018 13:04	WG1095155
Chromium,Dissolved	0.000882	J	0.000540	0.00200	1	04/13/2018 04:15	WG1095182
Iron	0.123	B	0.0150	0.100	1	04/17/2018 13:04	WG1095155
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 04:15	WG1095182
Lead	0.00163	B J	0.000240	0.00200	1	04/17/2018 13:04	WG1095155
Lead,Dissolved	0.000739	B J	0.000240	0.00200	1	04/13/2018 04:15	WG1095182
Manganese	0.0215		0.000250	0.00500	1	04/17/2018 13:04	WG1095155
Manganese,Dissolved	0.0203		0.000250	0.00500	1	04/13/2018 04:15	WG1095182
Potassium	2.25		0.0370	1.00	1	04/17/2018 13:04	WG1095155
Selenium	0.00128	B J	0.000380	0.00200	1	04/17/2018 13:04	WG1095155
Selenium,Dissolved	0.000515	J	0.000380	0.00200	1	04/13/2018 04:15	WG1095182
Sodium	335		0.110	1.00	1	04/17/2018 13:04	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	20.5		0.785	2.50	25	04/13/2018 00:07	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*105*			*77.0-122*		*04/13/2018 00:07*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 03:18	WG1095247
Benzene	4.68		0.0828	0.250	250	04/13/2018 11:36	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 03:18	WG1095247
Bromoform	U		0.000469	0.00100	1	04/08/2018 03:18	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/08/2018 03:18	WG1095247
n-Butylbenzene	0.0139		0.000361	0.00100	1	04/08/2018 03:18	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.0148		0.000365	0.00100	1	04/08/2018 03:18	WG1095247
Carbon disulfide	0.00224		0.000275	0.00100	1	04/08/2018 03:18	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 03:18	WG1095247
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 03:18	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 03:18	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/08/2018 03:18	WG1095247
Chloroform	U		0.000324	0.00500	1	04/08/2018 03:18	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/08/2018 03:18	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 03:18	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 03:18	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 03:18	WG1095247
1,1-Dichloroethene	0.00122		0.000398	0.00100	1	04/08/2018 03:18	WG1095247
cis-1,2-Dichloroethene	0.543		0.00650	0.0250	25	04/12/2018 21:53	WG1095247
trans-1,2-Dichloroethene	0.00825		0.000396	0.00100	1	04/08/2018 03:18	WG1095247
1,2-Dichloropropane	0.000959	J	0.000306	0.00100	1	04/08/2018 03:18	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 03:18	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 03:18	WG1095247
Ethylbenzene	0.672		0.00960	0.0250	25	04/12/2018 21:53	WG1095247
Isopropylbenzene	0.0769		0.000326	0.00100	1	04/08/2018 03:18	WG1095247
p-Isopropyltoluene	0.00776		0.000350	0.00100	1	04/08/2018 03:18	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 03:18	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 03:18	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 03:18	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 03:18	WG1095247
Methyl tert-butyl ether	0.0120		0.000367	0.00100	1	04/08/2018 03:18	WG1095247
Naphthalene	0.190		0.0250	0.125	25	04/12/2018 21:53	WG1095247
n-Propylbenzene	0.104		0.000349	0.00100	1	04/08/2018 03:18	WG1095247
Styrene	U		0.000307	0.00100	1	04/08/2018 03:18	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 03:18	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 03:18	WG1095247
Tetrachloroethene	0.00335		0.000372	0.00100	1	04/08/2018 03:18	WG1095247
Toluene	0.0312		0.000412	0.00100	1	04/08/2018 03:18	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 03:18	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 03:18	WG1095247
Trichloroethene	0.00521		0.000398	0.00100	1	04/08/2018 03:18	WG1095247
1,2,4-Trimethylbenzene	0.329		0.00932	0.0250	25	04/12/2018 21:53	WG1095247
1,3,5-Trimethylbenzene	0.0783		0.000387	0.00100	1	04/08/2018 03:18	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 03:18	WG1095247
o-Xylene	0.00601		0.000341	0.00100	1	04/08/2018 03:18	WG1095247
m&p-Xylene	0.440		0.0180	0.0500	25	04/12/2018 21:53	WG1095247
Xylenes, Total	0.446		0.0265	0.0750	25	04/12/2018 21:53	WG1095247
(S) Toluene-d8	*102*			*80.0-120*		*04/08/2018 03:18*	WG1095247
(S) Toluene-d8	*105*			*80.0-120*		*04/13/2018 11:36*	WG1095247
(S) Toluene-d8	*109*			*80.0-120*		*04/12/2018 21:53*	WG1095247
(S) Dibromofluoromethane	*100*			*76.0-123*		*04/13/2018 11:36*	WG1095247
(S) Dibromofluoromethane	*88.4*			*76.0-123*		*04/12/2018 21:53*	WG1095247
(S) Dibromofluoromethane	*110*			*76.0-123*		*04/08/2018 03:18*	WG1095247
(S) 4-Bromofluorobenzene	*102*			*80.0-120*		*04/12/2018 21:53*	WG1095247
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/08/2018 03:18*	WG1095247
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/13/2018 11:36*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	8.31		0.0247	0.100	1	04/11/2018 03:41	WG1095660
(S) o-Terphenyl	*113*			*31.0-160*		*04/11/2018 03:41*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2200		2.82	10.0	1	04/12/2018 16:05	WG1096341

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.394	2.00	20	04/12/2018 16:00	WG1096783

Sample Narrative:

L983865-35 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	299		1.04	20.0	20	04/08/2018 22:08	WG1095125
Fluoride	1.55		0.00990	0.100	1	04/08/2018 21:53	WG1095125
Sulfate	862		1.55	100	20	04/10/2018 20:49	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00249		0.000250	0.00200	1	04/17/2018 11:20	WG1095155
Arsenic,Dissolved	0.00185	J	0.000250	0.00200	1	04/13/2018 04:27	WG1095182
Barium	0.0288		0.000360	0.00500	1	04/17/2018 11:20	WG1095155
Barium,Dissolved	0.0307		0.000360	0.00500	1	04/13/2018 04:27	WG1095182
Calcium	289	V	0.0460	1.00	1	04/17/2018 11:20	WG1095155
Chromium	0.000703	J	0.000540	0.00200	1	04/17/2018 11:20	WG1095155
Chromium,Dissolved	0.00112	J	0.000540	0.00200	1	04/13/2018 04:27	WG1095182
Iron	0.0382	B J	0.0150	0.100	1	04/17/2018 11:20	WG1095155
Iron,Dissolved	0.0155	B J	0.0150	0.100	1	04/13/2018 04:27	WG1095182
Lead	0.00174	B J	0.000240	0.00200	1	04/17/2018 11:20	WG1095155
Lead,Dissolved	0.00192	B J	0.000240	0.00200	1	04/13/2018 04:27	WG1095182
Manganese	0.0184		0.000250	0.00500	1	04/17/2018 11:20	WG1095155
Manganese,Dissolved	0.0183		0.000250	0.00500	1	04/13/2018 04:27	WG1095182
Potassium	1.24		0.0370	1.00	1	04/17/2018 11:20	WG1095155
Selenium	0.000498	B J	0.000380	0.00200	1	04/17/2018 11:20	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 04:27	WG1095182
Sodium	293	V	0.110	1.00	1	04/17/2018 11:20	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	7.59		0.0314	0.100	1	04/13/2018 00:31	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*97.9*			*77.0-122*		*04/13/2018 00:31*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.500	2.50	50	04/08/2018 03:39	WG1095247
Benzene	1.36		0.0166	0.0500	50	04/08/2018 03:39	WG1095247
Bromodichloromethane	U		0.0190	0.0500	50	04/08/2018 03:39	WG1095247
Bromoform	U		0.0234	0.0500	50	04/08/2018 03:39	WG1095247
Bromomethane	U		0.0433	0.250	50	04/08/2018 03:39	WG1095247
n-Butylbenzene	U		0.0180	0.0500	50	04/08/2018 03:39	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
sec-Butylbenzene	U		0.0182	0.0500	50	04/08/2018 03:39	WG1095247
Carbon disulfide	0.0187	J	0.0138	0.0500	50	04/08/2018 03:39	WG1095247
Carbon tetrachloride	U		0.0190	0.0500	50	04/08/2018 03:39	WG1095247
Chlorobenzene	U		0.0174	0.0500	50	04/08/2018 03:39	WG1095247
Chlorodibromomethane	U		0.0164	0.0500	50	04/08/2018 03:39	WG1095247
Chloroethane	U		0.0226	0.250	50	04/08/2018 03:39	WG1095247
Chloroform	U		0.0162	0.250	50	04/08/2018 03:39	WG1095247
Chloromethane	U		0.0138	0.125	50	04/08/2018 03:39	WG1095247
1,2-Dibromoethane	U		0.0190	0.0500	50	04/08/2018 03:39	WG1095247
1,1-Dichloroethane	U		0.0130	0.0500	50	04/08/2018 03:39	WG1095247
1,2-Dichloroethane	U		0.0180	0.0500	50	04/08/2018 03:39	WG1095247
1,1-Dichloroethene	U		0.0199	0.0500	50	04/08/2018 03:39	WG1095247
cis-1,2-Dichloroethene	0.0379	J	0.0130	0.0500	50	04/08/2018 03:39	WG1095247
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	04/08/2018 03:39	WG1095247
1,2-Dichloropropane	U		0.0153	0.0500	50	04/08/2018 03:39	WG1095247
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	04/08/2018 03:39	WG1095247
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	04/08/2018 03:39	WG1095247
Ethylbenzene	0.0846		0.0192	0.0500	50	04/08/2018 03:39	WG1095247
Isopropylbenzene	0.118		0.0163	0.0500	50	04/08/2018 03:39	WG1095247
p-Isopropyltoluene	U		0.0175	0.0500	50	04/08/2018 03:39	WG1095247
2-Butanone (MEK)	U		0.196	0.500	50	04/08/2018 03:39	WG1095247
2-Hexanone	U		0.191	0.500	50	04/08/2018 03:39	WG1095247
Methylene Chloride	U		0.0500	0.250	50	04/08/2018 03:39	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	04/08/2018 03:39	WG1095247
Methyl tert-butyl ether	U		0.0184	0.0500	50	04/08/2018 03:39	WG1095247
Naphthalene	0.250	J	0.0500	0.250	50	04/08/2018 03:39	WG1095247
n-Propylbenzene	0.155		0.0174	0.0500	50	04/08/2018 03:39	WG1095247
Styrene	U		0.0154	0.0500	50	04/08/2018 03:39	WG1095247
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	04/08/2018 03:39	WG1095247
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	04/08/2018 03:39	WG1095247
Tetrachloroethene	U		0.0186	0.0500	50	04/08/2018 03:39	WG1095247
Toluene	0.0844		0.0206	0.0500	50	04/08/2018 03:39	WG1095247
1,1,1-Trichloroethane	U		0.0160	0.0500	50	04/08/2018 03:39	WG1095247
1,1,2-Trichloroethane	U		0.0192	0.0500	50	04/08/2018 03:39	WG1095247
Trichloroethene	U		0.0199	0.0500	50	04/08/2018 03:39	WG1095247
1,2,4-Trimethylbenzene	0.198		0.0186	0.0500	50	04/08/2018 03:39	WG1095247
1,3,5-Trimethylbenzene	U		0.0194	0.0500	50	04/08/2018 03:39	WG1095247
Vinyl chloride	U		0.0130	0.0500	50	04/08/2018 03:39	WG1095247
o-Xylene	U		0.0170	0.0500	50	04/08/2018 03:39	WG1095247
m&p-Xylene	0.450		0.0360	0.100	50	04/08/2018 03:39	WG1095247
Xylenes, Total	0.450		0.0530	0.150	50	04/08/2018 03:39	WG1095247
(S) Toluene-d8	*108*			*80.0-120*		*04/08/2018 03:39*	WG1095247
(S) Dibromofluoromethane	*89.0*			*76.0-123*		*04/08/2018 03:39*	WG1095247
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/08/2018 03:39*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	2.55		0.0247	0.100	1	04/11/2018 04:01	WG1095660
(S) o-Terphenyl	*117*			*31.0-160*		*04/11/2018 04:01*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2330		2.82	10.0	1	04/12/2018 16:05	WG1096341

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.394	2.00	20	04/12/2018 16:01	WG1096783

Sample Narrative:

L983865-36 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	266		1.04	20.0	20	04/08/2018 22:39	WG1095125
Fluoride	1.73		0.00990	0.100	1	04/08/2018 22:23	WG1095125
Sulfate	793		1.55	100	20	04/10/2018 21:29	WG1095827

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00849		0.000250	0.00200	1	04/17/2018 13:08	WG1095155
Arsenic,Dissolved	0.00834		0.000250	0.00200	1	04/13/2018 04:31	WG1095182
Barium	0.0467		0.000360	0.00500	1	04/17/2018 13:08	WG1095155
Barium,Dissolved	0.0403		0.000360	0.00500	1	04/13/2018 04:31	WG1095182
Calcium	338		0.0460	1.00	1	04/17/2018 13:08	WG1095155
Chromium	0.000842	J	0.000540	0.00200	1	04/17/2018 13:08	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 04:31	WG1095182
Iron	U		0.0150	0.100	1	04/17/2018 13:08	WG1095155
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 04:31	WG1095182
Lead	0.000380	B J	0.000240	0.00200	1	04/17/2018 13:08	WG1095155
Lead,Dissolved	0.000347	B J	0.000240	0.00200	1	04/13/2018 04:31	WG1095182
Manganese	0.00452	J	0.000250	0.00500	1	04/17/2018 13:08	WG1095155
Manganese,Dissolved	0.00427	J	0.000250	0.00500	1	04/13/2018 04:31	WG1095182
Potassium	1.36		0.0370	1.00	1	04/17/2018 13:08	WG1095155
Selenium	U		0.000380	0.00200	1	04/17/2018 13:08	WG1095155
Selenium,Dissolved	0.000514	J	0.000380	0.00200	1	04/13/2018 04:31	WG1095182
Sodium	360		0.110	1.00	1	04/17/2018 13:08	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	9.38		0.0314	0.100	1	04/13/2018 00:55	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*102*			*77.0-122*		*04/13/2018 00:55*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		1.00	5.00	100	04/08/2018 04:00	WG1095247
Benzene	1.59		0.0331	0.100	100	04/08/2018 04:00	WG1095247
Bromodichloromethane	U		0.0380	0.100	100	04/08/2018 04:00	WG1095247
Bromoform	U		0.0469	0.100	100	04/08/2018 04:00	WG1095247
Bromomethane	U		0.0866	0.500	100	04/08/2018 04:00	WG1095247
n-Butylbenzene	U		0.0361	0.100	100	04/08/2018 04:00	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	U		0.0365	0.100	100	04/08/2018 04:00	WG1095247
Carbon disulfide	0.0289	J	0.0275	0.100	100	04/08/2018 04:00	WG1095247
Carbon tetrachloride	U		0.0379	0.100	100	04/08/2018 04:00	WG1095247
Chlorobenzene	U		0.0348	0.100	100	04/08/2018 04:00	WG1095247
Chlorodibromomethane	U		0.0327	0.100	100	04/08/2018 04:00	WG1095247
Chloroethane	U		0.0453	0.500	100	04/08/2018 04:00	WG1095247
Chloroform	U		0.0324	0.500	100	04/08/2018 04:00	WG1095247
Chloromethane	U		0.0276	0.250	100	04/08/2018 04:00	WG1095247
1,2-Dibromoethane	U		0.0381	0.100	100	04/08/2018 04:00	WG1095247
1,1-Dichloroethane	U		0.0259	0.100	100	04/08/2018 04:00	WG1095247
1,2-Dichloroethane	U		0.0361	0.100	100	04/08/2018 04:00	WG1095247
1,1-Dichloroethene	U		0.0398	0.100	100	04/08/2018 04:00	WG1095247
cis-1,2-Dichloroethene	U		0.0260	0.100	100	04/08/2018 04:00	WG1095247
trans-1,2-Dichloroethene	U		0.0396	0.100	100	04/08/2018 04:00	WG1095247
1,2-Dichloropropane	U		0.0306	0.100	100	04/08/2018 04:00	WG1095247
cis-1,3-Dichloropropene	U		0.0418	0.100	100	04/08/2018 04:00	WG1095247
trans-1,3-Dichloropropene	U		0.0419	0.100	100	04/08/2018 04:00	WG1095247
Ethylbenzene	0.129		0.0384	0.100	100	04/08/2018 04:00	WG1095247
Isopropylbenzene	0.128		0.0326	0.100	100	04/08/2018 04:00	WG1095247
p-Isopropyltoluene	U		0.0350	0.100	100	04/08/2018 04:00	WG1095247
2-Butanone (MEK)	U		0.393	1.00	100	04/08/2018 04:00	WG1095247
2-Hexanone	U		0.382	1.00	100	04/08/2018 04:00	WG1095247
Methylene Chloride	U		0.100	0.500	100	04/08/2018 04:00	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	04/08/2018 04:00	WG1095247
Methyl tert-butyl ether	U		0.0367	0.100	100	04/08/2018 04:00	WG1095247
Naphthalene	0.313	J	0.100	0.500	100	04/08/2018 04:00	WG1095247
n-Propylbenzene	0.228		0.0349	0.100	100	04/08/2018 04:00	WG1095247
Styrene	U		0.0307	0.100	100	04/08/2018 04:00	WG1095247
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	04/08/2018 04:00	WG1095247
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	04/08/2018 04:00	WG1095247
Tetrachloroethene	U		0.0372	0.100	100	04/08/2018 04:00	WG1095247
Toluene	U		0.0412	0.100	100	04/08/2018 04:00	WG1095247
1,1,1-Trichloroethane	U		0.0319	0.100	100	04/08/2018 04:00	WG1095247
1,1,2-Trichloroethane	U		0.0383	0.100	100	04/08/2018 04:00	WG1095247
Trichloroethene	U		0.0398	0.100	100	04/08/2018 04:00	WG1095247
1,2,4-Trimethylbenzene	0.715		0.0373	0.100	100	04/08/2018 04:00	WG1095247
1,3,5-Trimethylbenzene	0.166		0.0387	0.100	100	04/08/2018 04:00	WG1095247
Vinyl chloride	U		0.0259	0.100	100	04/08/2018 04:00	WG1095247
o-Xylene	U		0.0341	0.100	100	04/08/2018 04:00	WG1095247
m&p-Xylene	1.15		0.0719	0.200	100	04/08/2018 04:00	WG1095247
Xylenes, Total	1.15		0.106	0.300	100	04/08/2018 04:00	WG1095247
(S) Toluene-d8	*105*			*80.0-120*		*04/08/2018 04:00*	WG1095247
(S) Dibromofluoromethane	*88.9*			*76.0-123*		*04/08/2018 04:00*	WG1095247
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/08/2018 04:00*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.28		0.0247	0.100	1	04/11/2018 04:21	WG1095660
(S) o-Terphenyl	*98.0*			*31.0-160*		*04/11/2018 04:21*	WG1095660

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2760		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.197	1.00	10	04/12/2018 16:02	WG1096783

Sample Narrative:

L983865-37 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	193		1.04	20.0	20	04/08/2018 23:10	WG1095125
Fluoride	2.39		0.00990	0.100	1	04/08/2018 22:54	WG1095125
Sulfate	1400		3.87	250	50	04/10/2018 21:43	WG1095827

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00706		0.000250	0.00200	1	04/17/2018 13:12	WG1095155
Arsenic,Dissolved	0.00554		0.000250	0.00200	1	04/13/2018 04:35	WG1095182
Barium	0.0304		0.000360	0.00500	1	04/17/2018 13:12	WG1095155
Barium,Dissolved	0.0288		0.000360	0.00500	1	04/13/2018 04:35	WG1095182
Calcium	537		0.0460	1.00	1	04/17/2018 13:12	WG1095155
Chromium	0.00945		0.000540	0.00200	1	04/17/2018 13:12	WG1095155
Chromium,Dissolved	0.00278		0.000540	0.00200	1	04/13/2018 04:35	WG1095182
Iron	0.145	B	0.0150	0.100	1	04/17/2018 13:12	WG1095155
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 04:35	WG1095182
Lead	0.00152	B J	0.000240	0.00200	1	04/17/2018 13:12	WG1095155
Lead,Dissolved	0.000746	B J	0.000240	0.00200	1	04/13/2018 04:35	WG1095182
Manganese	0.0325		0.000250	0.00500	1	04/17/2018 13:12	WG1095155
Manganese,Dissolved	0.0282		0.000250	0.00500	1	04/13/2018 04:35	WG1095182
Potassium	3.55		0.0370	1.00	1	04/17/2018 13:12	WG1095155
Selenium	0.00377	B	0.000380	0.00200	1	04/17/2018 13:12	WG1095155
Selenium,Dissolved	0.00375		0.000380	0.00200	1	04/13/2018 04:35	WG1095182
Sodium	191		0.110	1.00	1	04/17/2018 13:12	WG1095155

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	3.59		0.0314	0.100	1	04/10/2018 10:24	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*100*			*77.0-122*		*04/10/2018 10:24*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 04:21	WG1095247
Benzene	0.857		0.00662	0.0200	20	04/12/2018 22:13	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 04:21	WG1095247
Bromoform	U		0.000469	0.00100	1	04/08/2018 04:21	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/08/2018 04:21	WG1095247
n-Butylbenzene	0.00367		0.000361	0.00100	1	04/08/2018 04:21	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
sec-Butylbenzene	0.00564		0.000365	0.00100	1	04/08/2018 04:21	WG1095247
Carbon disulfide	0.00180		0.000275	0.00100	1	04/08/2018 04:21	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 04:21	WG1095247
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 04:21	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 04:21	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/08/2018 04:21	WG1095247
Chloroform	U		0.000324	0.00500	1	04/08/2018 04:21	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/08/2018 04:21	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 04:21	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 04:21	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 04:21	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 04:21	WG1095247
cis-1,2-Dichloroethene	0.000281	J	0.000260	0.00100	1	04/08/2018 04:21	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 04:21	WG1095247
1,2-Dichloropropane	0.00116		0.000306	0.00100	1	04/08/2018 04:21	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 04:21	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 04:21	WG1095247
Ethylbenzene	0.00738		0.000384	0.00100	1	04/08/2018 04:21	WG1095247
Isopropylbenzene	0.0359		0.000326	0.00100	1	04/08/2018 04:21	WG1095247
p-Isopropyltoluene	0.00268		0.000350	0.00100	1	04/08/2018 04:21	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 04:21	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 04:21	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 04:21	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 04:21	WG1095247
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 04:21	WG1095247
Naphthalene	0.0256		0.00100	0.00500	1	04/08/2018 04:21	WG1095247
n-Propylbenzene	0.0492		0.000349	0.00100	1	04/08/2018 04:21	WG1095247
Styrene	U		0.000307	0.00100	1	04/08/2018 04:21	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 04:21	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 04:21	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 04:21	WG1095247
Toluene	0.00797		0.000412	0.00100	1	04/08/2018 04:21	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 04:21	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 04:21	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 04:21	WG1095247
1,2,4-Trimethylbenzene	0.116		0.000373	0.00100	1	04/08/2018 04:21	WG1095247
1,3,5-Trimethylbenzene	0.0260		0.000387	0.00100	1	04/08/2018 04:21	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 04:21	WG1095247
o-Xylene	0.00452		0.000341	0.00100	1	04/08/2018 04:21	WG1095247
m&p-Xylene	0.332		0.000719	0.00200	1	04/08/2018 04:21	WG1095247
Xylenes, Total	0.336		0.00106	0.00300	1	04/08/2018 04:21	WG1095247
(S) Toluene-d8	*111*			*80.0-120*		*04/12/2018 22:13*	WG1095247
(S) Toluene-d8	*102*			*80.0-120*		*04/08/2018 04:21*	WG1095247
(S) Dibromofluoromethane	*85.7*			*76.0-123*		*04/08/2018 04:21*	WG1095247
(S) Dibromofluoromethane	*92.2*			*76.0-123*		*04/12/2018 22:13*	WG1095247
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/08/2018 04:21*	WG1095247
(S) 4-Bromofluorobenzene	*102*			*80.0-120*		*04/12/2018 22:13*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	5.05		0.0247	0.100	1	04/11/2018 04:41	WG1095660
(S) o-Terphenyl	*99.7*			*31.0-160*		*04/11/2018 04:41*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3110		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.985	5.00	50	04/12/2018 16:04	WG1096783

Sample Narrative:

L983865-38 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.180	0.500	100	04/09/2018 16:16	WG1095350

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	697		1.04	20.0	20	04/09/2018 00:11	WG1095125
Fluoride	1.93		0.00990	0.100	1	04/08/2018 23:25	WG1095125
Sulfate	357		1.55	100	20	04/10/2018 23:50	WG1095833

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	04/11/2018 08:44	WG1095972
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:43	WG1095576

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	1.32		0.0126	0.200	1	04/10/2018 21:34	WG1095823
Boron,Dissolved	1.29		0.0126	0.200	1	04/11/2018 15:45	WG1095851

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0124		0.000250	0.00200	1	04/17/2018 13:16	WG1095155
Arsenic,Dissolved	0.0121		0.000250	0.00200	1	04/13/2018 04:39	WG1095182
Barium	0.186		0.000360	0.00500	1	04/17/2018 13:16	WG1095155
Barium,Dissolved	0.195		0.000360	0.00500	1	04/13/2018 04:39	WG1095182
Cadmium	U		0.000160	0.00100	1	04/17/2018 13:16	WG1095155
Cadmium,Dissolved	U		0.000160	0.00100	1	04/13/2018 04:39	WG1095182
Calcium	159		0.0460	1.00	1	04/17/2018 13:16	WG1095155
Chromium	0.00246		0.000540	0.00200	1	04/17/2018 13:16	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 04:39	WG1095182
Cobalt	U		0.000260	0.00200	1	04/17/2018 13:16	WG1095155
Cobalt,Dissolved	U		0.000260	0.00200	1	04/13/2018 04:39	WG1095182
Iron	0.0572	B J	0.0150	0.100	1	04/17/2018 13:16	WG1095155
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 04:39	WG1095182
Lead	0.000412	B J	0.000240	0.00200	1	04/17/2018 13:16	WG1095155
Lead,Dissolved	0.000387	B J	0.000240	0.00200	1	04/13/2018 04:39	WG1095182
Manganese	0.154		0.000250	0.00500	1	04/17/2018 13:16	WG1095155

MW-43

Collected date/time: 04/04/18 16:30

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Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Manganese,Dissolved	0.148		0.000250	0.00500	1	04/13/2018 04:39	WG1095182
Nickel	0.00839		0.000350	0.00200	1	04/17/2018 13:16	WG1095155
Nickel,Dissolved	0.00629		0.000350	0.00200	1	04/13/2018 04:39	WG1095182
Potassium	1.11		0.0370	1.00	1	04/17/2018 13:16	WG1095155
Selenium	0.00143	B J	0.000380	0.00200	1	04/17/2018 13:16	WG1095155
Selenium,Dissolved	0.00150	J	0.000380	0.00200	1	04/13/2018 04:39	WG1095182
Sodium	604		0.110	1.00	1	04/17/2018 13:16	WG1095155
Uranium	U		0.000330	0.0100	1	04/17/2018 13:16	WG1095155
Uranium,Dissolved	U		0.000330	0.0100	1	04/13/2018 04:39	WG1095182
Vanadium	0.00181	J	0.000180	0.00500	1	04/17/2018 13:16	WG1095155
Vanadium,Dissolved	0.00143	J	0.000180	0.00500	1	04/13/2018 04:39	WG1095182

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	73.8		0.314	1.00	10	04/10/2018 11:11	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*96.6*			*77.0-122*		*04/10/2018 11:11*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.500	2.50	50	04/08/2018 04:42	WG1095247
Benzene	38.5		0.0662	0.200	200	04/12/2018 22:33	WG1095247
Bromodichloromethane	U		0.0190	0.0500	50	04/08/2018 04:42	WG1095247
Bromoform	U		0.0234	0.0500	50	04/08/2018 04:42	WG1095247
Bromomethane	U		0.0433	0.250	50	04/08/2018 04:42	WG1095247
n-Butylbenzene	U		0.0180	0.0500	50	04/08/2018 04:42	WG1095247
sec-Butylbenzene	U		0.0182	0.0500	50	04/08/2018 04:42	WG1095247
Carbon disulfide	0.0177	J	0.0138	0.0500	50	04/08/2018 04:42	WG1095247
Carbon tetrachloride	U		0.0190	0.0500	50	04/08/2018 04:42	WG1095247
Chlorobenzene	U		0.0174	0.0500	50	04/08/2018 04:42	WG1095247
Chlorodibromomethane	U		0.0164	0.0500	50	04/08/2018 04:42	WG1095247
Chloroethane	U		0.0226	0.250	50	04/08/2018 04:42	WG1095247
Chloroform	U		0.0162	0.250	50	04/08/2018 04:42	WG1095247
Chloromethane	U		0.0138	0.125	50	04/08/2018 04:42	WG1095247
1,2-Dibromoethane	U		0.0190	0.0500	50	04/08/2018 04:42	WG1095247
1,1-Dichloroethane	U		0.0130	0.0500	50	04/08/2018 04:42	WG1095247
1,2-Dichloroethane	U		0.0180	0.0500	50	04/08/2018 04:42	WG1095247
1,1-Dichloroethene	U		0.0199	0.0500	50	04/08/2018 04:42	WG1095247
cis-1,2-Dichloroethene	U		0.0130	0.0500	50	04/08/2018 04:42	WG1095247
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	04/08/2018 04:42	WG1095247
1,2-Dichloropropane	U		0.0153	0.0500	50	04/08/2018 04:42	WG1095247
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	04/08/2018 04:42	WG1095247
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	04/08/2018 04:42	WG1095247
Ethylbenzene	0.215		0.0192	0.0500	50	04/08/2018 04:42	WG1095247
Isopropylbenzene	0.0950		0.0163	0.0500	50	04/08/2018 04:42	WG1095247
p-Isopropyltoluene	U		0.0175	0.0500	50	04/08/2018 04:42	WG1095247
2-Butanone (MEK)	U		0.196	0.500	50	04/08/2018 04:42	WG1095247
2-Hexanone	U		0.191	0.500	50	04/08/2018 04:42	WG1095247
Methylene Chloride	U		0.0500	0.250	50	04/08/2018 04:42	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	04/08/2018 04:42	WG1095247
Methyl tert-butyl ether	0.0477	J	0.0184	0.0500	50	04/08/2018 04:42	WG1095247
Naphthalene	0.303		0.0500	0.250	50	04/08/2018 04:42	WG1095247
n-Propylbenzene	0.141		0.0174	0.0500	50	04/08/2018 04:42	WG1095247
Styrene	U		0.0154	0.0500	50	04/08/2018 04:42	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	04/08/2018 04:42	WG1095247
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	04/08/2018 04:42	WG1095247
Tetrachloroethene	U		0.0186	0.0500	50	04/08/2018 04:42	WG1095247
Toluene	0.124		0.0206	0.0500	50	04/08/2018 04:42	WG1095247
1,1,1-Trichloroethane	U		0.0160	0.0500	50	04/08/2018 04:42	WG1095247
1,1,2-Trichloroethane	U		0.0192	0.0500	50	04/08/2018 04:42	WG1095247
Trichloroethene	U		0.0199	0.0500	50	04/08/2018 04:42	WG1095247
1,2,4-Trimethylbenzene	0.665		0.0186	0.0500	50	04/08/2018 04:42	WG1095247
1,3,5-Trimethylbenzene	0.151		0.0194	0.0500	50	04/08/2018 04:42	WG1095247
Vinyl chloride	U		0.0130	0.0500	50	04/08/2018 04:42	WG1095247
o-Xylene	0.264		0.0170	0.0500	50	04/08/2018 04:42	WG1095247
m&p-Xylene	1.52		0.0360	0.100	50	04/08/2018 04:42	WG1095247
Xylenes, Total	1.78		0.0530	0.150	50	04/08/2018 04:42	WG1095247
(S) Toluene-d8	*103*			*80.0-120*		*04/08/2018 04:42*	WG1095247
(S) Toluene-d8	*112*			*80.0-120*		*04/12/2018 22:33*	WG1095247
(S) Dibromofluoromethane	*87.6*			*76.0-123*		*04/08/2018 04:42*	WG1095247
(S) Dibromofluoromethane	*86.1*			*76.0-123*		*04/12/2018 22:33*	WG1095247
(S) 4-Bromofluorobenzene	*98.2*			*80.0-120*		*04/12/2018 22:33*	WG1095247
(S) 4-Bromofluorobenzene	*106*			*80.0-120*		*04/08/2018 04:42*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	5.89		0.0247	0.100	1	04/11/2018 05:01	WG1095660
(S) o-Terphenyl	*106*			*31.0-160*		*04/11/2018 05:01*	WG1095660

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3420		2.82	10.0	1	04/12/2018 16:05	WG1096341

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	04/12/2018 16:05	WG1096783

Sample Narrative:

L983865-39 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.180	0.500	100	04/09/2018 16:17	WG1095350

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	446		1.04	20.0	20	04/09/2018 00:42	WG1095125
Fluoride	1.41		0.00990	0.100	1	04/09/2018 00:27	WG1095125
Sulfate	713		1.55	100	20	04/11/2018 00:05	WG1095833

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/11/2018 08:47	WG1095972
Mercury,Dissolved	U		0.000490	0.00200	10	04/11/2018 09:46	WG1095576

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.997		0.0126	0.200	1	04/10/2018 21:36	WG1095823
Boron,Dissolved	0.973		0.0126	0.200	1	04/11/2018 16:24	WG1095851

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0512		0.000250	0.00200	1	04/17/2018 13:20	WG1095155
Arsenic,Dissolved	0.0491		0.000250	0.00200	1	04/13/2018 04:43	WG1095182
Barium	0.0711		0.000360	0.00500	1	04/17/2018 13:20	WG1095155
Barium,Dissolved	0.0727		0.000360	0.00500	1	04/13/2018 04:43	WG1095182
Cadmium	U		0.000160	0.00100	1	04/17/2018 13:20	WG1095155
Cadmium,Dissolved	U		0.000160	0.00100	1	04/13/2018 04:43	WG1095182
Calcium	143		0.0460	1.00	1	04/17/2018 13:20	WG1095155
Chromium	0.00132	J	0.000540	0.00200	1	04/17/2018 13:20	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 04:43	WG1095182
Cobalt	U		0.000260	0.00200	1	04/17/2018 13:20	WG1095155
Cobalt,Dissolved	U		0.000260	0.00200	1	04/13/2018 04:43	WG1095182
Iron	0.0740	B J	0.0150	0.100	1	04/17/2018 13:20	WG1095155
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 04:43	WG1095182
Lead	0.00433		0.000240	0.00200	1	04/17/2018 13:20	WG1095155
Lead,Dissolved	0.00404		0.000240	0.00200	1	04/13/2018 04:43	WG1095182
Manganese	0.154		0.000250	0.00500	1	04/17/2018 13:20	WG1095155

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Manganese,Dissolved	0.147		0.000250	0.00500	1	04/13/2018 04:43	WG1095182
Nickel	0.0134		0.000350	0.00200	1	04/17/2018 13:20	WG1095155
Nickel,Dissolved	0.0110		0.000350	0.00200	1	04/13/2018 04:43	WG1095182
Potassium	1.23		0.0370	1.00	1	04/17/2018 13:20	WG1095155
Selenium	0.00240	B	0.000380	0.00200	1	04/17/2018 13:20	WG1095155
Selenium,Dissolved	0.00248		0.000380	0.00200	1	04/13/2018 04:43	WG1095182
Sodium	955		0.110	1.00	1	04/17/2018 13:20	WG1095155
Uranium	U		0.000330	0.0100	1	04/17/2018 13:20	WG1095155
Uranium,Dissolved	U		0.000330	0.0100	1	04/13/2018 04:43	WG1095182
Vanadium	0.00718		0.000180	0.00500	1	04/17/2018 13:20	WG1095155
Vanadium,Dissolved	0.00694		0.000180	0.00500	1	04/13/2018 04:43	WG1095182

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	26.6		0.628	2.00	20	04/10/2018 11:34	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*97.5*			*77.0-122*		*04/10/2018 11:34*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		2.00	10.0	200	04/08/2018 05:03	WG1095247
Benzene	9.63		0.0662	0.200	200	04/08/2018 05:03	WG1095247
Bromodichloromethane	U		0.0760	0.200	200	04/08/2018 05:03	WG1095247
Bromoform	U		0.0938	0.200	200	04/08/2018 05:03	WG1095247
Bromomethane	U		0.173	1.00	200	04/08/2018 05:03	WG1095247
n-Butylbenzene	U		0.0722	0.200	200	04/08/2018 05:03	WG1095247
sec-Butylbenzene	U		0.0730	0.200	200	04/08/2018 05:03	WG1095247
Carbon disulfide	0.0554	J	0.0550	0.200	200	04/08/2018 05:03	WG1095247
Carbon tetrachloride	U		0.0758	0.200	200	04/08/2018 05:03	WG1095247
Chlorobenzene	U		0.0696	0.200	200	04/08/2018 05:03	WG1095247
Chlorodibromomethane	U		0.0654	0.200	200	04/08/2018 05:03	WG1095247
Chloroethane	U		0.0906	1.00	200	04/08/2018 05:03	WG1095247
Chloroform	U		0.0648	1.00	200	04/08/2018 05:03	WG1095247
Chloromethane	U		0.0552	0.500	200	04/08/2018 05:03	WG1095247
1,2-Dibromoethane	U		0.0762	0.200	200	04/08/2018 05:03	WG1095247
1,1-Dichloroethane	U		0.0518	0.200	200	04/08/2018 05:03	WG1095247
1,2-Dichloroethane	U		0.0722	0.200	200	04/08/2018 05:03	WG1095247
1,1-Dichloroethene	U		0.0796	0.200	200	04/08/2018 05:03	WG1095247
cis-1,2-Dichloroethene	U		0.0520	0.200	200	04/08/2018 05:03	WG1095247
trans-1,2-Dichloroethene	U		0.0792	0.200	200	04/08/2018 05:03	WG1095247
1,2-Dichloropropane	U		0.0612	0.200	200	04/08/2018 05:03	WG1095247
cis-1,3-Dichloropropene	U		0.0836	0.200	200	04/08/2018 05:03	WG1095247
trans-1,3-Dichloropropene	U		0.0838	0.200	200	04/08/2018 05:03	WG1095247
Ethylbenzene	1.86		0.0768	0.200	200	04/08/2018 05:03	WG1095247
Isopropylbenzene	0.117	J	0.0652	0.200	200	04/08/2018 05:03	WG1095247
p-Isopropyltoluene	U		0.0700	0.200	200	04/08/2018 05:03	WG1095247
2-Butanone (MEK)	U		0.786	2.00	200	04/08/2018 05:03	WG1095247
2-Hexanone	U		0.764	2.00	200	04/08/2018 05:03	WG1095247
Methylene Chloride	U		0.200	1.00	200	04/08/2018 05:03	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.428	2.00	200	04/08/2018 05:03	WG1095247
Methyl tert-butyl ether	0.0758	J	0.0734	0.200	200	04/08/2018 05:03	WG1095247
Naphthalene	0.373	J	0.200	1.00	200	04/08/2018 05:03	WG1095247
n-Propylbenzene	0.162	J	0.0698	0.200	200	04/08/2018 05:03	WG1095247
Styrene	U		0.0614	0.200	200	04/08/2018 05:03	WG1095247

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,1,1,2-Tetrachloroethane	U		0.0770	0.200	200	04/08/2018 05:03	WG1095247
1,1,2,2-Tetrachloroethane	U		0.0260	0.200	200	04/08/2018 05:03	WG1095247
Tetrachloroethene	U		0.0744	0.200	200	04/08/2018 05:03	WG1095247
Toluene	1.83		0.0824	0.200	200	04/08/2018 05:03	WG1095247
1,1,1-Trichloroethane	U		0.0638	0.200	200	04/08/2018 05:03	WG1095247
1,1,2-Trichloroethane	U		0.0766	0.200	200	04/08/2018 05:03	WG1095247
Trichloroethene	U		0.0796	0.200	200	04/08/2018 05:03	WG1095247
1,2,4-Trimethylbenzene	0.531		0.0746	0.200	200	04/08/2018 05:03	WG1095247
1,3,5-Trimethylbenzene	0.125	J	0.0774	0.200	200	04/08/2018 05:03	WG1095247
Vinyl chloride	U		0.0518	0.200	200	04/08/2018 05:03	WG1095247
o-Xylene	0.398		0.0682	0.200	200	04/08/2018 05:03	WG1095247
m&p-Xylene	0.905		0.144	0.400	200	04/08/2018 05:03	WG1095247
Xylenes, Total	1.30		0.212	0.600	200	04/08/2018 05:03	WG1095247
(S) Toluene-d8	*106*			*80.0-120*		*04/08/2018 05:03*	WG1095247
(S) Dibromofluoromethane	*89.0*			*76.0-123*		*04/08/2018 05:03*	WG1095247
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/08/2018 05:03*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	9.60		0.124	0.500	5	04/11/2018 22:41	WG1095660
(S) o-Terphenyl	*106*			*31.0-160*		*04/11/2018 22:41*	WG1095660

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1910		2.82	10.0	1	04/12/2018 16:05	WG1096341

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:06	WG1096783

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	04/09/2018 16:18	WG1095350

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	453		1.04	20.0	20	04/09/2018 01:29	WG1095125
Fluoride	0.874		0.00990	0.100	1	04/09/2018 00:58	WG1095125
Sulfate	26.8		0.0774	5.00	1	04/11/2018 00:21	WG1095833

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	04/09/2018 15:48	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:48	WG1095576

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.984		0.0126	0.200	1	04/09/2018 17:03	WG1095148
Boron,Dissolved	0.955		0.0126	0.200	1	04/11/2018 16:27	WG1095851

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00514		0.000250	0.00200	1	04/17/2018 13:24	WG1095155
Arsenic,Dissolved	0.00517		0.000250	0.00200	1	04/13/2018 04:47	WG1095182
Barium	0.124		0.000360	0.00500	1	04/17/2018 13:24	WG1095155
Barium,Dissolved	0.133		0.000360	0.00500	1	04/13/2018 04:47	WG1095182
Cadmium	U		0.000160	0.00100	1	04/17/2018 13:24	WG1095155
Cadmium,Dissolved	U		0.000160	0.00100	1	04/13/2018 04:47	WG1095182
Calcium	130		0.0460	1.00	1	04/17/2018 13:24	WG1095155
Chromium	0.000785	J	0.000540	0.00200	1	04/17/2018 13:24	WG1095155
Chromium,Dissolved	U		0.000540	0.00200	1	04/13/2018 04:47	WG1095182
Cobalt	U		0.000260	0.00200	1	04/17/2018 13:24	WG1095155
Cobalt,Dissolved	U		0.000260	0.00200	1	04/13/2018 04:47	WG1095182
Iron	0.160	B	0.0150	0.100	1	04/17/2018 13:24	WG1095155
Iron,Dissolved	U		0.0150	0.100	1	04/13/2018 04:47	WG1095182
Lead	U		0.000240	0.00200	1	04/17/2018 13:24	WG1095155
Lead,Dissolved	U		0.000240	0.00200	1	04/13/2018 04:47	WG1095182
Manganese	0.103		0.000250	0.00500	1	04/17/2018 13:24	WG1095155
Manganese,Dissolved	0.111		0.000250	0.00500	1	04/13/2018 04:47	WG1095182
Nickel	0.00977		0.000350	0.00200	1	04/17/2018 13:24	WG1095155
Nickel,Dissolved	0.00593		0.000350	0.00200	1	04/13/2018 04:47	WG1095182

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	1.58		0.0370	1.00	1	04/17/2018 13:24	WG1095155
Selenium	0.000667	B J	0.000380	0.00200	1	04/17/2018 13:24	WG1095155
Selenium,Dissolved	U		0.000380	0.00200	1	04/13/2018 04:47	WG1095182
Sodium	436		0.110	1.00	1	04/17/2018 13:24	WG1095155
Uranium	U		0.000330	0.0100	1	04/17/2018 13:24	WG1095155
Uranium,Dissolved	U		0.000330	0.0100	1	04/13/2018 04:47	WG1095182
Vanadium	0.00169	J	0.000180	0.00500	1	04/17/2018 13:24	WG1095155
Vanadium,Dissolved	0.00128	J	0.000180	0.00500	1	04/13/2018 04:47	WG1095182

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	2.44		0.0314	0.100	1	04/10/2018 11:58	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*95.8*			*77.0-122*		*04/10/2018 11:58*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	04/08/2018 05:24	WG1095247
Benzene	0.741		0.00166	0.00500	5	04/08/2018 05:24	WG1095247
Bromodichloromethane	U		0.00190	0.00500	5	04/08/2018 05:24	WG1095247
Bromoform	U		0.00234	0.00500	5	04/08/2018 05:24	WG1095247
Bromomethane	U		0.00433	0.0250	5	04/08/2018 05:24	WG1095247
n-Butylbenzene	0.00518		0.00180	0.00500	5	04/08/2018 05:24	WG1095247
sec-Butylbenzene	0.0111		0.00182	0.00500	5	04/08/2018 05:24	WG1095247
Carbon disulfide	0.00176	J	0.00138	0.00500	5	04/08/2018 05:24	WG1095247
Carbon tetrachloride	U		0.00190	0.00500	5	04/08/2018 05:24	WG1095247
Chlorobenzene	U		0.00174	0.00500	5	04/08/2018 05:24	WG1095247
Chlorodibromomethane	U		0.00164	0.00500	5	04/08/2018 05:24	WG1095247
Chloroethane	U		0.00226	0.0250	5	04/08/2018 05:24	WG1095247
Chloroform	U		0.00162	0.0250	5	04/08/2018 05:24	WG1095247
Chloromethane	U		0.00138	0.0125	5	04/08/2018 05:24	WG1095247
1,2-Dibromoethane	U		0.00190	0.00500	5	04/08/2018 05:24	WG1095247
1,1-Dichloroethane	U		0.00130	0.00500	5	04/08/2018 05:24	WG1095247
1,2-Dichloroethane	U		0.00180	0.00500	5	04/08/2018 05:24	WG1095247
1,1-Dichloroethene	U		0.00199	0.00500	5	04/08/2018 05:24	WG1095247
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	04/08/2018 05:24	WG1095247
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	04/08/2018 05:24	WG1095247
1,2-Dichloropropane	U		0.00153	0.00500	5	04/08/2018 05:24	WG1095247
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	04/08/2018 05:24	WG1095247
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	04/08/2018 05:24	WG1095247
Ethylbenzene	0.222		0.00192	0.00500	5	04/08/2018 05:24	WG1095247
Isopropylbenzene	0.0572		0.00163	0.00500	5	04/08/2018 05:24	WG1095247
p-Isopropyltoluene	U		0.00175	0.00500	5	04/08/2018 05:24	WG1095247
2-Butanone (MEK)	U		0.0196	0.0500	5	04/08/2018 05:24	WG1095247
2-Hexanone	U		0.0191	0.0500	5	04/08/2018 05:24	WG1095247
Methylene Chloride	U		0.00500	0.0250	5	04/08/2018 05:24	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	04/08/2018 05:24	WG1095247
Methyl tert-butyl ether	0.188		0.00184	0.00500	5	04/08/2018 05:24	WG1095247
Naphthalene	0.0667		0.00500	0.0250	5	04/08/2018 05:24	WG1095247
n-Propylbenzene	0.0680		0.00174	0.00500	5	04/08/2018 05:24	WG1095247
Styrene	U		0.00154	0.00500	5	04/08/2018 05:24	WG1095247
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	04/08/2018 05:24	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	04/08/2018 05:24	WG1095247
Tetrachloroethene	U		0.00186	0.00500	5	04/08/2018 05:24	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Toluene	0.0128		0.00206	0.00500	5	04/08/2018 05:24	WG1095247
1,1,1-Trichloroethane	U		0.00160	0.00500	5	04/08/2018 05:24	WG1095247
1,1,2-Trichloroethane	U		0.00192	0.00500	5	04/08/2018 05:24	WG1095247
Trichloroethene	U		0.00199	0.00500	5	04/08/2018 05:24	WG1095247
1,2,4-Trimethylbenzene	0.0413		0.00186	0.00500	5	04/08/2018 05:24	WG1095247
1,3,5-Trimethylbenzene	0.00633		0.00194	0.00500	5	04/08/2018 05:24	WG1095247
Vinyl chloride	U		0.00130	0.00500	5	04/08/2018 05:24	WG1095247
o-Xylene	0.00541		0.00170	0.00500	5	04/08/2018 05:24	WG1095247
m&p-Xylene	0.0438		0.00360	0.0100	5	04/08/2018 05:24	WG1095247
Xylenes, Total	0.0492		0.00530	0.0150	5	04/08/2018 05:24	WG1095247
(S) Toluene-d8	*104*			*80.0-120*		*04/08/2018 05:24*	WG1095247
(S) Dibromofluoromethane	*86.3*			*76.0-123*		*04/08/2018 05:24*	WG1095247
(S) 4-Bromofluorobenzene	*104*			*80.0-120*		*04/08/2018 05:24*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	6.05		0.0247	0.100	1	04/11/2018 05:42	WG1095660
(S) o-Terphenyl	*104*			*31.0-160*		*04/11/2018 05:42*	WG1095660

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2080		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:07	WG1096783

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	450		1.04	20.0	20	04/09/2018 02:30	WG1095125
Fluoride	1.88		0.00990	0.100	1	04/09/2018 02:15	WG1095125
Sulfate	10.9		0.0774	5.00	1	04/11/2018 08:59	WG1095833

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00511		0.000250	0.00200	1	04/15/2018 15:34	WG1095156
Arsenic,Dissolved	0.00502		0.000250	0.00200	1	04/15/2018 23:54	WG1095184
Barium	9.72		0.000360	0.00500	1	04/15/2018 15:34	WG1095156
Barium,Dissolved	9.89		0.000360	0.00500	1	04/15/2018 23:54	WG1095184
Calcium	112		0.0460	1.00	1	04/15/2018 15:34	WG1095156
Chromium	0.000601	B J	0.000540	0.00200	1	04/15/2018 15:34	WG1095156
Chromium,Dissolved	0.000579	B J	0.000540	0.00200	1	04/15/2018 23:54	WG1095184
Iron	0.0297	J	0.0150	0.100	1	04/15/2018 15:34	WG1095156
Iron,Dissolved	0.0160	J	0.0150	0.100	1	04/15/2018 23:54	WG1095184
Lead	0.00227		0.000240	0.00200	1	04/15/2018 15:34	WG1095156
Lead,Dissolved	0.000791	J	0.000240	0.00200	1	04/15/2018 23:54	WG1095184
Manganese	0.0750		0.000250	0.00500	1	04/15/2018 15:34	WG1095156
Manganese,Dissolved	0.0741		0.000250	0.00500	1	04/15/2018 23:54	WG1095184
Potassium	1.47		0.0370	1.00	1	04/15/2018 15:34	WG1095156
Selenium	0.000496	J	0.000380	0.00200	1	04/15/2018 15:34	WG1095156
Selenium,Dissolved	0.000725	J	0.000380	0.00200	1	04/15/2018 23:54	WG1095184
Sodium	472		0.110	1.00	1	04/15/2018 15:34	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	19.3		0.314	1.00	10	04/10/2018 12:23	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*99.1*			*77.0-122*		*04/10/2018 12:23*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		1.00	5.00	100	04/08/2018 05:46	WG1095247
Benzene	9.68		0.0331	0.100	100	04/08/2018 05:46	WG1095247
Bromodichloromethane	U		0.0380	0.100	100	04/08/2018 05:46	WG1095247
Bromoform	U		0.0469	0.100	100	04/08/2018 05:46	WG1095247
Bromomethane	U		0.0866	0.500	100	04/08/2018 05:46	WG1095247
n-Butylbenzene	U		0.0361	0.100	100	04/08/2018 05:46	WG1095247
sec-Butylbenzene	U		0.0365	0.100	100	04/08/2018 05:46	WG1095247
Carbon disulfide	U		0.0275	0.100	100	04/08/2018 05:46	WG1095247
Carbon tetrachloride	U		0.0379	0.100	100	04/08/2018 05:46	WG1095247

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.0348	0.100	100	04/08/2018 05:46	WG1095247
Chlorodibromomethane	U		0.0327	0.100	100	04/08/2018 05:46	WG1095247
Chloroethane	U		0.0453	0.500	100	04/08/2018 05:46	WG1095247
Chloroform	U		0.0324	0.500	100	04/08/2018 05:46	WG1095247
Chloromethane	U		0.0276	0.250	100	04/08/2018 05:46	WG1095247
1,2-Dibromoethane	U		0.0381	0.100	100	04/08/2018 05:46	WG1095247
1,1-Dichloroethane	U		0.0259	0.100	100	04/08/2018 05:46	WG1095247
1,2-Dichloroethane	U		0.0361	0.100	100	04/08/2018 05:46	WG1095247
1,1-Dichloroethene	U		0.0398	0.100	100	04/08/2018 05:46	WG1095247
cis-1,2-Dichloroethene	U		0.0260	0.100	100	04/08/2018 05:46	WG1095247
trans-1,2-Dichloroethene	U		0.0396	0.100	100	04/08/2018 05:46	WG1095247
1,2-Dichloropropane	U		0.0306	0.100	100	04/08/2018 05:46	WG1095247
cis-1,3-Dichloropropene	U		0.0418	0.100	100	04/08/2018 05:46	WG1095247
trans-1,3-Dichloropropene	U		0.0419	0.100	100	04/08/2018 05:46	WG1095247
Ethylbenzene	0.114		0.0384	0.100	100	04/08/2018 05:46	WG1095247
Isopropylbenzene	0.141		0.0326	0.100	100	04/08/2018 05:46	WG1095247
p-Isopropyltoluene	U		0.0350	0.100	100	04/08/2018 05:46	WG1095247
2-Butanone (MEK)	U		0.393	1.00	100	04/08/2018 05:46	WG1095247
2-Hexanone	U		0.382	1.00	100	04/08/2018 05:46	WG1095247
Methylene Chloride	U		0.100	0.500	100	04/08/2018 05:46	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	04/08/2018 05:46	WG1095247
Methyl tert-butyl ether	U		0.0367	0.100	100	04/08/2018 05:46	WG1095247
Naphthalene	0.247	J	0.100	0.500	100	04/08/2018 05:46	WG1095247
n-Propylbenzene	0.213		0.0349	0.100	100	04/08/2018 05:46	WG1095247
Styrene	U		0.0307	0.100	100	04/08/2018 05:46	WG1095247
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	04/08/2018 05:46	WG1095247
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	04/08/2018 05:46	WG1095247
Tetrachloroethene	U		0.0372	0.100	100	04/08/2018 05:46	WG1095247
Toluene	U		0.0412	0.100	100	04/08/2018 05:46	WG1095247
1,1,1-Trichloroethane	U		0.0319	0.100	100	04/08/2018 05:46	WG1095247
1,1,2-Trichloroethane	U		0.0383	0.100	100	04/08/2018 05:46	WG1095247
Trichloroethene	U		0.0398	0.100	100	04/08/2018 05:46	WG1095247
1,2,4-Trimethylbenzene	U		0.0373	0.100	100	04/08/2018 05:46	WG1095247
1,3,5-Trimethylbenzene	U		0.0387	0.100	100	04/08/2018 05:46	WG1095247
Vinyl chloride	U		0.0259	0.100	100	04/08/2018 05:46	WG1095247
o-Xylene	U		0.0341	0.100	100	04/08/2018 05:46	WG1095247
m&p-Xylene	U		0.0719	0.200	100	04/08/2018 05:46	WG1095247
Xylenes, Total	U		0.106	0.300	100	04/08/2018 05:46	WG1095247
(S) Toluene-d8	*106*			*80.0-120*		*04/08/2018 05:46*	WG1095247
(S) Dibromofluoromethane	*87.6*			*76.0-123*		*04/08/2018 05:46*	WG1095247
(S) 4-Bromofluorobenzene	*107*			*80.0-120*		*04/08/2018 05:46*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	13.6		0.0494	0.200	2	04/11/2018 06:02	WG1095660
(S) o-Terphenyl	*92.0*			*31.0-160*		*04/11/2018 06:02*	WG1095660

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3020		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:08	WG1096783

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	131		1.04	20.0	20	04/08/2018 07:37	WG1095127
Fluoride	3.57		0.00990	0.100	1	04/08/2018 07:25	WG1095127
Sulfate	1130		1.55	100	20	04/08/2018 07:37	WG1095127

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0110		0.000250	0.00200	1	04/15/2018 15:39	WG1095156
Arsenic,Dissolved	0.0105		0.000250	0.00200	1	04/15/2018 23:58	WG1095184
Barium	0.0159		0.000360	0.00500	1	04/15/2018 15:39	WG1095156
Barium,Dissolved	0.0190		0.000360	0.00500	1	04/15/2018 23:58	WG1095184
Calcium	72.9		0.0460	1.00	1	04/15/2018 15:39	WG1095156
Chromium	0.00126	B J	0.000540	0.00200	1	04/15/2018 15:39	WG1095156
Chromium,Dissolved	U		0.000540	0.00200	1	04/15/2018 23:58	WG1095184
Iron	0.0868	J	0.0150	0.100	1	04/15/2018 15:39	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/15/2018 23:58	WG1095184
Lead	0.00139	J	0.000240	0.00200	1	04/15/2018 15:39	WG1095156
Lead,Dissolved	0.000243	J	0.000240	0.00200	1	04/15/2018 23:58	WG1095184
Manganese	0.0181		0.000250	0.00500	1	04/15/2018 15:39	WG1095156
Manganese,Dissolved	0.0186		0.000250	0.00500	1	04/15/2018 23:58	WG1095184
Potassium	0.331	J	0.0370	1.00	1	04/15/2018 15:39	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 15:39	WG1095156
Selenium,Dissolved	U		0.000380	0.00200	1	04/15/2018 23:58	WG1095184
Sodium	1090		0.550	5.00	5	04/15/2018 17:26	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	1.36		0.0314	0.100	1	04/10/2018 12:47	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*94.8*			*77.0-122*		*04/10/2018 12:47*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/12/2018 22:53	WG1095247
Benzene	0.144		0.000331	0.00100	1	04/12/2018 22:53	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/12/2018 22:53	WG1095247
Bromoform	U		0.000469	0.00100	1	04/12/2018 22:53	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/12/2018 22:53	WG1095247
n-Butylbenzene	0.00336		0.000361	0.00100	1	04/12/2018 22:53	WG1095247
sec-Butylbenzene	0.00845		0.000365	0.00100	1	04/12/2018 22:53	WG1095247
Carbon disulfide	0.000668	J	0.000275	0.00100	1	04/12/2018 22:53	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/12/2018 22:53	WG1095247

MW-39

Collected date/time: 04/04/18 10:45

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Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/12/2018 22:53	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/12/2018 22:53	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/12/2018 22:53	WG1095247
Chloroform	U		0.000324	0.00500	1	04/12/2018 22:53	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/12/2018 22:53	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/12/2018 22:53	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/12/2018 22:53	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/12/2018 22:53	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/12/2018 22:53	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 22:53	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/12/2018 22:53	WG1095247
1,2-Dichloropropane	U		0.000306	0.00100	1	04/12/2018 22:53	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/12/2018 22:53	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/12/2018 22:53	WG1095247
Ethylbenzene	0.0263		0.000384	0.00100	1	04/12/2018 22:53	WG1095247
Isopropylbenzene	0.0421		0.000326	0.00100	1	04/12/2018 22:53	WG1095247
p-Isopropyltoluene	0.00293		0.000350	0.00100	1	04/12/2018 22:53	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/12/2018 22:53	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/12/2018 22:53	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/12/2018 22:53	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/12/2018 22:53	WG1095247
Methyl tert-butyl ether	0.00147		0.000367	0.00100	1	04/12/2018 22:53	WG1095247
Naphthalene	0.00102	J	0.00100	0.00500	1	04/12/2018 22:53	WG1095247
n-Propylbenzene	0.0461		0.000349	0.00100	1	04/12/2018 22:53	WG1095247
Styrene	U		0.000307	0.00100	1	04/12/2018 22:53	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/12/2018 22:53	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/12/2018 22:53	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/12/2018 22:53	WG1095247
Toluene	0.00472		0.000412	0.00100	1	04/12/2018 22:53	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/12/2018 22:53	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/12/2018 22:53	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/12/2018 22:53	WG1095247
1,2,4-Trimethylbenzene	0.0678		0.000373	0.00100	1	04/12/2018 22:53	WG1095247
1,3,5-Trimethylbenzene	0.00685		0.000387	0.00100	1	04/12/2018 22:53	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/12/2018 22:53	WG1095247
o-Xylene	0.0452		0.000341	0.00100	1	04/12/2018 22:53	WG1095247
m&p-Xylene	0.141		0.000719	0.00200	1	04/12/2018 22:53	WG1095247
Xylenes, Total	0.186		0.00106	0.00300	1	04/12/2018 22:53	WG1095247
(S) Toluene-d8	*107*			*80.0-120*		*04/12/2018 22:53*	WG1095247
(S) Dibromofluoromethane	*89.8*			*76.0-123*		*04/12/2018 22:53*	WG1095247
(S) 4-Bromofluorobenzene	*101*			*80.0-120*		*04/12/2018 22:53*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	6.39		0.0247	0.100	1	04/11/2018 06:22	WG1095660
(S) o-Terphenyl	*107*			*31.0-160*		*04/11/2018 06:22*	WG1095660

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2670		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	04/12/2018 16:13	WG1096783

Sample Narrative:

L983865-43 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	131		1.04	20.0	20	04/08/2018 08:02	WG1095127
Fluoride	3.41		0.00990	0.100	1	04/08/2018 07:50	WG1095127
Sulfate	1530		1.55	100	20	04/08/2018 08:02	WG1095127

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00234		0.000250	0.00200	1	04/15/2018 15:43	WG1095156
Arsenic,Dissolved	0.00191	J	0.000250	0.00200	1	04/16/2018 00:23	WG1095184
Barium	0.0224		0.000360	0.00500	1	04/15/2018 15:43	WG1095156
Barium,Dissolved	0.0220		0.000360	0.00500	1	04/16/2018 00:23	WG1095184
Calcium	499		0.0460	1.00	1	04/15/2018 15:43	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 15:43	WG1095156
Chromium,Dissolved	U		0.000540	0.00200	1	04/16/2018 00:23	WG1095184
Iron	U		0.0150	0.100	1	04/15/2018 15:43	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 00:23	WG1095184
Lead	0.000469	J	0.000240	0.00200	1	04/15/2018 15:43	WG1095156
Lead,Dissolved	0.000521	J	0.000240	0.00200	1	04/16/2018 00:23	WG1095184
Manganese	0.189		0.000250	0.00500	1	04/15/2018 15:43	WG1095156
Manganese,Dissolved	0.181		0.000250	0.00500	1	04/16/2018 00:23	WG1095184
Potassium	3.49		0.0370	1.00	1	04/15/2018 15:43	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 15:43	WG1095156
Selenium,Dissolved	U		0.000380	0.00200	1	04/16/2018 00:23	WG1095184
Sodium	143		0.110	1.00	1	04/15/2018 15:43	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.380		0.0314	0.100	1	04/13/2018 01:19	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*107*			*77.0-122*		*04/13/2018 01:19*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/12/2018 23:13	WG1095247
Benzene	U		0.000331	0.00100	1	04/12/2018 23:13	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/12/2018 23:13	WG1095247
Bromoform	U		0.000469	0.00100	1	04/12/2018 23:13	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/12/2018 23:13	WG1095247
n-Butylbenzene	0.00108		0.000361	0.00100	1	04/12/2018 23:13	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.000567	J	0.000365	0.00100	1	04/12/2018 23:13	WG1095247
Carbon disulfide	U		0.000275	0.00100	1	04/12/2018 23:13	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/12/2018 23:13	WG1095247
Chlorobenzene	U		0.000348	0.00100	1	04/12/2018 23:13	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/12/2018 23:13	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/12/2018 23:13	WG1095247
Chloroform	U		0.000324	0.00500	1	04/12/2018 23:13	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/12/2018 23:13	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/12/2018 23:13	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/12/2018 23:13	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/12/2018 23:13	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/12/2018 23:13	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 23:13	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/12/2018 23:13	WG1095247
1,2-Dichloropropane	U		0.000306	0.00100	1	04/12/2018 23:13	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/12/2018 23:13	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/12/2018 23:13	WG1095247
Ethylbenzene	0.000727	J	0.000384	0.00100	1	04/12/2018 23:13	WG1095247
Isopropylbenzene	0.00307		0.000326	0.00100	1	04/12/2018 23:13	WG1095247
p-Isopropyltoluene	U		0.000350	0.00100	1	04/12/2018 23:13	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/12/2018 23:13	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/12/2018 23:13	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/12/2018 23:13	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/12/2018 23:13	WG1095247
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/12/2018 23:13	WG1095247
Naphthalene	U		0.00100	0.00500	1	04/12/2018 23:13	WG1095247
n-Propylbenzene	U		0.000349	0.00100	1	04/12/2018 23:13	WG1095247
Styrene	U		0.000307	0.00100	1	04/12/2018 23:13	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/12/2018 23:13	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/12/2018 23:13	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/12/2018 23:13	WG1095247
Toluene	0.00163		0.000412	0.00100	1	04/12/2018 23:13	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/12/2018 23:13	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/12/2018 23:13	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/12/2018 23:13	WG1095247
1,2,4-Trimethylbenzene	0.000631	J	0.000373	0.00100	1	04/12/2018 23:13	WG1095247
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/12/2018 23:13	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/12/2018 23:13	WG1095247
o-Xylene	0.00346		0.000341	0.00100	1	04/12/2018 23:13	WG1095247
m&p-Xylene	0.00126	J	0.000719	0.00200	1	04/12/2018 23:13	WG1095247
Xylenes, Total	0.00474		0.00106	0.00300	1	04/12/2018 23:13	WG1095247
(S) Toluene-d8	*107*			*80.0-120*		*04/12/2018 23:13*	WG1095247
(S) Dibromofluoromethane	*87.6*			*76.0-123*		*04/12/2018 23:13*	WG1095247
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/12/2018 23:13*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.81		0.0247	0.100	1	04/11/2018 07:49	WG1095661
(S) o-Terphenyl	*97.1*			*31.0-160*		*04/11/2018 07:49*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2390		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	04/12/2018 16:14	WG1096783

Sample Narrative:

L983865-44 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	141		1.04	20.0	20	04/08/2018 08:27	WG1095127
Fluoride	1.80		0.00990	0.100	1	04/08/2018 08:14	WG1095127
Sulfate	1440		1.55	100	20	04/08/2018 08:27	WG1095127

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.000656	J	0.000250	0.00200	1	04/15/2018 15:48	WG1095156
Arsenic,Dissolved	0.00213		0.000250	0.00200	1	04/16/2018 00:28	WG1095184
Barium	0.0227		0.000360	0.00500	1	04/15/2018 15:48	WG1095156
Barium,Dissolved	0.0247		0.000360	0.00500	1	04/16/2018 00:28	WG1095184
Calcium	425		0.0460	1.00	1	04/15/2018 15:48	WG1095156
Chromium	0.000593	B J	0.000540	0.00200	1	04/15/2018 15:48	WG1095156
Chromium,Dissolved	0.0314		0.000540	0.00200	1	04/16/2018 00:28	WG1095184
Iron	0.0289	J	0.0150	0.100	1	04/15/2018 15:48	WG1095156
Iron,Dissolved	0.143		0.0150	0.100	1	04/16/2018 00:28	WG1095184
Lead	0.000415	J	0.000240	0.00200	1	04/15/2018 15:48	WG1095156
Lead,Dissolved	0.00213		0.000240	0.00200	1	04/16/2018 00:28	WG1095184
Manganese	0.0161		0.000250	0.00500	1	04/15/2018 15:48	WG1095156
Manganese,Dissolved	0.0190		0.000250	0.00500	1	04/16/2018 00:28	WG1095184
Potassium	1.41		0.0370	1.00	1	04/15/2018 15:48	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 15:48	WG1095156
Selenium,Dissolved	0.00164	J	0.000380	0.00200	1	04/16/2018 00:28	WG1095184
Sodium	107		0.110	1.00	1	04/15/2018 15:48	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	1.18		0.0314	0.100	1	04/13/2018 01:43	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*104*			*77.0-122*		*04/13/2018 01:43*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	0.0269	J	0.0100	0.0500	1	04/12/2018 23:33	WG1095247
Benzene	0.000769	J	0.000331	0.00100	1	04/12/2018 23:33	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/12/2018 23:33	WG1095247
Bromoform	U		0.000469	0.00100	1	04/12/2018 23:33	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/12/2018 23:33	WG1095247
n-Butylbenzene	0.000605	J	0.000361	0.00100	1	04/12/2018 23:33	WG1095247

MW-40
Collected date/time: 04/04/18 12:20

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.0182		0.000365	0.00100	1	04/12/2018 23:33	WG1095247
Carbon disulfide	U		0.000275	0.00100	1	04/12/2018 23:33	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/12/2018 23:33	WG1095247
Chlorobenzene	U		0.000348	0.00100	1	04/12/2018 23:33	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/12/2018 23:33	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/12/2018 23:33	WG1095247
Chloroform	0.00196	J	0.000324	0.00500	1	04/12/2018 23:33	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/12/2018 23:33	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/12/2018 23:33	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/12/2018 23:33	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/12/2018 23:33	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/12/2018 23:33	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 23:33	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/12/2018 23:33	WG1095247
1,2-Dichloropropane	U		0.000306	0.00100	1	04/12/2018 23:33	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/12/2018 23:33	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/12/2018 23:33	WG1095247
Ethylbenzene	0.000567	J	0.000384	0.00100	1	04/12/2018 23:33	WG1095247
Isopropylbenzene	0.0930		0.000326	0.00100	1	04/12/2018 23:33	WG1095247
p-Isopropyltoluene	0.000376	J	0.000350	0.00100	1	04/12/2018 23:33	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/12/2018 23:33	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/12/2018 23:33	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/12/2018 23:33	WG1095247
4-Methyl-2-pentanone (MIBK)	0.00447	J	0.00214	0.0100	1	04/12/2018 23:33	WG1095247
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/12/2018 23:33	WG1095247
Naphthalene	U		0.00100	0.00500	1	04/12/2018 23:33	WG1095247
n-Propylbenzene	0.00369		0.000349	0.00100	1	04/12/2018 23:33	WG1095247
Styrene	U		0.000307	0.00100	1	04/12/2018 23:33	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/12/2018 23:33	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/12/2018 23:33	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/12/2018 23:33	WG1095247
Toluene	0.000543	J	0.000412	0.00100	1	04/12/2018 23:33	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/12/2018 23:33	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/12/2018 23:33	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/12/2018 23:33	WG1095247
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/12/2018 23:33	WG1095247
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/12/2018 23:33	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/12/2018 23:33	WG1095247
o-Xylene	U		0.000341	0.00100	1	04/12/2018 23:33	WG1095247
m&p-Xylene	0.00619		0.000719	0.00200	1	04/12/2018 23:33	WG1095247
Xylenes, Total	0.00619		0.00106	0.00300	1	04/12/2018 23:33	WG1095247
(S) Toluene-d8	*104*			*80.0-120*		*04/12/2018 23:33*	WG1095247
(S) Dibromofluoromethane	*88.7*			*76.0-123*		*04/12/2018 23:33*	WG1095247
(S) 4-Bromofluorobenzene	*98.7*			*80.0-120*		*04/12/2018 23:33*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.45		0.0247	0.100	1	04/11/2018 08:06	WG1095661
(S) o-Terphenyl	*102*			*31.0-160*		*04/11/2018 08:06*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4060		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:15	WG1096783

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	682		1.04	20.0	20	04/08/2018 09:16	WG1095127
Fluoride	0.934		0.00990	0.100	1	04/08/2018 08:39	WG1095127
Sulfate	1500		1.55	100	20	04/08/2018 09:16	WG1095127

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00729		0.000250	0.00200	1	04/15/2018 15:52	WG1095156
Arsenic,Dissolved	0.00774		0.000250	0.00200	1	04/16/2018 00:33	WG1095184
Barium	0.0206		0.000360	0.00500	1	04/15/2018 15:52	WG1095156
Barium,Dissolved	0.0206		0.000360	0.00500	1	04/16/2018 00:33	WG1095184
Calcium	329		0.0460	1.00	1	04/15/2018 15:52	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 15:52	WG1095156
Chromium,Dissolved	0.00773		0.000540	0.00200	1	04/16/2018 00:33	WG1095184
Iron	0.0230	J	0.0150	0.100	1	04/15/2018 15:52	WG1095156
Iron,Dissolved	0.0416	J	0.0150	0.100	1	04/16/2018 00:33	WG1095184
Lead	0.000304	J	0.000240	0.00200	1	04/15/2018 15:52	WG1095156
Lead,Dissolved	0.000558	J	0.000240	0.00200	1	04/16/2018 00:33	WG1095184
Manganese	1.03		0.000250	0.00500	1	04/15/2018 15:52	WG1095156
Manganese,Dissolved	0.996		0.000250	0.00500	1	04/16/2018 00:33	WG1095184
Potassium	0.571	J	0.0370	1.00	1	04/15/2018 15:52	WG1095156
Selenium	0.000470	J	0.000380	0.00200	1	04/15/2018 15:52	WG1095156
Selenium,Dissolved	0.000464	J	0.000380	0.00200	1	04/16/2018 00:33	WG1095184
Sodium	624		0.110	1.00	1	04/15/2018 15:52	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.111		0.0314	0.100	1	04/10/2018 14:44	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*102*			*77.0-122*		*04/10/2018 14:44*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 07:10	WG1095247
Benzene	U		0.000331	0.00100	1	04/08/2018 07:10	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 07:10	WG1095247
Bromoform	U		0.000469	0.00100	1	04/08/2018 07:10	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/08/2018 07:10	WG1095247
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 07:10	WG1095247
sec-Butylbenzene	0.00191		0.000365	0.00100	1	04/08/2018 07:10	WG1095247
Carbon disulfide	0.000311	J	0.000275	0.00100	1	04/08/2018 07:10	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 07:10	WG1095247

MW-41
Collected date/time: 04/04/18 15:20

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L983865

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 07:10	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 07:10	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/08/2018 07:10	WG1095247
Chloroform	U		0.000324	0.00500	1	04/08/2018 07:10	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/08/2018 07:10	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 07:10	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 07:10	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 07:10	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 07:10	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 07:10	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 07:10	WG1095247
1,2-Dichloropropane	0.00152		0.000306	0.00100	1	04/08/2018 07:10	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 07:10	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 07:10	WG1095247
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 07:10	WG1095247
Isopropylbenzene	0.00791		0.000326	0.00100	1	04/08/2018 07:10	WG1095247
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 07:10	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 07:10	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 07:10	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 07:10	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 07:10	WG1095247
Methyl tert-butyl ether	0.00796		0.000367	0.00100	1	04/08/2018 07:10	WG1095247
Naphthalene	U		0.00100	0.00500	1	04/08/2018 07:10	WG1095247
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 07:10	WG1095247
Styrene	U		0.000307	0.00100	1	04/08/2018 07:10	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 07:10	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 07:10	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 07:10	WG1095247
Toluene	U		0.000412	0.00100	1	04/08/2018 07:10	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 07:10	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 07:10	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 07:10	WG1095247
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 07:10	WG1095247
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 07:10	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 07:10	WG1095247
o-Xylene	U		0.000341	0.00100	1	04/08/2018 07:10	WG1095247
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 07:10	WG1095247
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 07:10	WG1095247
(S) Toluene-d8	*104*			*80.0-120*		*04/08/2018 07:10*	WG1095247
(S) Dibromofluoromethane	*90.0*			*76.0-123*		*04/08/2018 07:10*	WG1095247
(S) 4-Bromofluorobenzene	*103*			*80.0-120*		*04/08/2018 07:10*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.30		0.0247	0.100	1	04/11/2018 08:22	WG1095661
(S) o-Terphenyl	*96.9*			*31.0-160*		*04/11/2018 08:22*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2750		2.82	10.0	1	04/11/2018 15:48	WG1096158

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	04/12/2018 16:17	WG1096783

Sample Narrative:

L983865-46 WG1096783: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	353		1.04	20.0	20	04/08/2018 09:41	WG1095127
Fluoride	1.80		0.00990	0.100	1	04/08/2018 09:29	WG1095127
Sulfate	1170		1.55	100	20	04/08/2018 09:41	WG1095127

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00404		0.000250	0.00200	1	04/15/2018 15:57	WG1095156
Arsenic,Dissolved	0.00305		0.000250	0.00200	1	04/16/2018 00:37	WG1095184
Barium	0.0462		0.000360	0.00500	1	04/15/2018 15:57	WG1095156
Barium,Dissolved	0.0452		0.000360	0.00500	1	04/16/2018 00:37	WG1095184
Calcium	322		0.0460	1.00	1	04/15/2018 15:57	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 15:57	WG1095156
Chromium,Dissolved	0.000544	B J	0.000540	0.00200	1	04/16/2018 00:37	WG1095184
Iron	0.0199	J	0.0150	0.100	1	04/15/2018 15:57	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 00:37	WG1095184
Lead	0.00111	J	0.000240	0.00200	1	04/15/2018 15:57	WG1095156
Lead,Dissolved	0.000890	J	0.000240	0.00200	1	04/16/2018 00:37	WG1095184
Manganese	0.545		0.000250	0.00500	1	04/15/2018 15:57	WG1095156
Manganese,Dissolved	0.511		0.000250	0.00500	1	04/16/2018 00:37	WG1095184
Potassium	2.13		0.0370	1.00	1	04/15/2018 15:57	WG1095156
Selenium	0.000498	J	0.000380	0.00200	1	04/15/2018 15:57	WG1095156
Selenium,Dissolved	0.000670	J	0.000380	0.00200	1	04/16/2018 00:37	WG1095184
Sodium	351		0.110	1.00	1	04/15/2018 15:57	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	2.20		0.0314	0.100	1	04/13/2018 02:07	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*101*			*77.0-122*		*04/13/2018 02:07*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	0.0433	J	0.0100	0.0500	1	04/12/2018 23:53	WG1095247
Benzene	0.243		0.00331	0.0100	10	04/13/2018 11:56	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/12/2018 23:53	WG1095247
Bromoform	U		0.000469	0.00100	1	04/12/2018 23:53	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/12/2018 23:53	WG1095247
n-Butylbenzene	0.00212		0.000361	0.00100	1	04/12/2018 23:53	WG1095247

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.0194		0.000365	0.00100	1	04/12/2018 23:53	WG1095247
Carbon disulfide	U		0.000275	0.00100	1	04/12/2018 23:53	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/12/2018 23:53	WG1095247
Chlorobenzene	U		0.000348	0.00100	1	04/12/2018 23:53	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/12/2018 23:53	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/12/2018 23:53	WG1095247
Chloroform	U		0.000324	0.00500	1	04/12/2018 23:53	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/12/2018 23:53	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/12/2018 23:53	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/12/2018 23:53	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/12/2018 23:53	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/12/2018 23:53	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/12/2018 23:53	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/12/2018 23:53	WG1095247
1,2-Dichloropropane	U		0.000306	0.00100	1	04/12/2018 23:53	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/12/2018 23:53	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/12/2018 23:53	WG1095247
Ethylbenzene	0.00159		0.000384	0.00100	1	04/12/2018 23:53	WG1095247
Isopropylbenzene	0.100		0.000326	0.00100	1	04/12/2018 23:53	WG1095247
p-Isopropyltoluene	0.000962	J	0.000350	0.00100	1	04/12/2018 23:53	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/12/2018 23:53	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/12/2018 23:53	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/12/2018 23:53	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/12/2018 23:53	WG1095247
Methyl tert-butyl ether	0.00409		0.000367	0.00100	1	04/12/2018 23:53	WG1095247
Naphthalene	U		0.00100	0.00500	1	04/12/2018 23:53	WG1095247
n-Propylbenzene	0.0130		0.000349	0.00100	1	04/12/2018 23:53	WG1095247
Styrene	U		0.000307	0.00100	1	04/12/2018 23:53	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/12/2018 23:53	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/12/2018 23:53	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/12/2018 23:53	WG1095247
Toluene	0.00218		0.000412	0.00100	1	04/12/2018 23:53	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/12/2018 23:53	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/12/2018 23:53	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/12/2018 23:53	WG1095247
1,2,4-Trimethylbenzene	0.00314		0.000373	0.00100	1	04/12/2018 23:53	WG1095247
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/12/2018 23:53	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/12/2018 23:53	WG1095247
o-Xylene	U		0.000341	0.00100	1	04/12/2018 23:53	WG1095247
m&p-Xylene	0.0180		0.000719	0.00200	1	04/12/2018 23:53	WG1095247
Xylenes, Total	0.0180		0.00106	0.00300	1	04/12/2018 23:53	WG1095247
(S) Toluene-d8	*106*			*80.0-120*		*04/12/2018 23:53*	WG1095247
(S) Toluene-d8	*107*			*80.0-120*		*04/13/2018 11:56*	WG1095247
(S) Dibromofluoromethane	*95.9*			*76.0-123*		*04/13/2018 11:56*	WG1095247
(S) Dibromofluoromethane	*83.3*			*76.0-123*		*04/12/2018 23:53*	WG1095247
(S) 4-Bromofluorobenzene	*107*			*80.0-120*		*04/13/2018 11:56*	WG1095247
(S) 4-Bromofluorobenzene	*101*			*80.0-120*		*04/12/2018 23:53*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.31		0.0247	0.100	1	04/11/2018 12:40	WG1095661
(S) o-Terphenyl	*97.3*			*31.0-160*		*04/11/2018 12:40*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2990	J3	2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0310	J J6	0.0197	0.100	1	04/12/2018 16:18	WG1096783

Sample Narrative:

L983865-47 WG1096783: Low spike recovery, sample had some sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	372		1.04	20.0	20	04/08/2018 10:06	WG1095127
Fluoride	0.984		0.00990	0.100	1	04/08/2018 09:54	WG1095127
Sulfate	1180		1.55	100	20	04/08/2018 10:06	WG1095127

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00477		0.000250	0.00200	1	04/15/2018 16:02	WG1095156
Arsenic,Dissolved	0.00531		0.000250	0.00200	1	04/16/2018 00:42	WG1095184
Barium	0.0206		0.000360	0.00500	1	04/15/2018 16:02	WG1095156
Barium,Dissolved	0.0204		0.000360	0.00500	1	04/16/2018 00:42	WG1095184
Calcium	241		0.0460	1.00	1	04/15/2018 16:02	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 16:02	WG1095156
Chromium,Dissolved	0.000739	B J	0.000540	0.00200	1	04/16/2018 00:42	WG1095184
Iron	0.0216	J	0.0150	0.100	1	04/15/2018 16:02	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 00:42	WG1095184
Lead	0.000406	J	0.000240	0.00200	1	04/15/2018 16:02	WG1095156
Lead,Dissolved	0.000575	J	0.000240	0.00200	1	04/16/2018 00:42	WG1095184
Manganese	0.123		0.000250	0.00500	1	04/15/2018 16:02	WG1095156
Manganese,Dissolved	0.118		0.000250	0.00500	1	04/16/2018 00:42	WG1095184
Potassium	0.433	J	0.0370	1.00	1	04/15/2018 16:02	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 16:02	WG1095156
Selenium,Dissolved	0.000448	J	0.000380	0.00200	1	04/16/2018 00:42	WG1095184
Sodium	445		0.110	1.00	1	04/15/2018 16:02	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.626		0.0314	0.100	1	04/13/2018 02:31	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*106*			*77.0-122*		*04/13/2018 02:31*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/13/2018 00:13	WG1095247
Benzene	0.0488		0.000331	0.00100	1	04/13/2018 00:13	WG1095247
Bromodichloromethane	U		0.000380	0.00100	1	04/13/2018 00:13	WG1095247
Bromoform	U		0.000469	0.00100	1	04/13/2018 00:13	WG1095247
Bromomethane	U		0.000866	0.00500	1	04/13/2018 00:13	WG1095247
n-Butylbenzene	U		0.000361	0.00100	1	04/13/2018 00:13	WG1095247

MW-42

Collected date/time: 04/04/18 16:10

SAMPLE RESULTS - 47

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.00528		0.000365	0.00100	1	04/13/2018 00:13	WG1095247
Carbon disulfide	U		0.000275	0.00100	1	04/13/2018 00:13	WG1095247
Carbon tetrachloride	U		0.000379	0.00100	1	04/13/2018 00:13	WG1095247
Chlorobenzene	U		0.000348	0.00100	1	04/13/2018 00:13	WG1095247
Chlorodibromomethane	U		0.000327	0.00100	1	04/13/2018 00:13	WG1095247
Chloroethane	U		0.000453	0.00500	1	04/13/2018 00:13	WG1095247
Chloroform	U		0.000324	0.00500	1	04/13/2018 00:13	WG1095247
Chloromethane	U		0.000276	0.00250	1	04/13/2018 00:13	WG1095247
1,2-Dibromoethane	U		0.000381	0.00100	1	04/13/2018 00:13	WG1095247
1,1-Dichloroethane	U		0.000259	0.00100	1	04/13/2018 00:13	WG1095247
1,2-Dichloroethane	U		0.000361	0.00100	1	04/13/2018 00:13	WG1095247
1,1-Dichloroethene	U		0.000398	0.00100	1	04/13/2018 00:13	WG1095247
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/13/2018 00:13	WG1095247
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/13/2018 00:13	WG1095247
1,2-Dichloropropane	U		0.000306	0.00100	1	04/13/2018 00:13	WG1095247
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/13/2018 00:13	WG1095247
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/13/2018 00:13	WG1095247
Ethylbenzene	U		0.000384	0.00100	1	04/13/2018 00:13	WG1095247
Isopropylbenzene	0.0256		0.000326	0.00100	1	04/13/2018 00:13	WG1095247
p-Isopropyltoluene	U		0.000350	0.00100	1	04/13/2018 00:13	WG1095247
2-Butanone (MEK)	U		0.00393	0.0100	1	04/13/2018 00:13	WG1095247
2-Hexanone	U		0.00382	0.0100	1	04/13/2018 00:13	WG1095247
Methylene Chloride	U		0.00100	0.00500	1	04/13/2018 00:13	WG1095247
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/13/2018 00:13	WG1095247
Methyl tert-butyl ether	0.00598		0.000367	0.00100	1	04/13/2018 00:13	WG1095247
Naphthalene	U		0.00100	0.00500	1	04/13/2018 00:13	WG1095247
n-Propylbenzene	0.00300		0.000349	0.00100	1	04/13/2018 00:13	WG1095247
Styrene	U		0.000307	0.00100	1	04/13/2018 00:13	WG1095247
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/13/2018 00:13	WG1095247
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/13/2018 00:13	WG1095247
Tetrachloroethene	U		0.000372	0.00100	1	04/13/2018 00:13	WG1095247
Toluene	0.000959	J	0.000412	0.00100	1	04/13/2018 00:13	WG1095247
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/13/2018 00:13	WG1095247
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/13/2018 00:13	WG1095247
Trichloroethene	U		0.000398	0.00100	1	04/13/2018 00:13	WG1095247
1,2,4-Trimethylbenzene	0.00362		0.000373	0.00100	1	04/13/2018 00:13	WG1095247
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/13/2018 00:13	WG1095247
Vinyl chloride	U		0.000259	0.00100	1	04/13/2018 00:13	WG1095247
o-Xylene	U		0.000341	0.00100	1	04/13/2018 00:13	WG1095247
m&p-Xylene	0.00420		0.000719	0.00200	1	04/13/2018 00:13	WG1095247
Xylenes, Total	0.00420		0.00106	0.00300	1	04/13/2018 00:13	WG1095247
(S) Toluene-d8	*103*			*80.0-120*		*04/13/2018 00:13*	WG1095247
(S) Dibromofluoromethane	*86.9*			*76.0-123*		*04/13/2018 00:13*	WG1095247
(S) 4-Bromofluorobenzene	*98.7*			*80.0-120*		*04/13/2018 00:13*	WG1095247

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.98		0.0247	0.100	1	04/11/2018 12:56	WG1095661
(S) o-Terphenyl	*94.4*			*31.0-160*		*04/11/2018 12:56*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3910		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:34	WG1096784

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	332		1.04	20.0	20	04/08/2018 10:31	WG1095127
Fluoride	1.29		0.00990	0.100	1	04/08/2018 10:19	WG1095127
Sulfate	2120		3.87	250	50	04/11/2018 09:17	WG1095833

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00154	J	0.000250	0.00200	1	04/15/2018 16:06	WG1095156
Arsenic,Dissolved	0.00138	J	0.000250	0.00200	1	04/16/2018 00:47	WG1095184
Barium	0.0192		0.000360	0.00500	1	04/15/2018 16:06	WG1095156
Barium,Dissolved	0.0197		0.000360	0.00500	1	04/16/2018 00:47	WG1095184
Calcium	501		0.0460	1.00	1	04/15/2018 16:06	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 16:06	WG1095156
Chromium,Dissolved	0.00128	B J	0.000540	0.00200	1	04/16/2018 00:47	WG1095184
Iron	0.0804	J	0.0150	0.100	1	04/15/2018 16:06	WG1095156
Iron,Dissolved	0.0666	J	0.0150	0.100	1	04/16/2018 00:47	WG1095184
Lead	0.000379	J	0.000240	0.00200	1	04/15/2018 16:06	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 00:47	WG1095184
Manganese	0.483		0.000250	0.00500	1	04/15/2018 16:06	WG1095156
Manganese,Dissolved	0.474		0.000250	0.00500	1	04/16/2018 00:47	WG1095184
Potassium	1.61		0.0370	1.00	1	04/15/2018 16:06	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 16:06	WG1095156
Selenium,Dissolved	U		0.000380	0.00200	1	04/16/2018 00:47	WG1095184
Sodium	298		0.110	1.00	1	04/15/2018 16:06	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 16:16	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*99.4*			*77.0-122*		*04/10/2018 16:16*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 07:45	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 07:45	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 07:45	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 07:45	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 07:45	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 07:45	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 07:45	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 07:45	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 07:45	WG1095249

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 07:45	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 07:45	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 07:45	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 07:45	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 07:45	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 07:45	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 07:45	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 07:45	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 07:45	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 07:45	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 07:45	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 07:45	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 07:45	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 07:45	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 07:45	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 07:45	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 07:45	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 07:45	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 07:45	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 07:45	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 07:45	WG1095249
Methyl tert-butyl ether	0.000482	J	0.000367	0.00100	1	04/08/2018 07:45	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 07:45	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 07:45	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 07:45	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 07:45	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 07:45	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 07:45	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 07:45	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 07:45	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 07:45	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 07:45	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 07:45	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 07:45	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 07:45	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 07:45	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 07:45	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 07:45	WG1095249
(S) Toluene-d8	*101*			*80.0-120*		*04/08/2018 07:45*	WG1095249
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/08/2018 07:45*	WG1095249
(S) 4-Bromofluorobenzene	*91.0*			*80.0-120*		*04/08/2018 07:45*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.03		0.0247	0.100	1	04/11/2018 13:13	WG1095661
(S) o-Terphenyl	*102*			*31.0-160*		*04/11/2018 13:13*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4240		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.894	J6	0.0197	0.100	1	04/12/2018 16:36	WG1096784

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	43.5		0.0519	1.00	1	04/08/2018 10:43	WG1095127
Fluoride	4.89		0.00990	0.100	1	04/08/2018 10:43	WG1095127
Sulfate	2660		3.87	250	50	04/11/2018 01:38	WG1095833

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00922		0.000250	0.00200	1	04/15/2018 16:11	WG1095156
Arsenic,Dissolved	0.00858		0.000250	0.00200	1	04/16/2018 00:52	WG1095184
Barium	0.0130		0.000360	0.00500	1	04/15/2018 16:11	WG1095156
Barium,Dissolved	0.0130		0.000360	0.00500	1	04/16/2018 00:52	WG1095184
Calcium	546		0.0460	1.00	1	04/15/2018 16:11	WG1095156
Chromium	0.000754	B J	0.000540	0.00200	1	04/15/2018 16:11	WG1095156
Chromium,Dissolved	0.000761	B J	0.000540	0.00200	1	04/16/2018 00:52	WG1095184
Iron	0.0239	J	0.0150	0.100	1	04/15/2018 16:11	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 00:52	WG1095184
Lead	0.000343	J	0.000240	0.00200	1	04/15/2018 16:11	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 00:52	WG1095184
Manganese	0.201		0.000250	0.00500	1	04/15/2018 16:11	WG1095156
Manganese,Dissolved	0.194		0.000250	0.00500	1	04/16/2018 00:52	WG1095184
Potassium	0.788	J	0.0370	1.00	1	04/15/2018 16:11	WG1095156
Selenium	0.00643		0.000380	0.00200	1	04/15/2018 16:11	WG1095156
Selenium,Dissolved	0.00691		0.000380	0.00200	1	04/16/2018 00:52	WG1095184
Sodium	259		0.110	1.00	1	04/15/2018 16:11	WG1095156

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 08:04	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 08:04	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 08:04	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 08:04	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 08:04	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 08:04	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 08:04	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 08:04	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 08:04	WG1095249
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 08:04	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 08:04	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 08:04	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 08:04	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 08:04	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 08:04	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 08:04	WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 08:04	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 08:04	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 08:04	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 08:04	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 08:04	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 08:04	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 08:04	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 08:04	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 08:04	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 08:04	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 08:04	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 08:04	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 08:04	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 08:04	WG1095249
Methyl tert-butyl ether	0.00172		0.000367	0.00100	1	04/08/2018 08:04	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 08:04	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 08:04	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 08:04	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 08:04	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 08:04	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 08:04	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 08:04	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 08:04	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 08:04	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 08:04	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 08:04	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 08:04	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 08:04	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 08:04	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 08:04	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 08:04	WG1095249
(S) Toluene-d8	*103*			*80.0-120*		*04/08/2018 08:04*	WG1095249
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/08/2018 08:04*	WG1095249
(S) 4-Bromofluorobenzene	*92.0*			*80.0-120*		*04/08/2018 08:04*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.350		0.0247	0.100	1	04/11/2018 13:30	WG1095661
(S) o-Terphenyl	*96.6*			*31.0-160*		*04/11/2018 13:30*	WG1095661

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1770		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:38	WG1096784

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	258		0.260	5.00	5	04/08/2018 11:58	WG1095127
Fluoride	0.884		0.00990	0.100	1	04/08/2018 11:08	WG1095127
Sulfate	471		0.387	25.0	5	04/08/2018 11:58	WG1095127

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00154	J	0.000250	0.00200	1	04/15/2018 16:16	WG1095156
Arsenic,Dissolved	0.00135	J	0.000250	0.00200	1	04/16/2018 00:56	WG1095184
Barium	0.0691		0.000360	0.00500	1	04/15/2018 16:16	WG1095156
Barium,Dissolved	0.0690		0.000360	0.00500	1	04/16/2018 00:56	WG1095184
Calcium	229		0.0460	1.00	1	04/15/2018 16:16	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 16:16	WG1095156
Chromium,Dissolved	U		0.000540	0.00200	1	04/16/2018 00:56	WG1095184
Iron	0.0155	J	0.0150	0.100	1	04/15/2018 16:16	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 00:56	WG1095184
Lead	U		0.000240	0.00200	1	04/15/2018 16:16	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 00:56	WG1095184
Manganese	0.0556		0.000250	0.00500	1	04/15/2018 16:16	WG1095156
Manganese,Dissolved	0.0559		0.000250	0.00500	1	04/16/2018 00:56	WG1095184
Potassium	0.602	J	0.0370	1.00	1	04/15/2018 16:16	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 16:16	WG1095156
Selenium,Dissolved	0.000786	J	0.000380	0.00200	1	04/16/2018 00:56	WG1095184
Sodium	163		0.110	1.00	1	04/15/2018 16:16	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 16:46	WG1095732
(S) a,a,a-Trifluorotoluene(FID)	*99.2*			*77.0-122*		*04/10/2018 16:46*	WG1095732

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 08:23	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 08:23	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 08:23	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 08:23	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 08:23	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 08:23	WG1095249
sec-Butylbenzene	0.00305		0.000365	0.00100	1	04/08/2018 08:23	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 08:23	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 08:23	WG1095249

MW-95

Collected date/time: 04/04/18 08:55

SAMPLE RESULTS - 50

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 08:23	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 08:23	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 08:23	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 08:23	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 08:23	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 08:23	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 08:23	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 08:23	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 08:23	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 08:23	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 08:23	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 08:23	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 08:23	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 08:23	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 08:23	WG1095249
Isopropylbenzene	0.0122		0.000326	0.00100	1	04/08/2018 08:23	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 08:23	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 08:23	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 08:23	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 08:23	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 08:23	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 08:23	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 08:23	WG1095249
n-Propylbenzene	0.000352	J	0.000349	0.00100	1	04/08/2018 08:23	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 08:23	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 08:23	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 08:23	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 08:23	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 08:23	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 08:23	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 08:23	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 08:23	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 08:23	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 08:23	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 08:23	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 08:23	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 08:23	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 08:23	WG1095249
(S) Toluene-d8	*101*			*80.0-120*		*04/08/2018 08:23*	WG1095249
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/08/2018 08:23*	WG1095249
(S) 4-Bromofluorobenzene	*92.7*			*80.0-120*		*04/08/2018 08:23*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.68		0.0247	0.100	1	04/11/2018 13:46	WG1095661
(S) o-Terphenyl	*101*			*31.0-160*		*04/11/2018 13:46*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1820		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	04/12/2018 16:44	WG1096784

Sample Narrative:

L983865-51 WG1096784: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	217		0.260	5.00	5	04/08/2018 12:48	WG1095127
Fluoride	1.22		0.00990	0.100	1	04/08/2018 12:35	WG1095127
Sulfate	475		0.387	25.0	5	04/08/2018 12:48	WG1095127

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0174		0.000250	0.00200	1	04/15/2018 16:33	WG1095156
Arsenic,Dissolved	0.00798		0.000250	0.00200	1	04/16/2018 01:01	WG1095184
Barium	0.144		0.000360	0.00500	1	04/15/2018 16:33	WG1095156
Barium,Dissolved	0.138		0.000360	0.00500	1	04/16/2018 01:01	WG1095184
Calcium	295		0.0460	1.00	1	04/15/2018 16:33	WG1095156
Chromium	0.00434	B	0.000540	0.00200	1	04/15/2018 16:33	WG1095156
Chromium,Dissolved	0.00243	B	0.000540	0.00200	1	04/16/2018 01:01	WG1095184
Iron	2.92		0.0150	0.100	1	04/15/2018 16:33	WG1095156
Iron,Dissolved	0.0450	J	0.0150	0.100	1	04/16/2018 01:01	WG1095184
Lead	0.000599	J	0.000240	0.00200	1	04/15/2018 16:33	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 01:01	WG1095184
Manganese	0.106		0.000250	0.00500	1	04/15/2018 16:33	WG1095156
Manganese,Dissolved	0.0650		0.000250	0.00500	1	04/16/2018 01:01	WG1095184
Potassium	2.54		0.0370	1.00	1	04/15/2018 16:33	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 16:33	WG1095156
Selenium,Dissolved	0.000791	J	0.000380	0.00200	1	04/16/2018 01:01	WG1095184
Sodium	149		0.110	1.00	1	04/15/2018 16:33	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.177		0.0314	0.100	1	04/12/2018 18:00	WG1095828
(S) a,a,a-Trifluorotoluene(FID)	*96.5*			*77.0-122*		*04/12/2018 18:00*	WG1095828

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/10/2018 22:24	WG1095249
Benzene	0.0319		0.000331	0.00100	1	04/10/2018 22:24	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/10/2018 22:24	WG1095249
Bromoform	U		0.000469	0.00100	1	04/10/2018 22:24	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/10/2018 22:24	WG1095249
n-Butylbenzene	0.00102		0.000361	0.00100	1	04/10/2018 22:24	WG1095249

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
sec-Butylbenzene	0.00386		0.000365	0.00100	1	04/10/2018 22:24	WG1095249
Carbon disulfide	0.000556	J	0.000275	0.00100	1	04/10/2018 22:24	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/10/2018 22:24	WG1095249
Chlorobenzene	U		0.000348	0.00100	1	04/10/2018 22:24	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/10/2018 22:24	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/10/2018 22:24	WG1095249
Chloroform	U		0.000324	0.00500	1	04/10/2018 22:24	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/10/2018 22:24	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/10/2018 22:24	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/10/2018 22:24	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/10/2018 22:24	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/10/2018 22:24	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/10/2018 22:24	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/10/2018 22:24	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/10/2018 22:24	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/10/2018 22:24	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/10/2018 22:24	WG1095249
Ethylbenzene	0.00132		0.000384	0.00100	1	04/10/2018 22:24	WG1095249
Isopropylbenzene	0.00650		0.000326	0.00100	1	04/10/2018 22:24	WG1095249
p-Isopropyltoluene	0.000872	J	0.000350	0.00100	1	04/10/2018 22:24	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/10/2018 22:24	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/10/2018 22:24	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/10/2018 22:24	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/10/2018 22:24	WG1095249
Methyl tert-butyl ether	0.0378		0.000367	0.00100	1	04/10/2018 22:24	WG1095249
Naphthalene	0.00204	J	0.00100	0.00500	1	04/10/2018 22:24	WG1095249
n-Propylbenzene	0.00280		0.000349	0.00100	1	04/10/2018 22:24	WG1095249
Styrene	U		0.000307	0.00100	1	04/10/2018 22:24	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/10/2018 22:24	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/10/2018 22:24	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/10/2018 22:24	WG1095249
Toluene	0.00106		0.000412	0.00100	1	04/10/2018 22:24	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/10/2018 22:24	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/10/2018 22:24	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/10/2018 22:24	WG1095249
1,2,4-Trimethylbenzene	0.00502		0.000373	0.00100	1	04/10/2018 22:24	WG1095249
1,3,5-Trimethylbenzene	0.000415	J	0.000387	0.00100	1	04/10/2018 22:24	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/10/2018 22:24	WG1095249
o-Xylene	0.00114		0.000341	0.00100	1	04/10/2018 22:24	WG1095249
m&p-Xylene	0.00431		0.000719	0.00200	1	04/10/2018 22:24	WG1095249
Xylenes, Total	0.00545		0.00106	0.00300	1	04/10/2018 22:24	WG1095249
(S) Toluene-d8	*109*			*80.0-120*		*04/10/2018 22:24*	WG1095249
(S) Dibromofluoromethane	*99.2*			*76.0-123*		*04/10/2018 22:24*	WG1095249
(S) 4-Bromofluorobenzene	*105*			*80.0-120*		*04/10/2018 22:24*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	11.3		0.124	0.500	5	04/13/2018 06:17	WG1095661
(S) o-Terphenyl	*1600*	J1		*31.0-160*		*04/13/2018 06:17*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2150		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:45	WG1096784

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	191		1.04	20.0	20	04/08/2018 13:12	WG1095127
Fluoride	0.521		0.00990	0.100	1	04/08/2018 13:00	WG1095127
Sulfate	1070		1.55	100	20	04/08/2018 13:12	WG1095127

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00257		0.000250	0.00200	1	04/15/2018 16:38	WG1095156
Arsenic,Dissolved	0.00243		0.000250	0.00200	1	04/16/2018 01:06	WG1095184
Barium	0.0245		0.000360	0.00500	1	04/15/2018 16:38	WG1095156
Barium,Dissolved	0.0240		0.000360	0.00500	1	04/16/2018 01:06	WG1095184
Calcium	329		0.0460	1.00	1	04/15/2018 16:38	WG1095156
Chromium	0.00532	B	0.000540	0.00200	1	04/15/2018 16:38	WG1095156
Chromium,Dissolved	U		0.000540	0.00200	1	04/16/2018 01:06	WG1095184
Iron	0.550		0.0150	0.100	1	04/15/2018 16:38	WG1095156
Iron,Dissolved	0.489		0.0150	0.100	1	04/16/2018 01:06	WG1095184
Lead	U		0.000240	0.00200	1	04/15/2018 16:38	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 01:06	WG1095184
Manganese	0.892		0.000250	0.00500	1	04/15/2018 16:38	WG1095156
Manganese,Dissolved	0.935		0.000250	0.00500	1	04/16/2018 01:06	WG1095184
Potassium	0.629	J	0.0370	1.00	1	04/15/2018 16:38	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 16:38	WG1095156
Selenium,Dissolved	U		0.000380	0.00200	1	04/16/2018 01:06	WG1095184
Sodium	160		0.110	1.00	1	04/15/2018 16:38	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.756		0.0314	0.100	1	04/10/2018 19:47	WG1095828
(S) a,a,a-Trifluorotoluene(FID)	*92.8*			*77.0-122*		*04/10/2018 19:47*	WG1095828

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 09:01	WG1095249
Benzene	0.00996		0.000331	0.00100	1	04/08/2018 09:01	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 09:01	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 09:01	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 09:01	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 09:01	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 09:01	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 09:01	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 09:01	WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 09:01	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 09:01	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 09:01	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 09:01	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 09:01	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 09:01	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 09:01	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 09:01	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 09:01	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 09:01	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 09:01	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 09:01	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 09:01	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 09:01	WG1095249
Ethylbenzene	0.00667		0.000384	0.00100	1	04/08/2018 09:01	WG1095249
Isopropylbenzene	0.000449	J	0.000326	0.00100	1	04/08/2018 09:01	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 09:01	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 09:01	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 09:01	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 09:01	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 09:01	WG1095249
Methyl tert-butyl ether	0.0120		0.000367	0.00100	1	04/08/2018 09:01	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 09:01	WG1095249
n-Propylbenzene	0.000439	J	0.000349	0.00100	1	04/08/2018 09:01	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 09:01	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 09:01	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 09:01	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 09:01	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 09:01	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 09:01	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 09:01	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 09:01	WG1095249
1,2,4-Trimethylbenzene	0.00274		0.000373	0.00100	1	04/08/2018 09:01	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 09:01	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 09:01	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 09:01	WG1095249
m&p-Xylene	0.00901		0.000719	0.00200	1	04/08/2018 09:01	WG1095249
Xylenes, Total	0.00901		0.00106	0.00300	1	04/08/2018 09:01	WG1095249
(S) Toluene-d8	*99.2*			*80.0-120*		*04/08/2018 09:01*	WG1095249
(S) Dibromofluoromethane	*99.3*			*76.0-123*		*04/08/2018 09:01*	WG1095249
(S) 4-Bromofluorobenzene	*91.3*			*80.0-120*		*04/08/2018 09:01*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.174		0.0247	0.100	1	04/11/2018 14:20	WG1095661
(S) o-Terphenyl	*94.1*			*31.0-160*		*04/11/2018 14:20*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4430		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	3.85		0.0985	0.500	5	04/12/2018 16:46	WG1096784

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	464		1.04	20.0	20	04/08/2018 13:37	WG1095127
Fluoride	1.08		0.00990	0.100	1	04/08/2018 13:25	WG1095127
Sulfate	2760		3.87	250	50	04/11/2018 01:53	WG1095833

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00465		0.000250	0.00200	1	04/15/2018 14:57	WG1095156
Arsenic,Dissolved	0.00435		0.000250	0.00200	1	04/16/2018 01:21	WG1095184
Barium	0.0100		0.000360	0.00500	1	04/15/2018 14:57	WG1095156
Barium,Dissolved	0.00947		0.000360	0.00500	1	04/16/2018 01:21	WG1095184
Calcium	574	V	0.0460	1.00	1	04/15/2018 14:57	WG1095156
Chromium	0.00883	J3 J5	0.000540	0.00200	1	04/15/2018 14:57	WG1095156
Chromium,Dissolved	0.000575	B J	0.000540	0.00200	1	04/16/2018 01:21	WG1095184
Iron	0.0683	J	0.0150	0.100	1	04/15/2018 14:57	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 01:21	WG1095184
Lead	0.000274	J	0.000240	0.00200	1	04/15/2018 14:57	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 01:21	WG1095184
Manganese	0.0135		0.000250	0.00500	1	04/15/2018 14:57	WG1095156
Manganese,Dissolved	0.0110		0.000250	0.00500	1	04/16/2018 01:21	WG1095184
Potassium	1.71		0.0370	1.00	1	04/15/2018 14:57	WG1095156
Selenium	0.00665		0.000380	0.00200	1	04/15/2018 14:57	WG1095156
Selenium,Dissolved	0.00638		0.000380	0.00200	1	04/16/2018 01:21	WG1095184
Sodium	271	V	0.110	1.00	1	04/15/2018 14:57	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 20:09	WG1095828
(S) a,a,a-Trifluorotoluene(FID)	*100*			*77.0-122*		*04/10/2018 20:09*	WG1095828

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 09:20	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 09:20	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 09:20	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 09:20	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 09:20	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 09:20	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 09:20	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 09:20	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 09:20	WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 09:20	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 09:20	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 09:20	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 09:20	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 09:20	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 09:20	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 09:20	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 09:20	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 09:20	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 09:20	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 09:20	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 09:20	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 09:20	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 09:20	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 09:20	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 09:20	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 09:20	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 09:20	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 09:20	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 09:20	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 09:20	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 09:20	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 09:20	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 09:20	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 09:20	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 09:20	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 09:20	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 09:20	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 09:20	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 09:20	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 09:20	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 09:20	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 09:20	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 09:20	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 09:20	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 09:20	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 09:20	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 09:20	WG1095249
(S) Toluene-d8	*102*			*80.0-120*		*04/08/2018 09:20*	WG1095249
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/08/2018 09:20*	WG1095249
(S) 4-Bromofluorobenzene	*91.5*			*80.0-120*		*04/08/2018 09:20*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0427	J	0.0247	0.100	1	04/11/2018 16:56	WG1095661
(S) o-Terphenyl	*90.2*			*31.0-160*		*04/11/2018 16:56*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3510		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:47	WG1096784

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.180	0.500	100	04/09/2018 16:19	WG1095350

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	231		1.04	20.0	20	04/08/2018 14:27	WG1095127
Fluoride	0.969		0.00990	0.100	1	04/08/2018 14:14	WG1095127
Sulfate	1980		3.87	250	50	04/11/2018 02:08	WG1095833

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/09/2018 15:51	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:55	WG1095576

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.531		0.0126	0.200	1	04/09/2018 17:07	WG1095148
Boron,Dissolved	0.514		0.0126	0.200	1	04/11/2018 16:31	WG1095851

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00863		0.000250	0.00200	1	04/15/2018 16:43	WG1095156
Arsenic,Dissolved	0.00472		0.000250	0.00200	1	04/16/2018 01:26	WG1095184
Barium	0.0188		0.000360	0.00500	1	04/15/2018 16:43	WG1095156
Barium,Dissolved	0.0201		0.000360	0.00500	1	04/16/2018 01:26	WG1095184
Cadmium	U		0.000160	0.00100	1	04/15/2018 16:43	WG1095156
Cadmium,Dissolved	U		0.000160	0.00100	1	04/16/2018 20:35	WG1095184
Calcium	447		0.0460	1.00	1	04/15/2018 16:43	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 16:43	WG1095156
Chromium,Dissolved	0.00120	B J	0.000540	0.00200	1	04/16/2018 01:26	WG1095184
Cobalt	U		0.000260	0.00200	1	04/15/2018 16:43	WG1095156
Cobalt,Dissolved	U		0.000260	0.00200	1	04/16/2018 01:26	WG1095184
Iron	0.0606	J	0.0150	0.100	1	04/15/2018 16:43	WG1095156
Iron,Dissolved	0.0837	J	0.0150	0.100	1	04/16/2018 01:26	WG1095184
Lead	0.000350	J	0.000240	0.00200	1	04/15/2018 16:43	WG1095156
Lead,Dissolved	0.000771	J	0.000240	0.00200	1	04/16/2018 01:26	WG1095184
Manganese	0.279		0.000250	0.00500	1	04/15/2018 16:43	WG1095156
Manganese,Dissolved	0.292		0.000250	0.00500	1	04/16/2018 01:26	WG1095184
Nickel	0.00260		0.000350	0.00200	1	04/15/2018 16:43	WG1095156
Nickel,Dissolved	0.00124	J	0.000350	0.00200	1	04/16/2018 01:26	WG1095184

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Potassium	0.746	J	0.0370	1.00	1	04/15/2018 16:43	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 16:43	WG1095156
Selenium,Dissolved	U		0.000380	0.00200	1	04/16/2018 01:26	WG1095184
Sodium	218		0.110	1.00	1	04/15/2018 16:43	WG1095156
Uranium	0.00211	J	0.000330	0.0100	1	04/15/2018 16:43	WG1095156
Uranium,Dissolved	0.00209	J	0.000330	0.0100	1	04/16/2018 01:26	WG1095184
Vanadium	0.000362	J	0.000180	0.00500	1	04/15/2018 16:43	WG1095156
Vanadium,Dissolved	0.000377	J	0.000180	0.00500	1	04/16/2018 01:26	WG1095184

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.347		0.0314	0.100	1	04/10/2018 20:30	WG1095828
(S) a,a,a-Trifluorotoluene(FID)	*97.5*			*77.0-122*		*04/10/2018 20:30*	WG1095828

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 09:39	WG1095249
Benzene	0.00176		0.000331	0.00100	1	04/08/2018 09:39	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 09:39	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 09:39	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 09:39	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 09:39	WG1095249
sec-Butylbenzene	0.00379		0.000365	0.00100	1	04/08/2018 09:39	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 09:39	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 09:39	WG1095249
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 09:39	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 09:39	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 09:39	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 09:39	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 09:39	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 09:39	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 09:39	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 09:39	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 09:39	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 09:39	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 09:39	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 09:39	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 09:39	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 09:39	WG1095249
Ethylbenzene	0.000433	J	0.000384	0.00100	1	04/08/2018 09:39	WG1095249
Isopropylbenzene	0.0200		0.000326	0.00100	1	04/08/2018 09:39	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 09:39	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 09:39	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 09:39	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 09:39	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 09:39	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 09:39	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 09:39	WG1095249
n-Propylbenzene	0.000948	J	0.000349	0.00100	1	04/08/2018 09:39	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 09:39	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 09:39	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 09:39	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 09:39	WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Toluene	U		0.000412	0.00100	1	04/08/2018 09:39	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 09:39	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 09:39	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 09:39	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 09:39	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 09:39	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 09:39	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 09:39	WG1095249
m&p-Xylene	0.00196	J	0.000719	0.00200	1	04/08/2018 09:39	WG1095249
Xylenes, Total	0.00196	J	0.00106	0.00300	1	04/08/2018 09:39	WG1095249
(S) Toluene-d8	*101*			*80.0-120*		*04/08/2018 09:39*	WG1095249
(S) Dibromofluoromethane	*99.7*			*76.0-123*		*04/08/2018 09:39*	WG1095249
(S) 4-Bromofluorobenzene	*90.6*			*80.0-120*		*04/08/2018 09:39*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.688		0.0247	0.100	1	04/11/2018 17:22	WG1095661
(S) o-Terphenyl	*102*			*31.0-160*		*04/11/2018 17:22*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3480		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	7.88		0.0985	0.500	5	04/12/2018 16:48	WG1096784

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 16:20	WG1095350

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	129		1.04	20.0	20	04/08/2018 14:52	WG1095127
Fluoride	0.377		0.00990	0.100	1	04/08/2018 14:39	WG1095127
Sulfate	2280		3.87	250	50	04/11/2018 02:24	WG1095833

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/09/2018 15:53	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:57	WG1095576

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.607		0.0126	0.200	1	04/09/2018 17:11	WG1095148
Boron,Dissolved	0.573		0.0126	0.200	1	04/11/2018 16:35	WG1095851

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00174	J	0.000250	0.00200	1	04/15/2018 16:47	WG1095156
Arsenic,Dissolved	0.00159	J	0.000250	0.00200	1	04/16/2018 01:31	WG1095184
Barium	0.0102		0.000360	0.00500	1	04/15/2018 16:47	WG1095156
Barium,Dissolved	0.00958		0.000360	0.00500	1	04/16/2018 01:31	WG1095184
Cadmium	U		0.000160	0.00100	1	04/15/2018 16:47	WG1095156
Cadmium,Dissolved	U		0.000160	0.00100	1	04/16/2018 21:06	WG1095184
Calcium	581		0.0460	1.00	1	04/15/2018 16:47	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 16:47	WG1095156
Chromium,Dissolved	0.000621	B J	0.000540	0.00200	1	04/16/2018 01:31	WG1095184
Cobalt	U		0.000260	0.00200	1	04/15/2018 16:47	WG1095156
Cobalt,Dissolved	U		0.000260	0.00200	1	04/16/2018 01:31	WG1095184
Iron	0.0363	J	0.0150	0.100	1	04/15/2018 16:47	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 01:31	WG1095184
Lead	U		0.000240	0.00200	1	04/15/2018 16:47	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 01:31	WG1095184
Manganese	0.00120	J	0.000250	0.00500	1	04/15/2018 16:47	WG1095156
Manganese,Dissolved	0.000411	B J	0.000250	0.00500	1	04/16/2018 01:31	WG1095184
Nickel	0.000364	J	0.000350	0.00200	1	04/15/2018 16:47	WG1095156
Nickel,Dissolved	0.000357	J	0.000350	0.00200	1	04/16/2018 01:31	WG1095184

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	0.745	J	0.0370	1.00	1	04/15/2018 16:47	WG1095156
Selenium	0.00329		0.000380	0.00200	1	04/15/2018 16:47	WG1095156
Selenium,Dissolved	0.00298		0.000380	0.00200	1	04/16/2018 01:31	WG1095184
Sodium	144		0.110	1.00	1	04/15/2018 16:47	WG1095156
Uranium	0.0304		0.000330	0.0100	1	04/15/2018 16:47	WG1095156
Uranium,Dissolved	0.0301		0.000330	0.0100	1	04/16/2018 01:31	WG1095184
Vanadium	0.0125		0.000180	0.00500	1	04/15/2018 16:47	WG1095156
Vanadium,Dissolved	0.0125		0.000180	0.00500	1	04/16/2018 01:31	WG1095184

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/10/2018 20:52	WG1095828
(S) a,a,a-Trifluorotoluene(FID)	*98.8*			*77.0-122*		*04/10/2018 20:52*	WG1095828

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 09:58	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 09:58	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 09:58	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 09:58	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 09:58	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 09:58	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 09:58	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 09:58	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 09:58	WG1095249
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 09:58	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 09:58	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 09:58	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 09:58	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 09:58	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 09:58	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 09:58	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 09:58	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 09:58	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 09:58	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 09:58	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 09:58	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 09:58	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 09:58	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 09:58	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 09:58	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 09:58	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 09:58	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 09:58	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 09:58	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 09:58	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 09:58	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 09:58	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 09:58	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 09:58	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 09:58	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 09:58	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 09:58	WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Toluene	U		0.000412	0.00100	1	04/08/2018 09:58	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 09:58	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 09:58	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 09:58	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 09:58	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 09:58	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 09:58	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 09:58	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 09:58	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 09:58	WG1095249
(S) Toluene-d8	*100*			*80.0-120*		*04/08/2018 09:58*	WG1095249
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/08/2018 09:58*	WG1095249
(S) 4-Bromofluorobenzene	*93.0*			*80.0-120*		*04/08/2018 09:58*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/11/2018 17:39	WG1095661
(S) o-Terphenyl	*88.8*			*31.0-160*		*04/11/2018 17:39*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	U		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:49	WG1096784

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.0846	J	0.0519	1.00	1	04/08/2018 15:04	WG1095127
Fluoride	U		0.00990	0.100	1	04/08/2018 15:04	WG1095127
Sulfate	0.981	J	0.0774	5.00	1	04/08/2018 15:04	WG1095127

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	04/15/2018 16:52	WG1095156
Arsenic,Dissolved	U		0.000250	0.00200	1	04/16/2018 01:35	WG1095184
Barium	U		0.000360	0.00500	1	04/15/2018 16:52	WG1095156
Barium,Dissolved	U		0.000360	0.00500	1	04/16/2018 01:35	WG1095184
Calcium	0.0579	J	0.0460	1.00	1	04/15/2018 16:52	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 16:52	WG1095156
Chromium,Dissolved	U		0.000540	0.00200	1	04/16/2018 01:35	WG1095184
Iron	U		0.0150	0.100	1	04/15/2018 16:52	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 01:35	WG1095184
Lead	U		0.000240	0.00200	1	04/15/2018 16:52	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 01:35	WG1095184
Manganese	U		0.000250	0.00500	1	04/15/2018 16:52	WG1095156
Manganese,Dissolved	U		0.000250	0.00500	1	04/16/2018 01:35	WG1095184
Potassium	U		0.0370	1.00	1	04/15/2018 16:52	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 16:52	WG1095156
Selenium,Dissolved	U		0.000380	0.00200	1	04/16/2018 01:35	WG1095184
Sodium	0.225	J	0.110	1.00	1	04/15/2018 16:52	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/12/2018 06:38	WG1095836
(S) a,a,a-Trifluorotoluene(FID)	*97.8*			*77.0-122*		*04/12/2018 06:38*	WG1095836

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 10:17	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 10:17	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 10:17	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 10:17	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 10:17	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 10:17	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 10:17	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 10:17	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 10:17	WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 10:17	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 10:17	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 10:17	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 10:17	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 10:17	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 10:17	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 10:17	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 10:17	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 10:17	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 10:17	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 10:17	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 10:17	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 10:17	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 10:17	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 10:17	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 10:17	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 10:17	WG1095249
2-Butanone (MEK)	0.00850	J	0.00393	0.0100	1	04/08/2018 10:17	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 10:17	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 10:17	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 10:17	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 10:17	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 10:17	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 10:17	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 10:17	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 10:17	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 10:17	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 10:17	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 10:17	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 10:17	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 10:17	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 10:17	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 10:17	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 10:17	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 10:17	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 10:17	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 10:17	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 10:17	WG1095249
(S) Toluene-d8	*102*			*80.0-120*		*04/08/2018 10:17*	WG1095249
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/08/2018 10:17*	WG1095249
(S) 4-Bromofluorobenzene	*89.9*			*80.0-120*		*04/08/2018 10:17*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/11/2018 17:55	WG1095661
(S) o-Terphenyl	*98.6*			*31.0-160*		*04/11/2018 17:55*	WG1095661

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5.00	J	2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:50	WG1096784

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	0.0611	J P1	0.0519	1.00	1	04/08/2018 15:17	WG1095127
Fluoride	U		0.00990	0.100	1	04/08/2018 15:17	WG1095127
Sulfate	0.389	J P1	0.0774	5.00	1	04/08/2018 15:17	WG1095127

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	U		0.000250	0.00200	1	04/15/2018 16:57	WG1095156
Arsenic,Dissolved	U		0.000250	0.00200	1	04/16/2018 01:40	WG1095184
Barium	U		0.000360	0.00500	1	04/15/2018 16:57	WG1095156
Barium,Dissolved	U		0.000360	0.00500	1	04/16/2018 01:40	WG1095184
Calcium	U		0.0460	1.00	1	04/15/2018 16:57	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 16:57	WG1095156
Chromium,Dissolved	U		0.000540	0.00200	1	04/16/2018 01:40	WG1095184
Iron	U		0.0150	0.100	1	04/15/2018 16:57	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 01:40	WG1095184
Lead	U		0.000240	0.00200	1	04/15/2018 16:57	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 01:40	WG1095184
Manganese	U		0.000250	0.00500	1	04/15/2018 16:57	WG1095156
Manganese,Dissolved	0.000287	B J	0.000250	0.00500	1	04/16/2018 01:40	WG1095184
Potassium	U		0.0370	1.00	1	04/15/2018 16:57	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 16:57	WG1095156
Selenium,Dissolved	U		0.000380	0.00200	1	04/16/2018 01:40	WG1095184
Sodium	0.132	J	0.110	1.00	1	04/15/2018 16:57	WG1095156

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/11/2018 02:35	WG1095836
(S) a,a,a-Trifluorotoluene(FID)	*105*			*77.0-122*		*04/11/2018 02:35*	WG1095836

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	0.0106	J	0.0100	0.0500	1	04/08/2018 10:36	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 10:36	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 10:36	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 10:36	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 10:36	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 10:36	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 10:36	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 10:36	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 10:36	WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 10:36	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 10:36	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 10:36	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 10:36	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 10:36	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 10:36	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 10:36	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 10:36	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 10:36	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 10:36	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 10:36	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 10:36	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 10:36	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 10:36	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 10:36	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 10:36	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 10:36	WG1095249
2-Butanone (MEK)	0.00940	J	0.00393	0.0100	1	04/08/2018 10:36	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 10:36	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 10:36	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 10:36	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 10:36	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 10:36	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 10:36	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 10:36	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 10:36	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 10:36	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 10:36	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 10:36	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 10:36	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 10:36	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 10:36	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 10:36	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 10:36	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 10:36	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 10:36	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 10:36	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 10:36	WG1095249
(S) Toluene-d8	*102*			*80.0-120*		*04/08/2018 10:36*	WG1095249
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/08/2018 10:36*	WG1095249
(S) 4-Bromofluorobenzene	*89.6*			*80.0-120*		*04/08/2018 10:36*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/11/2018 18:12	WG1095661
(S) o-Terphenyl	*84.1*			*31.0-160*		*04/11/2018 18:12*	WG1095661

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	7.00	J	2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:51	WG1096784

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 16:21	WG1095350

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	0.205	J	0.0519	1.00	1	04/08/2018 16:06	WG1095127
Fluoride	U		0.00990	0.100	1	04/08/2018 16:06	WG1095127
Sulfate	0.277	J	0.0774	5.00	1	04/08/2018 16:06	WG1095127

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/09/2018 15:55	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 09:59	WG1095576

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.0337	J	0.0126	0.200	1	04/09/2018 17:14	WG1095148
Boron,Dissolved	0.0298	J	0.0126	0.200	1	04/11/2018 16:39	WG1095851

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	U		0.000250	0.00200	1	04/15/2018 17:01	WG1095156
Arsenic,Dissolved	U		0.000250	0.00200	1	04/16/2018 01:45	WG1095184
Barium	U		0.000360	0.00500	1	04/15/2018 17:01	WG1095156
Barium,Dissolved	0.000381	J	0.000360	0.00500	1	04/16/2018 01:45	WG1095184
Cadmium	U		0.000160	0.00100	1	04/15/2018 17:01	WG1095156
Cadmium,Dissolved	U		0.000160	0.00100	1	04/16/2018 21:11	WG1095184
Calcium	0.129	J	0.0460	1.00	1	04/15/2018 17:01	WG1095156
Chromium	U		0.000540	0.00200	1	04/15/2018 17:01	WG1095156
Chromium,Dissolved	U		0.000540	0.00200	1	04/16/2018 01:45	WG1095184
Cobalt	U		0.000260	0.00200	1	04/15/2018 17:01	WG1095156
Cobalt,Dissolved	U		0.000260	0.00200	1	04/16/2018 01:45	WG1095184
Iron	U		0.0150	0.100	1	04/15/2018 17:01	WG1095156
Iron,Dissolved	U		0.0150	0.100	1	04/16/2018 01:45	WG1095184
Lead	U		0.000240	0.00200	1	04/15/2018 17:01	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/16/2018 01:45	WG1095184
Manganese	U		0.000250	0.00500	1	04/15/2018 17:01	WG1095156
Manganese,Dissolved	0.000396	B J	0.000250	0.00500	1	04/16/2018 01:45	WG1095184
Nickel	0.000421	J	0.000350	0.00200	1	04/15/2018 17:01	WG1095156
Nickel,Dissolved	0.000479	J	0.000350	0.00200	1	04/16/2018 01:45	WG1095184

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	U		0.0370	1.00	1	04/15/2018 17:01	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 17:01	WG1095156
Selenium,Dissolved	U		0.000380	0.00200	1	04/16/2018 01:45	WG1095184
Sodium	0.227	J	0.110	1.00	1	04/15/2018 17:01	WG1095156
Uranium	U		0.000330	0.0100	1	04/15/2018 17:01	WG1095156
Uranium,Dissolved	U		0.000330	0.0100	1	04/16/2018 01:45	WG1095184
Vanadium	0.000188	J	0.000180	0.00500	1	04/15/2018 17:01	WG1095156
Vanadium,Dissolved	U		0.000180	0.00500	1	04/16/2018 01:45	WG1095184

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/11/2018 02:58	WG1095836
(S) a,a,a-Trifluorotoluene(FID)	*105*			*77.0-122*		*04/11/2018 02:58*	WG1095836

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 10:55	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 10:55	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 10:55	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 10:55	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 10:55	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 10:55	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 10:55	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 10:55	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 10:55	WG1095249
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 10:55	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 10:55	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 10:55	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 10:55	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 10:55	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 10:55	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 10:55	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 10:55	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 10:55	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 10:55	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 10:55	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 10:55	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 10:55	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 10:55	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 10:55	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 10:55	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 10:55	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 10:55	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 10:55	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 10:55	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 10:55	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 10:55	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 10:55	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 10:55	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 10:55	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 10:55	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 10:55	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 10:55	WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	04/08/2018 10:55	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 10:55	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 10:55	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 10:55	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 10:55	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 10:55	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 10:55	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 10:55	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 10:55	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 10:55	WG1095249
(S) Toluene-d8	*98.1*			*80.0-120*		*04/08/2018 10:55*	WG1095249
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/08/2018 10:55*	WG1095249
(S) 4-Bromofluorobenzene	*94.2*			*80.0-120*		*04/08/2018 10:55*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.287		0.0247	0.100	1	04/11/2018 18:28	WG1095661
(S) o-Terphenyl	*96.4*			*31.0-160*		*04/11/2018 18:28*	WG1095661

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	U		2.82	10.0	1	04/11/2018 16:25	WG1096160

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	04/12/2018 16:52	WG1096784

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	04/09/2018 16:22	WG1095350

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	U		0.0519	1.00	1	04/08/2018 16:43	WG1095127
Fluoride	U		0.00990	0.100	1	04/08/2018 16:43	WG1095127
Sulfate	U		0.0774	5.00	1	04/08/2018 16:43	WG1095127

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	04/09/2018 15:58	WG1095323
Mercury,Dissolved	U		0.0000490	0.000200	1	04/11/2018 10:01	WG1095576

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.0426	J	0.0126	0.200	1	04/09/2018 17:24	WG1095148
Boron,Dissolved	0.0294	J	0.0126	0.200	1	04/11/2018 16:42	WG1095851

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	U		0.000250	0.00200	1	04/15/2018 17:06	WG1095156
Arsenic,Dissolved	U		0.000250	0.00200	1	04/15/2018 23:30	WG1095184
Barium	U		0.000360	0.00500	1	04/15/2018 17:06	WG1095156
Barium,Dissolved	U		0.000360	0.00500	1	04/15/2018 23:30	WG1095184
Cadmium	U		0.000160	0.00100	1	04/15/2018 17:06	WG1095156
Cadmium,Dissolved	U		0.000160	0.00100	1	04/16/2018 20:07	WG1095184
Calcium	U		0.0460	1.00	1	04/15/2018 17:06	WG1095156
Chromium	0.000807	B J	0.000540	0.00200	1	04/15/2018 17:06	WG1095156
Chromium,Dissolved	0.00117	B J J3 J5	0.000540	0.00200	1	04/15/2018 23:30	WG1095184
Cobalt	U		0.000260	0.00200	1	04/15/2018 17:06	WG1095156
Cobalt,Dissolved	U		0.000260	0.00200	1	04/15/2018 23:30	WG1095184
Iron	U		0.0150	0.100	1	04/15/2018 17:06	WG1095156
Iron,Dissolved	U	J3 J5	0.0150	0.100	1	04/15/2018 23:30	WG1095184
Lead	U		0.000240	0.00200	1	04/15/2018 17:06	WG1095156
Lead,Dissolved	U		0.000240	0.00200	1	04/15/2018 23:30	WG1095184
Manganese	U		0.000250	0.00500	1	04/15/2018 17:06	WG1095156
Manganese,Dissolved	0.000831	B J J3 J5	0.000250	0.00500	1	04/15/2018 23:30	WG1095184
Nickel	0.000664	J	0.000350	0.00200	1	04/15/2018 17:06	WG1095156
Nickel,Dissolved	0.000828	J J3 J5	0.000350	0.00200	1	04/15/2018 23:30	WG1095184

EB-REST-05

Collected date/time: 04/04/18 14:50

SAMPLE RESULTS - 59

L983865

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Potassium	U		0.0370	1.00	1	04/15/2018 17:06	WG1095156
Selenium	U		0.000380	0.00200	1	04/15/2018 17:06	WG1095156
Selenium,Dissolved	U		0.000380	0.00200	1	04/15/2018 23:30	WG1095184
Sodium	0.115	J	0.110	1.00	1	04/15/2018 17:06	WG1095156
Uranium	U		0.000330	0.0100	1	04/15/2018 17:06	WG1095156
Uranium,Dissolved	U		0.000330	0.0100	1	04/15/2018 23:30	WG1095184
Vanadium	0.000204	J	0.000180	0.00500	1	04/15/2018 17:06	WG1095156
Vanadium,Dissolved	U		0.000180	0.00500	1	04/15/2018 23:30	WG1095184

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	04/11/2018 03:22	WG1095836
(S) a,a,a-Trifluorotoluene(FID)	*105*			*77.0-122*		*04/11/2018 03:22*	WG1095836

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 11:14	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 11:14	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 11:14	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 11:14	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 11:14	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 11:14	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 11:14	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 11:14	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 11:14	WG1095249
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 11:14	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 11:14	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 11:14	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 11:14	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 11:14	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 11:14	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 11:14	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 11:14	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 11:14	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 11:14	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 11:14	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 11:14	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 11:14	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 11:14	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 11:14	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 11:14	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 11:14	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 11:14	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 11:14	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 11:14	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 11:14	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 11:14	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 11:14	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 11:14	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 11:14	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 11:14	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 11:14	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 11:14	WG1095249

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	04/08/2018 11:14	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 11:14	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 11:14	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 11:14	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 11:14	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 11:14	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 11:14	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 11:14	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 11:14	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 11:14	WG1095249
(S) Toluene-d8	*102*			*80.0-120*		*04/08/2018 11:14*	WG1095249
(S) Dibromofluoromethane	*103*			*76.0-123*		*04/08/2018 11:14*	WG1095249
(S) 4-Bromofluorobenzene	*92.5*			*80.0-120*		*04/08/2018 11:14*	WG1095249

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	04/11/2018 18:45	WG1095661
(S) o-Terphenyl	*84.3*			*31.0-160*		*04/11/2018 18:45*	WG1095661

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	04/08/2018 05:12	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 05:12	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 05:12	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 05:12	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 05:12	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 05:12	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 05:12	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 05:12	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 05:12	WG1095249
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 05:12	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 05:12	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 05:12	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 05:12	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 05:12	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 05:12	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 05:12	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 05:12	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 05:12	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 05:12	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 05:12	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 05:12	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 05:12	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 05:12	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 05:12	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 05:12	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 05:12	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 05:12	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 05:12	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 05:12	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 05:12	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 05:12	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 05:12	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 05:12	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 05:12	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 05:12	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 05:12	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 05:12	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 05:12	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 05:12	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 05:12	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 05:12	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 05:12	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 05:12	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 05:12	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 05:12	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 05:12	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 05:12	WG1095249
(S) Toluene-d8	*102*			*80.0-120*		*04/08/2018 05:12*	WG1095249
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/08/2018 05:12*	WG1095249
(S) 4-Bromofluorobenzene	*90.9*			*80.0-120*		*04/08/2018 05:12*	WG1095249

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Collected date/time: 04/04/18 00:00

SAMPLE RESULTS - 61

L983865

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 05:31	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 05:31	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 05:31	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 05:31	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 05:31	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 05:31	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 05:31	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 05:31	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 05:31	WG1095249
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 05:31	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 05:31	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 05:31	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 05:31	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 05:31	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 05:31	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 05:31	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 05:31	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 05:31	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 05:31	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 05:31	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 05:31	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 05:31	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 05:31	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 05:31	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 05:31	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 05:31	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 05:31	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 05:31	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 05:31	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 05:31	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 05:31	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 05:31	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 05:31	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 05:31	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 05:31	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 05:31	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 05:31	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 05:31	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 05:31	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 05:31	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 05:31	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 05:31	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 05:31	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 05:31	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 05:31	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 05:31	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 05:31	WG1095249
(S) Toluene-d8	*102*			*80.0-120*		*04/08/2018 05:31*	WG1095249
(S) Dibromofluoromethane	*102*			*76.0-123*		*04/08/2018 05:31*	WG1095249
(S) 4-Bromofluorobenzene	*92.3*			*80.0-120*		*04/08/2018 05:31*	WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	04/08/2018 05:50	WG1095249
Benzene	U		0.000331	0.00100	1	04/08/2018 05:50	WG1095249
Bromodichloromethane	U		0.000380	0.00100	1	04/08/2018 05:50	WG1095249
Bromoform	U		0.000469	0.00100	1	04/08/2018 05:50	WG1095249
Bromomethane	U		0.000866	0.00500	1	04/08/2018 05:50	WG1095249
n-Butylbenzene	U		0.000361	0.00100	1	04/08/2018 05:50	WG1095249
sec-Butylbenzene	U		0.000365	0.00100	1	04/08/2018 05:50	WG1095249
Carbon disulfide	U		0.000275	0.00100	1	04/08/2018 05:50	WG1095249
Carbon tetrachloride	U		0.000379	0.00100	1	04/08/2018 05:50	WG1095249
Chlorobenzene	U		0.000348	0.00100	1	04/08/2018 05:50	WG1095249
Chlorodibromomethane	U		0.000327	0.00100	1	04/08/2018 05:50	WG1095249
Chloroethane	U	J4	0.000453	0.00500	1	04/08/2018 05:50	WG1095249
Chloroform	U		0.000324	0.00500	1	04/08/2018 05:50	WG1095249
Chloromethane	U		0.000276	0.00250	1	04/08/2018 05:50	WG1095249
1,2-Dibromoethane	U		0.000381	0.00100	1	04/08/2018 05:50	WG1095249
1,1-Dichloroethane	U		0.000259	0.00100	1	04/08/2018 05:50	WG1095249
1,2-Dichloroethane	U		0.000361	0.00100	1	04/08/2018 05:50	WG1095249
1,1-Dichloroethene	U		0.000398	0.00100	1	04/08/2018 05:50	WG1095249
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	04/08/2018 05:50	WG1095249
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	04/08/2018 05:50	WG1095249
1,2-Dichloropropane	U		0.000306	0.00100	1	04/08/2018 05:50	WG1095249
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	04/08/2018 05:50	WG1095249
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	04/08/2018 05:50	WG1095249
Ethylbenzene	U		0.000384	0.00100	1	04/08/2018 05:50	WG1095249
Isopropylbenzene	U		0.000326	0.00100	1	04/08/2018 05:50	WG1095249
p-Isopropyltoluene	U		0.000350	0.00100	1	04/08/2018 05:50	WG1095249
2-Butanone (MEK)	U		0.00393	0.0100	1	04/08/2018 05:50	WG1095249
2-Hexanone	U		0.00382	0.0100	1	04/08/2018 05:50	WG1095249
Methylene Chloride	U		0.00100	0.00500	1	04/08/2018 05:50	WG1095249
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	04/08/2018 05:50	WG1095249
Methyl tert-butyl ether	U		0.000367	0.00100	1	04/08/2018 05:50	WG1095249
Naphthalene	U		0.00100	0.00500	1	04/08/2018 05:50	WG1095249
n-Propylbenzene	U		0.000349	0.00100	1	04/08/2018 05:50	WG1095249
Styrene	U		0.000307	0.00100	1	04/08/2018 05:50	WG1095249
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	04/08/2018 05:50	WG1095249
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	04/08/2018 05:50	WG1095249
Tetrachloroethene	U		0.000372	0.00100	1	04/08/2018 05:50	WG1095249
Toluene	U		0.000412	0.00100	1	04/08/2018 05:50	WG1095249
1,1,1-Trichloroethane	U		0.000319	0.00100	1	04/08/2018 05:50	WG1095249
1,1,2-Trichloroethane	U		0.000383	0.00100	1	04/08/2018 05:50	WG1095249
Trichloroethene	U		0.000398	0.00100	1	04/08/2018 05:50	WG1095249
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	04/08/2018 05:50	WG1095249
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	04/08/2018 05:50	WG1095249
Vinyl chloride	U		0.000259	0.00100	1	04/08/2018 05:50	WG1095249
o-Xylene	U		0.000341	0.00100	1	04/08/2018 05:50	WG1095249
m&p-Xylene	U		0.000719	0.00200	1	04/08/2018 05:50	WG1095249
Xylenes, Total	U		0.00106	0.00300	1	04/08/2018 05:50	WG1095249
(S) Toluene-d8	*101*			*80.0-120*		*04/08/2018 05:50*	WG1095249
(S) Dibromofluoromethane	*101*			*76.0-123*		*04/08/2018 05:50*	WG1095249
(S) 4-Bromofluorobenzene	*92.9*			*80.0-120*		*04/08/2018 05:50*	WG1095249

WG1096155

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983865-07,08,09,10,11

Method Blank (MB)

(MB) R3301384-1 04/11/18 16:21

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	4.00	J	2.82	10.0

L983855-07 Original Sample (OS) • Duplicate (DUP)

(OS) L983855-07 04/11/18 16:21 • (DUP) R3301384-4 04/11/18 16:21

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2730	3280	1	18.2	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301384-2 04/11/18 16:21 • (LCSD) R3301384-3 04/11/18 16:21

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8610	8590	97.8	97.6	85.0-115			0.233	5

WG1096156

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L983865-12,13,14,15,16,17,18,19,20,21

Method Blank (MB)

(MB) R3301369-1 04/11/18 16:40

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983865-21 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-21 04/11/18 16:40 • (DUP) R3301369-4 04/11/18 16:40

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	3660	4050	1	9.99	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301369-2 04/11/18 16:40 • (LCSD) R3301369-3 04/11/18 16:40

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8490	8590	96.5	97.6	85.0-115			1.17	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

QUALITY CONTROL SUMMARY

L983865-22,23,24,25,26,27,28,29,30,31,32,34,37,38,41,42,43,44,45,46

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301331-1 04/11/18 15:48

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983865-44 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-44 04/11/18 15:48 • (DUP) R3301331-4 04/11/18 15:48

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2390	2420	1	1.25		5

L983865-45 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-45 04/11/18 15:48 • (DUP) R3301331-5 04/11/18 15:48

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	4060	4120	1	1.47		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301331-2 04/11/18 15:48 • (LCSD) R3301331-3 04/11/18 15:48

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8630	8630	98.1	98.1	85.0-115			0.000	5

QUALITY CONTROL SUMMARY

L983865-47,48,49,50,51,52,53,54,55,56,57,58,59

Method Blank (MB)

(MB) R3301341-1 04/11/18 16:25

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983865-47 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-47 04/11/18 16:25 • (DUP) R3301341-4 04/11/18 16:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2990	2720	1	9.47	J3	5

L983865-48 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-48 04/11/18 16:25 • (DUP) R3301341-5 04/11/18 16:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	3910	4060	1	3.89		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301341-2 04/11/18 16:25 • (LCSD) R3301341-3 04/11/18 16:25

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8580	8560	97.5	97.3	85.0-115			0.233	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301714-1 04/12/18 13:25

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L983865-03 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-03 04/12/18 13:25 • (DUP) R3301714-4 04/12/18 13:25

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Dissolved Solids	2230	2270	1	1.56		5

L983865-04 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-04 04/12/18 13:25 • (DUP) R3301714-5 04/12/18 13:25

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Dissolved Solids	2100	2070	1	1.44		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301714-2 04/12/18 13:25 • (LCSD) R3301714-3 04/12/18 13:25

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8970	8610	102	97.8	85.0-115			4.10	5

QUALITY CONTROL SUMMARY

L983865-05,06,33,35,36,39,40

Method Blank (MB)

(MB) R3301701-1 04/12/18 16:05

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L984021-01 Original Sample (OS) • Duplicate (DUP)

(OS) L984021-01 04/12/18 16:05 • (DUP) R3301701-4 04/12/18 16:05

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Dissolved Solids	529	526	1	0.569		5

L984021-02 Original Sample (OS) • Duplicate (DUP)

(OS) L984021-02 04/12/18 16:05 • (DUP) R3301701-5 04/12/18 16:05

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Dissolved Solids	450	452	1	0.443		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301701-2 04/12/18 16:05 • (LCSD) R3301701-3 04/12/18 16:05

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8710	8600	99.0	97.7	85.0-115			1.27	5

QUALITY CONTROL SUMMARY

L983865-01,02,03,04,05,06,07,08

Method Blank (MB)

(MB) R3300964-1 04/11/18 15:15

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983849-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983849-01 04/11/18 15:18 • (DUP) R3300964-4 04/11/18 15:19

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	0.156	0.165	1	5.61		20

L983865-07 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-07 04/11/18 15:47 • (DUP) R3300964-6 04/11/18 15:48

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300964-2 04/11/18 15:16 • (LCSD) R3300964-3 04/11/18 15:17

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.89	3.96	97.2	98.9	90.0-110			1.73	20

L983855-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L983855-06 04/11/18 15:29 • (MS) R3300964-5 04/11/18 15:31

Analyte	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	2.72	4.71	79.3	1	90.0-110	J6

L983865-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-08 04/11/18 15:49 • (MS) R3300964-7 04/11/18 15:51 • (MSD) R3300964-8 04/11/18 15:52

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	0.0350	2.37	2.41	93.3	94.8	1	90.0-110			1.55	20

QUALITY CONTROL SUMMARY

L983865-09,10,11,12,13,14,15,16,17,18,19,20,21,22,23,24,25,26,27,28

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300965-1 04/11/18 15:59

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983865-27 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-27 04/11/18 16:32 • (DUP) R3300965-6 04/11/18 16:33

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	20	0.000		20

Sample Narrative:

OS: Diluted due to sulfide interference

L983865-09 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-09 04/11/18 16:02 • (DUP) R3300965-4 04/11/18 16:03

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.0260	0.0200	1	26.1	J P1	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300965-2 04/11/18 16:00 • (LCSD) R3300965-3 04/11/18 16:01

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.86	4.04	96.5	101	90.0-110			4.53	20

L983865-28 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-28 04/11/18 16:34 • (MS) R3300965-7 04/11/18 16:35 • (MSD) R3300965-8 04/11/18 16:36

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	U	0.737	0.689	29.5	27.6	1	90.0-110	J6	J6	6.73	20

Sample Narrative:

OS: Low spike recovery due to sulfide in the sample.

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983865-11 Original Sample (OS) • Matrix Spike (MS)

(OS) L983865-11 04/11/18 16:05 • (MS) R3300965-5 04/11/18 16:06

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Nitrate-Nitrite	2.50	U	2.22	88.6	1	90.0-110	J6

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301410-1 04/12/18 15:43

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983825-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983825-01 04/12/18 15:47 • (DUP) R3301410-4 04/12/18 15:48

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.0800	0.0870	1	8.38	J	20

L983865-45 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-45 04/12/18 16:15 • (DUP) R3301410-9 04/12/18 16:16

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301410-2 04/12/18 15:45 • (LCSD) R3301410-3 04/12/18 15:46

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.91	3.96	97.7	98.9	90.0-110			1.25	20

L983865-29 Original Sample (OS) • Matrix Spike (MS)

(OS) L983865-29 04/12/18 15:49 • (MS) R3301410-6 04/12/18 15:50

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	U	0.154	6.16	1	90.0-110	J6

Sample Narrative:

OS: Low spike recovery, sample had some sulfide interference

MS: Low spike recovery, sample had some sulfide interference

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983865-47 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-47 04/12/18 16:18 • (MS) R3301410-10 04/12/18 16:19 • (MSD) R3301410-11 04/12/18 16:20

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	2.50	0.0310	0.132	0.138	4.04	4.28	1	90.0-110	J6	J6	4.44	20

Sample Narrative:

OS: Low spike recovery, sample had some sulfide interference

MS: Low spike recovery, sample had some sulfide interference

MSD: Low spike recovery, sample had some sulfide interference

QUALITY CONTROL SUMMARY

L983865-48,49,50,51,52,53,54,55,56,57,58,59

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301411-1 04/12/18 16:29

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L983865-48 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-48 04/12/18 16:34 • (DUP) R3301411-4 04/12/18 16:35

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

L984262-01 Original Sample (OS) • Duplicate (DUP)

(OS) L984262-01 04/12/18 17:01 • (DUP) R3301411-6 04/12/18 17:03

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301411-2 04/12/18 16:30 • (LCSD) R3301411-3 04/12/18 16:31

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	5.00	3.81	3.97	95.3	99.3	90.0-110			4.14	20

L983865-49 Original Sample (OS) • Matrix Spike (MS)

(OS) L983865-49 04/12/18 16:36 • (MS) R3301411-5 04/12/18 16:37

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	0.894	3.08	87.6	1	90.0-110	J6

L984320-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984320-01 04/12/18 17:04 • (MS) R3301411-7 04/12/18 17:05 • (MSD) R3301411-8 04/12/18 17:06

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	1.37	3.42	3.44	82.2	82.9	1	90.0-110	J6	J6	0.554	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300284-1 04/09/18 17:03

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L983514-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983514-01 04/09/18 17:08 • (DUP) R3300284-4 04/09/18 17:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L983865-22 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-22 04/09/18 17:24 • (DUP) R3300284-5 04/09/18 17:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300284-2 04/09/18 17:04 • (LCSD) R3300284-3 04/09/18 17:05

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0992	0.0906	99.2	90.6	85.0-115			9.06	20

WG1095350

Wet Chemistry by Method 4500CN E-2011

QUALITY CONTROL SUMMARY

L983865-38,39,40,54,55,58,59

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300255-1 04/09/18 16:01

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L983260-02 Original Sample (OS) • Duplicate (DUP)

(OS) L983260-02 04/09/18 16:10 • (DUP) R3300255-4 04/09/18 16:13

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L983881-02 Original Sample (OS) • Duplicate (DUP)

(OS) L983881-02 04/09/18 16:26 • (DUP) R3300255-5 04/09/18 16:27

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300255-2 04/09/18 16:02 • (LCSD) R3300255-3 04/09/18 16:03

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.107	0.103	107	103	85.0-115			3.81	20

L983954-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983954-02 04/09/18 16:31 • (MS) R3300255-6 04/09/18 16:32 • (MSD) R3300255-7 04/09/18 16:33

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	0.0876	0.164	0.180	76.4	92.4	1	75.0-125			9.30	20

Method Blank (MB)

(MB) R3299939-1 04/07/18 07:40

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.0743	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983855-11 Original Sample (OS) • Duplicate (DUP)

(OS) L983855-11 04/07/18 16:25 • (DUP) R3299939-4 04/07/18 16:38

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.0722	0.000	1	200	P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	0.286	0.000	1	200	P1	15

L983951-01 Original Sample (OS) • Duplicate (DUP)

(OS) L983951-01 04/08/18 02:56 • (DUP) R3299939-7 04/08/18 03:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	1.12	1.02	1	9.13		15
Fluoride	0.0249	0.0247	1	0.806	J	15
Sulfate	5.49	5.49	1	0.0765		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3299939-2 04/07/18 07:54 • (LCSD) R3299939-3 04/07/18 08:07

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.8	39.7	99.4	99.3	80.0-120			0.0526	15
Fluoride	8.00	8.03	8.04	100	101	80.0-120			0.174	15
Sulfate	40.0	40.1	40.1	100	100	80.0-120			0.0459	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983855-11 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-11 04/07/18 16:25 • (MS) R3299939-5 04/07/18 16:51 • (MSD) R3299939-6 04/07/18 17:05

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Fluoride	5.00	U	5.36	5.17	107	103	1	80.0-120			3.51	15

L983951-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L983951-01 04/08/18 02:56 • (MS) R3299939-8 04/08/18 03:22

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	1.12	51.2	100	1	80.0-120	
Fluoride	5.00	0.0249	5.11	102	1	80.0-120	
Sulfate	50.0	5.49	55.5	100	1	80.0-120	

WG1095124

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983865-02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300251-1 04/08/18 08:54

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983865-12 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-12 04/08/18 18:03 • (DUP) R3300251-4 04/08/18 18:19

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	15.3	15.2	1	0.342		15
Fluoride	0.888	0.904	1	1.73		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300251-2 04/08/18 09:09 • (LCSD) R3300251-3 04/08/18 09:24

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.2	39.0	98.1	97.5	80.0-120			0.632	15
Fluoride	8.00	8.06	7.98	101	99.8	80.0-120			0.989	15
Sulfate	40.0	38.8	38.5	96.9	96.2	80.0-120			0.678	15

L983865-12 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-12 04/08/18 18:03 • (MS) R3300251-5 04/08/18 18:34 • (MSD) R3300251-6 04/08/18 18:49

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	15.3	68.7	67.4	107	104	1	80.0-120			1.85	15
Fluoride	5.00	0.888	6.09	6.20	104	106	1	80.0-120			1.72	15

WG1095125

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983865-22,23,24,25,26,27,28,29,30,31,32,33,34,35,36,37,38,39,40,41

Method Blank (MB)

(MB) R3300241-1 04/08/18 09:12

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	0.158	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983865-32 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-32 04/08/18 18:47 • (DUP) R3300241-4 04/08/18 19:03

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	0.909	0.981	1	7.63		15

L983865-32 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-32 04/08/18 19:18 • (DUP) R3300241-5 04/08/18 19:34

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	228	223	20	2.43		15

L983865-40 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-40 04/09/18 00:58 • (DUP) R3300241-8 04/09/18 01:13

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	0.874	0.962	1	9.65		15

L983865-40 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-40 04/09/18 01:29 • (DUP) R3300241-9 04/09/18 01:44

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	453	447	20	1.35		15

WG1095125

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983865-22,23,24,25,26,27,28,29,30,31,32,33,34,35,36,37,38,39,40,41

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300241-2 04/08/18 09:27 • (LCSD) R3300241-3 04/08/18 09:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.9	39.9	99.7	99.7	80.0-120			0.0155	15
Fluoride	8.00	8.16	8.14	102	102	80.0-120			0.266	15
Sulfate	40.0	39.8	39.8	99.5	99.5	80.0-120			0.0492	15

L983865-32 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-32 04/08/18 18:47 • (MS) R3300241-6 04/08/18 19:49 • (MSD) R3300241-7 04/08/18 20:05

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Fluoride	5.00	0.909	6.23	6.05	106	103	1	80.0-120			3.01	15

L983865-40 Original Sample (OS) • Matrix Spike (MS)

(OS) L983865-40 04/09/18 00:58 • (MS) R3300241-10 04/09/18 01:59

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Fluoride	5.00	0.874	6.06	104	1	80.0-120	

WG1095127

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983865-42,43,44,45,46,47,48,49,50,51,52,53,54,55,56,57,58,59

Method Blank (MB)

(MB) R3300282-1 04/08/18 06:25

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983865-50 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-50 04/08/18 11:08 • (DUP) R3300282-4 04/08/18 11:45

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	0.884	0.919	1	3.89		15

L983865-50 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-50 04/08/18 11:58 • (DUP) R3300282-5 04/08/18 12:10

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	258	255	5	0.887		15
Sulfate	471	466	5	1.10		15

L983865-57 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-57 04/08/18 15:17 • (DUP) R3300282-7 04/08/18 15:29

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.0611	0.000	1	200	P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	0.389	0.000	1	200	P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300282-2 04/08/18 06:37 • (LCSD) R3300282-3 04/08/18 06:50

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.6	39.4	98.9	98.6	80.0-120			0.298	15
Fluoride	8.00	8.02	8.00	100	100	80.0-120			0.212	15
Sulfate	40.0	39.8	39.7	99.5	99.3	80.0-120			0.161	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983865-50 Original Sample (OS) • Matrix Spike (MS)

(OS) L983865-50 04/08/18 11:08 • (MS) R3300282-6 04/08/18 12:23

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Fluoride	5.00	0.884	5.50	92.3	1	80.0-120	

L983865-57 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-57 04/08/18 15:17 • (MS) R3300282-8 04/08/18 15:41 • (MSD) R3300282-9 04/08/18 15:54

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	0.0611	51.7	51.1	103	102	1	80.0-120			1.17	15
Fluoride	5.00	U	5.31	5.17	106	103	1	80.0-120			2.79	15
Sulfate	50.0	0.389	52.6	51.2	104	102	1	80.0-120			2.71	15

Method Blank (MB)

(MB) R3300644-1 04/10/18 10:30

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Chloride	0.0585	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L983865-30 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-30 04/10/18 19:03 • (DUP) R3300644-8 04/10/18 19:16

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Fluoride	1.72	1.78	1	3.44		15
Sulfate	1.08	1.07	1	1.19	J	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300644-4 04/10/18 13:50 • (LCSD) R3300644-3 04/10/18 11:00

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	40.3	40.1	101	100	80.0-120			0.487	15
Fluoride	8.00	8.18	8.12	102	102	80.0-120			0.665	15
Sulfate	40.0	40.9	40.6	102	101	80.0-120			0.854	15

L983865-30 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-30 04/10/18 19:03 • (MS) R3300644-9 04/10/18 19:29 • (MSD) R3300644-10 04/10/18 19:43

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Fluoride	5.00	1.72	6.15	6.88	88.7	103	1	80.0-120			11.2	15
Sulfate	50.0	1.08	48.4	53.0	94.7	104	1	80.0-120			9.00	15

WG1095833

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L983865-38,39,40,41,48,49,53,54,55

Method Blank (MB)

(MB) R3300828-1 04/10/18 22:17

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L983865-40 Original Sample (OS) • Duplicate (DUP)

(OS) L983865-40 04/11/18 00:21 • (DUP) R3300828-6 04/11/18 00:36

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	26.8	26.6	1	0.940		15

L984044-15 Original Sample (OS) • Duplicate (DUP)

(OS) L984044-15 04/11/18 02:55 • (DUP) R3300828-8 04/11/18 03:10

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	77.2	77.3	1	0.111		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300828-4 04/10/18 23:19 • (LCSD) R3300828-5 04/10/18 23:34

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	39.4	38.5	98.4	96.3	80.0-120			2.17	15

L983865-40 Original Sample (OS) • Matrix Spike (MS)

(OS) L983865-40 04/11/18 00:21 • (MS) R3300828-7 04/11/18 00:51

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	26.8	73.0	92.3	1	80.0-120	

L984044-15 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984044-15 04/11/18 02:55 • (MS) R3300828-9 04/11/18 03:26 • (MSD) R3300828-10 04/11/18 03:41

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	77.2	122	127	89.3	99.0	1	80.0-120	E	E	3.91	15

QUALITY CONTROL SUMMARY

L983865-04,22,26,27,29,40,54,55,58,59

Method Blank (MB)

(MB) R3300322-1 04/09/18 15:21

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300322-2 04/09/18 15:23 • (LCSD) R3300322-3 04/09/18 15:26

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	0.00294	0.00288	97.9	96.1	80.0-120			1.81	20

L983865-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-04 04/09/18 15:28 • (MS) R3300322-4 04/09/18 15:30 • (MSD) R3300322-5 04/09/18 15:37

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	U	0.00280	0.00275	93.3	91.8	1	75.0-125			1.57	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1095576

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983865-04,22,26,27,29,38,39,40,54,55,58,59

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300786-1 04/11/18 09:14

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury,Dissolved	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300786-2 04/11/18 09:16 • (LCSD) R3300786-3 04/11/18 09:18

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	0.00273	0.00278	91.0	92.5	80.0-120			1.65	20

L983865-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-04 04/11/18 09:27 • (MS) R3300786-4 04/11/18 09:30 • (MSD) R3300786-5 04/11/18 09:32

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury,Dissolved	0.00300	U	0.00254	0.00244	84.7	81.4	1	75.0-125			4.05	20

WG1095972

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L983865-38,39

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300785-1 04/11/18 08:24

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300785-2 04/11/18 08:31 • (LCSD) R3300785-3 04/11/18 08:33

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury	0.00300	0.00278	0.00282	92.5	94.1	80.0-120			1.73	20

L984310-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984310-08 04/11/18 08:35 • (MS) R3300785-4 04/11/18 08:38 • (MSD) R3300785-5 04/11/18 08:40

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury	0.00300	U	0.00276	0.00268	91.9	89.3	1	75.0-125			2.87	20

WG1095148

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983865-04,22,26,27,29,40,54,55,58,59

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300299-8 04/09/18 21:23

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300299-2 04/09/18 16:02 • (LCSD) R3300299-3 04/09/18 16:05

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron	1.00	0.983	0.977	98.3	97.7	80.0-120			0.604	20

L983855-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983855-02 04/09/18 16:09 • (MS) R3300299-5 04/09/18 16:16 • (MSD) R3300299-6 04/09/18 16:20

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1.00	0.611	1.60	1.61	99.2	100	1	75.0-125			0.662	20

WG1095823

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983865-38,39

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300648-1 04/10/18 21:00

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron	0.0133	J	0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300648-2 04/10/18 21:02 • (LCSD) R3300648-3 04/10/18 21:05

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron	1.00	1.01	1.04	101	104	80.0-120			3.22	20

L984041-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984041-02 04/10/18 21:07 • (MS) R3300648-5 04/10/18 21:12 • (MSD) R3300648-6 04/10/18 21:15

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1.00	ND	1.05	1.04	100	99.9	1	75.0-125			0.206	20

WG1095851

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L983865-04,22,26,27,29,38,39,40,54,55,58,59

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301025-1 04/11/18 15:35

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron,Dissolved	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301025-2 04/11/18 15:38 • (LCSD) R3301025-3 04/11/18 15:41

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	0.968	0.982	96.8	98.2	80.0-120			1.37	20

L983865-38 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-38 04/11/18 15:45 • (MS) R3301025-5 04/11/18 15:51 • (MSD) R3301025-6 04/11/18 15:55

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron,Dissolved	1.00	1.29	2.23	2.25	94.3	96.3	1	75.0-125			0.903	20

Method Blank (MB)

(MB) R3303143-1 04/18/18 13:32

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Method Blank (MB)

(MB) R3303179-1 04/19/18 11:46

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Cadmium	U		0.000160	0.00100
Nickel	U		0.000350	0.00200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3303143-2 04/18/18 13:36 • (LCSD) R3303143-3 04/18/18 13:40

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0481	0.0491	96.2	98.2	80.0-120			2.12	20
Barium	0.0500	0.0484	0.0491	96.7	98.3	80.0-120			1.59	20
Calcium	5.00	4.89	5.15	97.8	103	80.0-120			5.06	20
Chromium	0.0500	0.0500	0.0490	100	98.1	80.0-120			1.93	20
Cobalt	0.0500	0.0508	0.0517	102	103	80.0-120			1.90	20
Iron	5.00	4.96	5.04	99.1	101	80.0-120			1.64	20
Lead	0.0500	0.0494	0.0489	98.7	97.9	80.0-120			0.878	20
Manganese	0.0500	0.0482	0.0482	96.3	96.4	80.0-120			0.122	20
Potassium	5.00	5.07	4.91	101	98.2	80.0-120			3.13	20
Selenium	0.0500	0.0508	0.0498	102	99.6	80.0-120			1.95	20
Sodium	5.00	5.16	5.13	103	103	80.0-120			0.706	20
Uranium	0.0500	0.0496	0.0491	99.2	98.1	80.0-120			1.12	20

QUALITY CONTROL SUMMARY

L983865-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,19,20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3303143-2 04/18/18 13:36 • (LCSD) R3303143-3 04/18/18 13:40

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Vanadium	0.0500	0.0482	0.0492	96.3	98.4	80.0-120			2.12	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3303179-2 04/19/18 11:50 • (LCSD) R3303179-3 04/19/18 11:54

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cadmium	0.0500	0.0494	0.0499	98.9	99.8	80.0-120			0.892	20
Nickel	0.0500	0.0540	0.0539	108	108	80.0-120			0.174	20

L983865-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-01 04/18/18 13:44 • (MS) R3303143-4 04/18/18 13:48 • (MSD) R3303143-5 04/18/18 13:52

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.0239	0.0742	0.0754	101	103	1	75.0-125			1.68	20
Barium	0.0500	1.19	1.23	1.25	85.6	118	1	75.0-125			1.32	20
Calcium	5.00	211	218	218	147	140	1	75.0-125	V	V	0.177	20
Chromium	0.0500	0.000699	0.0502	0.0495	98.9	97.6	1	75.0-125			1.29	20
Cobalt	0.0500	0.000354	0.0504	0.0508	100	101	1	75.0-125			0.893	20
Potassium	5.00	1.28	6.36	6.34	102	101	1	75.0-125			0.205	20
Iron	5.00	0.264	5.30	5.19	101	98.5	1	75.0-125			2.09	20
Lead	0.0500	0.000822	0.0529	0.0525	104	103	1	75.0-125			0.737	20
Manganese	0.0500	0.372	0.423	0.421	101	97.6	1	75.0-125			0.382	20
Selenium	0.0500	0.000836	0.0559	0.0562	110	111	1	75.0-125			0.568	20
Sodium	5.00	349	358	355	194	125	1	75.0-125	V		0.964	20
Uranium	0.0500	U	0.0530	0.0526	106	105	1	75.0-125			0.792	20
Vanadium	0.0500	0.00156	0.0521	0.0503	101	97.5	1	75.0-125			3.49	20

L983865-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-01 04/19/18 11:59 • (MS) R3303179-4 04/19/18 12:03 • (MSD) R3303179-5 04/19/18 12:07

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cadmium	0.0500	U	0.0515	0.0503	103	101	1	75.0-125			2.29	20
Nickel	0.0500	0.00233	0.0640	0.0530	123	101	1	75.0-125			18.8	20

WG1095155

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983865-21,22,23,24,25,26,27,28,29,30,31,32,33,34,35,36,37,38,39,40

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3302473-1 04/17/18 11:08

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	0.101	J	0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	0.0708	J	0.0150	0.100
Lead	0.000413	J	0.000240	0.00200
Manganese	0.000332	J	0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	0.0423	J	0.0370	1.00
Selenium	0.000431	J	0.000380	0.00200
Sodium	0.116	J	0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302473-2 04/17/18 11:12 • (LCSD) R3302473-3 04/17/18 11:16

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Arsenic	0.0500	0.0489	0.0493	97.7	98.7	80.0-120			0.946	20
Barium	0.0500	0.0488	0.0503	97.6	101	80.0-120			3.09	20
Cadmium	0.0500	0.0513	0.0511	103	102	80.0-120			0.325	20
Calcium	5.00	4.89	5.03	97.9	101	80.0-120			2.83	20
Chromium	0.0500	0.0502	0.0491	100	98.2	80.0-120			2.26	20
Cobalt	0.0500	0.0520	0.0514	104	103	80.0-120			1.14	20
Iron	5.00	5.06	5.04	101	101	80.0-120			0.266	20
Lead	0.0500	0.0505	0.0495	101	99.0	80.0-120			1.94	20
Manganese	0.0500	0.0491	0.0493	98.1	98.6	80.0-120			0.465	20
Nickel	0.0500	0.0514	0.0501	103	100	80.0-120			2.53	20
Potassium	5.00	4.88	4.94	97.6	98.8	80.0-120			1.23	20
Selenium	0.0500	0.0516	0.0511	103	102	80.0-120			0.923	20
Sodium	5.00	5.00	5.06	100	101	80.0-120			1.19	20
Uranium	0.0500	0.0505	0.0495	101	99.0	80.0-120			1.99	20
Vanadium	0.0500	0.0485	0.0492	97.0	98.3	80.0-120			1.31	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983865-35 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-35 04/17/18 11:20 • (MS) R3302473-5 04/17/18 11:28 • (MSD) R3302473-6 04/17/18 11:32

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00249	0.0509	0.0533	96.9	102	1	75.0-125			4.52	20
Barium	0.0500	0.0288	0.0810	0.0777	104	97.9	1	75.0-125			4.15	20
Cadmium	0.0500	0.000261	0.0532	0.0542	106	108	1	75.0-125			1.79	20
Calcium	5.00	289	297	296	157	141	1	75.0-125	V	V	0.271	20
Chromium	0.0500	0.000703	0.0498	0.0510	98.1	101	1	75.0-125			2.41	20
Cobalt	0.0500	U	0.0508	0.0525	102	105	1	75.0-125			3.37	20
Potassium	5.00	1.24	6.29	6.29	101	101	1	75.0-125			0.00781	20
Iron	5.00	0.0382	4.99	5.11	99.1	101	1	75.0-125			2.26	20
Lead	0.0500	0.00174	0.0526	0.0538	102	104	1	75.0-125			2.16	20
Manganese	0.0500	0.0184	0.0664	0.0687	96.1	101	1	75.0-125			3.41	20
Nickel	0.0500	0.00122	0.0515	0.0524	101	102	1	75.0-125			1.75	20
Selenium	0.0500	0.000498	0.0497	0.0485	98.3	96.1	1	75.0-125			2.29	20
Sodium	5.00	293	305	304	225	205	1	75.0-125	V	V	0.320	20
Uranium	0.0500	U	0.0524	0.0532	105	106	1	75.0-125			1.62	20
Vanadium	0.0500	0.000591	0.0508	0.0511	100	101	1	75.0-125			0.538	20

QUALITY CONTROL SUMMARY

L983865-41,42,43,44,45,46,47,48,49,50,51,52,53,54,55,56,57,58,59

Method Blank (MB)

(MB) R3302031-1 04/15/18 14:43

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	0.000829	J	0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302031-2 04/15/18 14:48 • (LCSD) R3302031-3 04/15/18 14:52

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0502	0.0506	100	101	80.0-120			0.674	20
Barium	0.0500	0.0479	0.0486	95.8	97.1	80.0-120			1.40	20
Cadmium	0.0500	0.0498	0.0508	99.5	102	80.0-120			2.06	20
Calcium	5.00	5.05	5.11	101	102	80.0-120			1.17	20
Chromium	0.0500	0.0502	0.0498	100	99.7	80.0-120			0.685	20
Cobalt	0.0500	0.0515	0.0512	103	102	80.0-120			0.551	20
Iron	5.00	5.20	5.20	104	104	80.0-120			0.0786	20
Lead	0.0500	0.0499	0.0504	99.8	101	80.0-120			1.01	20
Manganese	0.0500	0.0492	0.0503	98.4	101	80.0-120			2.08	20
Nickel	0.0500	0.0524	0.0527	105	105	80.0-120			0.615	20
Potassium	5.00	5.02	5.09	100	102	80.0-120			1.39	20
Selenium	0.0500	0.0495	0.0508	99.1	102	80.0-120			2.43	20
Sodium	5.00	5.16	5.23	103	105	80.0-120			1.25	20
Uranium	0.0500	0.0504	0.0508	101	102	80.0-120			0.838	20
Vanadium	0.0500	0.0493	0.0497	98.7	99.4	80.0-120			0.708	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983865-53 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-53 04/15/18 14:57 • (MS) R3302031-5 04/15/18 15:06 • (MSD) R3302031-6 04/15/18 15:11

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.00465	0.0560	0.0565	103	104	1	75.0-125			0.880	20
Barium	0.0500	0.0100	0.0589	0.0567	97.8	93.4	1	75.0-125			3.82	20
Cadmium	0.0500	U	0.0514	0.0517	103	103	1	75.0-125			0.667	20
Calcium	5.00	574	571	558	0.000	0.000	1	75.0-125	V	V	2.37	20
Chromium	0.0500	0.00883	0.0755	0.0506	133	83.6	1	75.0-125	J5	J3	39.4	20
Cobalt	0.0500	U	0.0504	0.0501	101	100	1	75.0-125			0.535	20
Potassium	5.00	1.71	7.07	6.63	107	98.6	1	75.0-125			6.28	20
Iron	5.00	0.0683	5.18	5.08	102	100	1	75.0-125			1.81	20
Lead	0.0500	0.000274	0.0517	0.0520	103	104	1	75.0-125			0.708	20
Manganese	0.0500	0.0135	0.0632	0.0613	99.5	95.7	1	75.0-125			3.08	20
Nickel	0.0500	0.00136	0.0622	0.0517	122	101	1	75.0-125			18.3	20
Selenium	0.0500	0.00665	0.0609	0.0590	109	105	1	75.0-125			3.15	20
Sodium	5.00	271	273	267	47.4	0.000	1	75.0-125	V	V	2.31	20
Uranium	0.0500	0.0468	0.0999	0.100	106	106	1	75.0-125			0.137	20
Vanadium	0.0500	0.0208	0.0720	0.0707	102	99.8	1	75.0-125			1.81	20

Method Blank (MB)

(MB) R3302587-1 04/17/18 12:26

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Chromium,Dissolved	U		0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	U		0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302587-2 04/17/18 12:30 • (LCSD) R3302587-3 04/17/18 12:35

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0516	0.0533	103	107	80.0-120			3.27	20
Barium,Dissolved	0.0500	0.0482	0.0493	96.4	98.7	80.0-120			2.31	20
Cadmium,Dissolved	0.0500	0.0520	0.0534	104	107	80.0-120			2.69	20
Chromium,Dissolved	0.0500	0.0515	0.0556	103	111	80.0-120			7.60	20
Cobalt,Dissolved	0.0500	0.0535	0.0553	107	111	80.0-120			3.22	20
Iron,Dissolved	5.00	5.40	5.57	108	111	80.0-120			3.04	20
Lead,Dissolved	0.0500	0.0499	0.0502	99.8	100	80.0-120			0.580	20
Manganese,Dissolved	0.0500	0.0508	0.0530	102	106	80.0-120			4.27	20
Nickel,Dissolved	0.0500	0.0536	0.0572	107	114	80.0-120			6.49	20
Selenium,Dissolved	0.0500	0.0562	0.0568	112	114	80.0-120			1.17	20
Uranium,Dissolved	0.0500	0.0488	0.0498	97.7	99.5	80.0-120			1.86	20
Vanadium,Dissolved	0.0500	0.0506	0.0533	101	107	80.0-120			5.08	20

L983865-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-01 04/17/18 12:39 • (MS) R3302587-5 04/17/18 12:48 • (MSD) R3302587-6 04/17/18 12:52

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0264	0.0811	0.0816	110	111	1	75.0-125			0.610	20
Barium,Dissolved	0.0500	1.27	1.33	1.36	125	172	1	75.0-125		V	1.78	20
Cadmium,Dissolved	0.0500	U	0.0532	0.0531	106	106	1	75.0-125			0.234	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L983865-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-01 04/17/18 12:39 • (MS) R3302587-5 04/17/18 12:48 • (MSD) R3302587-6 04/17/18 12:52

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chromium,Dissolved	0.0500	U	0.0526	0.0550	105	110	1	75.0-125			4.51	20
Cobalt,Dissolved	0.0500	0.000316	0.0531	0.0534	106	106	1	75.0-125			0.558	20
Iron,Dissolved	5.00	0.197	5.64	5.69	109	110	1	75.0-125			0.892	20
Lead,Dissolved	0.0500	0.000585	0.0545	0.0546	108	108	1	75.0-125			0.231	20
Manganese,Dissolved	0.0500	0.399	0.454	0.459	109	119	1	75.0-125			1.11	20
Nickel,Dissolved	0.0500	0.00228	0.0548	0.0554	105	106	1	75.0-125			1.05	20
Selenium,Dissolved	0.0500	0.000675	0.0578	0.0586	114	116	1	75.0-125			1.48	20
Uranium,Dissolved	0.0500	U	0.0559	0.0569	112	114	1	75.0-125			1.68	20
Vanadium,Dissolved	0.0500	0.00147	0.0550	0.0568	107	111	1	75.0-125			3.20	20

Method Blank (MB)

(MB) R3301494-1 04/13/18 02:51

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Cadmium,Dissolved	U		0.000160	0.00100
Chromium,Dissolved	U		0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	0.0162	J	0.0150	0.100
Lead,Dissolved	0.000248	J	0.000240	0.00200
Manganese,Dissolved	U		0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301494-2 04/13/18 02:55 • (LCSD) R3301494-3 04/13/18 02:59

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0471	0.0491	94.2	98.2	80.0-120			4.13	20
Barium,Dissolved	0.0500	0.0482	0.0491	96.5	98.1	80.0-120			1.69	20
Cadmium,Dissolved	0.0500	0.0486	0.0499	97.1	99.7	80.0-120			2.64	20
Chromium,Dissolved	0.0500	0.0470	0.0479	94.1	95.9	80.0-120			1.86	20
Cobalt,Dissolved	0.0500	0.0492	0.0498	98.5	99.6	80.0-120			1.12	20
Iron,Dissolved	5.00	4.83	4.87	96.5	97.3	80.0-120			0.818	20
Lead,Dissolved	0.0500	0.0485	0.0496	97.0	99.2	80.0-120			2.31	20
Manganese,Dissolved	0.0500	0.0462	0.0476	92.5	95.1	80.0-120			2.82	20
Nickel,Dissolved	0.0500	0.0501	0.0509	100	102	80.0-120			1.63	20
Selenium,Dissolved	0.0500	0.0460	0.0499	91.9	99.9	80.0-120			8.26	20
Uranium,Dissolved	0.0500	0.0484	0.0486	96.7	97.1	80.0-120			0.411	20
Vanadium,Dissolved	0.0500	0.0472	0.0485	94.4	96.9	80.0-120			2.62	20

L983865-21 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-21 04/13/18 03:03 • (MS) R3301494-5 04/13/18 03:11 • (MSD) R3301494-6 04/13/18 03:15

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.00602	0.0534	0.0535	94.8	95.0	1	75.0-125			0.204	20
Barium,Dissolved	0.0500	0.0145	0.0663	0.0657	104	102	1	75.0-125			0.844	20
Cadmium,Dissolved	0.0500	U	0.0507	0.0489	101	97.8	1	75.0-125			3.48	20

WG1095182

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983865-21,22,23,24,25,26,27,28,29,30,31,32,33,34,35,36,37,38,39,40

L983865-21 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-21 04/13/18 03:03 • (MS) R3301494-5 04/13/18 03:11 • (MSD) R3301494-6 04/13/18 03:15

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chromium,Dissolved	0.0500	U	0.0468	0.0465	93.5	92.9	1	75.0-125			0.674	20
Cobalt,Dissolved	0.0500	0.00109	0.0490	0.0481	95.9	94.0	1	75.0-125			1.97	20
Iron,Dissolved	5.00	0.0979	4.83	4.76	94.6	93.3	1	75.0-125			1.28	20
Lead,Dissolved	0.0500	0.000638	0.0496	0.0499	98.0	98.6	1	75.0-125			0.611	20
Manganese,Dissolved	0.0500	0.525	0.563	0.568	76.5	85.6	1	75.0-125			0.804	20
Nickel,Dissolved	0.0500	0.00569	0.0534	0.0533	95.4	95.1	1	75.0-125			0.216	20
Selenium,Dissolved	0.0500	0.0108	0.0608	0.0616	99.9	102	1	75.0-125			1.34	20
Uranium,Dissolved	0.0500	0.0422	0.0922	0.0928	100	101	1	75.0-125			0.731	20
Vanadium,Dissolved	0.0500	0.0206	0.0679	0.0677	94.6	94.1	1	75.0-125			0.387	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3302064-1 04/15/18 23:16

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic,Dissolved	U		0.000250	0.00200
Barium,Dissolved	U		0.000360	0.00500
Chromium,Dissolved	0.000573	J	0.000540	0.00200
Cobalt,Dissolved	U		0.000260	0.00200
Iron,Dissolved	U		0.0150	0.100
Lead,Dissolved	U		0.000240	0.00200
Manganese,Dissolved	0.000287	J	0.000250	0.00500
Nickel,Dissolved	U		0.000350	0.00200
Selenium,Dissolved	U		0.000380	0.00200
Uranium,Dissolved	U		0.000330	0.0100
Vanadium,Dissolved	U		0.000180	0.00500

Method Blank (MB)

(MB) R3302297-1 04/16/18 19:53

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Cadmium,Dissolved	U		0.000160	0.00100

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302064-2 04/15/18 23:21 • (LCSD) R3302064-3 04/15/18 23:26

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	0.0516	0.0509	103	102	80.0-120			1.43	20
Barium,Dissolved	0.0500	0.0516	0.0510	103	102	80.0-120			1.07	20
Chromium,Dissolved	0.0500	0.0521	0.0489	104	97.8	80.0-120			6.35	20
Cobalt,Dissolved	0.0500	0.0518	0.0517	104	103	80.0-120			0.160	20
Iron,Dissolved	5.00	5.06	5.01	101	100	80.0-120			1.07	20
Lead,Dissolved	0.0500	0.0502	0.0503	100	101	80.0-120			0.112	20
Manganese,Dissolved	0.0500	0.0494	0.0472	98.8	94.3	80.0-120			4.56	20
Nickel,Dissolved	0.0500	0.0507	0.0513	101	103	80.0-120			1.27	20
Selenium,Dissolved	0.0500	0.0530	0.0530	106	106	80.0-120			0.0998	20
Uranium,Dissolved	0.0500	0.0502	0.0501	100	100	80.0-120			0.214	20
Vanadium,Dissolved	0.0500	0.0497	0.0483	99.3	96.5	80.0-120			2.86	20

WG1095184

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L983865-41,42,43,44,45,46,47,48,49,50,51,52,53,54,55,56,57,58,59

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3302297-2 04/16/18 19:58 • (LCSD) R3302297-3 04/16/18 20:03

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Cadmium,Dissolved	0.0500	0.0509	0.0508	102	102	80.0-120			0.164	20

L983865-59 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-59 04/15/18 23:30 • (MS) R3302064-5 04/15/18 23:40 • (MSD) R3302064-6 04/15/18 23:44

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic,Dissolved	0.0500	U	0.0530	0.0502	106	100	1	75.0-125			5.50	20
Barium,Dissolved	0.0500	U	0.0533	0.0501	107	100	1	75.0-125			6.24	20
Chromium,Dissolved	0.0500	0.00117	0.560	0.0517	1120	101	1	75.0-125	J5	J3	166	20
Cobalt,Dissolved	0.0500	U	0.0554	0.0516	111	103	1	75.0-125			7.19	20
Iron,Dissolved	5.00	U	7.19	5.06	144	101	1	75.0-125	J5	J3	34.9	20
Lead,Dissolved	0.0500	U	0.0509	0.0502	102	100	1	75.0-125			1.46	20
Manganese,Dissolved	0.0500	0.000831	0.0757	0.0489	150	96.0	1	75.0-125	J5	J3	43.2	20
Nickel,Dissolved	0.0500	0.000828	0.295	0.0529	589	104	1	75.0-125	J5	J3	139	20
Selenium,Dissolved	0.0500	U	0.0543	0.0522	109	104	1	75.0-125			4.01	20
Uranium,Dissolved	0.0500	U	0.0511	0.0512	102	102	1	75.0-125			0.0524	20
Vanadium,Dissolved	0.0500	U	0.0521	0.0482	104	96.4	1	75.0-125			7.81	20

L983865-59 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-59 04/16/18 20:07 • (MS) R3302297-6 04/16/18 20:21 • (MSD) R3302297-7 04/16/18 20:26

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Cadmium,Dissolved	0.0500	U	0.0550	0.0524	110	105	1	75.0-125			4.84	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301947-1 04/15/18 08:44

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Iron	U		0.0150	0.100
Lead	0.000357	J	0.000240	0.00200
Manganese	U		0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301947-2 04/15/18 08:49 • (LCSD) R3301947-3 04/15/18 08:54

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Arsenic	0.0500	0.0511	0.0510	102	102	80.0-120			0.176	20
Barium	0.0500	0.0484	0.0488	96.8	97.7	80.0-120			0.867	20
Calcium	5.00	5.02	5.13	100	103	80.0-120			2.05	20
Chromium	0.0500	0.0512	0.0508	102	102	80.0-120			0.860	20
Iron	5.00	5.27	5.23	105	105	80.0-120			0.850	20
Lead	0.0500	0.0504	0.0511	101	102	80.0-120			1.27	20
Manganese	0.0500	0.0514	0.0507	103	101	80.0-120			1.35	20
Potassium	5.00	5.11	5.11	102	102	80.0-120			0.0397	20
Selenium	0.0500	0.0511	0.0521	102	104	80.0-120			2.10	20
Sodium	5.00	5.15	5.23	103	105	80.0-120			1.63	20

L984054-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984054-07 04/15/18 08:58 • (MS) R3301947-5 04/15/18 09:08 • (MSD) R3301947-6 04/15/18 09:13

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.00145	0.0508	0.0512	98.7	99.5	1	75.0-125			0.811	20
Barium	0.0500	0.0546	0.102	0.0998	94.6	90.3	1	75.0-125			2.16	20
Calcium	5.00	22.4	27.2	26.9	95.9	89.0	1	75.0-125			1.27	20
Chromium	0.0500	0.00653	0.0559	0.0548	98.8	96.6	1	75.0-125			2.05	20
Potassium	5.00	10.8	15.7	15.5	97.1	92.6	1	75.0-125			1.41	20
Iron	5.00	0.0773	5.04	5.00	99.2	98.4	1	75.0-125			0.833	20
Lead	0.0500	0.000678	0.0497	0.0499	98.0	98.4	1	75.0-125			0.466	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L984054-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L984054-07 04/15/18 08:58 • (MS) R3301947-5 04/15/18 09:08 • (MSD) R3301947-6 04/15/18 09:13

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Manganese	0.0500	0.00650	0.0545	0.0540	96.0	95.0	1	75.0-125			0.953	20
Selenium	0.0500	0.000679	0.0488	0.0505	96.3	99.7	1	75.0-125			3.44	20
Sodium	5.00	35.3	40.1	39.7	95.6	87.1	1	75.0-125			1.07	20

WG1095731

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L983865-02,03,04,05,06,08,10,13,14,15,16,17,19,21,22,25,26,27,28,29

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301418-3 04/10/18 11:48

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*109*			*77.0-122*

Laboratory Control Sample (LCS)

(LCS) R3301418-2 04/10/18 11:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TPH (GC/FID) Low Fraction	5.50	4.86	88.4	71.0-136	
(S) a,a,a-Trifluorotoluene(FID)			*88.8*	*77.0-122*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301391-3 04/09/18 21:12

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*98.3*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301391-1 04/09/18 20:00 • (LCSD) R3301391-2 04/09/18 20:24

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	5.35	5.44	97.4	98.9	71.0-136			1.62	20
(S) a,a,a-Trifluorotoluene(FID)				*99.6*	*99.9*	*77.0-122*				

L983865-50 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-50 04/10/18 16:46 • (MS) R3301391-4 04/10/18 17:10 • (MSD) R3301391-5 04/10/18 17:45

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	U	3.12	2.98	56.6	54.1	1	18.0-160			4.53	20
(S) a,a,a-Trifluorotoluene(FID)					*97.9*	*95.8*		*77.0-122*				

WG1095828

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L983865-51,52,53,54,55

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301217-3 04/10/18 12:14

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*101*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301217-1 04/10/18 11:08 • (LCSD) R3301217-2 04/10/18 11:30

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	5.22	5.28	94.9	96.0	71.0-136			1.19	20
(S) a,a,a-Trifluorotoluene(FID)				*97.4*	*97.0*	*77.0-122*				

L983828-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983828-01 04/10/18 14:00 • (MS) R3301217-4 04/10/18 21:14 • (MSD) R3301217-5 04/10/18 21:36

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	3.60	3.14	2.51	0.000	0.000	1	18.0-160	J6	J3 J6	22.5	20
(S) a,a,a-Trifluorotoluene(FID)					*103*	*93.1*		*77.0-122*				

WG1095836

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L983865-56,57,58,59

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3300969-3 04/11/18 01:26

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*105*			*77.0-122*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300969-1 04/11/18 00:17 • (LCSD) R3300969-2 04/11/18 00:40

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	4.74	4.90	86.1	89.1	71.0-136			3.38	20
(S) a,a,a-Trifluorotoluene(FID)				*98.3*	*98.3*	*77.0-122*				

L983865-56 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L983865-56 04/12/18 06:38 • (MS) R3301114-1 04/12/18 07:01 • (MSD) R3301114-2 04/12/18 07:23

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	U	2.07	2.10	37.6	38.2	1	18.0-160			1.56	20
(S) a,a,a-Trifluorotoluene(FID)					*95.5*	*95.4*		*77.0-122*				

WG1095231

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983865-02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301328-2 04/07/18 14:14

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1095231

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983865-02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

Method Blank (MB)

(MB) R3301328-2 04/07/18 14:14

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*110*			*80.0-120*
(S) Dibromofluoromethane	*102*			*76.0-123*
(S) 4-Bromofluorobenzene	*96.6*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3301328-1 04/07/18 13:36

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.121	96.9	10.0-160	
Benzene	0.0250	0.0239	95.5	69.0-123	
Bromodichloromethane	0.0250	0.0238	95.2	76.0-120	
Bromoform	0.0250	0.0240	96.1	67.0-132	
Bromomethane	0.0250	0.0249	99.7	18.0-160	
n-Butylbenzene	0.0250	0.0247	98.6	72.0-126	
sec-Butylbenzene	0.0250	0.0220	88.2	74.0-121	
Carbon disulfide	0.0250	0.0231	92.6	55.0-127	
Carbon tetrachloride	0.0250	0.0301	120	63.0-122	
Chlorobenzene	0.0250	0.0268	107	79.0-121	
Chlorodibromomethane	0.0250	0.0265	106	75.0-125	
Chloroethane	0.0250	0.0284	113	47.0-152	
Chloroform	0.0250	0.0233	93.3	72.0-121	
Chloromethane	0.0250	0.0253	101	48.0-139	
1,2-Dibromoethane	0.0250	0.0264	106	77.0-123	
1,1-Dichloroethane	0.0250	0.0244	97.8	70.0-126	
1,2-Dichloroethane	0.0250	0.0258	103	67.0-126	
1,1-Dichloroethene	0.0250	0.0229	91.7	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0239	95.6	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0232	92.7	71.0-121	
1,2-Dichloropropane	0.0250	0.0240	96.2	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0267	107	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0272	109	74.0-127	

Laboratory Control Sample (LCS)

(LCS) R3301328-1 04/07/18 13:36

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.0250	0.0256	102	77.0-120	
2-Hexanone	0.125	0.140	112	58.0-147	
Isopropylbenzene	0.0250	0.0222	88.9	75.0-120	
p-Isopropyltoluene	0.0250	0.0231	92.3	74.0-126	
2-Butanone (MEK)	0.125	0.131	105	37.0-158	
Methylene Chloride	0.0250	0.0243	97.3	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.144	115	59.0-143	
Methyl tert-butyl ether	0.0250	0.0231	92.5	64.0-123	
Naphthalene	0.0250	0.0217	86.7	62.0-128	
n-Propylbenzene	0.0250	0.0240	95.9	79.0-120	
Styrene	0.0250	0.0230	92.0	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0262	105	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0243	97.1	71.0-122	
Tetrachloroethene	0.0250	0.0263	105	70.0-127	
Toluene	0.0250	0.0262	105	77.0-120	
1,1,1-Trichloroethane	0.0250	0.0246	98.4	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0251	101	78.0-120	
Trichloroethene	0.0250	0.0258	103	78.0-120	
1,2,4-Trimethylbenzene	0.0250	0.0227	90.9	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0223	89.2	75.0-120	
Vinyl chloride	0.0250	0.0244	97.5	64.0-133	
Xylenes, Total	0.0750	0.0768	102	77.0-120	
o-Xylene	0.0250	0.0253	101	78.0-120	
m&p-Xylenes	0.0500	0.0515	103	77.0-120	
(S) Toluene-d8			*107*	*80.0-120*	
(S) Dibromofluoromethane			*99.5*	*76.0-123*	
(S) 4-Bromofluorobenzene			*96.5*	*80.0-120*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301324-3 04/07/18 15:20

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1095245

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983865-21,22,23,24,25,26,27

Method Blank (MB)

(MB) R3301324-3 04/07/18 15:20

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*108*			*80.0-120*
(S) Dibromofluoromethane	*85.9*			*76.0-123*
(S) 4-Bromofluorobenzene	*104*			*80.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301324-1 04/07/18 13:57 • (LCSD) R3301324-2 04/07/18 14:18

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.0617	0.0710	49.4	56.8	10.0-160			13.9	23
Benzene	0.0250	0.0225	0.0228	90.0	91.3	69.0-123			1.42	20
Bromodichloromethane	0.0250	0.0237	0.0241	95.0	96.4	76.0-120			1.52	20
Bromoform	0.0250	0.0241	0.0252	96.3	101	67.0-132			4.56	20
Bromomethane	0.0250	0.00902	0.00993	36.1	39.7	18.0-160			9.62	20
n-Butylbenzene	0.0250	0.0253	0.0257	101	103	72.0-126			1.89	20
sec-Butylbenzene	0.0250	0.0257	0.0263	103	105	74.0-121			2.36	20
Carbon disulfide	0.0250	0.0233	0.0233	93.2	93.0	55.0-127			0.245	20
Carbon tetrachloride	0.0250	0.0217	0.0219	86.7	87.5	63.0-122			0.932	20
Chlorobenzene	0.0250	0.0247	0.0255	98.9	102	79.0-121			3.07	20
Chlorodibromomethane	0.0250	0.0242	0.0253	96.6	101	75.0-125			4.54	20
Chloroethane	0.0250	0.0223	0.0213	89.1	85.4	47.0-152			4.29	20
Chloroform	0.0250	0.0220	0.0221	87.9	88.6	72.0-121			0.792	20
Chloromethane	0.0250	0.0188	0.0189	75.2	75.7	48.0-139			0.641	20
1,2-Dibromoethane	0.0250	0.0251	0.0261	101	105	77.0-123			3.89	20
1,1-Dichloroethane	0.0250	0.0225	0.0227	90.1	90.9	70.0-126			0.886	20
1,2-Dichloroethane	0.0250	0.0210	0.0214	83.9	85.5	67.0-126			1.90	20
1,1-Dichloroethene	0.0250	0.0235	0.0234	94.1	93.7	64.0-129			0.363	20
cis-1,2-Dichloroethene	0.0250	0.0223	0.0226	89.2	90.3	73.0-120			1.23	20
trans-1,2-Dichloroethene	0.0250	0.0233	0.0232	93.0	92.8	71.0-121			0.187	20
1,2-Dichloropropane	0.0250	0.0243	0.0248	97.4	99.2	75.0-125			1.86	20
cis-1,3-Dichloropropene	0.0250	0.0253	0.0267	101	107	79.0-123			5.51	20
trans-1,3-Dichloropropene	0.0250	0.0249	0.0257	99.6	103	74.0-127			3.11	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301324-1 04/07/18 13:57 • (LCSD) R3301324-2 04/07/18 14:18

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0263	0.0269	105	108	77.0-120			2.37	20
2-Hexanone	0.125	0.131	0.139	104	111	58.0-147			6.46	20
Isopropylbenzene	0.0250	0.0263	0.0269	105	107	75.0-120			2.16	20
p-Isopropyltoluene	0.0250	0.0258	0.0262	103	105	74.0-126			1.48	20
2-Butanone (MEK)	0.125	0.0957	0.102	76.6	81.9	37.0-158			6.75	20
Methylene Chloride	0.0250	0.0215	0.0215	85.9	86.0	66.0-121			0.0988	20
4-Methyl-2-pentanone (MIBK)	0.125	0.134	0.139	107	112	59.0-143			4.30	20
Methyl tert-butyl ether	0.0250	0.0224	0.0224	89.5	89.7	64.0-123			0.193	20
Naphthalene	0.0250	0.0266	0.0280	107	112	62.0-128			5.02	20
n-Propylbenzene	0.0250	0.0258	0.0261	103	104	79.0-120			0.814	20
Styrene	0.0250	0.0268	0.0270	107	108	78.0-124			0.853	20
1,1,1,2-Tetrachloroethane	0.0250	0.0253	0.0259	101	104	75.0-122			2.34	20
1,1,2,2-Tetrachloroethane	0.0250	0.0262	0.0267	105	107	71.0-122			1.65	20
Tetrachloroethene	0.0250	0.0250	0.0258	100	103	70.0-127			3.30	20
Toluene	0.0250	0.0251	0.0257	100	103	77.0-120			2.59	20
1,1,1-Trichloroethane	0.0250	0.0223	0.0229	89.3	91.6	68.0-122			2.63	20
1,1,2-Trichloroethane	0.0250	0.0250	0.0260	100	104	78.0-120			3.90	20
Trichloroethene	0.0250	0.0232	0.0233	92.8	93.1	78.0-120			0.271	20
1,2,4-Trimethylbenzene	0.0250	0.0256	0.0259	103	103	75.0-120			0.883	20
1,3,5-Trimethylbenzene	0.0250	0.0256	0.0258	103	103	75.0-120			0.817	20
Vinyl chloride	0.0250	0.0222	0.0227	88.8	90.9	64.0-133			2.32	20
Xylenes, Total	0.0750	0.0784	0.0807	105	108	77.0-120			2.89	20
o-Xylene	0.0250	0.0260	0.0266	104	106	78.0-120			2.49	20
m&p-Xylenes	0.0500	0.0524	0.0541	105	108	77.0-120			3.19	20
(S) Toluene-d8				*104*	*106*	*80.0-120*				
(S) Dibromofluoromethane				*88.7*	*88.9*	*76.0-123*				
(S) 4-Bromofluorobenzene				*104*	*103*	*80.0-120*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301325-2 04/08/18 00:51

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1095247

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983865-28,29,30,31,32,33,34,35,36,37,38,39,40,41,42,43,44,45,46,47

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301325-2 04/08/18 00:51

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*107*			*80.0-120*
(S) Dibromofluoromethane	*88.4*			*76.0-123*
(S) 4-Bromofluorobenzene	*106*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3301325-1 04/07/18 23:47

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.0884	70.7	10.0-160	
Benzene	0.0250	0.0224	89.4	69.0-123	
Bromodichloromethane	0.0250	0.0240	96.0	76.0-120	
Bromoform	0.0250	0.0250	100	67.0-132	
Bromomethane	0.0250	0.00652	26.1	18.0-160	
n-Butylbenzene	0.0250	0.0240	95.8	72.0-126	
sec-Butylbenzene	0.0250	0.0246	98.4	74.0-121	
Carbon disulfide	0.0250	0.0225	90.0	55.0-127	
Carbon tetrachloride	0.0250	0.0218	87.3	63.0-122	
Chlorobenzene	0.0250	0.0239	95.5	79.0-121	
Chlorodibromomethane	0.0250	0.0241	96.6	75.0-125	
Chloroethane	0.0250	0.0201	80.6	47.0-152	
Chloroform	0.0250	0.0219	87.7	72.0-121	
Chloromethane	0.0250	0.0182	72.7	48.0-139	
1,2-Dibromoethane	0.0250	0.0251	100	77.0-123	
1,1-Dichloroethane	0.0250	0.0227	91.0	70.0-126	
1,2-Dichloroethane	0.0250	0.0215	86.1	67.0-126	
1,1-Dichloroethene	0.0250	0.0228	91.1	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0220	88.1	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0230	92.1	71.0-121	
1,2-Dichloropropane	0.0250	0.0247	98.7	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0250	100	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0245	97.9	74.0-127	

Laboratory Control Sample (LCS)

(LCS) R3301325-1 04/07/18 23:47

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.0250	0.0250	99.9	77.0-120	
2-Hexanone	0.125	0.139	111	58.0-147	
Isopropylbenzene	0.0250	0.0251	100	75.0-120	
p-Isopropyltoluene	0.0250	0.0244	97.7	74.0-126	
2-Butanone (MEK)	0.125	0.119	94.9	37.0-158	
Methylene Chloride	0.0250	0.0212	84.7	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.138	111	59.0-143	
Methyl tert-butyl ether	0.0250	0.0228	91.4	64.0-123	
Naphthalene	0.0250	0.0261	105	62.0-128	
n-Propylbenzene	0.0250	0.0245	98.1	79.0-120	
Styrene	0.0250	0.0259	104	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0250	100	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0245	98.2	71.0-122	
Tetrachloroethene	0.0250	0.0233	93.1	70.0-127	
Toluene	0.0250	0.0237	94.8	77.0-120	
1,1,1-Trichloroethane	0.0250	0.0224	89.5	68.0-122	
1,1,2-Trichloroethane	0.0250	0.0244	97.4	78.0-120	
Trichloroethene	0.0250	0.0237	94.7	78.0-120	
1,2,4-Trimethylbenzene	0.0250	0.0247	98.9	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0248	99.0	75.0-120	
Vinyl chloride	0.0250	0.0228	91.1	64.0-133	
Xylenes, Total	0.0750	0.0762	102	77.0-120	
o-Xylene	0.0250	0.0254	102	78.0-120	
m&p-Xylenes	0.0500	0.0508	102	77.0-120	
(S) Toluene-d8			*102*	*80.0-120*	
(S) Dibromofluoromethane			*91.2*	*76.0-123*	
(S) 4-Bromofluorobenzene			*102*	*80.0-120*	

Method Blank (MB)

(MB) R3300537-2 04/08/18 04:53

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

QUALITY CONTROL SUMMARY

Method Blank (MB)

(MB) R3300537-2 04/08/18 04:53

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
Xylenes, Total	U		0.00106	0.00300
(S) Toluene-d8	*102*			*80.0-120*
(S) Dibromofluoromethane	*99.8*			*76.0-123*
(S) 4-Bromofluorobenzene	*91.3*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3300537-1 04/08/18 04:14

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.111	88.7	10.0-160	
Bromodichloromethane	0.0250	0.0237	94.8	76.0-120	
Bromoform	0.0250	0.0258	103	67.0-132	
Bromomethane	0.0250	0.0375	150	18.0-160	
n-Butylbenzene	0.0250	0.0247	98.7	72.0-126	
sec-Butylbenzene	0.0250	0.0254	102	74.0-121	
Carbon disulfide	0.0250	0.0231	92.4	55.0-127	
Carbon tetrachloride	0.0250	0.0255	102	63.0-122	
Benzene	0.0250	0.0256	102	69.0-123	
Chlorobenzene	0.0250	0.0284	114	79.0-121	
Chlorodibromomethane	0.0250	0.0275	110	75.0-125	
Chloroethane	0.0250	0.0405	162	47.0-152	J4
Chloroform	0.0250	0.0251	101	72.0-121	
Chloromethane	0.0250	0.0228	91.1	48.0-139	
1,2-Dibromoethane	0.0250	0.0274	110	77.0-123	
1,1-Dichloroethane	0.0250	0.0248	99.0	70.0-126	
1,2-Dichloroethane	0.0250	0.0249	99.4	67.0-126	
1,1-Dichloroethene	0.0250	0.0240	95.8	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0257	103	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0256	102	71.0-121	
1,2-Dichloropropane	0.0250	0.0247	98.7	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0264	105	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0276	110	74.0-127	

WG1095249

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L983865-48,49,50,51,52,53,54,55,56,57,58,59,60,61,62

Laboratory Control Sample (LCS)

(LCS) R3300537-1 04/08/18 04:14

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
2-Hexanone	0.125	0.134	107	58.0-147	
Isopropylbenzene	0.0250	0.0247	99.0	75.0-120	
p-Isopropyltoluene	0.0250	0.0261	104	74.0-126	
2-Butanone (MEK)	0.125	0.123	98.5	37.0-158	
Methylene Chloride	0.0250	0.0258	103	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.132	106	59.0-143	
Ethylbenzene	0.0250	0.0285	114	77.0-120	
n-Propylbenzene	0.0250	0.0243	97.3	79.0-120	
Styrene	0.0250	0.0262	105	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0278	111	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0217	86.9	71.0-122	
Tetrachloroethene	0.0250	0.0292	117	70.0-127	
1,1,1-Trichloroethane	0.0250	0.0231	92.4	68.0-122	
Methyl tert-butyl ether	0.0250	0.0230	91.9	64.0-123	
1,1,2-Trichloroethane	0.0250	0.0272	109	78.0-120	
Trichloroethene	0.0250	0.0290	116	78.0-120	
Naphthalene	0.0250	0.0254	102	62.0-128	
1,2,4-Trimethylbenzene	0.0250	0.0253	101	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0245	98.0	75.0-120	
Vinyl chloride	0.0250	0.0263	105	64.0-133	
Toluene	0.0250	0.0269	108	77.0-120	
o-Xylene	0.0250	0.0285	114	78.0-120	
m&p-Xylenes	0.0500	0.0576	115	77.0-120	
Xylenes, Total	0.0750	0.0861	115	77.0-120	
(S) Toluene-d8			*100*	*80.0-120*	
(S) Dibromofluoromethane			*93.9*	*76.0-123*	
(S) 4-Bromofluorobenzene			*84.4*	*80.0-120*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301207-2 04/11/18 11:49

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3301207-2 04/11/18 11:49

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
Xylenes, Total	U		0.00106	0.00300
(S) Toluene-d8	*106*			*80.0-120*
(S) Dibromofluoromethane	*89.2*			*76.0-123*
(S) 4-Bromofluorobenzene	*80.6*			*80.0-120*

Laboratory Control Sample (LCS)

(LCS) R3301207-1 04/11/18 11:11

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Acetone	0.125	0.117	93.9	10.0-160	
Bromodichloromethane	0.0250	0.0236	94.5	76.0-120	
Bromoform	0.0250	0.0207	82.9	67.0-132	
Bromomethane	0.0250	0.0236	94.4	18.0-160	
n-Butylbenzene	0.0250	0.0216	86.3	72.0-126	
sec-Butylbenzene	0.0250	0.0212	84.7	74.0-121	
Carbon disulfide	0.0250	0.0197	78.6	55.0-127	
Carbon tetrachloride	0.0250	0.0216	86.5	63.0-122	
Benzene	0.0250	0.0210	84.1	69.0-123	
Chlorobenzene	0.0250	0.0251	101	79.0-121	
Chlorodibromomethane	0.0250	0.0256	102	75.0-125	
Chloroethane	0.0250	0.0209	83.6	47.0-152	
Chloroform	0.0250	0.0225	89.9	72.0-121	
Chloromethane	0.0250	0.0205	82.0	48.0-139	
1,1-Dichloroethane	0.0250	0.0225	90.1	70.0-126	
1,1-Dichloroethene	0.0250	0.0207	82.6	64.0-129	
cis-1,2-Dichloroethene	0.0250	0.0212	84.9	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0206	82.4	71.0-121	
1,2-Dibromoethane	0.0250	0.0254	101	77.0-123	
1,2-Dichloropropane	0.0250	0.0242	96.9	75.0-125	
cis-1,3-Dichloropropene	0.0250	0.0262	105	79.0-123	
trans-1,3-Dichloropropene	0.0250	0.0262	105	74.0-127	
1,2-Dichloroethane	0.0250	0.0246	98.3	67.0-126	

Laboratory Control Sample (LCS)

(LCS) R3301207-1 04/11/18 11:11

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
2-Hexanone	0.125	0.134	107	58.0-147	
Isopropylbenzene	0.0250	0.0200	80.1	75.0-120	
p-Isopropyltoluene	0.0250	0.0221	88.5	74.0-126	
2-Butanone (MEK)	0.125	0.108	86.6	37.0-158	
Methylene Chloride	0.0250	0.0206	82.2	66.0-121	
4-Methyl-2-pentanone (MIBK)	0.125	0.135	108	59.0-143	
Ethylbenzene	0.0250	0.0250	100	77.0-120	
n-Propylbenzene	0.0250	0.0198	79.0	79.0-120	
Styrene	0.0250	0.0197	78.8	78.0-124	
1,1,1,2-Tetrachloroethane	0.0250	0.0250	99.8	75.0-122	
1,1,2,2-Tetrachloroethane	0.0250	0.0198	79.3	71.0-122	
Tetrachloroethene	0.0250	0.0243	97.2	70.0-127	
1,1,1-Trichloroethane	0.0250	0.0227	90.9	68.0-122	
Methyl tert-butyl ether	0.0250	0.0228	91.1	64.0-123	
1,1,2-Trichloroethane	0.0250	0.0255	102	78.0-120	
Trichloroethene	0.0250	0.0247	98.9	78.0-120	
Naphthalene	0.0250	0.0245	98.1	62.0-128	
1,2,4-Trimethylbenzene	0.0250	0.0205	82.1	75.0-120	
1,3,5-Trimethylbenzene	0.0250	0.0204	81.7	75.0-120	
Vinyl chloride	0.0250	0.0212	84.7	64.0-133	
Toluene	0.0250	0.0254	102	77.0-120	
o-Xylene	0.0250	0.0255	102	78.0-120	
m&p-Xylenes	0.0500	0.0504	101	77.0-120	
Xylenes, Total	0.0750	0.0759	101	77.0-120	
(S) Toluene-d8			*104*	*80.0-120*	
(S) Dibromofluoromethane			*89.8*	*76.0-123*	
(S) 4-Bromofluorobenzene			*80.8*	*80.0-120*	

Semi-Volatile Organic Compounds (GC) by Method 3511/8015 L983865-01,02,03,04,05,06,07,08,09,13,14,15,16,17,18,19,20,21,22

Method Blank (MB)

(MB) R3300544-1 04/09/18 13:09

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	0.0843	J	0.0247	0.100
(S) o-Terphenyl	*92.0*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300544-2 04/09/18 13:26 • (LCSD) R3300544-3 04/09/18 13:43

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.36	1.36	90.6	90.7	50.0-150			0.131	20
(S) o-Terphenyl				*122*	*123*	*31.0-160*				

WG1095660

QUALITY CONTROL SUMMARY

Semi-Volatile Organic Compounds (GC) by Method 3511/8015 L983865-23,24,25,26,27,28,29,30,31,32,33,34,35,36,37,38,39,40,41,42

Method Blank (MB)

(MB) R3300760-1 04/10/18 19:35

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*56.3*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300760-2 04/10/18 19:55 • (LCSD) R3300760-3 04/10/18 20:15

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.15	1.24	77.0	82.7	50.0-150			7.10	20
(S) o-Terphenyl				*101*	*109*	*31.0-160*				

WG1095661

QUALITY CONTROL SUMMARY

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

L983865-43,44,45,46,47,48,49,50,51,52,53,54,55,56,57,58,59

Method Blank (MB)

(MB) R3300824-1 04/11/18 06:08

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*81.2*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3300824-2 04/11/18 06:25 • (LCSD) R3300824-3 04/11/18 06:42

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.49	1.50	99.1	100	50.0-150			0.982	20
(S) o-Terphenyl				*118*	*121*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3301886-1 04/12/18 20:48

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*96.4*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3301886-2 04/12/18 21:04 • (LCSD) R3301886-3 04/12/18 21:21

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.39	1.67	92.5	111	50.0-150			18.3	20
(S) o-Terphenyl				*127*	*145*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J1	Surrogate recovery limits have been exceeded; values are outside upper control limits.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J5	The sample matrix interfered with the ability to make any accurate determination; spike value is high.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.
V3	The internal standard exhibited poor recovery due to sample matrix interference. The analytical results will be biased high. BDL results will be unaffected.

ACCREDITATIONS & LOCATIONS

ESC Lab Sciences is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1,6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1,4]	2006
Louisiana [1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

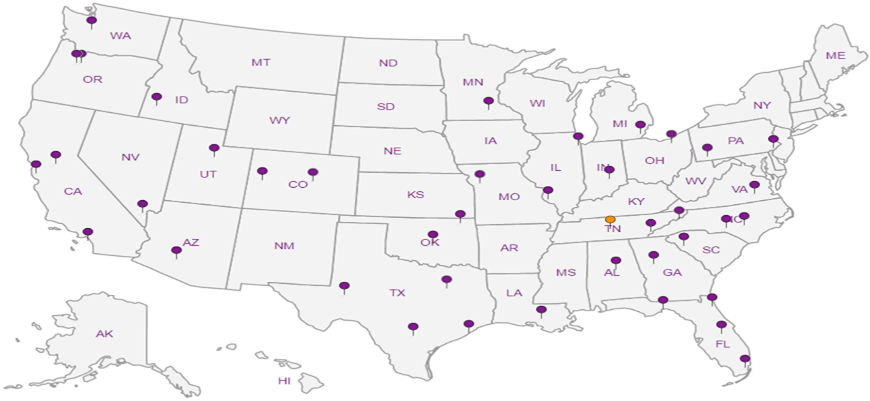
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

ESC Lab Sciences has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. ESC Lab Sciences performs all testing at our central laboratory.



Chain of Custody Page 1 of 12

ESC L·A·B S·C·I·E·N·C·E·S

YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L#	983 865
Table #	
Acctnum:	**TRCATX**
Template:	**T133463**
Prelogin:	**P643247**
TSR:	**526**
PB:	
Shipped Via:	

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project #: **249545.0000.0000 000001**

Lab Project #: **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: **REST (Navajo - Artesia)**

P.O. #: **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										<2				<2				
RW-#15C	Grab	GW		4/5/18	0905	8	X	X		X	X	X	X					01
MW-48	Grab	GW		4/5/18	0955	10	X	X	X	X	X	X	X					02
MW-130	Grab	GW		4/5/18	0955	10	X	X	X	X	X	X	X					03
KWB-4	Grab	GW				8	X	X		X	X	X	X					
RW-19	Grab	GW				8	X	X		X	X	X	X					
MW-52	Grab	GW		4/5/18	0905	11	X	X	X		X	X	X	X	X			04
MW-109	Grab	GW		4/5/18	0905	10	X	X	X	X	X	X	X					05
MW-110	Grab	GW		4/5/18	0945	10	X	X	X	X	X	X	X					06
RW-12R	Grab	GW		4/4/18	1200	8	X	X		X	X	X	X					07
MW-113	Grab	GW		4/4/18	1100	10	X	X	X	X	X	X	X					08

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP _Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: _Y ✓N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: ✓Y _N
Preservation Correct/Checked: ✓Y _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 3 [✓ HCL] / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: see attach °C Bottles Received: 573
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 845

If preservation required by Login: Date/Time
Diss Met pH Adj @ 1816 4/6/18

Hold:

Condition: [✓ NCF] / OK

Chain of Custody Page 2 of 12

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project #: **249545.0000.0000 000001**

Lab Project #: **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: **REST (Navajo - Artesia)**

P.O. #: **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L# 923865

Table #

Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										22				22				
KWB-8	**Grab**	**GW**				**9**	X	X			X	X	X	X	X			
RW-22	**Grab**	**GW**				**8**	X	X		X	X	X	X					
RW-20A	**Grab**	**GW**				**8**	X	X		X	X	X	X					
RW-20B	**Grab**	**GW**				**8**	X	X		X	X	X	X					
RW-13R	**Grab**	**GW**		**4/4/18**	**1250**	**8**	X	X		X	X	X	X					09
RW-14R	**Grab**	**GW**				**8**	X	X		X	X	X	X					
MW-133	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-134	**Grab**	**GW**		**4/4/18**	**1010**	**10**	X	X	X	X	X	X	X					10
RA-4798	**Grab**	**GW**				**5**	X				X	X	X					
RA-4196	**Grab**	**GW**				**5**	X				X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_______

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ___ FedEx ___ Courier ___ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] ___Y ___N
COC Signed/Accurate: [✓ Y] ___N
Bottles arrive intact: ___Y [✓ N]
Correct bottles used: [✓ Y] ___N
Sufficient volume sent: [✓ Y] ___N
If Applicable
VOA Zero Headspace: [✓ Y] ___N
Preservation Correct/Checked: [✓ Y] ___N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 3 [✓ HCL] / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attd °C Bottles Received: 573	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	Hold: Condition: [✓ NCF] / OK

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 3 of 12

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# 973865
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Quote #
Immediately Packed on Ice N____ Y____

Rush? (Lab MUST Be Notified)
____ Same Day
____ Next Day
____ Two Day
____ Three Day
____ Five Day
____ 5 Day (Rad Only)
____ 10 Day (Rad Only)

Date Results Needed

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										5				5				
RA-3156	Grab	GW		4/4/18	0805	5	X				X	X	X					11
RA-313	Grab	GW		4/4/18	1830	5	X				X	X	X					12
KWB-7	Grab	GW				9	X	X			X	X	X	X	X			
MW-135	Grab	GW				10	X	X	X	X	X	X	X					
KWB-11A	Grab	GW				11	X	X	X		X	X	X	X	X			
KWB-11B	Grab	GW				11	X	X	X		X	X	X	X	X			
MW-115	Grab	GW		4/4/18	1555	10	X	X	X	X	X	X	X					13
MW-114	Grab	GW		4/4/18	1650	10	X	X	X	X	X	X	X					14
MW-117	Grab	GW		4/4/18	0850	10	X	X	X	X	X	X	X					15
MW-118	Grab	GW		4/4/18	0935	10	X	X	X	X	X	X	X					16

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] _Y _N
COC Signed/Accurate: [✓ Y] _N
Bottles arrive intact: _Y [✓ N]
Correct bottles used: [✓ Y] _N
Sufficient volume sent: [✓ Y] _N
If Applicable
VOA Zero Headspace: _Y _N
Preservation Correct/Checked: [✓ Y] _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 3 [✓ HCl] / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See [illegible] °C Bottles Received: 573	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	Hold: Condition: [✓ NCF] / OK

Chain of Custody Page 4 of 12

ESC
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Fax: 615-758-5859

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**

Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L# 973865

Table #

Acctnum: **TRCATX**

Template: **T133463**

Prelogin: **P643247**

TSR: **526**

PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide	Remarks	Sample # (lab only)
										5				3			
MW-119	Grab	GW		4/4/18	1020	10	X	X	X	X	X	X	X				-17
MW-136	Grab	GW				11	X	X	X		X	X	X	X	X		
MW-126A	Grab	GW				10	X	X	X	X	X	X	X				
MW-126B	Grab	GW				10	X	X	X	X	X	X	X				
MW-127	Grab	GW				10	X	X	X	X	X	X	X				
MW-129	Grab	GW				10	X	X	X	X	X	X	X				
RW-#18A	Grab	GW				6	X			X	X	X	X				
KWB-1A	Grab	GW				9	X	X			X	X	X	X	X		
KWB-10R	Grab	GW				8	X	X		X	X	X	X				
MW-131	Grab	GW				10	X	X	X	X	X	X	X				

Pres Chk

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: NP _Y _N
COC Signed/Accurate: ✗Y _N
Bottles arrive intact: ✗Y _N
Correct bottles used: ✗Y _N
Sufficient volume sent: ✗Y _N
If Applicable
VOA Zero Headspace: ✗Y _N
Preservation Correct/Checked: ✗Y _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No [✓ HCl] / MeoH TBR 3
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attached °C Bottles Received: 573
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: [✓ NCF] / OK

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:

Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 5 of 12

ESC
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YOUR LAB OF CHOICE

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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**

Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L # 983865

Table #

Acctnum: **TRCATX**

Template: **T133463**

Prelogin: **P643247**

TSR: **526**

PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
KWB-5	Grab	GW		4/4/18	1125	8	X	X		X	X	X	X					18
MW-111	Grab	GW		4/4/18	1210	10	X	X	X	X	X	X	X					19
KWB-6	Grab	GW		4/4/18	1300	8	X	X		X	X	X	X					20
MW-112	Grab	GW				10	X	X	X	X	X	X	X					
MW-132	Grab	GW				10	X	X	X	X	X	X	X					
MW-57	Grab	GW		4/4/18	1350	10	X	X	X	X	X	X	X					21
RW-#11-0	Grab	GW				8	X	X		X	X	X	X					
KWB-12A	Grab	GW				11	X	X	X		X	X	X	X	X			
KWB-12B	Grab	GW		4/4/18	1435	11	X	X	X		X	X	X	X	X			22
KWB-2R	Grab	GW				8	X	X		X	X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ~~NP~~ _Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: _Y ✓N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: ✓Y _N
Preservation Correct/Checked: ✓Y _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 3 [✓ HCl] / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach °C Bottles Received: 573
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: [✓ NCF] / OK

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 6 of 12

ESC L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**
Project Description: **REST Spring 2018**	City/State Collected: **Artesia, NM**
Phone: **512-684-3170** Fax:	Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-REST**	
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**	Quote #
Collected by (signature):	
Immediately Packed on Ice N____ Y____	

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

L# 923865
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Pres Chk	VOC	DRO	GRO	Short List Metals (Total & Dissolved) 2	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved) 2	Cyanide		Remarks	Sample # (lab only)
MW-58	Grab	GW				9		X	X			X	X	X	X	X			
KWB-13	Grab	GW				9		X	X			X	X	X	X	X			
MW-103	Grab	GW				10		X	X	X	X	X	X	X					
MW-104	Grab	GW				10		X	X	X	X	X	X	X					
MW-64	Grab	GW				10		X	X	X	X	X	X	X					
MW-65	Grab	GW				10		X	X	X	X	X	X	X					
RW-5R	Grab	GW				8		X	X		X	X	X	X					
MW-102	Grab	GW				10		X	X	X	X	X	X	X					
RW-4	Grab	GW		4/4/18	0855	~~7~~ 8		X	X		X	X	X	X					23
RW-6	Grab	GW		4/4/18	0940	8		X	X		X	X	X	X					24

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks: MJ

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP _Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: _Y ✓N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: ✓Y _N
Preservation Correct/Checked: ✓Y _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: [✓ Yes] / No
3 [✓ HCL] / MeoH
TBR

Temp: See Attach °C
Bottles Received: 577

Date: 4/6/18
Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: [✓ NCF] / OK

Chain of Custody Page 7 of 12

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# 983865
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Quote #
Immediately Packed on Ice N___ Y___

Rush? (Lab MUST Be Notified)
__ Same Day
__ Next Day
__ Two Day
__ Three Day
__ Five Day
__ 5 Day (Rad Only)
__ 10 Day (Rad Only)

Date Results Needed

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										2				3				
MW-99	**Grab**	**GW**		**4/4/18**	**1010**	**10**	X	X	X	X	X	X	X					25
MW-66	**Grab**	**GW**		**4/4/18**	**1105**	**11**	X	X	X		X	X	X	X	X			26
MW-28	**Grab**	**GW**		**4/4/18**	**1205**	**11**	X	X	X		X	X	X	X	X			27
MW-59	**Grab**	**GW**		**4/4/18**	**1300**	**10**	X	X	X	X	X	X	X					28
MW-60	**Grab**	**GW**		**4/4/18**	**1350**	**11**	X	X	X		X	X	X	X	X			29
MW-107	**Grab**	**GW**		**4/4/18**	**1520**	**10**	X	X	X	X	X	X	X					70
MW-128	**Grab**	**GW**		**4/4/18**	**1640**	**10**	X	X	X	X	X	X	X					71
MW-125	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
MW-116	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
UG-2	**Grab**	**GW**				**11**	X	X			X	X	X	X	X			

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other______

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] __Y __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 3 [✓ HCl] / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: [illegible] °C Bottles Received: 513
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: [✓ NCF] / OK

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 8 of 12

ESC
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YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Quote #
Immediately Packed on Ice N ____ Y ____

Rush? (Lab MUST Be Notified)
____ Same Day ____ Five Day
____ Next Day ____ 5 Day (Rad Only)
____ Two Day ____ 10 Day (Rad Only)
____ Three Day

Date Results Needed

L# 973865
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										2				2				
UG-3R	**Grab**	**GW**				11	X	X	X		X	X	X	X	X			
UG-1	**Grab**	**GW**				11	X	X	X		X	X	X	X	X			
UG-4	**Grab**	**GW**				11	X	X	X		X	X	X	X	X			
MW-101	**Grab**	**GW**		**4/4/18**	**0910**	10	X	X	X	X	X	X	X					32
MW-105	**Grab**	**GW**		**4/5/18**	**1025**	10	X	X	X	X	X	X	X					33
RW-2	**Grab**	**GW**		**4/4/18**	**1715**	10	X	X	X	X	X	X	X					34
MW-61	**Grab**	**GW**		**4/5/18**	**0935**	10	X	X	X	X	X	X	X					35
MW-62	**Grab**	**GW**		**4/5/18**	**0825**	10	X	X	X	X	X	X	X					36
MW-93	**Grab**	**GW**		**4/4/18**	**1800**	10	X	X	X	X	X	X	X					37
MW-43	**Grab**	**GW**		**4/4/18**	**1630**	11	X	X	X		X	X	X	X	X			38

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] _Y _N
COC Signed/Accurate: [✓ Y] _N
Bottles arrive intact: _Y [✓ N]
Correct bottles used: [✓ Y] _N
Sufficient volume sent: [✓ Y] _N
If Applicable
VOA Zero Headspace: [✓ Y] _N
Preservation Correct/Checked: [✓ Y] _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No 7 [✓ HCL] / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See Attach °C Bottles Received: 573
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: [✓ NCF] / OK

Chain of Custody Page 9 of 12

ESC
L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

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Phone: 800-767-5859
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TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
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Windsor, CT 06095

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **249545.0000.0000 000001**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ___

L # 583865
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
						Pres Chk				2				2				
MW-137	**Grab**	**GW**		**4/5/18**	**0950**	**11**	X	X	X		X	X	X	X	X			39
MW-138	**Grab**	**GW**		**4/5/18**	**0905**	**11**	X	X	X		X	X	X	X	X			40
MW-23	**Grab**	**GW**		**4/4/18**	**1900**	**10**	X	X	X	X	X	X	X					41
MW-39	**Grab**	**GW**		**4/4/18**	**1045**	**10**	X	X	X	X	X	X	X					42
MW-98	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
RW-10	**Grab**	**GW**		**4/4/18**	**1135**	**10**	X	X	X	X	X	X	X					43
MW-40	**Grab**	**GW**		**4/4/18**	**1220**	**10**	X	X	X	X	X	X	X					44
MW-41	**Grab**	**GW**		**4/4/18**	**1520**	**10**	X	X	X	X	X	X	X					45
RW-9	**Grab**	**GW**		**4/4/18**	**1420**	**10**	X	X	X	X	X	X	X					46
MW-42	**Grab**	**GW**		**4/4/18**	**1610**	**10**	X	X	X	X	X	X	X					47

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] _Y _N
COC Signed/Accurate: [✓ Y] _N
Bottles arrive intact: _Y [✓ N]
Correct bottles used: [✓ Y] _N
Sufficient volume sent: [✓ Y] _N
If Applicable
VOA Zero Headspace: [✓ Y] _N
Preservation Correct/Checked: [✓ Y] _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: [✓ Yes] / No
[✓ HCl] / MeoH
TBR

Temp: 3 °C

Bottles Received: 573

Date: 4/6/18

Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: [✓ NCF] / OK

Chain of Custody Page 10 of 12

ESC
L·A·B S·C·I·E·N·C·E·S
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12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**

Project Description: **REST Spring 2018**
City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**

Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Quote #
Date Results Needed

Immediately Packed on Ice N ___ Y ___

L # 983865
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										✓				✓				
MW-29	**Grab**	**GW**		**4/4/18**	**1325**	**10**	×	×	×	×	×	×	×					48
RW-#16B	**Grab**	**GW**		**4/4/18**	**1705**	**8**	×	×		×	×	×	×					49
MW-106	**Grab**	**GW**				**10**	×	×	×	×	×	×	×					
MW-50	**Grab**	**GW**				**8**	×	×		×	×	×	×					
MW-97	**Grab**	**GW**				**10**	×	×	×	×	×	×	×					
MW-92	**Grab**	**GW**				**10**	×	×	×	×	×	×	×					
RW-1	**Grab**	**GW**				**10**	×	×	×	×	×	×	×					
MW-91	**Grab**	**GW**				**10**	×	×	×	×	×	×	×					
MW-90	**Grab**	**GW**				**10**	×	×	×	×	×	×	×					
MW-96	**Grab**	**GW**				**10**	×	×	×	×	×	×	×					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] _Y _N
COC Signed/Accurate: [✓ Y] _N
Bottles arrive intact: [✓ Y] _N
Correct bottles used: [✓ Y] _N
Sufficient volume sent: [✓ Y] _N
If Applicable
VOA Zero Headspace: [✓ Y] _N
Preservation Correct/Checked: [✓ Y] _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No ~~HCl~~ / MeoH TBR 3	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C Bottles Received: 573	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	Hold: Condition: [✓ NCF] / OK

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Chain of Custody Page 11 of 12

ESC L-A-B S-C-I-E-N-C-E-S
YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Spring 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Quote #
Date Results Needed
Immediately Packed on Ice N___ Y___

L# 923865
Table #
Acctnum: **TRCATX**
Template: **T133463**
Prelogin: **P643247**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
Pres Chk										2				2				
MW-94	Grab	GW				10	X	X	X	X	X	X	X					
RW-8	Grab	GW				8	X	X		X	X	X	X					
MW-67	Grab	GW				11	X	X	X		X	X	X	X	X			
MW-95	Grab	GW		4/4/18	0855	10 ~~8~~	X	X	X	X	X	X	X					50
RW-7	Grab	GW		4/4/18	0940	10	X	X	X	X	X	X	X					51
RW-#17A	Grab	GW				10	X	X	X	X	X	X	X					
DUP-REST-01	Grab	GW		4/4/18	1000	10	X	X	X	X	X	X	X					52
DUP-REST-02	Grab	GW				10	X	X	X	X	X	X	X					
DUP-REST-03	Grab	GW		4/4/18	1200	10	X	X	X	X	X	X	X					53
DUP-REST-04	Grab	GW		4/4/18	1100	11	X	X	X		X	X	X	X	X			54

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS __ FedEx __ Courier __ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] __Y __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: __Y [✓ N]
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No [✓ HCL] / MeoH TBR [illegible]
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp [illegible] °C Bottles Received: 573
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: [✓ NCF] / OK

Chain of Custody Page 12 of 12

ESC
L·A·B S·C·I·E·N·C·E·S
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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

TRC Solutions - Austin, TX **505 E. Huntland Dr, Ste 250** **Austin, TX 78752**	Billing Information: **Accounts Payable** **21 Griffin Road North** **Windsor, CT 06095**
Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**
Project Description: **REST Spring 2018**	City/State Collected: **Artesia, NM**
Phone: **512-684-3170** Fax:	Client Project # **249545.0000.0000 000001**
Lab Project # **TRCATX-REST**	
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**	Quote #
Collected by (signature):	***Rush?*** (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day
Immediately Packed on Ice N ___ Y ___	Date Results Needed

L #	497865
Table #	
Acctnum:	**TRCATX**
Template:	**T133463**
Prelogin:	**P643247**
TSR:	**526**
PB:	
Shipped Via:	

Pres Chk

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total & Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Long List Metals (Total & Dissolved)	Cyanide		Remarks	Sample # (lab only)
										<2				<2				
DUP-REST-05	**Grab**	**GW**		**4/4/18**	**1200**	**11**	X	X	X		X	X	X	X	X			55
EB-REST-01	**Grab**	**GW**		**4/4/18**	**1110**	**10**	X	X	X	X	X	X	X					56
EB-REST-02	**Grab**	**GW**				**10**	X	X	X	X	X	X	X					
EB-REST-03	**Grab**	**GW**		**4/4/18**	**1020**	**10**	X	X	X	X	X	X	X					57
EB-REST-04	**Grab**	**GW**		**4/4/18**	**1415**	**11**	X	X	X		X	X	X	X	X			58
EB-REST-05	**Grab**	**GW**		**4/4/18**	**1450**	**11**	X	X	X		X	X	X	X	X			59
TRIP BLANK-REST-01	**Grab**	**GW**		**4/4/18**	-	**1**	X											60
TRIP BLANK-REST-02	**Grab**	**GW**		**4/4/18**	-	**1**	X											61
TRIP BLANK-REST-03	**Grab**	**GW**				**1**	X											
TRIP BLANK-REST-04	**Grab**	**GW**		**4/4/18**	-	**1**	X											62

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
___ UPS ___ FedEx ___ Courier ___ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP ___ Y ___ N
COC Signed/Accurate: ✓ Y ___ N
Bottles arrive intact: ___ Y ✓ N
Correct bottles used: ✓ Y ___ N
Sufficient volume sent: ✓ Y ___ N
If Applicable
VOA Zero Headspace: ✓ Y ___ N
Preservation Correct/Checked: ✓ Y ___ N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No [✓ HCL] / MeoH TBR 3
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C Bottles Received: 573
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 845

If preservation required by Login: Date/Time

Hold:

Condition: [✓ NCF] / OK

Chain of Custody Page 1 of 2

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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to:	Julie Speer
Email To:	jspeer@trcwsolutions.com
Project Description:	REST Spring 2018
City/State Collected:	Artesia, NM
Phone:	512-684-3170
Fax:	
Client Project #	
Lab Project #	
Collected by (print):	**Scott Ude/HMI Team**
Site/Facility ID #	REST (Navajo - Artesia)
P.O. #	119503
Collected by (signature):	
Immediately Packed on Ice	N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

L #
Table #
Acctnum: TRCATX
Template:
Prelogin:
TSR: **Chris McCord**
Cooler:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-48	Grab	GW		4/5/18	955		✓	✓	✓	✓		✓	✓	✓				
RW-#15C	Grab	GW		4/5/18	905		✓	✓		✓		✓	✓	✓				
MW-52	Grab	GW		4/5/18	905		✓	✓	✓		✓	✓	✓	✓	✓			
MW-109	Grab	GW		4/5/18	905		✓	✓	✓	✓		✓	✓	✓				
MW-110	Grab	GW		4/5/18	945		✓	✓	✓	✓		✓	✓	✓				
MW-130	Grab	GW		4/5/18	955		✓	✓	✓	✓		✓	✓	✓				
MW-137	Grab	GW		4/5/18	950		✓	✓	✓		✓	✓	✓	✓	✓			
MW-138	Grab	GW		4/5/18	905		✓	✓	✓			✓	✓	✓	✓			
MW-61	Grab	GW		4/5/18	935		✓	✓	✓	✓		✓	✓	✓				
MW-62	Grab	GW		4/5/18	825		✓	✓	✓	✓		✓	✓	✓				

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ___________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________
Flow ________ Other ________

Hold #

Relinquished by: (Signature) Scott Ude	Date: 4/5/18 GS per email	Time: 17:20 GS	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ____
Relinquished by: (Signature)	Date:	Time:	Received by: (Signature)	Temp: See attn °C Bottles Received: 573
Relinquished by: (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845

Condition: (lab use only)
COC Seal Intact: ___ Y ___ N ___ NA
pH Checked:
NCF:

Chain of Custody Page 2 of 2

ESC
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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L #

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: REST Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
- ___ Same Day 200%
- ___ Next Day 100%
- ___ Two Day 50%
- ___ Three Day 25%

Date Results Needed

Email? ___No ✓ Yes

FAX? ___No ___Yes

Immediately Packed on Ice N ___ Y ✓

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-105	Grab	GW		4/5/18	1025		✓	✓	✓	✓		✓	✓	✓				
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Relinquished by: (Signature) Scott Ude	Date: 4/5/18 GS	Time: 17:20 GS	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only)
Relinquished by: (Signature)	Date: per email	Time:	Received by: (Signature)	~~Temp:~~ °C Bottles Received: 577	COC Seal Intact: ___Y ___N ___NA
Relinquished by: (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	pH Checked: NCF:

Chain of Custody Page 1 of 6

ESC
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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: REST Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Immediately Packed on Ice N___ Y ✓

Rush? (Lab MUST Be Notified)
- ___ Same Day 200%
- ___ Next Day 100%
- ___ Two Day 50%
- ___ Three Day 25%

Date Results Needed

Email? __No ✓ Yes

FAX? __No __Yes

L #

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
mw-23	Grab	GW		4/4/18	1900		✓	✓	✓	✓		✓	✓	✓				
mw-28	Grab	GW		4/4/18	1205		✓	✓	✓		✓	✓	✓	✓	✓			
mw-29	Grab	GW		4/4/18	1325		✓	✓	✓	✓		✓	✓	✓				
mw-39	Grab	GW		4/4/18	1045		✓	✓	✓	✓		✓	✓	✓				
MW-40	Grab	GW		4/4/18	1220		✓	✓	✓	✓		✓	✓	✓				
mw-41	Grab	GW		4/4/18	1520		✓	✓	✓	✓		✓	✓	✓				
mw-42	Grab	GW		4/4/18	1610		✓	✓	✓	✓		✓	✓	✓				
mw-43	Grab	GW		4/4/18	1630		✓	✓	✓		✓	✓	✓	✓	✓			
mw-57	Grab	GW		4/4/18	1350		✓	✓	✓	✓		✓	✓	✓				
mw-59	Grab	GW		4/4/18	1300		✓	✓	✓	✓		✓	✓	✓				

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other______

Remarks: Diss. metals are field-filtered.

pH ______ Temp ______

Flow ______ Other ______

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐____	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C Bottles Received: 573	COC Seal Intact: __Y __N __NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 825	pH Checked: NCF:

Chain of Custody Page 2 of 6

ESC
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YOUR LAB OF CHOICE
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: REST Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed
Email? ___ No ✓ Yes
FAX? ___ No ___ Yes

Immediately Packed on Ice N ___ Y ✓

L #

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-60	Grab	GW		4/4/18	1350		✓	✓	✓		✓	✓	✓	✓	✓			
DUP-Rest-04	Grab	GW		4/4/18	1100		✓	✓	✓		✓	✓	✓	✓	✓			
EB-Rest-04	Grab	GW		4/4/18	1415		✓	✓	✓		✓	✓	✓	✓	✓			
MW-66	Grab	GW		4/4/18	1105		✓	✓	✓		✓	✓	✓	✓	✓			
MW-93	Grab	GW		4/4/18	1800		✓	✓	✓	✓		✓	✓	✓				
MW-95	Grab	GW		4/4/18	855		✓	✓	✓	✓		✓	✓	✓				
MW-99	Grab	GW		4/4/18	1010		✓	✓	✓	✓		✓	✓	✓				
MW-101	Grab	GW		4/4/18	910		✓	✓	✓	✓		✓	✓	✓				
Trip Blank-Rest-04	Grab	GW		4/4/18	—		✓											
MW-107	Grab	GW		4/4/18	1520		✓	✓	✓	✓		✓	✓	✓				

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	Condition: (lab use only)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: See att °C Bottles Received: 573	COC Seal Intact: ___ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 845	pH Checked: NCF:

Chain of Custody Page 3 of 6

ESC
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Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Company Name/Address:
TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
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Billing Information:
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Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: REST Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
- ___ Same Day 200%
- ___ Next Day 100%
- ___ Two Day 50%
- ___ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes

FAX? ___ No ___ Yes

L #

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide	Rem./Contaminant	Sample # (lab only)
MW-111	Grab	GW		4/4/18	1210		✓	✓	✓	✓		✓	✓	✓			
MW-113	Grab	GW		4/4/18	1100		✓	✓	✓	✓		✓	✓	✓			
DUP-Rest-01	Grab	GW		4/4/18	1000		✓	✓	✓	✓		✓	✓	✓			
EB-Rest-01	Grab	GW		4/4/18	1110		✓	✓	✓	✓		✓	✓	✓			
MW-114	Grab	GW		4/4/18	1650		✓	✓	✓	✓		✓	✓	✓			
MW-115	Grab	GW		4/4/18	1555		✓	✓	✓	✓		✓	✓	✓			
MW-117	Grab	GW		4/4/18	850		✓	✓	✓	✓		✓	✓	✓			
MW-118	Grab	GW		4/4/18	935		✓	✓	✓	✓		✓	✓	✓			
MW-119	Grab	GW		4/4/18	1020		✓	✓	✓	✓		✓	✓	✓			
MW-128	Grab	GW		4/4/18	1640		✓	✓	✓	✓		✓	✓	✓			

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ______

Remarks: Diss. metals are field-filtered.

pH ______ Temp ______

Flow ______ Other ______

Hold #

Condition: (lab use only)

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C Bottles Received: 573	COC Seal Intact: ___ Y ___ N ___ NA
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 0845	pH Checked: NCF:

Chain of Custody Page 4 of 6

ESC
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TRC Solutions - Austin, TX
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Billing Information:
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Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: REST Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes

FAX? ___ No ___ Yes

L #

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
MW-134	Grab	GW		4/4/18	1010		✓	✓	✓	✓		✓	✓	✓				
DUP-Rest-03	Grab	GW		4/4/18	1200		✓	✓	✓	✓		✓	✓	✓				
EB-Rest-03	Grab	GW		4/4/18	1020		✓	✓	✓	✓		✓	✓	✓				
Trip Blank-Rest-01	Grab	GW		4/4/18	—		✓											
KWB-5	Grab	GW		4/4/18	1125		✓	✓		✓		✓	✓	✓				
KWB-6	Grab	GW		4/4/18	1300		✓	✓		✓		✓	✓	✓				
KWB-12B	Grab	GW		4/4/18	1435		✓	✓	✓		✓	✓	✓	✓	✓			
Dup-Rest-05	Grab	GW		4/4/18	1200		✓	✓	✓		✓	✓	✓	✓	✓			
EB-Rest-05	Grab	GW		4/4/18	1450		✓	✓	✓		✓	✓	✓	✓	✓			
Trip Blank-Rest-02	Grab	GW		4/4/18	—		✓											

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Relinquished by : (Signature) Scott Ude

Date: 4/5/18

Time: 1000

Received by: (Signature)

Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ________

Condition: (lab use only)

Relinquished by : (Signature)

Date:

Time:

Received by: (Signature)

Temp: [illegible] °C

Bottles Received: 57

COC Seal Intact: ___ Y ___ N ___ NA

Relinquished by : (Signature)

Date:

Time:

Received for lab by: (Signature)

Date: 4/6/18

Time:

pH Checked:

NCF:

Chain of Custody Page 5 of 6

ESC
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Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: REST Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed

Email? ___ No ✓ Yes

FAX? ___ No ___ Yes

Immediately Packed on Ice N ___ Y ✓

L #

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
RA-313	Grab	GW		4/4/18	1830		✓					✓	✓	✓				
RA-3156	Grab	GW		4/4/18	805		✓					✓	✓	✓				
RW-2	Grab	GW		4/4/18	1715		✓	✓	✓	✓		✓	✓	✓				
RW-4	Grab	GW		4/4/18	855		✓	✓		✓		✓	✓	✓				
RW-6	Grab	GW		4/4/18	940		✓	✓		✓		✓	✓	✓				
RW-7	Grab	GW		4/4/18	940		✓	✓	✓	✓		✓	✓	✓				
RW-9	Grab	GW		4/4/18	1420		✓	✓	✓	✓		✓	✓	✓				
RW-10	Grab	GW		4/4/18	1135		✓	✓	✓	✓		✓	✓	✓				
RW-12R	Grab	GW		4/4/18	1200		✓	✓		✓		✓	✓	✓				
RW-13R	Grab	GW		4/4/18	1250		✓	✓		✓		✓	✓	✓				

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ___________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Condition: (lab use only)

Relinquished by: (Signature) Scott Ude | Date: 4/5/18 | Time: 1000 | Received by: (Signature)

Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______

Relinquished by: (Signature) | Date: | Time: | Received by: (Signature)

Temp: °C Bottles Received: 573

COC Seal Intact: ___ Y ___ N ___ NA

Relinquished by: (Signature) | Date: | Time: | Received for lab by: (Signature)

Date: 4/6/18 Time: 0845

pH Checked:

NCF:

Chain of Custody Page 6 of 6

ESC L·A·B S·C·I·E·N·C·E·S
YOUR LAB OF CHOICE

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Company Name/Address:
TRC Solutions - Austin, TX
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Windsor, CT 06095

Report to: Julie Speer

Email To: jspeer@trcwsolutions.com

Project Description: REST Spring 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project #

Lab Project #

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day 200%
___ Next Day 100%
___ Two Day 50%
___ Three Day 25%

Date Results Needed

Email? ___No ✓ Yes
FAX? ___No ___Yes

Immediately Packed on Ice N ___ Y ✓

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC	DRO	GRO	Short List Metals (Total AND Dissolved)	Long List Metals (Total AND Dissolved)	Cations (from "total metals" bottle)	Anions, TDS	NO2NO3	Cyanide		Rem./Contaminant	Sample # (lab only)
RW-#16B	Grab	GW		4/4/18	1705		✓	✓		✓		✓	✓	✓				
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																
	Grab	GW																

L #

Table #

Acctnum: TRCATX

Template:

Prelogin:

TSR: **Chris McCord**

Cooler:

Shipped Via:

* Matrix: **SS** - Soil **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other ________

Remarks: Diss. metals are field-filtered.

pH ________ Temp ________

Flow ________ Other ________

Hold #

Condition: (lab use only)

Relinquished by : (Signature) Scott Ude	Date: 4/5/18	Time: 1000	Received by: (Signature)	Samples returned via: ☐ UPS ☑ FedEx ☐ Courier ☐ ______
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C Bottles Received: 573
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 4/6/18 Time: 845

COC Seal Intact: ___Y ___N ___NA

pH Checked: NCF:

①	4269	9211	4819	(1.7)
②	4269	9213	4020	(2.3)
③	4269	9213	4111	(.2)
④	4269	9213	4155	(1.7)
⑤	4269	9211	4820	(2.4)
⑥	4269	9211	4808	(1.7)
⑦	4269	9211	4830	(1.2)
⑧	4269	9211	4852	(.5)
⑨	4269	9211	4841	(.6)
⑩	4269	9213	4052	(1.1)
⑪	4269	9213	1763	(.9)
⑫	4269	9213	4074	(.2)
⑬	4269	9213	4619	(1.5)
⑭	4269	9213	4144	(3.2)
⑮	4269	9213	4641	(2.1)
⑯	4269	9212	1660	(.1)
⑰	4269	9212	1589	(3.1)
⑱	4269	9213	4035	(.9)
⑲	4269	9213	1774	(2.1)
⑳	4269	9213	4063	(1.3)

ESC
LAB SCIENCES
YOUR LAB OF CHOICE

Login #:983865	**Client:** TRCATX	**Date:4/6**	**Evaluated by:Matt S**

Non-Conformance (check applicable items)

	Sample Integrity		Chain of Custody Clarification		
	Parameter(s) past holding time		Login Clarification Needed		**If Broken Container:**
	Improper temperature		Chain of custody is incomplete		Insufficient packing material around container
	Improper container type		Please specify Metals requested.		Insufficient packing material inside cooler
	Improper preservation		Please specify TCLP requested.		Improper handling by carrier (FedEx / UPS / Couri
	Insufficient sample volume.		Received additional samples not listed on coc.		Sample was frozen
	Sample is biphasic.		Sample ids on containers do not match ids on coc		Container lid not intact
	Vials received with headspace.		Trip Blank not received.		**If no Chain of Custody:**
	Broken container		Client did not "X" analysis.		Received by:
x	Broken container:		Chain of Custody is missing		Date/Time:
	Sufficient sample remains				Temp./Cont. Rec./pH:
					Carrier:
					Tracking#

Login Comments: 1 of 2 DROLVI vials received broken for RW-4

Client informed by:	☐ Call	☐ Email	☐ Voice Mail	Date: 4/9/18	Time: 0826
TSR Initials: CM	Client Contact:				

Login Instructions:

Sufficient volume remains to extract and analyze.

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 11, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L1031727
Samples Received:	10/04/2018
Project Number:	294318.0000.0000.
Description:	TMD Fall 2018
Site:	TMD - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By:

Jason Romer
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

12065 Lebanon Rd   Mount Juliet, TN 37122   615-758-5858   800-767-5859   www.pacenational.com

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SAMPLE SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

NP-1 L1031727-01 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 16:10	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	1	10/05/18 08:57	10/05/18 08:57	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176610	10	10/05/18 19:15	10/05/18 19:15	RAS

MW-21 L1031727-02 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 17:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177072	1	10/09/18 19:49	10/09/18 20:11	MMF
Wet Chemistry by Method 353.2	WG1178144	10	10/09/18 19:49	10/09/18 19:49	JER
Wet Chemistry by Method 9056A	WG1176331	1	10/05/18 17:52	10/05/18 17:52	ELN
Wet Chemistry by Method 9056A	WG1176331	20	10/05/18 18:06	10/05/18 18:06	ELN
Wet Chemistry by Method 9056A	WG1176331	50	10/06/18 10:13	10/06/18 10:13	ELN
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 12:11	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 13:29	10/07/18 13:29	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	1	10/05/18 09:17	10/05/18 09:17	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177385	1	10/08/18 02:49	10/08/18 21:28	TH

TRIP BLANK-TMD-01 L1031727-03 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 00:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	1	10/05/18 07:59	10/05/18 07:59	DWR

CASE NARRATIVE

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Jason Romer
Project Manager

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 08:57	WG1176277
Benzene	U		0.000331	0.00100	1	10/05/2018 08:57	WG1176277
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 08:57	WG1176277
Bromoform	U		0.000469	0.00100	1	10/05/2018 08:57	WG1176277
Bromomethane	U		0.000866	0.00500	1	10/05/2018 08:57	WG1176277
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 08:57	WG1176277
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 08:57	WG1176277
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 08:57	WG1176277
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 08:57	WG1176277
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 08:57	WG1176277
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 08:57	WG1176277
Chloroethane	U		0.000453	0.00500	1	10/05/2018 08:57	WG1176277
Chloroform	U		0.000324	0.00500	1	10/05/2018 08:57	WG1176277
Chloromethane	U		0.000276	0.00250	1	10/05/2018 08:57	WG1176277
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 08:57	WG1176277
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 08:57	WG1176277
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 08:57	WG1176277
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 08:57	WG1176277
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 08:57	WG1176277
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 08:57	WG1176277
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 08:57	WG1176277
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 08:57	WG1176277
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 08:57	WG1176277
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 08:57	WG1176277
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 08:57	WG1176277
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 08:57	WG1176277
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 08:57	WG1176277
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 08:57	WG1176277
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 08:57	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 08:57	WG1176277
Methyl tert-butyl ether	0.547		0.00367	0.0100	10	10/05/2018 19:15	WG1176610
Naphthalene	U		0.00100	0.00500	1	10/05/2018 08:57	WG1176277
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 08:57	WG1176277
Styrene	U		0.000307	0.00100	1	10/05/2018 08:57	WG1176277
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 08:57	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 08:57	WG1176277
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 08:57	WG1176277
Toluene	U		0.000412	0.00100	1	10/05/2018 08:57	WG1176277
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 08:57	WG1176277
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 08:57	WG1176277
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 08:57	WG1176277
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 08:57	WG1176277
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 08:57	WG1176277
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 08:57	WG1176277
o-Xylene	U		0.000341	0.00100	1	10/05/2018 08:57	WG1176277
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 08:57	WG1176277
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 08:57	WG1176277
(S) Toluene-d8	*103*			*80.0-120*		*10/05/2018 08:57*	WG1176277
(S) Toluene-d8	*97.3*			*80.0-120*		*10/05/2018 19:15*	WG1176610
(S) Dibromofluoromethane	*93.8*			*75.0-120*		*10/05/2018 08:57*	WG1176277
(S) Dibromofluoromethane	*103*			*75.0-120*		*10/05/2018 19:15*	WG1176610
(S) 4-Bromofluorobenzene	*97.5*			*77.0-126*		*10/05/2018 08:57*	WG1176277
(S) 4-Bromofluorobenzene	*94.5*			*77.0-126*		*10/05/2018 19:15*	WG1176610

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4010		28.2	100	1	10/09/2018 20:11	WG1177072

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	22.1		0.197	1.00	10	10/09/2018 19:49	WG1178144

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	620		1.04	20.0	20	10/05/2018 18:06	WG1176331
Fluoride	1.92		0.00990	0.100	1	10/05/2018 17:52	WG1176331
Sulfate	3290		3.87	250	50	10/06/2018 10:13	WG1176331

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00537		0.000250	0.00200	1	10/10/2018 12:11	WG1176336
Barium	0.0101		0.000360	0.00500	1	10/10/2018 12:11	WG1176336
Calcium	599	O1 V	0.0460	1.00	1	10/10/2018 12:11	WG1176336
Chromium	U		0.000540	0.00200	1	10/10/2018 12:11	WG1176336
Iron	U		0.0150	0.100	1	10/10/2018 12:11	WG1176336
Lead	U		0.000240	0.00200	1	10/10/2018 12:11	WG1176336
Manganese	0.738	O1 V	0.000250	0.00500	1	10/10/2018 12:11	WG1176336
Potassium	2.08	O1	0.0370	1.00	1	10/10/2018 12:11	WG1176336
Selenium	0.0331		0.000380	0.00200	1	10/10/2018 12:11	WG1176336
Sodium	448	O1 V	0.110	1.00	1	10/10/2018 12:11	WG1176336

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.0645	J	0.0314	0.100	1	10/07/2018 13:29	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*98.9*			*78.0-120*		*10/07/2018 13:29*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 09:17	WG1176277
Benzene	U		0.000331	0.00100	1	10/05/2018 09:17	WG1176277
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 09:17	WG1176277
Bromoform	U		0.000469	0.00100	1	10/05/2018 09:17	WG1176277
Bromomethane	U		0.000866	0.00500	1	10/05/2018 09:17	WG1176277
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 09:17	WG1176277
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 09:17	WG1176277
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 09:17	WG1176277
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 09:17	WG1176277
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 09:17	WG1176277
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 09:17	WG1176277
Chloroethane	U		0.000453	0.00500	1	10/05/2018 09:17	WG1176277
Chloroform	U		0.000324	0.00500	1	10/05/2018 09:17	WG1176277
Chloromethane	U		0.000276	0.00250	1	10/05/2018 09:17	WG1176277
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 09:17	WG1176277
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 09:17	WG1176277

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 09:17	WG1176277
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 09:17	WG1176277
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 09:17	WG1176277
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 09:17	WG1176277
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 09:17	WG1176277
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 09:17	WG1176277
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 09:17	WG1176277
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 09:17	WG1176277
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 09:17	WG1176277
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 09:17	WG1176277
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 09:17	WG1176277
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 09:17	WG1176277
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 09:17	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 09:17	WG1176277
Methyl tert-butyl ether	0.0695		0.000367	0.00100	1	10/05/2018 09:17	WG1176277
Naphthalene	U		0.00100	0.00500	1	10/05/2018 09:17	WG1176277
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 09:17	WG1176277
Styrene	U		0.000307	0.00100	1	10/05/2018 09:17	WG1176277
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 09:17	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 09:17	WG1176277
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 09:17	WG1176277
Toluene	U		0.000412	0.00100	1	10/05/2018 09:17	WG1176277
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 09:17	WG1176277
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 09:17	WG1176277
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 09:17	WG1176277
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 09:17	WG1176277
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 09:17	WG1176277
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 09:17	WG1176277
o-Xylene	U		0.000341	0.00100	1	10/05/2018 09:17	WG1176277
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 09:17	WG1176277
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 09:17	WG1176277
(S) Toluene-d8	*102*			*80.0-120*		*10/05/2018 09:17*	WG1176277
(S) Dibromofluoromethane	*92.9*			*75.0-120*		*10/05/2018 09:17*	WG1176277
(S) 4-Bromofluorobenzene	*96.3*			*77.0-126*		*10/05/2018 09:17*	WG1176277

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0958	J	0.0247	0.100	1	10/08/2018 21:28	WG1177385
(S) o-Terphenyl	*68.4*			*31.0-160*		*10/08/2018 21:28*	WG1177385

TRIP BLANK-TMD-01

Collected date/time: 10/02/18 00:00

SAMPLE RESULTS - 03

L1031727

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 07:59	WG1176277
Benzene	U		0.000331	0.00100	1	10/05/2018 07:59	WG1176277
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 07:59	WG1176277
Bromoform	U		0.000469	0.00100	1	10/05/2018 07:59	WG1176277
Bromomethane	U		0.000866	0.00500	1	10/05/2018 07:59	WG1176277
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 07:59	WG1176277
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 07:59	WG1176277
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 07:59	WG1176277
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 07:59	WG1176277
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 07:59	WG1176277
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 07:59	WG1176277
Chloroethane	U		0.000453	0.00500	1	10/05/2018 07:59	WG1176277
Chloroform	U		0.000324	0.00500	1	10/05/2018 07:59	WG1176277
Chloromethane	U		0.000276	0.00250	1	10/05/2018 07:59	WG1176277
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 07:59	WG1176277
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 07:59	WG1176277
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 07:59	WG1176277
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 07:59	WG1176277
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 07:59	WG1176277
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 07:59	WG1176277
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 07:59	WG1176277
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 07:59	WG1176277
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 07:59	WG1176277
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 07:59	WG1176277
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 07:59	WG1176277
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 07:59	WG1176277
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 07:59	WG1176277
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 07:59	WG1176277
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 07:59	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 07:59	WG1176277
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 07:59	WG1176277
Naphthalene	U		0.00100	0.00500	1	10/05/2018 07:59	WG1176277
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 07:59	WG1176277
Styrene	U		0.000307	0.00100	1	10/05/2018 07:59	WG1176277
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 07:59	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 07:59	WG1176277
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 07:59	WG1176277
Toluene	U		0.000412	0.00100	1	10/05/2018 07:59	WG1176277
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 07:59	WG1176277
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 07:59	WG1176277
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 07:59	WG1176277
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 07:59	WG1176277
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 07:59	WG1176277
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 07:59	WG1176277
o-Xylene	U		0.000341	0.00100	1	10/05/2018 07:59	WG1176277
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 07:59	WG1176277
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 07:59	WG1176277
(S) Toluene-d8	*102*			*80.0-120*		*10/05/2018 07:59*	WG1176277
(S) Dibromofluoromethane	*93.6*			*75.0-120*		*10/05/2018 07:59*	WG1176277
(S) 4-Bromofluorobenzene	*97.2*			*77.0-126*		*10/05/2018 07:59*	WG1176277

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349503-1 10/09/18 20:11

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Dissolved Solids	U		2.82	10.0

L1031570-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031570-01 10/09/18 20:11 • (DUP) R3349503-4 10/09/18 20:11

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	830	838	1	0.959		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349503-2 10/09/18 20:11 • (LCSD) R3349503-3 10/09/18 20:11

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Dissolved Solids	8800	8630	8740	98.1	99.3	85.0-115			1.27	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349125-1 10/09/18 19:40

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1031644-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031644-02 10/09/18 19:46 • (DUP) R3349125-4 10/09/18 19:48

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.906	0.914	1	0.879		20

L1031730-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-07 10/09/18 20:27 • (DUP) R3349125-6 10/09/18 20:31

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349125-2 10/09/18 19:42 • (LCSD) R3349125-3 10/09/18 19:43

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.79	3.95	94.8	98.7	90.0-110			4.03	20

L1031728-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031728-02 10/09/18 19:52 • (MS) R3349125-5 10/09/18 19:54

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	U	2.59	103	1	90.0-110	

L1031730-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-08 10/09/18 20:32 • (MS) R3349125-7 10/09/18 20:34 • (MSD) R3349125-8 10/09/18 20:35

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	U	1.71	1.69	68.4	67.5	1	90.0-110	J6	J6	1.29	20

Method Blank (MB)

(MB) R3348235-1 10/05/18 10:36

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	0.0868	J	0.00990	0.100
Sulfate	U		0.0774	5.00

L1031627-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031627-01 10/05/18 16:14 • (DUP) R3348235-4 10/05/18 16:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	1.68	1.65	1	1.81		15
Fluoride	0.291	0.287	1	1.42		15

L1031728-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031728-01 10/05/18 18:47 • (DUP) R3348235-7 10/05/18 19:01

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	1.21	1.71	1	34.3	J3	15

L1031728-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031728-01 10/05/18 19:29 • (DUP) R3348235-9 10/05/18 19:43

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	289	279	10	3.44		15
Sulfate	117	110	10	5.29		15

L1031627-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031627-01 10/06/18 09:17 • (DUP) R3348235-10 10/06/18 09:31

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	121	124	5	2.09		15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348235-2 10/05/18 10:50 • (LCSD) R3348235-3 10/05/18 11:04

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.4	39.4	98.6	98.6	80.0-120			0.0142	15
Fluoride	8.00	8.12	8.12	102	102	80.0-120			0.0197	15
Sulfate	40.0	38.8	38.9	97.1	97.2	80.0-120			0.147	15

L1031627-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031627-01 10/05/18 16:14 • (MS) R3348235-5 10/05/18 16:42 • (MSD) R3348235-6 10/05/18 16:56

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	1.68	50.5	50.9	97.7	98.4	1	80.0-120			0.718	15
Fluoride	5.00	0.291	5.29	5.34	100	101	1	80.0-120			0.900	15
Sulfate	50.0	126	162	161	71.6	69.8	1	80.0-120	E J6	E J6	0.561	15

L1031728-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031728-01 10/05/18 18:47 • (MS) R3348235-8 10/05/18 19:15

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	299	334	69.2	1	80.0-120	E V
Fluoride	5.00	1.21	8.30	142	1	80.0-120	J5
Sulfate	50.0	124	156	64.1	1	80.0-120	E J6

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349417-1 10/10/18 11:57

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	0.000693	J	0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349417-2 10/10/18 12:02 • (LCSD) R3349417-3 10/10/18 12:06

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0514	0.0515	103	103	80.0-120			0.174	20
Barium	0.0500	0.0518	0.0490	104	98.1	80.0-120			5.39	20
Calcium	5.00	4.87	5.19	97.4	104	80.0-120			6.38	20
Chromium	0.0500	0.0536	0.0521	107	104	80.0-120			2.80	20
Iron	5.00	5.26	5.19	105	104	80.0-120			1.32	20
Lead	0.0500	0.0515	0.0510	103	102	80.0-120			0.893	20
Manganese	0.0500	0.0512	0.0497	102	99.5	80.0-120			2.96	20
Potassium	5.00	5.02	5.05	100	101	80.0-120			0.772	20
Selenium	0.0500	0.0555	0.0527	111	105	80.0-120			5.08	20
Sodium	5.00	5.18	5.22	104	104	80.0-120			0.806	20

L1031727-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031727-02 10/10/18 12:11 • (MS) R3349417-5 10/10/18 12:20 • (MSD) R3349417-6 10/10/18 12:25

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00537	0.0571	0.0552	103	99.7	1	75.0-125			3.35	20
Barium	0.0500	0.0101	0.0640	0.0606	108	101	1	75.0-125			5.56	20
Calcium	5.00	599	625	594	517	0.000	1	75.0-125	V	V	5.19	20
Chromium	0.0500	U	0.0513	0.0502	103	100	1	75.0-125			2.19	20
Potassium	5.00	2.08	7.33	7.04	105	99.4	1	75.0-125			3.97	20
Iron	5.00	U	5.11	4.98	102	99.6	1	75.0-125			2.53	20
Lead	0.0500	U	0.0525	0.0515	105	103	1	75.0-125			1.85	20

WG1176336

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1031727-02

L1031727-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031727-02 10/10/18 12:11 • (MS) R3349417-5 10/10/18 12:20 • (MSD) R3349417-6 10/10/18 12:25

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Manganese	0.0500	0.738	0.804	0.775	133	74.5	1	75.0-125	V	V	3.70	20
Selenium	0.0500	0.0331	0.0933	0.0871	120	108	1	75.0-125			6.93	20
Sodium	5.00	448	464	439	322	0.000	1	75.0-125	V	V	5.45	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348900-3 10/07/18 09:41

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*99.4*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348900-1 10/07/18 08:28 • (LCSD) R3348900-2 10/07/18 08:52

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) Low Fraction	5.50	6.00	6.04	109	110	72.0-127			0.604	20
(S) a,a,a-Trifluorotoluene(FID)				*104*	*104*	*78.0-120*				

L1031730-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-06 10/07/18 17:53 • (MS) R3348900-4 10/07/18 18:17 • (MSD) R3348900-5 10/07/18 18:41

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
TPH (GC/FID) Low Fraction	5.50	0.915	5.76	5.58	88.2	84.8	1	10.0-160			3.29	22
(S) a,a,a-Trifluorotoluene(FID)					*102*	*102*		*78.0-120*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348042-3 10/05/18 07:39

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348042-3 10/05/18 07:39

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*102*			*80.0-120*
(S) Dibromofluoromethane	*93.9*			*75.0-120*
(S) 4-Bromofluorobenzene	*96.3*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348042-1 10/05/18 06:40 • (LCSD) R3348042-2 10/05/18 07:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.0946	0.0956	75.7	76.4	19.0-160			0.983	27
Benzene	0.0250	0.0235	0.0235	93.9	94.0	70.0-123			0.0738	20
Bromodichloromethane	0.0250	0.0236	0.0239	94.5	95.6	75.0-120			1.10	20
Bromoform	0.0250	0.0291	0.0283	116	113	68.0-132			2.74	20
Bromomethane	0.0250	0.0227	0.0220	90.8	87.8	10.0-160			3.32	25
n-Butylbenzene	0.0250	0.0220	0.0219	87.8	87.5	73.0-125			0.434	20
sec-Butylbenzene	0.0250	0.0251	0.0247	101	98.7	75.0-125			1.89	20
Carbon disulfide	0.0250	0.0224	0.0206	89.4	82.3	61.0-128			8.28	20
Carbon tetrachloride	0.0250	0.0229	0.0229	91.7	91.6	68.0-126			0.109	20
Chlorobenzene	0.0250	0.0270	0.0266	108	106	80.0-121			1.42	20
Chlorodibromomethane	0.0250	0.0271	0.0264	109	106	77.0-125			2.72	20
Chloroethane	0.0250	0.0208	0.0211	83.1	84.5	47.0-150			1.68	20
Chloroform	0.0250	0.0235	0.0234	93.9	93.6	73.0-120			0.371	20
Chloromethane	0.0250	0.0179	0.0168	71.4	67.3	41.0-142			6.03	20
1,2-Dibromoethane	0.0250	0.0256	0.0256	102	102	80.0-122			0.00426	20
1,1-Dichloroethane	0.0250	0.0232	0.0226	92.7	90.5	70.0-126			2.36	20
1,2-Dichloroethane	0.0250	0.0215	0.0208	86.0	83.2	70.0-128			3.30	20
1,1-Dichloroethene	0.0250	0.0246	0.0223	98.4	89.4	71.0-124			9.64	20
cis-1,2-Dichloroethene	0.0250	0.0251	0.0248	100	99.1	73.0-120			1.21	20
trans-1,2-Dichloroethene	0.0250	0.0244	0.0242	97.7	97.0	73.0-120			0.705	20
1,2-Dichloropropane	0.0250	0.0239	0.0241	95.6	96.2	77.0-125			0.617	20
cis-1,3-Dichloropropene	0.0250	0.0251	0.0250	101	100	80.0-123			0.406	20
trans-1,3-Dichloropropene	0.0250	0.0247	0.0245	98.7	98.1	78.0-124			0.529	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348042-1 10/05/18 06:40 • (LCSD) R3348042-2 10/05/18 07:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0261	0.0261	105	105	79.0-123			0.00575	20
2-Hexanone	0.125	0.118	0.118	94.4	94.3	67.0-149			0.124	20
Isopropylbenzene	0.0250	0.0264	0.0261	106	105	76.0-127			0.976	20
p-Isopropyltoluene	0.0250	0.0253	0.0250	101	100	76.0-125			1.02	20
2-Butanone (MEK)	0.125	0.0996	0.100	79.7	80.1	44.0-160			0.584	20
Methylene Chloride	0.0250	0.0234	0.0219	93.5	87.6	67.0-120			6.55	20
4-Methyl-2-pentanone (MIBK)	0.125	0.110	0.109	87.8	86.9	68.0-142			1.03	20
Methyl tert-butyl ether	0.0250	0.0224	0.0217	89.6	86.8	68.0-125			3.12	20
Naphthalene	0.0250	0.0223	0.0225	89.3	89.9	54.0-135			0.638	20
n-Propylbenzene	0.0250	0.0257	0.0253	103	101	77.0-124			1.77	20
Styrene	0.0250	0.0276	0.0271	110	108	73.0-130			1.88	20
1,1,1,2-Tetrachloroethane	0.0250	0.0275	0.0277	110	111	75.0-125			0.699	20
1,1,2,2-Tetrachloroethane	0.0250	0.0249	0.0247	99.5	98.8	65.0-130			0.645	20
Tetrachloroethene	0.0250	0.0283	0.0278	113	111	72.0-132			1.82	20
Toluene	0.0250	0.0254	0.0252	102	101	79.0-120			1.09	20
1,1,1-Trichloroethane	0.0250	0.0235	0.0233	94.1	93.1	73.0-124			1.05	20
1,1,2-Trichloroethane	0.0250	0.0258	0.0260	103	104	80.0-120			0.793	20
Trichloroethene	0.0250	0.0278	0.0273	111	109	78.0-124			2.01	20
1,2,4-Trimethylbenzene	0.0250	0.0257	0.0256	103	102	76.0-121			0.643	20
1,3,5-Trimethylbenzene	0.0250	0.0265	0.0264	106	105	76.0-122			0.417	20
Vinyl chloride	0.0250	0.0234	0.0217	93.4	86.9	67.0-131			7.26	20
Xylenes, Total	0.0750	0.0780	0.0777	104	104	79.0-123			0.385	20
o-Xylene	0.0250	0.0259	0.0258	104	103	80.0-122			0.203	20
m&p-Xylenes	0.0500	0.0521	0.0519	104	104	80.0-122			0.307	20
(S) Toluene-d8				*99.9*	*101*	*80.0-120*				
(S) Dibromofluoromethane				*92.9*	*91.5*	*75.0-120*				
(S) 4-Bromofluorobenzene				*95.3*	*96.3*	*77.0-126*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1176610

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1031727-01

Method Blank (MB)

(MB) R3348177-3 10/05/18 10:23

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Methyl tert-butyl ether	U		0.000367	0.00100
(S) Toluene-d8	*96.7*			*80.0-120*
(S) Dibromofluoromethane	*99.9*			*75.0-120*
(S) 4-Bromofluorobenzene	*94.9*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348177-1 10/05/18 09:24 • (LCSD) R3348177-2 10/05/18 09:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Methyl tert-butyl ether	0.0250	0.0287	0.0265	115	106	68.0-125			8.31	20
(S) Toluene-d8				*98.0*	*96.1*	*80.0-120*				
(S) Dibromofluoromethane				*107*	*103*	*75.0-120*				
(S) 4-Bromofluorobenzene				*93.8*	*96.7*	*77.0-126*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1177385

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L1031727-02

Method Blank (MB)

(MB) R3348845-1 10/08/18 13:22

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*63.5*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348845-2 10/08/18 13:43 • (LCSD) R3348845-3 10/08/18 14:03

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.27	1.20	84.7	80.0	50.0-150			5.67	20
(S) o-Terphenyl				*90.0*	*88.0*	*31.0-160*				

L1030903-31 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1030903-31 10/08/18 15:24 • (MS) R3348845-4 10/08/18 15:44 • (MSD) R3348845-5 10/08/18 16:04

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
TPH (GC/FID) High Fraction	1.43	0.133	1.35	1.39	85.1	87.9	1	50.0-150			2.92	20
(S) o-Terphenyl					*90.0*	*85.8*		*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J5	The sample matrix interfered with the ability to make any accurate determination; spike value is high.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
O1	The analyte failed the method required serial dilution test and/or subsequent post-spike criteria. These failures indicate matrix interference.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico[1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina[1]	DW21704
Georgia	NELAP	North Carolina[3]	41
Georgia[1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky[1,6]	90010	South Carolina	84004
Kentucky[2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee[1,4]	2006
Louisiana[1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas[5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

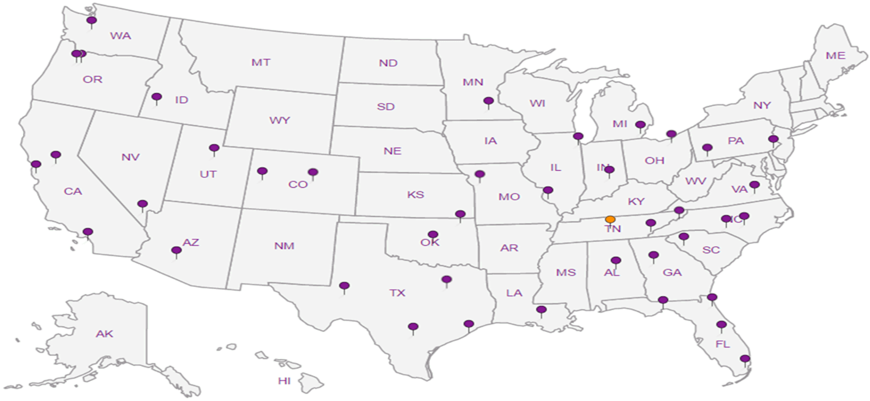
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025[5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Pres Chk

Chain of Custody Page 1 of 1

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **TMD Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-TMD**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **TMD (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ✓

L # L031727

Tal G247

Acctnum: **TRCATX**
Template: **T115542**
Prelogin: **P671990**
TSR: **526**
PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions, TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
NP-1	Grab	GW		10-2-18	1610	2	X											
MW-21	Grab	GW		↓	1700	9	X	X	X	X	X	X	X					-01
~~MW-46R~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					-02
TRIP BLANK-TMD-01	Grab	GW		10-2-18	—	1										X		-03

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ___ NP ✓ Y ___ N
COC Signed/Accurate: ✓ Y ___ N
Bottles arrive intact: ✓ Y ___ N
Correct bottles used: ✓ Y ___ N
Sufficient volume sent: ✓ Y ___ N
If Applicable
VOA Zero Headspace: ✓ Y ___ N
Preservation Correct/Checked: ✓ Y ___ N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-1=0.3 °C Bottles Received: 11+TP
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 9:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 16, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L1031728
Samples Received:	10/04/2018
Project Number:	294318.0000.0000.
Description:	NCL Fall 2018
Site:	NCL - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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NCL-34A L1031728-01 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 15:20	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177072	1	10/09/18 19:49	10/09/18 20:11	MMF
Wet Chemistry by Method 353.2	WG1178144	20	10/09/18 19:51	10/09/18 19:51	JER
Wet Chemistry by Method 9056A	WG1176331	1	10/05/18 18:47	10/05/18 18:47	ELN
Wet Chemistry by Method 9056A	WG1176331	10	10/05/18 19:29	10/05/18 19:29	ELN
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 12:29	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176273	10	10/06/18 16:14	10/06/18 16:14	JHH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	5	10/08/18 02:55	10/09/18 04:13	TH

NCL-33 L1031728-02 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 16:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177072	1	10/09/18 19:49	10/09/18 20:11	MMF
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 19:52	10/09/18 19:52	JER
Wet Chemistry by Method 9056A	WG1176331	1	10/05/18 19:57	10/05/18 19:57	ELN
Wet Chemistry by Method 9056A	WG1176331	20	10/05/18 20:11	10/05/18 20:11	ELN
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 12:34	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176273	1	10/06/18 16:34	10/06/18 16:34	JHH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	5	10/08/18 02:55	10/09/18 04:33	TH

MW-54A L1031728-03 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 09:10	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177072	1	10/09/18 19:49	10/09/18 20:11	MMF
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:01	10/09/18 20:01	JER
Wet Chemistry by Method 9056A	WG1176331	1	10/05/18 20:25	10/05/18 20:25	ELN
Wet Chemistry by Method 9056A	WG1176331	10	10/05/18 20:39	10/05/18 20:39	ELN
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 12:56	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176273	1	10/06/18 16:53	10/06/18 16:53	JHH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/08/18 23:09	TH

NCL-49 L1031728-04 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 09:55	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177072	1	10/09/18 19:49	10/09/18 20:11	MMF
Wet Chemistry by Method 353.2	WG1178144	5	10/09/18 20:03	10/09/18 20:03	JER
Wet Chemistry by Method 9056A	WG1176331	1	10/05/18 20:53	10/05/18 20:53	ELN
Wet Chemistry by Method 9056A	WG1176331	5	10/05/18 21:34	10/05/18 21:34	ELN
Wet Chemistry by Method 9056A	WG1176331	50	10/06/18 10:27	10/06/18 10:27	ELN
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 13:00	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176273	1	10/06/18 17:13	10/06/18 17:13	JHH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/08/18 23:30	TH

DUP-NCL-01 L1031728-05 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 15:20	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177072	1	10/09/18 19:49	10/09/18 20:11	MMF
Wet Chemistry by Method 353.2	WG1178144	5	10/09/18 20:04	10/09/18 20:04	JER
Wet Chemistry by Method 9056A	WG1176331	1	10/05/18 22:02	10/05/18 22:02	ELN

DUP-NCL-01 L1031728-05 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 15:20	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Wet Chemistry by Method 9056A	WG1176331	5	10/05/18 22:16	10/05/18 22:16	ELN
Wet Chemistry by Method 9056A	WG1176331	50	10/06/18 10:40	10/06/18 10:40	ELN
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 13:05	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176273	1	10/06/18 17:32	10/06/18 17:32	JHH
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/08/18 23:50	TH

TRIP BLANK-NCL-01 L1031728-06 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 00:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1178779	1	10/10/18 15:31	10/10/18 15:31	ACG

CASE NARRATIVE

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Project Manager

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1710		7.05	25.0	1	10/09/2018 20:11	WG1177072

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.394	2.00	20	10/09/2018 19:51	WG1178144

Sample Narrative:

L1031728-01 WG1178144: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	289		0.519	10.0	10	10/05/2018 19:29	WG1176331
Fluoride	1.21	J3 J5	0.00990	0.100	1	10/05/2018 18:47	WG1176331
Sulfate	117		0.774	50.0	10	10/05/2018 19:29	WG1176331

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.000692	J	0.000250	0.00200	1	10/10/2018 12:29	WG1176336
Barium	0.376		0.000360	0.00500	1	10/10/2018 12:29	WG1176336
Calcium	270		0.0460	1.00	1	10/10/2018 12:29	WG1176336
Chromium	U		0.000540	0.00200	1	10/10/2018 12:29	WG1176336
Iron	U		0.0150	0.100	1	10/10/2018 12:29	WG1176336
Lead	U		0.000240	0.00200	1	10/10/2018 12:29	WG1176336
Manganese	0.0191		0.000250	0.00500	1	10/10/2018 12:29	WG1176336
Potassium	1.25		0.0370	1.00	1	10/10/2018 12:29	WG1176336
Selenium	0.000423	J	0.000380	0.00200	1	10/10/2018 12:29	WG1176336
Sodium	111		0.110	1.00	1	10/10/2018 12:29	WG1176336

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.100	0.500	10	10/06/2018 16:14	WG1176273
Benzene	1.11		0.00331	0.0100	10	10/06/2018 16:14	WG1176273
Bromodichloromethane	U		0.00380	0.0100	10	10/06/2018 16:14	WG1176273
Bromoform	U		0.00469	0.0100	10	10/06/2018 16:14	WG1176273
Bromomethane	U		0.00866	0.0500	10	10/06/2018 16:14	WG1176273
n-Butylbenzene	0.00458	J	0.00361	0.0100	10	10/06/2018 16:14	WG1176273
sec-Butylbenzene	0.0136		0.00365	0.0100	10	10/06/2018 16:14	WG1176273
Carbon disulfide	0.0105	B	0.00275	0.0100	10	10/06/2018 16:14	WG1176273
Carbon tetrachloride	U		0.00379	0.0100	10	10/06/2018 16:14	WG1176273
Chlorobenzene	U		0.00348	0.0100	10	10/06/2018 16:14	WG1176273
Chlorodibromomethane	U		0.00327	0.0100	10	10/06/2018 16:14	WG1176273
Chloroethane	U		0.00453	0.0500	10	10/06/2018 16:14	WG1176273
Chloroform	U		0.00324	0.0500	10	10/06/2018 16:14	WG1176273
Chloromethane	U		0.00276	0.0250	10	10/06/2018 16:14	WG1176273
1,2-Dibromoethane	U		0.00381	0.0100	10	10/06/2018 16:14	WG1176273
1,1-Dichloroethane	U		0.00259	0.0100	10	10/06/2018 16:14	WG1176273
1,2-Dichloroethane	U		0.00361	0.0100	10	10/06/2018 16:14	WG1176273
1,1-Dichloroethene	U		0.00398	0.0100	10	10/06/2018 16:14	WG1176273
cis-1,2-Dichloroethene	U		0.00260	0.0100	10	10/06/2018 16:14	WG1176273
trans-1,2-Dichloroethene	U		0.00396	0.0100	10	10/06/2018 16:14	WG1176273

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloropropane	U		0.00306	0.0100	10	10/06/2018 16:14	WG1176273
cis-1,3-Dichloropropene	U		0.00418	0.0100	10	10/06/2018 16:14	WG1176273
trans-1,3-Dichloropropene	U		0.00419	0.0100	10	10/06/2018 16:14	WG1176273
Ethylbenzene	0.00672	J	0.00384	0.0100	10	10/06/2018 16:14	WG1176273
Isopropylbenzene	0.0828		0.00326	0.0100	10	10/06/2018 16:14	WG1176273
p-Isopropyltoluene	U		0.00350	0.0100	10	10/06/2018 16:14	WG1176273
2-Butanone (MEK)	U		0.0393	0.100	10	10/06/2018 16:14	WG1176273
2-Hexanone	U		0.0382	0.100	10	10/06/2018 16:14	WG1176273
Methylene Chloride	U		0.0100	0.0500	10	10/06/2018 16:14	WG1176273
4-Methyl-2-pentanone (MIBK)	U		0.0214	0.100	10	10/06/2018 16:14	WG1176273
Methyl tert-butyl ether	U		0.00367	0.0100	10	10/06/2018 16:14	WG1176273
Naphthalene	U		0.0100	0.0500	10	10/06/2018 16:14	WG1176273
n-Propylbenzene	0.0768		0.00349	0.0100	10	10/06/2018 16:14	WG1176273
Styrene	U		0.00307	0.0100	10	10/06/2018 16:14	WG1176273
1,1,1,2-Tetrachloroethane	U		0.00385	0.0100	10	10/06/2018 16:14	WG1176273
1,1,2,2-Tetrachloroethane	U		0.00130	0.0100	10	10/06/2018 16:14	WG1176273
Tetrachloroethene	U		0.00372	0.0100	10	10/06/2018 16:14	WG1176273
Toluene	U		0.00412	0.0100	10	10/06/2018 16:14	WG1176273
1,1,1-Trichloroethane	U		0.00319	0.0100	10	10/06/2018 16:14	WG1176273
1,1,2-Trichloroethane	U		0.00383	0.0100	10	10/06/2018 16:14	WG1176273
Trichloroethene	U		0.00398	0.0100	10	10/06/2018 16:14	WG1176273
1,2,4-Trimethylbenzene	0.00612	J	0.00373	0.0100	10	10/06/2018 16:14	WG1176273
1,3,5-Trimethylbenzene	U		0.00387	0.0100	10	10/06/2018 16:14	WG1176273
Vinyl chloride	U		0.00259	0.0100	10	10/06/2018 16:14	WG1176273
o-Xylene	U		0.00341	0.0100	10	10/06/2018 16:14	WG1176273
m&p-Xylene	0.0266		0.00719	0.0200	10	10/06/2018 16:14	WG1176273
Xylenes, Total	0.0266	J	0.0106	0.0300	10	10/06/2018 16:14	WG1176273
(S) Toluene-d8	*109*			*80.0-120*		*10/06/2018 16:14*	WG1176273
(S) Dibromofluoromethane	*97.8*			*75.0-120*		*10/06/2018 16:14*	WG1176273
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/06/2018 16:14*	WG1176273

Sample Narrative:

L1031728-01 WG1176273: Lowest possible dilution due to sample foaming.

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	7.41		0.123	0.500	5	10/09/2018 04:13	WG1177386
(S) o-Terphenyl	*85.8*			*31.0-160*		*10/09/2018 04:13*	WG1177386

NCL-33
Collected date/time: 10/02/18 16:00

SAMPLE RESULTS - 02

L1031728

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1880		14.1	50.0	1	10/09/2018 20:11	WG1177072

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/09/2018 19:52	WG1178144

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	466		1.04	20.0	20	10/05/2018 20:11	WG1176331
Fluoride	2.47		0.00990	0.100	1	10/05/2018 19:57	WG1176331
Sulfate	809		1.55	100	20	10/05/2018 20:11	WG1176331

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00303		0.000250	0.00200	1	10/10/2018 12:34	WG1176336
Barium	0.0244		0.000360	0.00500	1	10/10/2018 12:34	WG1176336
Calcium	454		0.0460	1.00	1	10/10/2018 12:34	WG1176336
Chromium	U		0.000540	0.00200	1	10/10/2018 12:34	WG1176336
Iron	2.02		0.0150	0.100	1	10/10/2018 12:34	WG1176336
Lead	U		0.000240	0.00200	1	10/10/2018 12:34	WG1176336
Manganese	0.119		0.000250	0.00500	1	10/10/2018 12:34	WG1176336
Potassium	5.35		0.0370	1.00	1	10/10/2018 12:34	WG1176336
Selenium	0.000474	J	0.000380	0.00200	1	10/10/2018 12:34	WG1176336
Sodium	128		0.110	1.00	1	10/10/2018 12:34	WG1176336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/06/2018 16:34	WG1176273
Benzene	U		0.000331	0.00100	1	10/06/2018 16:34	WG1176273
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 16:34	WG1176273
Bromoform	U		0.000469	0.00100	1	10/06/2018 16:34	WG1176273
Bromomethane	U		0.000866	0.00500	1	10/06/2018 16:34	WG1176273
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 16:34	WG1176273
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 16:34	WG1176273
Carbon disulfide	0.000673	B J	0.000275	0.00100	1	10/06/2018 16:34	WG1176273
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 16:34	WG1176273
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 16:34	WG1176273
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 16:34	WG1176273
Chloroethane	U		0.000453	0.00500	1	10/06/2018 16:34	WG1176273
Chloroform	U		0.000324	0.00500	1	10/06/2018 16:34	WG1176273
Chloromethane	U		0.000276	0.00250	1	10/06/2018 16:34	WG1176273
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 16:34	WG1176273
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 16:34	WG1176273
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 16:34	WG1176273
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 16:34	WG1176273
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 16:34	WG1176273
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 16:34	WG1176273
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 16:34	WG1176273
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 16:34	WG1176273
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 16:34	WG1176273

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 16:34	WG1176273
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 16:34	WG1176273
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 16:34	WG1176273
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 16:34	WG1176273
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 16:34	WG1176273
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 16:34	WG1176273
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 16:34	WG1176273
Methyl tert-butyl ether	0.000618	J	0.000367	0.00100	1	10/06/2018 16:34	WG1176273
Naphthalene	U		0.00100	0.00500	1	10/06/2018 16:34	WG1176273
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 16:34	WG1176273
Styrene	U		0.000307	0.00100	1	10/06/2018 16:34	WG1176273
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 16:34	WG1176273
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 16:34	WG1176273
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 16:34	WG1176273
Toluene	U		0.000412	0.00100	1	10/06/2018 16:34	WG1176273
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 16:34	WG1176273
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 16:34	WG1176273
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 16:34	WG1176273
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 16:34	WG1176273
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 16:34	WG1176273
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 16:34	WG1176273
o-Xylene	U		0.000341	0.00100	1	10/06/2018 16:34	WG1176273
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 16:34	WG1176273
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 16:34	WG1176273
(S) Toluene-d8	*109*			*80.0-120*		*10/06/2018 16:34*	WG1176273
(S) Dibromofluoromethane	*100*			*75.0-120*		*10/06/2018 16:34*	WG1176273
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/06/2018 16:34*	WG1176273

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.50		0.123	0.500	5	10/09/2018 04:33	WG1177386
(S) o-Terphenyl	*79.5*			*31.0-160*		*10/09/2018 04:33*	WG1177386

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1810		7.05	25.0	1	10/09/2018 20:11	WG1177072

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/09/2018 20:01	WG1178144

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	181		0.519	10.0	10	10/05/2018 20:39	WG1176331
Fluoride	0.898		0.00990	0.100	1	10/05/2018 20:25	WG1176331
Sulfate	821		0.774	50.0	10	10/05/2018 20:39	WG1176331

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00410		0.000250	0.00200	1	10/10/2018 12:56	WG1176336
Barium	0.0165		0.000360	0.00500	1	10/10/2018 12:56	WG1176336
Calcium	359		0.0460	1.00	1	10/10/2018 12:56	WG1176336
Chromium	U		0.000540	0.00200	1	10/10/2018 12:56	WG1176336
Iron	0.0601	J	0.0150	0.100	1	10/10/2018 12:56	WG1176336
Lead	U		0.000240	0.00200	1	10/10/2018 12:56	WG1176336
Manganese	0.541		0.000250	0.00500	1	10/10/2018 12:56	WG1176336
Potassium	0.215	J	0.0370	1.00	1	10/10/2018 12:56	WG1176336
Selenium	U		0.000380	0.00200	1	10/10/2018 12:56	WG1176336
Sodium	60.3		0.110	1.00	1	10/10/2018 12:56	WG1176336

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/06/2018 16:53	WG1176273
Benzene	U		0.000331	0.00100	1	10/06/2018 16:53	WG1176273
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 16:53	WG1176273
Bromoform	U		0.000469	0.00100	1	10/06/2018 16:53	WG1176273
Bromomethane	U		0.000866	0.00500	1	10/06/2018 16:53	WG1176273
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 16:53	WG1176273
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 16:53	WG1176273
Carbon disulfide	0.00112	B	0.000275	0.00100	1	10/06/2018 16:53	WG1176273
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 16:53	WG1176273
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 16:53	WG1176273
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 16:53	WG1176273
Chloroethane	U		0.000453	0.00500	1	10/06/2018 16:53	WG1176273
Chloroform	U		0.000324	0.00500	1	10/06/2018 16:53	WG1176273
Chloromethane	U		0.000276	0.00250	1	10/06/2018 16:53	WG1176273
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 16:53	WG1176273
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 16:53	WG1176273
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 16:53	WG1176273
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 16:53	WG1176273
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 16:53	WG1176273
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 16:53	WG1176273
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 16:53	WG1176273
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 16:53	WG1176273
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 16:53	WG1176273

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 16:53	WG1176273
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 16:53	WG1176273
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 16:53	WG1176273
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 16:53	WG1176273
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 16:53	WG1176273
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 16:53	WG1176273
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 16:53	WG1176273
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/06/2018 16:53	WG1176273
Naphthalene	U		0.00100	0.00500	1	10/06/2018 16:53	WG1176273
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 16:53	WG1176273
Styrene	U		0.000307	0.00100	1	10/06/2018 16:53	WG1176273
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 16:53	WG1176273
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 16:53	WG1176273
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 16:53	WG1176273
Toluene	U		0.000412	0.00100	1	10/06/2018 16:53	WG1176273
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 16:53	WG1176273
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 16:53	WG1176273
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 16:53	WG1176273
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 16:53	WG1176273
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 16:53	WG1176273
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 16:53	WG1176273
o-Xylene	U		0.000341	0.00100	1	10/06/2018 16:53	WG1176273
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 16:53	WG1176273
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 16:53	WG1176273
(S) Toluene-d8	*108*			*80.0-120*		*10/06/2018 16:53*	WG1176273
(S) Dibromofluoromethane	*100*			*75.0-120*		*10/06/2018 16:53*	WG1176273
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/06/2018 16:53*	WG1176273

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	2.18		0.0247	0.100	1	10/08/2018 23:09	WG1177386
(S) o-Terphenyl	*91.1*			*31.0-160*		*10/08/2018 23:09*	WG1177386

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3370		14.1	50.0	1	10/09/2018 20:11	WG1177072

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	3.59		0.0985	0.500	5	10/09/2018 20:03	WG1178144

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	143		0.260	5.00	5	10/05/2018 21:34	WG1176331
Fluoride	0.565	B	0.00990	0.100	1	10/05/2018 20:53	WG1176331
Sulfate	2050		3.87	250	50	10/06/2018 10:27	WG1176331

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00156	J	0.000250	0.00200	1	10/10/2018 13:00	WG1176336
Barium	0.0127		0.000360	0.00500	1	10/10/2018 13:00	WG1176336
Calcium	485		0.0460	1.00	1	10/10/2018 13:00	WG1176336
Chromium	U		0.000540	0.00200	1	10/10/2018 13:00	WG1176336
Iron	U		0.0150	0.100	1	10/10/2018 13:00	WG1176336
Lead	U		0.000240	0.00200	1	10/10/2018 13:00	WG1176336
Manganese	0.000358	J	0.000250	0.00500	1	10/10/2018 13:00	WG1176336
Potassium	0.689	J	0.0370	1.00	1	10/10/2018 13:00	WG1176336
Selenium	0.00739		0.000380	0.00200	1	10/10/2018 13:00	WG1176336
Sodium	130		0.110	1.00	1	10/10/2018 13:00	WG1176336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/06/2018 17:13	WG1176273
Benzene	U		0.000331	0.00100	1	10/06/2018 17:13	WG1176273
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 17:13	WG1176273
Bromoform	U		0.000469	0.00100	1	10/06/2018 17:13	WG1176273
Bromomethane	U		0.000866	0.00500	1	10/06/2018 17:13	WG1176273
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 17:13	WG1176273
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 17:13	WG1176273
Carbon disulfide	0.00152	B	0.000275	0.00100	1	10/06/2018 17:13	WG1176273
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 17:13	WG1176273
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 17:13	WG1176273
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 17:13	WG1176273
Chloroethane	U		0.000453	0.00500	1	10/06/2018 17:13	WG1176273
Chloroform	U		0.000324	0.00500	1	10/06/2018 17:13	WG1176273
Chloromethane	U		0.000276	0.00250	1	10/06/2018 17:13	WG1176273
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 17:13	WG1176273
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 17:13	WG1176273
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 17:13	WG1176273
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 17:13	WG1176273
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 17:13	WG1176273
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 17:13	WG1176273
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 17:13	WG1176273
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 17:13	WG1176273
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 17:13	WG1176273

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 17:13	WG1176273
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 17:13	WG1176273
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 17:13	WG1176273
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 17:13	WG1176273
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 17:13	WG1176273
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 17:13	WG1176273
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 17:13	WG1176273
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/06/2018 17:13	WG1176273
Naphthalene	U		0.00100	0.00500	1	10/06/2018 17:13	WG1176273
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 17:13	WG1176273
Styrene	U		0.000307	0.00100	1	10/06/2018 17:13	WG1176273
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 17:13	WG1176273
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 17:13	WG1176273
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 17:13	WG1176273
Toluene	U		0.000412	0.00100	1	10/06/2018 17:13	WG1176273
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 17:13	WG1176273
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 17:13	WG1176273
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 17:13	WG1176273
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 17:13	WG1176273
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 17:13	WG1176273
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 17:13	WG1176273
o-Xylene	U		0.000341	0.00100	1	10/06/2018 17:13	WG1176273
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 17:13	WG1176273
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 17:13	WG1176273
(S) Toluene-d8	*108*			*80.0-120*		*10/06/2018 17:13*	WG1176273
(S) Dibromofluoromethane	*99.6*			*75.0-120*		*10/06/2018 17:13*	WG1176273
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/06/2018 17:13*	WG1176273

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0922	J	0.0247	0.100	1	10/08/2018 23:30	WG1177386
(S) o-Terphenyl	*73.2*			*31.0-160*		*10/08/2018 23:30*	WG1177386

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

DUP-NCL-01

Collected date/time: 10/02/18 15:20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3190		14.1	50.0	1	10/09/2018 20:11	WG1177072

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	3.59		0.0985	0.500	5	10/09/2018 20:04	WG1178144

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	144		0.260	5.00	5	10/05/2018 22:16	WG1176331
Fluoride	0.572	B	0.00990	0.100	1	10/05/2018 22:02	WG1176331
Sulfate	2040		3.87	250	50	10/06/2018 10:40	WG1176331

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00154	J	0.000250	0.00200	1	10/10/2018 13:05	WG1176336
Barium	0.0115		0.000360	0.00500	1	10/10/2018 13:05	WG1176336
Calcium	448		0.0460	1.00	1	10/10/2018 13:05	WG1176336
Chromium	U		0.000540	0.00200	1	10/10/2018 13:05	WG1176336
Iron	U		0.0150	0.100	1	10/10/2018 13:05	WG1176336
Lead	U		0.000240	0.00200	1	10/10/2018 13:05	WG1176336
Manganese	U		0.000250	0.00500	1	10/10/2018 13:05	WG1176336
Potassium	0.635	J	0.0370	1.00	1	10/10/2018 13:05	WG1176336
Selenium	0.00624		0.000380	0.00200	1	10/10/2018 13:05	WG1176336
Sodium	122		0.110	1.00	1	10/10/2018 13:05	WG1176336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/06/2018 17:32	WG1176273
Benzene	U		0.000331	0.00100	1	10/06/2018 17:32	WG1176273
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 17:32	WG1176273
Bromoform	U		0.000469	0.00100	1	10/06/2018 17:32	WG1176273
Bromomethane	U		0.000866	0.00500	1	10/06/2018 17:32	WG1176273
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 17:32	WG1176273
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 17:32	WG1176273
Carbon disulfide	0.000727	B J	0.000275	0.00100	1	10/06/2018 17:32	WG1176273
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 17:32	WG1176273
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 17:32	WG1176273
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 17:32	WG1176273
Chloroethane	U		0.000453	0.00500	1	10/06/2018 17:32	WG1176273
Chloroform	U		0.000324	0.00500	1	10/06/2018 17:32	WG1176273
Chloromethane	U		0.000276	0.00250	1	10/06/2018 17:32	WG1176273
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 17:32	WG1176273
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 17:32	WG1176273
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 17:32	WG1176273
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 17:32	WG1176273
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 17:32	WG1176273
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 17:32	WG1176273
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 17:32	WG1176273
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 17:32	WG1176273
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 17:32	WG1176273

DUP-NCL-01

Collected date/time: 10/02/18 15:20

SAMPLE RESULTS - 05

L1031728

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 17:32	WG1176273
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 17:32	WG1176273
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 17:32	WG1176273
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 17:32	WG1176273
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 17:32	WG1176273
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 17:32	WG1176273
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 17:32	WG1176273
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/06/2018 17:32	WG1176273
Naphthalene	U		0.00100	0.00500	1	10/06/2018 17:32	WG1176273
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 17:32	WG1176273
Styrene	U		0.000307	0.00100	1	10/06/2018 17:32	WG1176273
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 17:32	WG1176273
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 17:32	WG1176273
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 17:32	WG1176273
Toluene	U		0.000412	0.00100	1	10/06/2018 17:32	WG1176273
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 17:32	WG1176273
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 17:32	WG1176273
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 17:32	WG1176273
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 17:32	WG1176273
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 17:32	WG1176273
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 17:32	WG1176273
o-Xylene	U		0.000341	0.00100	1	10/06/2018 17:32	WG1176273
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 17:32	WG1176273
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 17:32	WG1176273
(S) Toluene-d8	*110*			*80.0-120*		*10/06/2018 17:32*	WG1176273
(S) Dibromofluoromethane	*99.4*			*75.0-120*		*10/06/2018 17:32*	WG1176273
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/06/2018 17:32*	WG1176273

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0672	J	0.0247	0.100	1	10/08/2018 23:50	WG1177386
(S) o-Terphenyl	*65.8*			*31.0-160*		*10/08/2018 23:50*	WG1177386

TRIP BLANK-NCL-01

Collected date/time: 10/02/18 00:00

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/10/2018 15:31	WG1178779
Benzene	U		0.000331	0.00100	1	10/10/2018 15:31	WG1178779
Bromodichloromethane	U		0.000380	0.00100	1	10/10/2018 15:31	WG1178779
Bromoform	U		0.000469	0.00100	1	10/10/2018 15:31	WG1178779
Bromomethane	U		0.000866	0.00500	1	10/10/2018 15:31	WG1178779
n-Butylbenzene	U		0.000361	0.00100	1	10/10/2018 15:31	WG1178779
sec-Butylbenzene	U		0.000365	0.00100	1	10/10/2018 15:31	WG1178779
Carbon disulfide	U		0.000275	0.00100	1	10/10/2018 15:31	WG1178779
Carbon tetrachloride	U		0.000379	0.00100	1	10/10/2018 15:31	WG1178779
Chlorobenzene	U		0.000348	0.00100	1	10/10/2018 15:31	WG1178779
Chlorodibromomethane	U		0.000327	0.00100	1	10/10/2018 15:31	WG1178779
Chloroethane	U		0.000453	0.00500	1	10/10/2018 15:31	WG1178779
Chloroform	U		0.000324	0.00500	1	10/10/2018 15:31	WG1178779
Chloromethane	U		0.000276	0.00250	1	10/10/2018 15:31	WG1178779
1,2-Dibromoethane	U		0.000381	0.00100	1	10/10/2018 15:31	WG1178779
1,1-Dichloroethane	U		0.000259	0.00100	1	10/10/2018 15:31	WG1178779
1,2-Dichloroethane	U		0.000361	0.00100	1	10/10/2018 15:31	WG1178779
1,1-Dichloroethene	U		0.000398	0.00100	1	10/10/2018 15:31	WG1178779
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/10/2018 15:31	WG1178779
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/10/2018 15:31	WG1178779
1,2-Dichloropropane	U		0.000306	0.00100	1	10/10/2018 15:31	WG1178779
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/10/2018 15:31	WG1178779
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/10/2018 15:31	WG1178779
Ethylbenzene	U		0.000384	0.00100	1	10/10/2018 15:31	WG1178779
Isopropylbenzene	U		0.000326	0.00100	1	10/10/2018 15:31	WG1178779
p-Isopropyltoluene	U		0.000350	0.00100	1	10/10/2018 15:31	WG1178779
2-Butanone (MEK)	U		0.00393	0.0100	1	10/10/2018 15:31	WG1178779
2-Hexanone	U		0.00382	0.0100	1	10/10/2018 15:31	WG1178779
Methylene Chloride	U		0.00100	0.00500	1	10/10/2018 15:31	WG1178779
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/10/2018 15:31	WG1178779
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/10/2018 15:31	WG1178779
Naphthalene	U		0.00100	0.00500	1	10/10/2018 15:31	WG1178779
n-Propylbenzene	U		0.000349	0.00100	1	10/10/2018 15:31	WG1178779
Styrene	U		0.000307	0.00100	1	10/10/2018 15:31	WG1178779
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/10/2018 15:31	WG1178779
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/10/2018 15:31	WG1178779
Tetrachloroethene	U		0.000372	0.00100	1	10/10/2018 15:31	WG1178779
Toluene	U		0.000412	0.00100	1	10/10/2018 15:31	WG1178779
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/10/2018 15:31	WG1178779
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/10/2018 15:31	WG1178779
Trichloroethene	U		0.000398	0.00100	1	10/10/2018 15:31	WG1178779
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/10/2018 15:31	WG1178779
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/10/2018 15:31	WG1178779
Vinyl chloride	U		0.000259	0.00100	1	10/10/2018 15:31	WG1178779
o-Xylene	U		0.000341	0.00100	1	10/10/2018 15:31	WG1178779
m&p-Xylene	U		0.000719	0.00200	1	10/10/2018 15:31	WG1178779
Xylenes, Total	U		0.00106	0.00300	1	10/10/2018 15:31	WG1178779
(S) Toluene-d8	*106*			*80.0-120*		*10/10/2018 15:31*	WG1178779
(S) Dibromofluoromethane	*94.0*			*75.0-120*		*10/10/2018 15:31*	WG1178779
(S) 4-Bromofluorobenzene	*98.3*			*77.0-126*		*10/10/2018 15:31*	WG1178779

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1177072

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1031728-01,02,03,04,05

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349503-1 10/09/18 20:11

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1031570-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031570-01 10/09/18 20:11 • (DUP) R3349503-4 10/09/18 20:11

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	830	838	1	0.959		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349503-2 10/09/18 20:11 • (LCSD) R3349503-3 10/09/18 20:11

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8630	8740	98.1	99.3	85.0-115			1.27	5

WG1178144

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L1031728-01,02,03,04,05

Method Blank (MB)

(MB) R3349125-1 10/09/18 19:40

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1031644-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031644-02 10/09/18 19:46 • (DUP) R3349125-4 10/09/18 19:48

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.906	0.914	1	0.879		20

L1031730-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-07 10/09/18 20:27 • (DUP) R3349125-6 10/09/18 20:31

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

L1031644-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031644-01 10/09/18 19:46 • (DUP) R3349125-9 10/09/18 19:48

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.906	0.914	1	0.879		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349125-2 10/09/18 19:42 • (LCSD) R3349125-3 10/09/18 19:43

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.79	3.95	94.8	98.7	90.0-110			4.03	20

QUALITY CONTROL SUMMARY

L1031728-01,02,03,04,05

L1031728-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031728-02 10/09/18 19:52 • (MS) R3349125-5 10/09/18 19:54

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	U	2.59	103	1	90.0-110	

L1031730-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-08 10/09/18 20:32 • (MS) R3349125-7 10/09/18 20:34 • (MSD) R3349125-8 10/09/18 20:35

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	U	1.71	1.69	68.4	67.5	1	90.0-110	J6	J6	1.29	20

Method Blank (MB)

(MB) R3348235-1 10/05/18 10:36

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	U		0.0519	1.00
Fluoride	0.0868	J	0.00990	0.100
Sulfate	U		0.0774	5.00

L1031627-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031627-01 10/05/18 16:14 • (DUP) R3348235-4 10/05/18 16:28

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	1.68	1.65	1	1.81		15
Fluoride	0.291	0.287	1	1.42		15

L1031728-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031728-01 10/05/18 18:47 • (DUP) R3348235-7 10/05/18 19:01

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	1.21	1.71	1	34.3	J3	15

L1031728-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031728-01 10/05/18 19:29 • (DUP) R3348235-9 10/05/18 19:43

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	289	279	10	3.44		15
Sulfate	117	110	10	5.29		15

L1031627-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031627-01 10/06/18 09:17 • (DUP) R3348235-10 10/06/18 09:31

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Sulfate	121	124	5	2.09		15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348235-2 10/05/18 10:50 • (LCSD) R3348235-3 10/05/18 11:04

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.4	39.4	98.6	98.6	80.0-120			0.0142	15
Fluoride	8.00	8.12	8.12	102	102	80.0-120			0.0197	15
Sulfate	40.0	38.8	38.9	97.1	97.2	80.0-120			0.147	15

L1031627-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031627-01 10/05/18 16:14 • (MS) R3348235-5 10/05/18 16:42 • (MSD) R3348235-6 10/05/18 16:56

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	1.68	50.5	50.9	97.7	98.4	1	80.0-120			0.718	15
Fluoride	5.00	0.291	5.29	5.34	100	101	1	80.0-120			0.900	15
Sulfate	50.0	126	162	161	71.6	69.8	1	80.0-120	E J6	E J6	0.561	15

L1031728-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031728-01 10/05/18 18:47 • (MS) R3348235-8 10/05/18 19:15

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	299	334	69.2	1	80.0-120	E V
Fluoride	5.00	1.21	8.30	142	1	80.0-120	J5
Sulfate	50.0	124	156	64.1	1	80.0-120	E J6

Method Blank (MB)

(MB) R3349417-1 10/10/18 11:57

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	0.000693	J	0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349417-2 10/10/18 12:02 • (LCSD) R3349417-3 10/10/18 12:06

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0514	0.0515	103	103	80.0-120			0.174	20
Barium	0.0500	0.0518	0.0490	104	98.1	80.0-120			5.39	20
Calcium	5.00	4.87	5.19	97.4	104	80.0-120			6.38	20
Chromium	0.0500	0.0536	0.0521	107	104	80.0-120			2.80	20
Iron	5.00	5.26	5.19	105	104	80.0-120			1.32	20
Lead	0.0500	0.0515	0.0510	103	102	80.0-120			0.893	20
Manganese	0.0500	0.0512	0.0497	102	99.5	80.0-120			2.96	20
Potassium	5.00	5.02	5.05	100	101	80.0-120			0.772	20
Selenium	0.0500	0.0555	0.0527	111	105	80.0-120			5.08	20
Sodium	5.00	5.18	5.22	104	104	80.0-120			0.806	20

L1031727-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031727-02 10/10/18 12:11 • (MS) R3349417-5 10/10/18 12:20 • (MSD) R3349417-6 10/10/18 12:25

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00537	0.0571	0.0552	103	99.7	1	75.0-125			3.35	20
Barium	0.0500	0.0101	0.0640	0.0606	108	101	1	75.0-125			5.56	20
Calcium	5.00	599	625	594	517	0.000	1	75.0-125	V	V	5.19	20
Chromium	0.0500	U	0.0513	0.0502	103	100	1	75.0-125			2.19	20
Potassium	5.00	2.08	7.33	7.04	105	99.4	1	75.0-125			3.97	20
Iron	5.00	U	5.11	4.98	102	99.6	1	75.0-125			2.53	20
Lead	0.0500	U	0.0525	0.0515	105	103	1	75.0-125			1.85	20

WG1176336

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1031728-01,02,03,04,05

L1031727-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031727-02 10/10/18 12:11 • (MS) R3349417-5 10/10/18 12:20 • (MSD) R3349417-6 10/10/18 12:25

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Manganese	0.0500	0.738	0.804	0.775	133	74.5	1	75.0-125	V	V	3.70	20
Selenium	0.0500	0.0331	0.0933	0.0871	120	108	1	75.0-125			6.93	20
Sodium	5.00	448	464	439	322	0.000	1	75.0-125	V	V	5.45	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1176273

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1031728-01,02,03,04,05

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349472-3 10/06/18 10:52

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	0.000843	J	0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3349472-3 10/06/18 10:52

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*111*			*80.0-120*
(S) Dibromofluoromethane	*96.4*			*75.0-120*
(S) 4-Bromofluorobenzene	*101*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349472-1 10/06/18 09:34 • (LCSD) R3349472-2 10/06/18 09:53

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.113	0.111	90.2	89.0	19.0-160			1.35	27
Benzene	0.0250	0.0241	0.0243	96.5	97.3	70.0-123			0.905	20
Bromodichloromethane	0.0250	0.0226	0.0225	90.6	89.9	75.0-120			0.776	20
Bromoform	0.0250	0.0235	0.0237	94.0	95.0	68.0-132			1.09	20
Bromomethane	0.0250	0.0285	0.0325	114	130	10.0-160			13.3	25
n-Butylbenzene	0.0250	0.0251	0.0258	100	103	73.0-125			2.72	20
sec-Butylbenzene	0.0250	0.0259	0.0262	104	105	75.0-125			0.962	20
Carbon disulfide	0.0250	0.0225	0.0229	90.2	91.6	61.0-128			1.54	20
Carbon tetrachloride	0.0250	0.0228	0.0240	91.1	95.9	68.0-126			5.06	20
Chlorobenzene	0.0250	0.0258	0.0266	103	106	80.0-121			3.27	20
Chlorodibromomethane	0.0250	0.0246	0.0248	98.4	99.3	77.0-125			0.922	20
Chloroethane	0.0250	0.0248	0.0259	99.3	103	47.0-150			4.06	20
Chloroform	0.0250	0.0219	0.0221	87.5	88.3	73.0-120			0.840	20
Chloromethane	0.0250	0.0214	0.0217	85.5	86.9	41.0-142			1.65	20
1,2-Dibromoethane	0.0250	0.0251	0.0253	100	101	80.0-122			0.872	20
1,1-Dichloroethane	0.0250	0.0239	0.0244	95.7	97.8	70.0-126			2.21	20
1,2-Dichloroethane	0.0250	0.0202	0.0206	80.9	82.6	70.0-128			2.00	20
1,1-Dichloroethene	0.0250	0.0250	0.0261	100	104	71.0-124			4.03	20
cis-1,2-Dichloroethene	0.0250	0.0229	0.0232	91.8	92.8	73.0-120			1.07	20
trans-1,2-Dichloroethene	0.0250	0.0233	0.0239	93.1	95.7	73.0-120			2.81	20
1,2-Dichloropropane	0.0250	0.0248	0.0244	99.2	97.7	77.0-125			1.58	20
cis-1,3-Dichloropropene	0.0250	0.0253	0.0259	101	104	80.0-123			2.22	20
trans-1,3-Dichloropropene	0.0250	0.0249	0.0254	99.7	102	78.0-124			1.98	20

WG1176273

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1031728-01,02,03,04,05

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349472-1 10/06/18 09:34 • (LCSD) R3349472-2 10/06/18 09:53

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0251	0.0263	101	105	79.0-123			4.63	20
2-Hexanone	0.125	0.128	0.130	103	104	67.0-149			1.58	20
Isopropylbenzene	0.0250	0.0257	0.0266	103	106	76.0-127			3.49	20
p-Isopropyltoluene	0.0250	0.0252	0.0256	101	103	76.0-125			1.64	20
2-Butanone (MEK)	0.125	0.115	0.114	91.9	90.8	44.0-160			1.19	20
Methylene Chloride	0.0250	0.0222	0.0221	88.6	88.4	67.0-120			0.302	20
4-Methyl-2-pentanone (MIBK)	0.125	0.110	0.113	88.4	90.1	68.0-142			1.88	20
Methyl tert-butyl ether	0.0250	0.0219	0.0218	87.5	87.1	68.0-125			0.452	20
Naphthalene	0.0250	0.0164	0.0175	65.6	70.0	54.0-135			6.52	20
n-Propylbenzene	0.0250	0.0244	0.0250	97.5	100	77.0-124			2.68	20
Styrene	0.0250	0.0265	0.0261	106	104	73.0-130			1.65	20
1,1,1,2-Tetrachloroethane	0.0250	0.0251	0.0258	100	103	75.0-125			2.89	20
1,1,2,2-Tetrachloroethane	0.0250	0.0221	0.0225	88.4	90.1	65.0-130			1.89	20
Tetrachloroethene	0.0250	0.0270	0.0280	108	112	72.0-132			3.51	20
Toluene	0.0250	0.0253	0.0262	101	105	79.0-120			3.52	20
1,1,1-Trichloroethane	0.0250	0.0238	0.0243	95.2	97.3	73.0-124			2.19	20
1,1,2-Trichloroethane	0.0250	0.0247	0.0249	98.7	99.5	80.0-120			0.819	20
Trichloroethene	0.0250	0.0275	0.0272	110	109	78.0-124			1.41	20
1,2,4-Trimethylbenzene	0.0250	0.0239	0.0244	95.6	97.6	76.0-121			2.11	20
1,3,5-Trimethylbenzene	0.0250	0.0242	0.0251	96.8	100	76.0-122			3.73	20
Vinyl chloride	0.0250	0.0248	0.0250	99.3	100	67.0-131			0.794	20
Xylenes, Total	0.0750	0.0761	0.0775	101	103	79.0-123			1.82	20
o-Xylene	0.0250	0.0253	0.0258	101	103	80.0-122			1.95	20
m&p-Xylenes	0.0500	0.0508	0.0517	102	103	80.0-122			1.65	20
(S) Toluene-d8				*106*	*108*	*80.0-120*				
(S) Dibromofluoromethane				*94.8*	*96.0*	*75.0-120*				
(S) 4-Bromofluorobenzene				*98.2*	*100*	*77.0-126*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349658-4 10/10/18 11:45

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
Carbon tetrachloride	U		0.000379	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Chlorobenzene	U		0.000348	0.00100
Carbon disulfide	U		0.000275	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
Methylene Chloride	U		0.00100	0.00500
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Naphthalene	U		0.00100	0.00500
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
n-Propylbenzene	U		0.000349	0.00100
Toluene	U		0.000412	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3349658-4 10/10/18 11:45

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*105*			*80.0-120*
(S) Dibromofluoromethane	*95.1*			*75.0-120*
(S) 4-Bromofluorobenzene	*100*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349658-1 10/10/18 10:27 • (LCSD) R3349658-2 10/10/18 10:47

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.134	0.148	107	118	19.0-160			10.1	27
Benzene	0.0250	0.0246	0.0247	98.6	98.9	70.0-123			0.376	20
Bromodichloromethane	0.0250	0.0246	0.0242	98.4	96.7	75.0-120			1.81	20
Bromoform	0.0250	0.0242	0.0247	96.9	98.9	68.0-132			2.09	20
Bromomethane	0.0250	0.0177	0.0201	70.7	80.3	10.0-160			12.7	25
Carbon tetrachloride	0.0250	0.0234	0.0230	93.5	91.9	68.0-126			1.69	20
Chlorobenzene	0.0250	0.0265	0.0263	106	105	80.0-121			0.538	20
Chlorodibromomethane	0.0250	0.0248	0.0241	99.4	96.5	77.0-125			2.91	20
Chloroethane	0.0250	0.0282	0.0282	113	113	47.0-150			0.253	20
Chloroform	0.0250	0.0225	0.0224	90.1	89.8	73.0-120			0.301	20
Chloromethane	0.0250	0.0307	0.0313	123	125	41.0-142			2.13	20
n-Butylbenzene	0.0250	0.0270	0.0273	108	109	73.0-125			1.30	20
sec-Butylbenzene	0.0250	0.0268	0.0273	107	109	75.0-125			1.56	20
1,1-Dichloroethane	0.0250	0.0279	0.0278	112	111	70.0-126			0.221	20
1,2-Dichloroethane	0.0250	0.0247	0.0247	99.0	98.6	70.0-128			0.360	20
Carbon disulfide	0.0250	0.0237	0.0236	94.8	94.5	61.0-128			0.362	20
1,1-Dichloroethene	0.0250	0.0252	0.0245	101	98.1	71.0-124			2.92	20
trans-1,2-Dichloroethene	0.0250	0.0232	0.0236	92.8	94.6	73.0-120			1.95	20
1,2-Dichloropropane	0.0250	0.0297	0.0291	119	116	77.0-125			2.03	20
cis-1,3-Dichloropropene	0.0250	0.0268	0.0267	107	107	80.0-123			0.324	20
trans-1,3-Dichloropropene	0.0250	0.0268	0.0262	107	105	78.0-124			2.07	20
1,2-Dibromoethane	0.0250	0.0254	0.0251	101	100	80.0-122			1.02	20
Ethylbenzene	0.0250	0.0261	0.0261	104	104	79.0-123			0.199	20

QUALITY CONTROL SUMMARY

L1031728-06

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349658-1 10/10/18 10:27 • (LCSD) R3349658-2 10/10/18 10:47

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Methylene Chloride	0.0250	0.0217	0.0218	86.7	87.0	67.0-120			0.369	20
cis-1,2-Dichloroethene	0.0250	0.0220	0.0228	87.8	91.3	73.0-120			3.87	20
Methyl tert-butyl ether	0.0250	0.0233	0.0226	93.1	90.2	68.0-125			3.13	20
Naphthalene	0.0250	0.0179	0.0192	71.7	76.9	54.0-135			6.98	20
1,1,2,2-Tetrachloroethane	0.0250	0.0239	0.0235	95.7	94.1	65.0-130			1.67	20
Tetrachloroethene	0.0250	0.0271	0.0268	108	107	72.0-132			1.24	20
Toluene	0.0250	0.0254	0.0258	102	103	79.0-120			1.50	20
2-Hexanone	0.125	0.173	0.173	138	139	67.0-149			0.460	20
1,1,1-Trichloroethane	0.0250	0.0242	0.0248	96.8	99.0	73.0-124			2.26	20
1,1,2-Trichloroethane	0.0250	0.0245	0.0240	98.1	95.8	80.0-120			2.37	20
Isopropylbenzene	0.0250	0.0269	0.0275	108	110	76.0-127			1.89	20
p-Isopropyltoluene	0.0250	0.0260	0.0264	104	106	76.0-125			1.45	20
Trichloroethene	0.0250	0.0262	0.0266	105	107	78.0-124			1.46	20
2-Butanone (MEK)	0.125	0.158	0.162	126	130	44.0-160			2.93	20
4-Methyl-2-pentanone (MIBK)	0.125	0.166	0.164	133	131	68.0-142			0.925	20
Vinyl chloride	0.0250	0.0295	0.0296	118	119	67.0-131			0.298	20
Xylenes, Total	0.0750	0.0789	0.0797	105	106	79.0-123			1.01	20
n-Propylbenzene	0.0250	0.0254	0.0262	102	105	77.0-124			2.83	20
Styrene	0.0250	0.0267	0.0273	107	109	73.0-130			2.07	20
1,1,1,2-Tetrachloroethane	0.0250	0.0259	0.0252	104	101	75.0-125			2.82	20
1,2,4-Trimethylbenzene	0.0250	0.0256	0.0257	102	103	76.0-121			0.359	20
1,3,5-Trimethylbenzene	0.0250	0.0256	0.0259	102	104	76.0-122			1.40	20
o-Xylene	0.0250	0.0262	0.0266	105	106	80.0-122			1.48	20
m&p-Xylenes	0.0500	0.0527	0.0531	105	106	80.0-122			0.708	20
(S) Toluene-d8				*105*	*105*	*80.0-120*				
(S) Dibromofluoromethane				*95.2*	*94.4*	*75.0-120*				
(S) 4-Bromofluorobenzene				*96.5*	*98.1*	*77.0-126*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348846-1 10/08/18 12:22

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*65.5*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348846-2 10/08/18 12:42 • (LCSD) R3348846-3 10/08/18 13:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.33	1.38	88.7	92.0	50.0-150			3.69	20
(S) o-Terphenyl				*90.5*	*91.0*	*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J5	The sample matrix interfered with the ability to make any accurate determination; spike value is high.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

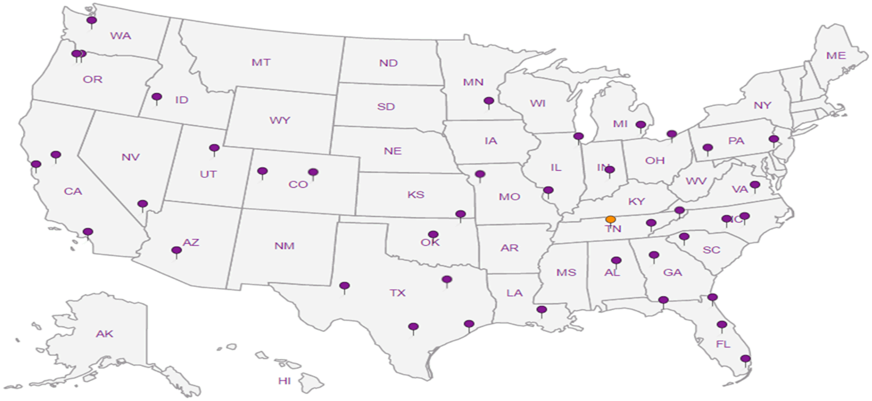
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Pres Chk

Chain of Custody Page 1 of 2

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **NCL Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-NCL**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **NCL (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
__ Same Day __ Five Day
__ Next Day __ 5 Day (Rad Only)
__ Two Day __ 10 Day (Rad Only)
__ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N __ Y ✓

L# L1031728
Tabl G246
Acctnum: **TRCATX**
Template: **T140423**
Prelogin: **P671813**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3 2	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~MW-45~~	~~Grab~~	~~GW~~				~~8~~	~~X~~	~~X~~			~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
NCL-34A	Grab	GW		10-2-18	1520	7	X	X		X	X	X	X					-01
NCL-33	Grab	GW		↓	1600	7	X	X		X	X	X	X					-02
~~NCL-44~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
~~NCL-32~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-108~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
~~NCL-31~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-55~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
MW-54A	Grab	GW		10-2-18	910	7	X	X		X	X	X	X					-03
NCL-49	Grab	GW		↓	955	7	X	X		X	X	X	X					-04

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Trip Blank Received: [✓ Yes] / No
HCL / MeoH
TBR

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-1=0.3 ku °C Bottles Received: 35+TB
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 2 of 2

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **NCL Fall 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-NCL**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **NCL (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Quote #
Date Results Needed
Immediately Packed on Ice N ___ Y ✓

L # L1031728
Table #
Acctnum: **TRCATX**
Template: **T140423**
Prelogin: **P671813**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions, TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
Pres Chk										<2								
DUP-NCL-01	Grab	GW		10-2-18	1100	7	X	X		X	X	X	X					-05
~~EB-NCL-01~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
TRIP BLANK-NCL-01	Grab	GW		10-2-18	—	1										X		-06

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: [✓ Yes] / No
HCL / MeoH
TBR

Temp: 0.4-.1=0.3 °C Bottles Received: 35+TB

Date: 10/4/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

January 22, 2019

TRC Solutions - Austin, TX

Sample Delivery Group:	L1031729
Samples Received:	10/04/2018
Project Number:	294318.0000.0000.
Description:	TEL Fall 2018
Site:	TEL - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

12065 Lebanon Rd Mount Juliet, TN 37122 615-758-5858 800-767-5859 www.pacenational.com

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1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

TEL-4 L1031729-01 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:55	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:50	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:06	10/09/18 20:06	JER
Wet Chemistry by Method 9056A	WG1176331	1	10/05/18 22:44	10/05/18 22:44	ELN
Wet Chemistry by Method 9056A	WG1176331	50	10/05/18 22:58	10/05/18 22:58	ELN
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 13:09	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 13:52	10/07/18 13:52	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	1	10/05/18 09:36	10/05/18 09:36	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176610	1	10/05/18 19:35	10/05/18 19:35	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/09/18 00:10	TH

TEL-2 L1031729-02 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:30	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:50	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	20	10/09/18 20:07	10/09/18 20:07	JER
Wet Chemistry by Method 9056A	WG1176331	1	10/05/18 23:12	10/05/18 23:12	ELN
Wet Chemistry by Method 9056A	WG1176331	20	10/05/18 23:26	10/05/18 23:26	ELN
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 13:14	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	25	10/07/18 14:16	10/07/18 14:16	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	25	10/05/18 09:56	10/05/18 09:56	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	5	10/08/18 02:55	10/09/18 04:53	TH

TEL-1 L1031729-03 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:50	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	20	10/09/18 20:09	10/09/18 20:09	JER
Wet Chemistry by Method 9056A	WG1175177	1	10/06/18 22:51	10/06/18 22:51	MAJ
Wet Chemistry by Method 9056A	WG1175177	20	10/06/18 23:05	10/06/18 23:05	MAJ
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 13:19	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 14:40	10/07/18 14:40	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	5	10/05/18 10:16	10/05/18 10:16	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	5	10/08/18 02:55	10/09/18 05:13	TH

DUP-TEL-01 L1031729-04 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:50	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:10	10/09/18 20:10	JER
Wet Chemistry by Method 9056A	WG1175177	1	10/06/18 23:18	10/06/18 23:18	MAJ
Wet Chemistry by Method 9056A	WG1175177	50	10/06/18 23:32	10/06/18 23:32	MAJ
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 13:23	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 15:05	10/07/18 15:05	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	1	10/05/18 10:36	10/05/18 10:36	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/09/18 00:30	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

EB-TEL-01 L1031729-05 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:50	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:12	10/09/18 20:12	JER
Wet Chemistry by Method 9056A	WG1175177	1	10/06/18 23:46	10/06/18 23:46	MAJ
Metals (ICPMS) by Method 6020	WG1176336	1	10/09/18 10:36	10/10/18 13:28	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 15:29	10/07/18 15:29	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	1	10/05/18 10:55	10/05/18 10:55	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/09/18 00:50	TH

TRIP BLANK-TEL-01 L1031729-06 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 00:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	1	10/05/18 08:18	10/05/18 08:18	DWR

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Project Manager

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2840		14.1	50.0	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/09/2018 20:06	WG1178144

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	28.5		0.0519	1.00	1	10/05/2018 22:44	WG1176331
Fluoride	1.48		0.00990	0.100	1	10/05/2018 22:44	WG1176331
Sulfate	2050		3.87	250	50	10/05/2018 22:58	WG1176331

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00130	J	0.000250	0.00200	1	10/10/2018 13:09	WG1176336
Barium	0.0123		0.000360	0.00500	1	10/10/2018 13:09	WG1176336
Calcium	242		0.0460	1.00	1	10/10/2018 13:09	WG1176336
Chromium	0.274		0.000540	0.00200	1	10/10/2018 13:09	WG1176336
Iron	0.370		0.0150	0.100	1	10/10/2018 13:09	WG1176336
Lead	0.000418	J	0.000240	0.00200	1	10/10/2018 13:09	WG1176336
Manganese	0.827		0.000250	0.00500	1	10/10/2018 13:09	WG1176336
Potassium	0.449	J	0.0370	1.00	1	10/10/2018 13:09	WG1176336
Selenium	U		0.000380	0.00200	1	10/10/2018 13:09	WG1176336
Sodium	286		0.110	1.00	1	10/10/2018 13:09	WG1176336

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.815		0.0314	0.100	1	10/07/2018 13:52	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/07/2018 13:52*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 09:36	WG1176277
Benzene	0.00285		0.000331	0.00100	1	10/05/2018 09:36	WG1176277
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 09:36	WG1176277
Bromoform	U		0.000469	0.00100	1	10/05/2018 09:36	WG1176277
Bromomethane	U		0.000866	0.00500	1	10/05/2018 09:36	WG1176277
n-Butylbenzene	0.00120		0.000361	0.00100	1	10/05/2018 09:36	WG1176277
sec-Butylbenzene	0.00981		0.000365	0.00100	1	10/05/2018 09:36	WG1176277
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 09:36	WG1176277
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 09:36	WG1176277
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 09:36	WG1176277
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 09:36	WG1176277
Chloroethane	U		0.000453	0.00500	1	10/05/2018 09:36	WG1176277
Chloroform	U		0.000324	0.00500	1	10/05/2018 09:36	WG1176277
Chloromethane	U		0.000276	0.00250	1	10/05/2018 09:36	WG1176277
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 09:36	WG1176277
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 09:36	WG1176277

TEL-4

Collected date/time: 10/02/18 12:55

SAMPLE RESULTS - 01

L1031729

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 09:36	WG1176277
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 09:36	WG1176277
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 09:36	WG1176277
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 09:36	WG1176277
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 09:36	WG1176277
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 09:36	WG1176277
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 09:36	WG1176277
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 09:36	WG1176277
Isopropylbenzene	0.0228		0.000326	0.00100	1	10/05/2018 09:36	WG1176277
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 09:36	WG1176277
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 09:36	WG1176277
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 09:36	WG1176277
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 09:36	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 09:36	WG1176277
Methyl tert-butyl ether	0.00101		0.000367	0.00100	1	10/05/2018 19:35	WG1176610
Naphthalene	U		0.00100	0.00500	1	10/05/2018 09:36	WG1176277
n-Propylbenzene	0.0195		0.000349	0.00100	1	10/05/2018 09:36	WG1176277
Styrene	U		0.000307	0.00100	1	10/05/2018 09:36	WG1176277
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 09:36	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 09:36	WG1176277
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 09:36	WG1176277
Toluene	U		0.000412	0.00100	1	10/05/2018 09:36	WG1176277
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 09:36	WG1176277
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 09:36	WG1176277
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 09:36	WG1176277
1,2,4-Trimethylbenzene	0.00321		0.000373	0.00100	1	10/05/2018 09:36	WG1176277
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 09:36	WG1176277
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 09:36	WG1176277
o-Xylene	U		0.000341	0.00100	1	10/05/2018 09:36	WG1176277
m&p-Xylene	0.00185	J	0.000719	0.00200	1	10/05/2018 09:36	WG1176277
Xylenes, Total	0.00185	J	0.00106	0.00300	1	10/05/2018 09:36	WG1176277
(S) Toluene-d8	*101*			*80.0-120*		*10/05/2018 09:36*	WG1176277
(S) Toluene-d8	*97.0*			*80.0-120*		*10/05/2018 19:35*	WG1176610
(S) Dibromofluoromethane	*93.6*			*75.0-120*		*10/05/2018 09:36*	WG1176277
(S) Dibromofluoromethane	*101*			*75.0-120*		*10/05/2018 19:35*	WG1176610
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/05/2018 09:36*	WG1176277
(S) 4-Bromofluorobenzene	*98.6*			*77.0-126*		*10/05/2018 19:35*	WG1176610

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.15		0.0247	0.100	1	10/09/2018 00:10	WG1177386
(S) o-Terphenyl	*86.8*			*31.0-160*		*10/09/2018 00:10*	WG1177386

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2730		14.1	50.0	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.394	2.00	20	10/09/2018 20:07	WG1178144

Sample Narrative:

L1031729-02 WG1178144: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	205		1.04	20.0	20	10/05/2018 23:26	WG1176331
Fluoride	0.967		0.00990	0.100	1	10/05/2018 23:12	WG1176331
Sulfate	1360		1.55	100	20	10/05/2018 23:26	WG1176331

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0152		0.000250	0.00200	1	10/10/2018 13:14	WG1176336
Barium	0.101		0.000360	0.00500	1	10/10/2018 13:14	WG1176336
Calcium	266		0.0460	1.00	1	10/10/2018 13:14	WG1176336
Chromium	0.00151	J	0.000540	0.00200	1	10/10/2018 13:14	WG1176336
Iron	0.0287	J	0.0150	0.100	1	10/10/2018 13:14	WG1176336
Lead	0.000727	J	0.000240	0.00200	1	10/10/2018 13:14	WG1176336
Manganese	0.0273		0.000250	0.00500	1	10/10/2018 13:14	WG1176336
Potassium	1.14		0.0370	1.00	1	10/10/2018 13:14	WG1176336
Selenium	0.000520	J	0.000380	0.00200	1	10/10/2018 13:14	WG1176336
Sodium	363		0.110	1.00	1	10/10/2018 13:14	WG1176336

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	5.19		0.785	2.50	25	10/07/2018 14:16	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*99.2*			*78.0-120*		*10/07/2018 14:16*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.250	1.25	25	10/05/2018 09:56	WG1176277
Benzene	0.936		0.00828	0.0250	25	10/05/2018 09:56	WG1176277
Bromodichloromethane	U		0.00950	0.0250	25	10/05/2018 09:56	WG1176277
Bromoform	U		0.0117	0.0250	25	10/05/2018 09:56	WG1176277
Bromomethane	U		0.0216	0.125	25	10/05/2018 09:56	WG1176277
n-Butylbenzene	U		0.00902	0.0250	25	10/05/2018 09:56	WG1176277
sec-Butylbenzene	U		0.00912	0.0250	25	10/05/2018 09:56	WG1176277
Carbon disulfide	U		0.00688	0.0250	25	10/05/2018 09:56	WG1176277
Carbon tetrachloride	U		0.00948	0.0250	25	10/05/2018 09:56	WG1176277
Chlorobenzene	U		0.00870	0.0250	25	10/05/2018 09:56	WG1176277
Chlorodibromomethane	U		0.00818	0.0250	25	10/05/2018 09:56	WG1176277
Chloroethane	U		0.0113	0.125	25	10/05/2018 09:56	WG1176277
Chloroform	U		0.00810	0.125	25	10/05/2018 09:56	WG1176277

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.00690	0.0625	25	10/05/2018 09:56	WG1176277
1,2-Dibromoethane	U		0.00952	0.0250	25	10/05/2018 09:56	WG1176277
1,1-Dichloroethane	U		0.00648	0.0250	25	10/05/2018 09:56	WG1176277
1,2-Dichloroethane	U		0.00902	0.0250	25	10/05/2018 09:56	WG1176277
1,1-Dichloroethene	U		0.00995	0.0250	25	10/05/2018 09:56	WG1176277
cis-1,2-Dichloroethene	U		0.00650	0.0250	25	10/05/2018 09:56	WG1176277
trans-1,2-Dichloroethene	U		0.00990	0.0250	25	10/05/2018 09:56	WG1176277
1,2-Dichloropropane	U		0.00765	0.0250	25	10/05/2018 09:56	WG1176277
cis-1,3-Dichloropropene	U		0.0104	0.0250	25	10/05/2018 09:56	WG1176277
trans-1,3-Dichloropropene	U		0.0105	0.0250	25	10/05/2018 09:56	WG1176277
Ethylbenzene	0.0121	J	0.00960	0.0250	25	10/05/2018 09:56	WG1176277
Isopropylbenzene	0.0354		0.00815	0.0250	25	10/05/2018 09:56	WG1176277
p-Isopropyltoluene	U		0.00875	0.0250	25	10/05/2018 09:56	WG1176277
2-Butanone (MEK)	U		0.0982	0.250	25	10/05/2018 09:56	WG1176277
2-Hexanone	U		0.0955	0.250	25	10/05/2018 09:56	WG1176277
Methylene Chloride	U		0.0250	0.125	25	10/05/2018 09:56	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.0535	0.250	25	10/05/2018 09:56	WG1176277
Methyl tert-butyl ether	U		0.00918	0.0250	25	10/05/2018 09:56	WG1176277
Naphthalene	U		0.0250	0.125	25	10/05/2018 09:56	WG1176277
n-Propylbenzene	0.0429		0.00872	0.0250	25	10/05/2018 09:56	WG1176277
Styrene	U		0.00768	0.0250	25	10/05/2018 09:56	WG1176277
1,1,1,2-Tetrachloroethane	U		0.00962	0.0250	25	10/05/2018 09:56	WG1176277
1,1,2,2-Tetrachloroethane	U		0.00325	0.0250	25	10/05/2018 09:56	WG1176277
Tetrachloroethene	U		0.00930	0.0250	25	10/05/2018 09:56	WG1176277
Toluene	0.0209	J	0.0103	0.0250	25	10/05/2018 09:56	WG1176277
1,1,1-Trichloroethane	U		0.00798	0.0250	25	10/05/2018 09:56	WG1176277
1,1,2-Trichloroethane	U		0.00958	0.0250	25	10/05/2018 09:56	WG1176277
Trichloroethene	U		0.00995	0.0250	25	10/05/2018 09:56	WG1176277
1,2,4-Trimethylbenzene	0.115		0.00932	0.0250	25	10/05/2018 09:56	WG1176277
1,3,5-Trimethylbenzene	0.0165	J	0.00968	0.0250	25	10/05/2018 09:56	WG1176277
Vinyl chloride	U		0.00648	0.0250	25	10/05/2018 09:56	WG1176277
o-Xylene	U		0.00852	0.0250	25	10/05/2018 09:56	WG1176277
m&p-Xylene	0.123		0.0180	0.0500	25	10/05/2018 09:56	WG1176277
Xylenes, Total	0.123		0.0265	0.0750	25	10/05/2018 09:56	WG1176277
(S) Toluene-d8	*102*			*80.0-120*		*10/05/2018 09:56*	WG1176277
(S) Dibromofluoromethane	*94.3*			*75.0-120*		*10/05/2018 09:56*	WG1176277
(S) 4-Bromofluorobenzene	*96.1*			*77.0-126*		*10/05/2018 09:56*	WG1176277

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	14.8		0.123	0.500	5	10/09/2018 04:53	WG1177386
(S) o-Terphenyl	*93.2*			*31.0-160*		*10/09/2018 04:53*	WG1177386

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2080		14.1	50.0	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.394	2.00	20	10/09/2018 20:09	WG1178144

Sample Narrative:

L1031729-03 WG1178144: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	238		1.04	20.0	20	10/06/2018 23:05	WG1175177
Fluoride	2.13		0.00990	0.100	1	10/06/2018 22:51	WG1175177
Sulfate	719		1.55	100	20	10/06/2018 23:05	WG1175177

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0173		0.000250	0.00200	1	10/10/2018 13:19	WG1176336
Barium	0.0171		0.000360	0.00500	1	10/10/2018 13:19	WG1176336
Calcium	160		0.0460	1.00	1	10/10/2018 13:19	WG1176336
Chromium	0.00240		0.000540	0.00200	1	10/10/2018 13:19	WG1176336
Iron	0.0675	J	0.0150	0.100	1	10/10/2018 13:19	WG1176336
Lead	U		0.000240	0.00200	1	10/10/2018 13:19	WG1176336
Manganese	0.0419		0.000250	0.00500	1	10/10/2018 13:19	WG1176336
Potassium	0.650	J	0.0370	1.00	1	10/10/2018 13:19	WG1176336
Selenium	U		0.000380	0.00200	1	10/10/2018 13:19	WG1176336
Sodium	474		0.110	1.00	1	10/10/2018 13:19	WG1176336

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.381		0.0314	0.100	1	10/07/2018 14:40	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*99.5*			*78.0-120*		*10/07/2018 14:40*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0500	0.250	5	10/05/2018 10:16	WG1176277
Benzene	U		0.00166	0.00500	5	10/05/2018 10:16	WG1176277
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 10:16	WG1176277
Bromoform	U		0.00234	0.00500	5	10/05/2018 10:16	WG1176277
Bromomethane	U		0.00433	0.0250	5	10/05/2018 10:16	WG1176277
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 10:16	WG1176277
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 10:16	WG1176277
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 10:16	WG1176277
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 10:16	WG1176277
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 10:16	WG1176277
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 10:16	WG1176277
Chloroethane	U		0.00226	0.0250	5	10/05/2018 10:16	WG1176277
Chloroform	U		0.00162	0.0250	5	10/05/2018 10:16	WG1176277

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.00138	0.0125	5	10/05/2018 10:16	WG1176277
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 10:16	WG1176277
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 10:16	WG1176277
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 10:16	WG1176277
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 10:16	WG1176277
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 10:16	WG1176277
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 10:16	WG1176277
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 10:16	WG1176277
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 10:16	WG1176277
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 10:16	WG1176277
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 10:16	WG1176277
Isopropylbenzene	U		0.00163	0.00500	5	10/05/2018 10:16	WG1176277
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 10:16	WG1176277
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 10:16	WG1176277
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 10:16	WG1176277
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 10:16	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 10:16	WG1176277
Methyl tert-butyl ether	0.00255	J	0.00184	0.00500	5	10/05/2018 10:16	WG1176277
Naphthalene	U		0.00500	0.0250	5	10/05/2018 10:16	WG1176277
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 10:16	WG1176277
Styrene	U		0.00154	0.00500	5	10/05/2018 10:16	WG1176277
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 10:16	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 10:16	WG1176277
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 10:16	WG1176277
Toluene	U		0.00206	0.00500	5	10/05/2018 10:16	WG1176277
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 10:16	WG1176277
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 10:16	WG1176277
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 10:16	WG1176277
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 10:16	WG1176277
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 10:16	WG1176277
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 10:16	WG1176277
o-Xylene	U		0.00170	0.00500	5	10/05/2018 10:16	WG1176277
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 10:16	WG1176277
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 10:16	WG1176277
(S) Toluene-d8	*104*			*80.0-120*		*10/05/2018 10:16*	WG1176277
(S) Dibromofluoromethane	*92.7*			*75.0-120*		*10/05/2018 10:16*	WG1176277
(S) 4-Bromofluorobenzene	*95.0*			*77.0-126*		*10/05/2018 10:16*	WG1176277

Sample Narrative:

L1031729-03 WG1176277: Lowest possible dilution due to sample matrix.

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	8.36		0.123	0.500	5	10/09/2018 05:13	WG1177386
(S) o-Terphenyl	*93.7*			*31.0-160*		*10/09/2018 05:13*	WG1177386

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2910		14.1	50.0	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0700	J	0.0197	0.100	1	10/09/2018 20:10	WG1178144

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	27.9		0.0519	1.00	1	10/06/2018 23:18	WG1175177
Fluoride	1.43		0.00990	0.100	1	10/06/2018 23:18	WG1175177
Sulfate	2050		3.87	250	50	10/06/2018 23:32	WG1175177

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00160	J	0.000250	0.00200	1	10/10/2018 13:23	WG1176336
Barium	0.0119		0.000360	0.00500	1	10/10/2018 13:23	WG1176336
Calcium	246		0.0460	1.00	1	10/10/2018 13:23	WG1176336
Chromium	0.293		0.000540	0.00200	1	10/10/2018 13:23	WG1176336
Iron	0.286		0.0150	0.100	1	10/10/2018 13:23	WG1176336
Lead	0.000413	J	0.000240	0.00200	1	10/10/2018 13:23	WG1176336
Manganese	0.822		0.000250	0.00500	1	10/10/2018 13:23	WG1176336
Potassium	0.446	J	0.0370	1.00	1	10/10/2018 13:23	WG1176336
Selenium	U		0.000380	0.00200	1	10/10/2018 13:23	WG1176336
Sodium	289		0.110	1.00	1	10/10/2018 13:23	WG1176336

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.737		0.0314	0.100	1	10/07/2018 15:05	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/07/2018 15:05*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 10:36	WG1176277
Benzene	0.00289		0.000331	0.00100	1	10/05/2018 10:36	WG1176277
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 10:36	WG1176277
Bromoform	U		0.000469	0.00100	1	10/05/2018 10:36	WG1176277
Bromomethane	U		0.000866	0.00500	1	10/05/2018 10:36	WG1176277
n-Butylbenzene	0.00148		0.000361	0.00100	1	10/05/2018 10:36	WG1176277
sec-Butylbenzene	0.0115		0.000365	0.00100	1	10/05/2018 10:36	WG1176277
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 10:36	WG1176277
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 10:36	WG1176277
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 10:36	WG1176277
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 10:36	WG1176277
Chloroethane	U		0.000453	0.00500	1	10/05/2018 10:36	WG1176277
Chloroform	U		0.000324	0.00500	1	10/05/2018 10:36	WG1176277
Chloromethane	U		0.000276	0.00250	1	10/05/2018 10:36	WG1176277
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 10:36	WG1176277
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 10:36	WG1176277

DUP-TEL-01

Collected date/time: 10/02/18 12:00

SAMPLE RESULTS - 04

L1031729

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 10:36	WG1176277
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 10:36	WG1176277
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 10:36	WG1176277
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 10:36	WG1176277
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 10:36	WG1176277
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 10:36	WG1176277
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 10:36	WG1176277
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 10:36	WG1176277
Isopropylbenzene	0.0254		0.000326	0.00100	1	10/05/2018 10:36	WG1176277
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 10:36	WG1176277
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 10:36	WG1176277
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 10:36	WG1176277
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 10:36	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 10:36	WG1176277
Methyl tert-butyl ether	0.000874	J	0.000367	0.00100	1	10/05/2018 10:36	WG1176277
Naphthalene	U		0.00100	0.00500	1	10/05/2018 10:36	WG1176277
n-Propylbenzene	0.0230		0.000349	0.00100	1	10/05/2018 10:36	WG1176277
Styrene	U		0.000307	0.00100	1	10/05/2018 10:36	WG1176277
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 10:36	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 10:36	WG1176277
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 10:36	WG1176277
Toluene	U		0.000412	0.00100	1	10/05/2018 10:36	WG1176277
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 10:36	WG1176277
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 10:36	WG1176277
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 10:36	WG1176277
1,2,4-Trimethylbenzene	0.00395		0.000373	0.00100	1	10/05/2018 10:36	WG1176277
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 10:36	WG1176277
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 10:36	WG1176277
o-Xylene	U		0.000341	0.00100	1	10/05/2018 10:36	WG1176277
m&p-Xylene	0.00221		0.000719	0.00200	1	10/05/2018 10:36	WG1176277
Xylenes, Total	0.00221	J	0.00106	0.00300	1	10/05/2018 10:36	WG1176277
(S) Toluene-d8	*98.3*			*80.0-120*		*10/05/2018 10:36*	WG1176277
(S) Dibromofluoromethane	*92.2*			*75.0-120*		*10/05/2018 10:36*	WG1176277
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/05/2018 10:36*	WG1176277

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.18		0.0247	0.100	1	10/09/2018 00:30	WG1177386
(S) o-Terphenyl	*94.2*			*31.0-160*		*10/09/2018 00:30*	WG1177386

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	U		2.82	10.0	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/09/2018 20:12	WG1178144

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.351	J	0.0519	1.00	1	10/06/2018 23:46	WG1175177
Fluoride	U		0.00990	0.100	1	10/06/2018 23:46	WG1175177
Sulfate	U		0.0774	5.00	1	10/06/2018 23:46	WG1175177

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	10/10/2018 13:28	WG1176336
Barium	0.00120	B J	0.000360	0.00500	1	10/10/2018 13:28	WG1176336
Calcium	U		0.0460	1.00	1	10/10/2018 13:28	WG1176336
Chromium	U		0.000540	0.00200	1	10/10/2018 13:28	WG1176336
Iron	U		0.0150	0.100	1	10/10/2018 13:28	WG1176336
Lead	U		0.000240	0.00200	1	10/10/2018 13:28	WG1176336
Manganese	0.000738	J	0.000250	0.00500	1	10/10/2018 13:28	WG1176336
Potassium	U		0.0370	1.00	1	10/10/2018 13:28	WG1176336
Selenium	U		0.000380	0.00200	1	10/10/2018 13:28	WG1176336
Sodium	0.482	J	0.110	1.00	1	10/10/2018 13:28	WG1176336

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 15:29	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*99.5*			*78.0-120*		*10/07/2018 15:29*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 10:55	WG1176277
Benzene	U		0.000331	0.00100	1	10/05/2018 10:55	WG1176277
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 10:55	WG1176277
Bromoform	U		0.000469	0.00100	1	10/05/2018 10:55	WG1176277
Bromomethane	U		0.000866	0.00500	1	10/05/2018 10:55	WG1176277
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 10:55	WG1176277
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 10:55	WG1176277
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 10:55	WG1176277
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 10:55	WG1176277
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 10:55	WG1176277
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 10:55	WG1176277
Chloroethane	U		0.000453	0.00500	1	10/05/2018 10:55	WG1176277
Chloroform	U		0.000324	0.00500	1	10/05/2018 10:55	WG1176277
Chloromethane	U		0.000276	0.00250	1	10/05/2018 10:55	WG1176277
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 10:55	WG1176277
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 10:55	WG1176277

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 10:55	WG1176277
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 10:55	WG1176277
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 10:55	WG1176277
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 10:55	WG1176277
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 10:55	WG1176277
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 10:55	WG1176277
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 10:55	WG1176277
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 10:55	WG1176277
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 10:55	WG1176277
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 10:55	WG1176277
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 10:55	WG1176277
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 10:55	WG1176277
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 10:55	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 10:55	WG1176277
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 10:55	WG1176277
Naphthalene	U		0.00100	0.00500	1	10/05/2018 10:55	WG1176277
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 10:55	WG1176277
Styrene	U		0.000307	0.00100	1	10/05/2018 10:55	WG1176277
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 10:55	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 10:55	WG1176277
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 10:55	WG1176277
Toluene	U		0.000412	0.00100	1	10/05/2018 10:55	WG1176277
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 10:55	WG1176277
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 10:55	WG1176277
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 10:55	WG1176277
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 10:55	WG1176277
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 10:55	WG1176277
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 10:55	WG1176277
o-Xylene	U		0.000341	0.00100	1	10/05/2018 10:55	WG1176277
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 10:55	WG1176277
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 10:55	WG1176277
(S) Toluene-d8	*103*			*80.0-120*		*10/05/2018 10:55*	WG1176277
(S) Dibromofluoromethane	*96.3*			*75.0-120*		*10/05/2018 10:55*	WG1176277
(S) 4-Bromofluorobenzene	*96.6*			*77.0-126*		*10/05/2018 10:55*	WG1176277

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0280	J	0.0247	0.100	1	10/09/2018 00:50	WG1177386
(S) o-Terphenyl	*73.2*			*31.0-160*		*10/09/2018 00:50*	WG1177386

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 08:18	WG1176277
Benzene	U		0.000331	0.00100	1	10/05/2018 08:18	WG1176277
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 08:18	WG1176277
Bromoform	U		0.000469	0.00100	1	10/05/2018 08:18	WG1176277
Bromomethane	U		0.000866	0.00500	1	10/05/2018 08:18	WG1176277
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 08:18	WG1176277
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 08:18	WG1176277
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 08:18	WG1176277
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 08:18	WG1176277
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 08:18	WG1176277
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 08:18	WG1176277
Chloroethane	U		0.000453	0.00500	1	10/05/2018 08:18	WG1176277
Chloroform	U		0.000324	0.00500	1	10/05/2018 08:18	WG1176277
Chloromethane	U		0.000276	0.00250	1	10/05/2018 08:18	WG1176277
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 08:18	WG1176277
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 08:18	WG1176277
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 08:18	WG1176277
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 08:18	WG1176277
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 08:18	WG1176277
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 08:18	WG1176277
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 08:18	WG1176277
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 08:18	WG1176277
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 08:18	WG1176277
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 08:18	WG1176277
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 08:18	WG1176277
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 08:18	WG1176277
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 08:18	WG1176277
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 08:18	WG1176277
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 08:18	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 08:18	WG1176277
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 08:18	WG1176277
Naphthalene	U		0.00100	0.00500	1	10/05/2018 08:18	WG1176277
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 08:18	WG1176277
Styrene	U		0.000307	0.00100	1	10/05/2018 08:18	WG1176277
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 08:18	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 08:18	WG1176277
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 08:18	WG1176277
Toluene	U		0.000412	0.00100	1	10/05/2018 08:18	WG1176277
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 08:18	WG1176277
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 08:18	WG1176277
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 08:18	WG1176277
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 08:18	WG1176277
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 08:18	WG1176277
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 08:18	WG1176277
o-Xylene	U		0.000341	0.00100	1	10/05/2018 08:18	WG1176277
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 08:18	WG1176277
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 08:18	WG1176277
(S) Toluene-d8	*101*			*80.0-120*		*10/05/2018 08:18*	WG1176277
(S) Dibromofluoromethane	*94.7*			*75.0-120*		*10/05/2018 08:18*	WG1176277
(S) 4-Bromofluorobenzene	*96.7*			*77.0-126*		*10/05/2018 08:18*	WG1176277

WG1177074

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1031729-01,02,03,04,05

Method Blank (MB)

(MB) R3349861-1 10/09/18 15:22

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1031729-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031729-01 10/09/18 15:22 • (DUP) R3349861-4 10/09/18 15:22

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2840	2980	1	4.99		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349861-2 10/09/18 15:22 • (LCSD) R3349861-3 10/09/18 15:22

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8650	8670	98.3	98.5	85.0-115			0.231	5

WG1178144

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L1031729-01,02,03,04,05

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349125-1 10/09/18 19:40

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1031644-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031644-02 10/09/18 19:46 • (DUP) R3349125-4 10/09/18 19:48

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Nitrate-Nitrite	0.906	0.914	1	0.879		20

L1031730-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-07 10/09/18 20:27 • (DUP) R3349125-6 10/09/18 20:31

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Nitrate-Nitrite	U	0.000	1	0.000		20

L1031644-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031644-01 10/09/18 19:46 • (DUP) R3349125-9 10/09/18 19:48

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Nitrate-Nitrite	0.906	0.914	1	0.879		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349125-2 10/09/18 19:42 • (LCSD) R3349125-3 10/09/18 19:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	4.00	3.79	3.95	94.8	98.7	90.0-110			4.03	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L1031728-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031728-02 10/09/18 19:52 • (MS) R3349125-5 10/09/18 19:54

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Nitrate-Nitrite	2.50	U	2.59	103	1	90.0-110	

L1031730-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-08 10/09/18 20:32 • (MS) R3349125-7 10/09/18 20:34 • (MSD) R3349125-8 10/09/18 20:35

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	2.50	U	1.71	1.69	68.4	67.5	1	90.0-110	J6	J6	1.29	20

Method Blank (MB)

(MB) R3348698-1 10/06/18 16:10

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L1031021-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031021-01 10/06/18 17:44 • (DUP) R3348698-4 10/06/18 17:58

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	2.31	2.28	1	1.53		15
Fluoride	0.144	0.131	1	9.81		15
Sulfate	36.3	36.6	1	0.725		15

L1031071-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1031071-04 10/06/18 19:50 • (DUP) R3348698-6 10/06/18 20:04

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	26.2	26.4	1	0.915		15
Fluoride	0.394	0.398	1	1.01		15

L1031071-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1031071-04 10/06/18 20:45 • (DUP) R3348698-9 10/06/18 20:59

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	419	413	5	1.28		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348698-2 10/06/18 16:24 • (LCSD) R3348698-3 10/06/18 16:38

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.5	38.9	98.7	97.2	80.0-120			1.44	15
Fluoride	8.00	7.86	7.87	98.2	98.3	80.0-120			0.0992	15
Sulfate	40.0	40.3	39.8	101	99.5	80.0-120			1.38	15

QUALITY CONTROL SUMMARY

L1031729-03,04,05

L1031021-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031021-01 10/06/18 17:44 • (MS) R3348698-5 10/06/18 18:12

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	2.31	52.0	99.4	1	80.0-120	
Fluoride	5.00	0.144	5.03	97.7	1	80.0-120	
Sulfate	50.0	36.3	84.1	95.6	1	80.0-120	

L1031071-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031071-04 10/06/18 19:50 • (MS) R3348698-7 10/06/18 20:18 • (MSD) R3348698-8 10/06/18 20:31

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	26.2	75.3	75.4	98.3	98.4	1	80.0-120			0.0617	15
Fluoride	5.00	0.394	5.32	5.34	98.5	98.8	1	80.0-120			0.357	15

Method Blank (MB)

(MB) R3348235-1 10/05/18 10:36

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	U		0.0519	1.00
Fluoride	0.0868	J	0.00990	0.100
Sulfate	U		0.0774	5.00

L1031627-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031627-01 10/05/18 16:14 • (DUP) R3348235-4 10/05/18 16:28

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	1.68	1.65	1	1.81		15
Fluoride	0.291	0.287	1	1.42		15

L1031728-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031728-01 10/05/18 18:47 • (DUP) R3348235-7 10/05/18 19:01

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	1.21	1.71	1	34.3	J3	15

L1031728-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031728-01 10/05/18 19:29 • (DUP) R3348235-9 10/05/18 19:43

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	289	279	10	3.44		15
Sulfate	117	110	10	5.29		15

L1031627-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031627-01 10/06/18 09:17 • (DUP) R3348235-10 10/06/18 09:31

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Sulfate	121	124	5	2.09		15

WG1176331

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L1031729-01,02

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348235-2 10/05/18 10:50 • (LCSD) R3348235-3 10/05/18 11:04

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.4	39.4	98.6	98.6	80.0-120			0.0142	15
Fluoride	8.00	8.12	8.12	102	102	80.0-120			0.0197	15
Sulfate	40.0	38.8	38.9	97.1	97.2	80.0-120			0.147	15

L1031627-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031627-01 10/05/18 16:14 • (MS) R3348235-5 10/05/18 16:42 • (MSD) R3348235-6 10/05/18 16:56

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	1.68	50.5	50.9	97.7	98.4	1	80.0-120			0.718	15
Fluoride	5.00	0.291	5.29	5.34	100	101	1	80.0-120			0.900	15
Sulfate	50.0	126	162	161	71.6	69.8	1	80.0-120	E J6	E J6	0.561	15

L1031728-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031728-01 10/05/18 18:47 • (MS) R3348235-8 10/05/18 19:15

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	299	334	69.2	1	80.0-120	E V
Fluoride	5.00	1.21	8.30	142	1	80.0-120	J5
Sulfate	50.0	124	156	64.1	1	80.0-120	E J6

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349417-1 10/10/18 11:57

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	0.000693	J	0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349417-2 10/10/18 12:02 • (LCSD) R3349417-3 10/10/18 12:06

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0514	0.0515	103	103	80.0-120			0.174	20
Barium	0.0500	0.0518	0.0490	104	98.1	80.0-120			5.39	20
Calcium	5.00	4.87	5.19	97.4	104	80.0-120			6.38	20
Chromium	0.0500	0.0536	0.0521	107	104	80.0-120			2.80	20
Iron	5.00	5.26	5.19	105	104	80.0-120			1.32	20
Lead	0.0500	0.0515	0.0510	103	102	80.0-120			0.893	20
Manganese	0.0500	0.0512	0.0497	102	99.5	80.0-120			2.96	20
Potassium	5.00	5.02	5.05	100	101	80.0-120			0.772	20
Selenium	0.0500	0.0555	0.0527	111	105	80.0-120			5.08	20
Sodium	5.00	5.18	5.22	104	104	80.0-120			0.806	20

L1031727-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031727-02 10/10/18 12:11 • (MS) R3349417-5 10/10/18 12:20 • (MSD) R3349417-6 10/10/18 12:25

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00537	0.0571	0.0552	103	99.7	1	75.0-125			3.35	20
Barium	0.0500	0.0101	0.0640	0.0606	108	101	1	75.0-125			5.56	20
Calcium	5.00	599	625	594	517	0.000	1	75.0-125	V	V	5.19	20
Chromium	0.0500	U	0.0513	0.0502	103	100	1	75.0-125			2.19	20
Potassium	5.00	2.08	7.33	7.04	105	99.4	1	75.0-125			3.97	20
Iron	5.00	U	5.11	4.98	102	99.6	1	75.0-125			2.53	20
Lead	0.0500	U	0.0525	0.0515	105	103	1	75.0-125			1.85	20

QUALITY CONTROL SUMMARY

L1031727-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031727-02 10/10/18 12:11 • (MS) R3349417-5 10/10/18 12:20 • (MSD) R3349417-6 10/10/18 12:25

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Manganese	0.0500	0.738	0.804	0.775	133	74.5	1	75.0-125	V	V	3.70	20
Selenium	0.0500	0.0331	0.0933	0.0871	120	108	1	75.0-125			6.93	20
Sodium	5.00	448	464	439	322	0.000	1	75.0-125	V	V	5.45	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348900-3 10/07/18 09:41

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*99.4*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348900-1 10/07/18 08:28 • (LCSD) R3348900-2 10/07/18 08:52

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.00	6.04	109	110	72.0-127			0.604	20
(S) a,a,a-Trifluorotoluene(FID)				*104*	*104*	*78.0-120*				

L1031730-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-06 10/07/18 17:53 • (MS) R3348900-4 10/07/18 18:17 • (MSD) R3348900-5 10/07/18 18:41

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	0.915	5.76	5.58	88.2	84.8	1	10.0-160			3.29	22
(S) a,a,a-Trifluorotoluene(FID)					*102*	*102*		*78.0-120*				

QUALITY CONTROL SUMMARY

L1031729-01,02,03,04,05,06

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348042-3 10/05/18 07:39

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

QUALITY CONTROL SUMMARY

Method Blank (MB)

(MB) R3348042-3 10/05/18 07:39

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*102*			*80.0-120*
(S) Dibromofluoromethane	*93.9*			*75.0-120*
(S) 4-Bromofluorobenzene	*96.3*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348042-1 10/05/18 06:40 • (LCSD) R3348042-2 10/05/18 07:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.0946	0.0956	75.7	76.4	19.0-160			0.983	27
Benzene	0.0250	0.0235	0.0235	93.9	94.0	70.0-123			0.0738	20
Bromodichloromethane	0.0250	0.0236	0.0239	94.5	95.6	75.0-120			1.10	20
Bromoform	0.0250	0.0291	0.0283	116	113	68.0-132			2.74	20
Bromomethane	0.0250	0.0227	0.0220	90.8	87.8	10.0-160			3.32	25
n-Butylbenzene	0.0250	0.0220	0.0219	87.8	87.5	73.0-125			0.434	20
sec-Butylbenzene	0.0250	0.0251	0.0247	101	98.7	75.0-125			1.89	20
Carbon disulfide	0.0250	0.0224	0.0206	89.4	82.3	61.0-128			8.28	20
Carbon tetrachloride	0.0250	0.0229	0.0229	91.7	91.6	68.0-126			0.109	20
Chlorobenzene	0.0250	0.0270	0.0266	108	106	80.0-121			1.42	20
Chlorodibromomethane	0.0250	0.0271	0.0264	109	106	77.0-125			2.72	20
Chloroethane	0.0250	0.0208	0.0211	83.1	84.5	47.0-150			1.68	20
Chloroform	0.0250	0.0235	0.0234	93.9	93.6	73.0-120			0.371	20
Chloromethane	0.0250	0.0179	0.0168	71.4	67.3	41.0-142			6.03	20
1,2-Dibromoethane	0.0250	0.0256	0.0256	102	102	80.0-122			0.00426	20
1,1-Dichloroethane	0.0250	0.0232	0.0226	92.7	90.5	70.0-126			2.36	20
1,2-Dichloroethane	0.0250	0.0215	0.0208	86.0	83.2	70.0-128			3.30	20
1,1-Dichloroethene	0.0250	0.0246	0.0223	98.4	89.4	71.0-124			9.64	20
cis-1,2-Dichloroethene	0.0250	0.0251	0.0248	100	99.1	73.0-120			1.21	20
trans-1,2-Dichloroethene	0.0250	0.0244	0.0242	97.7	97.0	73.0-120			0.705	20
1,2-Dichloropropane	0.0250	0.0239	0.0241	95.6	96.2	77.0-125			0.617	20
cis-1,3-Dichloropropene	0.0250	0.0251	0.0250	101	100	80.0-123			0.406	20
trans-1,3-Dichloropropene	0.0250	0.0247	0.0245	98.7	98.1	78.0-124			0.529	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348042-1 10/05/18 06:40 • (LCSD) R3348042-2 10/05/18 07:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0261	0.0261	105	105	79.0-123			0.00575	20
2-Hexanone	0.125	0.118	0.118	94.4	94.3	67.0-149			0.124	20
Isopropylbenzene	0.0250	0.0264	0.0261	106	105	76.0-127			0.976	20
p-Isopropyltoluene	0.0250	0.0253	0.0250	101	100	76.0-125			1.02	20
2-Butanone (MEK)	0.125	0.0996	0.100	79.7	80.1	44.0-160			0.584	20
Methylene Chloride	0.0250	0.0234	0.0219	93.5	87.6	67.0-120			6.55	20
4-Methyl-2-pentanone (MIBK)	0.125	0.110	0.109	87.8	86.9	68.0-142			1.03	20
Methyl tert-butyl ether	0.0250	0.0224	0.0217	89.6	86.8	68.0-125			3.12	20
Naphthalene	0.0250	0.0223	0.0225	89.3	89.9	54.0-135			0.638	20
n-Propylbenzene	0.0250	0.0257	0.0253	103	101	77.0-124			1.77	20
Styrene	0.0250	0.0276	0.0271	110	108	73.0-130			1.88	20
1,1,1,2-Tetrachloroethane	0.0250	0.0275	0.0277	110	111	75.0-125			0.699	20
1,1,2,2-Tetrachloroethane	0.0250	0.0249	0.0247	99.5	98.8	65.0-130			0.645	20
Tetrachloroethene	0.0250	0.0283	0.0278	113	111	72.0-132			1.82	20
Toluene	0.0250	0.0254	0.0252	102	101	79.0-120			1.09	20
1,1,1-Trichloroethane	0.0250	0.0235	0.0233	94.1	93.1	73.0-124			1.05	20
1,1,2-Trichloroethane	0.0250	0.0258	0.0260	103	104	80.0-120			0.793	20
Trichloroethene	0.0250	0.0278	0.0273	111	109	78.0-124			2.01	20
1,2,4-Trimethylbenzene	0.0250	0.0257	0.0256	103	102	76.0-121			0.643	20
1,3,5-Trimethylbenzene	0.0250	0.0265	0.0264	106	105	76.0-122			0.417	20
Vinyl chloride	0.0250	0.0234	0.0217	93.4	86.9	67.0-131			7.26	20
Xylenes, Total	0.0750	0.0780	0.0777	104	104	79.0-123			0.385	20
o-Xylene	0.0250	0.0259	0.0258	104	103	80.0-122			0.203	20
m&p-Xylenes	0.0500	0.0521	0.0519	104	104	80.0-122			0.307	20
(S) Toluene-d8				*99.9*	*101*	*80.0-120*				
(S) Dibromofluoromethane				*92.9*	*91.5*	*75.0-120*				
(S) 4-Bromofluorobenzene				*95.3*	*96.3*	*77.0-126*				

WG1176610

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1031729-01

Method Blank (MB)

(MB) R3348177-3 10/05/18 10:23

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Methyl tert-butyl ether	U		0.000367	0.00100
(S) Toluene-d8	*96.7*			*80.0-120*
(S) Dibromofluoromethane	*99.9*			*75.0-120*
(S) 4-Bromofluorobenzene	*94.9*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348177-1 10/05/18 09:24 • (LCSD) R3348177-2 10/05/18 09:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Methyl tert-butyl ether	0.0250	0.0287	0.0265	115	106	68.0-125			8.31	20
(S) Toluene-d8				*98.0*	*96.1*	*80.0-120*				
(S) Dibromofluoromethane				*107*	*103*	*75.0-120*				
(S) 4-Bromofluorobenzene				*93.8*	*96.7*	*77.0-126*				

WG1177386

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L1031729-01,02,03,04,05

Method Blank (MB)

(MB) R3348846-1 10/08/18 12:22

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*65.5*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348846-2 10/08/18 12:42 • (LCSD) R3348846-3 10/08/18 13:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.33	1.38	88.7	92.0	50.0-150			3.69	20
(S) o-Terphenyl				*90.5*	*91.0*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

GLOSSARY OF TERMS

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J5	The sample matrix interfered with the ability to make any accurate determination; spike value is high.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia [1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky [1] [6]	90010
Kentucky [2]	16
Louisiana	AI30792
Louisiana [1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086
Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico [1]	n/a
New York	11742
North Carolina	Env375
North Carolina [1]	DW21704
North Carolina [3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee [1] [4]	2006
Texas	T 104704245-17-14
Texas [5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

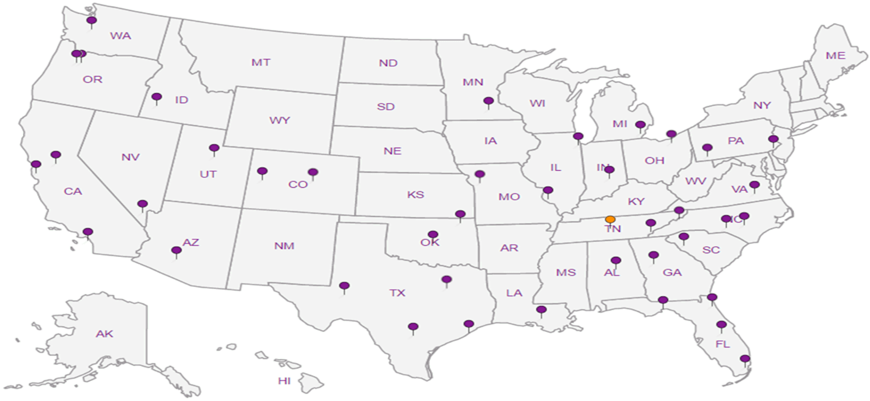
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01
A2LA – ISO 17025 [5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003
AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 1 of 1

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**
Project Description: **TEL Fall 2018**	City/State Collected: **Artesia, NM**
Phone: **512-684-3170** Fax:	Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-TEL**	
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **TEL (Navajo - Artesia)**
P.O. # **119503**	Quote #
Collected by (signature):	*Rush?* (Lab MUST Be Notified)
Immediately Packed on Ice N ___ Y ✓	___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day
Date Results Needed	

L # L1031729
G245
Table
Acctnum: **TRCATX**
Template: **T115528**
Prelogin: **P671987**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Pres Chk	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3 (<2)	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4 (<2)	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
TEL-4	Grab	GW		10-2-18	1255	9		X	X	X	X	X	X	X					-01
~~TEL-3~~	~~Grab~~	~~GW~~				~~9~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL				
TEL-2	Grab	GW		10-2-18	1130	9		X	X	X	X	X	X	X					-02
TEL-1	Grab	GW		↓	1045	9		X	X	X	X	X	X	X					-03
~~MW-49~~	~~Grab~~	~~GW~~				~~10~~		~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
DUP-TEL-01	Grab	GW		10-2-18	1200	9		X	X	X	X	X	X	X					-04
EB-TEL-01	Grab	GW			1145	9		X	X	X	X	X	X	X					-05
Trip Blank-TEL-01	Grab	GW		↓	—	1											X		

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ___

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-1=0.3 °C Bottles Received: 45
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 18, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L1031730
Samples Received:	10/04/2018
Project Number:	294318.0000.0000.
Description:	EP Fall 2018
Site:	EP NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

12065 Lebanon Rd   Mount Juliet, TN 37122   615-758-5858   800-767-5859   www.pacenational.com

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MW-76 L1031730-01 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 17:25	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:51	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:13	10/09/18 20:13	JER
Wet Chemistry by Method 9056A	WG1175177	1	10/07/18 00:00	10/07/18 00:00	MAJ
Wet Chemistry by Method 9056A	WG1175177	50	10/07/18 00:14	10/07/18 00:14	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 21:33	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 09:36	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 15:53	10/07/18 15:53	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 07:04	10/05/18 07:04	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	5	10/08/18 02:55	10/09/18 05:34	TH

MW-83 L1031730-02 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 16:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:51	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:15	10/09/18 20:15	JER
Wet Chemistry by Method 9056A	WG1175177	1	10/07/18 00:28	10/07/18 00:28	MAJ
Wet Chemistry by Method 9056A	WG1175177	50	10/07/18 01:10	10/07/18 01:10	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 21:38	LD
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/11/18 09:41	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 16:17	10/07/18 16:17	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 07:24	10/05/18 07:24	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	5	10/08/18 02:55	10/09/18 05:54	TH

MW-3 L1031730-03 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 15:50	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:51	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:22	10/09/18 20:22	JER
Wet Chemistry by Method 9056A	WG1175177	1	10/07/18 01:24	10/07/18 01:24	MAJ
Wet Chemistry by Method 9056A	WG1175177	50	10/07/18 01:38	10/07/18 01:38	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 22:10	LD
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/11/18 09:45	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 16:41	10/07/18 16:41	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 07:44	10/05/18 07:44	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	5	10/08/18 02:55	10/09/18 06:14	TH

MW-88 L1031730-04 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:55	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 22:15	LD
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/11/18 10:06	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 17:05	10/07/18 17:05	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 08:06	10/05/18 08:06	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/09/18 01:11	TH

MW-22A L1031730-05 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 13:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:51	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:24	10/09/18 20:24	JER
Wet Chemistry by Method 9056A	WG1175177	1	10/07/18 01:52	10/07/18 01:52	MAJ
Wet Chemistry by Method 9056A	WG1175177	50	10/07/18 02:06	10/07/18 02:06	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 22:19	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 10:10	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 17:29	10/07/18 17:29	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 08:25	10/05/18 08:25	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/09/18 01:31	TH

MW-10 L1031730-06 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 14:30	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177074	1	10/09/18 14:51	10/09/18 15:22	AJS
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:25	10/09/18 20:25	JER
Wet Chemistry by Method 9056A	WG1175177	1	10/07/18 02:19	10/07/18 02:19	MAJ
Wet Chemistry by Method 9056A	WG1175177	50	10/07/18 02:33	10/07/18 02:33	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 22:24	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 10:15	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177178	1	10/07/18 17:53	10/07/18 17:53	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 08:45	10/05/18 08:45	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/09/18 01:51	TH

MW-123 L1031730-07 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 15:15	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:27	10/09/18 20:27	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 02:54	10/09/18 02:54	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 03:14	10/09/18 03:14	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 22:28	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 10:19	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177442	1	10/08/18 06:23	10/08/18 06:23	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 09:05	10/05/18 09:05	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/09/18 02:11	TH

MW-4A L1031730-08 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:10	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178144	1	10/09/18 20:32	10/09/18 20:32	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 04:04	10/09/18 04:04	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 04:21	10/09/18 04:21	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 22:33	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 10:24	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177442	1	10/08/18 06:46	10/08/18 06:46	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 09:26	10/05/18 09:26	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	5	10/08/18 02:55	10/09/18 06:34	TH

MW-5A L1031730-09 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:15	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 14:47	10/10/18 14:47	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 04:38	10/09/18 04:38	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 04:55	10/09/18 04:55	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 22:38	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 10:28	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177442	1	10/08/18 07:28	10/08/18 07:28	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 09:46	10/05/18 09:46	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	5	10/08/18 02:55	10/09/18 06:55	TH

MW-7A L1031730-10 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:05	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 14:49	10/10/18 14:49	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 05:12	10/09/18 05:12	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 05:29	10/09/18 05:29	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 22:42	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 10:33	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177442	1	10/08/18 08:25	10/08/18 08:25	JAH
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	5	10/05/18 10:06	10/05/18 10:06	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177386	1	10/08/18 02:55	10/09/18 02:32	TH

OCD-8A L1031730-11 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 09:10	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 14:50	10/10/18 14:50	JER
Wet Chemistry by Method 4500CN E-2011	WG1176533	1	10/06/18 11:29	10/08/18 14:40	KK
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 05:46	10/09/18 05:46	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 06:03	10/09/18 06:03	MAJ
Mercury by Method 7470A	WG1176292	1	10/05/18 10:01	10/07/18 07:38	EL
Metals (ICP) by Method 6010B	WG1176325	1	10/06/18 13:26	10/07/18 15:18	CCE
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 22:47	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 10:38	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 13:18	10/07/18 13:18	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179146	1	10/11/18 02:31	10/11/18 02:31	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 10:17	TH

OCD-1R L1031730-12 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 14:35	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 14:58	10/10/18 14:58	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 06:20	10/09/18 06:20	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 06:37	10/09/18 06:37	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 23:27	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 10:42	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 13:41	10/07/18 13:41	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	1	10/05/18 10:46	10/05/18 10:46	BMB

OCD-1R L1031730-12 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 14:35	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 10:38	TH

OCD-2A L1031730-13 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 15:20	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 23:32	LD
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/11/18 10:47	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 14:04	10/07/18 14:04	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	1	10/05/18 11:07	10/05/18 11:07	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 10:58	TH

OCD-3 L1031730-14 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 16:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 23:36	LD
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/11/18 11:07	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 14:27	10/07/18 14:27	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	1	10/05/18 11:27	10/05/18 11:27	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 11:18	TH

OCD-4 L1031730-15 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 16:40	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 23:41	LD
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/11/18 11:11	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 14:50	10/07/18 14:50	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	1	10/05/18 11:48	10/05/18 11:48	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 11:38	TH

MW-11A L1031730-16 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 18:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 14:59	10/10/18 14:59	JER
Wet Chemistry by Method 9056A	WG1176341	50	10/09/18 17:37	10/09/18 17:37	MAJ
Wet Chemistry by Method 9056A	WG1176341	500	10/09/18 07:27	10/09/18 07:27	MAJ
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 23:45	LD
Metals (ICPMS) by Method 6020	WG1176329	10	10/09/18 15:26	10/11/18 12:26	JPD

OCD-5 L1031730-17 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 17:20	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 15:01	10/10/18 15:01	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 07:44	10/09/18 07:44	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 08:01	10/09/18 08:01	MAJ

OCD-5 L1031730-17 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 17:20	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 23:50	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 11:43	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 15:51	10/07/18 15:51	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	1	10/05/18 12:08	10/05/18 12:08	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1.18	10/08/18 17:04	10/09/18 11:58	TH

MW-87 L1031730-18 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 09:10	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 23:55	LD
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 11:47	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 16:14	10/07/18 16:14	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	1	10/05/18 12:29	10/05/18 12:29	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 12:19	TH

MW-18A L1031730-19 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 15:02	10/10/18 15:02	JER
Wet Chemistry by Method 4500CN E-2011	WG1176533	1	10/06/18 11:29	10/08/18 14:42	KK
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 08:18	10/09/18 08:18	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 08:35	10/09/18 08:35	MAJ
Mercury by Method 7470A	WG1176292	1	10/05/18 10:01	10/07/18 07:40	EL
Metals (ICP) by Method 6010B	WG1176325	1	10/06/18 13:26	10/07/18 15:21	CCE
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 23:59	JDG
Metals (ICPMS) by Method 6020	WG1176329	5	10/09/18 15:26	10/11/18 11:34	JDG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	1	10/05/18 12:49	10/05/18 12:49	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 12:39	TH

MW-70 L1031730-20 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/10/18 21:15	LD
Metals (ICPMS) by Method 6020	WG1176329	1	10/09/18 15:26	10/11/18 09:18	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 16:37	10/07/18 16:37	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176280	1	10/05/18 13:10	10/05/18 13:10	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 12:59	TH

MW-124 L1031730-21 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:30	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177076	1	10/09/18 16:58	10/09/18 17:26	JER
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 15:04	10/10/18 15:04	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 08:52	10/09/18 08:52	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 09:09	10/09/18 09:09	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 18:19	LD
Metals (ICPMS) by Method 6020	WG1176332	5	10/09/18 10:38	10/09/18 21:58	LD

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-124 L1031730-21 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:30	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 17:00	10/07/18 17:00	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	1	10/05/18 11:15	10/05/18 11:15	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 13:19	TH

DUP-EP-01 L1031730-22 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1181495	1	10/16/18 19:56	10/16/18 20:13	AJS
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 15:05	10/10/18 15:05	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 09:26	10/09/18 09:26	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 09:43	10/09/18 09:43	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 18:38	LD
Metals (ICPMS) by Method 6020	WG1176332	5	10/09/18 10:38	10/09/18 22:02	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 17:23	10/07/18 17:23	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176277	1	10/05/18 11:35	10/05/18 11:35	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 13:40	TH

DUP-EP-02 L1031730-23 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1181495	1	10/16/18 19:56	10/16/18 20:13	AJS
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 15:07	10/10/18 15:07	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 10:00	10/09/18 10:00	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 10:50	10/09/18 10:50	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 18:42	LD
Metals (ICPMS) by Method 6020	WG1176332	5	10/09/18 10:38	10/09/18 22:07	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 17:46	10/07/18 17:46	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176770	1	10/06/18 15:14	10/06/18 15:14	PP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 14:00	TH

DUP-EP-03 L1031730-24 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1181495	1	10/16/18 19:56	10/16/18 20:13	AJS
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 15:08	10/10/18 15:08	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 11:07	10/09/18 11:07	MAJ
Wet Chemistry by Method 9056A	WG1176341	100	10/09/18 11:24	10/09/18 11:24	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 19:10	LD
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 20:57	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 18:09	10/07/18 18:09	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176770	1	10/06/18 15:34	10/06/18 15:34	PP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 14:20	TH

EB-EP-02 L1031730-25 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1181495	1	10/16/18 19:56	10/16/18 20:13	AJS
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 15:10	10/10/18 15:10	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 01:47	10/09/18 01:47	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 19:14	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 18:32	10/07/18 18:32	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176770	1	10/06/18 15:54	10/06/18 15:54	PP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 14:40	TH

EB-EP-03 L1031730-26 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:30	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1181495	1	10/16/18 19:56	10/16/18 20:13	AJS
Wet Chemistry by Method 353.2	WG1178384	1	10/10/18 15:11	10/10/18 15:11	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 11:41	10/09/18 11:41	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 19:19	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 18:55	10/07/18 18:55	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176770	1	10/06/18 16:14	10/06/18 16:14	PP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 15:01	TH

TRIP BLANK-EP-02 L1031730-27 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 00:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176770	1	10/06/18 11:15	10/06/18 11:15	PP

TRIP BLANK-EP-03 L1031730-28 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 00:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176770	1	10/06/18 11:35	10/06/18 11:35	PP

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Project Manager

Project Narrative

TDS is reporting outside of the 7 day hold time on several samples due to QC failures in the intitial analysis. The out of hold data did not confirm with the initial analysis.

Sample Handling and Receiving

The following analysis were performed from an unpreserved, insufficiently or inadequately preserved sample.

Lab Sample ID	Project Sample ID	Method
L1031730-19	MW-18A	4500CN E-2011

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4130		28.2	100	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/09/2018 20:13	WG1178144

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1130		2.60	50.0	50	10/07/2018 00:14	WG1175177
Fluoride	2.95		0.00990	0.100	1	10/07/2018 00:00	WG1175177
Sulfate	2420		3.87	250	50	10/07/2018 00:14	WG1175177

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0718		0.000250	0.00200	1	10/10/2018 21:33	WG1176329
Barium	0.0714		0.00180	0.0250	5	10/11/2018 09:36	WG1176329
Calcium	464		0.0460	1.00	1	10/10/2018 21:33	WG1176329
Chromium	0.00888		0.000540	0.00200	1	10/10/2018 21:33	WG1176329
Iron	7.39		0.0150	0.100	1	10/10/2018 21:33	WG1176329
Lead	0.00261	B J	0.00120	0.0100	5	10/11/2018 09:36	WG1176329
Manganese	0.737		0.000250	0.00500	1	10/10/2018 21:33	WG1176329
Potassium	25.6		0.0370	1.00	1	10/10/2018 21:33	WG1176329
Selenium	0.00404		0.000380	0.00200	1	10/10/2018 21:33	WG1176329
Sodium	1130		0.550	5.00	5	10/11/2018 09:36	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.69		0.0314	0.100	1	10/07/2018 15:53	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*99.8*			*78.0-120*		*10/07/2018 15:53*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	10/05/2018 07:04	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 07:04	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 07:04	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 07:04	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 07:04	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 07:04	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 07:04	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 07:04	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 07:04	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 07:04	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 07:04	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 07:04	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 07:04	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 07:04	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 07:04	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 07:04	WG1176280

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 07:04	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 07:04	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 07:04	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 07:04	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 07:04	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 07:04	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 07:04	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 07:04	WG1176280
Isopropylbenzene	0.0138		0.00163	0.00500	5	10/05/2018 07:04	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 07:04	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 07:04	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 07:04	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 07:04	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 07:04	WG1176280
Methyl tert-butyl ether	0.0119		0.00184	0.00500	5	10/05/2018 07:04	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 07:04	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 07:04	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 07:04	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 07:04	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 07:04	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 07:04	WG1176280
Toluene	U		0.00206	0.00500	5	10/05/2018 07:04	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 07:04	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 07:04	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 07:04	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 07:04	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 07:04	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 07:04	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 07:04	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 07:04	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 07:04	WG1176280
(S) Toluene-d8	*108*			*80.0-120*		*10/05/2018 07:04*	WG1176280
(S) Dibromofluoromethane	*95.2*			*75.0-120*		*10/05/2018 07:04*	WG1176280
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/05/2018 07:04*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	29.2		0.123	0.500	5	10/09/2018 05:34	WG1177386
(S) o-Terphenyl	*101*			*31.0-160*		*10/09/2018 05:34*	WG1177386

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4860		28.2	100	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.495		0.0197	0.100	1	10/09/2018 20:15	WG1178144

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	221		2.60	50.0	50	10/07/2018 01:10	WG1175177
Fluoride	5.14		0.00990	0.100	1	10/07/2018 00:28	WG1175177
Sulfate	4240		3.87	250	50	10/07/2018 01:10	WG1175177

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0343		0.000250	0.00200	1	10/10/2018 21:38	WG1176329
Barium	0.0365		0.000360	0.00500	1	10/11/2018 09:41	WG1176329
Calcium	562		0.0460	1.00	1	10/10/2018 21:38	WG1176329
Chromium	0.0477		0.000540	0.00200	1	10/10/2018 21:38	WG1176329
Iron	7.25		0.0150	0.100	1	10/10/2018 21:38	WG1176329
Lead	0.00814		0.000240	0.00200	1	10/11/2018 09:41	WG1176329
Manganese	0.472		0.000250	0.00500	1	10/10/2018 21:38	WG1176329
Potassium	48.6		0.0370	1.00	1	10/10/2018 21:38	WG1176329
Selenium	0.0124		0.000380	0.00200	1	10/10/2018 21:38	WG1176329
Sodium	363		0.110	1.00	1	10/10/2018 21:38	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.597		0.0314	0.100	1	10/07/2018 16:17	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*99.6*			*78.0-120*		*10/07/2018 16:17*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	10/05/2018 07:24	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 07:24	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 07:24	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 07:24	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 07:24	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 07:24	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 07:24	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 07:24	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 07:24	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 07:24	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 07:24	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 07:24	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 07:24	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 07:24	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 07:24	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 07:24	WG1176280

MW-83
Collected date/time: 10/02/18 16:45

SAMPLE RESULTS - 02

L1031730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 07:24	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 07:24	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 07:24	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 07:24	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 07:24	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 07:24	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 07:24	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 07:24	WG1176280
Isopropylbenzene	0.00190	J	0.00163	0.00500	5	10/05/2018 07:24	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 07:24	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 07:24	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 07:24	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 07:24	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 07:24	WG1176280
Methyl tert-butyl ether	U		0.00184	0.00500	5	10/05/2018 07:24	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 07:24	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 07:24	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 07:24	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 07:24	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 07:24	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 07:24	WG1176280
Toluene	U		0.00206	0.00500	5	10/05/2018 07:24	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 07:24	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 07:24	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 07:24	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 07:24	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 07:24	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 07:24	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 07:24	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 07:24	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 07:24	WG1176280
(S) Toluene-d8	*110*			*80.0-120*		*10/05/2018 07:24*	WG1176280
(S) Dibromofluoromethane	*89.7*			*75.0-120*		*10/05/2018 07:24*	WG1176280
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 07:24*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	19.5		0.123	0.500	5	10/09/2018 05:54	WG1177386
(S) o-Terphenyl	*102*			*31.0-160*		*10/09/2018 05:54*	WG1177386

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4370		28.2	100	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.535		0.0197	0.100	1	10/09/2018 20:22	WG1178144

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1110		2.60	50.0	50	10/07/2018 01:38	WG1175177
Fluoride	1.91		0.00990	0.100	1	10/07/2018 01:24	WG1175177
Sulfate	2610		3.87	250	50	10/07/2018 01:38	WG1175177

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0254		0.000250	0.00200	1	10/10/2018 22:10	WG1176329
Barium	0.0151		0.000360	0.00500	1	10/11/2018 09:45	WG1176329
Calcium	591		0.0460	1.00	1	10/10/2018 22:10	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 22:10	WG1176329
Iron	0.0441	J	0.0150	0.100	1	10/10/2018 22:10	WG1176329
Lead	0.000448	B J	0.000240	0.00200	1	10/11/2018 09:45	WG1176329
Manganese	0.869		0.000250	0.00500	1	10/10/2018 22:10	WG1176329
Potassium	5.19		0.0370	1.00	1	10/10/2018 22:10	WG1176329
Selenium	0.00889		0.000380	0.00200	1	10/10/2018 22:10	WG1176329
Sodium	856		0.110	1.00	1	10/10/2018 22:10	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.289		0.0314	0.100	1	10/07/2018 16:41	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*99.6*			*78.0-120*		*10/07/2018 16:41*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	10/05/2018 07:44	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 07:44	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 07:44	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 07:44	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 07:44	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 07:44	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 07:44	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 07:44	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 07:44	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 07:44	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 07:44	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 07:44	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 07:44	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 07:44	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 07:44	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 07:44	WG1176280

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 07:44	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 07:44	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 07:44	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 07:44	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 07:44	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 07:44	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 07:44	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 07:44	WG1176280
Isopropylbenzene	U		0.00163	0.00500	5	10/05/2018 07:44	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 07:44	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 07:44	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 07:44	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 07:44	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 07:44	WG1176280
Methyl tert-butyl ether	U		0.00184	0.00500	5	10/05/2018 07:44	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 07:44	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 07:44	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 07:44	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 07:44	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 07:44	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 07:44	WG1176280
Toluene	U		0.00206	0.00500	5	10/05/2018 07:44	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 07:44	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 07:44	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 07:44	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 07:44	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 07:44	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 07:44	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 07:44	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 07:44	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 07:44	WG1176280
(S) Toluene-d8	*111*			*80.0-120*		*10/05/2018 07:44*	WG1176280
(S) Dibromofluoromethane	*93.1*			*75.0-120*		*10/05/2018 07:44*	WG1176280
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/05/2018 07:44*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	6.25		0.123	0.500	5	10/09/2018 06:14	WG1177386
(S) o-Terphenyl	*90.5*			*31.0-160*		*10/09/2018 06:14*	WG1177386

SAMPLE RESULTS - 04

L1031730

MW-88

Collected date/time: 10/02/18 12:55

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00660		0.000250	0.00200	1	10/10/2018 22:15	WG1176329
Barium	0.0109		0.000360	0.00500	1	10/11/2018 10:06	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 22:15	WG1176329
Iron	0.0233	J	0.0150	0.100	1	10/10/2018 22:15	WG1176329
Lead	0.000531	B J	0.000240	0.00200	1	10/11/2018 10:06	WG1176329
Manganese	0.881		0.000250	0.00500	1	10/10/2018 22:15	WG1176329
Selenium	U		0.000380	0.00200	1	10/10/2018 22:15	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.0479	J	0.0314	0.100	1	10/07/2018 17:05	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*99.1*			*78.0-120*		*10/07/2018 17:05*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	10/05/2018 08:06	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 08:06	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 08:06	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 08:06	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 08:06	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 08:06	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 08:06	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 08:06	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 08:06	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 08:06	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 08:06	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 08:06	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 08:06	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 08:06	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 08:06	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 08:06	WG1176280
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 08:06	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 08:06	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 08:06	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 08:06	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 08:06	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 08:06	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 08:06	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 08:06	WG1176280
Isopropylbenzene	U		0.00163	0.00500	5	10/05/2018 08:06	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 08:06	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 08:06	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 08:06	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 08:06	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 08:06	WG1176280
Methyl tert-butyl ether	U		0.00184	0.00500	5	10/05/2018 08:06	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 08:06	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 08:06	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 08:06	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 08:06	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 08:06	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 08:06	WG1176280

MW-88

Collected date/time: 10/02/18 12:55

SAMPLE RESULTS - 04

L1031730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Toluene	U		0.00206	0.00500	5	10/05/2018 08:06	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 08:06	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 08:06	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 08:06	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 08:06	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 08:06	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 08:06	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 08:06	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 08:06	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 08:06	WG1176280
(S) Toluene-d8	*112*			*80.0-120*		*10/05/2018 08:06*	WG1176280
(S) Dibromofluoromethane	*93.3*			*75.0-120*		*10/05/2018 08:06*	WG1176280
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 08:06*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.415		0.0247	0.100	1	10/09/2018 01:11	WG1177386
(S) o-Terphenyl	*94.2*			*31.0-160*		*10/09/2018 01:11*	WG1177386

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5730		28.2	100	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/09/2018 20:24	WG1178144

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1650		2.60	50.0	50	10/07/2018 02:06	WG1175177
Fluoride	0.677		0.00990	0.100	1	10/07/2018 01:52	WG1175177
Sulfate	2370		3.87	250	50	10/07/2018 02:06	WG1175177

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0463		0.000250	0.00200	1	10/10/2018 22:19	WG1176329
Barium	0.0156	J	0.00180	0.0250	5	10/11/2018 10:10	WG1176329
Calcium	444		0.0460	1.00	1	10/10/2018 22:19	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 22:19	WG1176329
Iron	5.81		0.0150	0.100	1	10/10/2018 22:19	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 10:10	WG1176329
Manganese	5.71		0.000250	0.00500	1	10/10/2018 22:19	WG1176329
Potassium	3.37		0.0370	1.00	1	10/10/2018 22:19	WG1176329
Selenium	0.000677	J	0.000380	0.00200	1	10/10/2018 22:19	WG1176329
Sodium	1360		0.550	5.00	5	10/11/2018 10:10	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	3.61		0.0314	0.100	1	10/07/2018 17:29	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/07/2018 17:29*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0500	0.250	5	10/05/2018 08:25	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 08:25	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 08:25	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 08:25	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 08:25	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 08:25	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 08:25	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 08:25	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 08:25	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 08:25	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 08:25	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 08:25	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 08:25	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 08:25	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 08:25	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 08:25	WG1176280

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 08:25	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 08:25	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 08:25	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 08:25	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 08:25	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 08:25	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 08:25	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 08:25	WG1176280
Isopropylbenzene	U		0.00163	0.00500	5	10/05/2018 08:25	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 08:25	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 08:25	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 08:25	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 08:25	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 08:25	WG1176280
Methyl tert-butyl ether	0.00351	J	0.00184	0.00500	5	10/05/2018 08:25	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 08:25	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 08:25	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 08:25	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 08:25	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 08:25	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 08:25	WG1176280
Toluene	U		0.00206	0.00500	5	10/05/2018 08:25	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 08:25	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 08:25	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 08:25	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 08:25	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 08:25	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 08:25	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 08:25	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 08:25	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 08:25	WG1176280
(S) Toluene-d8	*112*			*80.0-120*		*10/05/2018 08:25*	WG1176280
(S) Dibromofluoromethane	*92.7*			*75.0-120*		*10/05/2018 08:25*	WG1176280
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 08:25*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	5.13		0.0247	0.100	1	10/09/2018 01:31	WG1177386
(S) o-Terphenyl	*92.6*			*31.0-160*		*10/09/2018 01:31*	WG1177386

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3800		28.2	100	1	10/09/2018 15:22	WG1177074

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/09/2018 20:25	WG1178144

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1300		2.60	50.0	50	10/07/2018 02:33	WG1175177
Fluoride	0.854		0.00990	0.100	1	10/07/2018 02:19	WG1175177
Sulfate	2100		3.87	250	50	10/07/2018 02:33	WG1175177

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0153		0.000250	0.00200	1	10/10/2018 22:24	WG1176329
Barium	0.0109	J	0.00180	0.0250	5	10/11/2018 10:15	WG1176329
Calcium	454		0.0460	1.00	1	10/10/2018 22:24	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 22:24	WG1176329
Iron	0.114		0.0150	0.100	1	10/10/2018 22:24	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 10:15	WG1176329
Manganese	2.70		0.000250	0.00500	1	10/10/2018 22:24	WG1176329
Potassium	3.35		0.0370	1.00	1	10/10/2018 22:24	WG1176329
Selenium	0.000472	J	0.000380	0.00200	1	10/10/2018 22:24	WG1176329
Sodium	1060		0.550	5.00	5	10/11/2018 10:15	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.915		0.0314	0.100	1	10/07/2018 17:53	WG1177178
(S) a,a,a-Trifluorotoluene(FID)	*99.4*			*78.0-120*		*10/07/2018 17:53*	WG1177178

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	10/05/2018 08:45	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 08:45	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 08:45	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 08:45	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 08:45	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 08:45	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 08:45	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 08:45	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 08:45	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 08:45	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 08:45	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 08:45	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 08:45	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 08:45	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 08:45	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 08:45	WG1176280

MW-10

Collected date/time: 10/02/18 14:30

SAMPLE RESULTS - 06

L1031730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 08:45	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 08:45	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 08:45	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 08:45	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 08:45	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 08:45	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 08:45	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 08:45	WG1176280
Isopropylbenzene	U		0.00163	0.00500	5	10/05/2018 08:45	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 08:45	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 08:45	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 08:45	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 08:45	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 08:45	WG1176280
Methyl tert-butyl ether	U		0.00184	0.00500	5	10/05/2018 08:45	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 08:45	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 08:45	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 08:45	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 08:45	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 08:45	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 08:45	WG1176280
Toluene	U		0.00206	0.00500	5	10/05/2018 08:45	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 08:45	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 08:45	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 08:45	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 08:45	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 08:45	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 08:45	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 08:45	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 08:45	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 08:45	WG1176280
(S) Toluene-d8	*111*			*80.0-120*		*10/05/2018 08:45*	WG1176280
(S) Dibromofluoromethane	*92.9*			*75.0-120*		*10/05/2018 08:45*	WG1176280
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 08:45*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.03		0.0247	0.100	1	10/09/2018 01:51	WG1177386
(S) o-Terphenyl	*97.9*			*31.0-160*		*10/09/2018 01:51*	WG1177386

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4380		28.2	100	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/09/2018 20:27	WG1178144

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1390		5.19	100	100	10/09/2018 03:14	WG1176341
Fluoride	0.894		0.00990	0.100	1	10/09/2018 02:54	WG1176341
Sulfate	2040		7.74	500	100	10/09/2018 03:14	WG1176341

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0211		0.000250	0.00200	1	10/10/2018 22:28	WG1176329
Barium	0.0249	J	0.00180	0.0250	5	10/11/2018 10:19	WG1176329
Calcium	519		0.0460	1.00	1	10/10/2018 22:28	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 22:28	WG1176329
Iron	0.0298	J	0.0150	0.100	1	10/10/2018 22:28	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 10:19	WG1176329
Manganese	3.06		0.000250	0.00500	1	10/10/2018 22:28	WG1176329
Potassium	3.49		0.0370	1.00	1	10/10/2018 22:28	WG1176329
Selenium	U		0.000380	0.00200	1	10/10/2018 22:28	WG1176329
Sodium	1150		0.550	5.00	5	10/11/2018 10:19	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	2.04		0.0314	0.100	1	10/08/2018 06:23	WG1177442
(S) a,a,a-Trifluorotoluene(FID)	*99.7*			*78.0-120*		*10/08/2018 06:23*	WG1177442

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0500	0.250	5	10/05/2018 09:05	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 09:05	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 09:05	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 09:05	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 09:05	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 09:05	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 09:05	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 09:05	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 09:05	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 09:05	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 09:05	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 09:05	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 09:05	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 09:05	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 09:05	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 09:05	WG1176280

MW-123
Collected date/time: 10/02/18 15:15

SAMPLE RESULTS - 07

L1031730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 09:05	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 09:05	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 09:05	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 09:05	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 09:05	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 09:05	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 09:05	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 09:05	WG1176280
Isopropylbenzene	U		0.00163	0.00500	5	10/05/2018 09:05	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 09:05	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 09:05	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 09:05	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 09:05	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 09:05	WG1176280
Methyl tert-butyl ether	U		0.00184	0.00500	5	10/05/2018 09:05	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 09:05	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 09:05	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 09:05	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 09:05	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 09:05	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 09:05	WG1176280
Toluene	U		0.00206	0.00500	5	10/05/2018 09:05	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 09:05	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 09:05	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 09:05	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 09:05	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 09:05	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 09:05	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 09:05	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 09:05	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 09:05	WG1176280
(S) Toluene-d8	*110*			*80.0-120*		*10/05/2018 09:05*	WG1176280
(S) Dibromofluoromethane	*92.8*			*75.0-120*		*10/05/2018 09:05*	WG1176280
(S) 4-Bromofluorobenzene	*105*			*77.0-126*		*10/05/2018 09:05*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	2.51		0.0247	0.100	1	10/09/2018 02:11	WG1177386
(S) o-Terphenyl	*90.0*			*31.0-160*		*10/09/2018 02:11*	WG1177386

MW-4A
Collected date/time: 10/02/18 12:10

SAMPLE RESULTS - 08

L1031730

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3880		28.2	100	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U	J6	0.0197	0.100	1	10/09/2018 20:32	WG1178144

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1300		5.19	100	100	10/09/2018 04:21	WG1176341
Fluoride	1.65		0.00990	0.100	1	10/09/2018 04:04	WG1176341
Sulfate	1800		7.74	500	100	10/09/2018 04:21	WG1176341

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.183		0.000250	0.00200	1	10/10/2018 22:33	WG1176329
Barium	0.0122	J	0.00180	0.0250	5	10/11/2018 10:24	WG1176329
Calcium	415		0.0460	1.00	1	10/10/2018 22:33	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 22:33	WG1176329
Iron	1.34		0.0150	0.100	1	10/10/2018 22:33	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 10:24	WG1176329
Manganese	1.77		0.000250	0.00500	1	10/10/2018 22:33	WG1176329
Potassium	4.58		0.0370	1.00	1	10/10/2018 22:33	WG1176329
Selenium	0.000579	J	0.000380	0.00200	1	10/10/2018 22:33	WG1176329
Sodium	988		0.550	5.00	5	10/11/2018 10:24	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.803		0.0314	0.100	1	10/08/2018 06:46	WG1177442
(S) a,a,a-Trifluorotoluene(FID)	*99.5*			*78.0-120*		*10/08/2018 06:46*	WG1177442

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0500	0.250	5	10/05/2018 09:26	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 09:26	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 09:26	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 09:26	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 09:26	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 09:26	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 09:26	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 09:26	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 09:26	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 09:26	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 09:26	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 09:26	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 09:26	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 09:26	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 09:26	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 09:26	WG1176280

MW-4A

Collected date/time: 10/02/18 12:10

SAMPLE RESULTS - 08

L1031730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 09:26	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 09:26	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 09:26	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 09:26	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 09:26	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 09:26	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 09:26	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 09:26	WG1176280
Isopropylbenzene	0.00451	J	0.00163	0.00500	5	10/05/2018 09:26	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 09:26	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 09:26	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 09:26	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 09:26	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 09:26	WG1176280
Methyl tert-butyl ether	U		0.00184	0.00500	5	10/05/2018 09:26	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 09:26	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 09:26	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 09:26	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 09:26	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 09:26	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 09:26	WG1176280
Toluene	U		0.00206	0.00500	5	10/05/2018 09:26	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 09:26	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 09:26	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 09:26	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 09:26	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 09:26	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 09:26	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 09:26	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 09:26	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 09:26	WG1176280
(S) Toluene-d8	*110*			*80.0-120*		*10/05/2018 09:26*	WG1176280
(S) Dibromofluoromethane	*93.2*			*75.0-120*		*10/05/2018 09:26*	WG1176280
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/05/2018 09:26*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	5.23		0.123	0.500	5	10/09/2018 06:34	WG1177386
(S) o-Terphenyl	*85.8*			*31.0-160*		*10/09/2018 06:34*	WG1177386

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	11400		56.4	200	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 14:47	WG1178384

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	2800		5.19	100	100	10/09/2018 04:55	WG1176341
Fluoride	1.80		0.00990	0.100	1	10/09/2018 04:38	WG1176341
Sulfate	5720		7.74	500	100	10/09/2018 04:55	WG1176341

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.196		0.000250	0.00200	1	10/10/2018 22:38	WG1176329
Barium	0.0137	J	0.00180	0.0250	5	10/11/2018 10:28	WG1176329
Calcium	415		0.0460	1.00	1	10/10/2018 22:38	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 22:38	WG1176329
Iron	6.17		0.0150	0.100	1	10/10/2018 22:38	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 10:28	WG1176329
Manganese	0.946		0.000250	0.00500	1	10/10/2018 22:38	WG1176329
Potassium	7.38		0.0370	1.00	1	10/10/2018 22:38	WG1176329
Selenium	0.00100	J	0.000380	0.00200	1	10/10/2018 22:38	WG1176329
Sodium	2620		0.550	5.00	5	10/11/2018 10:28	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	3.29		0.0314	0.100	1	10/08/2018 07:28	WG1177442
(S) a,a,a-Trifluorotoluene(FID)	*99.8*			*78.0-120*		*10/08/2018 07:28*	WG1177442

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0500	0.250	5	10/05/2018 09:46	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 09:46	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 09:46	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 09:46	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 09:46	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 09:46	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 09:46	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 09:46	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 09:46	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 09:46	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 09:46	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 09:46	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 09:46	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 09:46	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 09:46	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 09:46	WG1176280

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 09:46	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 09:46	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 09:46	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 09:46	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 09:46	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 09:46	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 09:46	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 09:46	WG1176280
Isopropylbenzene	0.00181	J	0.00163	0.00500	5	10/05/2018 09:46	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 09:46	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 09:46	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 09:46	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 09:46	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 09:46	WG1176280
Methyl tert-butyl ether	U		0.00184	0.00500	5	10/05/2018 09:46	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 09:46	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 09:46	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 09:46	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 09:46	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 09:46	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 09:46	WG1176280
Toluene	U		0.00206	0.00500	5	10/05/2018 09:46	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 09:46	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 09:46	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 09:46	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 09:46	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 09:46	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 09:46	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 09:46	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 09:46	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 09:46	WG1176280
(S) Toluene-d8	*110*			*80.0-120*		*10/05/2018 09:46*	WG1176280
(S) Dibromofluoromethane	*95.6*			*75.0-120*		*10/05/2018 09:46*	WG1176280
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 09:46*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	7.51		0.123	0.500	5	10/09/2018 06:55	WG1177386
(S) o-Terphenyl	*81.6*			*31.0-160*		*10/09/2018 06:55*	WG1177386

MW-7A

Collected date/time: 10/02/18 10:05

SAMPLE RESULTS - 10

L1031730

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	6440		28.2	100	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 14:49	WG1178384

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	2070		5.19	100	100	10/09/2018 05:29	WG1176341
Fluoride	1.09		0.00990	0.100	1	10/09/2018 05:12	WG1176341
Sulfate	2840		7.74	500	100	10/09/2018 05:29	WG1176341

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0311		0.000250	0.00200	1	10/10/2018 22:42	WG1176329
Barium	0.0163	J	0.00180	0.0250	5	10/11/2018 10:33	WG1176329
Calcium	343		0.0460	1.00	1	10/10/2018 22:42	WG1176329
Chromium	0.00129	J	0.000540	0.00200	1	10/10/2018 22:42	WG1176329
Iron	4.69		0.0150	0.100	1	10/10/2018 22:42	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 10:33	WG1176329
Manganese	0.449		0.000250	0.00500	1	10/10/2018 22:42	WG1176329
Potassium	3.93		0.0370	1.00	1	10/10/2018 22:42	WG1176329
Selenium	U		0.000380	0.00200	1	10/10/2018 22:42	WG1176329
Sodium	1580		0.550	5.00	5	10/11/2018 10:33	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.755		0.0314	0.100	1	10/08/2018 08:25	WG1177442
(S) a,a,a-Trifluorotoluene(FID)	*99.7*			*78.0-120*		*10/08/2018 08:25*	WG1177442

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	10/05/2018 10:06	WG1176280
Benzene	U		0.00166	0.00500	5	10/05/2018 10:06	WG1176280
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 10:06	WG1176280
Bromoform	U		0.00234	0.00500	5	10/05/2018 10:06	WG1176280
Bromomethane	U		0.00433	0.0250	5	10/05/2018 10:06	WG1176280
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 10:06	WG1176280
sec-Butylbenzene	U		0.00182	0.00500	5	10/05/2018 10:06	WG1176280
Carbon disulfide	U		0.00138	0.00500	5	10/05/2018 10:06	WG1176280
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 10:06	WG1176280
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 10:06	WG1176280
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 10:06	WG1176280
Chloroethane	U		0.00226	0.0250	5	10/05/2018 10:06	WG1176280
Chloroform	U		0.00162	0.0250	5	10/05/2018 10:06	WG1176280
Chloromethane	U		0.00138	0.0125	5	10/05/2018 10:06	WG1176280
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 10:06	WG1176280
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 10:06	WG1176280

MW-7A

Collected date/time: 10/02/18 10:05

SAMPLE RESULTS - 10

L1031730

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 10:06	WG1176280
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 10:06	WG1176280
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 10:06	WG1176280
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 10:06	WG1176280
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 10:06	WG1176280
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 10:06	WG1176280
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 10:06	WG1176280
Ethylbenzene	U		0.00192	0.00500	5	10/05/2018 10:06	WG1176280
Isopropylbenzene	U		0.00163	0.00500	5	10/05/2018 10:06	WG1176280
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 10:06	WG1176280
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 10:06	WG1176280
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 10:06	WG1176280
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 10:06	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 10:06	WG1176280
Methyl tert-butyl ether	U		0.00184	0.00500	5	10/05/2018 10:06	WG1176280
Naphthalene	U		0.00500	0.0250	5	10/05/2018 10:06	WG1176280
n-Propylbenzene	U		0.00174	0.00500	5	10/05/2018 10:06	WG1176280
Styrene	U		0.00154	0.00500	5	10/05/2018 10:06	WG1176280
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 10:06	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 10:06	WG1176280
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 10:06	WG1176280
Toluene	U		0.00206	0.00500	5	10/05/2018 10:06	WG1176280
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 10:06	WG1176280
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 10:06	WG1176280
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 10:06	WG1176280
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 10:06	WG1176280
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 10:06	WG1176280
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 10:06	WG1176280
o-Xylene	U		0.00170	0.00500	5	10/05/2018 10:06	WG1176280
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 10:06	WG1176280
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 10:06	WG1176280
(S) Toluene-d8	*111*			*80.0-120*		*10/05/2018 10:06*	WG1176280
(S) Dibromofluoromethane	*91.5*			*75.0-120*		*10/05/2018 10:06*	WG1176280
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/05/2018 10:06*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.29		0.0247	0.100	1	10/09/2018 02:32	WG1177386
(S) o-Terphenyl	*84.2*			*31.0-160*		*10/09/2018 02:32*	WG1177386

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	9500		56.4	200	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 14:50	WG1178384

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	10/08/2018 14:40	WG1176533

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	2750		5.19	100	100	10/09/2018 06:03	WG1176341
Fluoride	1.73		0.00990	0.100	1	10/09/2018 05:46	WG1176341
Sulfate	4160		7.74	500	100	10/09/2018 06:03	WG1176341

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	0.000139	J	0.0000490	0.000200	1	10/07/2018 07:38	WG1176292

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.853		0.0126	0.200	1	10/07/2018 15:18	WG1176325

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.101		0.000250	0.00200	1	10/10/2018 22:47	WG1176329
Barium	0.0358		0.00180	0.0250	5	10/11/2018 10:38	WG1176329
Cadmium	U		0.000800	0.00500	5	10/11/2018 10:38	WG1176329
Calcium	664		0.0460	1.00	1	10/10/2018 22:47	WG1176329
Chromium	0.00233		0.000540	0.00200	1	10/10/2018 22:47	WG1176329
Cobalt	0.00489		0.000260	0.00200	1	10/10/2018 22:47	WG1176329
Iron	11.2		0.0150	0.100	1	10/10/2018 22:47	WG1176329
Lead	0.00152	B J	0.00120	0.0100	5	10/11/2018 10:38	WG1176329
Manganese	3.52		0.000250	0.00500	1	10/10/2018 22:47	WG1176329
Nickel	0.0279		0.000350	0.00200	1	10/10/2018 22:47	WG1176329
Potassium	9.02		0.0370	1.00	1	10/10/2018 22:47	WG1176329
Selenium	0.00141	J	0.000380	0.00200	1	10/10/2018 22:47	WG1176329
Sodium	2260		0.550	5.00	5	10/11/2018 10:38	WG1176329
Uranium	U		0.00165	0.0500	5	10/11/2018 10:38	WG1176329
Vanadium	0.00359	J	0.000180	0.00500	1	10/10/2018 22:47	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.39		0.0314	0.100	1	10/07/2018 13:18	WG1177198

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*99.1*			*78.0-120*		*10/07/2018 13:18*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/11/2018 02:31	WG1179146
Benzene	U		0.000331	0.00100	1	10/11/2018 02:31	WG1179146
Bromodichloromethane	U		0.000380	0.00100	1	10/11/2018 02:31	WG1179146
Bromoform	U		0.000469	0.00100	1	10/11/2018 02:31	WG1179146
Bromomethane	U		0.000866	0.00500	1	10/11/2018 02:31	WG1179146
n-Butylbenzene	U		0.000361	0.00100	1	10/11/2018 02:31	WG1179146
sec-Butylbenzene	U		0.000365	0.00100	1	10/11/2018 02:31	WG1179146
Carbon disulfide	U		0.000275	0.00100	1	10/11/2018 02:31	WG1179146
Carbon tetrachloride	U		0.000379	0.00100	1	10/11/2018 02:31	WG1179146
Chlorobenzene	U		0.000348	0.00100	1	10/11/2018 02:31	WG1179146
Chlorodibromomethane	U		0.000327	0.00100	1	10/11/2018 02:31	WG1179146
Chloroethane	U		0.000453	0.00500	1	10/11/2018 02:31	WG1179146
Chloroform	U		0.000324	0.00500	1	10/11/2018 02:31	WG1179146
Chloromethane	U		0.000276	0.00250	1	10/11/2018 02:31	WG1179146
1,2-Dibromoethane	U		0.000381	0.00100	1	10/11/2018 02:31	WG1179146
1,1-Dichloroethane	U		0.000259	0.00100	1	10/11/2018 02:31	WG1179146
1,2-Dichloroethane	U		0.000361	0.00100	1	10/11/2018 02:31	WG1179146
1,1-Dichloroethene	U		0.000398	0.00100	1	10/11/2018 02:31	WG1179146
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/11/2018 02:31	WG1179146
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/11/2018 02:31	WG1179146
1,2-Dichloropropane	U		0.000306	0.00100	1	10/11/2018 02:31	WG1179146
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/11/2018 02:31	WG1179146
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/11/2018 02:31	WG1179146
Ethylbenzene	U		0.000384	0.00100	1	10/11/2018 02:31	WG1179146
Isopropylbenzene	U		0.000326	0.00100	1	10/11/2018 02:31	WG1179146
p-Isopropyltoluene	U		0.000350	0.00100	1	10/11/2018 02:31	WG1179146
2-Butanone (MEK)	U		0.00393	0.0100	1	10/11/2018 02:31	WG1179146
2-Hexanone	U		0.00382	0.0100	1	10/11/2018 02:31	WG1179146
Methylene Chloride	U		0.00100	0.00500	1	10/11/2018 02:31	WG1179146
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/11/2018 02:31	WG1179146
Methyl tert-butyl ether	0.00463		0.000367	0.00100	1	10/11/2018 02:31	WG1179146
Naphthalene	U		0.00100	0.00500	1	10/11/2018 02:31	WG1179146
n-Propylbenzene	U		0.000349	0.00100	1	10/11/2018 02:31	WG1179146
Styrene	U		0.000307	0.00100	1	10/11/2018 02:31	WG1179146
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/11/2018 02:31	WG1179146
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/11/2018 02:31	WG1179146
Tetrachloroethene	U		0.000372	0.00100	1	10/11/2018 02:31	WG1179146
Toluene	U		0.000412	0.00100	1	10/11/2018 02:31	WG1179146
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/11/2018 02:31	WG1179146
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/11/2018 02:31	WG1179146
Trichloroethene	U		0.000398	0.00100	1	10/11/2018 02:31	WG1179146
1,2,4-Trimethylbenzene	0.00124		0.000373	0.00100	1	10/11/2018 02:31	WG1179146
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/11/2018 02:31	WG1179146
Vinyl chloride	U		0.000259	0.00100	1	10/11/2018 02:31	WG1179146
o-Xylene	U		0.000341	0.00100	1	10/11/2018 02:31	WG1179146
m&p-Xylene	U		0.000719	0.00200	1	10/11/2018 02:31	WG1179146
Xylenes, Total	U		0.00106	0.00300	1	10/11/2018 02:31	WG1179146
(S) Toluene-d8	*103*			*80.0-120*		*10/11/2018 02:31*	WG1179146
(S) Dibromofluoromethane	*94.2*			*75.0-120*		*10/11/2018 02:31*	WG1179146
(S) 4-Bromofluorobenzene	*98.9*			*77.0-126*		*10/11/2018 02:31*	WG1179146

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.95		0.0247	0.100	1	10/09/2018 10:17	WG1177735
(S) o-Terphenyl	*98.9*			*31.0-160*		*10/09/2018 10:17*	WG1177735

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4720		28.2	100	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.206		0.0197	0.100	1	10/10/2018 14:58	WG1178384

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1610		5.19	100	100	10/09/2018 06:37	WG1176341
Fluoride	2.61		0.00990	0.100	1	10/09/2018 06:20	WG1176341
Sulfate	2760		7.74	500	100	10/09/2018 06:37	WG1176341

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00423		0.000250	0.00200	1	10/10/2018 23:27	WG1176329
Barium	0.0198	J	0.00180	0.0250	5	10/11/2018 10:42	WG1176329
Calcium	514		0.0460	1.00	1	10/10/2018 23:27	WG1176329
Chromium	0.00104	J	0.000540	0.00200	1	10/10/2018 23:27	WG1176329
Iron	0.679		0.0150	0.100	1	10/10/2018 23:27	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 10:42	WG1176329
Manganese	1.47		0.000250	0.00500	1	10/10/2018 23:27	WG1176329
Potassium	3.64		0.0370	1.00	1	10/10/2018 23:27	WG1176329
Selenium	0.000628	J	0.000380	0.00200	1	10/10/2018 23:27	WG1176329
Sodium	1310		0.550	5.00	5	10/11/2018 10:42	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 13:41	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.5*			*78.0-120*		*10/07/2018 13:41*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 10:46	WG1176280
Benzene	U		0.000331	0.00100	1	10/05/2018 10:46	WG1176280
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 10:46	WG1176280
Bromoform	U		0.000469	0.00100	1	10/05/2018 10:46	WG1176280
Bromomethane	U		0.000866	0.00500	1	10/05/2018 10:46	WG1176280
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 10:46	WG1176280
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 10:46	WG1176280
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 10:46	WG1176280
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 10:46	WG1176280
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 10:46	WG1176280
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 10:46	WG1176280
Chloroethane	U		0.000453	0.00500	1	10/05/2018 10:46	WG1176280
Chloroform	U		0.000324	0.00500	1	10/05/2018 10:46	WG1176280
Chloromethane	U		0.000276	0.00250	1	10/05/2018 10:46	WG1176280
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 10:46	WG1176280
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 10:46	WG1176280

OCD-1R

Collected date/time: 10/02/18 14:35

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 10:46	WG1176280
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 10:46	WG1176280
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 10:46	WG1176280
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 10:46	WG1176280
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 10:46	WG1176280
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 10:46	WG1176280
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 10:46	WG1176280
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 10:46	WG1176280
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 10:46	WG1176280
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 10:46	WG1176280
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 10:46	WG1176280
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 10:46	WG1176280
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 10:46	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 10:46	WG1176280
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 10:46	WG1176280
Naphthalene	U		0.00100	0.00500	1	10/05/2018 10:46	WG1176280
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 10:46	WG1176280
Styrene	U		0.000307	0.00100	1	10/05/2018 10:46	WG1176280
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 10:46	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 10:46	WG1176280
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 10:46	WG1176280
Toluene	U		0.000412	0.00100	1	10/05/2018 10:46	WG1176280
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 10:46	WG1176280
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 10:46	WG1176280
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 10:46	WG1176280
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 10:46	WG1176280
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 10:46	WG1176280
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 10:46	WG1176280
o-Xylene	U		0.000341	0.00100	1	10/05/2018 10:46	WG1176280
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 10:46	WG1176280
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 10:46	WG1176280
(S) Toluene-d8	*111*			*80.0-120*		*10/05/2018 10:46*	WG1176280
(S) Dibromofluoromethane	*93.7*			*75.0-120*		*10/05/2018 10:46*	WG1176280
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/05/2018 10:46*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.141		0.0247	0.100	1	10/09/2018 10:38	WG1177735
(S) o-Terphenyl	*62.6*			*31.0-160*		*10/09/2018 10:38*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00227		0.000250	0.00200	1	10/10/2018 23:32	WG1176329
Barium	0.0266		0.000360	0.00500	1	10/11/2018 10:47	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 23:32	WG1176329
Iron	1.60		0.0150	0.100	1	10/10/2018 23:32	WG1176329
Lead	0.000247	B J	0.000240	0.00200	1	10/11/2018 10:47	WG1176329
Manganese	0.688		0.000250	0.00500	1	10/10/2018 23:32	WG1176329
Selenium	U		0.000380	0.00200	1	10/10/2018 23:32	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 14:04	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.1*			*78.0-120*		*10/07/2018 14:04*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 11:07	WG1176280
Benzene	U		0.000331	0.00100	1	10/05/2018 11:07	WG1176280
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 11:07	WG1176280
Bromoform	U		0.000469	0.00100	1	10/05/2018 11:07	WG1176280
Bromomethane	U		0.000866	0.00500	1	10/05/2018 11:07	WG1176280
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 11:07	WG1176280
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 11:07	WG1176280
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 11:07	WG1176280
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 11:07	WG1176280
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 11:07	WG1176280
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 11:07	WG1176280
Chloroethane	U		0.000453	0.00500	1	10/05/2018 11:07	WG1176280
Chloroform	U		0.000324	0.00500	1	10/05/2018 11:07	WG1176280
Chloromethane	U		0.000276	0.00250	1	10/05/2018 11:07	WG1176280
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 11:07	WG1176280
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 11:07	WG1176280
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 11:07	WG1176280
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 11:07	WG1176280
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 11:07	WG1176280
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 11:07	WG1176280
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 11:07	WG1176280
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 11:07	WG1176280
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 11:07	WG1176280
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 11:07	WG1176280
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 11:07	WG1176280
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 11:07	WG1176280
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 11:07	WG1176280
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 11:07	WG1176280
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 11:07	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 11:07	WG1176280
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 11:07	WG1176280
Naphthalene	U		0.00100	0.00500	1	10/05/2018 11:07	WG1176280
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 11:07	WG1176280
Styrene	U		0.000307	0.00100	1	10/05/2018 11:07	WG1176280
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 11:07	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 11:07	WG1176280
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 11:07	WG1176280

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	10/05/2018 11:07	WG1176280
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 11:07	WG1176280
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 11:07	WG1176280
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 11:07	WG1176280
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 11:07	WG1176280
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 11:07	WG1176280
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 11:07	WG1176280
o-Xylene	U		0.000341	0.00100	1	10/05/2018 11:07	WG1176280
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 11:07	WG1176280
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 11:07	WG1176280
(S) Toluene-d8	*110*			*80.0-120*		*10/05/2018 11:07*	WG1176280
(S) Dibromofluoromethane	*94.0*			*75.0-120*		*10/05/2018 11:07*	WG1176280
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/05/2018 11:07*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0442	J	0.0247	0.100	1	10/09/2018 10:58	WG1177735
(S) o-Terphenyl	*57.4*			*31.0-160*		*10/09/2018 10:58*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00175	J	0.000250	0.00200	1	10/10/2018 23:36	WG1176329
Barium	0.0184		0.000360	0.00500	1	10/11/2018 11:07	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 23:36	WG1176329
Iron	1.36		0.0150	0.100	1	10/10/2018 23:36	WG1176329
Lead	0.000312	B J	0.000240	0.00200	1	10/11/2018 11:07	WG1176329
Manganese	0.248		0.000250	0.00500	1	10/10/2018 23:36	WG1176329
Selenium	U		0.000380	0.00200	1	10/10/2018 23:36	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 14:27	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.1*			*78.0-120*		*10/07/2018 14:27*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 11:27	WG1176280
Benzene	U		0.000331	0.00100	1	10/05/2018 11:27	WG1176280
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 11:27	WG1176280
Bromoform	U		0.000469	0.00100	1	10/05/2018 11:27	WG1176280
Bromomethane	U		0.000866	0.00500	1	10/05/2018 11:27	WG1176280
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 11:27	WG1176280
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 11:27	WG1176280
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 11:27	WG1176280
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 11:27	WG1176280
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 11:27	WG1176280
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 11:27	WG1176280
Chloroethane	U		0.000453	0.00500	1	10/05/2018 11:27	WG1176280
Chloroform	U		0.000324	0.00500	1	10/05/2018 11:27	WG1176280
Chloromethane	U		0.000276	0.00250	1	10/05/2018 11:27	WG1176280
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 11:27	WG1176280
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 11:27	WG1176280
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 11:27	WG1176280
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 11:27	WG1176280
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 11:27	WG1176280
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 11:27	WG1176280
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 11:27	WG1176280
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 11:27	WG1176280
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 11:27	WG1176280
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 11:27	WG1176280
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 11:27	WG1176280
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 11:27	WG1176280
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 11:27	WG1176280
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 11:27	WG1176280
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 11:27	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 11:27	WG1176280
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 11:27	WG1176280
Naphthalene	U		0.00100	0.00500	1	10/05/2018 11:27	WG1176280
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 11:27	WG1176280
Styrene	U		0.000307	0.00100	1	10/05/2018 11:27	WG1176280
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 11:27	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 11:27	WG1176280
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 11:27	WG1176280

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	10/05/2018 11:27	WG1176280
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 11:27	WG1176280
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 11:27	WG1176280
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 11:27	WG1176280
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 11:27	WG1176280
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 11:27	WG1176280
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 11:27	WG1176280
o-Xylene	U		0.000341	0.00100	1	10/05/2018 11:27	WG1176280
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 11:27	WG1176280
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 11:27	WG1176280
(S) Toluene-d8	*111*			*80.0-120*		*10/05/2018 11:27*	WG1176280
(S) Dibromofluoromethane	*93.7*			*75.0-120*		*10/05/2018 11:27*	WG1176280
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/05/2018 11:27*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0262	J	0.0247	0.100	1	10/09/2018 11:18	WG1177735
(S) o-Terphenyl	*55.3*			*31.0-160*		*10/09/2018 11:18*	WG1177735

OCD-4

Collected date/time: 10/02/18 16:40

SAMPLE RESULTS - 15

L1031730

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00318		0.000250	0.00200	1	10/10/2018 23:41	WG1176329
Barium	0.0278		0.000360	0.00500	1	10/11/2018 11:11	WG1176329
Chromium	0.00118	J	0.000540	0.00200	1	10/10/2018 23:41	WG1176329
Iron	2.31		0.0150	0.100	1	10/10/2018 23:41	WG1176329
Lead	0.000457	B J	0.000240	0.00200	1	10/11/2018 11:11	WG1176329
Manganese	0.323		0.000250	0.00500	1	10/10/2018 23:41	WG1176329
Selenium	U		0.000380	0.00200	1	10/10/2018 23:41	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 14:50	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.3*			*78.0-120*		*10/07/2018 14:50*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 11:48	WG1176280
Benzene	U		0.000331	0.00100	1	10/05/2018 11:48	WG1176280
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 11:48	WG1176280
Bromoform	U		0.000469	0.00100	1	10/05/2018 11:48	WG1176280
Bromomethane	U		0.000866	0.00500	1	10/05/2018 11:48	WG1176280
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 11:48	WG1176280
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 11:48	WG1176280
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 11:48	WG1176280
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 11:48	WG1176280
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 11:48	WG1176280
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 11:48	WG1176280
Chloroethane	U		0.000453	0.00500	1	10/05/2018 11:48	WG1176280
Chloroform	U		0.000324	0.00500	1	10/05/2018 11:48	WG1176280
Chloromethane	U		0.000276	0.00250	1	10/05/2018 11:48	WG1176280
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 11:48	WG1176280
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 11:48	WG1176280
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 11:48	WG1176280
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 11:48	WG1176280
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 11:48	WG1176280
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 11:48	WG1176280
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 11:48	WG1176280
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 11:48	WG1176280
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 11:48	WG1176280
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 11:48	WG1176280
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 11:48	WG1176280
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 11:48	WG1176280
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 11:48	WG1176280
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 11:48	WG1176280
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 11:48	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 11:48	WG1176280
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 11:48	WG1176280
Naphthalene	U		0.00100	0.00500	1	10/05/2018 11:48	WG1176280
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 11:48	WG1176280
Styrene	U		0.000307	0.00100	1	10/05/2018 11:48	WG1176280
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 11:48	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 11:48	WG1176280
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 11:48	WG1176280

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Toluene	U		0.000412	0.00100	1	10/05/2018 11:48	WG1176280
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 11:48	WG1176280
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 11:48	WG1176280
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 11:48	WG1176280
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 11:48	WG1176280
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 11:48	WG1176280
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 11:48	WG1176280
o-Xylene	U		0.000341	0.00100	1	10/05/2018 11:48	WG1176280
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 11:48	WG1176280
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 11:48	WG1176280
(S) Toluene-d8	*112*			*80.0-120*		*10/05/2018 11:48*	WG1176280
(S) Dibromofluoromethane	*95.9*			*75.0-120*		*10/05/2018 11:48*	WG1176280
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 11:48*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	10/09/2018 11:38	WG1177735
(S) o-Terphenyl	*53.7*			*31.0-160*		*10/09/2018 11:38*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	17400		113	400	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 14:59	WG1178384

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	11000		26.0	500	500	10/09/2018 07:27	WG1176341
Fluoride	3.15	J	0.495	5.00	50	10/09/2018 17:37	WG1176341
Sulfate	3140		3.87	250	50	10/09/2018 17:37	WG1176341

Sample Narrative:

L1031730-16 WG1176341: F report @ 50x due to matrix interference.

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Calcium	1110		0.460	10.0	10	10/11/2018 12:26	WG1176329
Potassium	20.7		0.0370	1.00	1	10/10/2018 23:45	WG1176329
Sodium	4520		1.10	10.0	10	10/11/2018 12:26	WG1176329

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	11200		56.4	200	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 15:01	WG1178384

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	5130		5.19	100	100	10/09/2018 08:01	WG1176341
Fluoride	0.324		0.00990	0.100	1	10/09/2018 07:44	WG1176341
Sulfate	3570		7.74	500	100	10/09/2018 08:01	WG1176341

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00753		0.000250	0.00200	1	10/10/2018 23:50	WG1176329
Barium	0.0255		0.00180	0.0250	5	10/11/2018 11:43	WG1176329
Calcium	834		0.0460	1.00	1	10/10/2018 23:50	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 23:50	WG1176329
Iron	6.56		0.0150	0.100	1	10/10/2018 23:50	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 11:43	WG1176329
Manganese	0.262		0.000250	0.00500	1	10/10/2018 23:50	WG1176329
Potassium	36.0		0.0370	1.00	1	10/10/2018 23:50	WG1176329
Selenium	0.000417	J	0.000380	0.00200	1	10/10/2018 23:50	WG1176329
Sodium	2690		0.550	5.00	5	10/11/2018 11:43	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.312		0.0314	0.100	1	10/07/2018 15:51	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.6*			*78.0-120*		*10/07/2018 15:51*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 12:08	WG1176280
Benzene	U		0.000331	0.00100	1	10/05/2018 12:08	WG1176280
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 12:08	WG1176280
Bromoform	U		0.000469	0.00100	1	10/05/2018 12:08	WG1176280
Bromomethane	U		0.000866	0.00500	1	10/05/2018 12:08	WG1176280
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 12:08	WG1176280
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 12:08	WG1176280
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 12:08	WG1176280
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 12:08	WG1176280
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 12:08	WG1176280
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 12:08	WG1176280
Chloroethane	U		0.000453	0.00500	1	10/05/2018 12:08	WG1176280
Chloroform	U		0.000324	0.00500	1	10/05/2018 12:08	WG1176280
Chloromethane	U		0.000276	0.00250	1	10/05/2018 12:08	WG1176280
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 12:08	WG1176280
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 12:08	WG1176280

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 12:08	WG1176280
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 12:08	WG1176280
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 12:08	WG1176280
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 12:08	WG1176280
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 12:08	WG1176280
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 12:08	WG1176280
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 12:08	WG1176280
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 12:08	WG1176280
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 12:08	WG1176280
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 12:08	WG1176280
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 12:08	WG1176280
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 12:08	WG1176280
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 12:08	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 12:08	WG1176280
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 12:08	WG1176280
Naphthalene	U		0.00100	0.00500	1	10/05/2018 12:08	WG1176280
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 12:08	WG1176280
Styrene	U		0.000307	0.00100	1	10/05/2018 12:08	WG1176280
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 12:08	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 12:08	WG1176280
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 12:08	WG1176280
Toluene	U		0.000412	0.00100	1	10/05/2018 12:08	WG1176280
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 12:08	WG1176280
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 12:08	WG1176280
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 12:08	WG1176280
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 12:08	WG1176280
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 12:08	WG1176280
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 12:08	WG1176280
o-Xylene	U		0.000341	0.00100	1	10/05/2018 12:08	WG1176280
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 12:08	WG1176280
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 12:08	WG1176280
(S) Toluene-d8	*109*			*80.0-120*		*10/05/2018 12:08*	WG1176280
(S) Dibromofluoromethane	*93.3*			*75.0-120*		*10/05/2018 12:08*	WG1176280
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 12:08*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.259		0.0291	0.118	1.18	10/09/2018 11:58	WG1177735
(S) o-Terphenyl	*62.6*			*31.0-160*		*10/09/2018 11:58*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00723		0.000250	0.00200	1	10/10/2018 23:55	WG1176329
Barium	0.0168	J	0.00180	0.0250	5	10/11/2018 11:47	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 23:55	WG1176329
Iron	1.27		0.0150	0.100	1	10/10/2018 23:55	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 11:47	WG1176329
Manganese	1.18		0.000250	0.00500	1	10/10/2018 23:55	WG1176329
Selenium	U		0.000380	0.00200	1	10/10/2018 23:55	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.0326	J	0.0314	0.100	1	10/07/2018 16:14	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.1*			*78.0-120*		*10/07/2018 16:14*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 12:29	WG1176280
Benzene	U		0.000331	0.00100	1	10/05/2018 12:29	WG1176280
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 12:29	WG1176280
Bromoform	U		0.000469	0.00100	1	10/05/2018 12:29	WG1176280
Bromomethane	U		0.000866	0.00500	1	10/05/2018 12:29	WG1176280
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 12:29	WG1176280
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 12:29	WG1176280
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 12:29	WG1176280
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 12:29	WG1176280
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 12:29	WG1176280
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 12:29	WG1176280
Chloroethane	U		0.000453	0.00500	1	10/05/2018 12:29	WG1176280
Chloroform	U		0.000324	0.00500	1	10/05/2018 12:29	WG1176280
Chloromethane	U		0.000276	0.00250	1	10/05/2018 12:29	WG1176280
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 12:29	WG1176280
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 12:29	WG1176280
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 12:29	WG1176280
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 12:29	WG1176280
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 12:29	WG1176280
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 12:29	WG1176280
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 12:29	WG1176280
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 12:29	WG1176280
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 12:29	WG1176280
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 12:29	WG1176280
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 12:29	WG1176280
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 12:29	WG1176280
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 12:29	WG1176280
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 12:29	WG1176280
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 12:29	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 12:29	WG1176280
Methyl tert-butyl ether	0.000736	J	0.000367	0.00100	1	10/05/2018 12:29	WG1176280
Naphthalene	U		0.00100	0.00500	1	10/05/2018 12:29	WG1176280
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 12:29	WG1176280
Styrene	U		0.000307	0.00100	1	10/05/2018 12:29	WG1176280
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 12:29	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 12:29	WG1176280
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 12:29	WG1176280

MW-87

Collected date/time: 10/02/18 09:10

SAMPLE RESULTS - 18

L1031730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	10/05/2018 12:29	WG1176280
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 12:29	WG1176280
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 12:29	WG1176280
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 12:29	WG1176280
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 12:29	WG1176280
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 12:29	WG1176280
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 12:29	WG1176280
o-Xylene	U		0.000341	0.00100	1	10/05/2018 12:29	WG1176280
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 12:29	WG1176280
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 12:29	WG1176280
(S) Toluene-d8	*110*			*80.0-120*		*10/05/2018 12:29*	WG1176280
(S) Dibromofluoromethane	*93.9*			*75.0-120*		*10/05/2018 12:29*	WG1176280
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 12:29*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.222		0.0247	0.100	1	10/09/2018 12:19	WG1177735
(S) o-Terphenyl	*64.7*			*31.0-160*		*10/09/2018 12:19*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	17900		113	400	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 15:02	WG1178384

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	0.00485	J	0.00180	0.00500	1	10/08/2018 14:42	WG1176533

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	6810		5.19	100	100	10/09/2018 08:35	WG1176341
Fluoride	1.25		0.00990	0.100	1	10/09/2018 08:18	WG1176341
Sulfate	7270		7.74	500	100	10/09/2018 08:35	WG1176341

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.000145	J	0.0000490	0.000200	1	10/07/2018 07:40	WG1176292

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	2.34		0.0126	0.200	1	10/07/2018 15:21	WG1176325

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00475		0.000250	0.00200	1	10/10/2018 23:59	WG1176329
Barium	0.0160	J	0.00180	0.0250	5	10/11/2018 11:34	WG1176329
Cadmium	U		0.000800	0.00500	5	10/11/2018 11:34	WG1176329
Calcium	674		0.0460	1.00	1	10/10/2018 23:59	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 23:59	WG1176329
Cobalt	0.000525	J	0.000260	0.00200	1	10/10/2018 23:59	WG1176329
Iron	0.436		0.0150	0.100	1	10/10/2018 23:59	WG1176329
Lead	U		0.00120	0.0100	5	10/11/2018 11:34	WG1176329
Manganese	1.73		0.000250	0.00500	1	10/10/2018 23:59	WG1176329
Nickel	0.00828		0.000350	0.00200	1	10/10/2018 23:59	WG1176329
Potassium	42.6		0.0370	1.00	1	10/10/2018 23:59	WG1176329
Selenium	U		0.000380	0.00200	1	10/10/2018 23:59	WG1176329
Sodium	3820		0.550	5.00	5	10/11/2018 11:34	WG1176329
Uranium	0.0243	J	0.00165	0.0500	5	10/11/2018 11:34	WG1176329
Vanadium	0.000400	J	0.000180	0.00500	1	10/10/2018 23:59	WG1176329

MW-18A
Collected date/time: 10/02/18 10:00

SAMPLE RESULTS - 19

L1031730

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 12:49	WG1176280
Benzene	U		0.000331	0.00100	1	10/05/2018 12:49	WG1176280
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 12:49	WG1176280
Bromoform	U		0.000469	0.00100	1	10/05/2018 12:49	WG1176280
Bromomethane	U		0.000866	0.00500	1	10/05/2018 12:49	WG1176280
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 12:49	WG1176280
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 12:49	WG1176280
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 12:49	WG1176280
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 12:49	WG1176280
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 12:49	WG1176280
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 12:49	WG1176280
Chloroethane	U		0.000453	0.00500	1	10/05/2018 12:49	WG1176280
Chloroform	U		0.000324	0.00500	1	10/05/2018 12:49	WG1176280
Chloromethane	U		0.000276	0.00250	1	10/05/2018 12:49	WG1176280
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 12:49	WG1176280
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 12:49	WG1176280
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 12:49	WG1176280
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 12:49	WG1176280
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 12:49	WG1176280
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 12:49	WG1176280
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 12:49	WG1176280
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 12:49	WG1176280
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 12:49	WG1176280
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 12:49	WG1176280
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 12:49	WG1176280
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 12:49	WG1176280
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 12:49	WG1176280
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 12:49	WG1176280
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 12:49	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 12:49	WG1176280
Methyl tert-butyl ether	0.000566	J	0.000367	0.00100	1	10/05/2018 12:49	WG1176280
Naphthalene	U		0.00100	0.00500	1	10/05/2018 12:49	WG1176280
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 12:49	WG1176280
Styrene	U		0.000307	0.00100	1	10/05/2018 12:49	WG1176280
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 12:49	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 12:49	WG1176280
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 12:49	WG1176280
Toluene	U		0.000412	0.00100	1	10/05/2018 12:49	WG1176280
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 12:49	WG1176280
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 12:49	WG1176280
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 12:49	WG1176280
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 12:49	WG1176280
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 12:49	WG1176280
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 12:49	WG1176280
o-Xylene	U		0.000341	0.00100	1	10/05/2018 12:49	WG1176280
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 12:49	WG1176280
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 12:49	WG1176280
(S) Toluene-d8	*110*			*80.0-120*		*10/05/2018 12:49*	WG1176280
(S) Dibromofluoromethane	*94.4*			*75.0-120*		*10/05/2018 12:49*	WG1176280
(S) 4-Bromofluorobenzene	*107*			*77.0-126*		*10/05/2018 12:49*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.329		0.0247	0.100	1	10/09/2018 12:39	WG1177735
(S) o-Terphenyl	*66.8*			*31.0-160*		*10/09/2018 12:39*	WG1177735

MW-70
Collected date/time: 10/02/18 10:45

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0186		0.000250	0.00200	1	10/10/2018 21:15	WG1176329
Barium	0.0161		0.000360	0.00500	1	10/11/2018 09:18	WG1176329
Chromium	U		0.000540	0.00200	1	10/10/2018 21:15	WG1176329
Iron	4.49		0.0150	0.100	1	10/10/2018 21:15	WG1176329
Lead	0.000490	B J	0.000240	0.00200	1	10/11/2018 09:18	WG1176329
Manganese	0.270		0.000250	0.00500	1	10/10/2018 21:15	WG1176329
Selenium	U		0.000380	0.00200	1	10/10/2018 21:15	WG1176329

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	2.34		0.0314	0.100	1	10/07/2018 16:37	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.4*			*78.0-120*		*10/07/2018 16:37*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 13:10	WG1176280
Benzene	U		0.000331	0.00100	1	10/05/2018 13:10	WG1176280
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 13:10	WG1176280
Bromoform	U		0.000469	0.00100	1	10/05/2018 13:10	WG1176280
Bromomethane	U		0.000866	0.00500	1	10/05/2018 13:10	WG1176280
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 13:10	WG1176280
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 13:10	WG1176280
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 13:10	WG1176280
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 13:10	WG1176280
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 13:10	WG1176280
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 13:10	WG1176280
Chloroethane	U		0.000453	0.00500	1	10/05/2018 13:10	WG1176280
Chloroform	U		0.000324	0.00500	1	10/05/2018 13:10	WG1176280
Chloromethane	U		0.000276	0.00250	1	10/05/2018 13:10	WG1176280
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 13:10	WG1176280
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 13:10	WG1176280
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 13:10	WG1176280
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 13:10	WG1176280
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 13:10	WG1176280
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 13:10	WG1176280
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 13:10	WG1176280
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 13:10	WG1176280
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 13:10	WG1176280
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 13:10	WG1176280
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 13:10	WG1176280
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 13:10	WG1176280
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 13:10	WG1176280
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 13:10	WG1176280
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 13:10	WG1176280
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 13:10	WG1176280
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 13:10	WG1176280
Naphthalene	U		0.00100	0.00500	1	10/05/2018 13:10	WG1176280
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 13:10	WG1176280
Styrene	U		0.000307	0.00100	1	10/05/2018 13:10	WG1176280
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 13:10	WG1176280
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 13:10	WG1176280
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 13:10	WG1176280

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Toluene	U		0.000412	0.00100	1	10/05/2018 13:10	WG1176280
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 13:10	WG1176280
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 13:10	WG1176280
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 13:10	WG1176280
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 13:10	WG1176280
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 13:10	WG1176280
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 13:10	WG1176280
o-Xylene	U		0.000341	0.00100	1	10/05/2018 13:10	WG1176280
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 13:10	WG1176280
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 13:10	WG1176280
(S) Toluene-d8	*109*			*80.0-120*		*10/05/2018 13:10*	WG1176280
(S) Dibromofluoromethane	*94.3*			*75.0-120*		*10/05/2018 13:10*	WG1176280
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 13:10*	WG1176280

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.666		0.0247	0.100	1	10/09/2018 12:59	WG1177735
(S) o-Terphenyl	*71.6*			*31.0-160*		*10/09/2018 12:59*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	9520		56.4	200	1	10/09/2018 17:26	WG1177076

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 15:04	WG1178384

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	3700		5.19	100	100	10/09/2018 09:09	WG1176341
Fluoride	0.848		0.00990	0.100	1	10/09/2018 08:52	WG1176341
Sulfate	4440		7.74	500	100	10/09/2018 09:09	WG1176341

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00214		0.000250	0.00200	1	10/09/2018 18:19	WG1176332
Barium	0.0216	O1	0.000360	0.00500	1	10/09/2018 18:19	WG1176332
Calcium	798	V	0.0460	1.00	1	10/09/2018 18:19	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 18:19	WG1176332
Iron	4.05		0.0150	0.100	1	10/09/2018 18:19	WG1176332
Lead	0.000355	B J	0.000240	0.00200	1	10/09/2018 18:19	WG1176332
Manganese	0.527		0.000250	0.00500	1	10/09/2018 18:19	WG1176332
Potassium	7.16		0.0370	1.00	1	10/09/2018 18:19	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 18:19	WG1176332
Sodium	1730		0.550	5.00	5	10/09/2018 21:58	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 17:00	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.0*			*78.0-120*		*10/07/2018 17:00*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 11:15	WG1176277
Benzene	U		0.000331	0.00100	1	10/05/2018 11:15	WG1176277
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 11:15	WG1176277
Bromoform	U		0.000469	0.00100	1	10/05/2018 11:15	WG1176277
Bromomethane	U		0.000866	0.00500	1	10/05/2018 11:15	WG1176277
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 11:15	WG1176277
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 11:15	WG1176277
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 11:15	WG1176277
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 11:15	WG1176277
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 11:15	WG1176277
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 11:15	WG1176277
Chloroethane	U		0.000453	0.00500	1	10/05/2018 11:15	WG1176277
Chloroform	U		0.000324	0.00500	1	10/05/2018 11:15	WG1176277
Chloromethane	U		0.000276	0.00250	1	10/05/2018 11:15	WG1176277
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 11:15	WG1176277
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 11:15	WG1176277

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 11:15	WG1176277
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 11:15	WG1176277
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 11:15	WG1176277
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 11:15	WG1176277
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 11:15	WG1176277
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 11:15	WG1176277
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 11:15	WG1176277
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 11:15	WG1176277
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 11:15	WG1176277
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 11:15	WG1176277
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 11:15	WG1176277
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 11:15	WG1176277
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 11:15	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 11:15	WG1176277
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 11:15	WG1176277
Naphthalene	U		0.00100	0.00500	1	10/05/2018 11:15	WG1176277
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 11:15	WG1176277
Styrene	U		0.000307	0.00100	1	10/05/2018 11:15	WG1176277
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 11:15	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 11:15	WG1176277
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 11:15	WG1176277
Toluene	U		0.000412	0.00100	1	10/05/2018 11:15	WG1176277
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 11:15	WG1176277
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 11:15	WG1176277
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 11:15	WG1176277
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 11:15	WG1176277
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 11:15	WG1176277
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 11:15	WG1176277
o-Xylene	U		0.000341	0.00100	1	10/05/2018 11:15	WG1176277
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 11:15	WG1176277
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 11:15	WG1176277
(S) Toluene-d8	*99.8*			*80.0-120*		*10/05/2018 11:15*	WG1176277
(S) Dibromofluoromethane	*95.4*			*75.0-120*		*10/05/2018 11:15*	WG1176277
(S) 4-Bromofluorobenzene	*95.8*			*77.0-126*		*10/05/2018 11:15*	WG1176277

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	10/09/2018 13:19	WG1177735
(S) o-Terphenyl	*55.8*			*31.0-160*		*10/09/2018 13:19*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	6530	Q	28.2	100	1	10/16/2018 20:13	WG1181495

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 15:05	WG1178384

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	2000		5.19	100	100	10/09/2018 09:43	WG1176341
Fluoride	1.10		0.00990	0.100	1	10/09/2018 09:26	WG1176341
Sulfate	2770		7.74	500	100	10/09/2018 09:43	WG1176341

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0316		0.000250	0.00200	1	10/09/2018 18:38	WG1176332
Barium	0.0179		0.000360	0.00500	1	10/09/2018 18:38	WG1176332
Calcium	348		0.0460	1.00	1	10/09/2018 18:38	WG1176332
Chromium	0.000814	J	0.000540	0.00200	1	10/09/2018 18:38	WG1176332
Iron	4.52		0.0150	0.100	1	10/09/2018 18:38	WG1176332
Lead	0.000623	B J	0.000240	0.00200	1	10/09/2018 18:38	WG1176332
Manganese	0.480		0.000250	0.00500	1	10/09/2018 18:38	WG1176332
Potassium	4.24		0.0370	1.00	1	10/09/2018 18:38	WG1176332
Selenium	0.000485	J	0.000380	0.00200	1	10/09/2018 18:38	WG1176332
Sodium	1550		0.550	5.00	5	10/09/2018 22:02	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.649		0.0314	0.100	1	10/07/2018 17:23	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*98.7*			*78.0-120*		*10/07/2018 17:23*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 11:35	WG1176277
Benzene	U		0.000331	0.00100	1	10/05/2018 11:35	WG1176277
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 11:35	WG1176277
Bromoform	U		0.000469	0.00100	1	10/05/2018 11:35	WG1176277
Bromomethane	U		0.000866	0.00500	1	10/05/2018 11:35	WG1176277
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 11:35	WG1176277
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 11:35	WG1176277
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 11:35	WG1176277
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 11:35	WG1176277
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 11:35	WG1176277
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 11:35	WG1176277
Chloroethane	U		0.000453	0.00500	1	10/05/2018 11:35	WG1176277
Chloroform	U		0.000324	0.00500	1	10/05/2018 11:35	WG1176277
Chloromethane	U		0.000276	0.00250	1	10/05/2018 11:35	WG1176277
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 11:35	WG1176277
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 11:35	WG1176277

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 11:35	WG1176277
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 11:35	WG1176277
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 11:35	WG1176277
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 11:35	WG1176277
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 11:35	WG1176277
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 11:35	WG1176277
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 11:35	WG1176277
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 11:35	WG1176277
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 11:35	WG1176277
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 11:35	WG1176277
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 11:35	WG1176277
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 11:35	WG1176277
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 11:35	WG1176277
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 11:35	WG1176277
Methyl tert-butyl ether	0.00148		0.000367	0.00100	1	10/05/2018 11:35	WG1176277
Naphthalene	U		0.00100	0.00500	1	10/05/2018 11:35	WG1176277
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 11:35	WG1176277
Styrene	U		0.000307	0.00100	1	10/05/2018 11:35	WG1176277
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 11:35	WG1176277
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 11:35	WG1176277
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 11:35	WG1176277
Toluene	U		0.000412	0.00100	1	10/05/2018 11:35	WG1176277
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 11:35	WG1176277
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 11:35	WG1176277
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 11:35	WG1176277
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 11:35	WG1176277
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 11:35	WG1176277
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 11:35	WG1176277
o-Xylene	U		0.000341	0.00100	1	10/05/2018 11:35	WG1176277
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 11:35	WG1176277
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 11:35	WG1176277
(S) Toluene-d8	*100*			*80.0-120*		*10/05/2018 11:35*	WG1176277
(S) Dibromofluoromethane	*93.9*			*75.0-120*		*10/05/2018 11:35*	WG1176277
(S) 4-Bromofluorobenzene	*96.1*			*77.0-126*		*10/05/2018 11:35*	WG1176277

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.13		0.0247	0.100	1	10/09/2018 13:40	WG1177735
(S) o-Terphenyl	*78.4*			*31.0-160*		*10/09/2018 13:40*	WG1177735

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5930	Q	28.2	100	1	10/16/2018 20:13	WG1181495

Wet Chemistry by Method 353.2

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 15:07	WG1178384

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Chloride	1650		5.19	100	100	10/09/2018 10:50	WG1176341
Fluoride	0.584		0.00990	0.100	1	10/09/2018 10:00	WG1176341
Sulfate	2190		7.74	500	100	10/09/2018 10:50	WG1176341

Metals (ICPMS) by Method 6020

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0496		0.000250	0.00200	1	10/09/2018 18:42	WG1176332
Barium	0.0173		0.000360	0.00500	1	10/09/2018 18:42	WG1176332
Calcium	473		0.0460	1.00	1	10/09/2018 18:42	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 18:42	WG1176332
Iron	5.73		0.0150	0.100	1	10/09/2018 18:42	WG1176332
Lead	0.000489	B J	0.000240	0.00200	1	10/09/2018 18:42	WG1176332
Manganese	6.14		0.000250	0.00500	1	10/09/2018 18:42	WG1176332
Potassium	3.81		0.0370	1.00	1	10/09/2018 18:42	WG1176332
Selenium	0.000707	J	0.000380	0.00200	1	10/09/2018 18:42	WG1176332
Sodium	1250		0.550	5.00	5	10/09/2018 22:07	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	4.46		0.0314	0.100	1	10/07/2018 17:46	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.2*			*78.0-120*		*10/07/2018 17:46*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/06/2018 15:14	WG1176770
Benzene	U		0.000331	0.00100	1	10/06/2018 15:14	WG1176770
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 15:14	WG1176770
Bromoform	U		0.000469	0.00100	1	10/06/2018 15:14	WG1176770
Bromomethane	U		0.000866	0.00500	1	10/06/2018 15:14	WG1176770
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 15:14	WG1176770
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 15:14	WG1176770
Carbon disulfide	U		0.000275	0.00100	1	10/06/2018 15:14	WG1176770
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 15:14	WG1176770
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 15:14	WG1176770
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 15:14	WG1176770
Chloroethane	U		0.000453	0.00500	1	10/06/2018 15:14	WG1176770
Chloroform	U		0.000324	0.00500	1	10/06/2018 15:14	WG1176770
Chloromethane	U		0.000276	0.00250	1	10/06/2018 15:14	WG1176770
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 15:14	WG1176770
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 15:14	WG1176770

DUP-EP-02
Collected date/time: 10/02/18 11:00

SAMPLE RESULTS - 23

L1031730

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 15:14	WG1176770
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 15:14	WG1176770
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 15:14	WG1176770
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 15:14	WG1176770
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 15:14	WG1176770
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 15:14	WG1176770
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 15:14	WG1176770
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 15:14	WG1176770
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 15:14	WG1176770
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 15:14	WG1176770
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 15:14	WG1176770
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 15:14	WG1176770
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 15:14	WG1176770
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 15:14	WG1176770
Methyl tert-butyl ether	0.00446		0.000367	0.00100	1	10/06/2018 15:14	WG1176770
Naphthalene	U		0.00100	0.00500	1	10/06/2018 15:14	WG1176770
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 15:14	WG1176770
Styrene	U		0.000307	0.00100	1	10/06/2018 15:14	WG1176770
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 15:14	WG1176770
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 15:14	WG1176770
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 15:14	WG1176770
Toluene	U		0.000412	0.00100	1	10/06/2018 15:14	WG1176770
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 15:14	WG1176770
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 15:14	WG1176770
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 15:14	WG1176770
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 15:14	WG1176770
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 15:14	WG1176770
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 15:14	WG1176770
o-Xylene	U		0.000341	0.00100	1	10/06/2018 15:14	WG1176770
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 15:14	WG1176770
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 15:14	WG1176770
(S) Toluene-d8	*107*			*80.0-120*		*10/06/2018 15:14*	WG1176770
(S) Dibromofluoromethane	*107*			*75.0-120*		*10/06/2018 15:14*	WG1176770
(S) 4-Bromofluorobenzene	*109*			*77.0-126*		*10/06/2018 15:14*	WG1176770

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	4.89		0.0247	0.100	1	10/09/2018 14:00	WG1177735
(S) o-Terphenyl	*91.6*			*31.0-160*		*10/09/2018 14:00*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4820	Q	28.2	100	1	10/16/2018 20:13	WG1181495

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.481		0.0197	0.100	1	10/10/2018 15:08	WG1178384

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1060		5.19	100	100	10/09/2018 11:24	WG1176341
Fluoride	1.67		0.00990	0.100	1	10/09/2018 11:07	WG1176341
Sulfate	2440		7.74	500	100	10/09/2018 11:24	WG1176341

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0279		0.000250	0.00200	1	10/09/2018 19:10	WG1176332
Barium	0.0169		0.000360	0.00500	1	10/09/2018 19:10	WG1176332
Calcium	620		0.0460	1.00	1	10/09/2018 19:10	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 19:10	WG1176332
Iron	0.0176	J	0.0150	0.100	1	10/09/2018 19:10	WG1176332
Lead	0.000706	B J	0.000240	0.00200	1	10/09/2018 20:57	WG1176332
Manganese	0.983		0.000250	0.00500	1	10/09/2018 19:10	WG1176332
Potassium	5.74		0.0370	1.00	1	10/09/2018 19:10	WG1176332
Selenium	0.00932		0.000380	0.00200	1	10/09/2018 19:10	WG1176332
Sodium	832		0.110	1.00	1	10/09/2018 19:10	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.381		0.0314	0.100	1	10/07/2018 18:09	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*98.7*			*78.0-120*		*10/07/2018 18:09*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/06/2018 15:34	WG1176770
Benzene	U		0.000331	0.00100	1	10/06/2018 15:34	WG1176770
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 15:34	WG1176770
Bromoform	U		0.000469	0.00100	1	10/06/2018 15:34	WG1176770
Bromomethane	U		0.000866	0.00500	1	10/06/2018 15:34	WG1176770
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 15:34	WG1176770
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 15:34	WG1176770
Carbon disulfide	U		0.000275	0.00100	1	10/06/2018 15:34	WG1176770
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 15:34	WG1176770
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 15:34	WG1176770
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 15:34	WG1176770
Chloroethane	U		0.000453	0.00500	1	10/06/2018 15:34	WG1176770
Chloroform	U		0.000324	0.00500	1	10/06/2018 15:34	WG1176770
Chloromethane	U		0.000276	0.00250	1	10/06/2018 15:34	WG1176770
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 15:34	WG1176770
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 15:34	WG1176770

DUP-EP-03
Collected date/time: 10/02/18 12:00

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L1031730

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 15:34	WG1176770
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 15:34	WG1176770
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 15:34	WG1176770
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 15:34	WG1176770
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 15:34	WG1176770
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 15:34	WG1176770
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 15:34	WG1176770
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 15:34	WG1176770
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 15:34	WG1176770
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 15:34	WG1176770
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 15:34	WG1176770
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 15:34	WG1176770
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 15:34	WG1176770
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 15:34	WG1176770
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/06/2018 15:34	WG1176770
Naphthalene	U		0.00100	0.00500	1	10/06/2018 15:34	WG1176770
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 15:34	WG1176770
Styrene	U		0.000307	0.00100	1	10/06/2018 15:34	WG1176770
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 15:34	WG1176770
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 15:34	WG1176770
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 15:34	WG1176770
Toluene	U		0.000412	0.00100	1	10/06/2018 15:34	WG1176770
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 15:34	WG1176770
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 15:34	WG1176770
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 15:34	WG1176770
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 15:34	WG1176770
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 15:34	WG1176770
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 15:34	WG1176770
o-Xylene	U		0.000341	0.00100	1	10/06/2018 15:34	WG1176770
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 15:34	WG1176770
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 15:34	WG1176770
(S) Toluene-d8	*110*			*80.0-120*		*10/06/2018 15:34*	WG1176770
(S) Dibromofluoromethane	*111*			*75.0-120*		*10/06/2018 15:34*	WG1176770
(S) 4-Bromofluorobenzene	*96.3*			*77.0-126*		*10/06/2018 15:34*	WG1176770

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	5.62		0.0247	0.100	1	10/09/2018 14:20	WG1177735
(S) o-Terphenyl	*81.6*			*31.0-160*		*10/09/2018 14:20*	WG1177735

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	18.0	Q	2.82	10.0	1	10/16/2018 20:13	WG1181495

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 15:10	WG1178384

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.294	B J P1	0.0519	1.00	1	10/09/2018 01:47	WG1176341
Fluoride	U		0.00990	0.100	1	10/09/2018 01:47	WG1176341
Sulfate	0.312	B J P1	0.0774	5.00	1	10/09/2018 01:47	WG1176341

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	10/09/2018 19:14	WG1176332
Barium	U		0.000360	0.00500	1	10/09/2018 19:14	WG1176332
Calcium	0.116	J	0.0460	1.00	1	10/09/2018 19:14	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 19:14	WG1176332
Iron	U		0.0150	0.100	1	10/09/2018 19:14	WG1176332
Lead	0.000916	B J	0.000240	0.00200	1	10/09/2018 19:14	WG1176332
Manganese	0.000710	J	0.000250	0.00500	1	10/09/2018 19:14	WG1176332
Potassium	0.0486	J	0.0370	1.00	1	10/09/2018 19:14	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 19:14	WG1176332
Sodium	0.670	J	0.110	1.00	1	10/09/2018 19:14	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 18:32	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.4*			*78.0-120*		*10/07/2018 18:32*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/06/2018 15:54	WG1176770
Benzene	U		0.000331	0.00100	1	10/06/2018 15:54	WG1176770
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 15:54	WG1176770
Bromoform	U		0.000469	0.00100	1	10/06/2018 15:54	WG1176770
Bromomethane	U		0.000866	0.00500	1	10/06/2018 15:54	WG1176770
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 15:54	WG1176770
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 15:54	WG1176770
Carbon disulfide	U		0.000275	0.00100	1	10/06/2018 15:54	WG1176770
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 15:54	WG1176770
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 15:54	WG1176770
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 15:54	WG1176770
Chloroethane	U		0.000453	0.00500	1	10/06/2018 15:54	WG1176770
Chloroform	U		0.000324	0.00500	1	10/06/2018 15:54	WG1176770
Chloromethane	U		0.000276	0.00250	1	10/06/2018 15:54	WG1176770
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 15:54	WG1176770
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 15:54	WG1176770

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 15:54	WG1176770
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 15:54	WG1176770
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 15:54	WG1176770
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 15:54	WG1176770
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 15:54	WG1176770
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 15:54	WG1176770
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 15:54	WG1176770
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 15:54	WG1176770
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 15:54	WG1176770
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 15:54	WG1176770
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 15:54	WG1176770
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 15:54	WG1176770
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 15:54	WG1176770
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 15:54	WG1176770
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/06/2018 15:54	WG1176770
Naphthalene	U		0.00100	0.00500	1	10/06/2018 15:54	WG1176770
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 15:54	WG1176770
Styrene	U		0.000307	0.00100	1	10/06/2018 15:54	WG1176770
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 15:54	WG1176770
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 15:54	WG1176770
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 15:54	WG1176770
Toluene	U		0.000412	0.00100	1	10/06/2018 15:54	WG1176770
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 15:54	WG1176770
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 15:54	WG1176770
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 15:54	WG1176770
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 15:54	WG1176770
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 15:54	WG1176770
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 15:54	WG1176770
o-Xylene	U		0.000341	0.00100	1	10/06/2018 15:54	WG1176770
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 15:54	WG1176770
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 15:54	WG1176770
(S) Toluene-d8	*107*			*80.0-120*		*10/06/2018 15:54*	WG1176770
(S) Dibromofluoromethane	*105*			*75.0-120*		*10/06/2018 15:54*	WG1176770
(S) 4-Bromofluorobenzene	*99.0*			*77.0-126*		*10/06/2018 15:54*	WG1176770

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0682	J	0.0247	0.100	1	10/09/2018 14:40	WG1177735
(S) o-Terphenyl	*57.4*			*31.0-160*		*10/09/2018 14:40*	WG1177735

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	U	Q	2.82	10.0	1	10/16/2018 20:13	WG1181495

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 15:11	WG1178384

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.555	B J P1	0.0519	1.00	1	10/09/2018 11:41	WG1176341
Fluoride	U		0.00990	0.100	1	10/09/2018 11:41	WG1176341
Sulfate	1.97	B J P1	0.0774	5.00	1	10/09/2018 11:41	WG1176341

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	10/09/2018 19:19	WG1176332
Barium	0.00233	J	0.000360	0.00500	1	10/09/2018 19:19	WG1176332
Calcium	0.0870	J	0.0460	1.00	1	10/09/2018 19:19	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 19:19	WG1176332
Iron	U		0.0150	0.100	1	10/09/2018 19:19	WG1176332
Lead	0.000453	B J	0.000240	0.00200	1	10/09/2018 19:19	WG1176332
Manganese	0.000625	J	0.000250	0.00500	1	10/09/2018 19:19	WG1176332
Potassium	U		0.0370	1.00	1	10/09/2018 19:19	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 19:19	WG1176332
Sodium	0.545	J	0.110	1.00	1	10/09/2018 19:19	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 18:55	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.7*			*78.0-120*		*10/07/2018 18:55*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/06/2018 16:14	WG1176770
Benzene	U		0.000331	0.00100	1	10/06/2018 16:14	WG1176770
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 16:14	WG1176770
Bromoform	U		0.000469	0.00100	1	10/06/2018 16:14	WG1176770
Bromomethane	U		0.000866	0.00500	1	10/06/2018 16:14	WG1176770
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 16:14	WG1176770
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 16:14	WG1176770
Carbon disulfide	U		0.000275	0.00100	1	10/06/2018 16:14	WG1176770
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 16:14	WG1176770
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 16:14	WG1176770
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 16:14	WG1176770
Chloroethane	U		0.000453	0.00500	1	10/06/2018 16:14	WG1176770
Chloroform	U		0.000324	0.00500	1	10/06/2018 16:14	WG1176770
Chloromethane	U		0.000276	0.00250	1	10/06/2018 16:14	WG1176770
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 16:14	WG1176770
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 16:14	WG1176770

EB-EP-03

Collected date/time: 10/02/18 11:30

SAMPLE RESULTS - 26

L1031730

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 16:14	WG1176770
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 16:14	WG1176770
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 16:14	WG1176770
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 16:14	WG1176770
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 16:14	WG1176770
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 16:14	WG1176770
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 16:14	WG1176770
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 16:14	WG1176770
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 16:14	WG1176770
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 16:14	WG1176770
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 16:14	WG1176770
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 16:14	WG1176770
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 16:14	WG1176770
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 16:14	WG1176770
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/06/2018 16:14	WG1176770
Naphthalene	U		0.00100	0.00500	1	10/06/2018 16:14	WG1176770
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 16:14	WG1176770
Styrene	U		0.000307	0.00100	1	10/06/2018 16:14	WG1176770
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 16:14	WG1176770
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 16:14	WG1176770
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 16:14	WG1176770
Toluene	U		0.000412	0.00100	1	10/06/2018 16:14	WG1176770
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 16:14	WG1176770
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 16:14	WG1176770
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 16:14	WG1176770
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 16:14	WG1176770
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 16:14	WG1176770
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 16:14	WG1176770
o-Xylene	U		0.000341	0.00100	1	10/06/2018 16:14	WG1176770
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 16:14	WG1176770
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 16:14	WG1176770
(S) Toluene-d8	*107*			*80.0-120*		*10/06/2018 16:14*	WG1176770
(S) Dibromofluoromethane	*101*			*75.0-120*		*10/06/2018 16:14*	WG1176770
(S) 4-Bromofluorobenzene	*95.6*			*77.0-126*		*10/06/2018 16:14*	WG1176770

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0382	J	0.0247	0.100	1	10/09/2018 15:01	WG1177735
(S) o-Terphenyl	*54.2*			*31.0-160*		*10/09/2018 15:01*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/06/2018 11:15	WG1176770
Benzene	U		0.000331	0.00100	1	10/06/2018 11:15	WG1176770
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 11:15	WG1176770
Bromoform	U		0.000469	0.00100	1	10/06/2018 11:15	WG1176770
Bromomethane	U		0.000866	0.00500	1	10/06/2018 11:15	WG1176770
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 11:15	WG1176770
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 11:15	WG1176770
Carbon disulfide	U		0.000275	0.00100	1	10/06/2018 11:15	WG1176770
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 11:15	WG1176770
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 11:15	WG1176770
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 11:15	WG1176770
Chloroethane	U		0.000453	0.00500	1	10/06/2018 11:15	WG1176770
Chloroform	U		0.000324	0.00500	1	10/06/2018 11:15	WG1176770
Chloromethane	U		0.000276	0.00250	1	10/06/2018 11:15	WG1176770
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 11:15	WG1176770
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 11:15	WG1176770
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 11:15	WG1176770
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 11:15	WG1176770
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 11:15	WG1176770
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 11:15	WG1176770
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 11:15	WG1176770
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 11:15	WG1176770
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 11:15	WG1176770
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 11:15	WG1176770
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 11:15	WG1176770
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 11:15	WG1176770
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 11:15	WG1176770
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 11:15	WG1176770
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 11:15	WG1176770
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 11:15	WG1176770
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/06/2018 11:15	WG1176770
Naphthalene	U		0.00100	0.00500	1	10/06/2018 11:15	WG1176770
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 11:15	WG1176770
Styrene	U		0.000307	0.00100	1	10/06/2018 11:15	WG1176770
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 11:15	WG1176770
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 11:15	WG1176770
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 11:15	WG1176770
Toluene	U		0.000412	0.00100	1	10/06/2018 11:15	WG1176770
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 11:15	WG1176770
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 11:15	WG1176770
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 11:15	WG1176770
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 11:15	WG1176770
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 11:15	WG1176770
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 11:15	WG1176770
o-Xylene	U		0.000341	0.00100	1	10/06/2018 11:15	WG1176770
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 11:15	WG1176770
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 11:15	WG1176770
(S) Toluene-d8	*108*			*80.0-120*		*10/06/2018 11:15*	WG1176770
(S) Dibromofluoromethane	*103*			*75.0-120*		*10/06/2018 11:15*	WG1176770
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/06/2018 11:15*	WG1176770

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/06/2018 11:35	WG1176770
Benzene	U		0.000331	0.00100	1	10/06/2018 11:35	WG1176770
Bromodichloromethane	U		0.000380	0.00100	1	10/06/2018 11:35	WG1176770
Bromoform	U		0.000469	0.00100	1	10/06/2018 11:35	WG1176770
Bromomethane	U		0.000866	0.00500	1	10/06/2018 11:35	WG1176770
n-Butylbenzene	U		0.000361	0.00100	1	10/06/2018 11:35	WG1176770
sec-Butylbenzene	U		0.000365	0.00100	1	10/06/2018 11:35	WG1176770
Carbon disulfide	U		0.000275	0.00100	1	10/06/2018 11:35	WG1176770
Carbon tetrachloride	U		0.000379	0.00100	1	10/06/2018 11:35	WG1176770
Chlorobenzene	U		0.000348	0.00100	1	10/06/2018 11:35	WG1176770
Chlorodibromomethane	U		0.000327	0.00100	1	10/06/2018 11:35	WG1176770
Chloroethane	U		0.000453	0.00500	1	10/06/2018 11:35	WG1176770
Chloroform	U		0.000324	0.00500	1	10/06/2018 11:35	WG1176770
Chloromethane	U		0.000276	0.00250	1	10/06/2018 11:35	WG1176770
1,2-Dibromoethane	U		0.000381	0.00100	1	10/06/2018 11:35	WG1176770
1,1-Dichloroethane	U		0.000259	0.00100	1	10/06/2018 11:35	WG1176770
1,2-Dichloroethane	U		0.000361	0.00100	1	10/06/2018 11:35	WG1176770
1,1-Dichloroethene	U		0.000398	0.00100	1	10/06/2018 11:35	WG1176770
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/06/2018 11:35	WG1176770
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/06/2018 11:35	WG1176770
1,2-Dichloropropane	U		0.000306	0.00100	1	10/06/2018 11:35	WG1176770
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/06/2018 11:35	WG1176770
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/06/2018 11:35	WG1176770
Ethylbenzene	U		0.000384	0.00100	1	10/06/2018 11:35	WG1176770
Isopropylbenzene	U		0.000326	0.00100	1	10/06/2018 11:35	WG1176770
p-Isopropyltoluene	U		0.000350	0.00100	1	10/06/2018 11:35	WG1176770
2-Butanone (MEK)	U		0.00393	0.0100	1	10/06/2018 11:35	WG1176770
2-Hexanone	U		0.00382	0.0100	1	10/06/2018 11:35	WG1176770
Methylene Chloride	U		0.00100	0.00500	1	10/06/2018 11:35	WG1176770
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/06/2018 11:35	WG1176770
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/06/2018 11:35	WG1176770
Naphthalene	U		0.00100	0.00500	1	10/06/2018 11:35	WG1176770
n-Propylbenzene	U		0.000349	0.00100	1	10/06/2018 11:35	WG1176770
Styrene	U		0.000307	0.00100	1	10/06/2018 11:35	WG1176770
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/06/2018 11:35	WG1176770
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/06/2018 11:35	WG1176770
Tetrachloroethene	U		0.000372	0.00100	1	10/06/2018 11:35	WG1176770
Toluene	U		0.000412	0.00100	1	10/06/2018 11:35	WG1176770
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/06/2018 11:35	WG1176770
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/06/2018 11:35	WG1176770
Trichloroethene	U		0.000398	0.00100	1	10/06/2018 11:35	WG1176770
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/06/2018 11:35	WG1176770
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/06/2018 11:35	WG1176770
Vinyl chloride	U		0.000259	0.00100	1	10/06/2018 11:35	WG1176770
o-Xylene	U		0.000341	0.00100	1	10/06/2018 11:35	WG1176770
m&p-Xylene	U		0.000719	0.00200	1	10/06/2018 11:35	WG1176770
Xylenes, Total	U		0.00106	0.00300	1	10/06/2018 11:35	WG1176770
(S) Toluene-d8	*104*			*80.0-120*		*10/06/2018 11:35*	WG1176770
(S) Dibromofluoromethane	*113*			*75.0-120*		*10/06/2018 11:35*	WG1176770
(S) 4-Bromofluorobenzene	*98.2*			*77.0-126*		*10/06/2018 11:35*	WG1176770

WG1177074

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1031730-01,02,03,05,06

Method Blank (MB)

(MB) R3349861-1 10/09/18 15:22

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1031729-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031729-01 10/09/18 15:22 • (DUP) R3349861-4 10/09/18 15:22

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2840	2980	1	4.99		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349861-2 10/09/18 15:22 • (LCSD) R3349861-3 10/09/18 15:22

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8650	8670	98.3	98.5	85.0-115			0.231	5

WG1177076

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1031730-07,08,09,10,11,12,16,17,19,21

Method Blank (MB)

(MB) R3349952-1 10/09/18 17:26

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	4.00	J	2.82	10.0

L1031730-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-07 10/09/18 17:26 • (DUP) R3349952-4 10/09/18 17:26

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	4380	4280	1	2.31		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349952-2 10/09/18 17:26 • (LCSD) R3349952-3 10/09/18 17:26

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8630	8760	98.1	99.5	85.0-115			1.50	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3351617-1 10/16/18 20:13

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1031730-22 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-22 10/16/18 20:13 • (DUP) R3351617-4 10/16/18 20:13

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	6530	6420	1	1.70		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3351617-2 10/16/18 20:13 • (LCSD) R3351617-3 10/16/18 20:13

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	9080	8810	103	100	85.0-115			3.02	5

QUALITY CONTROL SUMMARY

L1031730-01,02,03,05,06,07,08

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349125-1 10/09/18 19:40

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1031644-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031644-02 10/09/18 19:46 • (DUP) R3349125-4 10/09/18 19:48

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Nitrate-Nitrite	0.906	0.914	1	0.879		20

L1031730-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-07 10/09/18 20:27 • (DUP) R3349125-6 10/09/18 20:31

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Nitrate-Nitrite	U	0.000	1	0.000		20

L1031644-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031644-01 10/09/18 19:46 • (DUP) R3349125-9 10/09/18 19:48

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Nitrate-Nitrite	0.906	0.914	1	0.879		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349125-2 10/09/18 19:42 • (LCSD) R3349125-3 10/09/18 19:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	4.00	3.79	3.95	94.8	98.7	90.0-110			4.03	20

WG1178144

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L1031730-01,02,03,05,06,07,08

L1031728-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031728-02 10/09/18 19:52 • (MS) R3349125-5 10/09/18 19:54

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Nitrate-Nitrite	2.50	U	2.59	103	1	90.0-110	

L1031730-08 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-08 10/09/18 20:32 • (MS) R3349125-7 10/09/18 20:34 • (MSD) R3349125-8 10/09/18 20:35

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	2.50	U	1.71	1.69	68.4	67.5	1	90.0-110	J6	J6	1.29	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1178384

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L1031730-09,10,11,12,16,17,19,21,22,23,24,25,26

Method Blank (MB)

(MB) R3349476-1 10/10/18 14:37

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1031625-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031625-01 10/10/18 14:41 • (DUP) R3349476-4 10/10/18 14:43

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.298	0.303	1	1.66		20

L1031795-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031795-02 10/10/18 15:22 • (DUP) R3349476-6 10/10/18 15:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	3.04	3.10	1	1.99		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349476-2 10/10/18 14:38 • (LCSD) R3349476-3 10/10/18 14:40

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.78	3.87	94.5	96.8	90.0-110			2.40	20

L1031635-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031635-01 10/10/18 14:44 • (MS) R3349476-5 10/10/18 14:46

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	ND	2.10	83.9	1	90.0-110	J6

L1031798-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031798-01 10/10/18 15:25 • (MS) R3349476-7 10/10/18 15:26 • (MSD) R3349476-8 10/10/18 15:28

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	0.102	2.37	2.36	90.6	90.3	1	90.0-110			0.254	20

WG1176533

Wet Chemistry by Method 4500CN E-2011

QUALITY CONTROL SUMMARY

L1031730-11,19

Method Blank (MB)

(MB) R3348616-1 10/08/18 14:11

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Cyanide	U		0.00180	0.00500

L1030670-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1030670-02 10/08/18 14:18 • (DUP) R3348616-4 10/08/18 14:19

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Cyanide	ND	0.00344	1	0.000		20

L1031734-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-02 10/08/18 14:43 • (DUP) R3348616-9 10/08/18 14:44

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Cyanide	U	0.00552	1	200	P1	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348616-2 10/08/18 14:12 • (LCSD) R3348616-3 10/08/18 14:13

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Cyanide	0.100	0.161	0.146	107	97.3	85.0-115			9.77	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348698-1 10/06/18 16:10

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L1031021-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031021-01 10/06/18 17:44 • (DUP) R3348698-4 10/06/18 17:58

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	2.31	2.28	1	1.53		15
Fluoride	0.144	0.131	1	9.81		15
Sulfate	36.3	36.6	1	0.725		15

L1031071-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1031071-04 10/06/18 19:50 • (DUP) R3348698-6 10/06/18 20:04

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	26.2	26.4	1	0.915		15
Fluoride	0.394	0.398	1	1.01		15

L1031071-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1031071-04 10/06/18 20:45 • (DUP) R3348698-9 10/06/18 20:59

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	419	413	5	1.28		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348698-2 10/06/18 16:24 • (LCSD) R3348698-3 10/06/18 16:38

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.5	38.9	98.7	97.2	80.0-120			1.44	15
Fluoride	8.00	7.86	7.87	98.2	98.3	80.0-120			0.0992	15
Sulfate	40.0	40.3	39.8	101	99.5	80.0-120			1.38	15

QUALITY CONTROL SUMMARY

L1031730-01,02,03,05,06

L1031021-01 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031021-01 10/06/18 17:44 • (MS) R3348698-5 10/06/18 18:12

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	2.31	52.0	99.4	1	80.0-120	
Fluoride	5.00	0.144	5.03	97.7	1	80.0-120	
Sulfate	50.0	36.3	84.1	95.6	1	80.0-120	

L1031071-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031071-04 10/06/18 19:50 • (MS) R3348698-7 10/06/18 20:18 • (MSD) R3348698-8 10/06/18 20:31

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	26.2	75.3	75.4	98.3	98.4	1	80.0-120			0.0617	15
Fluoride	5.00	0.394	5.32	5.34	98.5	98.8	1	80.0-120			0.357	15

Method Blank (MB)

(MB) R3349049-1 10/09/18 00:09

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	0.248	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.318	J	0.0774	5.00

L1031730-25 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-25 10/09/18 01:47 • (DUP) R3349049-4 10/09/18 02:03

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.294	0.209	1	33.9	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	0.312	0.000	1	200	P1	15

L1031730-26 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-26 10/09/18 11:41 • (DUP) R3349049-7 10/09/18 11:58

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.555	0.369	1	40.5	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.97	1.13	1	53.7	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349049-2 10/09/18 00:26 • (LCSD) R3349049-3 10/09/18 00:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.0	39.1	97.6	97.7	80.0-120			0.0876	15
Fluoride	8.00	8.07	8.12	101	101	80.0-120			0.645	15
Sulfate	40.0	39.4	39.5	98.5	98.8	80.0-120			0.259	15

L1031730-25 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-25 10/09/18 01:47 • (MS) R3349049-5 10/09/18 02:20 • (MSD) R3349049-6 10/09/18 02:37

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	0.294	48.1	49.7	95.6	98.9	1	80.0-120			3.35	15
Fluoride	5.00	U	4.76	4.96	95.3	99.2	1	80.0-120			4.03	15
Sulfate	50.0	0.312	48.4	49.9	96.2	99.1	1	80.0-120			3.04	15

L1031730-26 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031730-26 10/09/18 11:41 • (MS) R3349049-8 10/09/18 12:15

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	0.555	50.3	99.5	1	80.0-120	
Fluoride	5.00	U	4.99	99.7	1	80.0-120	
Sulfate	50.0	1.97	50.9	97.8	1	80.0-120	

WG1176292

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L1031730-11,19

Method Blank (MB)

(MB) R3348322-6 10/07/18 10:02

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348322-1 10/07/18 07:21 • (LCSD) R3348322-2 10/07/18 07:23

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	0.00300	0.00300	100	100	80.0-120			0.0233	20

L1030925-16 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1030925-16 10/07/18 07:31 • (MS) R3348322-3 10/07/18 07:33 • (MSD) R3348322-4 10/07/18 07:36

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	0.000163	0.00325	0.00322	103	102	1	75.0-125			1.10	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1176325

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L1031730-11,19

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348436-1 10/07/18 14:31

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348436-2 10/07/18 14:33 • (LCSD) R3348436-3 10/07/18 14:36

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron	1.00	0.988	0.964	98.8	96.4	80.0-120			2.48	20

L1031738-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031738-02 10/07/18 14:39 • (MS) R3348436-5 10/07/18 14:44 • (MSD) R3348436-6 10/07/18 14:47

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1.00	U	0.994	0.984	99.4	98.4	1	75.0-125			1.04	20

WG1176329

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1031730-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

Method Blank (MB)

(MB) R3349540-1 10/10/18 21:01

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Manganese	0.000329	J	0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Vanadium	U		0.000180	0.00500

Method Blank (MB)

(MB) R3349710-1 10/11/18 09:04

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Lead	0.000438	J	0.000240	0.00200
Uranium	U		0.000330	0.0100

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349540-2 10/10/18 21:05 • (LCSD) R3349540-3 10/10/18 21:10

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0496	0.0502	99.2	100	80.0-120			1.22	20
Calcium	5.00	4.88	4.95	97.6	99.0	80.0-120			1.37	20
Chromium	0.0500	0.0513	0.0514	103	103	80.0-120			0.266	20
Cobalt	0.0500	0.0525	0.0527	105	105	80.0-120			0.470	20
Iron	5.00	5.18	5.07	104	101	80.0-120			2.25	20
Manganese	0.0500	0.0472	0.0478	94.3	95.6	80.0-120			1.30	20
Nickel	0.0500	0.0529	0.0527	106	105	80.0-120			0.366	20
Potassium	5.00	4.77	4.84	95.4	96.8	80.0-120			1.43	20
Selenium	0.0500	0.0489	0.0499	97.9	99.8	80.0-120			1.98	20
Sodium	5.00	5.22	5.25	104	105	80.0-120			0.619	20
Vanadium	0.0500	0.0494	0.0498	98.8	99.6	80.0-120			0.827	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349710-2 10/11/18 09:09 • (LCSD) R3349710-3 10/11/18 09:13

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Barium	0.0500	0.0481	0.0466	96.2	93.3	80.0-120			3.12	20
Cadmium	0.0500	0.0483	0.0482	96.6	96.4	80.0-120			0.220	20
Lead	0.0500	0.0480	0.0484	96.0	96.8	80.0-120			0.840	20
Uranium	0.0500	0.0460	0.0459	92.0	91.9	80.0-120			0.147	20

L1031730-20 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-20 10/10/18 21:15 • (MS) R3349540-5 10/10/18 21:24 • (MSD) R3349540-6 10/10/18 21:28

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.0186	0.0667	0.0671	96.0	97.0	1	75.0-125			0.727	20
Calcium	5.00	706	696	698	0.000	0.000	1	75.0-125	V	V	0.269	20
Chromium	0.0500	U	0.0484	0.0497	96.7	99.5	1	75.0-125			2.80	20
Cobalt	0.0500	U	0.0496	0.0505	99.1	101	1	75.0-125			1.76	20
Potassium	5.00	5.13	9.65	9.70	90.3	91.4	1	75.0-125			0.566	20
Iron	5.00	4.49	9.17	9.26	93.6	95.4	1	75.0-125			0.964	20
Manganese	0.0500	0.270	0.315	0.314	89.2	86.7	1	75.0-125			0.393	20
Nickel	0.0500	0.00142	0.0495	0.0511	96.1	99.4	1	75.0-125			3.35	20
Selenium	0.0500	U	0.0494	0.0514	98.7	103	1	75.0-125			4.00	20
Sodium	5.00	753	750	747	0.000	0.000	1	75.0-125	V	V	0.379	20
Vanadium	0.0500	U	0.0492	0.0498	98.4	99.6	1	75.0-125			1.20	20

L1031730-20 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-20 10/11/18 09:18 • (MS) R3349710-5 10/11/18 09:27 • (MSD) R3349710-6 10/11/18 09:32

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Barium	0.0500	0.0161	0.0640	0.0656	95.8	99.1	1	75.0-125			2.56	20
Cadmium	0.0500	U	0.0465	0.0470	93.1	93.9	1	75.0-125			0.941	20
Lead	0.0500	0.000490	0.0482	0.0496	95.5	98.3	1	75.0-125			2.80	20
Uranium	0.0500	0.00107	0.0495	0.0505	96.9	98.9	1	75.0-125			1.99	20

WG1176332

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1031730-21,22,23,24,25,26

Method Blank (MB)

(MB) R3349141-1 10/09/18 18:05

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Iron	U		0.0150	0.100
Lead	0.000605	J	0.000240	0.00200
Manganese	U		0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349141-2 10/09/18 18:10 • (LCSD) R3349141-3 10/09/18 18:14

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0511	0.0519	102	104	80.0-120			1.55	20
Barium	0.0500	0.0489	0.0491	97.9	98.2	80.0-120			0.382	20
Calcium	5.00	4.99	5.15	99.8	103	80.0-120			3.18	20
Chromium	0.0500	0.0524	0.0522	105	104	80.0-120			0.359	20
Iron	5.00	5.20	5.20	104	104	80.0-120			0.0291	20
Lead	0.0500	0.0509	0.0511	102	102	80.0-120			0.211	20
Manganese	0.0500	0.0504	0.0509	101	102	80.0-120			0.992	20
Potassium	5.00	5.10	5.08	102	102	80.0-120			0.388	20
Selenium	0.0500	0.0532	0.0543	106	109	80.0-120			2.04	20
Sodium	5.00	5.18	5.22	104	104	80.0-120			0.841	20

L1031730-21 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-21 10/09/18 18:19 • (MS) R3349141-5 10/09/18 18:28 • (MSD) R3349141-6 10/09/18 18:33

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00214	0.0527	0.0554	101	106	1	75.0-125			4.91	20
Barium	0.0500	0.0216	0.0790	0.0804	115	118	1	75.0-125			1.79	20
Calcium	5.00	798	810	807	237	168	1	75.0-125	V	V	0.426	20
Chromium	0.0500	U	0.0491	0.0498	98.2	99.6	1	75.0-125			1.42	20
Potassium	5.00	7.16	12.2	12.3	101	103	1	75.0-125			1.03	20
Iron	5.00	4.05	9.13	9.10	102	101	1	75.0-125			0.320	20
Lead	0.0500	0.000355	0.0532	0.0550	106	109	1	75.0-125			3.37	20

WG1176332

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1031730-21,22,23,24,25,26

L1031730-21 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-21 10/09/18 18:19 • (MS) R3349141-5 10/09/18 18:28 • (MSD) R3349141-6 10/09/18 18:33

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Manganese	0.0500	0.527	0.571	0.575	88.4	95.7	1	75.0-125			0.638	20
Selenium	0.0500	U	0.0562	0.0554	112	111	1	75.0-125			1.46	20
Sodium	5.00	1750	1710	1680	0.000	0.000	1	75.0-125	E V	E V	1.98	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348900-3 10/07/18 09:41

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*99.4*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348900-1 10/07/18 08:28 • (LCSD) R3348900-2 10/07/18 08:52

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.00	6.04	109	110	72.0-127			0.604	20
(S) a,a,a-Trifluorotoluene(FID)				*104*	*104*	*78.0-120*				

L1031730-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-06 10/07/18 17:53 • (MS) R3348900-4 10/07/18 18:17 • (MSD) R3348900-5 10/07/18 18:41

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	0.915	5.76	5.58	88.2	84.8	1	10.0-160			3.29	22
(S) a,a,a-Trifluorotoluene(FID)					*102*	*102*		*78.0-120*				

WG1177198

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L1031730-11,12,13,14,15,17,18,20,21,22,23,24,25,26

Method Blank (MB)

(MB) R3349191-3 10/07/18 12:30

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*99.3*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349191-1 10/07/18 11:21 • (LCSD) R3349191-2 10/07/18 11:44

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	5.21	5.24	94.6	95.2	72.0-127			0.638	20
(S) a,a,a-Trifluorotoluene(FID)				*105*	*105*	*78.0-120*				

Method Blank (MB)

(MB) R3348842-3 10/08/18 05:14

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*99.6*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348842-1 10/07/18 23:51 • (LCSD) R3348842-2 10/08/18 00:14

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.16	6.51	112	118	72.0-127			5.49	20
(S) a,a,a-Trifluorotoluene(FID)				*107*	*107*	*78.0-120*				

Method Blank (MB)

(MB) R3348042-3 10/05/18 07:39

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3348042-3 10/05/18 07:39

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*102*			*80.0-120*
(S) Dibromofluoromethane	*93.9*			*75.0-120*
(S) 4-Bromofluorobenzene	*96.3*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348042-1 10/05/18 06:40 • (LCSD) R3348042-2 10/05/18 07:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.0946	0.0956	75.7	76.4	19.0-160			0.983	27
Benzene	0.0250	0.0235	0.0235	93.9	94.0	70.0-123			0.0738	20
Bromodichloromethane	0.0250	0.0236	0.0239	94.5	95.6	75.0-120			1.10	20
Bromoform	0.0250	0.0291	0.0283	116	113	68.0-132			2.74	20
Bromomethane	0.0250	0.0227	0.0220	90.8	87.8	10.0-160			3.32	25
n-Butylbenzene	0.0250	0.0220	0.0219	87.8	87.5	73.0-125			0.434	20
sec-Butylbenzene	0.0250	0.0251	0.0247	101	98.7	75.0-125			1.89	20
Carbon disulfide	0.0250	0.0224	0.0206	89.4	82.3	61.0-128			8.28	20
Carbon tetrachloride	0.0250	0.0229	0.0229	91.7	91.6	68.0-126			0.109	20
Chlorobenzene	0.0250	0.0270	0.0266	108	106	80.0-121			1.42	20
Chlorodibromomethane	0.0250	0.0271	0.0264	109	106	77.0-125			2.72	20
Chloroethane	0.0250	0.0208	0.0211	83.1	84.5	47.0-150			1.68	20
Chloroform	0.0250	0.0235	0.0234	93.9	93.6	73.0-120			0.371	20
Chloromethane	0.0250	0.0179	0.0168	71.4	67.3	41.0-142			6.03	20
1,2-Dibromoethane	0.0250	0.0256	0.0256	102	102	80.0-122			0.00426	20
1,1-Dichloroethane	0.0250	0.0232	0.0226	92.7	90.5	70.0-126			2.36	20
1,2-Dichloroethane	0.0250	0.0215	0.0208	86.0	83.2	70.0-128			3.30	20
1,1-Dichloroethene	0.0250	0.0246	0.0223	98.4	89.4	71.0-124			9.64	20
cis-1,2-Dichloroethene	0.0250	0.0251	0.0248	100	99.1	73.0-120			1.21	20
trans-1,2-Dichloroethene	0.0250	0.0244	0.0242	97.7	97.0	73.0-120			0.705	20
1,2-Dichloropropane	0.0250	0.0239	0.0241	95.6	96.2	77.0-125			0.617	20
cis-1,3-Dichloropropene	0.0250	0.0251	0.0250	101	100	80.0-123			0.406	20
trans-1,3-Dichloropropene	0.0250	0.0247	0.0245	98.7	98.1	78.0-124			0.529	20

QUALITY CONTROL SUMMARY

L1031730-21,22

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348042-1 10/05/18 06:40 • (LCSD) R3348042-2 10/05/18 07:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0261	0.0261	105	105	79.0-123			0.00575	20
2-Hexanone	0.125	0.118	0.118	94.4	94.3	67.0-149			0.124	20
Isopropylbenzene	0.0250	0.0264	0.0261	106	105	76.0-127			0.976	20
p-Isopropyltoluene	0.0250	0.0253	0.0250	101	100	76.0-125			1.02	20
2-Butanone (MEK)	0.125	0.0996	0.100	79.7	80.1	44.0-160			0.584	20
Methylene Chloride	0.0250	0.0234	0.0219	93.5	87.6	67.0-120			6.55	20
4-Methyl-2-pentanone (MIBK)	0.125	0.110	0.109	87.8	86.9	68.0-142			1.03	20
Methyl tert-butyl ether	0.0250	0.0224	0.0217	89.6	86.8	68.0-125			3.12	20
Naphthalene	0.0250	0.0223	0.0225	89.3	89.9	54.0-135			0.638	20
n-Propylbenzene	0.0250	0.0257	0.0253	103	101	77.0-124			1.77	20
Styrene	0.0250	0.0276	0.0271	110	108	73.0-130			1.88	20
1,1,1,2-Tetrachloroethane	0.0250	0.0275	0.0277	110	111	75.0-125			0.699	20
1,1,2,2-Tetrachloroethane	0.0250	0.0249	0.0247	99.5	98.8	65.0-130			0.645	20
Tetrachloroethene	0.0250	0.0283	0.0278	113	111	72.0-132			1.82	20
Toluene	0.0250	0.0254	0.0252	102	101	79.0-120			1.09	20
1,1,1-Trichloroethane	0.0250	0.0235	0.0233	94.1	93.1	73.0-124			1.05	20
1,1,2-Trichloroethane	0.0250	0.0258	0.0260	103	104	80.0-120			0.793	20
Trichloroethene	0.0250	0.0278	0.0273	111	109	78.0-124			2.01	20
1,2,4-Trimethylbenzene	0.0250	0.0257	0.0256	103	102	76.0-121			0.643	20
1,3,5-Trimethylbenzene	0.0250	0.0265	0.0264	106	105	76.0-122			0.417	20
Vinyl chloride	0.0250	0.0234	0.0217	93.4	86.9	67.0-131			7.26	20
Xylenes, Total	0.0750	0.0780	0.0777	104	104	79.0-123			0.385	20
o-Xylene	0.0250	0.0259	0.0258	104	103	80.0-122			0.203	20
m&p-Xylenes	0.0500	0.0521	0.0519	104	104	80.0-122			0.307	20
(S) Toluene-d8				*99.9*	*101*	*80.0-120*				
(S) Dibromofluoromethane				*92.9*	*91.5*	*75.0-120*				
(S) 4-Bromofluorobenzene				*95.3*	*96.3*	*77.0-126*				

WG1176280

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1031730-01,02,03,04,05,06,07,08,09,10,12,13,14,15,17,18,19,20

Method Blank (MB)

(MB) R3349510-3 10/05/18 06:43

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3349510-3 10/05/18 06:43

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*111*			*80.0-120*
(S) Dibromofluoromethane	*92.8*			*75.0-120*
(S) 4-Bromofluorobenzene	*103*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349510-1 10/05/18 05:42 • (LCSD) R3349510-2 10/05/18 06:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.104	0.0985	83.5	78.8	19.0-160			5.79	27
Benzene	0.0250	0.0211	0.0195	84.3	78.2	70.0-123			7.56	20
Bromodichloromethane	0.0250	0.0219	0.0223	87.8	89.1	75.0-120			1.54	20
Bromoform	0.0250	0.0261	0.0252	104	101	68.0-132			3.41	20
Bromomethane	0.0250	0.0201	0.0221	80.4	88.5	10.0-160			9.59	25
n-Butylbenzene	0.0250	0.0241	0.0232	96.4	92.8	73.0-125			3.74	20
sec-Butylbenzene	0.0250	0.0237	0.0228	94.9	91.1	75.0-125			4.09	20
Carbon disulfide	0.0250	0.0198	0.0186	79.1	74.5	61.0-128			5.96	20
Carbon tetrachloride	0.0250	0.0204	0.0193	81.4	77.3	68.0-126			5.16	20
Chlorobenzene	0.0250	0.0256	0.0252	102	101	80.0-121			1.65	20
Chlorodibromomethane	0.0250	0.0259	0.0245	104	97.9	77.0-125			5.61	20
Chloroethane	0.0250	0.0230	0.0212	91.8	84.9	47.0-150			7.85	20
Chloroform	0.0250	0.0207	0.0197	82.9	78.9	73.0-120			4.98	20
Chloromethane	0.0250	0.0235	0.0219	94.0	87.7	41.0-142			6.89	20
1,2-Dibromoethane	0.0250	0.0259	0.0245	104	98.0	80.0-122			5.63	20
1,1-Dichloroethane	0.0250	0.0206	0.0196	82.5	78.5	70.0-126			5.03	20
1,2-Dichloroethane	0.0250	0.0215	0.0201	86.0	80.4	70.0-128			6.68	20
1,1-Dichloroethene	0.0250	0.0212	0.0203	84.7	81.2	71.0-124			4.20	20
cis-1,2-Dichloroethene	0.0250	0.0207	0.0211	83.0	84.3	73.0-120			1.61	20
trans-1,2-Dichloroethene	0.0250	0.0225	0.0210	90.0	83.9	73.0-120			7.04	20
1,2-Dichloropropane	0.0250	0.0221	0.0225	88.3	89.8	77.0-125			1.76	20
cis-1,3-Dichloropropene	0.0250	0.0241	0.0238	96.6	95.1	80.0-123			1.50	20
trans-1,3-Dichloropropene	0.0250	0.0218	0.0214	87.2	85.8	78.0-124			1.58	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349510-1 10/05/18 05:42 • (LCSD) R3349510-2 10/05/18 06:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0264	0.0254	106	101	79.0-123			3.97	20
2-Hexanone	0.125	0.119	0.117	95.4	93.9	67.0-149			1.61	20
Isopropylbenzene	0.0250	0.0242	0.0233	96.9	93.4	76.0-127			3.67	20
p-Isopropyltoluene	0.0250	0.0245	0.0233	97.9	93.1	76.0-125			4.99	20
2-Butanone (MEK)	0.125	0.113	0.110	90.8	87.6	44.0-160			3.55	20
Methylene Chloride	0.0250	0.0206	0.0200	82.3	79.9	67.0-120			2.97	20
4-Methyl-2-pentanone (MIBK)	0.125	0.131	0.128	104	102	68.0-142			2.07	20
Methyl tert-butyl ether	0.0250	0.0203	0.0199	81.1	79.5	68.0-125			1.98	20
Naphthalene	0.0250	0.0264	0.0256	105	103	54.0-135			2.77	20
n-Propylbenzene	0.0250	0.0235	0.0225	94.0	90.0	77.0-124			4.36	20
Styrene	0.0250	0.0266	0.0254	106	102	73.0-130			4.65	20
1,1,1,2-Tetrachloroethane	0.0250	0.0266	0.0261	106	104	75.0-125			1.97	20
1,1,2,2-Tetrachloroethane	0.0250	0.0216	0.0214	86.4	85.6	65.0-130			0.849	20
Tetrachloroethene	0.0250	0.0265	0.0255	106	102	72.0-132			3.72	20
Toluene	0.0250	0.0241	0.0231	96.4	92.3	79.0-120			4.35	20
1,1,1-Trichloroethane	0.0250	0.0220	0.0201	87.8	80.4	73.0-124			8.86	20
1,1,2-Trichloroethane	0.0250	0.0254	0.0253	102	101	80.0-120			0.603	20
Trichloroethene	0.0250	0.0251	0.0245	100	98.0	78.0-124			2.44	20
1,2,4-Trimethylbenzene	0.0250	0.0244	0.0230	97.6	92.1	76.0-121			5.82	20
1,3,5-Trimethylbenzene	0.0250	0.0233	0.0222	93.2	89.0	76.0-122			4.68	20
Vinyl chloride	0.0250	0.0239	0.0218	95.7	87.4	67.0-131			9.14	20
Xylenes, Total	0.0750	0.0770	0.0741	103	98.8	79.0-123			3.84	20
o-Xylene	0.0250	0.0263	0.0257	105	103	80.0-122			2.30	20
m&p-Xylenes	0.0500	0.0507	0.0484	101	96.8	80.0-122			4.64	20
(S) Toluene-d8				*109*	*108*	*80.0-120*				
(S) Dibromofluoromethane				*93.6*	*91.1*	*75.0-120*				
(S) 4-Bromofluorobenzene				*98.8*	*97.4*	*77.0-126*				

Method Blank (MB)

(MB) R3349081-3 10/06/18 10:36

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349081-3 10/06/18 10:36

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*105*			*80.0-120*
(S) Dibromofluoromethane	*107*			*75.0-120*
(S) 4-Bromofluorobenzene	*104*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349081-1 10/06/18 09:26 • (LCSD) R3349081-2 10/06/18 09:46

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.142	0.149	114	119	19.0-160			4.69	27
Benzene	0.0250	0.0233	0.0223	93.3	89.2	70.0-123			4.59	20
Bromodichloromethane	0.0250	0.0238	0.0231	95.1	92.4	75.0-120			2.84	20
Bromoform	0.0250	0.0234	0.0241	93.5	96.3	68.0-132			2.92	20
Bromomethane	0.0250	0.0204	0.0202	81.8	80.8	10.0-160			1.19	25
n-Butylbenzene	0.0250	0.0235	0.0237	94.1	94.7	73.0-125			0.561	20
sec-Butylbenzene	0.0250	0.0244	0.0258	97.8	103	75.0-125			5.24	20
Carbon disulfide	0.0250	0.0209	0.0207	83.4	82.9	61.0-128			0.593	20
Carbon tetrachloride	0.0250	0.0259	0.0257	103	103	68.0-126			0.520	20
Chlorobenzene	0.0250	0.0278	0.0275	111	110	80.0-121			0.971	20
Chlorodibromomethane	0.0250	0.0271	0.0279	109	111	77.0-125			2.65	20
Chloroethane	0.0250	0.0217	0.0208	86.7	83.1	47.0-150			4.25	20
Chloroform	0.0250	0.0242	0.0251	96.9	100	73.0-120			3.42	20
Chloromethane	0.0250	0.0228	0.0224	91.3	89.8	41.0-142			1.62	20
1,2-Dibromoethane	0.0250	0.0271	0.0266	108	106	80.0-122			1.68	20
1,1-Dichloroethane	0.0250	0.0232	0.0241	93.0	96.2	70.0-126			3.41	20
1,2-Dichloroethane	0.0250	0.0246	0.0237	98.6	95.0	70.0-128			3.74	20
1,1-Dichloroethene	0.0250	0.0268	0.0257	107	103	71.0-124			4.48	20
cis-1,2-Dichloroethene	0.0250	0.0244	0.0239	97.6	95.7	73.0-120			1.98	20
trans-1,2-Dichloroethene	0.0250	0.0235	0.0240	94.2	96.0	73.0-120			1.87	20
1,2-Dichloropropane	0.0250	0.0248	0.0245	99.4	98.0	77.0-125			1.39	20
cis-1,3-Dichloropropene	0.0250	0.0242	0.0241	96.9	96.5	80.0-123			0.392	20
trans-1,3-Dichloropropene	0.0250	0.0253	0.0255	101	102	78.0-124			1.12	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349081-1 10/06/18 09:26 • (LCSD) R3349081-2 10/06/18 09:46

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0283	0.0271	113	108	79.0-123			4.36	20
2-Hexanone	0.125	0.149	0.147	119	118	67.0-149			1.27	20
Isopropylbenzene	0.0250	0.0254	0.0256	101	103	76.0-127			1.01	20
p-Isopropyltoluene	0.0250	0.0255	0.0262	102	105	76.0-125			2.47	20
2-Butanone (MEK)	0.125	0.150	0.151	120	121	44.0-160			0.626	20
Methylene Chloride	0.0250	0.0219	0.0230	87.6	92.1	67.0-120			5.02	20
4-Methyl-2-pentanone (MIBK)	0.125	0.157	0.151	126	121	68.0-142			3.58	20
Methyl tert-butyl ether	0.0250	0.0217	0.0226	86.7	90.3	68.0-125			4.04	20
Naphthalene	0.0250	0.0222	0.0251	88.6	100	54.0-135			12.5	20
n-Propylbenzene	0.0250	0.0233	0.0257	93.4	103	77.0-124			9.45	20
Styrene	0.0250	0.0239	0.0248	95.6	99.3	73.0-130			3.70	20
1,1,1,2-Tetrachloroethane	0.0250	0.0281	0.0281	112	112	75.0-125			0.0699	20
1,1,2,2-Tetrachloroethane	0.0250	0.0227	0.0228	90.6	91.1	65.0-130			0.559	20
Tetrachloroethene	0.0250	0.0273	0.0271	109	109	72.0-132			0.598	20
Toluene	0.0250	0.0256	0.0251	102	100	79.0-120			1.96	20
1,1,1-Trichloroethane	0.0250	0.0271	0.0274	108	109	73.0-124			1.05	20
1,1,2-Trichloroethane	0.0250	0.0266	0.0258	106	103	80.0-120			2.74	20
Trichloroethene	0.0250	0.0251	0.0252	100	101	78.0-124			0.702	20
1,2,4-Trimethylbenzene	0.0250	0.0243	0.0258	97.1	103	76.0-121			6.01	20
1,3,5-Trimethylbenzene	0.0250	0.0227	0.0238	90.9	95.1	76.0-122			4.54	20
Vinyl chloride	0.0250	0.0219	0.0219	87.6	87.6	67.0-131			0.0744	20
Xylenes, Total	0.0750	0.0742	0.0801	98.9	107	79.0-123			7.65	20
o-Xylene	0.0250	0.0249	0.0270	99.5	108	80.0-122			8.32	20
m&p-Xylenes	0.0500	0.0493	0.0531	98.6	106	80.0-122			7.33	20
(S) Toluene-d8				*112*	*106*	*80.0-120*				
(S) Dibromofluoromethane				*104*	*104*	*75.0-120*				
(S) 4-Bromofluorobenzene				*101*	*102*	*77.0-126*				

Method Blank (MB)

(MB) R3349725-3 10/10/18 22:57

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

QUALITY CONTROL SUMMARY

L1031730-11

Method Blank (MB)

(MB) R3349725-3 10/10/18 22:57

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*102*			*80.0-120*
(S) Dibromofluoromethane	*95.3*			*75.0-120*
(S) 4-Bromofluorobenzene	*99.2*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349725-1 10/10/18 21:39 • (LCSD) R3349725-2 10/10/18 21:58

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.125	0.133	100	107	19.0-160			6.19	27
Benzene	0.0250	0.0223	0.0223	89.1	89.2	70.0-123			0.0222	20
Bromodichloromethane	0.0250	0.0222	0.0226	88.9	90.3	75.0-120			1.51	20
Bromoform	0.0250	0.0228	0.0233	91.2	93.1	68.0-132			2.11	20
Bromomethane	0.0250	0.0130	0.0148	51.9	59.2	10.0-160			13.2	25
n-Butylbenzene	0.0250	0.0243	0.0245	97.1	97.9	73.0-125			0.863	20
sec-Butylbenzene	0.0250	0.0244	0.0252	97.7	101	75.0-125			2.99	20
Carbon disulfide	0.0250	0.0208	0.0209	83.4	83.6	61.0-128			0.278	20
Carbon tetrachloride	0.0250	0.0210	0.0216	83.9	86.4	68.0-126			2.99	20
Chlorobenzene	0.0250	0.0246	0.0247	98.3	99.0	80.0-121			0.711	20
Chlorodibromomethane	0.0250	0.0233	0.0233	93.4	93.3	77.0-125			0.100	20
Chloroethane	0.0250	0.0253	0.0250	101	100	47.0-150			1.28	20
Chloroform	0.0250	0.0205	0.0210	81.9	83.9	73.0-120			2.48	20
Chloromethane	0.0250	0.0280	0.0284	112	114	41.0-142			1.63	20
1,2-Dibromoethane	0.0250	0.0240	0.0243	96.0	97.3	80.0-122			1.35	20
1,1-Dichloroethane	0.0250	0.0252	0.0255	101	102	70.0-126			1.04	20
1,2-Dichloroethane	0.0250	0.0231	0.0239	92.3	95.5	70.0-128			3.41	20
1,1-Dichloroethene	0.0250	0.0221	0.0221	88.3	88.5	71.0-124			0.256	20
cis-1,2-Dichloroethene	0.0250	0.0201	0.0202	80.6	80.8	73.0-120			0.312	20
trans-1,2-Dichloroethene	0.0250	0.0209	0.0204	83.5	81.7	73.0-120			2.21	20
1,2-Dichloropropane	0.0250	0.0279	0.0275	112	110	77.0-125			1.50	20
cis-1,3-Dichloropropene	0.0250	0.0245	0.0247	97.9	99.0	80.0-123			1.08	20
trans-1,3-Dichloropropene	0.0250	0.0246	0.0249	98.3	99.7	78.0-124			1.38	20

WG1179146

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1031730-11

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349725-1 10/10/18 21:39 • (LCSD) R3349725-2 10/10/18 21:58

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0241	0.0243	96.4	97.0	79.0-123			0.629	20
2-Hexanone	0.125	0.163	0.167	130	134	67.0-149			2.72	20
Isopropylbenzene	0.0250	0.0248	0.0248	99.1	99.1	76.0-127			0.000120	20
p-Isopropyltoluene	0.0250	0.0241	0.0240	96.4	96.0	76.0-125			0.467	20
2-Butanone (MEK)	0.125	0.145	0.151	116	121	44.0-160			4.04	20
Methylene Chloride	0.0250	0.0199	0.0202	79.7	80.7	67.0-120			1.31	20
4-Methyl-2-pentanone (MIBK)	0.125	0.154	0.158	123	126	68.0-142			2.30	20
Methyl tert-butyl ether	0.0250	0.0214	0.0220	85.5	87.9	68.0-125			2.74	20
Naphthalene	0.0250	0.0171	0.0190	68.6	76.1	54.0-135			10.5	20
n-Propylbenzene	0.0250	0.0234	0.0236	93.4	94.5	77.0-124			1.20	20
Styrene	0.0250	0.0246	0.0241	98.6	96.3	73.0-130			2.28	20
1,1,1,2-Tetrachloroethane	0.0250	0.0239	0.0238	95.6	95.0	75.0-125			0.583	20
1,1,2,2-Tetrachloroethane	0.0250	0.0215	0.0219	86.0	87.7	65.0-130			1.91	20
Tetrachloroethene	0.0250	0.0246	0.0250	98.6	100	72.0-132			1.66	20
Toluene	0.0250	0.0236	0.0238	94.4	95.4	79.0-120			1.04	20
1,1,1-Trichloroethane	0.0250	0.0221	0.0224	88.5	89.5	73.0-124			1.12	20
1,1,2-Trichloroethane	0.0250	0.0230	0.0235	91.8	93.9	80.0-120			2.21	20
Trichloroethene	0.0250	0.0251	0.0245	100	97.9	78.0-124			2.56	20
1,2,4-Trimethylbenzene	0.0250	0.0234	0.0239	93.6	95.7	76.0-121			2.28	20
1,3,5-Trimethylbenzene	0.0250	0.0238	0.0242	95.4	96.6	76.0-122			1.31	20
Vinyl chloride	0.0250	0.0265	0.0266	106	107	67.0-131			0.477	20
Xylenes, Total	0.0750	0.0735	0.0728	98.0	97.1	79.0-123			0.957	20
o-Xylene	0.0250	0.0244	0.0241	97.5	96.6	80.0-122			0.953	20
m&p-Xylenes	0.0500	0.0491	0.0487	98.2	97.3	80.0-122			0.921	20
(S) Toluene-d8				*104*	*107*	*80.0-120*				
(S) Dibromofluoromethane				*91.6*	*94.5*	*75.0-120*				
(S) 4-Bromofluorobenzene				*96.6*	*98.7*	*77.0-126*				

WG1177386

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L1031730-01,02,03,04,05,06,07,08,09,10

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348846-1 10/08/18 12:22

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*65.5*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348846-2 10/08/18 12:42 • (LCSD) R3348846-3 10/08/18 13:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.33	1.38	88.7	92.0	50.0-150			3.69	20
(S) o-Terphenyl				*90.5*	*91.0*	*31.0-160*				

WG1177735

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L1031730-11,12,13,14,15,17,18,19,20,21,22,23,24,25,26

Method Blank (MB)

(MB) R3349235-1 10/09/18 09:16

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*47.9*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349235-2 10/09/18 09:37 • (LCSD) R3349235-3 10/09/18 09:57

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.17	1.24	78.0	82.7	50.0-150			5.81	20
(S) o-Terphenyl				*85.5*	*96.5*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
O1	The analyte failed the method required serial dilution test and/or subsequent post-spike criteria. These failures indicate matrix interference.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
Q	Sample was prepared and/or analyzed past recommended holding time. Concentrations should be considered minimum values.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia [1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky [1,6]	90010
Kentucky [2]	16
Louisiana	AI30792
Louisiana [1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086
Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico [1]	n/a
New York	11742
North Carolina	Env375
North Carolina [1]	DW21704
North Carolina [3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee [1,4]	2006
Texas	T 104704245-17-14
Texas [5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

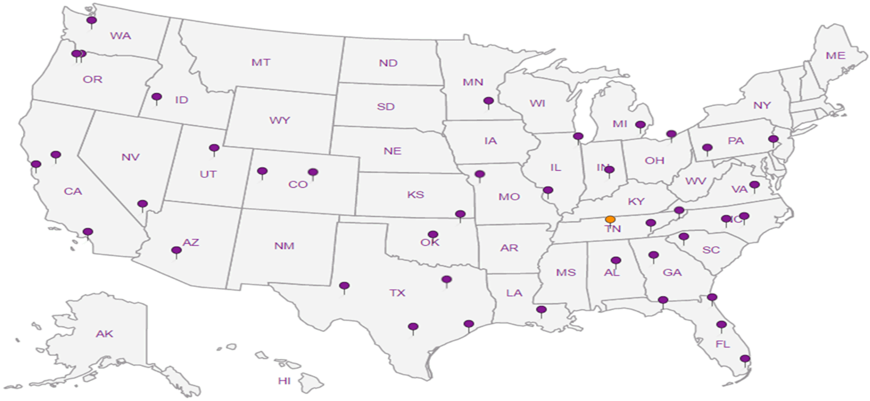
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01
A2LA – ISO 17025 [5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003
AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 1 of 5

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Pres Chk

L # L031730

G243

Acctnum: TRCATX
Template: T140422
Prelogin: P671812
TSR: 526
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
MW-85	Grab	GW				9	X	X	X	X	X	X	X	LNAPL				
MW-86	Grab	GW				10	X	X	X		X	X	X	X	X	LNAPL		
MW-120	Grab	GW				9	X	X	X	X	X	X	X					
MW-121	Grab	GW				9	X	X	X	X	X	X	X					
MW-84	Grab	GW				9	X	X	X	X	X	X	X					
MW-122	Grab	GW				9	X	X	X	X	X	X	X					
MW-79	Grab	GW				9	X	X	X	X	X	X	X					
MW-74	Grab	GW				9	X	X	X	X	X	X	X					
MW-2A	Grab	GW				9	X	X	X	X	X	X	X					
OCD-6	Grab	GW				9	X	X	X	X	X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR 2	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-1=0.3k °C Bottles Received: 146	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 8:45	Hold: Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
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Chain of Custody Page 2 of 5

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **EP Fall 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-EP**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **EP (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Immediately Packed on Ice N ___ Y ✓
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Quote #
Date Results Needed

L # 4031730
Table #
Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671812**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	Pres Chk / No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
										<2			<2					
~~OCD-7AR~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
MW-76	Grab	GW		10-2-18	1725	9	X	X	X	X	X	X	X					-01
~~MW-75~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
MW-83	Grab	GW		10-2-18	1645	9	X	X	X	X	X	X	X					-02
MW-3	Grab	GW		↓	1550	9	X	X	X	X	X	X	X					-03
MW-88	Grab	GW			1255	7	X	X	X	X								-04
MW-22A	Grab	GW			1345	9	X	X	X	X	X	X	X					-05
MW-10	Grab	GW			1430	9	X	X	X	X	X	X	X					-06
MW-123	Grab	GW			1515	9	X	X	X	X	X	X	X					-07
MW-4A	Grab	GW			1210	9	X	X	X	X	X	X	X					-08

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR 2	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-1=0.3 °C	Bottles Received: 146
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18	Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
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Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 3 of 5

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Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Fall 2018**

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Phone: **512-684-3170**
Fax:

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Lab Project # **TRCATX-EP**

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Site/Facility ID # **EP (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Pres Chk

Analysis / Container / Preservative

L# L031730
Table #
Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671812**
TSR: **526**
PB:
Shipped Via:

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3 <2	Cations (from "total metals" bottle)	Anions, TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4 <2	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
MW-5A	Grab	GW		10-2-18	1115	9	X	X	X	X	X	X	X					-09
MW-7A	Grab	GW			1005	9	X	X	X	X	X	X	X					-10
OCD-8A	Grab	GW			910	10	X	X	X		X	X	X	X	X			-11
OCD-1R	Grab	GW			1435	9	X	X	X	X	X	X	X					-12
OCD-2A	Grab	GW			1520	7	X	X	X	X								-13
OCD-3	Grab	GW			1600	7	X	X	X	X								-14
OCD-4	Grab	GW			1640	7	X	X	X	X								-15
MW-11A	Grab	GW			1800	3					X	X	X					-16
OCD-5	Grab	GW			1720	9	X	X	X	X	X	X	X					-17
MW-87	Grab	GW		↓	910	7	X	X	X	X								-18

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR 2
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-.1=0.3 °C Bottles Received: 146
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 4 of 5

Pace Analytical®
National Center for Testing & Innovation
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**
Project Description: **EP Fall 2018**	City/State Collected: **Artesia, NM**
Phone: **512-684-3170** Fax:	Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-EP**	
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **EP (Navajo - Artesia)**
P.O. # **119503**	Quote #
Collected by (signature):	
Immediately Packed on Ice N___ Y ✓	

Rush? (Lab MUST Be Notified)
- ___ Same Day
- ___ Next Day
- ___ Two Day
- ___ Three Day
- ___ Five Day
- ___ 5 Day (Rad Only)
- ___ 10 Day (Rad Only)

Date Results Needed

L# L031730
Table #
Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671812**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions, TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
Pres Chk										<2			<2					
MW-18A	Grab	GW		10-2-18	1000	8	X	X			X	X	X	X	X			-19
MW-70	Grab	GW			1045	7	X	X	X	X								-20
MW-124	Grab	GW			1130	9	X	X	X	X	X	X	X					-21
DUP-EP-01	Grab	GW			1000	9	X	X	X	X	X	X	X					-22
DUP-EP-02	Grab	GW			1100	9	X	X	X	X	X	X	X					-23
DUP-EP-03	Grab	GW			1200	9	X	X	X	X	X	X	X					-24
~~EB-EP-01~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
EB-EP-02	Grab	GW		10-2-18	1145	9	X	X	X	X	X	X	X					-25
EB-EP-03	Grab	GW		↓	1130	9	X	X	X	X	X	X	X					-26
~~EB-EP-04~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other____

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR 2	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-.1=0.3 °C	Bottles Received: 146
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18	Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Pres Chk

Analysis / Container / Preservative

Chain of Custody Page 5 of 5

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

L # L1031730
Table #
Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671812**
TSR: **526**
PB:
Shipped Via:

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~Trip Blank-EP-01~~	~~Grab~~	~~GW~~				~~1~~										X		
Trip Blank-EP-02	Grab	GW		10-2-18	—	1										X		-27
Trip Blank-EP-03	Grab	GW		10-2-18	—	1										X		-28

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)
Date: 10-3-18 Time: 700
Received by: (Signature)
Trip Blank Received: [✓ Yes] / No
HCL / MeoH
TBR
2

Relinquished by : (Signature)
Date: Time:
Received by: (Signature)
Temp: 0.4-.1=0.3 °C Bottles Received: 1 2/6

If preservation required by Login: Date/Time

Relinquished by : (Signature)
Date: Time:
Received for lab by: (Signature)
Date: 10/4/18 Time: 8:45

Hold:

Condition: NCF / [✓ OK]

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ANALYTICAL REPORT

October 16, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L1031734
Samples Received:	10/04/2018
Project Number:	294318.0000.0000.
Description:	REST Fall 2018
Site:	REST - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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MW-113 L1031734-01 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 13:35	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 15:44	10/10/18 15:44	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 12:32	10/09/18 12:32	MAJ
Wet Chemistry by Method 9056A	WG1176341	10	10/09/18 12:49	10/09/18 12:49	MAJ
Wet Chemistry by Method 9056A	WG1176341	20	10/09/18 17:03	10/09/18 17:03	MAJ
Metals (ICPMS) by Method 6020	WG1176330	1	10/09/18 15:20	10/10/18 22:59	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 13:34	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 19:18	10/07/18 19:18	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	1	10/05/18 07:44	10/05/18 07:44	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 15:21	TH

KWB-7 L1031734-02 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 09:20	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 15:47	10/10/18 15:47	JER
Wet Chemistry by Method 4500CN E-2011	WG1176533	1	10/06/18 11:29	10/08/18 14:43	KK
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 13:06	10/09/18 13:06	MAJ
Wet Chemistry by Method 9056A	WG1176341	20	10/09/18 13:23	10/09/18 13:23	MAJ
Mercury by Method 7470A	WG1176292	1	10/05/18 10:01	10/07/18 07:43	EL
Metals (ICP) by Method 6010B	WG1176325	1	10/06/18 13:26	10/07/18 15:29	CCE
Metals (ICPMS) by Method 6020	WG1176330	1	10/09/18 15:20	10/10/18 23:18	JDG
Metals (ICPMS) by Method 6020	WG1176330	1	10/09/18 15:20	10/11/18 11:24	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 13:39	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	1	10/05/18 08:04	10/05/18 08:04	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 15:41	TH

MW-135 L1031734-03 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:20	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	20	10/10/18 15:50	10/10/18 15:50	JER
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 14:13	10/09/18 14:13	MAJ
Wet Chemistry by Method 9056A	WG1176341	20	10/09/18 14:30	10/09/18 14:30	MAJ
Wet Chemistry by Method 9056A	WG1176341	50	10/09/18 17:20	10/09/18 17:20	MAJ
Metals (ICPMS) by Method 6020	WG1176330	2	10/09/18 15:20	10/10/18 23:22	JDG
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 13:16	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 20:00	10/07/18 20:00	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	1	10/05/18 08:24	10/05/18 08:24	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 16:01	TH

KWB-11A L1031734-04 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:30	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 15:52	10/10/18 15:52	JER
Wet Chemistry by Method 4500CN E-2011	WG1176533	1	10/06/18 11:29	10/08/18 14:45	KK
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 14:47	10/09/18 14:47	MAJ
Wet Chemistry by Method 9056A	WG1176341	20	10/09/18 15:04	10/09/18 15:04	MAJ
Mercury by Method 7470A	WG1176292	1	10/05/18 10:01	10/07/18 07:45	EL

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

KWB-11A L1031734-04 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:30	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICP) by Method 6010B	WG1176325	1	10/06/18 13:26	10/07/18 15:32	CCE
Metals (ICPMS) by Method 6020	WG1176330	1	10/09/18 15:20	10/10/18 23:50	LAT
Metals (ICPMS) by Method 6020	WG1176330	1	10/09/18 15:20	10/11/18 11:28	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 13:56	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 20:23	10/07/18 20:23	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	1	10/05/18 08:44	10/05/18 08:44	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 16:22	TH

KWB-11B L1031734-05 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:15	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 15:53	10/10/18 15:53	JER
Wet Chemistry by Method 4500CN E-2011	WG1176533	1	10/06/18 11:29	10/08/18 14:48	KK
Wet Chemistry by Method 9056A	WG1176341	1	10/09/18 15:21	10/09/18 15:21	MAJ
Wet Chemistry by Method 9056A	WG1176341	20	10/09/18 15:38	10/09/18 15:38	MAJ
Mercury by Method 7470A	WG1176292	1	10/05/18 10:01	10/07/18 07:48	EL
Metals (ICP) by Method 6010B	WG1176325	1	10/06/18 13:26	10/07/18 15:35	CCE
Metals (ICPMS) by Method 6020	WG1176330	1	10/09/18 15:20	10/11/18 11:32	LAT
Metals (ICPMS) by Method 6020	WG1176330	2	10/09/18 15:20	10/10/18 23:54	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 14:01	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 20:46	10/07/18 20:46	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	1	10/05/18 09:05	10/05/18 09:05	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177735	1	10/08/18 17:04	10/09/18 16:42	TH

MW-136 L1031734-06 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:30	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	2	10/10/18 16:01	10/10/18 16:01	JER
Wet Chemistry by Method 4500CN E-2011	WG1177361	1	10/08/18 16:55	10/09/18 08:45	KK
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 02:47	10/09/18 02:47	MAJ
Wet Chemistry by Method 9056A	WG1176348	20	10/09/18 03:05	10/09/18 03:05	MAJ
Wet Chemistry by Method 9056A	WG1176348	50	10/09/18 20:32	10/09/18 20:32	MAJ
Mercury by Method 7470A	WG1176292	1	10/05/18 10:01	10/07/18 07:50	EL
Metals (ICP) by Method 6010B	WG1176325	1	10/06/18 13:26	10/07/18 15:44	CCE
Metals (ICPMS) by Method 6020	WG1176330	1	10/09/18 15:20	10/11/18 11:36	LAT
Metals (ICPMS) by Method 6020	WG1176330	2	10/09/18 15:20	10/10/18 23:59	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 14:06	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 21:10	10/07/18 21:10	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	1	10/05/18 09:25	10/05/18 09:25	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 16:56	SHG

MW-126A L1031734-07 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:15	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 16:02	10/10/18 16:02	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 03:23	10/09/18 03:23	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 03:41	10/09/18 03:41	MAJ

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-126A L1031734-07 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:15	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Wet Chemistry by Method 9056A	WG1176348	20	10/09/18 20:51	10/09/18 20:51	MAJ
Metals (ICPMS) by Method 6020	WG1176330	2	10/09/18 15:20	10/11/18 00:04	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 14:10	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177198	1	10/07/18 21:33	10/07/18 21:33	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	1	10/05/18 09:45	10/05/18 09:45	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 17:14	SHG

MW-126B L1031734-08 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:55	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 16:04	10/10/18 16:04	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 04:00	10/09/18 04:00	MAJ
Wet Chemistry by Method 9056A	WG1176348	20	10/09/18 04:18	10/09/18 04:18	MAJ
Wet Chemistry by Method 9056A	WG1176348	50	10/09/18 21:09	10/09/18 21:09	MAJ
Metals (ICPMS) by Method 6020	WG1176330	2	10/09/18 15:20	10/11/18 00:08	LAT
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 01:30	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 14:15	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 13:18	10/08/18 13:18	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	1	10/05/18 10:06	10/05/18 10:06	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 17:31	SHG

MW-127 L1031734-09 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:35	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 16:05	10/10/18 16:05	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 04:36	10/09/18 04:36	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 05:30	10/09/18 05:30	MAJ
Metals (ICPMS) by Method 6020	WG1176330	2	10/09/18 15:20	10/11/18 00:13	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 14:19	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 13:39	10/08/18 13:39	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	20	10/05/18 10:26	10/05/18 10:26	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 17:48	SHG

KWB-1A L1031734-10 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 09:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177172	1	10/09/18 15:55	10/09/18 16:21	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 16:07	10/10/18 16:07	JER
Wet Chemistry by Method 4500CN E-2011	WG1177361	1	10/08/18 16:55	10/09/18 08:46	KK
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 05:49	10/09/18 05:49	MAJ
Wet Chemistry by Method 9056A	WG1176348	20	10/09/18 06:07	10/09/18 06:07	MAJ
Wet Chemistry by Method 9056A	WG1176348	50	10/09/18 21:27	10/09/18 21:27	MAJ
Mercury by Method 7470A	WG1176292	1	10/05/18 10:01	10/07/18 07:53	EL
Metals (ICP) by Method 6010B	WG1176325	1	10/06/18 13:26	10/07/18 15:47	CCE
Metals (ICPMS) by Method 6020	WG1176330	1	10/09/18 15:20	10/11/18 11:40	LAT
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 00:18	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 14:24	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179145	1	10/11/18 02:51	10/11/18 02:51	RAS

KWB-1A L1031734-10 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 09:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 18:06	SHG

KWB-10R L1031734-11 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 09:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 16:08	10/10/18 16:08	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 06:25	10/09/18 06:25	MAJ
Wet Chemistry by Method 9056A	WG1176348	5	10/09/18 06:43	10/09/18 06:43	MAJ
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 00:23	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 14:28	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	250	10/05/18 13:53	10/05/18 13:53	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 18:23	SHG

KWB-5 L1031734-12 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 14:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 16:10	10/10/18 16:10	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 07:01	10/09/18 07:01	MAJ
Wet Chemistry by Method 9056A	WG1176348	20	10/09/18 07:19	10/09/18 07:19	MAJ
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 00:28	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 14:33	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	250	10/05/18 14:14	10/05/18 14:14	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 18:41	SHG

MW-111 L1031734-13 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 13:50	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 16:11	10/10/18 16:11	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 07:38	10/09/18 07:38	MAJ
Wet Chemistry by Method 9056A	WG1176348	20	10/09/18 07:56	10/09/18 07:56	MAJ
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 00:54	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 14:56	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 14:00	10/08/18 14:00	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	25	10/05/18 14:34	10/05/18 14:34	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 18:58	SHG

MW-104 L1031734-14 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:05	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	50	10/10/18 16:14	10/10/18 16:14	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 08:14	10/09/18 08:14	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 21:45	10/09/18 21:45	MAJ
Wet Chemistry by Method 9056A	WG1176348	5	10/09/18 10:03	10/09/18 10:03	MAJ
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 00:58	LAT

SAMPLE SUMMARY

MW-104 L1031734-14 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:05	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 15:00	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 14:21	10/08/18 14:21	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	1	10/05/18 14:54	10/05/18 14:54	JCP
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179145	5	10/11/18 03:10	10/11/18 03:10	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 19:15	SHG

MW-64 L1031734-15 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 09:25	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	50	10/10/18 16:22	10/10/18 16:22	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 10:39	10/09/18 10:39	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 10:57	10/09/18 10:57	MAJ
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 01:03	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 15:05	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1179105	100	10/10/18 20:57	10/10/18 20:57	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	20	10/05/18 15:15	10/05/18 15:15	JCP
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179145	500	10/11/18 03:30	10/11/18 03:30	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 19:33	SHG

MW-65 L1031734-16 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 11:35	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	1	10/10/18 16:23	10/10/18 16:23	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 11:16	10/09/18 11:16	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 11:34	10/09/18 11:34	MAJ
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 01:07	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 15:09	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	5	10/08/18 15:02	10/08/18 15:02	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	100	10/05/18 15:35	10/05/18 15:35	JCP
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179145	50	10/11/18 03:49	10/11/18 03:49	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 21:17	SHG

MW-102 L1031734-17 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:25	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	50	10/10/18 16:28	10/10/18 16:28	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 11:52	10/09/18 11:52	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 12:46	10/09/18 12:46	MAJ
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 01:12	LAT
Metals (ICPMS) by Method 6020	WG1179423	5	10/11/18 11:24	10/11/18 16:03	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	100	10/08/18 15:23	10/08/18 15:23	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	500	10/05/18 15:55	10/05/18 15:55	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	5	10/09/18 09:29	10/10/18 12:02	SHG

MW-28 L1031734-18 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 13:15	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	50	10/10/18 16:29	10/10/18 16:29	JER
Wet Chemistry by Method 4500CN E-2011	WG1177361	1	10/08/18 16:55	10/09/18 08:47	KK
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 13:05	10/09/18 13:05	MAJ
Wet Chemistry by Method 9056A	WG1176348	5	10/09/18 13:59	10/09/18 13:59	MAJ
Wet Chemistry by Method 9056A	WG1178750	20	10/10/18 21:52	10/10/18 21:52	MAJ
Mercury by Method 7470A	WG1176292	1	10/05/18 10:01	10/07/18 08:00	EL
Metals (ICP) by Method 6010B	WG1176325	1	10/06/18 13:26	10/07/18 15:50	CCE
Metals (ICPMS) by Method 6020	WG1176330	1	10/09/18 15:20	10/11/18 11:44	LAT
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 01:17	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 15:19	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 15:44	10/08/18 15:44	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179145	20	10/11/18 04:09	10/11/18 04:09	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 21:52	SHG

MW-61 L1031734-19 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 14:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	50	10/10/18 16:31	10/10/18 16:31	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 14:35	10/09/18 14:35	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 14:54	10/09/18 14:54	MAJ
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 01:21	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 15:23	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	20	10/08/18 16:05	10/08/18 16:05	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	50	10/05/18 16:36	10/05/18 16:36	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 22:09	SHG

MW-62 L1031734-20 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 15:30	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177173	1	10/09/18 16:22	10/09/18 16:56	MMF
Wet Chemistry by Method 353.2	WG1178387	50	10/10/18 16:32	10/10/18 16:32	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 15:12	10/09/18 15:12	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 15:30	10/09/18 15:30	MAJ
Metals (ICPMS) by Method 6020	WG1176330	5	10/09/18 15:20	10/11/18 01:26	LAT
Metals (ICPMS) by Method 6020	WG1179423	1	10/11/18 11:24	10/11/18 15:28	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	100	10/08/18 16:25	10/08/18 16:25	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176275	100	10/05/18 16:56	10/05/18 16:56	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 22:27	SHG

MW-98 L1031734-21 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 13:55	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	50	10/10/18 19:35	10/10/18 19:35	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 16:24	10/09/18 16:24	MAJ
Wet Chemistry by Method 9056A	WG1176348	20	10/09/18 22:21	10/09/18 22:21	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 19:23	LD
Metals (ICPMS) by Method 6020	WG1176332	5	10/09/18 10:38	10/09/18 21:53	LD

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-98 L1031734-21 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 13:55	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	100	10/08/18 16:46	10/08/18 16:46	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	50	10/05/18 08:00	10/05/18 08:00	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 22:44	SHG

MW-50 L1031734-22 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:50	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	1	10/10/18 18:56	10/10/18 18:56	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 17:01	10/09/18 17:01	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 17:19	10/09/18 17:19	MAJ
Wet Chemistry by Method 9056A	WG1176348	50	10/09/18 22:40	10/09/18 22:40	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 19:28	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	1	10/05/18 08:20	10/05/18 08:20	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 23:02	SHG

MW-91 L1031734-23 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	50	10/10/18 18:58	10/10/18 18:58	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 17:37	10/09/18 17:37	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 18:26	10/09/18 18:26	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 19:33	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	100	10/08/18 17:07	10/08/18 17:07	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	100	10/05/18 08:39	10/05/18 08:39	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	5	10/09/18 09:29	10/10/18 12:19	SHG

MW-90 L1031734-24 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:40	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	10	10/10/18 18:59	10/10/18 18:59	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 18:43	10/09/18 18:43	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 19:02	10/09/18 19:02	MAJ
Wet Chemistry by Method 9056A	WG1176348	20	10/09/18 22:58	10/09/18 22:58	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 19:37	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1179105	1	10/10/18 21:38	10/10/18 21:38	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	1	10/05/18 08:59	10/05/18 08:59	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	1	10/09/18 09:29	10/09/18 19:50	SHG

MW-96 L1031734-25 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 13:15	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	10	10/10/18 19:01	10/10/18 19:01	JER
Wet Chemistry by Method 9056A	WG1176348	1	10/09/18 19:20	10/09/18 19:20	MAJ
Wet Chemistry by Method 9056A	WG1176348	10	10/09/18 19:38	10/09/18 19:38	MAJ

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-96 L1031734-25 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 13:15	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 19:42	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	100	10/08/18 17:48	10/08/18 17:48	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	1000	10/05/18 09:19	10/05/18 09:19	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177736	5	10/09/18 09:29	10/10/18 11:44	SHG

MW-67 L1031734-26 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 14:15	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	1	10/10/18 19:02	10/10/18 19:02	JER
Wet Chemistry by Method 4500CN E-2011	WG1177361	1	10/08/18 16:55	10/09/18 08:55	KK
Wet Chemistry by Method 9056A	WG1176351	1	10/09/18 00:21	10/09/18 00:21	ELN
Wet Chemistry by Method 9056A	WG1176351	10	10/09/18 00:35	10/09/18 00:35	ELN
Mercury by Method 7470A	WG1176292	1	10/05/18 10:01	10/07/18 08:02	EL
Metals (ICP) by Method 6010B	WG1176325	1	10/06/18 13:26	10/07/18 15:53	CCE
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 19:47	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 18:09	10/08/18 18:09	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	5	10/05/18 09:39	10/05/18 09:39	TJJ
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179746	1	10/11/18 17:15	10/11/18 17:15	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 00:29	SHG

DUP-REST-01 L1031734-27 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	1	10/10/18 19:04	10/10/18 19:04	JER
Wet Chemistry by Method 9056A	WG1176351	1	10/09/18 00:50	10/09/18 00:50	ELN
Wet Chemistry by Method 9056A	WG1176351	10	10/09/18 01:04	10/09/18 01:04	ELN
Wet Chemistry by Method 9056A	WG1178750	20	10/10/18 22:02	10/10/18 22:02	MAJ
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 20:15	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 18:30	10/08/18 18:30	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	1	10/05/18 09:59	10/05/18 09:59	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 00:46	SHG

DUP-REST-02 L1031734-28 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 12:00	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	10	10/10/18 19:05	10/10/18 19:05	JER
Wet Chemistry by Method 9056A	WG1176351	1	10/09/18 01:18	10/09/18 01:18	ELN
Wet Chemistry by Method 9056A	WG1176351	10	10/09/18 01:33	10/09/18 01:33	ELN
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 20:20	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 18:50	10/08/18 18:50	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	5	10/05/18 10:19	10/05/18 10:19	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 01:04	SHG

SAMPLE SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

EB-REST-01 L1031734-29 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 13:45	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	1	10/10/18 19:07	10/10/18 19:07	JER
Wet Chemistry by Method 9056A	WG1176351	1	10/09/18 02:16	10/09/18 02:16	ELN
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 20:25	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 19:11	10/08/18 19:11	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	1	10/05/18 10:39	10/05/18 10:39	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 01:21	SHG

EB-REST-02 L1031734-30 GW

Collected by	Collected date/time	Received date/time
SU/HMI Team	10/02/18 10:25	10/04/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1177175	1	10/09/18 17:44	10/09/18 18:11	MMF
Wet Chemistry by Method 353.2	WG1178390	1	10/10/18 19:08	10/10/18 19:08	JER
Wet Chemistry by Method 9056A	WG1176351	1	10/09/18 02:59	10/09/18 02:59	ELN
Metals (ICPMS) by Method 6020	WG1176332	1	10/09/18 10:38	10/09/18 20:29	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 19:32	10/08/18 19:32	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1176278	1	10/05/18 10:59	10/05/18 10:59	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 01:38	SHG

CASE NARRATIVE

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Project Manager

MW-113

Collected date/time: 10/02/18 13:35

SAMPLE RESULTS - 01

L1031734

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2010		14.1	50.0	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 15:44	WG1178387

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	177		0.519	10.0	10	10/09/2018 12:49	WG1176341
Fluoride	0.499		0.00990	0.100	1	10/09/2018 12:32	WG1176341
Sulfate	1060		1.55	100	20	10/09/2018 17:03	WG1176341

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00240		0.000250	0.00200	1	10/10/2018 22:59	WG1176330
Barium	0.0200		0.000360	0.00500	1	10/11/2018 13:34	WG1179423
Calcium	309	V	0.0460	1.00	1	10/10/2018 22:59	WG1176330
Chromium	U		0.000540	0.00200	1	10/10/2018 22:59	WG1176330
Iron	0.487		0.0150	0.100	1	10/10/2018 22:59	WG1176330
Lead	U		0.000240	0.00200	1	10/10/2018 22:59	WG1176330
Manganese	1.06	V	0.000250	0.00500	1	10/10/2018 22:59	WG1176330
Potassium	0.557	B J	0.0370	1.00	1	10/10/2018 22:59	WG1176330
Selenium	U		0.000380	0.00200	1	10/10/2018 22:59	WG1176330
Sodium	156	V	0.110	1.00	1	10/10/2018 22:59	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.285		0.0314	0.100	1	10/07/2018 19:18	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.8*			*78.0-120*		*10/07/2018 19:18*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 07:44	WG1176275
Benzene	0.00182		0.000331	0.00100	1	10/05/2018 07:44	WG1176275
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 07:44	WG1176275
Bromoform	U		0.000469	0.00100	1	10/05/2018 07:44	WG1176275
Bromomethane	U		0.000866	0.00500	1	10/05/2018 07:44	WG1176275
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 07:44	WG1176275
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 07:44	WG1176275
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 07:44	WG1176275
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 07:44	WG1176275
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 07:44	WG1176275
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 07:44	WG1176275
Chloroethane	U	J4	0.000453	0.00500	1	10/05/2018 07:44	WG1176275
Chloroform	U		0.000324	0.00500	1	10/05/2018 07:44	WG1176275
Chloromethane	U		0.000276	0.00250	1	10/05/2018 07:44	WG1176275
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 07:44	WG1176275
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 07:44	WG1176275

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 07:44	WG1176275
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 07:44	WG1176275
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 07:44	WG1176275
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 07:44	WG1176275
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 07:44	WG1176275
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 07:44	WG1176275
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 07:44	WG1176275
Ethylbenzene	0.00885		0.000384	0.00100	1	10/05/2018 07:44	WG1176275
Isopropylbenzene	0.000671	J	0.000326	0.00100	1	10/05/2018 07:44	WG1176275
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 07:44	WG1176275
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 07:44	WG1176275
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 07:44	WG1176275
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 07:44	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 07:44	WG1176275
Methyl tert-butyl ether	0.0128		0.000367	0.00100	1	10/05/2018 07:44	WG1176275
Naphthalene	U		0.00100	0.00500	1	10/05/2018 07:44	WG1176275
n-Propylbenzene	0.000882	J	0.000349	0.00100	1	10/05/2018 07:44	WG1176275
Styrene	U		0.000307	0.00100	1	10/05/2018 07:44	WG1176275
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 07:44	WG1176275
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 07:44	WG1176275
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 07:44	WG1176275
Toluene	U		0.000412	0.00100	1	10/05/2018 07:44	WG1176275
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 07:44	WG1176275
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 07:44	WG1176275
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 07:44	WG1176275
1,2,4-Trimethylbenzene	0.00393		0.000373	0.00100	1	10/05/2018 07:44	WG1176275
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 07:44	WG1176275
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 07:44	WG1176275
o-Xylene	U		0.000341	0.00100	1	10/05/2018 07:44	WG1176275
m&p-Xylene	0.00867		0.000719	0.00200	1	10/05/2018 07:44	WG1176275
Xylenes, Total	0.00867		0.00106	0.00300	1	10/05/2018 07:44	WG1176275
(S) Toluene-d8	*98.2*			*80.0-120*		*10/05/2018 07:44*	WG1176275
(S) Dibromofluoromethane	*112*			*75.0-120*		*10/05/2018 07:44*	WG1176275
(S) 4-Bromofluorobenzene	*116*			*77.0-126*		*10/05/2018 07:44*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.100	J	0.0247	0.100	1	10/09/2018 15:21	WG1177735
(S) o-Terphenyl	*58.4*			*31.0-160*		*10/09/2018 15:21*	WG1177735

KWB-7

Collected date/time: 10/02/18 09:20

SAMPLE RESULTS - 02

L1031734

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2630		14.1	50.0	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U	J6	0.0197	0.100	1	10/10/2018 15:47	WG1178387

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U	P1	0.00180	0.00500	1	10/08/2018 14:43	WG1176533

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	360		1.04	20.0	20	10/09/2018 13:23	WG1176341
Fluoride	0.754		0.00990	0.100	1	10/09/2018 13:06	WG1176341
Sulfate	1120		1.55	100	20	10/09/2018 13:23	WG1176341

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.000134	J	0.0000490	0.000200	1	10/07/2018 07:43	WG1176292

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.491		0.0126	0.200	1	10/07/2018 15:29	WG1176325

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.000371	J	0.000250	0.00200	1	10/10/2018 23:18	WG1176330
Barium	0.0513		0.000360	0.00500	1	10/11/2018 13:39	WG1179423
Cadmium	U		0.000160	0.00100	1	10/11/2018 11:24	WG1176330
Calcium	326		0.0460	1.00	1	10/10/2018 23:18	WG1176330
Chromium	0.000570	J	0.000540	0.00200	1	10/10/2018 23:18	WG1176330
Cobalt	0.000457	J	0.000260	0.00200	1	10/10/2018 23:18	WG1176330
Iron	0.432		0.0150	0.100	1	10/10/2018 23:18	WG1176330
Lead	0.000317	J	0.000240	0.00200	1	10/10/2018 23:18	WG1176330
Manganese	2.55		0.000250	0.00500	1	10/10/2018 23:18	WG1176330
Nickel	0.00144	J	0.000350	0.00200	1	10/10/2018 23:18	WG1176330
Potassium	0.419	B J	0.0370	1.00	1	10/10/2018 23:18	WG1176330
Selenium	U		0.000380	0.00200	1	10/10/2018 23:18	WG1176330
Sodium	248		0.110	1.00	1	10/10/2018 23:18	WG1176330
Uranium	0.00120	J	0.000330	0.0100	1	10/10/2018 23:18	WG1176330
Vanadium	0.00118	B J	0.000180	0.00500	1	10/10/2018 23:18	WG1176330

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 08:04	WG1176275
Benzene	0.0247		0.000331	0.00100	1	10/05/2018 08:04	WG1176275
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 08:04	WG1176275
Bromoform	U		0.000469	0.00100	1	10/05/2018 08:04	WG1176275
Bromomethane	U		0.000866	0.00500	1	10/05/2018 08:04	WG1176275
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 08:04	WG1176275
sec-Butylbenzene	0.00314		0.000365	0.00100	1	10/05/2018 08:04	WG1176275
Carbon disulfide	0.00891		0.000275	0.00100	1	10/05/2018 08:04	WG1176275
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 08:04	WG1176275
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 08:04	WG1176275
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 08:04	WG1176275
Chloroethane	U	J4	0.000453	0.00500	1	10/05/2018 08:04	WG1176275
Chloroform	U		0.000324	0.00500	1	10/05/2018 08:04	WG1176275
Chloromethane	U		0.000276	0.00250	1	10/05/2018 08:04	WG1176275
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 08:04	WG1176275
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 08:04	WG1176275
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 08:04	WG1176275
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 08:04	WG1176275
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 08:04	WG1176275
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 08:04	WG1176275
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 08:04	WG1176275
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 08:04	WG1176275
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 08:04	WG1176275
Ethylbenzene	0.00178		0.000384	0.00100	1	10/05/2018 08:04	WG1176275
Isopropylbenzene	0.00504		0.000326	0.00100	1	10/05/2018 08:04	WG1176275
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 08:04	WG1176275
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 08:04	WG1176275
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 08:04	WG1176275
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 08:04	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 08:04	WG1176275
Methyl tert-butyl ether	0.00928		0.000367	0.00100	1	10/05/2018 08:04	WG1176275
Naphthalene	U		0.00100	0.00500	1	10/05/2018 08:04	WG1176275
n-Propylbenzene	0.00333		0.000349	0.00100	1	10/05/2018 08:04	WG1176275
Styrene	U		0.000307	0.00100	1	10/05/2018 08:04	WG1176275
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 08:04	WG1176275
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 08:04	WG1176275
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 08:04	WG1176275
Toluene	U		0.000412	0.00100	1	10/05/2018 08:04	WG1176275
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 08:04	WG1176275
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 08:04	WG1176275
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 08:04	WG1176275
1,2,4-Trimethylbenzene	0.00186		0.000373	0.00100	1	10/05/2018 08:04	WG1176275
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 08:04	WG1176275
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 08:04	WG1176275
o-Xylene	U		0.000341	0.00100	1	10/05/2018 08:04	WG1176275
m&p-Xylene	0.00156	J	0.000719	0.00200	1	10/05/2018 08:04	WG1176275
Xylenes, Total	0.00156	J	0.00106	0.00300	1	10/05/2018 08:04	WG1176275
(S) Toluene-d8	*95.0*			*80.0-120*		*10/05/2018 08:04*	WG1176275
(S) Dibromofluoromethane	*116*			*75.0-120*		*10/05/2018 08:04*	WG1176275
(S) 4-Bromofluorobenzene	*115*			*77.0-126*		*10/05/2018 08:04*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.444		0.0247	0.100	1	10/09/2018 15:41	WG1177735
(S) o-Terphenyl	*75.3*			*31.0-160*		*10/09/2018 15:41*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5070		28.2	100	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	35.9		0.394	2.00	20	10/10/2018 15:50	WG1178387

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	716		1.04	20.0	20	10/09/2018 14:30	WG1176341
Fluoride	0.985		0.00990	0.100	1	10/09/2018 14:13	WG1176341
Sulfate	2730		3.87	250	50	10/09/2018 17:20	WG1176341

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00335	J	0.000500	0.00400	2	10/10/2018 23:22	WG1176330
Barium	0.0422		0.000360	0.00500	1	10/11/2018 13:16	WG1179423
Calcium	484		0.0920	2.00	2	10/10/2018 23:22	WG1176330
Chromium	0.00276	J	0.00108	0.00400	2	10/10/2018 23:22	WG1176330
Iron	0.649		0.0300	0.200	2	10/10/2018 23:22	WG1176330
Lead	0.000966	J	0.000480	0.00400	2	10/10/2018 23:22	WG1176330
Manganese	0.0380		0.000500	0.0100	2	10/10/2018 23:22	WG1176330
Potassium	1.15	B J	0.0740	2.00	2	10/10/2018 23:22	WG1176330
Selenium	0.0298		0.000760	0.00400	2	10/10/2018 23:22	WG1176330
Sodium	573		0.220	2.00	2	10/10/2018 23:22	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 20:00	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*99.7*			*78.0-120*		*10/07/2018 20:00*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 08:24	WG1176275
Benzene	U		0.000331	0.00100	1	10/05/2018 08:24	WG1176275
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 08:24	WG1176275
Bromoform	U		0.000469	0.00100	1	10/05/2018 08:24	WG1176275
Bromomethane	U		0.000866	0.00500	1	10/05/2018 08:24	WG1176275
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 08:24	WG1176275
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 08:24	WG1176275
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 08:24	WG1176275
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 08:24	WG1176275
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 08:24	WG1176275
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 08:24	WG1176275
Chloroethane	U	J4	0.000453	0.00500	1	10/05/2018 08:24	WG1176275
Chloroform	U		0.000324	0.00500	1	10/05/2018 08:24	WG1176275
Chloromethane	U		0.000276	0.00250	1	10/05/2018 08:24	WG1176275
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 08:24	WG1176275
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 08:24	WG1176275

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 08:24	WG1176275
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 08:24	WG1176275
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 08:24	WG1176275
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 08:24	WG1176275
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 08:24	WG1176275
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 08:24	WG1176275
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 08:24	WG1176275
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 08:24	WG1176275
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 08:24	WG1176275
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 08:24	WG1176275
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 08:24	WG1176275
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 08:24	WG1176275
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 08:24	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 08:24	WG1176275
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 08:24	WG1176275
Naphthalene	U		0.00100	0.00500	1	10/05/2018 08:24	WG1176275
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 08:24	WG1176275
Styrene	U		0.000307	0.00100	1	10/05/2018 08:24	WG1176275
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 08:24	WG1176275
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 08:24	WG1176275
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 08:24	WG1176275
Toluene	U		0.000412	0.00100	1	10/05/2018 08:24	WG1176275
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 08:24	WG1176275
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 08:24	WG1176275
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 08:24	WG1176275
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 08:24	WG1176275
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 08:24	WG1176275
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 08:24	WG1176275
o-Xylene	U		0.000341	0.00100	1	10/05/2018 08:24	WG1176275
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 08:24	WG1176275
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 08:24	WG1176275
(S) Toluene-d8	*97.4*			*80.0-120*		*10/05/2018 08:24*	WG1176275
(S) Dibromofluoromethane	*115*			*75.0-120*		*10/05/2018 08:24*	WG1176275
(S) 4-Bromofluorobenzene	*118*			*77.0-126*		*10/05/2018 08:24*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0342	J	0.0247	0.100	1	10/09/2018 16:01	WG1177735
(S) o-Terphenyl	*51.1*			*31.0-160*		*10/09/2018 16:01*	WG1177735

KWB-11A

Collected date/time: 10/02/18 10:30

SAMPLE RESULTS - 04

L1031734

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3410		14.1	50.0	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0410	J	0.0197	0.100	1	10/10/2018 15:52	WG1178387

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/08/2018 14:45	WG1176533

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	786		1.04	20.0	20	10/09/2018 15:04	WG1176341
Fluoride	0.851		0.00990	0.100	1	10/09/2018 14:47	WG1176341
Sulfate	1220		1.55	100	20	10/09/2018 15:04	WG1176341

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.000140	J	0.0000490	0.000200	1	10/07/2018 07:45	WG1176292

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.423		0.0126	0.200	1	10/07/2018 15:32	WG1176325

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0487		0.000250	0.00200	1	10/10/2018 23:50	WG1176330
Barium	0.0379		0.000360	0.00500	1	10/11/2018 13:56	WG1179423
Cadmium	U		0.000160	0.00100	1	10/11/2018 11:28	WG1176330
Calcium	433		0.0460	1.00	1	10/10/2018 23:50	WG1176330
Chromium	U		0.000540	0.00200	1	10/10/2018 23:50	WG1176330
Cobalt	0.0143		0.000260	0.00200	1	10/10/2018 23:50	WG1176330
Iron	12.6		0.0150	0.100	1	10/10/2018 23:50	WG1176330
Lead	0.00226		0.000240	0.00200	1	10/10/2018 23:50	WG1176330
Manganese	1.98		0.000250	0.00500	1	10/10/2018 23:50	WG1176330
Nickel	0.00485		0.000350	0.00200	1	10/10/2018 23:50	WG1176330
Potassium	1.17	B	0.0370	1.00	1	10/10/2018 23:50	WG1176330
Selenium	0.00182	J	0.000380	0.00200	1	10/10/2018 23:50	WG1176330
Sodium	359		0.110	1.00	1	10/10/2018 23:50	WG1176330
Uranium	0.0119		0.000330	0.0100	1	10/10/2018 23:50	WG1176330
Vanadium	0.00855		0.000180	0.00500	1	10/10/2018 23:50	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.369		0.0314	0.100	1	10/07/2018 20:23	WG1177198

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/07/2018 20:23*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 08:44	WG1176275
Benzene	0.00333		0.000331	0.00100	1	10/05/2018 08:44	WG1176275
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 08:44	WG1176275
Bromoform	U		0.000469	0.00100	1	10/05/2018 08:44	WG1176275
Bromomethane	U		0.000866	0.00500	1	10/05/2018 08:44	WG1176275
n-Butylbenzene	0.000730	J	0.000361	0.00100	1	10/05/2018 08:44	WG1176275
sec-Butylbenzene	0.00466		0.000365	0.00100	1	10/05/2018 08:44	WG1176275
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 08:44	WG1176275
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 08:44	WG1176275
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 08:44	WG1176275
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 08:44	WG1176275
Chloroethane	U	J4	0.000453	0.00500	1	10/05/2018 08:44	WG1176275
Chloroform	U		0.000324	0.00500	1	10/05/2018 08:44	WG1176275
Chloromethane	U		0.000276	0.00250	1	10/05/2018 08:44	WG1176275
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 08:44	WG1176275
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 08:44	WG1176275
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 08:44	WG1176275
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 08:44	WG1176275
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 08:44	WG1176275
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 08:44	WG1176275
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 08:44	WG1176275
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 08:44	WG1176275
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 08:44	WG1176275
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 08:44	WG1176275
Isopropylbenzene	0.00390		0.000326	0.00100	1	10/05/2018 08:44	WG1176275
p-Isopropyltoluene	0.000647	J	0.000350	0.00100	1	10/05/2018 08:44	WG1176275
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 08:44	WG1176275
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 08:44	WG1176275
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 08:44	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 08:44	WG1176275
Methyl tert-butyl ether	0.00290		0.000367	0.00100	1	10/05/2018 08:44	WG1176275
Naphthalene	0.00165	J	0.00100	0.00500	1	10/05/2018 08:44	WG1176275
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 08:44	WG1176275
Styrene	U		0.000307	0.00100	1	10/05/2018 08:44	WG1176275
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 08:44	WG1176275
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 08:44	WG1176275
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 08:44	WG1176275
Toluene	U		0.000412	0.00100	1	10/05/2018 08:44	WG1176275
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 08:44	WG1176275
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 08:44	WG1176275
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 08:44	WG1176275
1,2,4-Trimethylbenzene	0.00500		0.000373	0.00100	1	10/05/2018 08:44	WG1176275
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 08:44	WG1176275
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 08:44	WG1176275
o-Xylene	U		0.000341	0.00100	1	10/05/2018 08:44	WG1176275
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 08:44	WG1176275
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 08:44	WG1176275
(S) Toluene-d8	*93.0*			*80.0-120*		*10/05/2018 08:44*	WG1176275
(S) Dibromofluoromethane	*110*			*75.0-120*		*10/05/2018 08:44*	WG1176275
(S) 4-Bromofluorobenzene	*114*			*77.0-126*		*10/05/2018 08:44*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.20		0.0247	0.100	1	10/09/2018 16:22	WG1177735
(S) o-Terphenyl	*84.2*			*31.0-160*		*10/09/2018 16:22*	WG1177735

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2620		14.1	50.0	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	3.33		0.0197	0.100	1	10/10/2018 15:53	WG1178387

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/08/2018 14:48	WG1176533

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	314		1.04	20.0	20	10/09/2018 15:38	WG1176341
Fluoride	0.399		0.00990	0.100	1	10/09/2018 15:21	WG1176341
Sulfate	1580		1.55	100	20	10/09/2018 15:38	WG1176341

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.000180	J	0.0000490	0.000200	1	10/07/2018 07:48	WG1176292

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.128	J	0.0126	0.200	1	10/07/2018 15:35	WG1176325

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00122	J	0.000500	0.00400	2	10/10/2018 23:54	WG1176330
Barium	0.0130		0.000360	0.00500	1	10/11/2018 14:01	WG1179423
Cadmium	U		0.000160	0.00100	1	10/11/2018 11:32	WG1176330
Calcium	484		0.0920	2.00	2	10/10/2018 23:54	WG1176330
Chromium	U		0.00108	0.00400	2	10/10/2018 23:54	WG1176330
Cobalt	U		0.000520	0.00400	2	10/10/2018 23:54	WG1176330
Iron	U		0.0300	0.200	2	10/10/2018 23:54	WG1176330
Lead	U		0.000480	0.00400	2	10/10/2018 23:54	WG1176330
Manganese	0.00248	B J	0.000500	0.0100	2	10/10/2018 23:54	WG1176330
Nickel	0.00108	J	0.000700	0.00400	2	10/10/2018 23:54	WG1176330
Potassium	2.65	B	0.0740	2.00	2	10/10/2018 23:54	WG1176330
Selenium	0.00911		0.000760	0.00400	2	10/10/2018 23:54	WG1176330
Sodium	86.8		0.220	2.00	2	10/10/2018 23:54	WG1176330
Uranium	0.0111	J	0.000660	0.0200	2	10/10/2018 23:54	WG1176330
Vanadium	0.00776	J	0.000360	0.0100	2	10/10/2018 23:54	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 20:46	WG1177198

KWB-11B

Collected date/time: 10/02/18 11:15

SAMPLE RESULTS - 05

L1031734

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*99.6*			*78.0-120*		*10/07/2018 20:46*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 09:05	WG1176275
Benzene	U		0.000331	0.00100	1	10/05/2018 09:05	WG1176275
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 09:05	WG1176275
Bromoform	U		0.000469	0.00100	1	10/05/2018 09:05	WG1176275
Bromomethane	U		0.000866	0.00500	1	10/05/2018 09:05	WG1176275
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 09:05	WG1176275
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 09:05	WG1176275
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 09:05	WG1176275
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 09:05	WG1176275
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 09:05	WG1176275
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 09:05	WG1176275
Chloroethane	U	J4	0.000453	0.00500	1	10/05/2018 09:05	WG1176275
Chloroform	U		0.000324	0.00500	1	10/05/2018 09:05	WG1176275
Chloromethane	U		0.000276	0.00250	1	10/05/2018 09:05	WG1176275
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 09:05	WG1176275
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 09:05	WG1176275
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 09:05	WG1176275
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 09:05	WG1176275
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 09:05	WG1176275
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 09:05	WG1176275
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 09:05	WG1176275
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 09:05	WG1176275
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 09:05	WG1176275
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 09:05	WG1176275
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 09:05	WG1176275
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 09:05	WG1176275
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 09:05	WG1176275
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 09:05	WG1176275
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 09:05	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 09:05	WG1176275
Methyl tert-butyl ether	0.00125		0.000367	0.00100	1	10/05/2018 09:05	WG1176275
Naphthalene	U		0.00100	0.00500	1	10/05/2018 09:05	WG1176275
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 09:05	WG1176275
Styrene	U		0.000307	0.00100	1	10/05/2018 09:05	WG1176275
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 09:05	WG1176275
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 09:05	WG1176275
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 09:05	WG1176275
Toluene	U		0.000412	0.00100	1	10/05/2018 09:05	WG1176275
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 09:05	WG1176275
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 09:05	WG1176275
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 09:05	WG1176275
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 09:05	WG1176275
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 09:05	WG1176275
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 09:05	WG1176275
o-Xylene	U		0.000341	0.00100	1	10/05/2018 09:05	WG1176275
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 09:05	WG1176275
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 09:05	WG1176275
(S) Toluene-d8	*99.0*			*80.0-120*		*10/05/2018 09:05*	WG1176275
(S) Dibromofluoromethane	*115*			*75.0-120*		*10/05/2018 09:05*	WG1176275
(S) 4-Bromofluorobenzene	*117*			*77.0-126*		*10/05/2018 09:05*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0382	J	0.0247	0.100	1	10/09/2018 16:42	WG1177735
(S) o-Terphenyl	*54.2*			*31.0-160*		*10/09/2018 16:42*	WG1177735

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4250		14.1	50.0	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	7.86		0.0394	0.200	2	10/10/2018 16:01	WG1178387

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	0.0359		0.00180	0.00500	1	10/09/2018 08:45	WG1177361

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	327		1.04	20.0	20	10/09/2018 03:05	WG1176348
Fluoride	1.82		0.00990	0.100	1	10/09/2018 02:47	WG1176348
Sulfate	2610		3.87	250	50	10/09/2018 20:32	WG1176348

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.000168	J	0.0000490	0.000200	1	10/07/2018 07:50	WG1176292

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.697		0.0126	0.200	1	10/07/2018 15:44	WG1176325

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00258	J	0.000500	0.00400	2	10/10/2018 23:59	WG1176330
Barium	0.0115		0.000360	0.00500	1	10/11/2018 14:06	WG1179423
Cadmium	U		0.000160	0.00100	1	10/11/2018 11:36	WG1176330
Calcium	689		0.0920	2.00	2	10/10/2018 23:59	WG1176330
Chromium	U		0.00108	0.00400	2	10/10/2018 23:59	WG1176330
Cobalt	U		0.000520	0.00400	2	10/10/2018 23:59	WG1176330
Iron	0.0379	J	0.0300	0.200	2	10/10/2018 23:59	WG1176330
Lead	U		0.000480	0.00400	2	10/10/2018 23:59	WG1176330
Manganese	0.00900	B J	0.000500	0.0100	2	10/10/2018 23:59	WG1176330
Nickel	0.00180	J	0.000700	0.00400	2	10/10/2018 23:59	WG1176330
Potassium	3.52		0.0740	2.00	2	10/10/2018 23:59	WG1176330
Selenium	0.00759		0.000760	0.00400	2	10/10/2018 23:59	WG1176330
Sodium	148		0.220	2.00	2	10/10/2018 23:59	WG1176330
Uranium	0.0688		0.000660	0.0200	2	10/10/2018 23:59	WG1176330
Vanadium	0.0176		0.000360	0.0100	2	10/10/2018 23:59	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/07/2018 21:10	WG1177198

MW-136

Collected date/time: 10/02/18 10:30

SAMPLE RESULTS - 06

L1031734

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*99.3*			*78.0-120*		*10/07/2018 21:10*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 09:25	WG1176275
Benzene	U		0.000331	0.00100	1	10/05/2018 09:25	WG1176275
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 09:25	WG1176275
Bromoform	U		0.000469	0.00100	1	10/05/2018 09:25	WG1176275
Bromomethane	U		0.000866	0.00500	1	10/05/2018 09:25	WG1176275
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 09:25	WG1176275
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 09:25	WG1176275
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 09:25	WG1176275
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 09:25	WG1176275
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 09:25	WG1176275
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 09:25	WG1176275
Chloroethane	U	J4	0.000453	0.00500	1	10/05/2018 09:25	WG1176275
Chloroform	U		0.000324	0.00500	1	10/05/2018 09:25	WG1176275
Chloromethane	U		0.000276	0.00250	1	10/05/2018 09:25	WG1176275
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 09:25	WG1176275
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 09:25	WG1176275
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 09:25	WG1176275
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 09:25	WG1176275
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 09:25	WG1176275
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 09:25	WG1176275
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 09:25	WG1176275
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 09:25	WG1176275
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 09:25	WG1176275
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 09:25	WG1176275
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 09:25	WG1176275
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 09:25	WG1176275
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 09:25	WG1176275
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 09:25	WG1176275
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 09:25	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 09:25	WG1176275
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 09:25	WG1176275
Naphthalene	U		0.00100	0.00500	1	10/05/2018 09:25	WG1176275
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 09:25	WG1176275
Styrene	U		0.000307	0.00100	1	10/05/2018 09:25	WG1176275
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 09:25	WG1176275
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 09:25	WG1176275
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 09:25	WG1176275
Toluene	U		0.000412	0.00100	1	10/05/2018 09:25	WG1176275
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 09:25	WG1176275
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 09:25	WG1176275
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 09:25	WG1176275
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 09:25	WG1176275
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 09:25	WG1176275
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 09:25	WG1176275
o-Xylene	U		0.000341	0.00100	1	10/05/2018 09:25	WG1176275
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 09:25	WG1176275
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 09:25	WG1176275
(S) Toluene-d8	*98.6*			*80.0-120*		*10/05/2018 09:25*	WG1176275
(S) Dibromofluoromethane	*115*			*75.0-120*		*10/05/2018 09:25*	WG1176275
(S) 4-Bromofluorobenzene	*115*			*77.0-126*		*10/05/2018 09:25*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0676	J	0.0247	0.100	1	10/09/2018 16:56	WG1177736
(S) o-Terphenyl	*71.6*			*31.0-160*		*10/09/2018 16:56*	WG1177736

MW-126A

Collected date/time: 10/02/18 11:15

SAMPLE RESULTS - 07

L1031734

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2420		14.1	50.0	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0850	J	0.0197	0.100	1	10/10/2018 16:02	WG1178387

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	185		0.519	10.0	10	10/09/2018 03:41	WG1176348
Fluoride	0.899		0.00990	0.100	1	10/09/2018 03:23	WG1176348
Sulfate	1310		1.55	100	20	10/09/2018 20:51	WG1176348

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00135	J	0.000500	0.00400	2	10/11/2018 00:04	WG1176330
Barium	0.0153		0.000360	0.00500	1	10/11/2018 14:10	WG1179423
Calcium	308		0.0920	2.00	2	10/11/2018 00:04	WG1176330
Chromium	0.00132	J	0.00108	0.00400	2	10/11/2018 00:04	WG1176330
Iron	0.537		0.0300	0.200	2	10/11/2018 00:04	WG1176330
Lead	U		0.000480	0.00400	2	10/11/2018 00:04	WG1176330
Manganese	0.642		0.000500	0.0100	2	10/11/2018 00:04	WG1176330
Potassium	1.72	B J	0.0740	2.00	2	10/11/2018 00:04	WG1176330
Selenium	U		0.000760	0.00400	2	10/11/2018 00:04	WG1176330
Sodium	179		0.220	2.00	2	10/11/2018 00:04	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.182		0.0314	0.100	1	10/07/2018 21:33	WG1177198
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/07/2018 21:33*	WG1177198

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 09:45	WG1176275
Benzene	U		0.000331	0.00100	1	10/05/2018 09:45	WG1176275
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 09:45	WG1176275
Bromoform	U		0.000469	0.00100	1	10/05/2018 09:45	WG1176275
Bromomethane	U		0.000866	0.00500	1	10/05/2018 09:45	WG1176275
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 09:45	WG1176275
sec-Butylbenzene	0.00201		0.000365	0.00100	1	10/05/2018 09:45	WG1176275
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 09:45	WG1176275
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 09:45	WG1176275
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 09:45	WG1176275
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 09:45	WG1176275
Chloroethane	U	J4	0.000453	0.00500	1	10/05/2018 09:45	WG1176275
Chloroform	U		0.000324	0.00500	1	10/05/2018 09:45	WG1176275
Chloromethane	U		0.000276	0.00250	1	10/05/2018 09:45	WG1176275
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 09:45	WG1176275
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 09:45	WG1176275

MW-126A

Collected date/time: 10/02/18 11:15

SAMPLE RESULTS - 07

L1031734

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 09:45	WG1176275
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 09:45	WG1176275
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 09:45	WG1176275
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 09:45	WG1176275
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 09:45	WG1176275
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 09:45	WG1176275
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 09:45	WG1176275
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 09:45	WG1176275
Isopropylbenzene	0.00285		0.000326	0.00100	1	10/05/2018 09:45	WG1176275
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 09:45	WG1176275
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 09:45	WG1176275
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 09:45	WG1176275
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 09:45	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 09:45	WG1176275
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 09:45	WG1176275
Naphthalene	U		0.00100	0.00500	1	10/05/2018 09:45	WG1176275
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 09:45	WG1176275
Styrene	U		0.000307	0.00100	1	10/05/2018 09:45	WG1176275
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 09:45	WG1176275
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 09:45	WG1176275
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 09:45	WG1176275
Toluene	U		0.000412	0.00100	1	10/05/2018 09:45	WG1176275
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 09:45	WG1176275
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 09:45	WG1176275
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 09:45	WG1176275
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 09:45	WG1176275
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 09:45	WG1176275
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 09:45	WG1176275
o-Xylene	U		0.000341	0.00100	1	10/05/2018 09:45	WG1176275
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 09:45	WG1176275
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 09:45	WG1176275
(S) Toluene-d8	*97.0*			*80.0-120*		*10/05/2018 09:45*	WG1176275
(S) Dibromofluoromethane	*116*			*75.0-120*		*10/05/2018 09:45*	WG1176275
(S) 4-Bromofluorobenzene	*117*			*77.0-126*		*10/05/2018 09:45*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.723		0.0247	0.100	1	10/09/2018 17:14	WG1177736
(S) o-Terphenyl	*88.4*			*31.0-160*		*10/09/2018 17:14*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3610		14.1	50.0	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.639		0.0197	0.100	1	10/10/2018 16:04	WG1178387

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	264		1.04	20.0	20	10/09/2018 04:18	WG1176348
Fluoride	0.930		0.00990	0.100	1	10/09/2018 04:00	WG1176348
Sulfate	2290		3.87	250	50	10/09/2018 21:09	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00387	J	0.000500	0.00400	2	10/11/2018 00:08	WG1176330
Barium	0.00911		0.000360	0.00500	1	10/11/2018 14:15	WG1179423
Calcium	561		0.0920	2.00	2	10/11/2018 00:08	WG1176330
Chromium	0.00139	J	0.00108	0.00400	2	10/11/2018 00:08	WG1176330
Iron	U		0.0300	0.200	2	10/11/2018 00:08	WG1176330
Lead	U		0.00120	0.0100	5	10/11/2018 01:30	WG1176330
Manganese	0.0593		0.000500	0.0100	2	10/11/2018 00:08	WG1176330
Potassium	3.07		0.0740	2.00	2	10/11/2018 00:08	WG1176330
Selenium	0.00383	J	0.000760	0.00400	2	10/11/2018 00:08	WG1176330
Sodium	213		0.220	2.00	2	10/11/2018 00:08	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 13:18	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*104*			*78.0-120*		*10/08/2018 13:18*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 10:06	WG1176275
Benzene	U		0.000331	0.00100	1	10/05/2018 10:06	WG1176275
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 10:06	WG1176275
Bromoform	U		0.000469	0.00100	1	10/05/2018 10:06	WG1176275
Bromomethane	U		0.000866	0.00500	1	10/05/2018 10:06	WG1176275
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 10:06	WG1176275
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 10:06	WG1176275
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 10:06	WG1176275
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 10:06	WG1176275
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 10:06	WG1176275
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 10:06	WG1176275
Chloroethane	U	J4	0.000453	0.00500	1	10/05/2018 10:06	WG1176275
Chloroform	U		0.000324	0.00500	1	10/05/2018 10:06	WG1176275
Chloromethane	U		0.000276	0.00250	1	10/05/2018 10:06	WG1176275
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 10:06	WG1176275
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 10:06	WG1176275

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 10:06	WG1176275
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 10:06	WG1176275
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 10:06	WG1176275
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 10:06	WG1176275
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 10:06	WG1176275
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 10:06	WG1176275
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 10:06	WG1176275
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 10:06	WG1176275
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 10:06	WG1176275
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 10:06	WG1176275
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 10:06	WG1176275
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 10:06	WG1176275
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 10:06	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 10:06	WG1176275
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 10:06	WG1176275
Naphthalene	U		0.00100	0.00500	1	10/05/2018 10:06	WG1176275
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 10:06	WG1176275
Styrene	U		0.000307	0.00100	1	10/05/2018 10:06	WG1176275
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 10:06	WG1176275
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 10:06	WG1176275
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 10:06	WG1176275
Toluene	U		0.000412	0.00100	1	10/05/2018 10:06	WG1176275
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 10:06	WG1176275
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 10:06	WG1176275
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 10:06	WG1176275
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 10:06	WG1176275
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 10:06	WG1176275
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 10:06	WG1176275
o-Xylene	U		0.000341	0.00100	1	10/05/2018 10:06	WG1176275
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 10:06	WG1176275
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 10:06	WG1176275
(S) Toluene-d8	*96.5*			*80.0-120*		*10/05/2018 10:06*	WG1176275
(S) Dibromofluoromethane	*115*			*75.0-120*		*10/05/2018 10:06*	WG1176275
(S) 4-Bromofluorobenzene	*116*			*77.0-126*		*10/05/2018 10:06*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.298		0.0247	0.100	1	10/09/2018 17:31	WG1177736
(S) o-Terphenyl	*85.3*			*31.0-160*		*10/09/2018 17:31*	WG1177736

MW-127

Collected date/time: 10/02/18 12:35

SAMPLE RESULTS - 09

L1031734

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1940		14.1	50.0	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 16:05	WG1178387

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	219		0.519	10.0	10	10/09/2018 05:30	WG1176348
Fluoride	0.979		0.00990	0.100	1	10/09/2018 04:36	WG1176348
Sulfate	670		0.774	50.0	10	10/09/2018 05:30	WG1176348

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00439		0.000500	0.00400	2	10/11/2018 00:13	WG1176330
Barium	0.0589		0.000360	0.00500	1	10/11/2018 14:19	WG1179423
Calcium	240		0.0920	2.00	2	10/11/2018 00:13	WG1176330
Chromium	U		0.00108	0.00400	2	10/11/2018 00:13	WG1176330
Iron	0.0981	J	0.0300	0.200	2	10/11/2018 00:13	WG1176330
Lead	U		0.000480	0.00400	2	10/11/2018 00:13	WG1176330
Manganese	0.121		0.000500	0.0100	2	10/11/2018 00:13	WG1176330
Potassium	1.29	B J	0.0740	2.00	2	10/11/2018 00:13	WG1176330
Selenium	U		0.000760	0.00400	2	10/11/2018 00:13	WG1176330
Sodium	135		0.220	2.00	2	10/11/2018 00:13	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	3.13		0.0314	0.100	1	10/08/2018 13:39	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*82.4*			*78.0-120*		*10/08/2018 13:39*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.200	1.00	20	10/05/2018 10:26	WG1176275
Benzene	1.15		0.00662	0.0200	20	10/05/2018 10:26	WG1176275
Bromodichloromethane	U		0.00760	0.0200	20	10/05/2018 10:26	WG1176275
Bromoform	U		0.00938	0.0200	20	10/05/2018 10:26	WG1176275
Bromomethane	U		0.0173	0.100	20	10/05/2018 10:26	WG1176275
n-Butylbenzene	U		0.00722	0.0200	20	10/05/2018 10:26	WG1176275
sec-Butylbenzene	U		0.00730	0.0200	20	10/05/2018 10:26	WG1176275
Carbon disulfide	U		0.00550	0.0200	20	10/05/2018 10:26	WG1176275
Carbon tetrachloride	U		0.00758	0.0200	20	10/05/2018 10:26	WG1176275
Chlorobenzene	U		0.00696	0.0200	20	10/05/2018 10:26	WG1176275
Chlorodibromomethane	U		0.00654	0.0200	20	10/05/2018 10:26	WG1176275
Chloroethane	U	J4	0.00906	0.100	20	10/05/2018 10:26	WG1176275
Chloroform	U		0.00648	0.100	20	10/05/2018 10:26	WG1176275
Chloromethane	U		0.00552	0.0500	20	10/05/2018 10:26	WG1176275
1,2-Dibromoethane	U		0.00762	0.0200	20	10/05/2018 10:26	WG1176275
1,1-Dichloroethane	U		0.00518	0.0200	20	10/05/2018 10:26	WG1176275

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.00722	0.0200	20	10/05/2018 10:26	WG1176275
1,1-Dichloroethene	U		0.00796	0.0200	20	10/05/2018 10:26	WG1176275
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	10/05/2018 10:26	WG1176275
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	10/05/2018 10:26	WG1176275
1,2-Dichloropropane	U		0.00612	0.0200	20	10/05/2018 10:26	WG1176275
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	10/05/2018 10:26	WG1176275
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	10/05/2018 10:26	WG1176275
Ethylbenzene	0.0797		0.00768	0.0200	20	10/05/2018 10:26	WG1176275
Isopropylbenzene	0.0180	J	0.00652	0.0200	20	10/05/2018 10:26	WG1176275
p-Isopropyltoluene	U		0.00700	0.0200	20	10/05/2018 10:26	WG1176275
2-Butanone (MEK)	U		0.0786	0.200	20	10/05/2018 10:26	WG1176275
2-Hexanone	U		0.0764	0.200	20	10/05/2018 10:26	WG1176275
Methylene Chloride	U		0.0200	0.100	20	10/05/2018 10:26	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	10/05/2018 10:26	WG1176275
Methyl tert-butyl ether	0.774		0.00734	0.0200	20	10/05/2018 10:26	WG1176275
Naphthalene	U		0.0200	0.100	20	10/05/2018 10:26	WG1176275
n-Propylbenzene	0.0258		0.00698	0.0200	20	10/05/2018 10:26	WG1176275
Styrene	U		0.00614	0.0200	20	10/05/2018 10:26	WG1176275
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	10/05/2018 10:26	WG1176275
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	10/05/2018 10:26	WG1176275
Tetrachloroethene	U		0.00744	0.0200	20	10/05/2018 10:26	WG1176275
Toluene	0.0397		0.00824	0.0200	20	10/05/2018 10:26	WG1176275
1,1,1-Trichloroethane	U		0.00638	0.0200	20	10/05/2018 10:26	WG1176275
1,1,2-Trichloroethane	U		0.00766	0.0200	20	10/05/2018 10:26	WG1176275
Trichloroethene	U		0.00796	0.0200	20	10/05/2018 10:26	WG1176275
1,2,4-Trimethylbenzene	0.0272		0.00746	0.0200	20	10/05/2018 10:26	WG1176275
1,3,5-Trimethylbenzene	U		0.00774	0.0200	20	10/05/2018 10:26	WG1176275
Vinyl chloride	U		0.00518	0.0200	20	10/05/2018 10:26	WG1176275
o-Xylene	U		0.00682	0.0200	20	10/05/2018 10:26	WG1176275
m&p-Xylene	0.0458		0.0144	0.0400	20	10/05/2018 10:26	WG1176275
Xylenes, Total	0.0458	J	0.0212	0.0600	20	10/05/2018 10:26	WG1176275
(S) Toluene-d8	*96.4*			*80.0-120*		*10/05/2018 10:26*	WG1176275
(S) Dibromofluoromethane	*114*			*75.0-120*		*10/05/2018 10:26*	WG1176275
(S) 4-Bromofluorobenzene	*111*			*77.0-126*		*10/05/2018 10:26*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.30		0.0247	0.100	1	10/09/2018 17:48	WG1177736
(S) o-Terphenyl	*75.3*			*31.0-160*		*10/09/2018 17:48*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4060		14.1	50.0	1	10/09/2018 16:21	WG1177172

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.219		0.0197	0.100	1	10/10/2018 16:07	WG1178387

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/09/2018 08:46	WG1177361

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	339		1.04	20.0	20	10/09/2018 06:07	WG1176348
Fluoride	1.48		0.00990	0.100	1	10/09/2018 05:49	WG1176348
Sulfate	2670		3.87	250	50	10/09/2018 21:27	WG1176348

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.000132	J	0.0000490	0.000200	1	10/07/2018 07:53	WG1176292

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.734		0.0126	0.200	1	10/07/2018 15:47	WG1176325

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00263	J	0.00125	0.0100	5	10/11/2018 00:18	WG1176330
Barium	0.00840		0.000360	0.00500	1	10/11/2018 14:24	WG1179423
Cadmium	U		0.000160	0.00100	1	10/11/2018 11:40	WG1176330
Calcium	457		0.230	5.00	5	10/11/2018 00:18	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 00:18	WG1176330
Cobalt	0.00583	J	0.00130	0.0100	5	10/11/2018 00:18	WG1176330
Iron	U		0.0750	0.500	5	10/11/2018 00:18	WG1176330
Lead	U		0.00120	0.0100	5	10/11/2018 00:18	WG1176330
Manganese	0.394		0.00125	0.0250	5	10/11/2018 00:18	WG1176330
Nickel	0.00823	J	0.00175	0.0100	5	10/11/2018 00:18	WG1176330
Potassium	1.53	B J	0.185	5.00	5	10/11/2018 00:18	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 00:18	WG1176330
Sodium	251		0.550	5.00	5	10/11/2018 00:18	WG1176330
Uranium	0.0153	J	0.00165	0.0500	5	10/11/2018 00:18	WG1176330
Vanadium	0.0210	J	0.000900	0.0250	5	10/11/2018 00:18	WG1176330

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/11/2018 02:51	WG1179145
Benzene	U		0.000331	0.00100	1	10/11/2018 02:51	WG1179145
Bromodichloromethane	U		0.000380	0.00100	1	10/11/2018 02:51	WG1179145
Bromoform	U		0.000469	0.00100	1	10/11/2018 02:51	WG1179145
Bromomethane	U		0.000866	0.00500	1	10/11/2018 02:51	WG1179145
n-Butylbenzene	U		0.000361	0.00100	1	10/11/2018 02:51	WG1179145
sec-Butylbenzene	U		0.000365	0.00100	1	10/11/2018 02:51	WG1179145
Carbon disulfide	U		0.000275	0.00100	1	10/11/2018 02:51	WG1179145
Carbon tetrachloride	U		0.000379	0.00100	1	10/11/2018 02:51	WG1179145
Chlorobenzene	U		0.000348	0.00100	1	10/11/2018 02:51	WG1179145
Chlorodibromomethane	U		0.000327	0.00100	1	10/11/2018 02:51	WG1179145
Chloroethane	U		0.000453	0.00500	1	10/11/2018 02:51	WG1179145
Chloroform	U		0.000324	0.00500	1	10/11/2018 02:51	WG1179145
Chloromethane	U		0.000276	0.00250	1	10/11/2018 02:51	WG1179145
1,2-Dibromoethane	U		0.000381	0.00100	1	10/11/2018 02:51	WG1179145
1,1-Dichloroethane	U		0.000259	0.00100	1	10/11/2018 02:51	WG1179145
1,2-Dichloroethane	U		0.000361	0.00100	1	10/11/2018 02:51	WG1179145
1,1-Dichloroethene	U		0.000398	0.00100	1	10/11/2018 02:51	WG1179145
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/11/2018 02:51	WG1179145
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/11/2018 02:51	WG1179145
1,2-Dichloropropane	U		0.000306	0.00100	1	10/11/2018 02:51	WG1179145
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/11/2018 02:51	WG1179145
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/11/2018 02:51	WG1179145
Ethylbenzene	U		0.000384	0.00100	1	10/11/2018 02:51	WG1179145
Isopropylbenzene	U		0.000326	0.00100	1	10/11/2018 02:51	WG1179145
p-Isopropyltoluene	U		0.000350	0.00100	1	10/11/2018 02:51	WG1179145
2-Butanone (MEK)	U		0.00393	0.0100	1	10/11/2018 02:51	WG1179145
2-Hexanone	U		0.00382	0.0100	1	10/11/2018 02:51	WG1179145
Methylene Chloride	U		0.00100	0.00500	1	10/11/2018 02:51	WG1179145
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/11/2018 02:51	WG1179145
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/11/2018 02:51	WG1179145
Naphthalene	U		0.00100	0.00500	1	10/11/2018 02:51	WG1179145
n-Propylbenzene	U		0.000349	0.00100	1	10/11/2018 02:51	WG1179145
Styrene	U		0.000307	0.00100	1	10/11/2018 02:51	WG1179145
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/11/2018 02:51	WG1179145
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/11/2018 02:51	WG1179145
Tetrachloroethene	U		0.000372	0.00100	1	10/11/2018 02:51	WG1179145
Toluene	U		0.000412	0.00100	1	10/11/2018 02:51	WG1179145
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/11/2018 02:51	WG1179145
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/11/2018 02:51	WG1179145
Trichloroethene	U		0.000398	0.00100	1	10/11/2018 02:51	WG1179145
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/11/2018 02:51	WG1179145
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/11/2018 02:51	WG1179145
Vinyl chloride	U		0.000259	0.00100	1	10/11/2018 02:51	WG1179145
o-Xylene	U		0.000341	0.00100	1	10/11/2018 02:51	WG1179145
m&p-Xylene	U		0.000719	0.00200	1	10/11/2018 02:51	WG1179145
Xylenes, Total	U		0.00106	0.00300	1	10/11/2018 02:51	WG1179145
(S) Toluene-d8	*105*			*80.0-120*		*10/11/2018 02:51*	WG1179145
(S) Dibromofluoromethane	*92.8*			*75.0-120*		*10/11/2018 02:51*	WG1179145
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/11/2018 02:51*	WG1179145

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0970	J	0.0247	0.100	1	10/09/2018 18:06	WG1177736
(S) o-Terphenyl	*74.7*			*31.0-160*		*10/09/2018 18:06*	WG1177736

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1040		5.64	20.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 16:08	WG1178387

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	188		0.260	5.00	5	10/09/2018 06:43	WG1176348
Fluoride	1.33		0.00990	0.100	1	10/09/2018 06:25	WG1176348
Sulfate	U		0.0774	5.00	1	10/09/2018 06:25	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0164		0.00125	0.0100	5	10/11/2018 00:23	WG1176330
Barium	3.93		0.000360	0.00500	1	10/11/2018 14:28	WG1179423
Calcium	130		0.230	5.00	5	10/11/2018 00:23	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 00:23	WG1176330
Iron	4.24		0.0750	0.500	5	10/11/2018 00:23	WG1176330
Lead	0.00124	J	0.00120	0.0100	5	10/11/2018 00:23	WG1176330
Manganese	0.168		0.00125	0.0250	5	10/11/2018 00:23	WG1176330
Potassium	0.836	B J	0.185	5.00	5	10/11/2018 00:23	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 00:23	WG1176330
Sodium	110		0.110	1.00	1	10/11/2018 14:28	WG1179423

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		2.50	12.5	250	10/05/2018 13:53	WG1176275
Benzene	3.81		0.0828	0.250	250	10/05/2018 13:53	WG1176275
Bromodichloromethane	U		0.0950	0.250	250	10/05/2018 13:53	WG1176275
Bromoform	U		0.117	0.250	250	10/05/2018 13:53	WG1176275
Bromomethane	U		0.216	1.25	250	10/05/2018 13:53	WG1176275
n-Butylbenzene	U		0.0902	0.250	250	10/05/2018 13:53	WG1176275
sec-Butylbenzene	U		0.0912	0.250	250	10/05/2018 13:53	WG1176275
Carbon disulfide	U		0.0688	0.250	250	10/05/2018 13:53	WG1176275
Carbon tetrachloride	U		0.0948	0.250	250	10/05/2018 13:53	WG1176275
Chlorobenzene	U		0.0870	0.250	250	10/05/2018 13:53	WG1176275
Chlorodibromomethane	U		0.0818	0.250	250	10/05/2018 13:53	WG1176275
Chloroethane	U	J4	0.113	1.25	250	10/05/2018 13:53	WG1176275
Chloroform	U		0.0810	1.25	250	10/05/2018 13:53	WG1176275
Chloromethane	U		0.0690	0.625	250	10/05/2018 13:53	WG1176275
1,2-Dibromoethane	U		0.0952	0.250	250	10/05/2018 13:53	WG1176275
1,1-Dichloroethane	U		0.0648	0.250	250	10/05/2018 13:53	WG1176275
1,2-Dichloroethane	U		0.0902	0.250	250	10/05/2018 13:53	WG1176275
1,1-Dichloroethene	U		0.0995	0.250	250	10/05/2018 13:53	WG1176275
cis-1,2-Dichloroethene	U		0.0650	0.250	250	10/05/2018 13:53	WG1176275
trans-1,2-Dichloroethene	U		0.0990	0.250	250	10/05/2018 13:53	WG1176275
1,2-Dichloropropane	U		0.0765	0.250	250	10/05/2018 13:53	WG1176275
cis-1,3-Dichloropropene	U		0.104	0.250	250	10/05/2018 13:53	WG1176275
trans-1,3-Dichloropropene	U		0.105	0.250	250	10/05/2018 13:53	WG1176275

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Ethylbenzene	0.238	J	0.0960	0.250	250	10/05/2018 13:53	WG1176275
Isopropylbenzene	U		0.0815	0.250	250	10/05/2018 13:53	WG1176275
p-Isopropyltoluene	U		0.0875	0.250	250	10/05/2018 13:53	WG1176275
2-Butanone (MEK)	U		0.982	2.50	250	10/05/2018 13:53	WG1176275
2-Hexanone	U		0.955	2.50	250	10/05/2018 13:53	WG1176275
Methylene Chloride	U		0.250	1.25	250	10/05/2018 13:53	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.535	2.50	250	10/05/2018 13:53	WG1176275
Methyl tert-butyl ether	4.12		0.0918	0.250	250	10/05/2018 13:53	WG1176275
Naphthalene	U		0.250	1.25	250	10/05/2018 13:53	WG1176275
n-Propylbenzene	U		0.0872	0.250	250	10/05/2018 13:53	WG1176275
Styrene	U		0.0768	0.250	250	10/05/2018 13:53	WG1176275
1,1,1,2-Tetrachloroethane	U		0.0962	0.250	250	10/05/2018 13:53	WG1176275
1,1,2,2-Tetrachloroethane	U		0.0325	0.250	250	10/05/2018 13:53	WG1176275
Tetrachloroethene	U		0.0930	0.250	250	10/05/2018 13:53	WG1176275
Toluene	U		0.103	0.250	250	10/05/2018 13:53	WG1176275
1,1,1-Trichloroethane	U		0.0798	0.250	250	10/05/2018 13:53	WG1176275
1,1,2-Trichloroethane	U		0.0958	0.250	250	10/05/2018 13:53	WG1176275
Trichloroethene	U		0.0995	0.250	250	10/05/2018 13:53	WG1176275
1,2,4-Trimethylbenzene	0.215	J	0.0932	0.250	250	10/05/2018 13:53	WG1176275
1,3,5-Trimethylbenzene	U		0.0968	0.250	250	10/05/2018 13:53	WG1176275
Vinyl chloride	U		0.0648	0.250	250	10/05/2018 13:53	WG1176275
o-Xylene	U		0.0852	0.250	250	10/05/2018 13:53	WG1176275
m&p-Xylene	0.217	J	0.180	0.500	250	10/05/2018 13:53	WG1176275
Xylenes, Total	U		0.265	0.750	250	10/05/2018 13:53	WG1176275
(S) Toluene-d8	*100*			*80.0-120*		*10/05/2018 13:53*	WG1176275
(S) Dibromofluoromethane	*117*			*75.0-120*		*10/05/2018 13:53*	WG1176275
(S) 4-Bromofluorobenzene	*117*			*77.0-126*		*10/05/2018 13:53*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	3.35		0.0247	0.100	1	10/09/2018 18:23	WG1177736
(S) o-Terphenyl	*75.3*			*31.0-160*		*10/09/2018 18:23*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1450		14.1	50.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 16:10	WG1178387

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	546		1.04	20.0	20	10/09/2018 07:19	WG1176348
Fluoride	0.869		0.00990	0.100	1	10/09/2018 07:01	WG1176348
Sulfate	11.8		0.0774	5.00	1	10/09/2018 07:01	WG1176348

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0166		0.00125	0.0100	5	10/11/2018 00:28	WG1176330
Barium	3.75		0.000360	0.00500	1	10/11/2018 14:33	WG1179423
Calcium	200		0.230	5.00	5	10/11/2018 00:28	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 00:28	WG1176330
Iron	2.13		0.0750	0.500	5	10/11/2018 00:28	WG1176330
Lead	U		0.00120	0.0100	5	10/11/2018 00:28	WG1176330
Manganese	1.55		0.00125	0.0250	5	10/11/2018 00:28	WG1176330
Potassium	1.76	B J	0.185	5.00	5	10/11/2018 00:28	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 00:28	WG1176330
Sodium	208		0.110	1.00	1	10/11/2018 14:33	WG1179423

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		2.50	12.5	250	10/05/2018 14:14	WG1176275
Benzene	0.278		0.0828	0.250	250	10/05/2018 14:14	WG1176275
Bromodichloromethane	U		0.0950	0.250	250	10/05/2018 14:14	WG1176275
Bromoform	U		0.117	0.250	250	10/05/2018 14:14	WG1176275
Bromomethane	U		0.216	1.25	250	10/05/2018 14:14	WG1176275
n-Butylbenzene	U		0.0902	0.250	250	10/05/2018 14:14	WG1176275
sec-Butylbenzene	U		0.0912	0.250	250	10/05/2018 14:14	WG1176275
Carbon disulfide	U		0.0688	0.250	250	10/05/2018 14:14	WG1176275
Carbon tetrachloride	U		0.0948	0.250	250	10/05/2018 14:14	WG1176275
Chlorobenzene	U		0.0870	0.250	250	10/05/2018 14:14	WG1176275
Chlorodibromomethane	U		0.0818	0.250	250	10/05/2018 14:14	WG1176275
Chloroethane	U	J4	0.113	1.25	250	10/05/2018 14:14	WG1176275
Chloroform	U		0.0810	1.25	250	10/05/2018 14:14	WG1176275
Chloromethane	U		0.0690	0.625	250	10/05/2018 14:14	WG1176275
1,2-Dibromoethane	U		0.0952	0.250	250	10/05/2018 14:14	WG1176275
1,1-Dichloroethane	U		0.0648	0.250	250	10/05/2018 14:14	WG1176275
1,2-Dichloroethane	U		0.0902	0.250	250	10/05/2018 14:14	WG1176275
1,1-Dichloroethene	U		0.0995	0.250	250	10/05/2018 14:14	WG1176275
cis-1,2-Dichloroethene	U		0.0650	0.250	250	10/05/2018 14:14	WG1176275
trans-1,2-Dichloroethene	U		0.0990	0.250	250	10/05/2018 14:14	WG1176275
1,2-Dichloropropane	U		0.0765	0.250	250	10/05/2018 14:14	WG1176275
cis-1,3-Dichloropropene	U		0.104	0.250	250	10/05/2018 14:14	WG1176275
trans-1,3-Dichloropropene	U		0.105	0.250	250	10/05/2018 14:14	WG1176275

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Ethylbenzene	U		0.0960	0.250	250	10/05/2018 14:14	WG1176275
Isopropylbenzene	U		0.0815	0.250	250	10/05/2018 14:14	WG1176275
p-Isopropyltoluene	U		0.0875	0.250	250	10/05/2018 14:14	WG1176275
2-Butanone (MEK)	U		0.982	2.50	250	10/05/2018 14:14	WG1176275
2-Hexanone	U		0.955	2.50	250	10/05/2018 14:14	WG1176275
Methylene Chloride	U		0.250	1.25	250	10/05/2018 14:14	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.535	2.50	250	10/05/2018 14:14	WG1176275
Methyl tert-butyl ether	10.8		0.0918	0.250	250	10/05/2018 14:14	WG1176275
Naphthalene	U		0.250	1.25	250	10/05/2018 14:14	WG1176275
n-Propylbenzene	U		0.0872	0.250	250	10/05/2018 14:14	WG1176275
Styrene	U		0.0768	0.250	250	10/05/2018 14:14	WG1176275
1,1,1,2-Tetrachloroethane	U		0.0962	0.250	250	10/05/2018 14:14	WG1176275
1,1,2,2-Tetrachloroethane	U		0.0325	0.250	250	10/05/2018 14:14	WG1176275
Tetrachloroethene	U		0.0930	0.250	250	10/05/2018 14:14	WG1176275
Toluene	U		0.103	0.250	250	10/05/2018 14:14	WG1176275
1,1,1-Trichloroethane	U		0.0798	0.250	250	10/05/2018 14:14	WG1176275
1,1,2-Trichloroethane	U		0.0958	0.250	250	10/05/2018 14:14	WG1176275
Trichloroethene	U		0.0995	0.250	250	10/05/2018 14:14	WG1176275
1,2,4-Trimethylbenzene	U		0.0932	0.250	250	10/05/2018 14:14	WG1176275
1,3,5-Trimethylbenzene	U		0.0968	0.250	250	10/05/2018 14:14	WG1176275
Vinyl chloride	U		0.0648	0.250	250	10/05/2018 14:14	WG1176275
o-Xylene	U		0.0852	0.250	250	10/05/2018 14:14	WG1176275
m&p-Xylene	U		0.180	0.500	250	10/05/2018 14:14	WG1176275
Xylenes, Total	U		0.265	0.750	250	10/05/2018 14:14	WG1176275
(S) Toluene-d8	*97.8*			*80.0-120*		*10/05/2018 14:14*	WG1176275
(S) Dibromofluoromethane	*114*			*75.0-120*		*10/05/2018 14:14*	WG1176275
(S) 4-Bromofluorobenzene	*114*			*77.0-126*		*10/05/2018 14:14*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.62		0.0247	0.100	1	10/09/2018 18:41	WG1177736
(S) o-Terphenyl	*75.3*			*31.0-160*		*10/09/2018 18:41*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1810		14.1	50.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 16:11	WG1178387

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	412		1.04	20.0	20	10/09/2018 07:56	WG1176348
Fluoride	1.46		0.00990	0.100	1	10/09/2018 07:38	WG1176348
Sulfate	331		1.55	100	20	10/09/2018 07:56	WG1176348

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00849	J	0.00125	0.0100	5	10/11/2018 00:54	WG1176330
Barium	0.0674		0.000360	0.00500	1	10/11/2018 14:56	WG1179423
Calcium	203		0.230	5.00	5	10/11/2018 00:54	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 00:54	WG1176330
Iron	6.39		0.0750	0.500	5	10/11/2018 00:54	WG1176330
Lead	U		0.00120	0.0100	5	10/11/2018 00:54	WG1176330
Manganese	1.42		0.00125	0.0250	5	10/11/2018 00:54	WG1176330
Potassium	0.588	B J	0.185	5.00	5	10/11/2018 00:54	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 00:54	WG1176330
Sodium	221		0.550	5.00	5	10/11/2018 00:54	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.36		0.0314	0.100	1	10/08/2018 14:00	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*106*			*78.0-120*		*10/08/2018 14:00*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.250	1.25	25	10/05/2018 14:34	WG1176275
Benzene	0.0268		0.00828	0.0250	25	10/05/2018 14:34	WG1176275
Bromodichloromethane	U		0.00950	0.0250	25	10/05/2018 14:34	WG1176275
Bromoform	U		0.0117	0.0250	25	10/05/2018 14:34	WG1176275
Bromomethane	U		0.0216	0.125	25	10/05/2018 14:34	WG1176275
n-Butylbenzene	U		0.00902	0.0250	25	10/05/2018 14:34	WG1176275
sec-Butylbenzene	U		0.00912	0.0250	25	10/05/2018 14:34	WG1176275
Carbon disulfide	U		0.00688	0.0250	25	10/05/2018 14:34	WG1176275
Carbon tetrachloride	U		0.00948	0.0250	25	10/05/2018 14:34	WG1176275
Chlorobenzene	U		0.00870	0.0250	25	10/05/2018 14:34	WG1176275
Chlorodibromomethane	U		0.00818	0.0250	25	10/05/2018 14:34	WG1176275
Chloroethane	U	J4	0.0113	0.125	25	10/05/2018 14:34	WG1176275
Chloroform	U		0.00810	0.125	25	10/05/2018 14:34	WG1176275
Chloromethane	U		0.00690	0.0625	25	10/05/2018 14:34	WG1176275
1,2-Dibromoethane	U		0.00952	0.0250	25	10/05/2018 14:34	WG1176275
1,1-Dichloroethane	U		0.00648	0.0250	25	10/05/2018 14:34	WG1176275

MW-111

Collected date/time: 10/02/18 13:50

SAMPLE RESULTS - 13

L1031734

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.00902	0.0250	25	10/05/2018 14:34	WG1176275
1,1-Dichloroethene	U		0.00995	0.0250	25	10/05/2018 14:34	WG1176275
cis-1,2-Dichloroethene	U		0.00650	0.0250	25	10/05/2018 14:34	WG1176275
trans-1,2-Dichloroethene	U		0.00990	0.0250	25	10/05/2018 14:34	WG1176275
1,2-Dichloropropane	U		0.00765	0.0250	25	10/05/2018 14:34	WG1176275
cis-1,3-Dichloropropene	U		0.0104	0.0250	25	10/05/2018 14:34	WG1176275
trans-1,3-Dichloropropene	U		0.0105	0.0250	25	10/05/2018 14:34	WG1176275
Ethylbenzene	U		0.00960	0.0250	25	10/05/2018 14:34	WG1176275
Isopropylbenzene	U		0.00815	0.0250	25	10/05/2018 14:34	WG1176275
p-Isopropyltoluene	U		0.00875	0.0250	25	10/05/2018 14:34	WG1176275
2-Butanone (MEK)	U		0.0982	0.250	25	10/05/2018 14:34	WG1176275
2-Hexanone	U		0.0955	0.250	25	10/05/2018 14:34	WG1176275
Methylene Chloride	U		0.0250	0.125	25	10/05/2018 14:34	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.0535	0.250	25	10/05/2018 14:34	WG1176275
Methyl tert-butyl ether	1.47		0.00918	0.0250	25	10/05/2018 14:34	WG1176275
Naphthalene	U		0.0250	0.125	25	10/05/2018 14:34	WG1176275
n-Propylbenzene	U		0.00872	0.0250	25	10/05/2018 14:34	WG1176275
Styrene	U		0.00768	0.0250	25	10/05/2018 14:34	WG1176275
1,1,1,2-Tetrachloroethane	U		0.00962	0.0250	25	10/05/2018 14:34	WG1176275
1,1,2,2-Tetrachloroethane	U		0.00325	0.0250	25	10/05/2018 14:34	WG1176275
Tetrachloroethene	U		0.00930	0.0250	25	10/05/2018 14:34	WG1176275
Toluene	U		0.0103	0.0250	25	10/05/2018 14:34	WG1176275
1,1,1-Trichloroethane	U		0.00798	0.0250	25	10/05/2018 14:34	WG1176275
1,1,2-Trichloroethane	U		0.00958	0.0250	25	10/05/2018 14:34	WG1176275
Trichloroethene	U		0.00995	0.0250	25	10/05/2018 14:34	WG1176275
1,2,4-Trimethylbenzene	U		0.00932	0.0250	25	10/05/2018 14:34	WG1176275
1,3,5-Trimethylbenzene	U		0.00968	0.0250	25	10/05/2018 14:34	WG1176275
Vinyl chloride	U		0.00648	0.0250	25	10/05/2018 14:34	WG1176275
o-Xylene	U		0.00852	0.0250	25	10/05/2018 14:34	WG1176275
m&p-Xylene	U		0.0180	0.0500	25	10/05/2018 14:34	WG1176275
Xylenes, Total	U		0.0265	0.0750	25	10/05/2018 14:34	WG1176275
(S) Toluene-d8	*100*			*80.0-120*		*10/05/2018 14:34*	WG1176275
(S) Dibromofluoromethane	*118*			*75.0-120*		*10/05/2018 14:34*	WG1176275
(S) 4-Bromofluorobenzene	*114*			*77.0-126*		*10/05/2018 14:34*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	2.63		0.0247	0.100	1	10/09/2018 18:58	WG1177736
(S) o-Terphenyl	*83.7*			*31.0-160*		*10/09/2018 18:58*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1610		7.05	25.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 16:14	WG1178387

Sample Narrative:

L1031734-14 WG1178387: matrix interference: high sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	123		0.260	5.00	5	10/09/2018 10:03	WG1176348
Fluoride	1.64		0.00990	0.100	1	10/09/2018 08:14	WG1176348
Sulfate	736		0.774	50.0	10	10/09/2018 21:45	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0159		0.00125	0.0100	5	10/11/2018 00:58	WG1176330
Barium	0.0306		0.000360	0.00500	1	10/11/2018 15:00	WG1179423
Calcium	275		0.230	5.00	5	10/11/2018 00:58	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 00:58	WG1176330
Iron	U		0.0750	0.500	5	10/11/2018 00:58	WG1176330
Lead	U		0.00120	0.0100	5	10/11/2018 00:58	WG1176330
Manganese	0.0152	B J	0.00125	0.0250	5	10/11/2018 00:58	WG1176330
Potassium	8.34		0.185	5.00	5	10/11/2018 00:58	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 00:58	WG1176330
Sodium	86.6		0.110	1.00	1	10/11/2018 15:00	WG1179423

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	1.44		0.0314	0.100	1	10/08/2018 14:21	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*95.4*			*78.0-120*		*10/08/2018 14:21*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 14:54	WG1176275
Benzene	0.198		0.00166	0.00500	5	10/11/2018 03:10	WG1179145
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 14:54	WG1176275
Bromoform	U		0.000469	0.00100	1	10/05/2018 14:54	WG1176275
Bromomethane	U		0.000866	0.00500	1	10/05/2018 14:54	WG1176275
n-Butylbenzene	0.000466	J	0.000361	0.00100	1	10/05/2018 14:54	WG1176275
sec-Butylbenzene	0.0354		0.000365	0.00100	1	10/05/2018 14:54	WG1176275
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 14:54	WG1176275
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 14:54	WG1176275
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 14:54	WG1176275
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 14:54	WG1176275
Chloroethane	U	J4	0.000453	0.00500	1	10/05/2018 14:54	WG1176275
Chloroform	U		0.000324	0.00500	1	10/05/2018 14:54	WG1176275

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.000276	0.00250	1	10/05/2018 14:54	WG1176275
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 14:54	WG1176275
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 14:54	WG1176275
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 14:54	WG1176275
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 14:54	WG1176275
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 14:54	WG1176275
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 14:54	WG1176275
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 14:54	WG1176275
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 14:54	WG1176275
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 14:54	WG1176275
Ethylbenzene	0.00315		0.000384	0.00100	1	10/05/2018 14:54	WG1176275
Isopropylbenzene	0.0408		0.000326	0.00100	1	10/05/2018 14:54	WG1176275
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 14:54	WG1176275
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 14:54	WG1176275
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 14:54	WG1176275
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 14:54	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 14:54	WG1176275
Methyl tert-butyl ether	0.00661		0.000367	0.00100	1	10/05/2018 14:54	WG1176275
Naphthalene	0.00175	J	0.00100	0.00500	1	10/05/2018 14:54	WG1176275
n-Propylbenzene	0.00317		0.000349	0.00100	1	10/05/2018 14:54	WG1176275
Styrene	U		0.000307	0.00100	1	10/05/2018 14:54	WG1176275
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 14:54	WG1176275
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 14:54	WG1176275
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 14:54	WG1176275
Toluene	0.000463	J	0.000412	0.00100	1	10/05/2018 14:54	WG1176275
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 14:54	WG1176275
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 14:54	WG1176275
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 14:54	WG1176275
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 14:54	WG1176275
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 14:54	WG1176275
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 14:54	WG1176275
o-Xylene	U		0.000341	0.00100	1	10/05/2018 14:54	WG1176275
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 14:54	WG1176275
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 14:54	WG1176275
(S) Toluene-d8	*100*			*80.0-120*		*10/05/2018 14:54*	WG1176275
(S) Toluene-d8	*103*			*80.0-120*		*10/11/2018 03:10*	WG1179145
(S) Dibromofluoromethane	*105*			*75.0-120*		*10/05/2018 14:54*	WG1176275
(S) Dibromofluoromethane	*93.0*			*75.0-120*		*10/11/2018 03:10*	WG1179145
(S) 4-Bromofluorobenzene	*116*			*77.0-126*		*10/05/2018 14:54*	WG1176275
(S) 4-Bromofluorobenzene	*99.0*			*77.0-126*		*10/11/2018 03:10*	WG1179145

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	3.05		0.0247	0.100	1	10/09/2018 19:15	WG1177736
(S) o-Terphenyl	*90.0*			*31.0-160*		*10/09/2018 19:15*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1390		14.1	50.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 16:22	WG1178387

Sample Narrative:

L1031734-15 WG1178387: matrix interference: high sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	309		0.519	10.0	10	10/09/2018 10:57	WG1176348
Fluoride	0.958		0.00990	0.100	1	10/09/2018 10:39	WG1176348
Sulfate	3.78	J	0.0774	5.00	1	10/09/2018 10:39	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0291		0.00125	0.0100	5	10/11/2018 01:03	WG1176330
Barium	2.33		0.000360	0.00500	1	10/11/2018 15:05	WG1179423
Calcium	77.9		0.230	5.00	5	10/11/2018 01:03	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 01:03	WG1176330
Iron	0.148	J	0.0750	0.500	5	10/11/2018 01:03	WG1176330
Lead	U		0.00120	0.0100	5	10/11/2018 01:03	WG1176330
Manganese	0.0644		0.00125	0.0250	5	10/11/2018 01:03	WG1176330
Potassium	1.36	B J	0.185	5.00	5	10/11/2018 01:03	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 01:03	WG1176330
Sodium	312		0.550	5.00	5	10/11/2018 01:03	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	141		3.14	10.0	100	10/10/2018 20:57	WG1179105
(S) a,a,a-Trifluorotoluene(FID)	*97.7*			*78.0-120*		*10/10/2018 20:57*	WG1179105

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.200	1.00	20	10/05/2018 15:15	WG1176275
Benzene	38.6		0.166	0.500	500	10/11/2018 03:30	WG1179145
Bromodichloromethane	U		0.00760	0.0200	20	10/05/2018 15:15	WG1176275
Bromoform	U		0.00938	0.0200	20	10/05/2018 15:15	WG1176275
Bromomethane	U		0.0173	0.100	20	10/05/2018 15:15	WG1176275
n-Butylbenzene	U		0.00722	0.0200	20	10/05/2018 15:15	WG1176275
sec-Butylbenzene	0.00971	J	0.00730	0.0200	20	10/05/2018 15:15	WG1176275
Carbon disulfide	U		0.00550	0.0200	20	10/05/2018 15:15	WG1176275
Carbon tetrachloride	U		0.00758	0.0200	20	10/05/2018 15:15	WG1176275
Chlorobenzene	U		0.00696	0.0200	20	10/05/2018 15:15	WG1176275
Chlorodibromomethane	U		0.00654	0.0200	20	10/05/2018 15:15	WG1176275
Chloroethane	U	J4	0.00906	0.100	20	10/05/2018 15:15	WG1176275
Chloroform	U		0.00648	0.100	20	10/05/2018 15:15	WG1176275

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.00552	0.0500	20	10/05/2018 15:15	WG1176275
1,2-Dibromoethane	U		0.00762	0.0200	20	10/05/2018 15:15	WG1176275
1,1-Dichloroethane	U		0.00518	0.0200	20	10/05/2018 15:15	WG1176275
1,2-Dichloroethane	U		0.00722	0.0200	20	10/05/2018 15:15	WG1176275
1,1-Dichloroethene	U		0.00796	0.0200	20	10/05/2018 15:15	WG1176275
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	10/05/2018 15:15	WG1176275
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	10/05/2018 15:15	WG1176275
1,2-Dichloropropane	U		0.00612	0.0200	20	10/05/2018 15:15	WG1176275
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	10/05/2018 15:15	WG1176275
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	10/05/2018 15:15	WG1176275
Ethylbenzene	2.47		0.00768	0.0200	20	10/05/2018 15:15	WG1176275
Isopropylbenzene	0.0804		0.00652	0.0200	20	10/05/2018 15:15	WG1176275
p-Isopropyltoluene	0.00781	J	0.00700	0.0200	20	10/05/2018 15:15	WG1176275
2-Butanone (MEK)	U		0.0786	0.200	20	10/05/2018 15:15	WG1176275
2-Hexanone	U		0.0764	0.200	20	10/05/2018 15:15	WG1176275
Methylene Chloride	U		0.0200	0.100	20	10/05/2018 15:15	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	10/05/2018 15:15	WG1176275
Methyl tert-butyl ether	0.510		0.00734	0.0200	20	10/05/2018 15:15	WG1176275
Naphthalene	0.158		0.0200	0.100	20	10/05/2018 15:15	WG1176275
n-Propylbenzene	0.119		0.00698	0.0200	20	10/05/2018 15:15	WG1176275
Styrene	U		0.00614	0.0200	20	10/05/2018 15:15	WG1176275
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	10/05/2018 15:15	WG1176275
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	10/05/2018 15:15	WG1176275
Tetrachloroethene	U		0.00744	0.0200	20	10/05/2018 15:15	WG1176275
Toluene	13.0		0.206	0.500	500	10/11/2018 03:30	WG1179145
1,1,1-Trichloroethane	U		0.00638	0.0200	20	10/05/2018 15:15	WG1176275
1,1,2-Trichloroethane	U		0.00766	0.0200	20	10/05/2018 15:15	WG1176275
Trichloroethene	U		0.00796	0.0200	20	10/05/2018 15:15	WG1176275
1,2,4-Trimethylbenzene	0.620		0.00746	0.0200	20	10/05/2018 15:15	WG1176275
1,3,5-Trimethylbenzene	0.123		0.00774	0.0200	20	10/05/2018 15:15	WG1176275
Vinyl chloride	U		0.00518	0.0200	20	10/05/2018 15:15	WG1176275
o-Xylene	1.06		0.00682	0.0200	20	10/05/2018 15:15	WG1176275
m&p-Xylene	3.66		0.0144	0.0400	20	10/05/2018 15:15	WG1176275
Xylenes, Total	4.72		0.0212	0.0600	20	10/05/2018 15:15	WG1176275
(S) Toluene-d8	*96.6*			*80.0-120*		*10/05/2018 15:15*	WG1176275
(S) Toluene-d8	*106*			*80.0-120*		*10/11/2018 03:30*	WG1179145
(S) Dibromofluoromethane	*91.1*			*75.0-120*		*10/05/2018 15:15*	WG1176275
(S) Dibromofluoromethane	*94.4*			*75.0-120*		*10/11/2018 03:30*	WG1179145
(S) 4-Bromofluorobenzene	*119*			*77.0-126*		*10/05/2018 15:15*	WG1176275
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/11/2018 03:30*	WG1179145

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	7.23		0.0247	0.100	1	10/09/2018 19:33	WG1177736
(S) o-Terphenyl	*76.3*			*31.0-160*		*10/09/2018 19:33*	WG1177736

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1280		7.05	25.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U	J6	0.0197	0.100	1	10/10/2018 16:23	WG1178387

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	284		0.519	10.0	10	10/09/2018 11:34	WG1176348
Fluoride	1.12		0.00990	0.100	1	10/09/2018 11:16	WG1176348
Sulfate	4.80	J	0.0774	5.00	1	10/09/2018 11:16	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00679	J	0.00125	0.0100	5	10/11/2018 01:07	WG1176330
Barium	1.71		0.000360	0.00500	1	10/11/2018 15:09	WG1179423
Calcium	127		0.230	5.00	5	10/11/2018 01:07	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 01:07	WG1176330
Iron	0.624		0.0750	0.500	5	10/11/2018 01:07	WG1176330
Lead	U		0.00120	0.0100	5	10/11/2018 01:07	WG1176330
Manganese	0.431		0.00125	0.0250	5	10/11/2018 01:07	WG1176330
Potassium	0.823	B J	0.185	5.00	5	10/11/2018 01:07	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 01:07	WG1176330
Sodium	229		0.550	5.00	5	10/11/2018 01:07	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	10.4		0.157	0.500	5	10/08/2018 15:02	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*99.1*			*78.0-120*		*10/08/2018 15:02*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		1.00	5.00	100	10/05/2018 15:35	WG1176275
Benzene	2.84		0.0166	0.0500	50	10/11/2018 03:49	WG1179145
Bromodichloromethane	U		0.0380	0.100	100	10/05/2018 15:35	WG1176275
Bromoform	U		0.0469	0.100	100	10/05/2018 15:35	WG1176275
Bromomethane	U		0.0866	0.500	100	10/05/2018 15:35	WG1176275
n-Butylbenzene	U		0.0361	0.100	100	10/05/2018 15:35	WG1176275
sec-Butylbenzene	U		0.0365	0.100	100	10/05/2018 15:35	WG1176275
Carbon disulfide	U		0.0275	0.100	100	10/05/2018 15:35	WG1176275
Carbon tetrachloride	U		0.0379	0.100	100	10/05/2018 15:35	WG1176275
Chlorobenzene	U		0.0348	0.100	100	10/05/2018 15:35	WG1176275
Chlorodibromomethane	U		0.0327	0.100	100	10/05/2018 15:35	WG1176275
Chloroethane	U	J4	0.0453	0.500	100	10/05/2018 15:35	WG1176275
Chloroform	U		0.0324	0.500	100	10/05/2018 15:35	WG1176275
Chloromethane	U		0.0276	0.250	100	10/05/2018 15:35	WG1176275
1,2-Dibromoethane	U		0.0381	0.100	100	10/05/2018 15:35	WG1176275
1,1-Dichloroethane	U		0.0259	0.100	100	10/05/2018 15:35	WG1176275

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.0361	0.100	100	10/05/2018 15:35	WG1176275
1,1-Dichloroethene	U		0.0398	0.100	100	10/05/2018 15:35	WG1176275
cis-1,2-Dichloroethene	U		0.0260	0.100	100	10/05/2018 15:35	WG1176275
trans-1,2-Dichloroethene	U		0.0396	0.100	100	10/05/2018 15:35	WG1176275
1,2-Dichloropropane	U		0.0306	0.100	100	10/05/2018 15:35	WG1176275
cis-1,3-Dichloropropene	U		0.0418	0.100	100	10/05/2018 15:35	WG1176275
trans-1,3-Dichloropropene	U		0.0419	0.100	100	10/05/2018 15:35	WG1176275
Ethylbenzene	U		0.0384	0.100	100	10/05/2018 15:35	WG1176275
Isopropylbenzene	0.0545	J	0.0326	0.100	100	10/05/2018 15:35	WG1176275
p-Isopropyltoluene	U		0.0350	0.100	100	10/05/2018 15:35	WG1176275
2-Butanone (MEK)	U		0.393	1.00	100	10/05/2018 15:35	WG1176275
2-Hexanone	U		0.382	1.00	100	10/05/2018 15:35	WG1176275
Methylene Chloride	U		0.100	0.500	100	10/05/2018 15:35	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	10/05/2018 15:35	WG1176275
Methyl tert-butyl ether	2.38		0.0367	0.100	100	10/05/2018 15:35	WG1176275
Naphthalene	U		0.100	0.500	100	10/05/2018 15:35	WG1176275
n-Propylbenzene	0.0881	J	0.0349	0.100	100	10/05/2018 15:35	WG1176275
Styrene	U		0.0307	0.100	100	10/05/2018 15:35	WG1176275
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	10/05/2018 15:35	WG1176275
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	10/05/2018 15:35	WG1176275
Tetrachloroethene	U		0.0372	0.100	100	10/05/2018 15:35	WG1176275
Toluene	U		0.0206	0.0500	50	10/11/2018 03:49	WG1179145
1,1,1-Trichloroethane	U		0.0319	0.100	100	10/05/2018 15:35	WG1176275
1,1,2-Trichloroethane	U		0.0383	0.100	100	10/05/2018 15:35	WG1176275
Trichloroethene	U		0.0398	0.100	100	10/05/2018 15:35	WG1176275
1,2,4-Trimethylbenzene	U		0.0373	0.100	100	10/05/2018 15:35	WG1176275
1,3,5-Trimethylbenzene	U		0.0387	0.100	100	10/05/2018 15:35	WG1176275
Vinyl chloride	U		0.0259	0.100	100	10/05/2018 15:35	WG1176275
o-Xylene	U		0.0341	0.100	100	10/05/2018 15:35	WG1176275
m&p-Xylene	U		0.0719	0.200	100	10/05/2018 15:35	WG1176275
Xylenes, Total	U		0.106	0.300	100	10/05/2018 15:35	WG1176275
(S) Toluene-d8	*98.7*			*80.0-120*		*10/05/2018 15:35*	WG1176275
(S) Toluene-d8	*106*			*80.0-120*		*10/11/2018 03:49*	WG1179145
(S) Dibromofluoromethane	*113*			*75.0-120*		*10/05/2018 15:35*	WG1176275
(S) Dibromofluoromethane	*94.8*			*75.0-120*		*10/11/2018 03:49*	WG1179145
(S) 4-Bromofluorobenzene	*115*			*77.0-126*		*10/05/2018 15:35*	WG1176275
(S) 4-Bromofluorobenzene	*98.7*			*77.0-126*		*10/11/2018 03:49*	WG1179145

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.57		0.0247	0.100	1	10/09/2018 21:17	WG1177736
(S) o-Terphenyl	*87.4*			*31.0-160*		*10/09/2018 21:17*	WG1177736

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1490		7.05	25.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 16:28	WG1178387

Sample Narrative:

L1031734-17 WG1178387: matrix interference: high sulfide content

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	254		0.519	10.0	10	10/09/2018 12:46	WG1176348
Fluoride	0.883		0.00990	0.100	1	10/09/2018 11:52	WG1176348
Sulfate	6.33		0.0774	5.00	1	10/09/2018 11:52	WG1176348

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0130		0.00125	0.0100	5	10/11/2018 01:12	WG1176330
Barium	7.92		0.00180	0.0250	5	10/11/2018 16:03	WG1179423
Calcium	88.3		0.230	5.00	5	10/11/2018 01:12	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 01:12	WG1176330
Iron	0.103	J	0.0750	0.500	5	10/11/2018 01:12	WG1176330
Lead	0.00376	J	0.00120	0.0100	5	10/11/2018 01:12	WG1176330
Manganese	0.0381		0.00125	0.0250	5	10/11/2018 01:12	WG1176330
Potassium	0.605	B J	0.185	5.00	5	10/11/2018 01:12	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 01:12	WG1176330
Sodium	377		0.550	5.00	5	10/11/2018 01:12	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	41.8		3.14	10.0	100	10/08/2018 15:23	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*104*			*78.0-120*		*10/08/2018 15:23*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		5.00	25.0	500	10/05/2018 15:55	WG1176275
Benzene	12.9		0.166	0.500	500	10/05/2018 15:55	WG1176275
Bromodichloromethane	U		0.190	0.500	500	10/05/2018 15:55	WG1176275
Bromoform	U		0.234	0.500	500	10/05/2018 15:55	WG1176275
Bromomethane	U		0.433	2.50	500	10/05/2018 15:55	WG1176275
n-Butylbenzene	U		0.180	0.500	500	10/05/2018 15:55	WG1176275
sec-Butylbenzene	U		0.182	0.500	500	10/05/2018 15:55	WG1176275
Carbon disulfide	U		0.138	0.500	500	10/05/2018 15:55	WG1176275
Carbon tetrachloride	U		0.190	0.500	500	10/05/2018 15:55	WG1176275
Chlorobenzene	U		0.174	0.500	500	10/05/2018 15:55	WG1176275
Chlorodibromomethane	U		0.164	0.500	500	10/05/2018 15:55	WG1176275
Chloroethane	U	J4	0.226	2.50	500	10/05/2018 15:55	WG1176275
Chloroform	U		0.162	2.50	500	10/05/2018 15:55	WG1176275

MW-102

Collected date/time: 10/02/18 12:25

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L1031734

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.138	1.25	500	10/05/2018 15:55	WG1176275
1,2-Dibromoethane	U		0.190	0.500	500	10/05/2018 15:55	WG1176275
1,1-Dichloroethane	U		0.130	0.500	500	10/05/2018 15:55	WG1176275
1,2-Dichloroethane	U		0.180	0.500	500	10/05/2018 15:55	WG1176275
1,1-Dichloroethene	U		0.199	0.500	500	10/05/2018 15:55	WG1176275
cis-1,2-Dichloroethene	U		0.130	0.500	500	10/05/2018 15:55	WG1176275
trans-1,2-Dichloroethene	U		0.198	0.500	500	10/05/2018 15:55	WG1176275
1,2-Dichloropropane	U		0.153	0.500	500	10/05/2018 15:55	WG1176275
cis-1,3-Dichloropropene	U		0.209	0.500	500	10/05/2018 15:55	WG1176275
trans-1,3-Dichloropropene	U		0.210	0.500	500	10/05/2018 15:55	WG1176275
Ethylbenzene	0.648		0.192	0.500	500	10/05/2018 15:55	WG1176275
Isopropylbenzene	U		0.163	0.500	500	10/05/2018 15:55	WG1176275
p-Isopropyltoluene	U		0.175	0.500	500	10/05/2018 15:55	WG1176275
2-Butanone (MEK)	U		1.96	5.00	500	10/05/2018 15:55	WG1176275
2-Hexanone	U		1.91	5.00	500	10/05/2018 15:55	WG1176275
Methylene Chloride	U		0.500	2.50	500	10/05/2018 15:55	WG1176275
4-Methyl-2-pentanone (MIBK)	U		1.07	5.00	500	10/05/2018 15:55	WG1176275
Methyl tert-butyl ether	1.68		0.184	0.500	500	10/05/2018 15:55	WG1176275
Naphthalene	U		0.500	2.50	500	10/05/2018 15:55	WG1176275
n-Propylbenzene	U		0.174	0.500	500	10/05/2018 15:55	WG1176275
Styrene	U		0.154	0.500	500	10/05/2018 15:55	WG1176275
1,1,1,2-Tetrachloroethane	U		0.192	0.500	500	10/05/2018 15:55	WG1176275
1,1,2,2-Tetrachloroethane	U		0.0650	0.500	500	10/05/2018 15:55	WG1176275
Tetrachloroethene	U		0.186	0.500	500	10/05/2018 15:55	WG1176275
Toluene	0.889		0.206	0.500	500	10/05/2018 15:55	WG1176275
1,1,1-Trichloroethane	U		0.160	0.500	500	10/05/2018 15:55	WG1176275
1,1,2-Trichloroethane	U		0.192	0.500	500	10/05/2018 15:55	WG1176275
Trichloroethene	U		0.199	0.500	500	10/05/2018 15:55	WG1176275
1,2,4-Trimethylbenzene	0.196	J	0.186	0.500	500	10/05/2018 15:55	WG1176275
1,3,5-Trimethylbenzene	U		0.194	0.500	500	10/05/2018 15:55	WG1176275
Vinyl chloride	U		0.130	0.500	500	10/05/2018 15:55	WG1176275
o-Xylene	U		0.170	0.500	500	10/05/2018 15:55	WG1176275
m&p-Xylene	0.478	J	0.360	1.00	500	10/05/2018 15:55	WG1176275
Xylenes, Total	U		0.530	1.50	500	10/05/2018 15:55	WG1176275
(S) Toluene-d8	*100*			*80.0-120*		*10/05/2018 15:55*	WG1176275
(S) Dibromofluoromethane	*113*			*75.0-120*		*10/05/2018 15:55*	WG1176275
(S) 4-Bromofluorobenzene	*117*			*77.0-126*		*10/05/2018 15:55*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	10.4		0.123	0.500	5	10/10/2018 12:02	WG1177736
(S) o-Terphenyl	*96.8*			*31.0-160*		*10/10/2018 12:02*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1810		14.1	50.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 16:29	WG1178387

Sample Narrative:

L1031734-18 WG1178387: matrix interference: high sulfide content

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	0.00263	J P1	0.00180	0.00500	1	10/09/2018 08:47	WG1177361

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	151		0.260	5.00	5	10/09/2018 13:59	WG1176348
Fluoride	1.08	J3	0.00990	0.100	1	10/09/2018 13:05	WG1176348
Sulfate	960		1.55	100	20	10/10/2018 21:52	WG1178750

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.000108	J	0.0000490	0.000200	1	10/07/2018 08:00	WG1176292

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	1.16		0.0126	0.200	1	10/07/2018 15:50	WG1176325

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00486	J	0.00125	0.0100	5	10/11/2018 01:17	WG1176330
Barium	0.0652		0.000360	0.00500	1	10/11/2018 15:19	WG1179423
Cadmium	U		0.000160	0.00100	1	10/11/2018 11:44	WG1176330
Calcium	212		0.230	5.00	5	10/11/2018 01:17	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 01:17	WG1176330
Cobalt	U		0.00130	0.0100	5	10/11/2018 01:17	WG1176330
Iron	0.0971	J	0.0750	0.500	5	10/11/2018 01:17	WG1176330
Lead	0.00453	J	0.00120	0.0100	5	10/11/2018 01:17	WG1176330
Manganese	0.0509		0.00125	0.0250	5	10/11/2018 01:17	WG1176330
Nickel	0.00659	J	0.00175	0.0100	5	10/11/2018 01:17	WG1176330
Potassium	1.72	B J	0.185	5.00	5	10/11/2018 01:17	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 01:17	WG1176330
Sodium	97.0		0.110	1.00	1	10/11/2018 15:19	WG1179423
Uranium	U		0.00165	0.0500	5	10/11/2018 01:17	WG1176330
Vanadium	0.00111	B J	0.000900	0.0250	5	10/11/2018 01:17	WG1176330

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.30		0.0314	0.100	1	10/08/2018 15:44	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*98.8*			*78.0-120*		*10/08/2018 15:44*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.200	1.00	20	10/11/2018 04:09	WG1179145
Benzene	0.356		0.00662	0.0200	20	10/11/2018 04:09	WG1179145
Bromodichloromethane	U		0.00760	0.0200	20	10/11/2018 04:09	WG1179145
Bromoform	U		0.00938	0.0200	20	10/11/2018 04:09	WG1179145
Bromomethane	U		0.0173	0.100	20	10/11/2018 04:09	WG1179145
n-Butylbenzene	U		0.00722	0.0200	20	10/11/2018 04:09	WG1179145
sec-Butylbenzene	U		0.00730	0.0200	20	10/11/2018 04:09	WG1179145
Carbon disulfide	0.00753	J	0.00550	0.0200	20	10/11/2018 04:09	WG1179145
Carbon tetrachloride	U		0.00758	0.0200	20	10/11/2018 04:09	WG1179145
Chlorobenzene	U		0.00696	0.0200	20	10/11/2018 04:09	WG1179145
Chlorodibromomethane	U		0.00654	0.0200	20	10/11/2018 04:09	WG1179145
Chloroethane	U		0.00906	0.100	20	10/11/2018 04:09	WG1179145
Chloroform	U		0.00648	0.100	20	10/11/2018 04:09	WG1179145
Chloromethane	U		0.00552	0.0500	20	10/11/2018 04:09	WG1179145
1,2-Dibromoethane	U		0.00762	0.0200	20	10/11/2018 04:09	WG1179145
1,1-Dichloroethane	U		0.00518	0.0200	20	10/11/2018 04:09	WG1179145
1,2-Dichloroethane	U		0.00722	0.0200	20	10/11/2018 04:09	WG1179145
1,1-Dichloroethene	U		0.00796	0.0200	20	10/11/2018 04:09	WG1179145
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	10/11/2018 04:09	WG1179145
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	10/11/2018 04:09	WG1179145
1,2-Dichloropropane	U		0.00612	0.0200	20	10/11/2018 04:09	WG1179145
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	10/11/2018 04:09	WG1179145
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	10/11/2018 04:09	WG1179145
Ethylbenzene	0.00788	J	0.00768	0.0200	20	10/11/2018 04:09	WG1179145
Isopropylbenzene	0.00981	J	0.00652	0.0200	20	10/11/2018 04:09	WG1179145
p-Isopropyltoluene	U		0.00700	0.0200	20	10/11/2018 04:09	WG1179145
2-Butanone (MEK)	U		0.0786	0.200	20	10/11/2018 04:09	WG1179145
2-Hexanone	U		0.0764	0.200	20	10/11/2018 04:09	WG1179145
Methylene Chloride	U		0.0200	0.100	20	10/11/2018 04:09	WG1179145
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	10/11/2018 04:09	WG1179145
Methyl tert-butyl ether	0.0425		0.00734	0.0200	20	10/11/2018 04:09	WG1179145
Naphthalene	U		0.0200	0.100	20	10/11/2018 04:09	WG1179145
n-Propylbenzene	0.0117	J	0.00698	0.0200	20	10/11/2018 04:09	WG1179145
Styrene	U		0.00614	0.0200	20	10/11/2018 04:09	WG1179145
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	10/11/2018 04:09	WG1179145
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	10/11/2018 04:09	WG1179145
Tetrachloroethene	U		0.00744	0.0200	20	10/11/2018 04:09	WG1179145
Toluene	U		0.00824	0.0200	20	10/11/2018 04:09	WG1179145
1,1,1-Trichloroethane	U		0.00638	0.0200	20	10/11/2018 04:09	WG1179145
1,1,2-Trichloroethane	U		0.00766	0.0200	20	10/11/2018 04:09	WG1179145
Trichloroethene	U		0.00796	0.0200	20	10/11/2018 04:09	WG1179145
1,2,4-Trimethylbenzene	0.0165	J	0.00746	0.0200	20	10/11/2018 04:09	WG1179145
1,3,5-Trimethylbenzene	U		0.00774	0.0200	20	10/11/2018 04:09	WG1179145
Vinyl chloride	U		0.00518	0.0200	20	10/11/2018 04:09	WG1179145
o-Xylene	U		0.00682	0.0200	20	10/11/2018 04:09	WG1179145
m&p-Xylene	0.0301	J	0.0144	0.0400	20	10/11/2018 04:09	WG1179145
Xylenes, Total	0.0301	J	0.0212	0.0600	20	10/11/2018 04:09	WG1179145
(S) Toluene-d8	*105*			*80.0-120*		*10/11/2018 04:09*	WG1179145
(S) Dibromofluoromethane	*93.8*			*75.0-120*		*10/11/2018 04:09*	WG1179145

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/11/2018 04:09*	WG1179145

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.68		0.0247	0.100	1	10/09/2018 21:52	WG1177736
(S) o-Terphenyl	*88.4*			*31.0-160*		*10/09/2018 21:52*	WG1177736

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2180		14.1	50.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 16:31	WG1178387

Sample Narrative:

L1031734-19 WG1178387: matrix interference: high sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	279		0.519	10.0	10	10/09/2018 14:54	WG1176348
Fluoride	1.46		0.00990	0.100	1	10/09/2018 14:35	WG1176348
Sulfate	797		0.774	50.0	10	10/09/2018 14:54	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00157	J	0.00125	0.0100	5	10/11/2018 01:21	WG1176330
Barium	0.0316		0.000360	0.00500	1	10/11/2018 15:23	WG1179423
Calcium	257		0.230	5.00	5	10/11/2018 01:21	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 01:21	WG1176330
Iron	U		0.0750	0.500	5	10/11/2018 01:21	WG1176330
Lead	0.00145	J	0.00120	0.0100	5	10/11/2018 01:21	WG1176330
Manganese	0.0190	B J	0.00125	0.0250	5	10/11/2018 01:21	WG1176330
Potassium	2.99	B J	0.185	5.00	5	10/11/2018 01:21	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 01:21	WG1176330
Sodium	258		0.550	5.00	5	10/11/2018 01:21	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	13.4		0.628	2.00	20	10/08/2018 16:05	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/08/2018 16:05*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.500	2.50	50	10/05/2018 16:36	WG1176275
Benzene	1.52		0.0166	0.0500	50	10/05/2018 16:36	WG1176275
Bromodichloromethane	U		0.0190	0.0500	50	10/05/2018 16:36	WG1176275
Bromoform	U		0.0234	0.0500	50	10/05/2018 16:36	WG1176275
Bromomethane	U		0.0433	0.250	50	10/05/2018 16:36	WG1176275
n-Butylbenzene	U		0.0180	0.0500	50	10/05/2018 16:36	WG1176275
sec-Butylbenzene	U		0.0182	0.0500	50	10/05/2018 16:36	WG1176275
Carbon disulfide	U		0.0138	0.0500	50	10/05/2018 16:36	WG1176275
Carbon tetrachloride	U		0.0190	0.0500	50	10/05/2018 16:36	WG1176275
Chlorobenzene	U		0.0174	0.0500	50	10/05/2018 16:36	WG1176275
Chlorodibromomethane	U		0.0164	0.0500	50	10/05/2018 16:36	WG1176275
Chloroethane	U	J4	0.0226	0.250	50	10/05/2018 16:36	WG1176275
Chloroform	U		0.0162	0.250	50	10/05/2018 16:36	WG1176275

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.0138	0.125	50	10/05/2018 16:36	WG1176275
1,2-Dibromoethane	U		0.0190	0.0500	50	10/05/2018 16:36	WG1176275
1,1-Dichloroethane	U		0.0130	0.0500	50	10/05/2018 16:36	WG1176275
1,2-Dichloroethane	U		0.0180	0.0500	50	10/05/2018 16:36	WG1176275
1,1-Dichloroethene	U		0.0199	0.0500	50	10/05/2018 16:36	WG1176275
cis-1,2-Dichloroethene	U		0.0130	0.0500	50	10/05/2018 16:36	WG1176275
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	10/05/2018 16:36	WG1176275
1,2-Dichloropropane	U		0.0153	0.0500	50	10/05/2018 16:36	WG1176275
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	10/05/2018 16:36	WG1176275
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	10/05/2018 16:36	WG1176275
Ethylbenzene	0.0367	J	0.0192	0.0500	50	10/05/2018 16:36	WG1176275
Isopropylbenzene	0.0978		0.0163	0.0500	50	10/05/2018 16:36	WG1176275
p-Isopropyltoluene	U		0.0175	0.0500	50	10/05/2018 16:36	WG1176275
2-Butanone (MEK)	U		0.196	0.500	50	10/05/2018 16:36	WG1176275
2-Hexanone	U		0.191	0.500	50	10/05/2018 16:36	WG1176275
Methylene Chloride	U		0.0500	0.250	50	10/05/2018 16:36	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	10/05/2018 16:36	WG1176275
Methyl tert-butyl ether	U		0.0184	0.0500	50	10/05/2018 16:36	WG1176275
Naphthalene	0.0940	J	0.0500	0.250	50	10/05/2018 16:36	WG1176275
n-Propylbenzene	0.140		0.0174	0.0500	50	10/05/2018 16:36	WG1176275
Styrene	U		0.0154	0.0500	50	10/05/2018 16:36	WG1176275
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	10/05/2018 16:36	WG1176275
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	10/05/2018 16:36	WG1176275
Tetrachloroethene	U		0.0186	0.0500	50	10/05/2018 16:36	WG1176275
Toluene	0.0795		0.0206	0.0500	50	10/05/2018 16:36	WG1176275
1,1,1-Trichloroethane	U		0.0160	0.0500	50	10/05/2018 16:36	WG1176275
1,1,2-Trichloroethane	U		0.0192	0.0500	50	10/05/2018 16:36	WG1176275
Trichloroethene	U		0.0199	0.0500	50	10/05/2018 16:36	WG1176275
1,2,4-Trimethylbenzene	0.165		0.0186	0.0500	50	10/05/2018 16:36	WG1176275
1,3,5-Trimethylbenzene	U		0.0194	0.0500	50	10/05/2018 16:36	WG1176275
Vinyl chloride	U		0.0130	0.0500	50	10/05/2018 16:36	WG1176275
o-Xylene	U		0.0170	0.0500	50	10/05/2018 16:36	WG1176275
m&p-Xylene	0.353		0.0360	0.100	50	10/05/2018 16:36	WG1176275
Xylenes, Total	0.353		0.0530	0.150	50	10/05/2018 16:36	WG1176275
(S) Toluene-d8	*99.3*			*80.0-120*		*10/05/2018 16:36*	WG1176275
(S) Dibromofluoromethane	*113*			*75.0-120*		*10/05/2018 16:36*	WG1176275
(S) 4-Bromofluorobenzene	*117*			*77.0-126*		*10/05/2018 16:36*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.40		0.0247	0.100	1	10/09/2018 22:09	WG1177736
(S) o-Terphenyl	*104*			*31.0-160*		*10/09/2018 22:09*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2100		14.1	50.0	1	10/09/2018 16:56	WG1177173

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 16:32	WG1178387

Sample Narrative:

L1031734-20 WG1178387: matrix interference: high sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	264		0.519	10.0	10	10/09/2018 15:30	WG1176348
Fluoride	1.91		0.00990	0.100	1	10/09/2018 15:12	WG1176348
Sulfate	500		0.774	50.0	10	10/09/2018 15:30	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00419	J	0.00125	0.0100	5	10/11/2018 01:26	WG1176330
Barium	0.0529		0.000360	0.00500	1	10/11/2018 15:28	WG1179423
Calcium	259		0.230	5.00	5	10/11/2018 01:26	WG1176330
Chromium	U		0.00270	0.0100	5	10/11/2018 01:26	WG1176330
Iron	0.0752	J	0.0750	0.500	5	10/11/2018 01:26	WG1176330
Lead	U		0.00120	0.0100	5	10/11/2018 01:26	WG1176330
Manganese	0.00287	B J	0.00125	0.0250	5	10/11/2018 01:26	WG1176330
Potassium	2.22	B J	0.185	5.00	5	10/11/2018 01:26	WG1176330
Selenium	U		0.00190	0.0100	5	10/11/2018 01:26	WG1176330
Sodium	270		0.550	5.00	5	10/11/2018 01:26	WG1176330

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	11.6		3.14	10.0	100	10/08/2018 16:25	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*104*			*78.0-120*		*10/08/2018 16:25*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		1.00	5.00	100	10/05/2018 16:56	WG1176275
Benzene	1.54		0.0331	0.100	100	10/05/2018 16:56	WG1176275
Bromodichloromethane	U		0.0380	0.100	100	10/05/2018 16:56	WG1176275
Bromoform	U		0.0469	0.100	100	10/05/2018 16:56	WG1176275
Bromomethane	U		0.0866	0.500	100	10/05/2018 16:56	WG1176275
n-Butylbenzene	U		0.0361	0.100	100	10/05/2018 16:56	WG1176275
sec-Butylbenzene	U		0.0365	0.100	100	10/05/2018 16:56	WG1176275
Carbon disulfide	U		0.0275	0.100	100	10/05/2018 16:56	WG1176275
Carbon tetrachloride	U		0.0379	0.100	100	10/05/2018 16:56	WG1176275
Chlorobenzene	U		0.0348	0.100	100	10/05/2018 16:56	WG1176275
Chlorodibromomethane	U		0.0327	0.100	100	10/05/2018 16:56	WG1176275
Chloroethane	U	J4	0.0453	0.500	100	10/05/2018 16:56	WG1176275
Chloroform	U		0.0324	0.500	100	10/05/2018 16:56	WG1176275

MW-62

Collected date/time: 10/02/18 15:30

SAMPLE RESULTS - 20

L1031734

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.0276	0.250	100	10/05/2018 16:56	WG1176275
1,2-Dibromoethane	U		0.0381	0.100	100	10/05/2018 16:56	WG1176275
1,1-Dichloroethane	U		0.0259	0.100	100	10/05/2018 16:56	WG1176275
1,2-Dichloroethane	U		0.0361	0.100	100	10/05/2018 16:56	WG1176275
1,1-Dichloroethene	U		0.0398	0.100	100	10/05/2018 16:56	WG1176275
cis-1,2-Dichloroethene	U		0.0260	0.100	100	10/05/2018 16:56	WG1176275
trans-1,2-Dichloroethene	U		0.0396	0.100	100	10/05/2018 16:56	WG1176275
1,2-Dichloropropane	U		0.0306	0.100	100	10/05/2018 16:56	WG1176275
cis-1,3-Dichloropropene	U		0.0418	0.100	100	10/05/2018 16:56	WG1176275
trans-1,3-Dichloropropene	U		0.0419	0.100	100	10/05/2018 16:56	WG1176275
Ethylbenzene	0.106		0.0384	0.100	100	10/05/2018 16:56	WG1176275
Isopropylbenzene	0.112		0.0326	0.100	100	10/05/2018 16:56	WG1176275
p-Isopropyltoluene	U		0.0350	0.100	100	10/05/2018 16:56	WG1176275
2-Butanone (MEK)	U		0.393	1.00	100	10/05/2018 16:56	WG1176275
2-Hexanone	U		0.382	1.00	100	10/05/2018 16:56	WG1176275
Methylene Chloride	U		0.100	0.500	100	10/05/2018 16:56	WG1176275
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	10/05/2018 16:56	WG1176275
Methyl tert-butyl ether	U		0.0367	0.100	100	10/05/2018 16:56	WG1176275
Naphthalene	0.183	J	0.100	0.500	100	10/05/2018 16:56	WG1176275
n-Propylbenzene	0.216		0.0349	0.100	100	10/05/2018 16:56	WG1176275
Styrene	U		0.0307	0.100	100	10/05/2018 16:56	WG1176275
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	10/05/2018 16:56	WG1176275
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	10/05/2018 16:56	WG1176275
Tetrachloroethene	U		0.0372	0.100	100	10/05/2018 16:56	WG1176275
Toluene	U		0.0412	0.100	100	10/05/2018 16:56	WG1176275
1,1,1-Trichloroethane	U		0.0319	0.100	100	10/05/2018 16:56	WG1176275
1,1,2-Trichloroethane	U		0.0383	0.100	100	10/05/2018 16:56	WG1176275
Trichloroethene	U		0.0398	0.100	100	10/05/2018 16:56	WG1176275
1,2,4-Trimethylbenzene	0.602		0.0373	0.100	100	10/05/2018 16:56	WG1176275
1,3,5-Trimethylbenzene	0.144		0.0387	0.100	100	10/05/2018 16:56	WG1176275
Vinyl chloride	U		0.0259	0.100	100	10/05/2018 16:56	WG1176275
o-Xylene	U		0.0341	0.100	100	10/05/2018 16:56	WG1176275
m&p-Xylene	0.871		0.0719	0.200	100	10/05/2018 16:56	WG1176275
Xylenes, Total	0.871		0.106	0.300	100	10/05/2018 16:56	WG1176275
(S) Toluene-d8	*98.1*			*80.0-120*		*10/05/2018 16:56*	WG1176275
(S) Dibromofluoromethane	*114*			*75.0-120*		*10/05/2018 16:56*	WG1176275
(S) 4-Bromofluorobenzene	*116*			*77.0-126*		*10/05/2018 16:56*	WG1176275

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	7.19		0.0247	0.100	1	10/09/2018 22:27	WG1177736
(S) o-Terphenyl	*104*			*31.0-160*		*10/09/2018 22:27*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2320	J3	14.1	50.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 19:35	WG1178390

Sample Narrative:

L1031734-21 WG1178390: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	98.3		0.0519	1.00	1	10/09/2018 16:24	WG1176348
Fluoride	1.65		0.00990	0.100	1	10/09/2018 16:24	WG1176348
Sulfate	1640		1.55	100	20	10/09/2018 22:21	WG1176348

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.000968	J	0.000250	0.00200	1	10/09/2018 19:23	WG1176332
Barium	0.0182		0.000360	0.00500	1	10/09/2018 19:23	WG1176332
Calcium	490		0.0460	1.00	1	10/09/2018 19:23	WG1176332
Chromium	0.000615	J	0.000540	0.00200	1	10/09/2018 19:23	WG1176332
Iron	0.0174	J	0.0150	0.100	1	10/09/2018 19:23	WG1176332
Lead	0.00903	B J	0.00120	0.0100	5	10/09/2018 21:53	WG1176332
Manganese	0.0210		0.000250	0.00500	1	10/09/2018 19:23	WG1176332
Potassium	0.249	J	0.0370	1.00	1	10/09/2018 19:23	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 19:23	WG1176332
Sodium	93.9		0.110	1.00	1	10/09/2018 19:23	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	20.9		3.14	10.0	100	10/08/2018 16:46	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*103*			*78.0-120*		*10/08/2018 16:46*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.500	2.50	50	10/05/2018 08:00	WG1176278
Benzene	2.64		0.0166	0.0500	50	10/05/2018 08:00	WG1176278
Bromodichloromethane	U		0.0190	0.0500	50	10/05/2018 08:00	WG1176278
Bromoform	U		0.0234	0.0500	50	10/05/2018 08:00	WG1176278
Bromomethane	U		0.0433	0.250	50	10/05/2018 08:00	WG1176278
n-Butylbenzene	U		0.0180	0.0500	50	10/05/2018 08:00	WG1176278
sec-Butylbenzene	U		0.0182	0.0500	50	10/05/2018 08:00	WG1176278
Carbon disulfide	U		0.0138	0.0500	50	10/05/2018 08:00	WG1176278
Carbon tetrachloride	U		0.0190	0.0500	50	10/05/2018 08:00	WG1176278
Chlorobenzene	U		0.0174	0.0500	50	10/05/2018 08:00	WG1176278
Chlorodibromomethane	U		0.0164	0.0500	50	10/05/2018 08:00	WG1176278
Chloroethane	U		0.0226	0.250	50	10/05/2018 08:00	WG1176278
Chloroform	U		0.0162	0.250	50	10/05/2018 08:00	WG1176278

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.0138	0.125	50	10/05/2018 08:00	WG1176278
1,2-Dibromoethane	U		0.0190	0.0500	50	10/05/2018 08:00	WG1176278
1,1-Dichloroethane	U		0.0130	0.0500	50	10/05/2018 08:00	WG1176278
1,2-Dichloroethane	U		0.0180	0.0500	50	10/05/2018 08:00	WG1176278
1,1-Dichloroethene	U		0.0199	0.0500	50	10/05/2018 08:00	WG1176278
cis-1,2-Dichloroethene	U		0.0130	0.0500	50	10/05/2018 08:00	WG1176278
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	10/05/2018 08:00	WG1176278
1,2-Dichloropropane	U		0.0153	0.0500	50	10/05/2018 08:00	WG1176278
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	10/05/2018 08:00	WG1176278
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	10/05/2018 08:00	WG1176278
Ethylbenzene	1.09		0.0192	0.0500	50	10/05/2018 08:00	WG1176278
Isopropylbenzene	0.0816		0.0163	0.0500	50	10/05/2018 08:00	WG1176278
p-Isopropyltoluene	U		0.0175	0.0500	50	10/05/2018 08:00	WG1176278
2-Butanone (MEK)	U		0.196	0.500	50	10/05/2018 08:00	WG1176278
2-Hexanone	U		0.191	0.500	50	10/05/2018 08:00	WG1176278
Methylene Chloride	U		0.0500	0.250	50	10/05/2018 08:00	WG1176278
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	10/05/2018 08:00	WG1176278
Methyl tert-butyl ether	U		0.0184	0.0500	50	10/05/2018 08:00	WG1176278
Naphthalene	0.257		0.0500	0.250	50	10/05/2018 08:00	WG1176278
n-Propylbenzene	0.118		0.0174	0.0500	50	10/05/2018 08:00	WG1176278
Styrene	U		0.0154	0.0500	50	10/05/2018 08:00	WG1176278
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	10/05/2018 08:00	WG1176278
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	10/05/2018 08:00	WG1176278
Tetrachloroethene	U		0.0186	0.0500	50	10/05/2018 08:00	WG1176278
Toluene	0.269		0.0206	0.0500	50	10/05/2018 08:00	WG1176278
1,1,1-Trichloroethane	U		0.0160	0.0500	50	10/05/2018 08:00	WG1176278
1,1,2-Trichloroethane	U		0.0192	0.0500	50	10/05/2018 08:00	WG1176278
Trichloroethene	U		0.0199	0.0500	50	10/05/2018 08:00	WG1176278
1,2,4-Trimethylbenzene	0.480		0.0186	0.0500	50	10/05/2018 08:00	WG1176278
1,3,5-Trimethylbenzene	0.103		0.0194	0.0500	50	10/05/2018 08:00	WG1176278
Vinyl chloride	U		0.0130	0.0500	50	10/05/2018 08:00	WG1176278
o-Xylene	0.0272	J	0.0170	0.0500	50	10/05/2018 08:00	WG1176278
m&p-Xylene	2.13		0.0360	0.100	50	10/05/2018 08:00	WG1176278
Xylenes, Total	2.16		0.0530	0.150	50	10/05/2018 08:00	WG1176278
(S) Toluene-d8	*109*			*80.0-120*		*10/05/2018 08:00*	WG1176278
(S) Dibromofluoromethane	*115*			*75.0-120*		*10/05/2018 08:00*	WG1176278
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 08:00*	WG1176278

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	5.69		0.0247	0.100	1	10/09/2018 22:44	WG1177736
(S) o-Terphenyl	*78.4*			*31.0-160*		*10/09/2018 22:44*	WG1177736

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3790		14.1	50.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.507		0.0197	0.100	1	10/10/2018 18:56	WG1178390

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	338		0.519	10.0	10	10/09/2018 17:19	WG1176348
Fluoride	1.85		0.00990	0.100	1	10/09/2018 17:01	WG1176348
Sulfate	2150		3.87	250	50	10/09/2018 22:40	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00610		0.000250	0.00200	1	10/09/2018 19:28	WG1176332
Barium	0.0137		0.000360	0.00500	1	10/09/2018 19:28	WG1176332
Calcium	402		0.0460	1.00	1	10/09/2018 19:28	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 19:28	WG1176332
Iron	1.59		0.0150	0.100	1	10/09/2018 19:28	WG1176332
Lead	0.000401	B J	0.000240	0.00200	1	10/09/2018 19:28	WG1176332
Manganese	0.898		0.000250	0.00500	1	10/09/2018 19:28	WG1176332
Potassium	2.56		0.0370	1.00	1	10/09/2018 19:28	WG1176332
Selenium	0.00178	J	0.000380	0.00200	1	10/09/2018 19:28	WG1176332
Sodium	291		0.110	1.00	1	10/09/2018 19:28	WG1176332

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 08:20	WG1176278
Benzene	U		0.000331	0.00100	1	10/05/2018 08:20	WG1176278
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 08:20	WG1176278
Bromoform	U		0.000469	0.00100	1	10/05/2018 08:20	WG1176278
Bromomethane	U		0.000866	0.00500	1	10/05/2018 08:20	WG1176278
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 08:20	WG1176278
sec-Butylbenzene	0.000478	J	0.000365	0.00100	1	10/05/2018 08:20	WG1176278
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 08:20	WG1176278
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 08:20	WG1176278
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 08:20	WG1176278
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 08:20	WG1176278
Chloroethane	U		0.000453	0.00500	1	10/05/2018 08:20	WG1176278
Chloroform	U		0.000324	0.00500	1	10/05/2018 08:20	WG1176278
Chloromethane	U		0.000276	0.00250	1	10/05/2018 08:20	WG1176278
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 08:20	WG1176278
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 08:20	WG1176278
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 08:20	WG1176278
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 08:20	WG1176278
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 08:20	WG1176278
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 08:20	WG1176278
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 08:20	WG1176278
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 08:20	WG1176278
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 08:20	WG1176278

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 08:20	WG1176278
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 08:20	WG1176278
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 08:20	WG1176278
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 08:20	WG1176278
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 08:20	WG1176278
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 08:20	WG1176278
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 08:20	WG1176278
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 08:20	WG1176278
Naphthalene	U		0.00100	0.00500	1	10/05/2018 08:20	WG1176278
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 08:20	WG1176278
Styrene	U		0.000307	0.00100	1	10/05/2018 08:20	WG1176278
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 08:20	WG1176278
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 08:20	WG1176278
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 08:20	WG1176278
Toluene	U		0.000412	0.00100	1	10/05/2018 08:20	WG1176278
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 08:20	WG1176278
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 08:20	WG1176278
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 08:20	WG1176278
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 08:20	WG1176278
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 08:20	WG1176278
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 08:20	WG1176278
o-Xylene	U		0.000341	0.00100	1	10/05/2018 08:20	WG1176278
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 08:20	WG1176278
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 08:20	WG1176278
(S) Toluene-d8	*106*			*80.0-120*		*10/05/2018 08:20*	WG1176278
(S) Dibromofluoromethane	*107*			*75.0-120*		*10/05/2018 08:20*	WG1176278
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 08:20*	WG1176278

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.677		0.0247	0.100	1	10/09/2018 23:02	WG1177736
(S) o-Terphenyl	*80.5*			*31.0-160*		*10/09/2018 23:02*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2820		14.1	50.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 18:58	WG1178390

Sample Narrative:

L1031734-23 WG1178390: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	221		0.519	10.0	10	10/09/2018 18:26	WG1176348
Fluoride	1.27		0.00990	0.100	1	10/09/2018 17:37	WG1176348
Sulfate	966		0.774	50.0	10	10/09/2018 18:26	WG1176348

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00772		0.000250	0.00200	1	10/09/2018 19:33	WG1176332
Barium	0.0484		0.000360	0.00500	1	10/09/2018 19:33	WG1176332
Calcium	433		0.0460	1.00	1	10/09/2018 19:33	WG1176332
Chromium	0.000738	J	0.000540	0.00200	1	10/09/2018 19:33	WG1176332
Iron	0.0472	J	0.0150	0.100	1	10/09/2018 19:33	WG1176332
Lead	0.00440	B	0.000240	0.00200	1	10/09/2018 19:33	WG1176332
Manganese	0.00539		0.000250	0.00500	1	10/09/2018 19:33	WG1176332
Potassium	0.639	J	0.0370	1.00	1	10/09/2018 19:33	WG1176332
Selenium	0.000542	J	0.000380	0.00200	1	10/09/2018 19:33	WG1176332
Sodium	35.2		0.110	1.00	1	10/09/2018 19:33	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	16.7		3.14	10.0	100	10/08/2018 17:07	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*104*			*78.0-120*		*10/08/2018 17:07*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		1.00	5.00	100	10/05/2018 08:39	WG1176278
Benzene	2.86		0.0331	0.100	100	10/05/2018 08:39	WG1176278
Bromodichloromethane	U		0.0380	0.100	100	10/05/2018 08:39	WG1176278
Bromoform	U		0.0469	0.100	100	10/05/2018 08:39	WG1176278
Bromomethane	U		0.0866	0.500	100	10/05/2018 08:39	WG1176278
n-Butylbenzene	U		0.0361	0.100	100	10/05/2018 08:39	WG1176278
sec-Butylbenzene	U		0.0365	0.100	100	10/05/2018 08:39	WG1176278
Carbon disulfide	U		0.0275	0.100	100	10/05/2018 08:39	WG1176278
Carbon tetrachloride	U		0.0379	0.100	100	10/05/2018 08:39	WG1176278
Chlorobenzene	U		0.0348	0.100	100	10/05/2018 08:39	WG1176278
Chlorodibromomethane	U		0.0327	0.100	100	10/05/2018 08:39	WG1176278
Chloroethane	U		0.0453	0.500	100	10/05/2018 08:39	WG1176278
Chloroform	U		0.0324	0.500	100	10/05/2018 08:39	WG1176278

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.0276	0.250	100	10/05/2018 08:39	WG1176278
1,2-Dibromoethane	U		0.0381	0.100	100	10/05/2018 08:39	WG1176278
1,1-Dichloroethane	U		0.0259	0.100	100	10/05/2018 08:39	WG1176278
1,2-Dichloroethane	U		0.0361	0.100	100	10/05/2018 08:39	WG1176278
1,1-Dichloroethene	U		0.0398	0.100	100	10/05/2018 08:39	WG1176278
cis-1,2-Dichloroethene	U		0.0260	0.100	100	10/05/2018 08:39	WG1176278
trans-1,2-Dichloroethene	U		0.0396	0.100	100	10/05/2018 08:39	WG1176278
1,2-Dichloropropane	U		0.0306	0.100	100	10/05/2018 08:39	WG1176278
cis-1,3-Dichloropropene	U		0.0418	0.100	100	10/05/2018 08:39	WG1176278
trans-1,3-Dichloropropene	U		0.0419	0.100	100	10/05/2018 08:39	WG1176278
Ethylbenzene	0.210		0.0384	0.100	100	10/05/2018 08:39	WG1176278
Isopropylbenzene	0.0813	J	0.0326	0.100	100	10/05/2018 08:39	WG1176278
p-Isopropyltoluene	U		0.0350	0.100	100	10/05/2018 08:39	WG1176278
2-Butanone (MEK)	U		0.393	1.00	100	10/05/2018 08:39	WG1176278
2-Hexanone	U		0.382	1.00	100	10/05/2018 08:39	WG1176278
Methylene Chloride	U		0.100	0.500	100	10/05/2018 08:39	WG1176278
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	10/05/2018 08:39	WG1176278
Methyl tert-butyl ether	U		0.0367	0.100	100	10/05/2018 08:39	WG1176278
Naphthalene	U		0.100	0.500	100	10/05/2018 08:39	WG1176278
n-Propylbenzene	0.0792	J	0.0349	0.100	100	10/05/2018 08:39	WG1176278
Styrene	U		0.0307	0.100	100	10/05/2018 08:39	WG1176278
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	10/05/2018 08:39	WG1176278
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	10/05/2018 08:39	WG1176278
Tetrachloroethene	U		0.0372	0.100	100	10/05/2018 08:39	WG1176278
Toluene	1.24		0.0412	0.100	100	10/05/2018 08:39	WG1176278
1,1,1-Trichloroethane	U		0.0319	0.100	100	10/05/2018 08:39	WG1176278
1,1,2-Trichloroethane	U		0.0383	0.100	100	10/05/2018 08:39	WG1176278
Trichloroethene	U		0.0398	0.100	100	10/05/2018 08:39	WG1176278
1,2,4-Trimethylbenzene	0.182		0.0373	0.100	100	10/05/2018 08:39	WG1176278
1,3,5-Trimethylbenzene	0.0510	J	0.0387	0.100	100	10/05/2018 08:39	WG1176278
Vinyl chloride	U		0.0259	0.100	100	10/05/2018 08:39	WG1176278
o-Xylene	0.164		0.0341	0.100	100	10/05/2018 08:39	WG1176278
m&p-Xylene	0.552		0.0719	0.200	100	10/05/2018 08:39	WG1176278
Xylenes, Total	0.716		0.106	0.300	100	10/05/2018 08:39	WG1176278
(S) Toluene-d8	*114*			*80.0-120*		*10/05/2018 08:39*	WG1176278
(S) Dibromofluoromethane	*113*			*75.0-120*		*10/05/2018 08:39*	WG1176278
(S) 4-Bromofluorobenzene	*106*			*77.0-126*		*10/05/2018 08:39*	WG1176278

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	11.8		0.123	0.500	5	10/10/2018 12:19	WG1177736
(S) o-Terphenyl	*94.2*			*31.0-160*		*10/10/2018 12:19*	WG1177736

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2990		14.1	50.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.197	1.00	10	10/10/2018 18:59	WG1178390

Sample Narrative:

L1031734-24 WG1178390: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	150		0.519	10.0	10	10/09/2018 19:02	WG1176348
Fluoride	2.32		0.00990	0.100	1	10/09/2018 18:43	WG1176348
Sulfate	1630		1.55	100	20	10/09/2018 22:58	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00274		0.000250	0.00200	1	10/09/2018 19:37	WG1176332
Barium	0.0189		0.000360	0.00500	1	10/09/2018 19:37	WG1176332
Calcium	305		0.0460	1.00	1	10/09/2018 19:37	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 19:37	WG1176332
Iron	0.0894	J	0.0150	0.100	1	10/09/2018 19:37	WG1176332
Lead	0.000534	B J	0.000240	0.00200	1	10/09/2018 19:37	WG1176332
Manganese	0.0916		0.000250	0.00500	1	10/09/2018 19:37	WG1176332
Potassium	1.31		0.0370	1.00	1	10/09/2018 19:37	WG1176332
Selenium	0.000461	J	0.000380	0.00200	1	10/09/2018 19:37	WG1176332
Sodium	167		0.110	1.00	1	10/09/2018 19:37	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.397	B	0.0314	0.100	1	10/10/2018 21:38	WG1179105
(S) a,a,a-Trifluorotoluene(FID)	*98.4*			*78.0-120*		*10/10/2018 21:38*	WG1179105

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/05/2018 08:59	WG1176278
Benzene	0.00103		0.000331	0.00100	1	10/05/2018 08:59	WG1176278
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 08:59	WG1176278
Bromoform	U		0.000469	0.00100	1	10/05/2018 08:59	WG1176278
Bromomethane	U		0.000866	0.00500	1	10/05/2018 08:59	WG1176278
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 08:59	WG1176278
sec-Butylbenzene	0.00606		0.000365	0.00100	1	10/05/2018 08:59	WG1176278
Carbon disulfide	0.000349	J	0.000275	0.00100	1	10/05/2018 08:59	WG1176278
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 08:59	WG1176278
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 08:59	WG1176278
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 08:59	WG1176278
Chloroethane	U		0.000453	0.00500	1	10/05/2018 08:59	WG1176278
Chloroform	0.000589	J	0.000324	0.00500	1	10/05/2018 08:59	WG1176278

MW-90

Collected date/time: 10/02/18 12:40

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.000276	0.00250	1	10/05/2018 08:59	WG1176278
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 08:59	WG1176278
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 08:59	WG1176278
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 08:59	WG1176278
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 08:59	WG1176278
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 08:59	WG1176278
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 08:59	WG1176278
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 08:59	WG1176278
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 08:59	WG1176278
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 08:59	WG1176278
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 08:59	WG1176278
Isopropylbenzene	0.0355		0.000326	0.00100	1	10/05/2018 08:59	WG1176278
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 08:59	WG1176278
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 08:59	WG1176278
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 08:59	WG1176278
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 08:59	WG1176278
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 08:59	WG1176278
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 08:59	WG1176278
Naphthalene	U		0.00100	0.00500	1	10/05/2018 08:59	WG1176278
n-Propylbenzene	0.00174		0.000349	0.00100	1	10/05/2018 08:59	WG1176278
Styrene	U		0.000307	0.00100	1	10/05/2018 08:59	WG1176278
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 08:59	WG1176278
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 08:59	WG1176278
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 08:59	WG1176278
Toluene	U		0.000412	0.00100	1	10/05/2018 08:59	WG1176278
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 08:59	WG1176278
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 08:59	WG1176278
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 08:59	WG1176278
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 08:59	WG1176278
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 08:59	WG1176278
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 08:59	WG1176278
o-Xylene	U		0.000341	0.00100	1	10/05/2018 08:59	WG1176278
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 08:59	WG1176278
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 08:59	WG1176278
(S) Toluene-d8	*100*			*80.0-120*		*10/05/2018 08:59*	WG1176278
(S) Dibromofluoromethane	*106*			*75.0-120*		*10/05/2018 08:59*	WG1176278
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/05/2018 08:59*	WG1176278

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	5.54		0.0247	0.100	1	10/09/2018 19:50	WG1177736
(S) o-Terphenyl	*91.6*			*31.0-160*		*10/09/2018 19:50*	WG1177736

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1530		7.05	25.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.197	1.00	10	10/10/2018 19:01	WG1178390

Sample Narrative:

L1031734-25 WG1178390: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	157		0.519	10.0	10	10/09/2018 19:38	WG1176348
Fluoride	1.10		0.00990	0.100	1	10/09/2018 19:20	WG1176348
Sulfate	235		0.774	50.0	10	10/09/2018 19:38	WG1176348

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00251		0.000250	0.00200	1	10/09/2018 19:42	WG1176332
Barium	0.111		0.000360	0.00500	1	10/09/2018 19:42	WG1176332
Calcium	186		0.0460	1.00	1	10/09/2018 19:42	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 19:42	WG1176332
Iron	0.0658	J	0.0150	0.100	1	10/09/2018 19:42	WG1176332
Lead	0.000673	B J	0.000240	0.00200	1	10/09/2018 19:42	WG1176332
Manganese	0.00158	J	0.000250	0.00500	1	10/09/2018 19:42	WG1176332
Potassium	0.985	J	0.0370	1.00	1	10/09/2018 19:42	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 19:42	WG1176332
Sodium	217		0.110	1.00	1	10/09/2018 19:42	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	31.3		3.14	10.0	100	10/08/2018 17:48	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/08/2018 17:48*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		10.0	50.0	1000	10/05/2018 09:19	WG1176278
Benzene	U		0.331	1.00	1000	10/05/2018 09:19	WG1176278
Bromodichloromethane	U		0.380	1.00	1000	10/05/2018 09:19	WG1176278
Bromoform	U		0.469	1.00	1000	10/05/2018 09:19	WG1176278
Bromomethane	U		0.866	5.00	1000	10/05/2018 09:19	WG1176278
n-Butylbenzene	U		0.361	1.00	1000	10/05/2018 09:19	WG1176278
sec-Butylbenzene	U		0.365	1.00	1000	10/05/2018 09:19	WG1176278
Carbon disulfide	U		0.275	1.00	1000	10/05/2018 09:19	WG1176278
Carbon tetrachloride	U		0.379	1.00	1000	10/05/2018 09:19	WG1176278
Chlorobenzene	U		0.348	1.00	1000	10/05/2018 09:19	WG1176278
Chlorodibromomethane	U		0.327	1.00	1000	10/05/2018 09:19	WG1176278
Chloroethane	U		0.453	5.00	1000	10/05/2018 09:19	WG1176278
Chloroform	U		0.324	5.00	1000	10/05/2018 09:19	WG1176278

MW-96

Collected date/time: 10/02/18 13:15

SAMPLE RESULTS - 25

L1031734

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.276	2.50	1000	10/05/2018 09:19	WG1176278
1,2-Dibromoethane	U		0.381	1.00	1000	10/05/2018 09:19	WG1176278
1,1-Dichloroethane	U		0.259	1.00	1000	10/05/2018 09:19	WG1176278
1,2-Dichloroethane	U		0.361	1.00	1000	10/05/2018 09:19	WG1176278
1,1-Dichloroethene	U		0.398	1.00	1000	10/05/2018 09:19	WG1176278
cis-1,2-Dichloroethene	U		0.260	1.00	1000	10/05/2018 09:19	WG1176278
trans-1,2-Dichloroethene	U		0.396	1.00	1000	10/05/2018 09:19	WG1176278
1,2-Dichloropropane	U		0.306	1.00	1000	10/05/2018 09:19	WG1176278
cis-1,3-Dichloropropene	U		0.418	1.00	1000	10/05/2018 09:19	WG1176278
trans-1,3-Dichloropropene	U		0.419	1.00	1000	10/05/2018 09:19	WG1176278
Ethylbenzene	U		0.384	1.00	1000	10/05/2018 09:19	WG1176278
Isopropylbenzene	U		0.326	1.00	1000	10/05/2018 09:19	WG1176278
p-Isopropyltoluene	U		0.350	1.00	1000	10/05/2018 09:19	WG1176278
2-Butanone (MEK)	U		3.93	10.0	1000	10/05/2018 09:19	WG1176278
2-Hexanone	U		3.82	10.0	1000	10/05/2018 09:19	WG1176278
Methylene Chloride	U		1.00	5.00	1000	10/05/2018 09:19	WG1176278
4-Methyl-2-pentanone (MIBK)	U		2.14	10.0	1000	10/05/2018 09:19	WG1176278
Methyl tert-butyl ether	26.7		0.367	1.00	1000	10/05/2018 09:19	WG1176278
Naphthalene	U		1.00	5.00	1000	10/05/2018 09:19	WG1176278
n-Propylbenzene	U		0.349	1.00	1000	10/05/2018 09:19	WG1176278
Styrene	U		0.307	1.00	1000	10/05/2018 09:19	WG1176278
1,1,1,2-Tetrachloroethane	U		0.385	1.00	1000	10/05/2018 09:19	WG1176278
1,1,2,2-Tetrachloroethane	U		0.130	1.00	1000	10/05/2018 09:19	WG1176278
Tetrachloroethene	U		0.372	1.00	1000	10/05/2018 09:19	WG1176278
Toluene	U		0.412	1.00	1000	10/05/2018 09:19	WG1176278
1,1,1-Trichloroethane	U		0.319	1.00	1000	10/05/2018 09:19	WG1176278
1,1,2-Trichloroethane	U		0.383	1.00	1000	10/05/2018 09:19	WG1176278
Trichloroethene	U		0.398	1.00	1000	10/05/2018 09:19	WG1176278
1,2,4-Trimethylbenzene	U		0.373	1.00	1000	10/05/2018 09:19	WG1176278
1,3,5-Trimethylbenzene	U		0.387	1.00	1000	10/05/2018 09:19	WG1176278
Vinyl chloride	U		0.259	1.00	1000	10/05/2018 09:19	WG1176278
o-Xylene	U		0.341	1.00	1000	10/05/2018 09:19	WG1176278
m&p-Xylene	U		0.719	2.00	1000	10/05/2018 09:19	WG1176278
Xylenes, Total	U		1.06	3.00	1000	10/05/2018 09:19	WG1176278
(S) Toluene-d8	*114*			*80.0-120*		*10/05/2018 09:19*	WG1176278
(S) Dibromofluoromethane	*106*			*75.0-120*		*10/05/2018 09:19*	WG1176278
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/05/2018 09:19*	WG1176278

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	8.07		0.123	0.500	5	10/10/2018 11:44	WG1177736
(S) o-Terphenyl	*85.8*			*31.0-160*		*10/10/2018 11:44*	WG1177736

MW-67

Collected date/time: 10/02/18 14:15

SAMPLE RESULTS - 26

L1031734

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1580		14.1	50.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 19:02	WG1178390

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/09/2018 08:55	WG1177361

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	221		0.519	10.0	10	10/09/2018 00:35	WG1176351
Fluoride	0.611		0.00990	0.100	1	10/09/2018 00:21	WG1176351
Sulfate	493		0.774	50.0	10	10/09/2018 00:35	WG1176351

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	0.000120	J	0.0000490	0.000200	1	10/07/2018 08:02	WG1176292

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.401		0.0126	0.200	1	10/07/2018 15:53	WG1176325

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00516		0.000250	0.00200	1	10/09/2018 19:47	WG1176332
Barium	0.0745		0.000360	0.00500	1	10/09/2018 19:47	WG1176332
Cadmium	0.000220	B J	0.000160	0.00100	1	10/09/2018 19:47	WG1176332
Calcium	240		0.0460	1.00	1	10/09/2018 19:47	WG1176332
Chromium	0.000568	J	0.000540	0.00200	1	10/09/2018 19:47	WG1176332
Cobalt	U		0.000260	0.00200	1	10/09/2018 19:47	WG1176332
Iron	0.0289	J	0.0150	0.100	1	10/09/2018 19:47	WG1176332
Lead	0.00192	B J	0.000240	0.00200	1	10/09/2018 19:47	WG1176332
Manganese	0.126		0.000250	0.00500	1	10/09/2018 19:47	WG1176332
Nickel	0.000595	J	0.000350	0.00200	1	10/09/2018 19:47	WG1176332
Potassium	0.636	J	0.0370	1.00	1	10/09/2018 19:47	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 19:47	WG1176332
Sodium	202		0.110	1.00	1	10/09/2018 19:47	WG1176332
Uranium	U		0.000330	0.0100	1	10/09/2018 19:47	WG1176332
Vanadium	0.000634	J	0.000180	0.00500	1	10/09/2018 19:47	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.562		0.0314	0.100	1	10/08/2018 18:09	WG1177450

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*98.5*			*78.0-120*		*10/08/2018 18:09*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/11/2018 17:15	WG1179746
Benzene	0.00480		0.000331	0.00100	1	10/11/2018 17:15	WG1179746
Bromodichloromethane	U		0.000380	0.00100	1	10/11/2018 17:15	WG1179746
Bromoform	U		0.000469	0.00100	1	10/11/2018 17:15	WG1179746
Bromomethane	U		0.000866	0.00500	1	10/11/2018 17:15	WG1179746
n-Butylbenzene	0.00129		0.000361	0.00100	1	10/11/2018 17:15	WG1179746
sec-Butylbenzene	0.00450		0.000365	0.00100	1	10/11/2018 17:15	WG1179746
Carbon disulfide	0.000465	J	0.000275	0.00100	1	10/11/2018 17:15	WG1179746
Carbon tetrachloride	U		0.000379	0.00100	1	10/11/2018 17:15	WG1179746
Chlorobenzene	U		0.000348	0.00100	1	10/11/2018 17:15	WG1179746
Chlorodibromomethane	U		0.000327	0.00100	1	10/11/2018 17:15	WG1179746
Chloroethane	U		0.000453	0.00500	1	10/11/2018 17:15	WG1179746
Chloroform	U		0.000324	0.00500	1	10/11/2018 17:15	WG1179746
Chloromethane	U		0.000276	0.00250	1	10/11/2018 17:15	WG1179746
1,2-Dibromoethane	U		0.000381	0.00100	1	10/11/2018 17:15	WG1179746
1,1-Dichloroethane	U		0.000259	0.00100	1	10/11/2018 17:15	WG1179746
1,2-Dichloroethane	U		0.000361	0.00100	1	10/11/2018 17:15	WG1179746
1,1-Dichloroethene	U		0.000398	0.00100	1	10/11/2018 17:15	WG1179746
cis-1,2-Dichloroethene	0.00122		0.000260	0.00100	1	10/11/2018 17:15	WG1179746
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/11/2018 17:15	WG1179746
1,2-Dichloropropane	U		0.000306	0.00100	1	10/11/2018 17:15	WG1179746
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/11/2018 17:15	WG1179746
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/11/2018 17:15	WG1179746
Ethylbenzene	0.000620	J	0.000384	0.00100	1	10/11/2018 17:15	WG1179746
Isopropylbenzene	0.0231		0.000326	0.00100	1	10/11/2018 17:15	WG1179746
p-Isopropyltoluene	0.000513	J	0.000350	0.00100	1	10/11/2018 17:15	WG1179746
2-Butanone (MEK)	U		0.00393	0.0100	1	10/11/2018 17:15	WG1179746
2-Hexanone	U		0.00382	0.0100	1	10/11/2018 17:15	WG1179746
Methylene Chloride	U		0.00100	0.00500	1	10/11/2018 17:15	WG1179746
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/11/2018 17:15	WG1179746
Methyl tert-butyl ether	0.289		0.00184	0.00500	5	10/05/2018 09:39	WG1176278
Naphthalene	U		0.00100	0.00500	1	10/11/2018 17:15	WG1179746
n-Propylbenzene	0.00387		0.000349	0.00100	1	10/11/2018 17:15	WG1179746
Styrene	U		0.000307	0.00100	1	10/11/2018 17:15	WG1179746
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/11/2018 17:15	WG1179746
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/11/2018 17:15	WG1179746
Tetrachloroethene	U		0.000372	0.00100	1	10/11/2018 17:15	WG1179746
Toluene	U		0.000412	0.00100	1	10/11/2018 17:15	WG1179746
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/11/2018 17:15	WG1179746
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/11/2018 17:15	WG1179746
Trichloroethene	0.000424	J	0.000398	0.00100	1	10/11/2018 17:15	WG1179746
1,2,4-Trimethylbenzene	0.000557	J	0.000373	0.00100	1	10/11/2018 17:15	WG1179746
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/11/2018 17:15	WG1179746
Vinyl chloride	U		0.000259	0.00100	1	10/11/2018 17:15	WG1179746
o-Xylene	U		0.000341	0.00100	1	10/11/2018 17:15	WG1179746
m&p-Xylene	0.00113	J	0.000719	0.00200	1	10/11/2018 17:15	WG1179746
Xylenes, Total	0.00113	J	0.00106	0.00300	1	10/11/2018 17:15	WG1179746
(S) Toluene-d8	*101*			*80.0-120*		*10/05/2018 09:39*	WG1176278
(S) Toluene-d8	*103*			*80.0-120*		*10/11/2018 17:15*	WG1179746
(S) Dibromofluoromethane	*109*			*75.0-120*		*10/05/2018 09:39*	WG1176278

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) Dibromofluoromethane	*99.0*			*75.0-120*		*10/11/2018 17:15*	WG1179746
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/05/2018 09:39*	WG1176278
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/11/2018 17:15*	WG1179746

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	7.73		0.0247	0.100	1	10/10/2018 00:29	WG1177738
(S) o-Terphenyl	*82.6*			*31.0-160*		*10/10/2018 00:29*	WG1177738

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2050		14.1	50.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 19:04	WG1178390

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	186		0.519	10.0	10	10/09/2018 01:04	WG1176351
Fluoride	0.542		0.00990	0.100	1	10/09/2018 00:50	WG1176351
Sulfate	895		1.55	100	20	10/10/2018 22:02	WG1178750

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00265		0.000250	0.00200	1	10/09/2018 20:15	WG1176332
Barium	0.0228		0.000360	0.00500	1	10/09/2018 20:15	WG1176332
Calcium	327		0.0460	1.00	1	10/09/2018 20:15	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 20:15	WG1176332
Iron	0.522		0.0150	0.100	1	10/09/2018 20:15	WG1176332
Lead	0.000639	B J	0.000240	0.00200	1	10/09/2018 20:15	WG1176332
Manganese	1.15		0.000250	0.00500	1	10/09/2018 20:15	WG1176332
Potassium	0.555	J	0.0370	1.00	1	10/09/2018 20:15	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 20:15	WG1176332
Sodium	161		0.110	1.00	1	10/09/2018 20:15	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.259		0.0314	0.100	1	10/08/2018 18:30	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*103*			*78.0-120*		*10/08/2018 18:30*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 09:59	WG1176278
Benzene	0.00130		0.000331	0.00100	1	10/05/2018 09:59	WG1176278
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 09:59	WG1176278
Bromoform	U		0.000469	0.00100	1	10/05/2018 09:59	WG1176278
Bromomethane	U		0.000866	0.00500	1	10/05/2018 09:59	WG1176278
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 09:59	WG1176278
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 09:59	WG1176278
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 09:59	WG1176278
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 09:59	WG1176278
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 09:59	WG1176278
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 09:59	WG1176278
Chloroethane	U		0.000453	0.00500	1	10/05/2018 09:59	WG1176278
Chloroform	U		0.000324	0.00500	1	10/05/2018 09:59	WG1176278
Chloromethane	U		0.000276	0.00250	1	10/05/2018 09:59	WG1176278
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 09:59	WG1176278
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 09:59	WG1176278

DUP-REST-01

Collected date/time: 10/02/18 10:00

SAMPLE RESULTS - 27

L1031734

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 09:59	WG1176278
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 09:59	WG1176278
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 09:59	WG1176278
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 09:59	WG1176278
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 09:59	WG1176278
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 09:59	WG1176278
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 09:59	WG1176278
Ethylbenzene	0.00992		0.000384	0.00100	1	10/05/2018 09:59	WG1176278
Isopropylbenzene	0.000612	J	0.000326	0.00100	1	10/05/2018 09:59	WG1176278
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 09:59	WG1176278
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 09:59	WG1176278
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 09:59	WG1176278
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 09:59	WG1176278
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 09:59	WG1176278
Methyl tert-butyl ether	0.0100		0.000367	0.00100	1	10/05/2018 09:59	WG1176278
Naphthalene	0.00117	J	0.00100	0.00500	1	10/05/2018 09:59	WG1176278
n-Propylbenzene	0.000794	J	0.000349	0.00100	1	10/05/2018 09:59	WG1176278
Styrene	U		0.000307	0.00100	1	10/05/2018 09:59	WG1176278
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 09:59	WG1176278
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 09:59	WG1176278
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 09:59	WG1176278
Toluene	U		0.000412	0.00100	1	10/05/2018 09:59	WG1176278
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 09:59	WG1176278
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 09:59	WG1176278
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 09:59	WG1176278
1,2,4-Trimethylbenzene	0.00388		0.000373	0.00100	1	10/05/2018 09:59	WG1176278
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 09:59	WG1176278
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 09:59	WG1176278
o-Xylene	U		0.000341	0.00100	1	10/05/2018 09:59	WG1176278
m&p-Xylene	0.00938		0.000719	0.00200	1	10/05/2018 09:59	WG1176278
Xylenes, Total	0.00939		0.00106	0.00300	1	10/05/2018 09:59	WG1176278
(S) Toluene-d8	*107*			*80.0-120*		*10/05/2018 09:59*	WG1176278
(S) Dibromofluoromethane	*107*			*75.0-120*		*10/05/2018 09:59*	WG1176278
(S) 4-Bromofluorobenzene	*108*			*77.0-126*		*10/05/2018 09:59*	WG1176278

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.215		0.0247	0.100	1	10/10/2018 00:46	WG1177738
(S) o-Terphenyl	*80.0*			*31.0-160*		*10/10/2018 00:46*	WG1177738

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1640		7.05	25.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.197	1.00	10	10/10/2018 19:05	WG1178390

Sample Narrative:

L1031734-28 WG1178390: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	126		0.519	10.0	10	10/09/2018 01:33	WG1176351
Fluoride	1.57		0.00990	0.100	1	10/09/2018 01:18	WG1176351
Sulfate	746		0.774	50.0	10	10/09/2018 01:33	WG1176351

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0185		0.000250	0.00200	1	10/09/2018 20:20	WG1176332
Barium	0.0353		0.000360	0.00500	1	10/09/2018 20:20	WG1176332
Calcium	313		0.0460	1.00	1	10/09/2018 20:20	WG1176332
Chromium	0.000631	J	0.000540	0.00200	1	10/09/2018 20:20	WG1176332
Iron	U		0.0150	0.100	1	10/09/2018 20:20	WG1176332
Lead	0.000503	B J	0.000240	0.00200	1	10/09/2018 20:20	WG1176332
Manganese	0.0157		0.000250	0.00500	1	10/09/2018 20:20	WG1176332
Potassium	8.09		0.0370	1.00	1	10/09/2018 20:20	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 20:20	WG1176332
Sodium	92.8		0.110	1.00	1	10/09/2018 20:20	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	1.38		0.0314	0.100	1	10/08/2018 18:50	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*96.3*			*78.0-120*		*10/08/2018 18:50*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0500	0.250	5	10/05/2018 10:19	WG1176278
Benzene	0.186		0.00166	0.00500	5	10/05/2018 10:19	WG1176278
Bromodichloromethane	U		0.00190	0.00500	5	10/05/2018 10:19	WG1176278
Bromoform	U		0.00234	0.00500	5	10/05/2018 10:19	WG1176278
Bromomethane	U		0.00433	0.0250	5	10/05/2018 10:19	WG1176278
n-Butylbenzene	U		0.00180	0.00500	5	10/05/2018 10:19	WG1176278
sec-Butylbenzene	0.0303		0.00182	0.00500	5	10/05/2018 10:19	WG1176278
Carbon disulfide	0.00141	J	0.00138	0.00500	5	10/05/2018 10:19	WG1176278
Carbon tetrachloride	U		0.00190	0.00500	5	10/05/2018 10:19	WG1176278
Chlorobenzene	U		0.00174	0.00500	5	10/05/2018 10:19	WG1176278
Chlorodibromomethane	U		0.00164	0.00500	5	10/05/2018 10:19	WG1176278
Chloroethane	U		0.00226	0.0250	5	10/05/2018 10:19	WG1176278
Chloroform	U		0.00162	0.0250	5	10/05/2018 10:19	WG1176278

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.00138	0.0125	5	10/05/2018 10:19	WG1176278
1,2-Dibromoethane	U		0.00190	0.00500	5	10/05/2018 10:19	WG1176278
1,1-Dichloroethane	U		0.00130	0.00500	5	10/05/2018 10:19	WG1176278
1,2-Dichloroethane	U		0.00180	0.00500	5	10/05/2018 10:19	WG1176278
1,1-Dichloroethene	U		0.00199	0.00500	5	10/05/2018 10:19	WG1176278
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/05/2018 10:19	WG1176278
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/05/2018 10:19	WG1176278
1,2-Dichloropropane	U		0.00153	0.00500	5	10/05/2018 10:19	WG1176278
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/05/2018 10:19	WG1176278
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/05/2018 10:19	WG1176278
Ethylbenzene	0.00316	J	0.00192	0.00500	5	10/05/2018 10:19	WG1176278
Isopropylbenzene	0.0341		0.00163	0.00500	5	10/05/2018 10:19	WG1176278
p-Isopropyltoluene	U		0.00175	0.00500	5	10/05/2018 10:19	WG1176278
2-Butanone (MEK)	U		0.0196	0.0500	5	10/05/2018 10:19	WG1176278
2-Hexanone	U		0.0191	0.0500	5	10/05/2018 10:19	WG1176278
Methylene Chloride	U		0.00500	0.0250	5	10/05/2018 10:19	WG1176278
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/05/2018 10:19	WG1176278
Methyl tert-butyl ether	0.00582		0.00184	0.00500	5	10/05/2018 10:19	WG1176278
Naphthalene	U		0.00500	0.0250	5	10/05/2018 10:19	WG1176278
n-Propylbenzene	0.00273	J	0.00174	0.00500	5	10/05/2018 10:19	WG1176278
Styrene	U		0.00154	0.00500	5	10/05/2018 10:19	WG1176278
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/05/2018 10:19	WG1176278
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/05/2018 10:19	WG1176278
Tetrachloroethene	U		0.00186	0.00500	5	10/05/2018 10:19	WG1176278
Toluene	U		0.00206	0.00500	5	10/05/2018 10:19	WG1176278
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/05/2018 10:19	WG1176278
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/05/2018 10:19	WG1176278
Trichloroethene	U		0.00199	0.00500	5	10/05/2018 10:19	WG1176278
1,2,4-Trimethylbenzene	U		0.00186	0.00500	5	10/05/2018 10:19	WG1176278
1,3,5-Trimethylbenzene	U		0.00194	0.00500	5	10/05/2018 10:19	WG1176278
Vinyl chloride	U		0.00130	0.00500	5	10/05/2018 10:19	WG1176278
o-Xylene	U		0.00170	0.00500	5	10/05/2018 10:19	WG1176278
m&p-Xylene	U		0.00360	0.0100	5	10/05/2018 10:19	WG1176278
Xylenes, Total	U		0.00530	0.0150	5	10/05/2018 10:19	WG1176278
(S) Toluene-d8	*105*			*80.0-120*		*10/05/2018 10:19*	WG1176278
(S) Dibromofluoromethane	*108*			*75.0-120*		*10/05/2018 10:19*	WG1176278
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/05/2018 10:19*	WG1176278

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	2.87		0.0247	0.100	1	10/10/2018 01:04	WG1177738
(S) o-Terphenyl	*85.3*			*31.0-160*		*10/10/2018 01:04*	WG1177738

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4.00	J	2.82	10.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 19:07	WG1178390

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.105	J P1	0.0519	1.00	1	10/09/2018 02:16	WG1176351
Fluoride	U	J6	0.00990	0.100	1	10/09/2018 02:16	WG1176351
Sulfate	U		0.0774	5.00	1	10/09/2018 02:16	WG1176351

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	10/09/2018 20:25	WG1176332
Barium	0.00101	J	0.000360	0.00500	1	10/09/2018 20:25	WG1176332
Calcium	0.120	J	0.0460	1.00	1	10/09/2018 20:25	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 20:25	WG1176332
Iron	U		0.0150	0.100	1	10/09/2018 20:25	WG1176332
Lead	0.000722	B J	0.000240	0.00200	1	10/09/2018 20:25	WG1176332
Manganese	0.000666	J	0.000250	0.00500	1	10/09/2018 20:25	WG1176332
Potassium	U		0.0370	1.00	1	10/09/2018 20:25	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 20:25	WG1176332
Sodium	0.514	J	0.110	1.00	1	10/09/2018 20:25	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 19:11	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/08/2018 19:11*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 10:39	WG1176278
Benzene	U		0.000331	0.00100	1	10/05/2018 10:39	WG1176278
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 10:39	WG1176278
Bromoform	U		0.000469	0.00100	1	10/05/2018 10:39	WG1176278
Bromomethane	U		0.000866	0.00500	1	10/05/2018 10:39	WG1176278
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 10:39	WG1176278
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 10:39	WG1176278
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 10:39	WG1176278
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 10:39	WG1176278
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 10:39	WG1176278
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 10:39	WG1176278
Chloroethane	U		0.000453	0.00500	1	10/05/2018 10:39	WG1176278
Chloroform	U		0.000324	0.00500	1	10/05/2018 10:39	WG1176278
Chloromethane	U		0.000276	0.00250	1	10/05/2018 10:39	WG1176278
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 10:39	WG1176278
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 10:39	WG1176278

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 10:39	WG1176278
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 10:39	WG1176278
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 10:39	WG1176278
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 10:39	WG1176278
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 10:39	WG1176278
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 10:39	WG1176278
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 10:39	WG1176278
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 10:39	WG1176278
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 10:39	WG1176278
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 10:39	WG1176278
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 10:39	WG1176278
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 10:39	WG1176278
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 10:39	WG1176278
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 10:39	WG1176278
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 10:39	WG1176278
Naphthalene	U		0.00100	0.00500	1	10/05/2018 10:39	WG1176278
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 10:39	WG1176278
Styrene	U		0.000307	0.00100	1	10/05/2018 10:39	WG1176278
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 10:39	WG1176278
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 10:39	WG1176278
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 10:39	WG1176278
Toluene	U		0.000412	0.00100	1	10/05/2018 10:39	WG1176278
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 10:39	WG1176278
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 10:39	WG1176278
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 10:39	WG1176278
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 10:39	WG1176278
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 10:39	WG1176278
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 10:39	WG1176278
o-Xylene	U		0.000341	0.00100	1	10/05/2018 10:39	WG1176278
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 10:39	WG1176278
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 10:39	WG1176278
(S) Toluene-d8	*113*			*80.0-120*		*10/05/2018 10:39*	WG1176278
(S) Dibromofluoromethane	*103*			*75.0-120*		*10/05/2018 10:39*	WG1176278
(S) 4-Bromofluorobenzene	*99.7*			*77.0-126*		*10/05/2018 10:39*	WG1176278

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0377	J	0.0247	0.100	1	10/10/2018 01:21	WG1177738
(S) o-Terphenyl	*80.0*			*31.0-160*		*10/10/2018 01:21*	WG1177738

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	U		2.82	10.0	1	10/09/2018 18:11	WG1177175

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 19:08	WG1178390

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.122	J	0.0519	1.00	1	10/09/2018 02:59	WG1176351
Fluoride	U		0.00990	0.100	1	10/09/2018 02:59	WG1176351
Sulfate	U		0.0774	5.00	1	10/09/2018 02:59	WG1176351

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	10/09/2018 20:29	WG1176332
Barium	0.000624	J	0.000360	0.00500	1	10/09/2018 20:29	WG1176332
Calcium	0.0878	J	0.0460	1.00	1	10/09/2018 20:29	WG1176332
Chromium	U		0.000540	0.00200	1	10/09/2018 20:29	WG1176332
Iron	U		0.0150	0.100	1	10/09/2018 20:29	WG1176332
Lead	0.000615	B J	0.000240	0.00200	1	10/09/2018 20:29	WG1176332
Manganese	0.000519	J	0.000250	0.00500	1	10/09/2018 20:29	WG1176332
Potassium	U		0.0370	1.00	1	10/09/2018 20:29	WG1176332
Selenium	U		0.000380	0.00200	1	10/09/2018 20:29	WG1176332
Sodium	0.478	J	0.110	1.00	1	10/09/2018 20:29	WG1176332

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 19:32	WG1177450
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/08/2018 19:32*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/05/2018 10:59	WG1176278
Benzene	U		0.000331	0.00100	1	10/05/2018 10:59	WG1176278
Bromodichloromethane	U		0.000380	0.00100	1	10/05/2018 10:59	WG1176278
Bromoform	U		0.000469	0.00100	1	10/05/2018 10:59	WG1176278
Bromomethane	U		0.000866	0.00500	1	10/05/2018 10:59	WG1176278
n-Butylbenzene	U		0.000361	0.00100	1	10/05/2018 10:59	WG1176278
sec-Butylbenzene	U		0.000365	0.00100	1	10/05/2018 10:59	WG1176278
Carbon disulfide	U		0.000275	0.00100	1	10/05/2018 10:59	WG1176278
Carbon tetrachloride	U		0.000379	0.00100	1	10/05/2018 10:59	WG1176278
Chlorobenzene	U		0.000348	0.00100	1	10/05/2018 10:59	WG1176278
Chlorodibromomethane	U		0.000327	0.00100	1	10/05/2018 10:59	WG1176278
Chloroethane	U		0.000453	0.00500	1	10/05/2018 10:59	WG1176278
Chloroform	U		0.000324	0.00500	1	10/05/2018 10:59	WG1176278
Chloromethane	U		0.000276	0.00250	1	10/05/2018 10:59	WG1176278
1,2-Dibromoethane	U		0.000381	0.00100	1	10/05/2018 10:59	WG1176278
1,1-Dichloroethane	U		0.000259	0.00100	1	10/05/2018 10:59	WG1176278

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/05/2018 10:59	WG1176278
1,1-Dichloroethene	U		0.000398	0.00100	1	10/05/2018 10:59	WG1176278
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/05/2018 10:59	WG1176278
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/05/2018 10:59	WG1176278
1,2-Dichloropropane	U		0.000306	0.00100	1	10/05/2018 10:59	WG1176278
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/05/2018 10:59	WG1176278
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/05/2018 10:59	WG1176278
Ethylbenzene	U		0.000384	0.00100	1	10/05/2018 10:59	WG1176278
Isopropylbenzene	U		0.000326	0.00100	1	10/05/2018 10:59	WG1176278
p-Isopropyltoluene	U		0.000350	0.00100	1	10/05/2018 10:59	WG1176278
2-Butanone (MEK)	U		0.00393	0.0100	1	10/05/2018 10:59	WG1176278
2-Hexanone	U		0.00382	0.0100	1	10/05/2018 10:59	WG1176278
Methylene Chloride	U		0.00100	0.00500	1	10/05/2018 10:59	WG1176278
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/05/2018 10:59	WG1176278
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/05/2018 10:59	WG1176278
Naphthalene	U		0.00100	0.00500	1	10/05/2018 10:59	WG1176278
n-Propylbenzene	U		0.000349	0.00100	1	10/05/2018 10:59	WG1176278
Styrene	U		0.000307	0.00100	1	10/05/2018 10:59	WG1176278
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/05/2018 10:59	WG1176278
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/05/2018 10:59	WG1176278
Tetrachloroethene	U		0.000372	0.00100	1	10/05/2018 10:59	WG1176278
Toluene	U		0.000412	0.00100	1	10/05/2018 10:59	WG1176278
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/05/2018 10:59	WG1176278
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/05/2018 10:59	WG1176278
Trichloroethene	U		0.000398	0.00100	1	10/05/2018 10:59	WG1176278
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/05/2018 10:59	WG1176278
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/05/2018 10:59	WG1176278
Vinyl chloride	U		0.000259	0.00100	1	10/05/2018 10:59	WG1176278
o-Xylene	U		0.000341	0.00100	1	10/05/2018 10:59	WG1176278
m&p-Xylene	U		0.000719	0.00200	1	10/05/2018 10:59	WG1176278
Xylenes, Total	U		0.00106	0.00300	1	10/05/2018 10:59	WG1176278
(S) Toluene-d8	*101*			*80.0-120*		*10/05/2018 10:59*	WG1176278
(S) Dibromofluoromethane	*109*			*75.0-120*		*10/05/2018 10:59*	WG1176278
(S) 4-Bromofluorobenzene	*94.2*			*77.0-126*		*10/05/2018 10:59*	WG1176278

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	10/10/2018 01:38	WG1177738
(S) o-Terphenyl	*70.0*			*31.0-160*		*10/10/2018 01:38*	WG1177738

WG1177172

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1031734-01,02,03,04,05,06,07,08,09,10

Method Blank (MB)

(MB) R3349514-1 10/09/18 16:21

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1031734-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-01 10/09/18 16:21 • (DUP) R3349514-4 10/09/18 16:21

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2010	2080	1	3.67		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349514-2 10/09/18 16:21 • (LCSD) R3349514-3 10/09/18 16:21

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8620	8790	98.0	99.9	85.0-115			1.95	5

WG1177173

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1031734-11,12,13,14,15,16,17,18,19,20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349704-1 10/09/18 16:56

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1031734-11 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-11 10/09/18 16:56 • (DUP) R3349704-4 10/09/18 16:56

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	1040	1070	1	2.65		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349704-2 10/09/18 16:56 • (LCSD) R3349704-3 10/09/18 16:56

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8640	8630	98.2	98.1	85.0-115			0.116	5

WG1177175

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1031734-21,22,23,24,25,26,27,28,29,30

Method Blank (MB)

(MB) R3350170-1 10/09/18 18:11

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Dissolved Solids	U		2.82	10.0

L1031734-21 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-21 10/09/18 18:11 • (DUP) R3350170-4 10/09/18 18:11

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	2320	2910	1	22.6	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350170-2 10/09/18 18:11 • (LCSD) R3350170-3 10/09/18 18:11

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Dissolved Solids	8800	8650	8680	98.3	98.6	85.0-115			0.346	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349475-1 10/10/18 15:40

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1031734-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-01 10/10/18 15:44 • (DUP) R3349475-4 10/10/18 15:46

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

L1031734-13 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-13 10/10/18 16:11 • (DUP) R3349475-6 10/10/18 16:13

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349475-2 10/10/18 15:41 • (LCSD) R3349475-3 10/10/18 15:43

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.77	3.80	94.3	94.9	90.0-110			0.687	20

L1031734-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031734-02 10/10/18 15:47 • (MS) R3349475-5 10/10/18 15:49

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	U	1.18	47.3	1	90.0-110	J6

L1031734-16 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031734-16 10/10/18 16:23 • (MS) R3349475-7 10/10/18 16:25 • (MSD) R3349475-8 10/10/18 16:26

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	U	2.01	2.07	80.5	83.0	1	90.0-110	J6	J6	3.03	20

QUALITY CONTROL SUMMARY

L1031734-21,22,23,24,25,26,27,28,29,30

Method Blank (MB)

(MB) R3349531-1 10/10/18 18:35

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1029721-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1029721-01 10/10/18 18:40 • (DUP) R3349531-4 10/10/18 18:41

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	ND	0.000	1	0.000		20

L1031995-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031995-01 10/10/18 19:22 • (DUP) R3349531-6 10/10/18 19:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.495	0.499	1	0.805		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349531-2 10/10/18 18:37 • (LCSD) R3349531-3 10/10/18 18:38

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.76	3.76	94.0	94.1	90.0-110			0.0797	20

L1031995-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031995-02 10/10/18 19:25 • (MS) R3349531-7 10/10/18 19:26 • (MSD) R3349531-8 10/10/18 19:28

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	0.481	2.38	2.30	75.8	72.6	1	90.0-110	J6	J6	3.51	20

L1029721-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L1029721-03 10/10/18 18:43 • (MS) R3349531-5 10/10/18 18:44

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	0.0500	613	612	0.000	50	90.0-110	E V

Method Blank (MB)

(MB) R3348616-1 10/08/18 14:11

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L1030670-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1030670-02 10/08/18 14:18 • (DUP) R3348616-4 10/08/18 14:19

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.00344	1	0.000		20

L1031734-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-02 10/08/18 14:43 • (DUP) R3348616-9 10/08/18 14:44

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	U	0.00552	1	200	P1	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348616-2 10/08/18 14:12 • (LCSD) R3348616-3 10/08/18 14:13

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.161	0.146	107	97.3	85.0-115			9.77	20

QUALITY CONTROL SUMMARY

L1031734-06,10,18,26

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348810-1 10/09/18 08:39

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L1031734-18 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-18 10/09/18 08:47 • (DUP) R3348810-4 10/09/18 08:48

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	0.00263	0.000	1	200	P1	20

L1031808-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1031808-05 10/09/18 09:08 • (DUP) R3348810-9 10/09/18 09:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348810-2 10/09/18 08:40 • (LCSD) R3348810-3 10/09/18 08:41

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0992	0.101	99.2	101	85.0-115			1.80	20

L1031808-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031808-01 10/09/18 08:51 • (MS) R3348810-5 10/09/18 08:53 • (MSD) R3348810-6 10/09/18 08:54

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	U	0.0825	0.0903	82.5	90.3	1	75.0-125			9.03	20

L1031808-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031808-02 10/09/18 09:05 • (MS) R3348810-7 10/09/18 09:06 • (MSD) R3348810-8 10/09/18 09:07

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	0.00894	0.0882	0.0516	79.3	42.7	1	75.0-125		J3 J6	52.4	20

Method Blank (MB)

(MB) R3349049-1 10/09/18 00:09

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	0.248	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.318	J	0.0774	5.00

L1031730-25 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-25 10/09/18 01:47 • (DUP) R3349049-4 10/09/18 02:03

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.294	0.209	1	33.9	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	0.312	0.000	1	200	P1	15

L1031730-26 Original Sample (OS) • Duplicate (DUP)

(OS) L1031730-26 10/09/18 11:41 • (DUP) R3349049-7 10/09/18 11:58

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.555	0.369	1	40.5	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.97	1.13	1	53.7	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349049-2 10/09/18 00:26 • (LCSD) R3349049-3 10/09/18 00:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	39.0	39.1	97.6	97.7	80.0-120			0.0876	15
Fluoride	8.00	8.07	8.12	101	101	80.0-120			0.645	15
Sulfate	40.0	39.4	39.5	98.5	98.8	80.0-120			0.259	15

QUALITY CONTROL SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L1031730-25 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-25 10/09/18 01:47 • (MS) R3349049-5 10/09/18 02:20 • (MSD) R3349049-6 10/09/18 02:37

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	0.294	48.1	49.7	95.6	98.9	1	80.0-120			3.35	15
Fluoride	5.00	U	4.76	4.96	95.3	99.2	1	80.0-120			4.03	15
Sulfate	50.0	0.312	48.4	49.9	96.2	99.1	1	80.0-120			3.04	15

L1031730-26 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031730-26 10/09/18 11:41 • (MS) R3349049-8 10/09/18 12:15

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	0.555	50.3	99.5	1	80.0-120	
Fluoride	5.00	U	4.99	99.7	1	80.0-120	
Sulfate	50.0	1.97	50.9	97.8	1	80.0-120	

QUALITY CONTROL SUMMARY

L1031734-06,07,08,09,10,11,12,13,14,15,16,17,18,19,20,21,22,23,24,25

Method Blank (MB)

(MB) R3349098-1 10/08/18 20:47

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L1031734-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-14 10/09/18 08:14 • (DUP) R3349098-4 10/09/18 09:08

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	1.64	1.64	1	0.220		15

L1031734-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-14 10/09/18 10:03 • (DUP) R3349098-7 10/09/18 10:21

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	123	122	5	0.895		15

L1031734-18 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-18 10/09/18 13:05 • (DUP) R3349098-8 10/09/18 13:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	1.08	1.31	1	19.6	J3	15

L1031734-18 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-18 10/09/18 13:59 • (DUP) R3349098-10 10/09/18 14:17

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	151	148	5	2.12		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349098-2 10/08/18 21:05 • (LCSD) R3349098-3 10/08/18 21:24

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	39.4	39.5	98.6	98.7	80.0-120			0.178	15
Fluoride	8.00	7.99	8.01	99.9	100	80.0-120			0.247	15
Sulfate	40.0	39.9	40.0	99.9	99.9	80.0-120			0.0671	15

L1031734-14 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031734-14 10/09/18 08:14 • (MS) R3349098-5 10/09/18 09:27 • (MSD) R3349098-6 10/09/18 09:45

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Fluoride	5.00	1.64	6.56	6.46	98.4	96.4	1	80.0-120			1.51	15

L1031734-18 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031734-18 10/09/18 13:05 • (MS) R3349098-9 10/09/18 13:41

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Fluoride	5.00	1.08	5.72	92.9	1	80.0-120	

WG1176351

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L1031734-26,27,28,29,30

Method Blank (MB)

(MB) R3348953-1 10/08/18 20:34

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L1031734-29 Original Sample (OS) • Duplicate (DUP)

(OS) L1031734-29 10/09/18 02:16 • (DUP) R3348953-4 10/09/18 02:30

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.105	0.000	1	200	P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	U	0.000	1	0.000		15

L1031914-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031914-02 10/09/18 12:34 • (DUP) R3348960-1 10/09/18 12:48

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	13.8	13.9	1	0.754		15
Fluoride	0.128	0.125	1	2.46		15
Sulfate	1090	1100	1	0.280	E	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348953-2 10/08/18 20:48 • (LCSD) R3348953-3 10/08/18 21:03

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	40.4	40.5	101	101	80.0-120			0.267	15
Fluoride	8.00	8.16	8.12	102	102	80.0-120			0.484	15
Sulfate	40.0	41.1	40.9	103	102	80.0-120			0.363	15

WG1176351

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L1031734-26,27,28,29,30

L1031734-29 Original Sample (OS) • Matrix Spike (MS)

(OS) L1031734-29 10/09/18 02:16 • (MS) R3348953-5 10/09/18 02:45

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	0.105	40.3	80.4	1	80.0-120	
Fluoride	5.00	U	3.97	79.3	1	80.0-120	J6
Sulfate	50.0	U	40.2	80.4	1	80.0-120	

L1031914-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031914-02 10/09/18 12:34 • (MS) R3348960-2 10/09/18 13:02 • (MSD) R3348960-3 10/09/18 13:16

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	13.8	63.8	63.8	100	100	1	80.0-120			0.0698	15
Fluoride	5.00	0.128	4.86	4.83	94.6	94.1	1	80.0-120			0.483	15
Sulfate	50.0	1090	1120	1130	59.4	69.7	1	80.0-120	E V	E V	0.458	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349535-1 10/10/18 16:52

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L1033265-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1033265-04 10/10/18 17:31 • (DUP) R3349535-4 10/10/18 17:41

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	9.30	9.30	1	0.0107		15

L1033265-12 Original Sample (OS) • Duplicate (DUP)

(OS) L1033265-12 10/10/18 19:46 • (DUP) R3349535-8 10/10/18 19:56

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	24.8	24.9	1	0.354		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349535-2 10/10/18 17:02 • (LCSD) R3349535-3 10/10/18 17:11

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	40.2	39.2	100	98.1	80.0-120			2.35	15

L1033265-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1033265-04 10/10/18 17:31 • (MS) R3349535-5 10/10/18 17:50 • (MSD) R3349535-6 10/10/18 18:00

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	9.30	58.1	58.2	97.6	97.8	1	80.0-120			0.113	15

L1033265-11 Original Sample (OS) • Matrix Spike (MS)

(OS) L1033265-11 10/10/18 19:27 • (MS) R3349535-7 10/10/18 19:37

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	51.3	98.8	94.9	1	80.0-120	

WG1176292

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L1031734-02,04,05,06,10,18,26

Method Blank (MB)

(MB) R3348322-6 10/07/18 10:02

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348322-1 10/07/18 07:21 • (LCSD) R3348322-2 10/07/18 07:23

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	0.00300	0.00300	100	100	80.0-120			0.0233	20

L1030925-16 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1030925-16 10/07/18 07:31 • (MS) R3348322-3 10/07/18 07:33 • (MSD) R3348322-4 10/07/18 07:36

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Mercury	0.00300	0.000163	0.00325	0.00322	103	102	1	75.0-125			1.10	20

WG1176325

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L1031734-02,04,05,06,10,18,26

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348436-1 10/07/18 14:31

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348436-2 10/07/18 14:33 • (LCSD) R3348436-3 10/07/18 14:36

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Boron	1.00	0.988	0.964	98.8	96.4	80.0-120			2.48	20

L1031738-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031738-02 10/07/18 14:39 • (MS) R3348436-5 10/07/18 14:44 • (MSD) R3348436-6 10/07/18 14:47

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Boron	1.00	U	0.994	0.984	99.4	98.4	1	75.0-125			1.04	20

WG1176330

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1031734-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

Method Blank (MB)

(MB) R3349556-7 10/10/18 22:46

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Cadmium	U		0.000160	0.00100
Calcium	0.957	J	0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	0.000682	J	0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	0.141	J	0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	4.17		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	0.000342	J	0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349556-8 10/10/18 22:50 • (LCSD) R3349556-9 10/10/18 22:55

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0473	0.0478	94.5	95.5	80.0-120			1.05	20
Cadmium	0.0500	0.0479	0.0476	95.9	95.3	80.0-120			0.610	20
Calcium	5.00	4.83	4.69	96.5	93.8	80.0-120			2.88	20
Chromium	0.0500	0.0481	0.0489	96.1	97.8	80.0-120			1.77	20
Cobalt	0.0500	0.0502	0.0516	100	103	80.0-120			2.67	20
Iron	5.00	4.82	4.93	96.4	98.6	80.0-120			2.27	20
Lead	0.0500	0.0474	0.0483	94.9	96.5	80.0-120			1.68	20
Manganese	0.0500	0.0457	0.0509	91.5	102	80.0-120			10.7	20
Nickel	0.0500	0.0482	0.0508	96.5	102	80.0-120			5.12	20
Potassium	5.00	4.68	4.70	93.6	93.9	80.0-120			0.409	20
Selenium	0.0500	0.0567	0.0496	113	99.1	80.0-120			13.5	20
Sodium	5.00	4.76	4.74	95.2	94.9	80.0-120			0.363	20
Uranium	0.0500	0.0465	0.0472	92.9	94.5	80.0-120			1.62	20
Vanadium	0.0500	0.0462	0.0483	92.5	96.7	80.0-120			4.44	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L1031734-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031734-01 10/10/18 22:59 • (MS) R3349556-11 10/10/18 23:09 • (MSD) R3349556-12 10/10/18 23:13

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00240	0.0484	0.0506	92.0	96.4	1	75.0-125			4.50	20
Cadmium	0.0500	U	0.0435	0.0432	87.0	86.4	1	75.0-125			0.627	20
Calcium	5.00	309	295	300	0.000	0.000	1	75.0-125	V	V	1.83	20
Chromium	0.0500	U	0.0442	0.0469	88.3	93.7	1	75.0-125			5.93	20
Cobalt	0.0500	0.000411	0.0439	0.0459	87.0	90.9	1	75.0-125			4.30	20
Potassium	5.00	0.557	5.24	5.39	93.7	96.7	1	75.0-125			2.86	20
Iron	5.00	0.487	4.83	4.98	86.9	90.0	1	75.0-125			3.12	20
Lead	0.0500	U	0.0503	0.0466	101	93.3	1	75.0-125			7.55	20
Manganese	0.0500	1.06	1.04	1.06	0.000	8.79	1	75.0-125	V	V	2.29	20
Nickel	0.0500	0.000942	0.0454	0.0455	88.9	89.1	1	75.0-125			0.242	20
Selenium	0.0500	U	0.0468	0.0488	93.5	97.7	1	75.0-125			4.31	20
Sodium	5.00	156	152	154	0.000	0.000	1	75.0-125	V	V	0.942	20
Uranium	0.0500	0.0104	0.0605	0.0568	100	92.7	1	75.0-125			6.27	20
Vanadium	0.0500	0.000560	0.0449	0.0461	88.7	91.0	1	75.0-125			2.55	20

WG1176332

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1031734-21,22,23,24,25,26,27,28,29,30

Method Blank (MB)

(MB) R3349141-1 10/09/18 18:05

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	0.000222	J	0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	0.000605	J	0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349141-2 10/09/18 18:10 • (LCSD) R3349141-3 10/09/18 18:14

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0511	0.0519	102	104	80.0-120			1.55	20
Barium	0.0500	0.0489	0.0491	97.9	98.2	80.0-120			0.382	20
Cadmium	0.0500	0.0507	0.0504	101	101	80.0-120			0.610	20
Calcium	5.00	4.99	5.15	99.8	103	80.0-120			3.18	20
Chromium	0.0500	0.0524	0.0522	105	104	80.0-120			0.359	20
Cobalt	0.0500	0.0534	0.0538	107	108	80.0-120			0.651	20
Iron	5.00	5.20	5.20	104	104	80.0-120			0.0291	20
Lead	0.0500	0.0509	0.0511	102	102	80.0-120			0.211	20
Manganese	0.0500	0.0504	0.0509	101	102	80.0-120			0.992	20
Nickel	0.0500	0.0536	0.0533	107	107	80.0-120			0.497	20
Potassium	5.00	5.10	5.08	102	102	80.0-120			0.388	20
Selenium	0.0500	0.0532	0.0543	106	109	80.0-120			2.04	20
Sodium	5.00	5.18	5.22	104	104	80.0-120			0.841	20
Uranium	0.0500	0.0485	0.0489	97.0	97.8	80.0-120			0.842	20
Vanadium	0.0500	0.0518	0.0514	104	103	80.0-120			0.897	20

WG1176332

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1031734-21,22,23,24,25,26,27,28,29,30

L1031730-21 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031730-21 10/09/18 18:19 • (MS) R3349141-5 10/09/18 18:28 • (MSD) R3349141-6 10/09/18 18:33

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.00214	0.0527	0.0554	101	106	1	75.0-125			4.91	20
Barium	0.0500	0.0216	0.0790	0.0804	115	118	1	75.0-125			1.79	20
Cadmium	0.0500	U	0.0468	0.0470	93.2	93.6	1	75.0-125			0.483	20
Calcium	5.00	798	810	807	237	168	1	75.0-125	V	V	0.426	20
Chromium	0.0500	U	0.0491	0.0498	98.2	99.6	1	75.0-125			1.42	20
Cobalt	0.0500	0.00145	0.0504	0.0503	97.8	97.7	1	75.0-125			0.118	20
Potassium	5.00	7.16	12.2	12.3	101	103	1	75.0-125			1.03	20
Iron	5.00	4.05	9.13	9.10	102	101	1	75.0-125			0.320	20
Lead	0.0500	0.000355	0.0532	0.0550	106	109	1	75.0-125			3.37	20
Manganese	0.0500	0.527	0.571	0.575	88.4	95.7	1	75.0-125			0.638	20
Nickel	0.0500	0.00121	0.0472	0.0483	92.0	94.2	1	75.0-125			2.28	20
Selenium	0.0500	U	0.0562	0.0554	112	111	1	75.0-125			1.46	20
Sodium	5.00	1750	1710	1680	0.000	0.000	1	75.0-125	E V	E V	1.98	20
Uranium	0.0500	0.000858	0.0555	0.0570	109	112	1	75.0-125			2.65	20
Vanadium	0.0500	0.000292	0.0513	0.0515	102	102	1	75.0-125			0.290	20

WG1179423

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1031734-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349865-1 10/11/18 13:02

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Barium	U		0.000360	0.00500
Sodium	0.113	J	0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349865-2 10/11/18 13:07 • (LCSD) R3349865-3 10/11/18 13:11

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Barium	0.0500	0.0491	0.0466	98.2	93.2	80.0-120			5.26	20
Sodium	5.00	5.20	5.19	104	104	80.0-120			0.193	20

L1031734-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031734-03 10/11/18 13:16 • (MS) R3349865-5 10/11/18 13:25 • (MSD) R3349865-6 10/11/18 13:29

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Barium	0.0500	0.0422	0.0863	0.0889	88.2	93.5	1	75.0-125			3.01	20
Sodium	5.00	613	590	611	0.000	0.000	1	75.0-125	V	V	3.46	20

WG1177198

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L1031734-01,03,04,05,06,07

Method Blank (MB)

(MB) R3349191-3 10/07/18 12:30

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*99.3*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349191-1 10/07/18 11:21 • (LCSD) R3349191-2 10/07/18 11:44

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	5.21	5.24	94.6	95.2	72.0-127			0.638	20
(S) a,a,a-Trifluorotoluene(FID)				*105*	*105*	*78.0-120*				

QUALITY CONTROL SUMMARY

Method Blank (MB)

(MB) R3349491-3 10/08/18 12:07

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349491-1 10/08/18 11:04 • (LCSD) R3349491-2 10/08/18 11:25

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) Low Fraction	5.50	6.03	5.78	110	105	72.0-127			4.27	20
(S) a,a,a-Trifluorotoluene(FID)				*99.8*	*99.9*	*78.0-120*				

L1032119-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032119-06 10/08/18 19:53 • (MS) R3349491-4 10/08/18 20:13 • (MSD) R3349491-5 10/08/18 20:34

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
TPH (GC/FID) Low Fraction	5.50	0.0888	5.66	5.43	101	97.2	1	10.0-160			4.07	22
(S) a,a,a-Trifluorotoluene(FID)					*94.8*	*95.2*		*78.0-120*				

WG1179105

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L1031734-15,24

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349622-3 10/10/18 19:58

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	0.0821	J	0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*99.3*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349622-2 10/10/18 18:39 • (LCSD) R3349622-1 10/10/18 17:36

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.19	5.82	113	106	72.0-127			6.14	20
(S) a,a,a-Trifluorotoluene(FID)				*106*	*105*	*78.0-120*				

Method Blank (MB)

(MB) R3349509-3 10/05/18 07:23

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

QUALITY CONTROL SUMMARY

L1031734-01,02,03,04,05,06,07,08,09,11,12,13,14,15,16,17,19,20

Method Blank (MB)

(MB) R3349509-3 10/05/18 07:23

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*103*			*80.0-120*
(S) Dibromofluoromethane	*114*			*75.0-120*
(S) 4-Bromofluorobenzene	*116*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349509-1 10/05/18 06:23 • (LCSD) R3349509-2 10/05/18 06:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.148	0.148	119	118	19.0-160			0.300	27
Benzene	0.0250	0.0260	0.0263	104	105	70.0-123			0.944	20
Bromodichloromethane	0.0250	0.0272	0.0271	109	108	75.0-120			0.498	20
Bromoform	0.0250	0.0264	0.0268	106	107	68.0-132			1.35	20
Bromomethane	0.0250	0.0219	0.0235	87.7	94.2	10.0-160			7.12	25
n-Butylbenzene	0.0250	0.0247	0.0251	98.9	101	73.0-125			1.66	20
sec-Butylbenzene	0.0250	0.0246	0.0246	98.4	98.4	75.0-125			0.0108	20
Carbon disulfide	0.0250	0.0253	0.0256	101	102	61.0-128			1.44	20
Carbon tetrachloride	0.0250	0.0277	0.0271	111	108	68.0-126			2.23	20
Chlorobenzene	0.0250	0.0225	0.0227	89.9	90.7	80.0-121			0.865	20
Chlorodibromomethane	0.0250	0.0232	0.0245	92.8	97.9	77.0-125			5.30	20
Chloroethane	0.0250	0.0447	0.0453	179	181	47.0-150	J4	J4	1.40	20
Chloroform	0.0250	0.0285	0.0290	114	116	73.0-120			1.81	20
Chloromethane	0.0250	0.0229	0.0237	91.6	94.7	41.0-142			3.26	20
1,2-Dibromoethane	0.0250	0.0238	0.0234	95.1	93.8	80.0-122			1.43	20
1,1-Dichloroethane	0.0250	0.0288	0.0287	115	115	70.0-126			0.567	20
1,2-Dichloroethane	0.0250	0.0311	0.0311	124	125	70.0-128			0.317	20
1,1-Dichloroethene	0.0250	0.0277	0.0276	111	110	71.0-124			0.396	20
cis-1,2-Dichloroethene	0.0250	0.0270	0.0272	108	109	73.0-120			0.998	20
trans-1,2-Dichloroethene	0.0250	0.0263	0.0265	105	106	73.0-120			0.965	20
1,2-Dichloropropane	0.0250	0.0266	0.0258	106	103	77.0-125			3.22	20
cis-1,3-Dichloropropene	0.0250	0.0232	0.0238	93.0	95.4	80.0-123			2.51	20
trans-1,3-Dichloropropene	0.0250	0.0243	0.0247	97.4	98.9	78.0-124			1.52	20

WG1176275

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1031734-01,02,03,04,05,06,07,08,09,11,12,13,14,15,16,17,19,20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349509-1 10/05/18 06:23 • (LCSD) R3349509-2 10/05/18 06:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0216	0.0217	86.6	87.0	79.0-123			0.502	20
2-Hexanone	0.125	0.112	0.113	90.0	90.1	67.0-149			0.147	20
Isopropylbenzene	0.0250	0.0256	0.0259	102	104	76.0-127			1.36	20
p-Isopropyltoluene	0.0250	0.0241	0.0239	96.3	95.7	76.0-125			0.587	20
2-Butanone (MEK)	0.125	0.125	0.127	100	102	44.0-160			1.72	20
Methylene Chloride	0.0250	0.0258	0.0254	103	102	67.0-120			1.43	20
4-Methyl-2-pentanone (MIBK)	0.125	0.113	0.115	90.2	92.1	68.0-142			2.17	20
Methyl tert-butyl ether	0.0250	0.0268	0.0270	107	108	68.0-125			0.764	20
Naphthalene	0.0250	0.0207	0.0214	82.8	85.6	54.0-135			3.35	20
n-Propylbenzene	0.0250	0.0263	0.0263	105	105	77.0-124			0.0569	20
Styrene	0.0250	0.0250	0.0257	100	103	73.0-130			2.75	20
1,1,1,2-Tetrachloroethane	0.0250	0.0224	0.0224	89.8	89.6	75.0-125			0.264	20
1,1,2,2-Tetrachloroethane	0.0250	0.0259	0.0253	104	101	65.0-130			2.22	20
Tetrachloroethene	0.0250	0.0220	0.0218	88.0	87.0	72.0-132			1.11	20
Toluene	0.0250	0.0229	0.0230	91.6	92.0	79.0-120			0.485	20
1,1,1-Trichloroethane	0.0250	0.0295	0.0298	118	119	73.0-124			1.11	20
1,1,2-Trichloroethane	0.0250	0.0234	0.0236	93.6	94.3	80.0-120			0.733	20
Trichloroethene	0.0250	0.0248	0.0243	99.2	97.2	78.0-124			2.01	20
1,2,4-Trimethylbenzene	0.0250	0.0250	0.0254	99.9	102	76.0-121			1.90	20
1,3,5-Trimethylbenzene	0.0250	0.0248	0.0252	99.3	101	76.0-122			1.26	20
Vinyl chloride	0.0250	0.0291	0.0303	116	121	67.0-131			4.09	20
Xylenes, Total	0.0750	0.0639	0.0656	85.2	87.5	79.0-123			2.63	20
o-Xylene	0.0250	0.0212	0.0221	84.9	88.6	80.0-122			4.24	20
m&p-Xylenes	0.0500	0.0427	0.0435	85.5	87.0	80.0-122			1.82	20
(S) Toluene-d8				*94.2*	*95.7*	*80.0-120*				
(S) Dibromofluoromethane				*116*	*115*	*75.0-120*				
(S) 4-Bromofluorobenzene				*112*	*113*	*77.0-126*				

WG1176278

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1031734-21,22,23,24,25,26,27,28,29,30

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349106-3 10/05/18 07:40

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3349106-3 10/05/18 07:40

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*108*			*80.0-120*
(S) Dibromofluoromethane	*104*			*75.0-120*
(S) 4-Bromofluorobenzene	*104*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349106-1 10/05/18 06:40 • (LCSD) R3349106-2 10/05/18 07:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.143	0.168	115	135	19.0-160			16.1	27
Benzene	0.0250	0.0222	0.0210	88.9	84.0	70.0-123			5.71	20
Bromodichloromethane	0.0250	0.0232	0.0216	92.9	86.4	75.0-120			7.28	20
Bromoform	0.0250	0.0232	0.0212	92.6	84.7	68.0-132			8.89	20
Bromomethane	0.0250	0.0209	0.0179	83.7	71.8	10.0-160			15.3	25
n-Butylbenzene	0.0250	0.0229	0.0209	91.7	83.7	73.0-125			9.18	20
sec-Butylbenzene	0.0250	0.0242	0.0223	96.6	89.0	75.0-125			8.21	20
Carbon disulfide	0.0250	0.0182	0.0181	72.9	72.6	61.0-128			0.414	20
Carbon tetrachloride	0.0250	0.0223	0.0223	89.4	89.0	68.0-126			0.405	20
Chlorobenzene	0.0250	0.0287	0.0266	115	106	80.0-121			7.72	20
Chlorodibromomethane	0.0250	0.0286	0.0273	115	109	77.0-125			4.65	20
Chloroethane	0.0250	0.0220	0.0196	87.9	78.5	47.0-150			11.3	20
Chloroform	0.0250	0.0230	0.0225	92.2	89.9	73.0-120			2.45	20
Chloromethane	0.0250	0.0220	0.0210	88.1	84.0	41.0-142			4.68	20
1,2-Dibromoethane	0.0250	0.0272	0.0261	109	105	80.0-122			4.09	20
1,1-Dichloroethane	0.0250	0.0223	0.0206	89.3	82.6	70.0-126			7.77	20
1,2-Dichloroethane	0.0250	0.0250	0.0227	100	90.6	70.0-128			10.0	20
1,1-Dichloroethene	0.0250	0.0231	0.0226	92.5	90.5	71.0-124			2.14	20
cis-1,2-Dichloroethene	0.0250	0.0230	0.0224	91.9	89.7	73.0-120			2.47	20
trans-1,2-Dichloroethene	0.0250	0.0217	0.0228	86.8	91.1	73.0-120			4.86	20
1,2-Dichloropropane	0.0250	0.0243	0.0235	97.0	93.8	77.0-125			3.34	20
cis-1,3-Dichloropropene	0.0250	0.0235	0.0231	93.8	92.4	80.0-123			1.53	20
trans-1,3-Dichloropropene	0.0250	0.0242	0.0236	96.9	94.3	78.0-124			2.70	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349106-1 10/05/18 06:40 • (LCSD) R3349106-2 10/05/18 07:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0286	0.0268	114	107	79.0-123			6.18	20
2-Hexanone	0.125	0.156	0.151	125	121	67.0-149			3.20	20
Isopropylbenzene	0.0250	0.0237	0.0226	94.7	90.3	76.0-127			4.84	20
p-Isopropyltoluene	0.0250	0.0249	0.0238	99.5	95.3	76.0-125			4.36	20
2-Butanone (MEK)	0.125	0.152	0.159	121	127	44.0-160			4.85	20
Methylene Chloride	0.0250	0.0217	0.0204	87.0	81.8	67.0-120			6.19	20
4-Methyl-2-pentanone (MIBK)	0.125	0.163	0.155	130	124	68.0-142			4.58	20
Methyl tert-butyl ether	0.0250	0.0214	0.0207	85.5	83.0	68.0-125			3.01	20
Naphthalene	0.0250	0.0246	0.0239	98.4	95.4	54.0-135			3.04	20
n-Propylbenzene	0.0250	0.0241	0.0228	96.5	91.2	77.0-124			5.61	20
Styrene	0.0250	0.0237	0.0211	94.8	84.4	73.0-130			11.6	20
1,1,1,2-Tetrachloroethane	0.0250	0.0278	0.0268	111	107	75.0-125			3.56	20
1,1,2,2-Tetrachloroethane	0.0250	0.0218	0.0197	87.4	79.0	65.0-130			10.1	20
Tetrachloroethene	0.0250	0.0254	0.0254	102	102	72.0-132			0.0685	20
Toluene	0.0250	0.0253	0.0239	101	95.5	79.0-120			5.82	20
1,1,1-Trichloroethane	0.0250	0.0244	0.0238	97.5	95.2	73.0-124			2.37	20
1,1,2-Trichloroethane	0.0250	0.0277	0.0254	111	101	80.0-120			8.62	20
Trichloroethene	0.0250	0.0251	0.0244	101	97.4	78.0-124			3.19	20
1,2,4-Trimethylbenzene	0.0250	0.0240	0.0237	96.0	94.6	76.0-121			1.47	20
1,3,5-Trimethylbenzene	0.0250	0.0237	0.0210	94.8	83.8	76.0-122			12.3	20
Vinyl chloride	0.0250	0.0219	0.0214	87.6	85.5	67.0-131			2.45	20
Xylenes, Total	0.0750	0.0776	0.0750	103	100	79.0-123			3.41	20
o-Xylene	0.0250	0.0270	0.0238	108	95.1	80.0-122			12.7	20
m&p-Xylenes	0.0500	0.0506	0.0512	101	102	80.0-122			1.25	20
(S) Toluene-d8				*115*	*105*	*80.0-120*				
(S) Dibromofluoromethane				*102*	*104*	*75.0-120*				
(S) 4-Bromofluorobenzene				*106*	*93.4*	*77.0-126*				

WG1179145

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1031734-10,14,15,16,18

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349724-3 10/10/18 22:57

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349724-3 10/10/18 22:57

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*102*			*80.0-120*
(S) Dibromofluoromethane	*95.3*			*75.0-120*
(S) 4-Bromofluorobenzene	*99.2*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349724-1 10/10/18 21:39 • (LCSD) R3349724-2 10/10/18 21:58

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.125	0.133	100	107	19.0-160			6.19	27
Benzene	0.0250	0.0223	0.0223	89.1	89.2	70.0-123			0.0222	20
Bromodichloromethane	0.0250	0.0222	0.0226	88.9	90.3	75.0-120			1.51	20
Bromoform	0.0250	0.0228	0.0233	91.2	93.1	68.0-132			2.11	20
Bromomethane	0.0250	0.0130	0.0148	51.9	59.2	10.0-160			13.2	25
n-Butylbenzene	0.0250	0.0243	0.0245	97.1	97.9	73.0-125			0.863	20
sec-Butylbenzene	0.0250	0.0244	0.0252	97.7	101	75.0-125			2.99	20
Carbon disulfide	0.0250	0.0208	0.0209	83.4	83.6	61.0-128			0.278	20
Carbon tetrachloride	0.0250	0.0210	0.0216	83.9	86.4	68.0-126			2.99	20
Chlorobenzene	0.0250	0.0246	0.0247	98.3	99.0	80.0-121			0.711	20
Chlorodibromomethane	0.0250	0.0233	0.0233	93.4	93.3	77.0-125			0.100	20
Chloroethane	0.0250	0.0253	0.0250	101	100	47.0-150			1.28	20
Chloroform	0.0250	0.0205	0.0210	81.9	83.9	73.0-120			2.48	20
Chloromethane	0.0250	0.0280	0.0284	112	114	41.0-142			1.63	20
1,2-Dibromoethane	0.0250	0.0240	0.0243	96.0	97.3	80.0-122			1.35	20
1,1-Dichloroethane	0.0250	0.0252	0.0255	101	102	70.0-126			1.04	20
1,2-Dichloroethane	0.0250	0.0231	0.0239	92.3	95.5	70.0-128			3.41	20
1,1-Dichloroethene	0.0250	0.0221	0.0221	88.3	88.5	71.0-124			0.256	20
cis-1,2-Dichloroethene	0.0250	0.0201	0.0202	80.6	80.8	73.0-120			0.312	20
trans-1,2-Dichloroethene	0.0250	0.0209	0.0204	83.5	81.7	73.0-120			2.21	20
1,2-Dichloropropane	0.0250	0.0279	0.0275	112	110	77.0-125			1.50	20
cis-1,3-Dichloropropene	0.0250	0.0245	0.0247	97.9	99.0	80.0-123			1.08	20
trans-1,3-Dichloropropene	0.0250	0.0246	0.0249	98.3	99.7	78.0-124			1.38	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349724-1 10/10/18 21:39 • (LCSD) R3349724-2 10/10/18 21:58

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0241	0.0243	96.4	97.0	79.0-123			0.629	20
2-Hexanone	0.125	0.163	0.167	130	134	67.0-149			2.72	20
Isopropylbenzene	0.0250	0.0248	0.0248	99.1	99.1	76.0-127			0.000120	20
p-Isopropyltoluene	0.0250	0.0241	0.0240	96.4	96.0	76.0-125			0.467	20
2-Butanone (MEK)	0.125	0.145	0.151	116	121	44.0-160			4.04	20
Methylene Chloride	0.0250	0.0199	0.0202	79.7	80.7	67.0-120			1.31	20
4-Methyl-2-pentanone (MIBK)	0.125	0.154	0.158	123	126	68.0-142			2.30	20
Methyl tert-butyl ether	0.0250	0.0214	0.0220	85.5	87.9	68.0-125			2.74	20
Naphthalene	0.0250	0.0171	0.0190	68.6	76.1	54.0-135			10.5	20
n-Propylbenzene	0.0250	0.0234	0.0236	93.4	94.5	77.0-124			1.20	20
Styrene	0.0250	0.0246	0.0241	98.6	96.3	73.0-130			2.28	20
1,1,1,2-Tetrachloroethane	0.0250	0.0239	0.0238	95.6	95.0	75.0-125			0.583	20
1,1,2,2-Tetrachloroethane	0.0250	0.0215	0.0219	86.0	87.7	65.0-130			1.91	20
Tetrachloroethene	0.0250	0.0246	0.0250	98.6	100	72.0-132			1.66	20
Toluene	0.0250	0.0236	0.0238	94.4	95.4	79.0-120			1.04	20
1,1,1-Trichloroethane	0.0250	0.0221	0.0224	88.5	89.5	73.0-124			1.12	20
1,1,2-Trichloroethane	0.0250	0.0230	0.0235	91.8	93.9	80.0-120			2.21	20
Trichloroethene	0.0250	0.0251	0.0245	100	97.9	78.0-124			2.56	20
1,2,4-Trimethylbenzene	0.0250	0.0234	0.0239	93.6	95.7	76.0-121			2.28	20
1,3,5-Trimethylbenzene	0.0250	0.0238	0.0242	95.4	96.6	76.0-122			1.31	20
Vinyl chloride	0.0250	0.0265	0.0266	106	107	67.0-131			0.477	20
Xylenes, Total	0.0750	0.0735	0.0728	98.0	97.1	79.0-123			0.957	20
o-Xylene	0.0250	0.0244	0.0241	97.5	96.6	80.0-122			0.953	20
m&p-Xylenes	0.0500	0.0491	0.0487	98.2	97.3	80.0-122			0.921	20
(S) Toluene-d8				*104*	*107*	*80.0-120*				
(S) Dibromofluoromethane				*91.6*	*94.5*	*75.0-120*				
(S) 4-Bromofluorobenzene				*96.6*	*98.7*	*77.0-126*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349900-3 10/11/18 16:54

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100
Trichloroethene	U		0.000398	0.00100

Method Blank (MB)

(MB) R3349900-3 10/11/18 16:54

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*106*			*80.0-120*
(S) Dibromofluoromethane	*97.1*			*75.0-120*
(S) 4-Bromofluorobenzene	*103*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349900-1 10/11/18 15:51 • (LCSD) R3349900-2 10/11/18 16:12

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.152	0.152	122	122	19.0-160			0.206	27
Benzene	0.0250	0.0241	0.0241	96.3	96.4	70.0-123			0.153	20
Bromodichloromethane	0.0250	0.0251	0.0248	100	99.2	75.0-120			1.07	20
Bromoform	0.0250	0.0262	0.0251	105	100	68.0-132			4.37	20
Bromomethane	0.0250	0.0177	0.0160	70.8	64.1	10.0-160			10.1	25
n-Butylbenzene	0.0250	0.0262	0.0260	105	104	73.0-125			1.04	20
sec-Butylbenzene	0.0250	0.0260	0.0261	104	104	75.0-125			0.374	20
Carbon disulfide	0.0250	0.0232	0.0237	92.9	94.9	61.0-128			2.15	20
Carbon tetrachloride	0.0250	0.0229	0.0231	91.7	92.3	68.0-126			0.659	20
Chlorobenzene	0.0250	0.0251	0.0254	101	101	80.0-121			0.898	20
Chlorodibromomethane	0.0250	0.0253	0.0254	101	102	77.0-125			0.563	20
Chloroethane	0.0250	0.0257	0.0260	103	104	47.0-150			1.34	20
Chloroform	0.0250	0.0247	0.0244	98.7	97.5	73.0-120			1.20	20
Chloromethane	0.0250	0.0264	0.0264	106	106	41.0-142			0.191	20
1,2-Dibromoethane	0.0250	0.0257	0.0262	103	105	80.0-122			2.00	20
1,1-Dichloroethane	0.0250	0.0242	0.0243	96.7	97.4	70.0-126			0.684	20
1,2-Dichloroethane	0.0250	0.0245	0.0244	98.1	97.6	70.0-128			0.494	20
1,1-Dichloroethene	0.0250	0.0246	0.0247	98.3	99.0	71.0-124			0.697	20
cis-1,2-Dichloroethene	0.0250	0.0241	0.0242	96.5	96.8	73.0-120			0.285	20
trans-1,2-Dichloroethene	0.0250	0.0251	0.0254	100	101	73.0-120			1.09	20
1,2-Dichloropropane	0.0250	0.0255	0.0248	102	99.3	77.0-125			2.80	20
cis-1,3-Dichloropropene	0.0250	0.0246	0.0248	98.5	99.1	80.0-123			0.634	20
trans-1,3-Dichloropropene	0.0250	0.0256	0.0253	102	101	78.0-124			1.02	20
Ethylbenzene	0.0250	0.0247	0.0245	98.7	98.2	79.0-123			0.557	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349900-1 10/11/18 15:51 • (LCSD) R3349900-2 10/11/18 16:12

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
2-Hexanone	0.125	0.139	0.139	111	111	67.0-149			0.0426	20
Isopropylbenzene	0.0250	0.0256	0.0255	102	102	76.0-127			0.494	20
p-Isopropyltoluene	0.0250	0.0265	0.0261	106	105	76.0-125			1.43	20
2-Butanone (MEK)	0.125	0.145	0.142	116	114	44.0-160			1.90	20
Methylene Chloride	0.0250	0.0233	0.0233	93.4	93.3	67.0-120			0.0887	20
4-Methyl-2-pentanone (MIBK)	0.125	0.131	0.132	105	105	68.0-142			0.778	20
Naphthalene	0.0250	0.0259	0.0263	104	105	54.0-135			1.60	20
n-Propylbenzene	0.0250	0.0255	0.0255	102	102	77.0-124			0.103	20
Styrene	0.0250	0.0267	0.0269	107	108	73.0-130			0.700	20
1,1,1,2-Tetrachloroethane	0.0250	0.0248	0.0250	99.1	100	75.0-125			1.05	20
1,1,2,2-Tetrachloroethane	0.0250	0.0256	0.0258	103	103	65.0-130			0.552	20
Tetrachloroethene	0.0250	0.0249	0.0248	99.6	99.1	72.0-132			0.540	20
Toluene	0.0250	0.0239	0.0240	95.6	96.0	79.0-120			0.364	20
1,1,1-Trichloroethane	0.0250	0.0238	0.0245	95.2	97.9	73.0-124			2.73	20
1,1,2-Trichloroethane	0.0250	0.0255	0.0256	102	102	80.0-120			0.256	20
Trichloroethene	0.0250	0.0252	0.0252	101	101	78.0-124			0.370	20
1,2,4-Trimethylbenzene	0.0250	0.0259	0.0253	103	101	76.0-121			2.03	20
1,3,5-Trimethylbenzene	0.0250	0.0257	0.0255	103	102	76.0-122			0.515	20
Vinyl chloride	0.0250	0.0289	0.0295	116	118	67.0-131			2.13	20
Xylenes, Total	0.0750	0.0748	0.0742	99.7	98.9	79.0-123			0.805	20
o-Xylene	0.0250	0.0249	0.0247	99.5	99.0	80.0-122			0.511	20
m&p-Xylenes	0.0500	0.0499	0.0495	99.7	98.9	80.0-122			0.835	20
(S) Toluene-d8				*101*	*102*	*80.0-120*				
(S) Dibromofluoromethane				*99.3*	*98.6*	*75.0-120*				
(S) 4-Bromofluorobenzene				*101*	*102*	*77.0-126*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349235-1 10/09/18 09:16

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*47.9*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349235-2 10/09/18 09:37 • (LCSD) R3349235-3 10/09/18 09:57

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.17	1.24	78.0	82.7	50.0-150			5.81	20
(S) o-Terphenyl				*85.5*	*96.5*	*31.0-160*				

WG1177736

QUALITY CONTROL SUMMARY

Semi-Volatile Organic Compounds (GC) by Method 3511/8015 L1031734-06,07,08,09,10,11,12,13,14,15,16,17,18,19,20,21,22,23,24,25

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349249-1 10/09/18 15:12

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*69.0*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349249-2 10/09/18 15:29 • (LCSD) R3349249-3 10/09/18 15:47

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.31	1.30	87.3	86.7	50.0-150			0.766	20
(S) o-Terphenyl				*94.0*	*96.5*	*31.0-160*				

WG1177738

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L1031734-26,27,28,29,30

Method Blank (MB)

(MB) R3349250-1 10/09/18 16:04

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*66.0*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349250-2 10/09/18 16:22 • (LCSD) R3349250-3 10/09/18 16:39

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.30	1.30	86.7	86.7	50.0-150			0.000	20
(S) o-Terphenyl				*94.5*	*94.5*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia[1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky[1,6]	90010
Kentucky[2]	16
Louisiana	AI30792
Louisiana[1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086
Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico[1]	n/a
New York	11742
North Carolina	Env375
North Carolina[1]	DW21704
North Carolina[3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee[1,4]	2006
Texas	T 104704245-17-14
Texas[5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

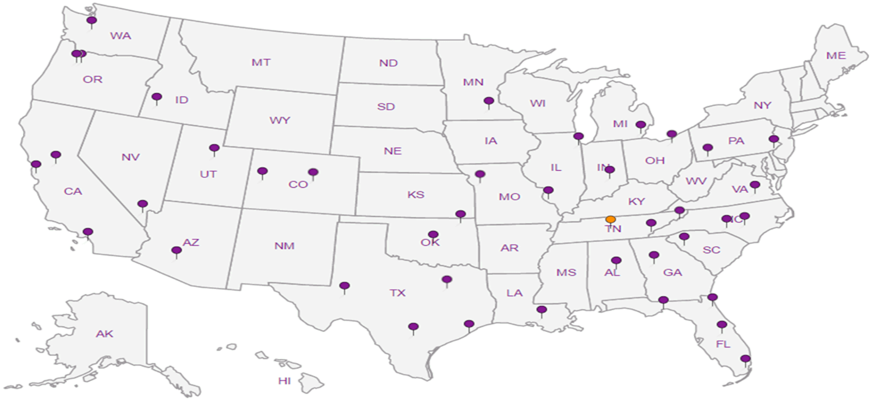
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01
A2LA – ISO 17025[5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003
AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Chain of Custody Page 1 of 9

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
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Phone: 800-767-5859
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TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Report to: Julie Speer

Email To: jspeer@trcsolutions.com

Project Description: REST Fall 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170
Fax:

Client Project #: 294318.0000.0000.

Lab Project #: TRCATX-REST

Collected by (print): Scott Ude/HMI Team

Site/Facility ID #: REST (Navajo - Artesia)

P.O. #: 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ✓

L # L031734
G244
Tal
Acctnum: TRCATX
Template: T140424
Prelogin: P671814
TSR: 526
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
Pres Chk										<2			<2					
~~MW-48~~	~~Grab~~	~~GW~~				~~9~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~					
~~MW-130~~	~~Grab~~	~~GW~~				~~9~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~					
~~KWB-4~~	~~Grab~~	~~GW~~				~~7~~	~~x~~	~~x~~		~~x~~	~~x~~	~~x~~	~~x~~					
~~MW-52~~	~~Grab~~	~~GW~~				~~10~~	~~x~~	~~x~~	~~x~~		~~x~~	~~x~~	~~x~~	~~x~~	~~x~~			
~~MW-109~~	~~Grab~~	~~GW~~				~~9~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~					
~~MW-110~~	~~Grab~~	~~GW~~				~~9~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~					
MW-113	Grab	GW		10-2-18	1335	9	x	x	x	x	x	x	x					-01
~~KWB-8~~	~~Grab~~	~~GW~~				~~8~~	~~x~~	~~x~~			~~x~~	~~x~~	~~x~~	~~x~~	~~x~~			
~~MW-133~~	~~Grab~~	~~GW~~				~~9~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	LNAPL				
~~MW-134~~	~~Grab~~	~~GW~~				~~9~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __ NP ✓Y __ N
COC Signed/Accurate: ✓Y __ N
Bottles arrive intact: ✓Y __ N
Correct bottles used: ✓Y __ N
Sufficient volume sent: ✓Y __ N
If Applicable
VOA Zero Headspace: ✓Y __ N
Preservation Correct/Checked: ✓Y __ N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-1=03 °C Bottles Received: 25
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 2 of 9

Pace Analytical®
National Center for Testing & Innovation

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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**	L# L031734
Project Description: **REST Fall 2018**	City/State Collected: **Artesia, NM**	Table #
Phone: **512-684-3170** Fax:	Client Project # **294318.0000.0000.**	Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **REST (Navajo - Artesia)**	P.O. # **119503**
Collected by (signature): Immediately Packed on Ice N___ Y ✓	**Rush?** (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day	Quote # Date Results Needed

Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~RA-4798~~	~~Grab~~	~~GW~~				~~5~~	~~X~~				~~X~~	~~X~~	~~X~~					
~~RA-4196~~	~~Grab~~	~~GW~~				~~5~~	~~X~~				~~X~~	~~X~~	~~X~~					
KWB-7	Grab	GW		10-2-18	920	8	X	X			X	X	X	X	X			-02
MW-135	Grab	GW		↓	1220	9	X	X	X	X	X	X	X					-03
KWB-11A	Grab	GW			1030	10	X	X	X		X	X	X	X	X			-04
KWB-11B	Grab	GW			1115	10	X	X	X		X	X	X	X	X			-05
~~MW-115~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-114~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-117~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-118~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-.1=0.3 °C Bottles Received: 257
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 3 of 9

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**
Project Description: **REST Fall 2018**	City/State Collected: **Artesia, NM**
Phone: **512-684-3170** Fax:	Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-REST**	
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**	Quote #
Collected by (signature):	Rush? (Lab MUST Be Notified) ___ Same Day ___ Next Day ___ Two Day ___ Three Day ___ Five Day ___ 5 Day (Rad Only) ___ 10 Day (Rad Only)
Immediately Packed on Ice N ___ Y ✓	Date Results Needed

L # L031734
Table #
Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
Pres Chk										22			22					
~~MW-119~~	~~Grab~~	~~GW~~				~~9~~	~~X~~				~~X~~	~~X~~	~~X~~					
MW-136	Grab	GW		10-2-18	1030	10	X	X	X		X	X	X	X	X			-06
MW-126A	Grab	GW			1115	9	X	X	X	X	X	X	X					.07
MW-126B	Grab	GW			1155	9	X	X	X	X	X	X	X					.08
MW-127	Grab	GW			1235	9	X	X	X	X	X	X	X					-09
KWB-1A	Grab	GW			945	8	X	X			X	X	X	X	X			-10
KWB-10R	Grab	GW		↓	900	7	X	X		X	X	X	X					-11
~~MW-131~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	ENAR				
KWB-5	Grab	GW		10-2-18	1445	7	X	X		X	X	X	X					-12
MW-111	Grab	GW		↓	1350	9	X	X	X	X	X	X	X					.13

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via: ___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ___NP ✓Y ___N
COC Signed/Accurate: ✓Y ___N
Bottles arrive intact: ✓Y ___N
Correct bottles used: ✓Y ___N
Sufficient volume sent: ✓Y ___N
If Applicable
VOA Zero Headspace: ✓Y ___N
Preservation Correct/Checked: ✓Y ___N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: DA:1=0.3 °C Bottles Received: 257
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) Reagan Johns	Date: 10/4/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 4 of 9

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

L # L1031734
Table #
Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
Pres Chk										N✓			N✓					
~~KWB-6~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-112~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL				
~~MW-132~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL				
~~MW-57~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~KWB-12A~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~KWB-12B~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~KWB-2R~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	Not Sampled				
~~MW-58~~	~~Grab~~	~~GW~~				~~8~~	~~X~~	~~X~~			~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
MW-104	Grab	GW		10-2-18	1005	9	X	X	X	X	X	X	X					-14
MW-64	Grab	GW		↓	925	9	X	X	X	X	X	X	X					-15

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: Yes / [✓ No]
HCL / MeoH
TBR

Temp: 0.4-.1=0.3 °C Bottles Received: 25

Date: 10/4/14 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
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Chain of Custody Page 5 of 9

Pace Analytical® National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Pres Chk

L# L1031744
Table #
Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3 <2	Cations (from "total metals" bottle)	Anions, TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4 <2	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
MW-65	Grab	GW		10-2-18	1135	9	X	X	X	X	X	X	X					-16
MW-102	Grab	GW		↓	1225	9	X	X	X	X	X	X	X					-17
~~MW-99~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-66~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
MW-28	Grab	GW		10-2-18	1315	10	X	X	X		X	X	X	X	X			-18
~~MW-60~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~MW-128~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-125~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-116~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-101~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ___ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 04-1=03 °C Bottles Received: 257
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 6 of 9

Pace Analytical® National Center for Testing & Innovation
12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**

Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Quote #

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

Pres Chk

L # L031734

Table #

Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~MW-105~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
MW-61	Grab	GW		10-2-18	1445	9	X	X	X	X	X	X	X					-19
MW-62	Grab	GW		↓	1530	9	X	X	X	X	X	X	X					-20
~~MW-137~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~MW-138~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~MW-23~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-39~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
MW-98	Grab	GW		10-2-18	1355	9	X	X	X	X	X	X	X					-21
~~MW-29~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-106~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: _NP ✓Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: ✓Y _N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: _Y _N
Preservation Correct/Checked: ✓Y _N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes [✓ No] HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0A-1=03 °C Bottles Received: 257
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 9:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
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Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Pres Chk

Chain of Custody Page 7 of 9

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

L # L031734

Table #

Acctnum: **TRCATX**

Template: **T140424**

Prelogin: **P671814**

TSR: **526**

PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	✓✓ Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	✓ NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
MW-50	Grab	GW		10-2-18	1050	7	X	X		X	X	X	X					-22
~~MW-97~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL				
~~MW-92~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL				
MW-91	Grab	GW		10-2-18	1200	9	X	X	X	X	X	X	X					-23
MW-90	Grab	GW		↓	1240	9	X	X	X	X	X	X	X					-24
MW-96	Grab	GW			1315	9	X	X	X	X	X	X	X					-25
~~MW-94~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL				
MW-67	Grab	GW		10-2-18	1415	10	X	X	X		X	X	X	X	X			-26
DUP-REST-01	Grab	GW		↓	1000	9	X	X	X	X	X	X	X					-27
DUP-REST-02	Grab	GW			1200	9	X	X	X	X	X	X	X					-28

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NF ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-1=0.3 °C Bottles Received: 257
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) Reagan Tolan	Date: 10/4/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX **505 E. Huntland Dr, Ste 250** **Austin, TX 78752**	Billing Information: **Accounts Payable** **21 Griffin Road North** **Windsor, CT 06095** **apinvoiceapproval@trcsolutions.com**	Pres Chk	Chain of Custody Page 8 of 9
Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**		Pace Analytical® 12065 Lebanon Rd Mount Juliet, TN 37122 Phone: 615-758-5858 Phone: 800-767-5859 Fax: 615-758-5859
Project Description: **REST Fall 2018**	City/State Collected: **Artesia, NM**		
Phone: **512-684-3170** Fax:	Client Project # **294318.0000.0000.**	Lab Project # **TRCATX-REST**	L# L1031734 Table #
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **REST (Navajo - Artesia)**	P.O. # **119503**	Acctnum: **TRCATX** Template: **T140424** Prelogin: **P671814** TSR: **526** PB:
Collected by (signature): Immediately Packed on Ice N ___ Y ✓	***Rush?*** (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day	Quote # Date Results Needed	Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3 <2	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4 <2	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~DUP-REST-03~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~DUP-REST-04~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~DUP-REST-05~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
EB-REST-01	Grab	GW		10-2-18	1345	9	X	X	X	X	X	X	X					-29
EB-REST-02	Grab	GW		↓	1025	9	X	X	X	X	X	X	X					-30
~~EB-REST-03~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~EB-REST-04~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~EB-REST-05~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~TRIP BLANK REST-01~~	~~Grab~~	~~GW~~				~~1~~										~~X~~		
~~TRIP BLANK REST-02~~	~~Grab~~	~~GW~~				~~1~~										~~X~~		

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP ✓Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-1=0.3 °C Bottles Received: 257	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18 Time: 8:45	Hold: Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Pres Chk

Chain of Custody Page 9 of 9

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L # L1031734

Table #

Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671814**
TSR: **526**
PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~TRIP BLANK-REST-03~~	Grab	GW				1										X		
TRIP BLANK-REST-04	Grab	GW				1										X		
MW-43	Grab	GW				10	X	X	X		X	X	X	X	X			

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ___ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ___NP ✓Y ___N
COC Signed/Accurate: ✓Y ___N
Bottles arrive intact: ✓Y ___N
Correct bottles used: ✓Y ___N
Sufficient volume sent: ✓Y ___N
If Applicable
VOA Zero Headspace: ✓Y ___N
Preservation Correct/Checked: ✓Y ___N

Relinquished by : (Signature)	Date: 10-3-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR		
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 0.4-.1=0.3 °C	Bottles Received: 257	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/4/18	Time: 8:45	Hold:

Condition: NCF / [✓ OK]

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

January 11, 2019

TRC Solutions - Austin, TX

Sample Delivery Group:	L1032119
Samples Received:	10/05/2018
Project Number:	294318.0000.0000.
Description:	NCL Fall 2018
Site:	NCL - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By:

Chris McCord
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

12065 Lebanon Rd Mount Juliet, TN 37122 615-758-5858 800-767-5859 www.pacenational.com

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1 Cp
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8 Al
9 Sc

MW-45 L1032119-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 14:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178367	1	10/10/18 08:30	10/10/18 09:00	MMF
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:26	10/10/18 22:26	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	1	10/11/18 15:31	10/12/18 17:42	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 16:12	10/11/18 16:12	ELN
Wet Chemistry by Method 9056A	WG1176730	50	10/11/18 16:28	10/11/18 16:28	ELN
Mercury by Method 7470A	WG1177216	1	10/08/18 05:26	10/08/18 13:03	ABL
Metals (ICP) by Method 6010B	WG1176838	1	10/06/18 13:02	10/08/18 11:07	CCE
Metals (ICPMS) by Method 6020	WG1176860	1	10/09/18 18:12	10/10/18 16:59	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 05:48	10/07/18 05:48	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 03:05	SHG

NCL-44 L1032119-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 11:30	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178367	1	10/10/18 08:30	10/10/18 09:00	MMF
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:29	10/10/18 22:29	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 16:45	10/11/18 16:45	ELN
Wet Chemistry by Method 9056A	WG1176730	20	10/11/18 17:02	10/11/18 17:02	ELN
Metals (ICPMS) by Method 6020	WG1176860	1	10/09/18 18:12	10/10/18 17:04	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 06:08	10/07/18 06:08	RAS
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 03:23	SHG

NCL-32 L1032119-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 10:45	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178367	1	10/10/18 08:30	10/10/18 09:00	MMF
Wet Chemistry by Method 353.2	WG1178866	2	10/10/18 22:32	10/10/18 22:32	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 17:19	10/11/18 17:19	ELN
Wet Chemistry by Method 9056A	WG1176730	50	10/11/18 18:01	10/11/18 18:01	ELN
Metals (ICPMS) by Method 6020	WG1176860	1	10/09/18 18:12	10/10/18 17:08	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 06:27	10/07/18 06:27	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 03:40	SHG

MW-108 L1032119-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178367	1	10/10/18 08:30	10/10/18 09:00	MMF
Wet Chemistry by Method 353.2	WG1178866	50	10/10/18 22:33	10/10/18 22:33	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 18:18	10/11/18 18:18	ELN
Wet Chemistry by Method 9056A	WG1176730	20	10/11/18 19:12	10/11/18 19:12	ELN
Metals (ICPMS) by Method 6020	WG1176860	1	10/09/18 18:12	10/10/18 17:13	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179679	5	10/11/18 17:57	10/11/18 17:57	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 03:57	SHG

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

NCL-31 L1032119-05 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:55	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178367	1	10/10/18 08:30	10/10/18 09:00	MMF
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:35	10/10/18 22:35	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 19:29	10/11/18 19:29	ELN
Wet Chemistry by Method 9056A	WG1176730	50	10/11/18 19:46	10/11/18 19:46	ELN
Metals (ICPMS) by Method 6020	WG1176860	1	10/09/18 18:12	10/10/18 17:18	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 07:07	10/07/18 07:07	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 04:15	SHG

MW-55 L1032119-06 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:15	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:42	10/10/18 22:42	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	1	10/11/18 15:31	10/12/18 17:43	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 20:02	10/11/18 20:02	ELN
Wet Chemistry by Method 9056A	WG1176730	50	10/11/18 20:19	10/11/18 20:19	ELN
Mercury by Method 7470A	WG1177216	1	10/08/18 05:26	10/08/18 13:20	ABL
Metals (ICP) by Method 6010B	WG1176838	1	10/06/18 13:02	10/08/18 11:10	CCE
Metals (ICPMS) by Method 6020	WG1176860	1	10/09/18 18:12	10/10/18 17:22	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177450	1	10/08/18 19:53	10/08/18 19:53	DWR
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 07:27	10/07/18 07:27	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 04:32	SHG

EB-NCL-01 L1032119-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 10:55	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:44	10/10/18 22:44	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 20:36	10/11/18 20:36	ELN
Metals (ICPMS) by Method 6020	WG1176860	1	10/09/18 18:12	10/10/18 17:27	LD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 07:47	10/07/18 07:47	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1177738	1	10/09/18 09:32	10/10/18 04:49	SHG

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Project Manager

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3840		28.2	100	1	10/10/2018 09:00	WG1178367

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 22:26	WG1178866

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	0.00258	J	0.00180	0.00500	1	10/12/2018 17:42	WG1179442

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	447		2.60	50.0	50	10/11/2018 16:28	WG1176730
Fluoride	1.36		0.00990	0.100	1	10/11/2018 16:12	WG1176730
Sulfate	2680		3.87	250	50	10/11/2018 16:28	WG1176730

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	10/08/2018 13:03	WG1177216

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.670		0.0126	0.200	1	10/08/2018 11:07	WG1176838

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00327		0.000250	0.00200	1	10/10/2018 16:59	WG1176860
Barium	0.0156	B	0.000360	0.00500	1	10/10/2018 16:59	WG1176860
Cadmium	0.000394	B J	0.000160	0.00100	1	10/10/2018 16:59	WG1176860
Calcium	624		0.0460	1.00	1	10/10/2018 16:59	WG1176860
Chromium	U		0.000540	0.00200	1	10/10/2018 16:59	WG1176860
Cobalt	U		0.000260	0.00200	1	10/10/2018 16:59	WG1176860
Iron	1.58		0.0150	0.100	1	10/10/2018 16:59	WG1176860
Lead	0.00109	B J	0.000240	0.00200	1	10/10/2018 16:59	WG1176860
Manganese	0.599		0.000250	0.00500	1	10/10/2018 16:59	WG1176860
Nickel	0.00378		0.000350	0.00200	1	10/10/2018 16:59	WG1176860
Potassium	5.03		0.0370	1.00	1	10/10/2018 16:59	WG1176860
Selenium	U		0.000380	0.00200	1	10/10/2018 16:59	WG1176860
Sodium	372		0.110	1.00	1	10/10/2018 16:59	WG1176860
Uranium	0.000654	J	0.000330	0.0100	1	10/10/2018 16:59	WG1176860
Vanadium	0.000278	J	0.000180	0.00500	1	10/10/2018 16:59	WG1176860

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/07/2018 05:48	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 05:48	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 05:48	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 05:48	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 05:48	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 05:48	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 05:48	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 05:48	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 05:48	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 05:48	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 05:48	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 05:48	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 05:48	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 05:48	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 05:48	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 05:48	WG1177169
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 05:48	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 05:48	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 05:48	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 05:48	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 05:48	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 05:48	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 05:48	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 05:48	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 05:48	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 05:48	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 05:48	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 05:48	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 05:48	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 05:48	WG1177169
Methyl tert-butyl ether	0.00766		0.000367	0.00100	1	10/07/2018 05:48	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 05:48	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 05:48	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 05:48	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 05:48	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 05:48	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 05:48	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 05:48	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 05:48	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 05:48	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 05:48	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 05:48	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 05:48	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 05:48	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 05:48	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 05:48	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 05:48	WG1177169
(S) Toluene-d8	*110*			*80.0-120*		*10/07/2018 05:48*	WG1177169
(S) Dibromofluoromethane	*110*			*75.0-120*		*10/07/2018 05:48*	WG1177169
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/07/2018 05:48*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.30		0.0247	0.100	1	10/10/2018 03:05	WG1177738
(S) o-Terphenyl	*82.6*			*31.0-160*		*10/10/2018 03:05*	WG1177738

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2340		14.1	50.0	1	10/10/2018 09:00	WG1178367

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0260	J J6	0.0197	0.100	1	10/10/2018 22:29	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	146		1.04	20.0	20	10/11/2018 17:02	WG1176730
Fluoride	1.60		0.00990	0.100	1	10/11/2018 16:45	WG1176730
Sulfate	1330		1.55	100	20	10/11/2018 17:02	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0301		0.000250	0.00200	1	10/10/2018 17:04	WG1176860
Barium	0.0201	B	0.000360	0.00500	1	10/10/2018 17:04	WG1176860
Calcium	376		0.0460	1.00	1	10/10/2018 17:04	WG1176860
Chromium	U		0.000540	0.00200	1	10/10/2018 17:04	WG1176860
Iron	1.13		0.0150	0.100	1	10/10/2018 17:04	WG1176860
Lead	0.000618	B J	0.000240	0.00200	1	10/10/2018 17:04	WG1176860
Manganese	0.879		0.000250	0.00500	1	10/10/2018 17:04	WG1176860
Potassium	2.33		0.0370	1.00	1	10/10/2018 17:04	WG1176860
Selenium	U		0.000380	0.00200	1	10/10/2018 17:04	WG1176860
Sodium	131		0.110	1.00	1	10/10/2018 17:04	WG1176860

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/07/2018 06:08	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 06:08	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 06:08	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 06:08	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 06:08	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 06:08	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 06:08	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 06:08	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 06:08	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 06:08	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 06:08	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 06:08	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 06:08	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 06:08	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 06:08	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 06:08	WG1177169
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 06:08	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 06:08	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 06:08	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 06:08	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 06:08	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 06:08	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 06:08	WG1177169

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 06:08	WG1177169
Isopropylbenzene	0.00101		0.000326	0.00100	1	10/07/2018 06:08	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 06:08	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 06:08	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 06:08	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 06:08	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 06:08	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 06:08	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 06:08	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 06:08	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 06:08	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 06:08	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 06:08	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 06:08	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 06:08	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 06:08	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 06:08	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 06:08	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 06:08	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 06:08	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 06:08	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 06:08	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 06:08	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 06:08	WG1177169
(S) Toluene-d8	*99.9*			*80.0-120*		*10/07/2018 06:08*	WG1177169
(S) Dibromofluoromethane	*103*			*75.0-120*		*10/07/2018 06:08*	WG1177169
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/07/2018 06:08*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	8.38		0.0247	0.100	1	10/10/2018 03:23	WG1177738
(S) o-Terphenyl	*91.6*			*31.0-160*		*10/10/2018 03:23*	WG1177738

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2270		14.1	50.0	1	10/10/2018 09:00	WG1178367

Wet Chemistry by Method 353.2

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	5.11		0.0394	0.200	2	10/10/2018 22:32	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Chloride	104	B	2.60	50.0	50	10/11/2018 18:01	WG1176730
Fluoride	1.23		0.00990	0.100	1	10/11/2018 17:19	WG1176730
Sulfate	1570		3.87	250	50	10/11/2018 18:01	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00306		0.000250	0.00200	1	10/10/2018 17:08	WG1176860
Barium	0.0198	B	0.000360	0.00500	1	10/10/2018 17:08	WG1176860
Calcium	447		0.0460	1.00	1	10/10/2018 17:08	WG1176860
Chromium	0.00201		0.000540	0.00200	1	10/10/2018 17:08	WG1176860
Iron	0.339		0.0150	0.100	1	10/10/2018 17:08	WG1176860
Lead	0.00224	B	0.000240	0.00200	1	10/10/2018 17:08	WG1176860
Manganese	1.34		0.000250	0.00500	1	10/10/2018 17:08	WG1176860
Potassium	3.24		0.0370	1.00	1	10/10/2018 17:08	WG1176860
Selenium	0.00134	J	0.000380	0.00200	1	10/10/2018 17:08	WG1176860
Sodium	120		0.110	1.00	1	10/10/2018 17:08	WG1176860

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/07/2018 06:27	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 06:27	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 06:27	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 06:27	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 06:27	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 06:27	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 06:27	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 06:27	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 06:27	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 06:27	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 06:27	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 06:27	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 06:27	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 06:27	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 06:27	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 06:27	WG1177169
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 06:27	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 06:27	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 06:27	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 06:27	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 06:27	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 06:27	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 06:27	WG1177169

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 06:27	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 06:27	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 06:27	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 06:27	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 06:27	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 06:27	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 06:27	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 06:27	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 06:27	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 06:27	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 06:27	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 06:27	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 06:27	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 06:27	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 06:27	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 06:27	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 06:27	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 06:27	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 06:27	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 06:27	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 06:27	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 06:27	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 06:27	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 06:27	WG1177169
(S) Toluene-d8	*104*			*80.0-120*		*10/07/2018 06:27*	WG1177169
(S) Dibromofluoromethane	*109*			*75.0-120*		*10/07/2018 06:27*	WG1177169
(S) 4-Bromofluorobenzene	*99.6*			*77.0-126*		*10/07/2018 06:27*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	2.11		0.0247	0.100	1	10/10/2018 03:40	WG1177738
(S) o-Terphenyl	*78.4*			*31.0-160*		*10/10/2018 03:40*	WG1177738

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2260		14.1	50.0	1	10/10/2018 09:00	WG1178367

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 22:33	WG1178866

Sample Narrative:

L1032119-04 WG1178866: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	62.0		0.0519	1.00	1	10/11/2018 18:18	WG1176730
Fluoride	1.64		0.00990	0.100	1	10/11/2018 18:18	WG1176730
Sulfate	1080		1.55	100	20	10/11/2018 19:12	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00274		0.000250	0.00200	1	10/10/2018 17:13	WG1176860
Barium	0.0384		0.000360	0.00500	1	10/10/2018 17:13	WG1176860
Calcium	300		0.0460	1.00	1	10/10/2018 17:13	WG1176860
Chromium	0.00310		0.000540	0.00200	1	10/10/2018 17:13	WG1176860
Iron	4.57		0.0150	0.100	1	10/10/2018 17:13	WG1176860
Lead	0.00279	B	0.000240	0.00200	1	10/10/2018 17:13	WG1176860
Manganese	0.0540		0.000250	0.00500	1	10/10/2018 17:13	WG1176860
Potassium	0.996	J	0.0370	1.00	1	10/10/2018 17:13	WG1176860
Selenium	U		0.000380	0.00200	1	10/10/2018 17:13	WG1176860
Sodium	98.1		0.110	1.00	1	10/10/2018 17:13	WG1176860

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	10/11/2018 17:57	WG1179679
Benzene	0.404		0.00166	0.00500	5	10/11/2018 17:57	WG1179679
Bromodichloromethane	U		0.00190	0.00500	5	10/11/2018 17:57	WG1179679
Bromoform	U		0.00234	0.00500	5	10/11/2018 17:57	WG1179679
Bromomethane	U		0.00433	0.0250	5	10/11/2018 17:57	WG1179679
n-Butylbenzene	0.00413	J	0.00180	0.00500	5	10/11/2018 17:57	WG1179679
sec-Butylbenzene	0.00781		0.00182	0.00500	5	10/11/2018 17:57	WG1179679
Carbon disulfide	0.00363	J	0.00138	0.00500	5	10/11/2018 17:57	WG1179679
Carbon tetrachloride	U		0.00190	0.00500	5	10/11/2018 17:57	WG1179679
Chlorobenzene	U		0.00174	0.00500	5	10/11/2018 17:57	WG1179679
Chlorodibromomethane	U		0.00164	0.00500	5	10/11/2018 17:57	WG1179679
Chloroethane	U		0.00226	0.0250	5	10/11/2018 17:57	WG1179679
Chloroform	U		0.00162	0.0250	5	10/11/2018 17:57	WG1179679
Chloromethane	U		0.00138	0.0125	5	10/11/2018 17:57	WG1179679
1,2-Dibromoethane	U		0.00190	0.00500	5	10/11/2018 17:57	WG1179679
1,1-Dichloroethane	U		0.00130	0.00500	5	10/11/2018 17:57	WG1179679
1,2-Dichloroethane	U		0.00180	0.00500	5	10/11/2018 17:57	WG1179679
1,1-Dichloroethene	U		0.00199	0.00500	5	10/11/2018 17:57	WG1179679
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/11/2018 17:57	WG1179679
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/11/2018 17:57	WG1179679

MW-108

Collected date/time: 10/03/18 09:10

SAMPLE RESULTS - 04

L1032119

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloropropane	U		0.00153	0.00500	5	10/11/2018 17:57	WG1179679
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/11/2018 17:57	WG1179679
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/11/2018 17:57	WG1179679
Ethylbenzene	0.00532		0.00192	0.00500	5	10/11/2018 17:57	WG1179679
Isopropylbenzene	0.0398		0.00163	0.00500	5	10/11/2018 17:57	WG1179679
p-Isopropyltoluene	0.00337	J	0.00175	0.00500	5	10/11/2018 17:57	WG1179679
2-Butanone (MEK)	U		0.0196	0.0500	5	10/11/2018 17:57	WG1179679
2-Hexanone	U		0.0191	0.0500	5	10/11/2018 17:57	WG1179679
Methylene Chloride	U		0.00500	0.0250	5	10/11/2018 17:57	WG1179679
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/11/2018 17:57	WG1179679
Methyl tert-butyl ether	U		0.00184	0.00500	5	10/11/2018 17:57	WG1179679
Naphthalene	U	J4	0.00500	0.0250	5	10/11/2018 17:57	WG1179679
n-Propylbenzene	0.0373		0.00174	0.00500	5	10/11/2018 17:57	WG1179679
Styrene	U		0.00154	0.00500	5	10/11/2018 17:57	WG1179679
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/11/2018 17:57	WG1179679
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/11/2018 17:57	WG1179679
Tetrachloroethene	U		0.00186	0.00500	5	10/11/2018 17:57	WG1179679
Toluene	0.00660		0.00206	0.00500	5	10/11/2018 17:57	WG1179679
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/11/2018 17:57	WG1179679
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/11/2018 17:57	WG1179679
Trichloroethene	U		0.00199	0.00500	5	10/11/2018 17:57	WG1179679
1,2,4-Trimethylbenzene	0.0637		0.00186	0.00500	5	10/11/2018 17:57	WG1179679
1,3,5-Trimethylbenzene	0.00773		0.00194	0.00500	5	10/11/2018 17:57	WG1179679
Vinyl chloride	U		0.00130	0.00500	5	10/11/2018 17:57	WG1179679
o-Xylene	0.00363	J	0.00170	0.00500	5	10/11/2018 17:57	WG1179679
m&p-Xylene	0.0852		0.00360	0.0100	5	10/11/2018 17:57	WG1179679
Xylenes, Total	0.0888		0.00530	0.0150	5	10/11/2018 17:57	WG1179679
(S) Toluene-d8	*104*			*80.0-120*		*10/11/2018 17:57*	WG1179679
(S) Dibromofluoromethane	*95.4*			*75.0-120*		*10/11/2018 17:57*	WG1179679
(S) 4-Bromofluorobenzene	*99.5*			*77.0-126*		*10/11/2018 17:57*	WG1179679

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.41		0.0247	0.100	1	10/10/2018 03:57	WG1177738
(S) o-Terphenyl	*79.5*			*31.0-160*		*10/10/2018 03:57*	WG1177738

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2860		14.1	50.0	1	10/10/2018 09:00	WG1178367

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 22:35	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	35.3		0.0519	1.00	1	10/11/2018 19:29	WG1176730
Fluoride	1.55		0.00990	0.100	1	10/11/2018 19:29	WG1176730
Sulfate	2100		3.87	250	50	10/11/2018 19:46	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0241		0.000250	0.00200	1	10/10/2018 17:18	WG1176860
Barium	0.0172	B	0.000360	0.00500	1	10/10/2018 17:18	WG1176860
Calcium	382		0.0460	1.00	1	10/10/2018 17:18	WG1176860
Chromium	U		0.000540	0.00200	1	10/10/2018 17:18	WG1176860
Iron	1.03		0.0150	0.100	1	10/10/2018 17:18	WG1176860
Lead	0.000447	B J	0.000240	0.00200	1	10/10/2018 17:18	WG1176860
Manganese	2.02		0.000250	0.00500	1	10/10/2018 17:18	WG1176860
Potassium	1.02		0.0370	1.00	1	10/10/2018 17:18	WG1176860
Selenium	U		0.000380	0.00200	1	10/10/2018 17:18	WG1176860
Sodium	110		0.110	1.00	1	10/10/2018 17:18	WG1176860

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/07/2018 07:07	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 07:07	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 07:07	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 07:07	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 07:07	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 07:07	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 07:07	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 07:07	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 07:07	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 07:07	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 07:07	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 07:07	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 07:07	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 07:07	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 07:07	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 07:07	WG1177169
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 07:07	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 07:07	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 07:07	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 07:07	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 07:07	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 07:07	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 07:07	WG1177169

NCL-31
Collected date/time: 10/03/18 09:55

SAMPLE RESULTS - 05

L1032119

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 07:07	WG1177169
Isopropylbenzene	0.000334	J	0.000326	0.00100	1	10/07/2018 07:07	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 07:07	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 07:07	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 07:07	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 07:07	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 07:07	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 07:07	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 07:07	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 07:07	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 07:07	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 07:07	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 07:07	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 07:07	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 07:07	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 07:07	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 07:07	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 07:07	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 07:07	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 07:07	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 07:07	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 07:07	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 07:07	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 07:07	WG1177169
(S) Toluene-d8	*112*			*80.0-120*		*10/07/2018 07:07*	WG1177169
(S) Dibromofluoromethane	*105*			*75.0-120*		*10/07/2018 07:07*	WG1177169
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/07/2018 07:07*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.45		0.0247	0.100	1	10/10/2018 04:15	WG1177738
(S) o-Terphenyl	*74.7*			*31.0-160*		*10/10/2018 04:15*	WG1177738

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3340		14.1	50.0	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	2.86		0.0197	0.100	1	10/10/2018 22:42	WG1178866

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/12/2018 17:43	WG1179442

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	412		2.60	50.0	50	10/11/2018 20:19	WG1176730
Fluoride	1.59		0.00990	0.100	1	10/11/2018 20:02	WG1176730
Sulfate	1810		3.87	250	50	10/11/2018 20:19	WG1176730

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/08/2018 13:20	WG1177216

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	1.45		0.0126	0.200	1	10/08/2018 11:10	WG1176838

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00584		0.000250	0.00200	1	10/10/2018 17:22	WG1176860
Barium	0.0109	B	0.000360	0.00500	1	10/10/2018 17:22	WG1176860
Cadmium	0.000388	B J	0.000160	0.00100	1	10/10/2018 17:22	WG1176860
Calcium	447		0.0460	1.00	1	10/10/2018 17:22	WG1176860
Chromium	0.000540	J	0.000540	0.00200	1	10/10/2018 17:22	WG1176860
Cobalt	U		0.000260	0.00200	1	10/10/2018 17:22	WG1176860
Iron	0.0292	J	0.0150	0.100	1	10/10/2018 17:22	WG1176860
Lead	0.000240	B J	0.000240	0.00200	1	10/10/2018 17:22	WG1176860
Manganese	0.114		0.000250	0.00500	1	10/10/2018 17:22	WG1176860
Nickel	0.00678		0.000350	0.00200	1	10/10/2018 17:22	WG1176860
Potassium	1.04		0.0370	1.00	1	10/10/2018 17:22	WG1176860
Selenium	0.00570		0.000380	0.00200	1	10/10/2018 17:22	WG1176860
Sodium	227		0.110	1.00	1	10/10/2018 17:22	WG1176860
Uranium	0.0504		0.000330	0.0100	1	10/10/2018 17:22	WG1176860
Vanadium	0.0186		0.000180	0.00500	1	10/10/2018 17:22	WG1176860

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.0888	J	0.0314	0.100	1	10/08/2018 19:53	WG1177450

MW-55

Collected date/time: 10/03/18 12:15

SAMPLE RESULTS - 06

L1032119

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*104*			*78.0-120*		*10/08/2018 19:53*	WG1177450

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/07/2018 07:27	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 07:27	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 07:27	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 07:27	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 07:27	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 07:27	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 07:27	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 07:27	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 07:27	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 07:27	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 07:27	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 07:27	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 07:27	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 07:27	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 07:27	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 07:27	WG1177169
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 07:27	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 07:27	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 07:27	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 07:27	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 07:27	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 07:27	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 07:27	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 07:27	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 07:27	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 07:27	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 07:27	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 07:27	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 07:27	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 07:27	WG1177169
Methyl tert-butyl ether	0.0604		0.000367	0.00100	1	10/07/2018 07:27	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 07:27	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 07:27	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 07:27	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 07:27	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 07:27	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 07:27	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 07:27	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 07:27	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 07:27	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 07:27	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 07:27	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 07:27	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 07:27	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 07:27	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 07:27	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 07:27	WG1177169
(S) Toluene-d8	*99.9*			*80.0-120*		*10/07/2018 07:27*	WG1177169
(S) Dibromofluoromethane	*106*			*75.0-120*		*10/07/2018 07:27*	WG1177169
(S) 4-Bromofluorobenzene	*95.6*			*77.0-126*		*10/07/2018 07:27*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.09		0.0247	0.100	1	10/10/2018 04:32	WG1177738
(S) o-Terphenyl	*82.6*			*31.0-160*		*10/10/2018 04:32*	WG1177738

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	64.0		2.82	10.0	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 22:44	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.231	B J	0.0519	1.00	1	10/11/2018 20:36	WG1176730
Fluoride	U		0.00990	0.100	1	10/11/2018 20:36	WG1176730
Sulfate	1.34	B J P1	0.0774	5.00	1	10/11/2018 20:36	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	10/10/2018 17:27	WG1176860
Barium	0.000396	B J	0.000360	0.00500	1	10/10/2018 17:27	WG1176860
Calcium	0.195	J	0.0460	1.00	1	10/10/2018 17:27	WG1176860
Chromium	U		0.000540	0.00200	1	10/10/2018 17:27	WG1176860
Iron	U		0.0150	0.100	1	10/10/2018 17:27	WG1176860
Lead	U		0.000240	0.00200	1	10/10/2018 17:27	WG1176860
Manganese	0.00108	J	0.000250	0.00500	1	10/10/2018 17:27	WG1176860
Potassium	0.380	J	0.0370	1.00	1	10/10/2018 17:27	WG1176860
Selenium	U		0.000380	0.00200	1	10/10/2018 17:27	WG1176860
Sodium	0.848	J	0.110	1.00	1	10/10/2018 17:27	WG1176860

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/07/2018 07:47	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 07:47	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 07:47	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 07:47	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 07:47	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 07:47	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 07:47	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 07:47	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 07:47	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 07:47	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 07:47	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 07:47	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 07:47	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 07:47	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 07:47	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 07:47	WG1177169
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 07:47	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 07:47	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 07:47	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 07:47	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 07:47	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 07:47	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 07:47	WG1177169

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 07:47	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 07:47	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 07:47	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 07:47	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 07:47	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 07:47	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 07:47	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 07:47	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 07:47	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 07:47	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 07:47	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 07:47	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 07:47	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 07:47	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 07:47	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 07:47	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 07:47	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 07:47	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 07:47	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 07:47	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 07:47	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 07:47	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 07:47	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 07:47	WG1177169
(S) Toluene-d8	*106*			*80.0-120*		*10/07/2018 07:47*	WG1177169
(S) Dibromofluoromethane	*108*			*75.0-120*		*10/07/2018 07:47*	WG1177169
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/07/2018 07:47*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0562	J	0.0247	0.100	1	10/10/2018 04:49	WG1177738
(S) o-Terphenyl	*75.8*			*31.0-160*		*10/10/2018 04:49*	WG1177738

WG1178367

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1032119-01,02,03,04,05

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349910-1 10/10/18 09:00

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1031789-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031789-01 10/10/18 09:00 • (DUP) R3349910-4 10/10/18 09:00

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	235	233	1	0.855		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349910-2 10/10/18 09:00 • (LCSD) R3349910-3 10/10/18 09:00

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8680	8650	98.6	98.3	85.0-115			0.346	5

Method Blank (MB)

(MB) R3350334-1 10/10/18 20:59

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	3.00	J	2.82	10.0

L1032143-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-06 10/10/18 20:59 • (DUP) R3350334-4 10/10/18 20:59

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	9420	9560	1	1.48		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350334-2 10/10/18 20:59 • (LCSD) R3350334-3 10/10/18 20:59

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8770	8840	99.7	100	85.0-115			0.795	5

Method Blank (MB)

(MB) R3349533-1 10/10/18 22:21

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1032119-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1032119-01 10/10/18 22:26 • (DUP) R3349533-4 10/10/18 22:27

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

L1032143-11 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-11 10/10/18 23:08 • (DUP) R3349533-6 10/10/18 23:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349533-2 10/10/18 22:23 • (LCSD) R3349533-3 10/10/18 22:24

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.73	3.73	93.3	93.3	90.0-110			0.0268	20

L1032119-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032119-02 10/10/18 22:29 • (MS) R3349533-5 10/10/18 22:30

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	0.0260	1.79	70.4	1	90.0-110	J6

L1032143-12 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032143-12 10/10/18 23:11 • (MS) R3349533-7 10/10/18 23:12 • (MSD) R3349533-8 10/10/18 23:14

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	U	2.36	2.63	94.4	105	1	90.0-110			10.7	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350247-1 10/12/18 16:59

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L1031192-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031192-02 10/12/18 17:04 • (DUP) R3350247-4 10/12/18 17:05

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Cyanide	ND	0.00356	1	0.000		20

L1032142-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1032142-05 10/12/18 17:45 • (DUP) R3350247-7 10/12/18 17:48

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350247-2 10/12/18 17:00 • (LCSD) R3350247-3 10/12/18 17:01

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0998	0.0967	99.8	96.7	85.0-115			3.16	20

L1031946-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031946-02 10/12/18 17:36 • (MS) R3350247-5 10/12/18 17:37 • (MSD) R3350247-6 10/12/18 17:38

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	ND	0.0732	0.0753	73.2	75.3	1	75.0-125	J6		2.83	20

L1032152-18 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032152-18 10/12/18 17:53 • (MS) R3350247-8 10/12/18 17:54 • (MSD) R3350247-9 10/12/18 17:55

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	U	0.0477	0.0798	47.7	79.8	1	75.0-125	J6	J3	50.4	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350028-1 10/11/18 14:58

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.245	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.283	J	0.0774	5.00

L1032119-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1032119-07 10/11/18 20:36 • (DUP) R3350028-4 10/11/18 20:53

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.231	0.223	1	3.88	J	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.34	0.715	1	61.2	J P1	15

L1032143-11 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-11 10/12/18 06:11 • (DUP) R3350028-7 10/12/18 06:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.501	0.407	1	20.7	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.03	0.452	1	78.0	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350028-2 10/11/18 15:15 • (LCSD) R3350028-3 10/11/18 15:32

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	38.7	38.7	96.7	96.7	80.0-120			0.0672	15
Fluoride	8.00	7.87	7.89	98.4	98.6	80.0-120			0.200	15
Sulfate	40.0	38.6	38.7	96.6	96.6	80.0-120			0.0926	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L1032143-11 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032143-11 10/12/18 06:11 • (MS) R3350028-9 10/12/18 08:18

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	0.501	50.1	99.3	1	80.0-120	
Fluoride	5.00	U	4.98	99.6	1	80.0-120	
Sulfate	50.0	1.03	50.0	97.9	1	80.0-120	

L1032119-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032119-07 10/11/18 20:36 • (MS) R3350028-5 10/11/18 21:10 • (MSD) R3350028-6 10/11/18 21:27

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	0.231	50.2	50.8	99.9	101	1	80.0-120			1.17	15
Fluoride	5.00	U	4.95	5.01	99.0	100	1	80.0-120			1.26	15
Sulfate	50.0	1.34	50.2	50.7	97.6	98.7	1	80.0-120			1.09	15

WG1177216

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L1032119-01,06

Method Blank (MB)

(MB) R3348582-1 10/08/18 12:56

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348582-2 10/08/18 12:58 • (LCSD) R3348582-3 10/08/18 13:01

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury	0.00300	0.00300	0.00284	100	94.7	80.0-120			5.60	20

L1032119-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032119-01 10/08/18 13:03 • (MS) R3348582-4 10/08/18 13:13 • (MSD) R3348582-5 10/08/18 13:16

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury	0.00300	U	0.00249	0.00240	83.0	80.1	1	75.0-125			3.54	20

WG1176838

Metals (ICP) by Method 6010B

QUALITY CONTROL SUMMARY

L1032119-01,06

Method Blank (MB)

(MB) R3348538-1 10/08/18 10:26

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348538-2 10/08/18 10:29 • (LCSD) R3348538-3 10/08/18 10:31

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron	1.00	0.967	0.969	96.7	96.9	80.0-120			0.135	20

L1032206-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032206-07 10/08/18 10:34 • (MS) R3348538-5 10/08/18 10:39 • (MSD) R3348538-6 10/08/18 10:42

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1.00	ND	1.10	1.11	101	102	1	75.0-125			0.585	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349479-1 10/10/18 15:02

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	0.00266	J	0.000360	0.00500
Cadmium	0.000426	J	0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	0.000860	J	0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349479-2 10/10/18 15:06 • (LCSD) R3349479-3 10/10/18 15:11

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0483	0.0477	96.5	95.3	80.0-120			1.26	20
Barium	0.0500	0.0458	0.0451	91.6	90.3	80.0-120			1.50	20
Cadmium	0.0500	0.0476	0.0482	95.2	96.5	80.0-120			1.36	20
Calcium	5.00	4.67	4.76	93.3	95.2	80.0-120			2.02	20
Chromium	0.0500	0.0495	0.0487	99.1	97.4	80.0-120			1.67	20
Cobalt	0.0500	0.0498	0.0493	99.7	98.7	80.0-120			1.01	20
Iron	5.00	4.97	4.97	99.5	99.4	80.0-120			0.0847	20
Lead	0.0500	0.0490	0.0492	98.0	98.3	80.0-120			0.304	20
Manganese	0.0500	0.0473	0.0468	94.5	93.6	80.0-120			0.922	20
Nickel	0.0500	0.0496	0.0493	99.1	98.6	80.0-120			0.541	20
Potassium	5.00	4.85	4.82	96.9	96.4	80.0-120			0.554	20
Selenium	0.0500	0.0490	0.0489	98.0	97.7	80.0-120			0.256	20
Sodium	5.00	5.20	5.22	104	104	80.0-120			0.257	20
Uranium	0.0500	0.0452	0.0456	90.3	91.2	80.0-120			0.970	20
Vanadium	0.0500	0.0480	0.0480	96.1	96.0	80.0-120			0.0753	20

WG1176860

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1032119-01,02,03,04,05,06,07

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L1032111-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032111-02 10/10/18 15:16 • (MS) R3349479-5 10/10/18 15:25 • (MSD) R3349479-6 10/10/18 15:29

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00184	0.0485	0.0492	93.3	94.7	1	75.0-125			1.48	20
Barium	0.0500	0.0757	0.123	0.122	95.0	93.4	1	75.0-125			0.654	20
Cadmium	0.0500	0.000439	0.0482	0.0483	95.5	95.8	1	75.0-125			0.258	20
Calcium	5.00	191	193	194	55.2	63.6	1	75.0-125	V	V	0.218	20
Chromium	0.0500	0.00987	0.0573	0.0572	94.9	94.7	1	75.0-125			0.175	20
Cobalt	0.0500	0.000303	0.0476	0.0488	94.7	96.9	1	75.0-125			2.35	20
Potassium	5.00	16.5	20.8	20.7	86.8	83.7	1	75.0-125			0.744	20
Iron	5.00	0.279	5.01	5.09	94.7	96.3	1	75.0-125			1.58	20
Lead	0.0500	0.00368	0.0520	0.0528	96.7	98.3	1	75.0-125			1.53	20
Manganese	0.0500	0.00406	0.0498	0.0490	91.5	89.9	1	75.0-125			1.66	20
Nickel	0.0500	0.0108	0.0572	0.0584	92.8	95.2	1	75.0-125			2.06	20
Selenium	0.0500	0.000850	0.0514	0.0496	101	97.6	1	75.0-125			3.43	20
Sodium	5.00	116	117	117	24.6	16.9	1	75.0-125	V	V	0.330	20
Uranium	0.0500	0.0507	0.0969	0.0980	92.5	94.7	1	75.0-125			1.13	20
Vanadium	0.0500	0.0131	0.0602	0.0606	94.4	95.1	1	75.0-125			0.634	20

Method Blank (MB)

(MB) R3349491-3 10/08/18 12:07

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349491-1 10/08/18 11:04 • (LCSD) R3349491-2 10/08/18 11:25

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.03	5.78	110	105	72.0-127			4.27	20
(S) a,a,a-Trifluorotoluene(FID)				*99.8*	*99.9*	*78.0-120*				

L1032119-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032119-06 10/08/18 19:53 • (MS) R3349491-4 10/08/18 20:13 • (MSD) R3349491-5 10/08/18 20:34

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	0.0888	5.66	5.43	101	97.2	1	10.0-160			4.07	22
(S) a,a,a-Trifluorotoluene(FID)					*94.8*	*95.2*		*78.0-120*				

Method Blank (MB)

(MB) R3349840-3 10/07/18 05:28

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349840-3 10/07/18 05:28

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*103*			*80.0-120*
(S) Dibromofluoromethane	*107*			*75.0-120*
(S) 4-Bromofluorobenzene	*99.9*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349840-1 10/07/18 04:29 • (LCSD) R3349840-2 10/07/18 04:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.138	0.142	110	114	19.0-160			3.03	27
Benzene	0.0250	0.0222	0.0220	88.8	88.0	70.0-123			0.861	20
Bromodichloromethane	0.0250	0.0220	0.0225	88.2	90.2	75.0-120			2.25	20
Bromoform	0.0250	0.0239	0.0239	95.5	95.4	68.0-132			0.0698	20
Bromomethane	0.0250	0.0200	0.0208	80.2	83.2	10.0-160			3.76	25
n-Butylbenzene	0.0250	0.0222	0.0216	88.7	86.3	73.0-125			2.74	20
sec-Butylbenzene	0.0250	0.0246	0.0246	98.5	98.3	75.0-125			0.162	20
Carbon disulfide	0.0250	0.0205	0.0203	82.2	81.3	61.0-128			1.12	20
Carbon tetrachloride	0.0250	0.0248	0.0246	99.2	98.5	68.0-126			0.702	20
Chlorobenzene	0.0250	0.0269	0.0275	108	110	80.0-121			2.30	20
Chlorodibromomethane	0.0250	0.0285	0.0279	114	111	77.0-125			2.20	20
Chloroethane	0.0250	0.0205	0.0214	82.1	85.8	47.0-150			4.42	20
Chloroform	0.0250	0.0234	0.0247	93.7	98.7	73.0-120			5.16	20
Chloromethane	0.0250	0.0226	0.0243	90.5	97.2	41.0-142			7.14	20
1,2-Dibromoethane	0.0250	0.0280	0.0267	112	107	80.0-122			4.65	20
1,1-Dichloroethane	0.0250	0.0233	0.0246	93.3	98.2	70.0-126			5.13	20
1,2-Dichloroethane	0.0250	0.0250	0.0254	99.8	102	70.0-128			1.91	20
1,1-Dichloroethene	0.0250	0.0249	0.0233	99.5	93.1	71.0-124			6.70	20
cis-1,2-Dichloroethene	0.0250	0.0235	0.0235	94.0	94.2	73.0-120			0.184	20
trans-1,2-Dichloroethene	0.0250	0.0227	0.0239	90.7	95.6	73.0-120			5.25	20
1,2-Dichloropropane	0.0250	0.0224	0.0246	89.7	98.5	77.0-125			9.33	20
cis-1,3-Dichloropropene	0.0250	0.0241	0.0238	96.3	95.3	80.0-123			1.06	20
trans-1,3-Dichloropropene	0.0250	0.0256	0.0249	102	99.7	78.0-124			2.59	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349840-1 10/07/18 04:29 • (LCSD) R3349840-2 10/07/18 04:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0271	0.0276	108	110	79.0-123			1.89	20
2-Hexanone	0.125	0.161	0.153	129	123	67.0-149			4.85	20
Isopropylbenzene	0.0250	0.0249	0.0251	99.7	100	76.0-127			0.764	20
p-Isopropyltoluene	0.0250	0.0230	0.0245	92.1	98.1	76.0-125			6.27	20
2-Butanone (MEK)	0.125	0.149	0.150	119	120	44.0-160			0.814	20
Methylene Chloride	0.0250	0.0217	0.0221	86.9	88.3	67.0-120			1.66	20
4-Methyl-2-pentanone (MIBK)	0.125	0.166	0.158	133	127	68.0-142			4.66	20
Methyl tert-butyl ether	0.0250	0.0206	0.0232	82.2	92.7	68.0-125			11.9	20
Naphthalene	0.0250	0.0241	0.0263	96.2	105	54.0-135			9.09	20
n-Propylbenzene	0.0250	0.0238	0.0252	95.1	101	77.0-124			5.88	20
Styrene	0.0250	0.0250	0.0241	99.9	96.4	73.0-130			3.56	20
1,1,1,2-Tetrachloroethane	0.0250	0.0282	0.0290	113	116	75.0-125			2.65	20
1,1,2,2-Tetrachloroethane	0.0250	0.0239	0.0243	95.6	97.3	65.0-130			1.80	20
Tetrachloroethene	0.0250	0.0269	0.0255	107	102	72.0-132			5.15	20
Toluene	0.0250	0.0266	0.0254	106	101	79.0-120			4.78	20
1,1,1-Trichloroethane	0.0250	0.0260	0.0260	104	104	73.0-124			0.0360	20
1,1,2-Trichloroethane	0.0250	0.0272	0.0267	109	107	80.0-120			2.08	20
Trichloroethene	0.0250	0.0242	0.0244	96.7	97.5	78.0-124			0.777	20
1,2,4-Trimethylbenzene	0.0250	0.0258	0.0247	103	99.0	76.0-121			3.99	20
1,3,5-Trimethylbenzene	0.0250	0.0252	0.0244	101	97.4	76.0-122			3.49	20
Vinyl chloride	0.0250	0.0223	0.0222	89.1	88.7	67.0-131			0.451	20
Xylenes, Total	0.0750	0.0820	0.0802	109	107	79.0-123			2.22	20
o-Xylene	0.0250	0.0272	0.0266	109	106	80.0-122			2.27	20
m&p-Xylenes	0.0500	0.0548	0.0536	110	107	80.0-122			2.08	20
(S) Toluene-d8				*106*	*114*	*80.0-120*				
(S) Dibromofluoromethane				*107*	*109*	*75.0-120*				
(S) 4-Bromofluorobenzene				*105*	*102*	*77.0-126*				

Method Blank (MB)

(MB) R3350078-3 10/11/18 16:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350078-3 10/11/18 16:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*105*			*80.0-120*
(S) Dibromofluoromethane	*95.7*			*75.0-120*
(S) 4-Bromofluorobenzene	*102*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350078-1 10/11/18 15:42 • (LCSD) R3350078-2 10/11/18 16:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.146	0.144	117	115	19.0-160			1.53	27
Benzene	0.0250	0.0245	0.0250	98.1	100	70.0-123			2.08	20
Bromodichloromethane	0.0250	0.0231	0.0240	92.3	96.0	75.0-120			3.90	20
Bromoform	0.0250	0.0240	0.0244	95.8	97.6	68.0-132			1.87	20
Bromomethane	0.0250	0.0170	0.0191	67.9	76.5	10.0-160			11.9	25
n-Butylbenzene	0.0250	0.0255	0.0262	102	105	73.0-125			2.57	20
sec-Butylbenzene	0.0250	0.0261	0.0268	105	107	75.0-125			2.62	20
Carbon disulfide	0.0250	0.0233	0.0234	93.1	93.6	61.0-128			0.512	20
Carbon tetrachloride	0.0250	0.0225	0.0224	89.9	89.7	68.0-126			0.168	20
Chlorobenzene	0.0250	0.0255	0.0256	102	102	80.0-121			0.546	20
Chlorodibromomethane	0.0250	0.0234	0.0239	93.5	95.7	77.0-125			2.38	20
Chloroethane	0.0250	0.0278	0.0281	111	112	47.0-150			1.08	20
Chloroform	0.0250	0.0220	0.0225	88.0	90.2	73.0-120			2.45	20
Chloromethane	0.0250	0.0291	0.0297	116	119	41.0-142			2.17	20
1,2-Dibromoethane	0.0250	0.0246	0.0246	98.4	98.5	80.0-122			0.155	20
1,1-Dichloroethane	0.0250	0.0275	0.0272	110	109	70.0-126			1.11	20
1,2-Dichloroethane	0.0250	0.0253	0.0251	101	101	70.0-128			0.621	20
1,1-Dichloroethene	0.0250	0.0240	0.0247	95.9	98.8	71.0-124			2.98	20
cis-1,2-Dichloroethene	0.0250	0.0219	0.0222	87.5	88.8	73.0-120			1.46	20
trans-1,2-Dichloroethene	0.0250	0.0229	0.0235	91.6	94.0	73.0-120			2.64	20
1,2-Dichloropropane	0.0250	0.0296	0.0302	118	121	77.0-125			2.05	20
cis-1,3-Dichloropropene	0.0250	0.0264	0.0263	106	105	80.0-123			0.376	20
trans-1,3-Dichloropropene	0.0250	0.0261	0.0268	104	107	78.0-124			2.63	20

WG1179679

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1032119-04

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350078-1 10/11/18 15:42 • (LCSD) R3350078-2 10/11/18 16:01

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Ethylbenzene	0.0250	0.0250	0.0253	99.9	101	79.0-123			1.08	20
2-Hexanone	0.125	0.169	0.167	135	134	67.0-149			1.08	20
Isopropylbenzene	0.0250	0.0266	0.0273	106	109	76.0-127			2.53	20
p-Isopropyltoluene	0.0250	0.0251	0.0258	100	103	76.0-125			2.76	20
2-Butanone (MEK)	0.125	0.163	0.153	130	122	44.0-160			6.23	20
Methylene Chloride	0.0250	0.0219	0.0223	87.6	89.2	67.0-120			1.87	20
4-Methyl-2-pentanone (MIBK)	0.125	0.159	0.156	128	125	68.0-142			1.98	20
Methyl tert-butyl ether	0.0250	0.0232	0.0237	92.8	94.9	68.0-125			2.31	20
Naphthalene	0.0250	0.0121	0.0119	48.2	47.6	54.0-135	J4	J4	1.36	20
n-Propylbenzene	0.0250	0.0249	0.0257	99.6	103	77.0-124			3.30	20
Styrene	0.0250	0.0261	0.0278	104	111	73.0-130			6.41	20
1,1,1,2-Tetrachloroethane	0.0250	0.0239	0.0245	95.6	98.2	75.0-125			2.64	20
1,1,2,2-Tetrachloroethane	0.0250	0.0226	0.0234	90.3	93.8	65.0-130			3.75	20
Tetrachloroethene	0.0250	0.0258	0.0256	103	102	72.0-132			0.838	20
Toluene	0.0250	0.0248	0.0253	99.0	101	79.0-120			2.06	20
1,1,1-Trichloroethane	0.0250	0.0233	0.0237	93.2	94.9	73.0-124			1.77	20
1,1,2-Trichloroethane	0.0250	0.0240	0.0245	95.9	97.8	80.0-120			2.00	20
Trichloroethene	0.0250	0.0269	0.0274	108	109	78.0-124			1.69	20
1,2,4-Trimethylbenzene	0.0250	0.0248	0.0254	99.2	102	76.0-121			2.56	20
1,3,5-Trimethylbenzene	0.0250	0.0253	0.0260	101	104	76.0-122			2.94	20
Vinyl chloride	0.0250	0.0294	0.0298	118	119	67.0-131			1.37	20
Xylenes, Total	0.0750	0.0759	0.0756	101	101	79.0-123			0.396	20
o-Xylene	0.0250	0.0250	0.0252	100	101	80.0-122			0.696	20
m&p-Xylenes	0.0500	0.0509	0.0504	102	101	80.0-122			1.05	20
(S) Toluene-d8				*104*	*103*	*80.0-120*				
(S) Dibromofluoromethane				*92.9*	*93.9*	*75.0-120*				
(S) 4-Bromofluorobenzene				*100*	*100*	*77.0-126*				

WG1177738

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L1032119-01,02,03,04,05,06,07

Method Blank (MB)

(MB) R3349250-1 10/09/18 16:04

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*66.0*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349250-2 10/09/18 16:22 • (LCSD) R3349250-3 10/09/18 16:39

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.30	1.30	86.7	86.7	50.0-150			0.000	20
(S) o-Terphenyl				*94.5*	*94.5*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1,6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1,4]	2006
Louisiana [1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

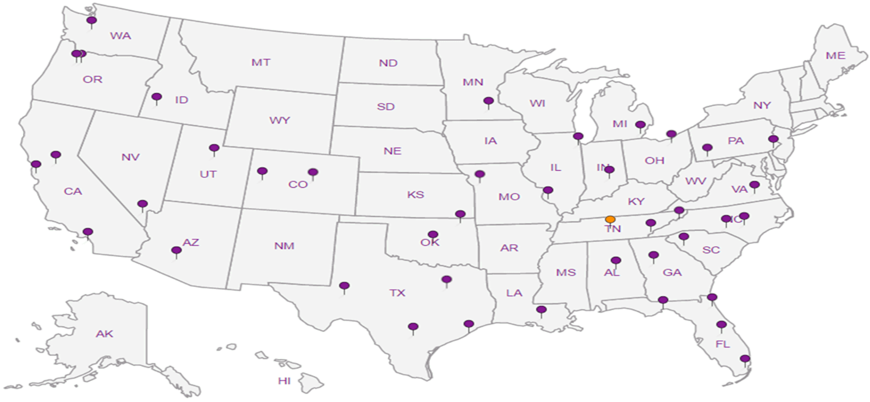
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Chain of Custody Page 1 of 2

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **NCL Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-NCL**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **NCL (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

L# 1032119
G010

Acctnum: **TRCATX**
Template: **T140423**
Prelogin: **P671813**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
Pres Chk										√ √			N √	N √	N Λ			
MW-45	Grab	GW		10-3-18	1425	8	X	X			X	X	X	X	X			01
~~NCL-34A~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
~~NCL-33~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
NCL-44	Grab	GW		10-3-18	1130	7	X	X		X	X	X	X					
NCL-32	Grab	GW		↓	1045	7	X	X		X	X	X	X					02
MW-108	Grab	GW			910	7	X	X		X	X	X	X					03
NCL-31	Grab	GW			955	7	X	X		X	X	X	X					04
MW-55	Grab	GW			1215	10	X	X	X		X	X	X	X	X			05
~~MW-54A~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					06
~~NCL-49~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					

RP

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ___

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ___ Temp ___
Flow ___ Other ___

Samples returned via:
__ UPS ✓ FedEx __ Courier ___

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP __ Y __ N
COC Signed/Accurate: ✓ Y __ N
Bottles arrive intact: ✓ Y __ N
Correct bottles used: ✓ Y __ N
Sufficient volume sent: ✓ Y __ N
If Applicable
VOA Zero Headspace: ✓ Y __ N
Preservation Correct/Checked: ✓ Y __ N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8 .5-.1 .1 1.7 °C Bottles Received: 54	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) Keegan Alu	Date: 10/5/18 Time: 8:45	Hold:

7

ok
MS

TRC Solutions - Austin, TX **505 E. Huntland Dr, Ste 250** **Austin, TX 78752**	Billing Information: **Accounts Payable** **21 Griffin Road North** **Windsor, CT 06095** **apinvoiceapproval@trcsolutions.com**	Pres Chk	Chain of Custody Page 2 of 2 Pace Analytical® National Center for Testing & Innovation 12065 Lebanon Rd Mount Juliet, TN 37122 Phone: 615-758-5858 Phone: 800-767-5859 Fax: 615-758-5859
Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**		L # 1032119
Project Description: **NCL Fall 2018**	City/State Collected: **Artesia, NM**		Table #
Phone: **512-684-3170** Fax:	Client Project # **294318.0000.0000.**	Lab Project # **TRCATX-NCL**	Acctnum: **TRCATX**
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **NCL (Navajo - Artesia)**	P.O. # **119503**	Template: **T140423** Prelogin: **P671813**
Collected by (signature): Immediately Packed on Ice N ___ Y ✓	***Rush?*** (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day	Quote # Date Results Needed	TSR: **526** PB: Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~DUP-NCL-01~~	~~Grab~~	~~GW~~				~~7~~	X	X		X	X	X	X					
EB-NCL-01	Grab	GW		10-3-18	1055	7	X	X		X	X	X	X					05
~~TRIP-BLANK-NCL-01~~	~~Grab~~	~~GW~~				~~1~~										X		

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ___ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP ___ Y ___ N
COC Signed/Accurate: ✓ Y ___ N
Bottles arrive intact: ✓ Y ___ N
Correct bottles used: ✓ Y ___ N
Sufficient volume sent: ✓ Y ___ N
If Applicable
VOA Zero Headspace: ✓ Y ___ N
Preservation Correct/Checked: ✓ Y ___ N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8 IRC -.1 1.7 °C Bottles Received: 54	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 8:45	Hold:

ok
MS

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 16, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L1032127
Samples Received:	10/05/2018
Project Number:	294318.0000.0000.
Description:	TMD Fall 2018
Site:	TMD - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

12065 Lebanon Rd   Mount Juliet, TN 37122   615-758-5858   800-767-5859   www.pacenational.com

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MW-46R L1032127-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 14:15	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178878	1	10/11/18 14:28	10/11/18 14:28	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 21:44	10/11/18 21:44	ELN
Wet Chemistry by Method 9056A	WG1176730	50	10/11/18 22:35	10/11/18 22:35	ELN
Metals (ICPMS) by Method 6020	WG1176856	1	10/06/18 13:03	10/06/18 16:21	WBD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 08:07	10/07/18 08:07	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 03:44	SHG

CASE NARRATIVE

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Project Manager

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3650		14.1	50.0	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0670	J	0.0197	0.100	1	10/11/2018 14:28	WG1178878

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	207		2.60	50.0	50	10/11/2018 22:35	WG1176730
Fluoride	1.42		0.00990	0.100	1	10/11/2018 21:44	WG1176730
Sulfate	2330		3.87	250	50	10/11/2018 22:35	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00264		0.000250	0.00200	1	10/06/2018 16:21	WG1176856
Barium	0.0119		0.000360	0.00500	1	10/06/2018 16:21	WG1176856
Calcium	582	V	0.0460	1.00	1	10/06/2018 16:21	WG1176856
Chromium	0.000793	J	0.000540	0.00200	1	10/06/2018 16:21	WG1176856
Iron	0.0221	J	0.0150	0.100	1	10/06/2018 16:21	WG1176856
Lead	U		0.000240	0.00200	1	10/06/2018 16:21	WG1176856
Manganese	0.107		0.000250	0.00500	1	10/06/2018 16:21	WG1176856
Potassium	1.22		0.0370	1.00	1	10/06/2018 16:21	WG1176856
Selenium	0.00132	J	0.000380	0.00200	1	10/06/2018 16:21	WG1176856
Sodium	174	V	0.110	1.00	1	10/06/2018 16:21	WG1176856

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/07/2018 08:07	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 08:07	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 08:07	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 08:07	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 08:07	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 08:07	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 08:07	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 08:07	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 08:07	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 08:07	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 08:07	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 08:07	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 08:07	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 08:07	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 08:07	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 08:07	WG1177169
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 08:07	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 08:07	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 08:07	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 08:07	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 08:07	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 08:07	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 08:07	WG1177169

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 08:07	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 08:07	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 08:07	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 08:07	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 08:07	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 08:07	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 08:07	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 08:07	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 08:07	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 08:07	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 08:07	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 08:07	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 08:07	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 08:07	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 08:07	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 08:07	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 08:07	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 08:07	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 08:07	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 08:07	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 08:07	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 08:07	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 08:07	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 08:07	WG1177169
(S) Toluene-d8	*115*			*80.0-120*		*10/07/2018 08:07*	WG1177169
(S) Dibromofluoromethane	*112*			*75.0-120*		*10/07/2018 08:07*	WG1177169
(S) 4-Bromofluorobenzene	*110*			*77.0-126*		*10/07/2018 08:07*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	10/12/2018 03:44	WG1178287
(S) o-Terphenyl	*81.6*			*31.0-160*		*10/12/2018 03:44*	WG1178287

WG1178368

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1032127-01

Method Blank (MB)

(MB) R3350334-1 10/10/18 20:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Dissolved Solids	3.00	J	2.82	10.0

L1032143-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-06 10/10/18 20:59 • (DUP) R3350334-4 10/10/18 20:59

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	9420	9560	1	1.48		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350334-2 10/10/18 20:59 • (LCSD) R3350334-3 10/10/18 20:59

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Dissolved Solids	8800	8770	8840	99.7	100	85.0-115			0.795	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

QUALITY CONTROL SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349914-1 10/11/18 14:16

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1032036-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1032036-01 10/11/18 14:22 • (DUP) R3349914-4 10/11/18 14:23

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.285	0.287	1	0.699		20

L1032464-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1032464-01 10/11/18 16:18 • (DUP) R3349914-9 10/11/18 16:20

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	9.18	9.22	5	0.446		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349914-2 10/11/18 14:17 • (LCSD) R3349914-3 10/11/18 14:19

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.67	3.65	91.8	91.3	90.0-110			0.601	20

L1032036-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032036-02 10/11/18 14:25 • (MS) R3349914-5 10/11/18 14:26

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	2.11	4.12	80.2	1	90.0-110	J6

L1033357-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1033357-02 10/11/18 15:05 • (MS) R3349914-6 10/11/18 15:07 • (MSD) R3349914-7 10/11/18 15:08

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	0.634	2.74	2.71	84.3	82.8	1	90.0-110	J6	J6	1.32	20

Method Blank (MB)

(MB) R3350028-1 10/11/18 14:58

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.245	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.283	J	0.0774	5.00

L1032119-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1032119-07 10/11/18 20:36 • (DUP) R3350028-4 10/11/18 20:53

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.231	0.223	1	3.88	J	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.34	0.715	1	61.2	J P1	15

L1032143-11 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-11 10/12/18 06:11 • (DUP) R3350028-7 10/12/18 06:28

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.501	0.407	1	20.7	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.03	0.452	1	78.0	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350028-2 10/11/18 15:15 • (LCSD) R3350028-3 10/11/18 15:32

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	38.7	38.7	96.7	96.7	80.0-120			0.0672	15
Fluoride	8.00	7.87	7.89	98.4	98.6	80.0-120			0.200	15
Sulfate	40.0	38.6	38.7	96.6	96.6	80.0-120			0.0926	15

L1032143-11 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032143-11 10/12/18 06:11 • (MS) R3350028-9 10/12/18 08:18

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	0.501	50.1	99.3	1	80.0-120	
Fluoride	5.00	U	4.98	99.6	1	80.0-120	
Sulfate	50.0	1.03	50.0	97.9	1	80.0-120	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348306-1 10/06/18 16:07

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	0.0572	J	0.0460	1.00
Chromium	U		0.000540	0.00200
Iron	U		0.0150	0.100
Lead	0.000799	J	0.000240	0.00200
Manganese	U		0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348306-2 10/06/18 16:12 • (LCSD) R3348306-3 10/06/18 16:17

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0463	0.0463	92.6	92.5	80.0-120			0.0711	20
Barium	0.0500	0.0459	0.0483	91.7	96.6	80.0-120			5.15	20
Calcium	5.00	4.65	4.68	93.0	93.7	80.0-120			0.694	20
Chromium	0.0500	0.0477	0.0485	95.3	97.0	80.0-120			1.72	20
Iron	5.00	4.71	4.73	94.2	94.6	80.0-120			0.476	20
Lead	0.0500	0.0460	0.0459	92.1	91.8	80.0-120			0.266	20
Manganese	0.0500	0.0449	0.0462	89.8	92.4	80.0-120			2.82	20
Potassium	5.00	4.50	4.56	90.1	91.2	80.0-120			1.24	20
Selenium	0.0500	0.0511	0.0490	102	98.0	80.0-120			4.22	20
Sodium	5.00	4.78	4.80	95.6	96.0	80.0-120			0.472	20

L1032127-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032127-01 10/06/18 16:21 • (MS) R3348306-5 10/06/18 16:30 • (MSD) R3348306-6 10/06/18 16:35

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00264	0.0488	0.0483	92.4	91.2	1	75.0-125			1.21	20
Barium	0.0500	0.0119	0.0598	0.0595	95.7	95.1	1	75.0-125			0.523	20
Calcium	5.00	582	587	567	92.9	0.000	1	75.0-125		V	3.51	20
Chromium	0.0500	0.000793	0.0474	0.0458	93.2	89.9	1	75.0-125			3.51	20
Potassium	5.00	1.22	6.13	5.59	98.3	87.5	1	75.0-125			9.23	20
Iron	5.00	0.0221	4.62	4.48	91.9	89.2	1	75.0-125			2.91	20
Lead	0.0500	U	0.0466	0.0453	93.2	90.7	1	75.0-125			2.72	20

L1032127-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032127-01 10/06/18 16:21 • (MS) R3348306-5 10/06/18 16:30 • (MSD) R3348306-6 10/06/18 16:35

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Manganese	0.0500	0.107	0.152	0.149	90.2	85.2	1	75.0-125			1.65	20
Selenium	0.0500	0.00132	0.0561	0.0518	109	101	1	75.0-125			7.95	20
Sodium	5.00	174	177	172	57.8	0.000	1	75.0-125	V	V	2.94	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1177169

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1032127-01

Method Blank (MB)

(MB) R3349840-3 10/07/18 05:28

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1177169

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1032127-01

Method Blank (MB)

(MB) R3349840-3 10/07/18 05:28

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*103*			*80.0-120*
(S) Dibromofluoromethane	*107*			*75.0-120*
(S) 4-Bromofluorobenzene	*99.9*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349840-1 10/07/18 04:29 • (LCSD) R3349840-2 10/07/18 04:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.138	0.142	110	114	19.0-160			3.03	27
Benzene	0.0250	0.0222	0.0220	88.8	88.0	70.0-123			0.861	20
Bromodichloromethane	0.0250	0.0220	0.0225	88.2	90.2	75.0-120			2.25	20
Bromoform	0.0250	0.0239	0.0239	95.5	95.4	68.0-132			0.0698	20
Bromomethane	0.0250	0.0200	0.0208	80.2	83.2	10.0-160			3.76	25
n-Butylbenzene	0.0250	0.0222	0.0216	88.7	86.3	73.0-125			2.74	20
sec-Butylbenzene	0.0250	0.0246	0.0246	98.5	98.3	75.0-125			0.162	20
Carbon disulfide	0.0250	0.0205	0.0203	82.2	81.3	61.0-128			1.12	20
Carbon tetrachloride	0.0250	0.0248	0.0246	99.2	98.5	68.0-126			0.702	20
Chlorobenzene	0.0250	0.0269	0.0275	108	110	80.0-121			2.30	20
Chlorodibromomethane	0.0250	0.0285	0.0279	114	111	77.0-125			2.20	20
Chloroethane	0.0250	0.0205	0.0214	82.1	85.8	47.0-150			4.42	20
Chloroform	0.0250	0.0234	0.0247	93.7	98.7	73.0-120			5.16	20
Chloromethane	0.0250	0.0226	0.0243	90.5	97.2	41.0-142			7.14	20
1,2-Dibromoethane	0.0250	0.0280	0.0267	112	107	80.0-122			4.65	20
1,1-Dichloroethane	0.0250	0.0233	0.0246	93.3	98.2	70.0-126			5.13	20
1,2-Dichloroethane	0.0250	0.0250	0.0254	99.8	102	70.0-128			1.91	20
1,1-Dichloroethene	0.0250	0.0249	0.0233	99.5	93.1	71.0-124			6.70	20
cis-1,2-Dichloroethene	0.0250	0.0235	0.0235	94.0	94.2	73.0-120			0.184	20
trans-1,2-Dichloroethene	0.0250	0.0227	0.0239	90.7	95.6	73.0-120			5.25	20
1,2-Dichloropropane	0.0250	0.0224	0.0246	89.7	98.5	77.0-125			9.33	20
cis-1,3-Dichloropropene	0.0250	0.0241	0.0238	96.3	95.3	80.0-123			1.06	20
trans-1,3-Dichloropropene	0.0250	0.0256	0.0249	102	99.7	78.0-124			2.59	20

WG1177169

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1032127-01

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349840-1 10/07/18 04:29 • (LCSD) R3349840-2 10/07/18 04:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0271	0.0276	108	110	79.0-123			1.89	20
2-Hexanone	0.125	0.161	0.153	129	123	67.0-149			4.85	20
Isopropylbenzene	0.0250	0.0249	0.0251	99.7	100	76.0-127			0.764	20
p-Isopropyltoluene	0.0250	0.0230	0.0245	92.1	98.1	76.0-125			6.27	20
2-Butanone (MEK)	0.125	0.149	0.150	119	120	44.0-160			0.814	20
Methylene Chloride	0.0250	0.0217	0.0221	86.9	88.3	67.0-120			1.66	20
4-Methyl-2-pentanone (MIBK)	0.125	0.166	0.158	133	127	68.0-142			4.66	20
Methyl tert-butyl ether	0.0250	0.0206	0.0232	82.2	92.7	68.0-125			11.9	20
Naphthalene	0.0250	0.0241	0.0263	96.2	105	54.0-135			9.09	20
n-Propylbenzene	0.0250	0.0238	0.0252	95.1	101	77.0-124			5.88	20
Styrene	0.0250	0.0250	0.0241	99.9	96.4	73.0-130			3.56	20
1,1,1,2-Tetrachloroethane	0.0250	0.0282	0.0290	113	116	75.0-125			2.65	20
1,1,2,2-Tetrachloroethane	0.0250	0.0239	0.0243	95.6	97.3	65.0-130			1.80	20
Tetrachloroethene	0.0250	0.0269	0.0255	107	102	72.0-132			5.15	20
Toluene	0.0250	0.0266	0.0254	106	101	79.0-120			4.78	20
1,1,1-Trichloroethane	0.0250	0.0260	0.0260	104	104	73.0-124			0.0360	20
1,1,2-Trichloroethane	0.0250	0.0272	0.0267	109	107	80.0-120			2.08	20
Trichloroethene	0.0250	0.0242	0.0244	96.7	97.5	78.0-124			0.777	20
1,2,4-Trimethylbenzene	0.0250	0.0258	0.0247	103	99.0	76.0-121			3.99	20
1,3,5-Trimethylbenzene	0.0250	0.0252	0.0244	101	97.4	76.0-122			3.49	20
Vinyl chloride	0.0250	0.0223	0.0222	89.1	88.7	67.0-131			0.451	20
Xylenes, Total	0.0750	0.0820	0.0802	109	107	79.0-123			2.22	20
o-Xylene	0.0250	0.0272	0.0266	109	106	80.0-122			2.27	20
m&p-Xylenes	0.0500	0.0548	0.0536	110	107	80.0-122			2.08	20
(S) Toluene-d8				*106*	*114*	*80.0-120*				
(S) Dibromofluoromethane				*107*	*109*	*75.0-120*				
(S) 4-Bromofluorobenzene				*105*	*102*	*77.0-126*				

WG1178287

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L1032127-01

Method Blank (MB)

(MB) R3350066-1 10/12/18 01:08

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*82.0*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350066-2 10/12/18 01:25 • (LCSD) R3350066-3 10/12/18 01:43

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.47	1.53	98.0	102	50.0-150			4.00	20
(S) o-Terphenyl				*80.0*	*84.0*	*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
J	The identification of the analyte is acceptable; the reported value is an estimate.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1 6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana [1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

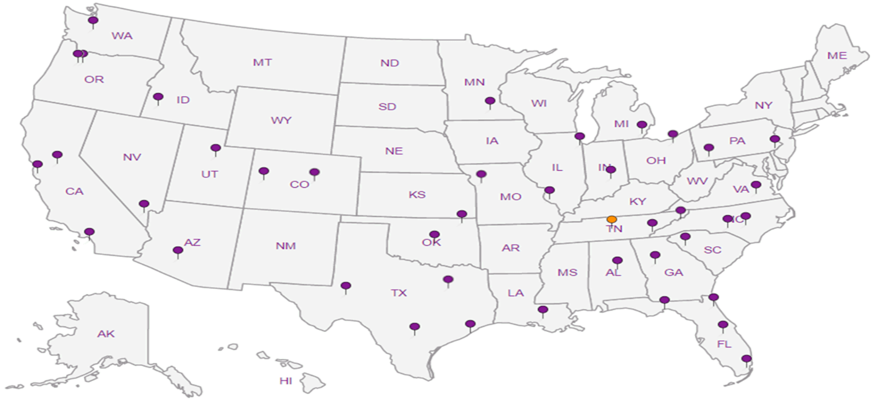
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

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Chain of Custody Page 1 of 1

Pace Analytical®
National Center for Testing & Innovation

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Mount Juliet, TN 37122
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Fax: 615-758-5859

L# 1032427

G011

Acctnum: **TRCATX**
Template: **T115542**
Prelogin: **P671990**
TSR: **526**
PB:
Shipped Via:

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **TMD Fall 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-TMD**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **TMD (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Quote #
Immediately Packed on Ice N ___ [✓ Y]

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
Pres Chk										N ✓			N ✓	N ✓				
~~NP-1~~	~~Grab~~	~~GW~~				2	X											
~~MW-21~~	~~Grab~~	~~GW~~				9	X	X	X	X	X	X	X					
MW-46R	Grab	GW		10-3-18	1415	7	X	X		X	X	X	X					
~~TRIP BLANK-TMD-01~~	~~Grab~~	~~GW~~				1										X		01

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS [✓ FedEx] __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] __ Y __ N
COC Signed/Accurate: [✓ Y] __ N
Bottles arrive intact: [✓ Y] __ N
Correct bottles used: [✓ Y] __ N
Sufficient volume sent: [✓ Y] __ N
If Applicable
VOA Zero Headspace: [✓ Y] __ N
Preservation Correct/Checked: [✓ Y] __ N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8 15-.1 1.7 °C Bottles Received: 7
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 9:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 16, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L1032139
Samples Received:	10/05/2018
Project Number:	294318.0000.0000.
Description:	TEL Fall 2018
Site:	TEL - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

12065 Lebanon Rd Mount Juliet, TN 37122 615-758-5858 800-767-5859 www.pacenational.com

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	Collected by	Collected date/time	Received date/time
MW-49 L1032139-01 GW	Scott Ude	10/03/18 09:45	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178866	50	10/10/18 22:45	10/10/18 22:45	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	100	10/11/18 15:31	10/12/18 17:44	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 22:52	10/11/18 22:52	ELN
Wet Chemistry by Method 9056A	WG1176730	20	10/11/18 23:09	10/11/18 23:09	ELN
Mercury by Method 7470A	WG1177216	1	10/08/18 05:26	10/08/18 13:30	ABL
Metals (ICP) by Method 6010B	WG1176838	1	10/06/18 13:02	10/08/18 11:22	CCE
Metals (ICPMS) by Method 6020	WG1177056	1	10/07/18 18:48	10/08/18 01:02	LD
Metals (ICPMS) by Method 6020	WG1177056	1	10/07/18 18:48	10/08/18 11:17	LAT
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1178631	1	10/10/18 22:02	10/10/18 22:02	ACG
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179679	5	10/11/18 18:17	10/11/18 18:17	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 04:02	SHG

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Project Manager

Sample Handling and Receiving

2-Chloroethyl vinyl ether degrades under acidic conditions. Associated results were determined from the analysis of an acid-preserved sample.

Lab Sample ID	Project Sample ID	Method
L1032139-01	MW-49	8260B

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2150		14.1	50.0	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.985	5.00	50	10/10/2018 22:45	WG1178866

Sample Narrative:

L1032139-01 WG1178866: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.180	0.500	100	10/12/2018 17:44	WG1179442

Sample Narrative:

L1032139-01 WG1179442: matrix interference: high sulfide content

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	355		1.04	20.0	20	10/11/2018 23:09	WG1176730
Fluoride	1.29		0.00990	0.100	1	10/11/2018 22:52	WG1176730
Sulfate	520		1.55	100	20	10/11/2018 23:09	WG1176730

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	10/08/2018 13:30	WG1177216

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.693		0.0126	0.200	1	10/08/2018 11:22	WG1176838

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00517		0.000250	0.00200	1	10/08/2018 01:02	WG1177056
Barium	0.0506		0.000360	0.00500	1	10/08/2018 01:02	WG1177056
Cadmium	U		0.000160	0.00100	1	10/08/2018 01:02	WG1177056
Calcium	209		0.0460	1.00	1	10/08/2018 01:02	WG1177056
Chromium	U		0.000540	0.00200	1	10/08/2018 01:02	WG1177056
Cobalt	U		0.000260	0.00200	1	10/08/2018 01:02	WG1177056
Iron	0.0585	J	0.0150	0.100	1	10/08/2018 01:02	WG1177056
Lead	0.000826	J	0.000240	0.00200	1	10/08/2018 01:02	WG1177056
Manganese	0.211		0.000250	0.00500	1	10/08/2018 01:02	WG1177056
Nickel	0.00660		0.000350	0.00200	1	10/08/2018 11:17	WG1177056
Potassium	2.58		0.0370	1.00	1	10/08/2018 01:02	WG1177056
Selenium	0.000519	J	0.000380	0.00200	1	10/08/2018 01:02	WG1177056
Sodium	335		0.110	1.00	1	10/08/2018 11:17	WG1177056
Uranium	U		0.000330	0.0100	1	10/08/2018 01:02	WG1177056
Vanadium	0.000439	J	0.000180	0.00500	1	10/08/2018 01:02	WG1177056

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	2.99		0.0314	0.100	1	10/10/2018 22:02	WG1178631
(S) a,a,a-Trifluorotoluene(FID)	*97.7*			*78.0-120*		*10/10/2018 22:02*	WG1178631

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0500	0.250	5	10/11/2018 18:17	WG1179679
Benzene	0.451		0.00166	0.00500	5	10/11/2018 18:17	WG1179679
Bromodichloromethane	U		0.00190	0.00500	5	10/11/2018 18:17	WG1179679
Bromoform	U		0.00234	0.00500	5	10/11/2018 18:17	WG1179679
Bromomethane	U		0.00433	0.0250	5	10/11/2018 18:17	WG1179679
n-Butylbenzene	0.00396	J	0.00180	0.00500	5	10/11/2018 18:17	WG1179679
sec-Butylbenzene	0.00700		0.00182	0.00500	5	10/11/2018 18:17	WG1179679
Carbon disulfide	0.00567		0.00138	0.00500	5	10/11/2018 18:17	WG1179679
Carbon tetrachloride	U		0.00190	0.00500	5	10/11/2018 18:17	WG1179679
Chlorobenzene	U		0.00174	0.00500	5	10/11/2018 18:17	WG1179679
Chlorodibromomethane	U		0.00164	0.00500	5	10/11/2018 18:17	WG1179679
Chloroethane	U		0.00226	0.0250	5	10/11/2018 18:17	WG1179679
Chloroform	U		0.00162	0.0250	5	10/11/2018 18:17	WG1179679
Chloromethane	U		0.00138	0.0125	5	10/11/2018 18:17	WG1179679
1,2-Dibromoethane	U		0.00190	0.00500	5	10/11/2018 18:17	WG1179679
1,1-Dichloroethane	U		0.00130	0.00500	5	10/11/2018 18:17	WG1179679
1,2-Dichloroethane	U		0.00180	0.00500	5	10/11/2018 18:17	WG1179679
1,1-Dichloroethene	U		0.00199	0.00500	5	10/11/2018 18:17	WG1179679
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/11/2018 18:17	WG1179679
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/11/2018 18:17	WG1179679
1,2-Dichloropropane	U		0.00153	0.00500	5	10/11/2018 18:17	WG1179679
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/11/2018 18:17	WG1179679
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/11/2018 18:17	WG1179679
Ethylbenzene	0.0143		0.00192	0.00500	5	10/11/2018 18:17	WG1179679
Isopropylbenzene	0.0436		0.00163	0.00500	5	10/11/2018 18:17	WG1179679
p-Isopropyltoluene	0.00239	J	0.00175	0.00500	5	10/11/2018 18:17	WG1179679
2-Butanone (MEK)	U		0.0196	0.0500	5	10/11/2018 18:17	WG1179679
2-Hexanone	U		0.0191	0.0500	5	10/11/2018 18:17	WG1179679
Methylene Chloride	U		0.00500	0.0250	5	10/11/2018 18:17	WG1179679
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/11/2018 18:17	WG1179679
Methyl tert-butyl ether	0.124		0.00184	0.00500	5	10/11/2018 18:17	WG1179679
Naphthalene	0.00585	J J4	0.00500	0.0250	5	10/11/2018 18:17	WG1179679
n-Propylbenzene	0.0426		0.00174	0.00500	5	10/11/2018 18:17	WG1179679
Styrene	U		0.00154	0.00500	5	10/11/2018 18:17	WG1179679
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/11/2018 18:17	WG1179679
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/11/2018 18:17	WG1179679
Tetrachloroethene	U		0.00186	0.00500	5	10/11/2018 18:17	WG1179679
Toluene	0.00918		0.00206	0.00500	5	10/11/2018 18:17	WG1179679
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/11/2018 18:17	WG1179679
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/11/2018 18:17	WG1179679
Trichloroethene	U		0.00199	0.00500	5	10/11/2018 18:17	WG1179679
1,2,4-Trimethylbenzene	0.0921		0.00186	0.00500	5	10/11/2018 18:17	WG1179679
1,3,5-Trimethylbenzene	0.0159		0.00194	0.00500	5	10/11/2018 18:17	WG1179679
Vinyl chloride	U		0.00130	0.00500	5	10/11/2018 18:17	WG1179679
o-Xylene	0.00182	J	0.00170	0.00500	5	10/11/2018 18:17	WG1179679
m&p-Xylene	0.130		0.00360	0.0100	5	10/11/2018 18:17	WG1179679
Xylenes, Total	0.132		0.00530	0.0150	5	10/11/2018 18:17	WG1179679
(S) Toluene-d8	*102*			*80.0-120*		*10/11/2018 18:17*	WG1179679
(S) Dibromofluoromethane	*93.1*			*75.0-120*		*10/11/2018 18:17*	WG1179679

MW-49
Collected date/time: 10/03/18 09:45

SAMPLE RESULTS - 01

L1032139

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/11/2018 18:17*	WG1179679

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	4.24		0.0247	0.100	1	10/12/2018 04:02	WG1178287
(S) o-Terphenyl	*77.9*			*31.0-160*		*10/12/2018 04:02*	WG1178287

WG1178368

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1032139-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350334-1 10/10/18 20:59

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	3.00	J	2.82	10.0

L1032143-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-06 10/10/18 20:59 • (DUP) R3350334-4 10/10/18 20:59

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	9420	9560	1	1.48		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350334-2 10/10/18 20:59 • (LCSD) R3350334-3 10/10/18 20:59

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8770	8840	99.7	100	85.0-115			0.795	5

WG1178866

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L1032139-01

Method Blank (MB)

(MB) R3349533-1 10/10/18 22:21

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1032119-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1032119-01 10/10/18 22:26 • (DUP) R3349533-4 10/10/18 22:27

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Nitrate-Nitrite	U	0.000	1	0.000		20

L1032143-11 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-11 10/10/18 23:08 • (DUP) R3349533-6 10/10/18 23:09

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349533-2 10/10/18 22:23 • (LCSD) R3349533-3 10/10/18 22:24

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	4.00	3.73	3.73	93.3	93.3	90.0-110			0.0268	20

L1032119-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032119-02 10/10/18 22:29 • (MS) R3349533-5 10/10/18 22:30

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Nitrate-Nitrite	2.50	0.0260	1.79	70.4	1	90.0-110	J6

L1032143-12 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032143-12 10/10/18 23:11 • (MS) R3349533-7 10/10/18 23:12 • (MSD) R3349533-8 10/10/18 23:14

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Nitrate-Nitrite	2.50	U	2.36	2.63	94.4	105	1	90.0-110			10.7	20

WG1179442

Wet Chemistry by Method 4500CN E-2011

QUALITY CONTROL SUMMARY

L1032139-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350247-1 10/12/18 16:59

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L1031192-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031192-02 10/12/18 17:04 • (DUP) R3350247-4 10/12/18 17:05

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.00356	1	0.000		20

L1032142-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1032142-05 10/12/18 17:45 • (DUP) R3350247-7 10/12/18 17:48

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350247-2 10/12/18 17:00 • (LCSD) R3350247-3 10/12/18 17:01

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0998	0.0967	99.8	96.7	85.0-115			3.16	20

L1031946-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031946-02 10/12/18 17:36 • (MS) R3350247-5 10/12/18 17:37 • (MSD) R3350247-6 10/12/18 17:38

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	ND	0.0732	0.0753	73.2	75.3	1	75.0-125	J6		2.83	20

L1032152-18 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032152-18 10/12/18 17:53 • (MS) R3350247-8 10/12/18 17:54 • (MSD) R3350247-9 10/12/18 17:55

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	U	0.0477	0.0798	47.7	79.8	1	75.0-125	J6	J3	50.4	20

Method Blank (MB)

(MB) R3350028-1 10/11/18 14:58

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Chloride	0.245	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.283	J	0.0774	5.00

L1032119-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1032119-07 10/11/18 20:36 • (DUP) R3350028-4 10/11/18 20:53

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Chloride	0.231	0.223	1	3.88	J	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.34	0.715	1	61.2	J P1	15

L1032143-11 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-11 10/12/18 06:11 • (DUP) R3350028-7 10/12/18 06:28

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Chloride	0.501	0.407	1	20.7	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.03	0.452	1	78.0	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350028-2 10/11/18 15:15 • (LCSD) R3350028-3 10/11/18 15:32

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	38.7	38.7	96.7	96.7	80.0-120			0.0672	15
Fluoride	8.00	7.87	7.89	98.4	98.6	80.0-120			0.200	15
Sulfate	40.0	38.6	38.7	96.6	96.6	80.0-120			0.0926	15

L1032143-11 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032143-11 10/12/18 06:11 • (MS) R3350028-9 10/12/18 08:18

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	0.501	50.1	99.3	1	80.0-120	
Fluoride	5.00	U	4.98	99.6	1	80.0-120	
Sulfate	50.0	1.03	50.0	97.9	1	80.0-120	

L1032119-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032119-07 10/11/18 20:36 • (MS) R3350028-5 10/11/18 21:10 • (MSD) R3350028-6 10/11/18 21:27

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	0.231	50.2	50.8	99.9	101	1	80.0-120			1.17	15
Fluoride	5.00	U	4.95	5.01	99.0	100	1	80.0-120			1.26	15
Sulfate	50.0	1.34	50.2	50.7	97.6	98.7	1	80.0-120			1.09	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1177216

Mercury by Method 7470A

QUALITY CONTROL SUMMARY

L1032139-01

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348582-1 10/08/18 12:56

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348582-2 10/08/18 12:58 • (LCSD) R3348582-3 10/08/18 13:01

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury	0.00300	0.00300	0.00284	100	94.7	80.0-120			5.60	20

L1032119-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032119-01 10/08/18 13:03 • (MS) R3348582-4 10/08/18 13:13 • (MSD) R3348582-5 10/08/18 13:16

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury	0.00300	U	0.00249	0.00240	83.0	80.1	1	75.0-125			3.54	20

Method Blank (MB)

(MB) R3348538-1 10/08/18 10:26

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348538-2 10/08/18 10:29 • (LCSD) R3348538-3 10/08/18 10:31

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron	1.00	0.967	0.969	96.7	96.9	80.0-120			0.135	20

L1032206-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032206-07 10/08/18 10:34 • (MS) R3348538-5 10/08/18 10:39 • (MSD) R3348538-6 10/08/18 10:42

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1.00	ND	1.10	1.11	101	102	1	75.0-125			0.585	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1177056

Metals (ICPMS) by Method 6020

Method Blank (MB)

(MB) R3348422-1 10/07/18 21:58

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Method Blank (MB)

(MB) R3348499-1 10/08/18 09:52

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Sodium	U		0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348422-2 10/07/18 22:03 • (LCSD) R3348422-3 10/07/18 22:07

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0488	0.0490	97.5	98.0	80.0-120			0.532	20
Barium	0.0500	0.0476	0.0465	95.3	92.9	80.0-120			2.50	20
Cadmium	0.0500	0.0505	0.0516	101	103	80.0-120			2.21	20
Calcium	5.00	4.90	4.87	98.0	97.4	80.0-120			0.697	20
Chromium	0.0500	0.0507	0.0504	101	101	80.0-120			0.582	20
Cobalt	0.0500	0.0538	0.0532	108	106	80.0-120			1.20	20
Iron	5.00	5.22	5.19	104	104	80.0-120			0.681	20
Lead	0.0500	0.0488	0.0483	97.6	96.6	80.0-120			0.933	20
Manganese	0.0500	0.0486	0.0485	97.1	97.1	80.0-120			0.0872	20
Nickel	0.0500	0.0530	0.0529	106	106	80.0-120			0.309	20
Potassium	5.00	4.68	4.65	93.7	93.0	80.0-120			0.740	20
Selenium	0.0500	0.0498	0.0516	99.6	103	80.0-120			3.60	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348422-2 10/07/18 22:03 • (LCSD) R3348422-3 10/07/18 22:07

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Uranium	0.0500	0.0474	0.0479	94.8	95.7	80.0-120			0.938	20
Vanadium	0.0500	0.0490	0.0488	98.0	97.5	80.0-120			0.512	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348499-2 10/08/18 09:57 • (LCSD) R3348499-3 10/08/18 10:01

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sodium	5.00	4.93	5.00	98.5	100	80.0-120			1.43	20

L1030072-14 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1030072-14 10/07/18 22:12 • (MS) R3348422-5 10/07/18 22:21 • (MSD) R3348422-6 10/07/18 22:25

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.00617	0.0539	0.0547	95.5	97.0	1	75.0-125			1.36	20
Barium	0.0500	0.0136	0.0599	0.0583	92.5	89.4	1	75.0-125			2.68	20
Cadmium	0.0500	ND	0.0500	0.0516	99.9	103	1	75.0-125			3.18	20
Calcium	5.00	27.1	32.0	31.5	99.6	89.7	1	75.0-125			1.56	20
Chromium	0.0500	0.0119	0.0606	0.0609	97.4	98.0	1	75.0-125			0.520	20
Cobalt	0.0500	ND	0.0537	0.0540	104	105	1	75.0-125			0.554	20
Potassium	5.00	3.41	7.99	8.05	91.8	92.9	1	75.0-125			0.709	20
Iron	5.00	0.357	5.43	5.36	101	100	1	75.0-125			1.24	20
Lead	0.0500	ND	0.0485	0.0486	96.9	97.3	1	75.0-125			0.384	20
Manganese	0.0500	0.0244	0.0707	0.0715	92.5	94.2	1	75.0-125			1.21	20
Nickel	0.0500	0.00215	0.0539	0.0539	104	104	1	75.0-125			0.00137	20
Selenium	0.0500	ND	0.0499	0.0508	97.4	99.0	1	75.0-125			1.62	20
Uranium	0.0500	ND	0.0472	0.0479	94.3	95.7	1	75.0-125			1.47	20
Vanadium	0.0500	0.00924	0.0567	0.0582	94.9	97.9	1	75.0-125			2.68	20

L1030072-14 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1030072-14 10/08/18 10:06 • (MS) R3348499-5 10/08/18 10:15 • (MSD) R3348499-6 10/08/18 10:19

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sodium	5.00	21.7	26.2	26.6	89.9	97.2	1	75.0-125			1.39	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349619-3 10/10/18 19:58

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	0.0821	J	0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*99.3*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349619-2 10/10/18 18:39 • (LCSD) R3349619-1 10/10/18 17:36

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.19	5.82	113	106	72.0-127			6.14	20
(S) a,a,a-Trifluorotoluene(FID)				*106*	*105*	*78.0-120*				

Method Blank (MB)

(MB) R3350078-3 10/11/18 16:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1179679

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1032139-01

Method Blank (MB)

(MB) R3350078-3 10/11/18 16:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*105*			*80.0-120*
(S) Dibromofluoromethane	*95.7*			*75.0-120*
(S) 4-Bromofluorobenzene	*102*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350078-1 10/11/18 15:42 • (LCSD) R3350078-2 10/11/18 16:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.146	0.144	117	115	19.0-160			1.53	27
Benzene	0.0250	0.0245	0.0250	98.1	100	70.0-123			2.08	20
Bromodichloromethane	0.0250	0.0231	0.0240	92.3	96.0	75.0-120			3.90	20
Bromoform	0.0250	0.0240	0.0244	95.8	97.6	68.0-132			1.87	20
Bromomethane	0.0250	0.0170	0.0191	67.9	76.5	10.0-160			11.9	25
n-Butylbenzene	0.0250	0.0255	0.0262	102	105	73.0-125			2.57	20
sec-Butylbenzene	0.0250	0.0261	0.0268	105	107	75.0-125			2.62	20
Carbon disulfide	0.0250	0.0233	0.0234	93.1	93.6	61.0-128			0.512	20
Carbon tetrachloride	0.0250	0.0225	0.0224	89.9	89.7	68.0-126			0.168	20
Chlorobenzene	0.0250	0.0255	0.0256	102	102	80.0-121			0.546	20
Chlorodibromomethane	0.0250	0.0234	0.0239	93.5	95.7	77.0-125			2.38	20
Chloroethane	0.0250	0.0278	0.0281	111	112	47.0-150			1.08	20
Chloroform	0.0250	0.0220	0.0225	88.0	90.2	73.0-120			2.45	20
Chloromethane	0.0250	0.0291	0.0297	116	119	41.0-142			2.17	20
1,2-Dibromoethane	0.0250	0.0246	0.0246	98.4	98.5	80.0-122			0.155	20
1,1-Dichloroethane	0.0250	0.0275	0.0272	110	109	70.0-126			1.11	20
1,2-Dichloroethane	0.0250	0.0253	0.0251	101	101	70.0-128			0.621	20
1,1-Dichloroethene	0.0250	0.0240	0.0247	95.9	98.8	71.0-124			2.98	20
cis-1,2-Dichloroethene	0.0250	0.0219	0.0222	87.5	88.8	73.0-120			1.46	20
trans-1,2-Dichloroethene	0.0250	0.0229	0.0235	91.6	94.0	73.0-120			2.64	20
1,2-Dichloropropane	0.0250	0.0296	0.0302	118	121	77.0-125			2.05	20
cis-1,3-Dichloropropene	0.0250	0.0264	0.0263	106	105	80.0-123			0.376	20
trans-1,3-Dichloropropene	0.0250	0.0261	0.0268	104	107	78.0-124			2.63	20

WG1179679

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1032139-01

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350078-1 10/11/18 15:42 • (LCSD) R3350078-2 10/11/18 16:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0250	0.0253	99.9	101	79.0-123			1.08	20
2-Hexanone	0.125	0.169	0.167	135	134	67.0-149			1.08	20
Isopropylbenzene	0.0250	0.0266	0.0273	106	109	76.0-127			2.53	20
p-Isopropyltoluene	0.0250	0.0251	0.0258	100	103	76.0-125			2.76	20
2-Butanone (MEK)	0.125	0.163	0.153	130	122	44.0-160			6.23	20
Methylene Chloride	0.0250	0.0219	0.0223	87.6	89.2	67.0-120			1.87	20
4-Methyl-2-pentanone (MIBK)	0.125	0.159	0.156	128	125	68.0-142			1.98	20
Methyl tert-butyl ether	0.0250	0.0232	0.0237	92.8	94.9	68.0-125			2.31	20
Naphthalene	0.0250	0.0121	0.0119	48.2	47.6	54.0-135	J4	J4	1.36	20
n-Propylbenzene	0.0250	0.0249	0.0257	99.6	103	77.0-124			3.30	20
Styrene	0.0250	0.0261	0.0278	104	111	73.0-130			6.41	20
1,1,1,2-Tetrachloroethane	0.0250	0.0239	0.0245	95.6	98.2	75.0-125			2.64	20
1,1,2,2-Tetrachloroethane	0.0250	0.0226	0.0234	90.3	93.8	65.0-130			3.75	20
Tetrachloroethene	0.0250	0.0258	0.0256	103	102	72.0-132			0.838	20
Toluene	0.0250	0.0248	0.0253	99.0	101	79.0-120			2.06	20
1,1,1-Trichloroethane	0.0250	0.0233	0.0237	93.2	94.9	73.0-124			1.77	20
1,1,2-Trichloroethane	0.0250	0.0240	0.0245	95.9	97.8	80.0-120			2.00	20
Trichloroethene	0.0250	0.0269	0.0274	108	109	78.0-124			1.69	20
1,2,4-Trimethylbenzene	0.0250	0.0248	0.0254	99.2	102	76.0-121			2.56	20
1,3,5-Trimethylbenzene	0.0250	0.0253	0.0260	101	104	76.0-122			2.94	20
Vinyl chloride	0.0250	0.0294	0.0298	118	119	67.0-131			1.37	20
Xylenes, Total	0.0750	0.0759	0.0756	101	101	79.0-123			0.396	20
o-Xylene	0.0250	0.0250	0.0252	100	101	80.0-122			0.696	20
m&p-Xylenes	0.0500	0.0509	0.0504	102	101	80.0-122			1.05	20
(S) Toluene-d8				*104*	*103*	*80.0-120*				
(S) Dibromofluoromethane				*92.9*	*93.9*	*75.0-120*				
(S) 4-Bromofluorobenzene				*100*	*100*	*77.0-126*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350066-1 10/12/18 01:08

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*82.0*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350066-2 10/12/18 01:25 • (LCSD) R3350066-3 10/12/18 01:43

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) High Fraction	1.50	1.47	1.53	98.0	102	50.0-150			4.00	20
(S) o-Terphenyl				*80.0*	*84.0*	*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.

ACCREDITATIONS & LOCATIONS

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1,6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1,4]	2006
Louisiana [1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

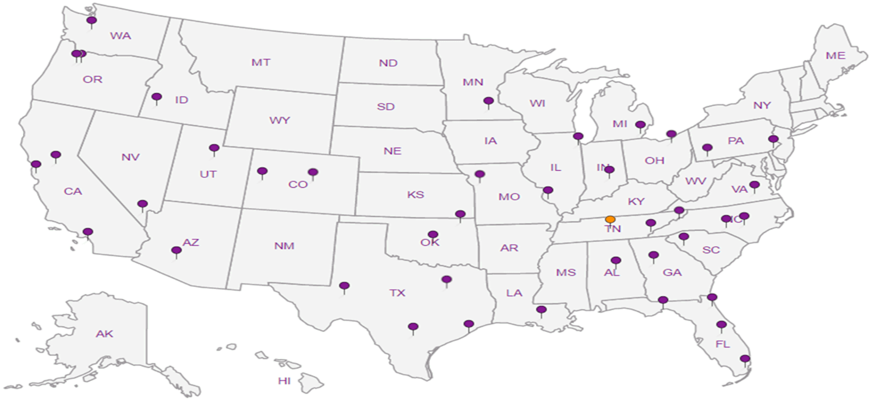
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



Chain of Custody Page 1 of 1

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Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**	
Project Description: **TEL Fall 2018**		City/State Collected: **Artesia, NM**
Phone: **512-684-3170** Fax:	Client Project # **294318.0000.0000.**	Lab Project # **TRCATX-TEL**
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **TEL (Navajo - Artesia)**	P.O. # **119503**
Collected by (signature):	*Rush?* (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day	Quote # Date Results Needed
Immediately Packed on Ice N ___ Y ✓		

L # 1032175
C205
Tab

Acctnum: **TRCATX**
Template: **T115528**
Prelogin: **P671987**
TSR: **526**
PB:
Shipped Via:

Pres Chk

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions, TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~TEL-4~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~TEL-3~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~TEL-2~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~TEL-1~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
MW-49	Grab	GW		10-3-18	945	10	X	X	X		X	X	X	X	X			01
~~DUP-TEL-01~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~EB-TEL-01~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~Trip Blank-TEL-01~~	~~Grab~~	~~GW~~				~~1~~										~~X~~		

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] __Y __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: [✓ Y] __N
Preservation Correct/Checked: [✓ Y] __N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: Yes / [✓ No] HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.5-.1 1.8 [illegible] 1.7 °C Bottles Received: 10
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

Pace Analytical®
National Center for Testing & Innovation

ANALYTICAL REPORT

October 18, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L1032143
Samples Received:	10/05/2018
Project Number:	294318.0000.0000.
Description:	EP Fall 2018
Site:	EP NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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1 Cp
2 Tc
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5 Sr
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7 Gl
8 Al
9 Sc

SAMPLE SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-120 L1032143-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:47	10/10/18 22:47	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 23:25	10/11/18 23:25	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/11/18 23:42	10/11/18 23:42	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 00:28	JDG
Metals (ICPMS) by Method 6020	WG1176866	5	10/09/18 14:49	10/11/18 02:47	JDG
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 16:28	10/08/18 16:28	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 09:46	10/07/18 09:46	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 04:19	SHG

MW-121 L1032143-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:55	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:48	10/10/18 22:48	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/11/18 23:59	10/11/18 23:59	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/12/18 00:16	10/12/18 00:16	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 00:46	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 16:51	10/08/18 16:51	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 10:06	10/07/18 10:06	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 04:36	SHG

MW-84 L1032143-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:50	10/10/18 22:50	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/12/18 00:33	10/12/18 00:33	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/12/18 00:50	10/12/18 00:50	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 00:50	LD
Metals (ICPMS) by Method 6020	WG1176866	5	10/09/18 14:49	10/11/18 02:51	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 17:14	10/08/18 17:14	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 10:26	10/07/18 10:26	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	10	10/09/18 23:52	10/12/18 08:57	SHG

MW-122 L1032143-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 10:40	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:51	10/10/18 22:51	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/12/18 01:07	10/12/18 01:07	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/12/18 01:58	10/12/18 01:58	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 00:54	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 17:37	10/08/18 17:37	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 10:46	10/07/18 10:46	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 04:54	SHG

MW-79 L1032143-05 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:50	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:53	10/10/18 22:53	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/12/18 02:15	10/12/18 02:15	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/12/18 02:31	10/12/18 02:31	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 01:26	LD
Metals (ICPMS) by Method 6020	WG1176866	5	10/09/18 14:49	10/11/18 02:56	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 17:59	10/08/18 17:59	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 11:05	10/07/18 11:05	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 05:11	SHG

MW-74 L1032143-06 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:55	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178368	1	10/10/18 20:30	10/10/18 20:59	JER
Wet Chemistry by Method 353.2	WG1178866	50	10/10/18 22:54	10/10/18 22:54	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/12/18 02:48	10/12/18 02:48	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/12/18 03:05	10/12/18 03:05	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 01:30	LD
Metals (ICPMS) by Method 6020	WG1176866	5	10/09/18 14:49	10/11/18 03:00	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 18:22	10/08/18 18:22	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 11:25	10/07/18 11:25	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	10	10/09/18 23:52	10/12/18 09:15	SHG

MW-2A L1032143-07 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 11:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178370	1	10/10/18 19:46	10/10/18 20:18	MCG
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 22:56	10/10/18 22:56	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/12/18 03:22	10/12/18 03:22	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/12/18 03:39	10/12/18 03:39	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 01:35	LD
Metals (ICPMS) by Method 6020	WG1176866	5	10/09/18 14:49	10/11/18 03:04	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 18:45	10/08/18 18:45	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 11:45	10/07/18 11:45	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 05:28	SHG

OCD-6 L1032143-08 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178370	1	10/10/18 19:46	10/10/18 20:18	MCG
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 23:03	10/10/18 23:03	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/12/18 03:56	10/12/18 03:56	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/12/18 04:13	10/12/18 04:13	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 01:39	LD
Metals (ICPMS) by Method 6020	WG1176866	5	10/09/18 14:49	10/11/18 03:27	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 19:08	10/08/18 19:08	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177169	1	10/07/18 12:05	10/07/18 12:05	DWR
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 05:46	SHG

OCD-7AR L1032143-09 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 11:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178370	1	10/10/18 19:46	10/10/18 20:18	MCG
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 23:05	10/10/18 23:05	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/12/18 04:30	10/12/18 04:30	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/12/18 05:21	10/12/18 05:21	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 01:43	LD
Metals (ICPMS) by Method 6020	WG1176866	5	10/09/18 14:49	10/11/18 03:31	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 19:31	10/08/18 19:31	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177440	1	10/08/18 05:12	10/08/18 05:12	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 06:03	SHG

MW-75 L1032143-10 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 08:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178370	1	10/10/18 19:46	10/10/18 20:18	MCG
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 23:06	10/10/18 23:06	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/12/18 05:38	10/12/18 05:38	ELN
Wet Chemistry by Method 9056A	WG1176730	100	10/12/18 05:54	10/12/18 05:54	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 01:48	LD
Metals (ICPMS) by Method 6020	WG1176866	5	10/09/18 14:49	10/11/18 03:36	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 19:54	10/08/18 19:54	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177440	1	10/08/18 05:33	10/08/18 05:33	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	2	10/09/18 23:52	10/12/18 08:40	SHG

EB-EP-01 L1032143-11 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178370	1	10/10/18 19:46	10/10/18 20:18	MCG
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 23:08	10/10/18 23:08	JER
Wet Chemistry by Method 9056A	WG1176730	1	10/12/18 06:11	10/12/18 06:11	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 01:52	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 20:17	10/08/18 20:17	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177440	1	10/08/18 05:54	10/08/18 05:54	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 06:20	SHG

EB-EP-04 L1032143-12 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 14:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178370	1	10/10/18 19:46	10/10/18 20:18	MCG
Wet Chemistry by Method 353.2	WG1178866	1	10/10/18 23:11	10/10/18 23:11	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 00:08	10/10/18 00:08	ELN
Metals (ICPMS) by Method 6020	WG1176866	1	10/09/18 14:49	10/11/18 01:56	LD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 20:40	10/08/18 20:40	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177440	1	10/08/18 06:15	10/08/18 06:15	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 06:38	SHG

TRIP BLANK-EP-01 L1032143-13 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 00:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177440	1	10/08/18 01:40	10/08/18 01:40	JCP

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Project Manager

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5380		28.2	100	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.168		0.0197	0.100	1	10/10/2018 22:47	WG1178866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1670		5.19	100	100	10/11/2018 23:42	WG1176730
Fluoride	3.66		0.00990	0.100	1	10/11/2018 23:25	WG1176730
Sulfate	3320		7.74	500	100	10/11/2018 23:42	WG1176730

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0118		0.000250	0.00200	1	10/11/2018 00:28	WG1176866
Barium	0.0126		0.000360	0.00500	1	10/11/2018 00:28	WG1176866
Calcium	583	O1 V	0.0460	1.00	1	10/11/2018 00:28	WG1176866
Chromium	U		0.000540	0.00200	1	10/11/2018 00:28	WG1176866
Iron	4.55	O1	0.0150	0.100	1	10/11/2018 00:28	WG1176866
Lead	0.000327	J	0.000240	0.00200	1	10/11/2018 00:28	WG1176866
Manganese	1.35	O1 V	0.000250	0.00500	1	10/11/2018 00:28	WG1176866
Potassium	2.60		0.0370	1.00	1	10/11/2018 00:28	WG1176866
Selenium	U		0.000380	0.00200	1	10/11/2018 00:28	WG1176866
Sodium	1320		0.550	5.00	5	10/11/2018 02:47	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.133		0.0314	0.100	1	10/08/2018 16:28	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*99.3*			*78.0-120*		*10/08/2018 16:28*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/07/2018 09:46	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 09:46	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 09:46	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 09:46	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 09:46	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 09:46	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 09:46	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 09:46	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 09:46	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 09:46	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 09:46	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 09:46	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 09:46	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 09:46	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 09:46	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 09:46	WG1177169

MW-120

Collected date/time: 10/03/18 09:10

SAMPLE RESULTS - 01

L1032143

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 09:46	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 09:46	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 09:46	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 09:46	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 09:46	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 09:46	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 09:46	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 09:46	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 09:46	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 09:46	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 09:46	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 09:46	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 09:46	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 09:46	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 09:46	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 09:46	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 09:46	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 09:46	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 09:46	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 09:46	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 09:46	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 09:46	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 09:46	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 09:46	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 09:46	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 09:46	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 09:46	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 09:46	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 09:46	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 09:46	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 09:46	WG1177169
(S) Toluene-d8	*106*			*80.0-120*		*10/07/2018 09:46*	WG1177169
(S) Dibromofluoromethane	*112*			*75.0-120*		*10/07/2018 09:46*	WG1177169
(S) 4-Bromofluorobenzene	*98.3*			*77.0-126*		*10/07/2018 09:46*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.664		0.0247	0.100	1	10/12/2018 04:19	WG1178287
(S) o-Terphenyl	*86.3*			*31.0-160*		*10/12/2018 04:19*	WG1178287

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5800		28.2	100	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	1.06		0.0197	0.100	1	10/10/2018 22:48	WG1178866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	833		5.19	100	100	10/12/2018 00:16	WG1176730
Fluoride	5.05		0.00990	0.100	1	10/11/2018 23:59	WG1176730
Sulfate	2820		7.74	500	100	10/12/2018 00:16	WG1176730

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0350		0.000250	0.00200	1	10/11/2018 00:46	WG1176866
Barium	0.0123		0.000360	0.00500	1	10/11/2018 00:46	WG1176866
Calcium	579		0.0460	1.00	1	10/11/2018 00:46	WG1176866
Chromium	U		0.000540	0.00200	1	10/11/2018 00:46	WG1176866
Iron	0.118		0.0150	0.100	1	10/11/2018 00:46	WG1176866
Lead	0.000425	J	0.000240	0.00200	1	10/11/2018 00:46	WG1176866
Manganese	2.03		0.000250	0.00500	1	10/11/2018 00:46	WG1176866
Potassium	3.25		0.0370	1.00	1	10/11/2018 00:46	WG1176866
Selenium	0.00619		0.000380	0.00200	1	10/11/2018 00:46	WG1176866
Sodium	716		0.110	1.00	1	10/11/2018 00:46	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 16:51	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 16:51*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/07/2018 10:06	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 10:06	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 10:06	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 10:06	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 10:06	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 10:06	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 10:06	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 10:06	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 10:06	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 10:06	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 10:06	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 10:06	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 10:06	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 10:06	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 10:06	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 10:06	WG1177169

MW-121

Collected date/time: 10/03/18 09:55

SAMPLE RESULTS - 02

L1032143

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 10:06	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 10:06	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 10:06	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 10:06	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 10:06	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 10:06	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 10:06	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 10:06	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 10:06	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 10:06	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 10:06	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 10:06	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 10:06	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 10:06	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 10:06	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 10:06	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 10:06	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 10:06	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 10:06	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 10:06	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 10:06	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 10:06	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 10:06	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 10:06	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 10:06	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 10:06	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 10:06	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 10:06	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 10:06	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 10:06	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 10:06	WG1177169
(S) Toluene-d8	*113*			*80.0-120*		*10/07/2018 10:06*	WG1177169
(S) Dibromofluoromethane	*118*			*75.0-120*		*10/07/2018 10:06*	WG1177169
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/07/2018 10:06*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.473		0.0247	0.100	1	10/12/2018 04:36	WG1178287
(S) o-Terphenyl	*82.1*			*31.0-160*		*10/12/2018 04:36*	WG1178287

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	9300		56.4	200	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 22:50	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1750		5.19	100	100	10/12/2018 00:50	WG1176730
Fluoride	4.62		0.00990	0.100	1	10/12/2018 00:33	WG1176730
Sulfate	4420		7.74	500	100	10/12/2018 00:50	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.150		0.000250	0.00200	1	10/11/2018 00:50	WG1176866
Barium	0.0135		0.000360	0.00500	1	10/11/2018 00:50	WG1176866
Calcium	574		0.0460	1.00	1	10/11/2018 00:50	WG1176866
Chromium	0.00213		0.000540	0.00200	1	10/11/2018 00:50	WG1176866
Iron	8.01		0.0150	0.100	1	10/11/2018 00:50	WG1176866
Lead	0.000288	J	0.000240	0.00200	1	10/11/2018 00:50	WG1176866
Manganese	2.83		0.000250	0.00500	1	10/11/2018 00:50	WG1176866
Potassium	6.34		0.0370	1.00	1	10/11/2018 00:50	WG1176866
Selenium	0.00367		0.000380	0.00200	1	10/11/2018 00:50	WG1176866
Sodium	1560		0.550	5.00	5	10/11/2018 02:51	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.21		0.0314	0.100	1	10/08/2018 17:14	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 17:14*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/07/2018 10:26	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 10:26	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 10:26	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 10:26	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 10:26	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 10:26	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 10:26	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 10:26	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 10:26	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 10:26	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 10:26	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 10:26	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 10:26	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 10:26	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 10:26	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 10:26	WG1177169

MW-84

Collected date/time: 10/03/18 12:10

SAMPLE RESULTS - 03

L1032143

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 10:26	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 10:26	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 10:26	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 10:26	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 10:26	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 10:26	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 10:26	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 10:26	WG1177169
Isopropylbenzene	0.000476	J	0.000326	0.00100	1	10/07/2018 10:26	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 10:26	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 10:26	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 10:26	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 10:26	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 10:26	WG1177169
Methyl tert-butyl ether	0.00128		0.000367	0.00100	1	10/07/2018 10:26	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 10:26	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 10:26	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 10:26	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 10:26	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 10:26	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 10:26	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 10:26	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 10:26	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 10:26	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 10:26	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 10:26	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 10:26	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 10:26	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 10:26	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 10:26	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 10:26	WG1177169
(S) Toluene-d8	*108*			*80.0-120*		*10/07/2018 10:26*	WG1177169
(S) Dibromofluoromethane	*108*			*75.0-120*		*10/07/2018 10:26*	WG1177169
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/07/2018 10:26*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	41.0		0.247	1.00	10	10/12/2018 08:57	WG1178287
(S) o-Terphenyl	*101*			*31.0-160*		*10/12/2018 08:57*	WG1178287

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3860		28.2	100	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 22:51	WG1178866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	845		5.19	100	100	10/12/2018 01:58	WG1176730
Fluoride	2.32		0.00990	0.100	1	10/12/2018 01:07	WG1176730
Sulfate	1730		7.74	500	100	10/12/2018 01:58	WG1176730

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00349		0.000250	0.00200	1	10/11/2018 00:54	WG1176866
Barium	0.0197		0.000360	0.00500	1	10/11/2018 00:54	WG1176866
Calcium	324		0.0460	1.00	1	10/11/2018 00:54	WG1176866
Chromium	U		0.000540	0.00200	1	10/11/2018 00:54	WG1176866
Iron	3.58		0.0150	0.100	1	10/11/2018 00:54	WG1176866
Lead	U		0.000240	0.00200	1	10/11/2018 00:54	WG1176866
Manganese	1.08		0.000250	0.00500	1	10/11/2018 00:54	WG1176866
Potassium	3.48		0.0370	1.00	1	10/11/2018 00:54	WG1176866
Selenium	U		0.000380	0.00200	1	10/11/2018 00:54	WG1176866
Sodium	742		0.110	1.00	1	10/11/2018 00:54	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 17:37	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 17:37*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/07/2018 10:46	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 10:46	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 10:46	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 10:46	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 10:46	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 10:46	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 10:46	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 10:46	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 10:46	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 10:46	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 10:46	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 10:46	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 10:46	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 10:46	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 10:46	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 10:46	WG1177169

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 10:46	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 10:46	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 10:46	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 10:46	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 10:46	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 10:46	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 10:46	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 10:46	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 10:46	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 10:46	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 10:46	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 10:46	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 10:46	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 10:46	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 10:46	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 10:46	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 10:46	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 10:46	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 10:46	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 10:46	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 10:46	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 10:46	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 10:46	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 10:46	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 10:46	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 10:46	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 10:46	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 10:46	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 10:46	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 10:46	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 10:46	WG1177169
(S) Toluene-d8	*107*			*80.0-120*		*10/07/2018 10:46*	WG1177169
(S) Dibromofluoromethane	*110*			*75.0-120*		*10/07/2018 10:46*	WG1177169
(S) 4-Bromofluorobenzene	*98.6*			*77.0-126*		*10/07/2018 10:46*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.188		0.0247	0.100	1	10/12/2018 04:54	WG1178287
(S) o-Terphenyl	*83.7*			*31.0-160*		*10/12/2018 04:54*	WG1178287

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	7700		28.2	100	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	1.44		0.0197	0.100	1	10/10/2018 22:53	WG1178866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	2020		5.19	100	100	10/12/2018 02:31	WG1176730
Fluoride	6.21		0.00990	0.100	1	10/12/2018 02:15	WG1176730
Sulfate	2350		7.74	500	100	10/12/2018 02:31	WG1176730

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00332		0.000250	0.00200	1	10/11/2018 01:26	WG1176866
Barium	0.0179		0.000360	0.00500	1	10/11/2018 01:26	WG1176866
Calcium	679		0.0460	1.00	1	10/11/2018 01:26	WG1176866
Chromium	U		0.000540	0.00200	1	10/11/2018 01:26	WG1176866
Iron	0.114		0.0150	0.100	1	10/11/2018 01:26	WG1176866
Lead	U		0.000240	0.00200	1	10/11/2018 01:26	WG1176866
Manganese	2.69		0.000250	0.00500	1	10/11/2018 01:26	WG1176866
Potassium	7.84		0.0370	1.00	1	10/11/2018 01:26	WG1176866
Selenium	0.000411	J	0.000380	0.00200	1	10/11/2018 01:26	WG1176866
Sodium	1100		0.550	5.00	5	10/11/2018 02:56	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.0571	J	0.0314	0.100	1	10/08/2018 17:59	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*99.7*			*78.0-120*		*10/08/2018 17:59*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/07/2018 11:05	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 11:05	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 11:05	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 11:05	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 11:05	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 11:05	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 11:05	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 11:05	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 11:05	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 11:05	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 11:05	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 11:05	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 11:05	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 11:05	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 11:05	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 11:05	WG1177169

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 11:05	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 11:05	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 11:05	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 11:05	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 11:05	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 11:05	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 11:05	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 11:05	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 11:05	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 11:05	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 11:05	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 11:05	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 11:05	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 11:05	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 11:05	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 11:05	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 11:05	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 11:05	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 11:05	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 11:05	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 11:05	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 11:05	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 11:05	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 11:05	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 11:05	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 11:05	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 11:05	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 11:05	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 11:05	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 11:05	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 11:05	WG1177169
(S) Toluene-d8	*107*			*80.0-120*		*10/07/2018 11:05*	WG1177169
(S) Dibromofluoromethane	*111*			*75.0-120*		*10/07/2018 11:05*	WG1177169
(S) 4-Bromofluorobenzene	*95.4*			*77.0-126*		*10/07/2018 11:05*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.533		0.0247	0.100	1	10/12/2018 05:11	WG1178287
(S) o-Terphenyl	*81.6*			*31.0-160*		*10/12/2018 05:11*	WG1178287

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	9420		56.4	200	1	10/10/2018 20:59	WG1178368

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	171		0.985	5.00	50	10/10/2018 22:54	WG1178866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	1560		5.19	100	100	10/12/2018 03:05	WG1176730
Fluoride	8.06		0.00990	0.100	1	10/12/2018 02:48	WG1176730
Sulfate	4870		7.74	500	100	10/12/2018 03:05	WG1176730

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0567		0.000250	0.00200	1	10/11/2018 01:30	WG1176866
Barium	0.0133		0.000360	0.00500	1	10/11/2018 01:30	WG1176866
Calcium	534		0.0460	1.00	1	10/11/2018 01:30	WG1176866
Chromium	U		0.000540	0.00200	1	10/11/2018 01:30	WG1176866
Iron	0.0233	J	0.0150	0.100	1	10/11/2018 01:30	WG1176866
Lead	0.000376	J	0.000240	0.00200	1	10/11/2018 01:30	WG1176866
Manganese	0.926		0.000250	0.00500	1	10/11/2018 01:30	WG1176866
Potassium	42.9		0.0370	1.00	1	10/11/2018 01:30	WG1176866
Selenium	0.227		0.000380	0.00200	1	10/11/2018 01:30	WG1176866
Sodium	2310		0.550	5.00	5	10/11/2018 03:00	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.889		0.0314	0.100	1	10/08/2018 18:22	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 18:22*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/07/2018 11:25	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 11:25	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 11:25	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 11:25	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 11:25	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 11:25	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 11:25	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 11:25	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 11:25	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 11:25	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 11:25	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 11:25	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 11:25	WG1177169
Chloromethane	U		0.000276	0.00250	1	10/07/2018 11:25	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 11:25	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 11:25	WG1177169

MW-74

Collected date/time: 10/03/18 12:55

SAMPLE RESULTS - 06

L1032143

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 11:25	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 11:25	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 11:25	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 11:25	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 11:25	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 11:25	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 11:25	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 11:25	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 11:25	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 11:25	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 11:25	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 11:25	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 11:25	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 11:25	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 11:25	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 11:25	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 11:25	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 11:25	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 11:25	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 11:25	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 11:25	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 11:25	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 11:25	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 11:25	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 11:25	WG1177169
1,2,4-Trimethylbenzene	0.000732	J	0.000373	0.00100	1	10/07/2018 11:25	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 11:25	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 11:25	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 11:25	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 11:25	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 11:25	WG1177169
(S) Toluene-d8	*108*			*80.0-120*		*10/07/2018 11:25*	WG1177169
(S) Dibromofluoromethane	*107*			*75.0-120*		*10/07/2018 11:25*	WG1177169
(S) 4-Bromofluorobenzene	*96.6*			*77.0-126*		*10/07/2018 11:25*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	35.3		0.247	1.00	10	10/12/2018 09:15	WG1178287
(S) o-Terphenyl	*117*			*31.0-160*		*10/12/2018 09:15*	WG1178287

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	13300	J4	56.4	200	1	10/10/2018 20:18	WG1178370

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.0330	J	0.0197	0.100	1	10/10/2018 22:56	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	4270		5.19	100	100	10/12/2018 03:39	WG1176730
Fluoride	1.89		0.00990	0.100	1	10/12/2018 03:22	WG1176730
Sulfate	4430		7.74	500	100	10/12/2018 03:39	WG1176730

Sample Narrative:

L1032143-07 WG1176730: Results confirmed

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00892		0.000250	0.00200	1	10/11/2018 01:35	WG1176866
Barium	0.0314		0.000360	0.00500	1	10/11/2018 01:35	WG1176866
Calcium	512		0.0460	1.00	1	10/11/2018 01:35	WG1176866
Chromium	0.000784	J	0.000540	0.00200	1	10/11/2018 01:35	WG1176866
Iron	0.617		0.0150	0.100	1	10/11/2018 01:35	WG1176866
Lead	U		0.000240	0.00200	1	10/11/2018 01:35	WG1176866
Manganese	1.24		0.000250	0.00500	1	10/11/2018 01:35	WG1176866
Potassium	5.36		0.0370	1.00	1	10/11/2018 01:35	WG1176866
Selenium	0.000828	J	0.000380	0.00200	1	10/11/2018 01:35	WG1176866
Sodium	3110		0.550	5.00	5	10/11/2018 03:04	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 18:45	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*99.4*			*78.0-120*		*10/08/2018 18:45*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/07/2018 11:45	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 11:45	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 11:45	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 11:45	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 11:45	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 11:45	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 11:45	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 11:45	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 11:45	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 11:45	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 11:45	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 11:45	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 11:45	WG1177169

MW-2A

Collected date/time: 10/03/18 11:25

SAMPLE RESULTS - 07

L1032143

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.000276	0.00250	1	10/07/2018 11:45	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 11:45	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 11:45	WG1177169
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 11:45	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 11:45	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 11:45	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 11:45	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 11:45	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 11:45	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 11:45	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 11:45	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 11:45	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 11:45	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 11:45	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 11:45	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 11:45	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 11:45	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 11:45	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 11:45	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 11:45	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 11:45	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 11:45	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 11:45	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 11:45	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 11:45	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 11:45	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 11:45	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 11:45	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 11:45	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 11:45	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 11:45	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 11:45	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 11:45	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 11:45	WG1177169
(S) Toluene-d8	*111*			*80.0-120*		*10/07/2018 11:45*	WG1177169
(S) Dibromofluoromethane	*102*			*75.0-120*		*10/07/2018 11:45*	WG1177169
(S) 4-Bromofluorobenzene	*96.5*			*77.0-126*		*10/07/2018 11:45*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.175		0.0247	0.100	1	10/12/2018 05:28	WG1178287
(S) o-Terphenyl	*77.9*			*31.0-160*		*10/12/2018 05:28*	WG1178287

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	14200	J4	56.4	200	1	10/10/2018 20:18	WG1178370

Sample Narrative:

L1032143-08 WG1178370: Results confirmed

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 23:03	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	4910		5.19	100	100	10/12/2018 04:13	WG1176730
Fluoride	1.98		0.00990	0.100	1	10/12/2018 03:56	WG1176730
Sulfate	3110		7.74	500	100	10/12/2018 04:13	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0125		0.000250	0.00200	1	10/11/2018 01:39	WG1176866
Barium	0.0262		0.000360	0.00500	1	10/11/2018 01:39	WG1176866
Calcium	850		0.0460	1.00	1	10/11/2018 01:39	WG1176866
Chromium	U		0.000540	0.00200	1	10/11/2018 01:39	WG1176866
Iron	6.45		0.0150	0.100	1	10/11/2018 01:39	WG1176866
Lead	0.000466	J	0.000240	0.00200	1	10/11/2018 01:39	WG1176866
Manganese	2.35		0.000250	0.00500	1	10/11/2018 01:39	WG1176866
Potassium	16.1		0.0370	1.00	1	10/11/2018 01:39	WG1176866
Selenium	U		0.000380	0.00200	1	10/11/2018 01:39	WG1176866
Sodium	2600		0.550	5.00	5	10/11/2018 03:27	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.293		0.0314	0.100	1	10/08/2018 19:08	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 19:08*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/07/2018 12:05	WG1177169
Benzene	U		0.000331	0.00100	1	10/07/2018 12:05	WG1177169
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 12:05	WG1177169
Bromoform	U		0.000469	0.00100	1	10/07/2018 12:05	WG1177169
Bromomethane	U		0.000866	0.00500	1	10/07/2018 12:05	WG1177169
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 12:05	WG1177169
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 12:05	WG1177169
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 12:05	WG1177169
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 12:05	WG1177169
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 12:05	WG1177169
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 12:05	WG1177169
Chloroethane	U		0.000453	0.00500	1	10/07/2018 12:05	WG1177169
Chloroform	U		0.000324	0.00500	1	10/07/2018 12:05	WG1177169

OCD-6

Collected date/time: 10/03/18 12:10

SAMPLE RESULTS - 08

L1032143

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.000276	0.00250	1	10/07/2018 12:05	WG1177169
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 12:05	WG1177169
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 12:05	WG1177169
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 12:05	WG1177169
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 12:05	WG1177169
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 12:05	WG1177169
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 12:05	WG1177169
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 12:05	WG1177169
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 12:05	WG1177169
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 12:05	WG1177169
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 12:05	WG1177169
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 12:05	WG1177169
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 12:05	WG1177169
2-Butanone (MEK)	U		0.00393	0.0100	1	10/07/2018 12:05	WG1177169
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 12:05	WG1177169
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 12:05	WG1177169
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 12:05	WG1177169
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 12:05	WG1177169
Naphthalene	U		0.00100	0.00500	1	10/07/2018 12:05	WG1177169
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 12:05	WG1177169
Styrene	U		0.000307	0.00100	1	10/07/2018 12:05	WG1177169
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 12:05	WG1177169
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 12:05	WG1177169
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 12:05	WG1177169
Toluene	U		0.000412	0.00100	1	10/07/2018 12:05	WG1177169
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 12:05	WG1177169
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 12:05	WG1177169
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 12:05	WG1177169
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 12:05	WG1177169
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 12:05	WG1177169
Vinyl chloride	U		0.000259	0.00100	1	10/07/2018 12:05	WG1177169
o-Xylene	U		0.000341	0.00100	1	10/07/2018 12:05	WG1177169
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 12:05	WG1177169
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 12:05	WG1177169
(S) Toluene-d8	*104*			*80.0-120*		*10/07/2018 12:05*	WG1177169
(S) Dibromofluoromethane	*104*			*75.0-120*		*10/07/2018 12:05*	WG1177169
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/07/2018 12:05*	WG1177169

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.651		0.0247	0.100	1	10/12/2018 05:46	WG1178287
(S) o-Terphenyl	*82.1*			*31.0-160*		*10/12/2018 05:46*	WG1178287

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	10500	J4	56.4	200	1	10/10/2018 20:18	WG1178370

Sample Narrative:

L1032143-09 WG1178370: Results confirmed

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 23:05	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	2460		5.19	100	100	10/12/2018 05:21	WG1176730
Fluoride	2.45		0.00990	0.100	1	10/12/2018 04:30	WG1176730
Sulfate	3680		7.74	500	100	10/12/2018 05:21	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.124		0.000250	0.00200	1	10/11/2018 01:43	WG1176866
Barium	0.0156		0.000360	0.00500	1	10/11/2018 01:43	WG1176866
Calcium	612		0.0460	1.00	1	10/11/2018 01:43	WG1176866
Chromium	U		0.000540	0.00200	1	10/11/2018 01:43	WG1176866
Iron	9.57		0.0150	0.100	1	10/11/2018 01:43	WG1176866
Lead	0.000362	J	0.000240	0.00200	1	10/11/2018 01:43	WG1176866
Manganese	2.98		0.000250	0.00500	1	10/11/2018 01:43	WG1176866
Potassium	6.30		0.0370	1.00	1	10/11/2018 01:43	WG1176866
Selenium	0.00153	J	0.000380	0.00200	1	10/11/2018 01:43	WG1176866
Sodium	2520		0.550	5.00	5	10/11/2018 03:31	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	1.32		0.0314	0.100	1	10/08/2018 19:31	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 19:31*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 05:12	WG1177440
Benzene	U		0.000331	0.00100	1	10/08/2018 05:12	WG1177440
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 05:12	WG1177440
Bromoform	U		0.000469	0.00100	1	10/08/2018 05:12	WG1177440
Bromomethane	U		0.000866	0.00500	1	10/08/2018 05:12	WG1177440
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 05:12	WG1177440
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 05:12	WG1177440
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 05:12	WG1177440
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 05:12	WG1177440
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 05:12	WG1177440
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 05:12	WG1177440
Chloroethane	U		0.000453	0.00500	1	10/08/2018 05:12	WG1177440
Chloroform	U		0.000324	0.00500	1	10/08/2018 05:12	WG1177440

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.000276	0.00250	1	10/08/2018 05:12	WG1177440
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 05:12	WG1177440
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 05:12	WG1177440
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 05:12	WG1177440
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 05:12	WG1177440
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 05:12	WG1177440
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 05:12	WG1177440
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 05:12	WG1177440
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 05:12	WG1177440
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 05:12	WG1177440
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 05:12	WG1177440
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 05:12	WG1177440
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 05:12	WG1177440
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 05:12	WG1177440
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 05:12	WG1177440
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 05:12	WG1177440
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 05:12	WG1177440
Methyl tert-butyl ether	0.00139		0.000367	0.00100	1	10/08/2018 05:12	WG1177440
Naphthalene	U		0.00100	0.00500	1	10/08/2018 05:12	WG1177440
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 05:12	WG1177440
Styrene	U		0.000307	0.00100	1	10/08/2018 05:12	WG1177440
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 05:12	WG1177440
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 05:12	WG1177440
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 05:12	WG1177440
Toluene	U		0.000412	0.00100	1	10/08/2018 05:12	WG1177440
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 05:12	WG1177440
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 05:12	WG1177440
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 05:12	WG1177440
1,2,4-Trimethylbenzene	0.00103		0.000373	0.00100	1	10/08/2018 05:12	WG1177440
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 05:12	WG1177440
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 05:12	WG1177440
o-Xylene	U		0.000341	0.00100	1	10/08/2018 05:12	WG1177440
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 05:12	WG1177440
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 05:12	WG1177440
(S) Toluene-d8	*103*			*80.0-120*		*10/08/2018 05:12*	WG1177440
(S) Dibromofluoromethane	*98.9*			*75.0-120*		*10/08/2018 05:12*	WG1177440
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/08/2018 05:12*	WG1177440

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.89		0.0247	0.100	1	10/12/2018 06:03	WG1178287
(S) o-Terphenyl	*81.1*			*31.0-160*		*10/12/2018 06:03*	WG1178287

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5890	J4	28.2	100	1	10/10/2018 20:18	WG1178370

Sample Narrative:

L1032143-10 WG1178370: Results confirmed

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 23:06	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	1370		5.19	100	100	10/12/2018 05:54	WG1176730
Fluoride	7.35		0.00990	0.100	1	10/12/2018 05:38	WG1176730
Sulfate	2100		7.74	500	100	10/12/2018 05:54	WG1176730

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.312		0.000250	0.00200	1	10/11/2018 01:48	WG1176866
Barium	0.0149		0.000360	0.00500	1	10/11/2018 01:48	WG1176866
Calcium	345		0.0460	1.00	1	10/11/2018 01:48	WG1176866
Chromium	0.000998	J	0.000540	0.00200	1	10/11/2018 01:48	WG1176866
Iron	5.50		0.0150	0.100	1	10/11/2018 01:48	WG1176866
Lead	0.000372	J	0.000240	0.00200	1	10/11/2018 01:48	WG1176866
Manganese	0.884		0.000250	0.00500	1	10/11/2018 01:48	WG1176866
Potassium	18.0		0.0370	1.00	1	10/11/2018 01:48	WG1176866
Selenium	0.00187	J	0.000380	0.00200	1	10/11/2018 01:48	WG1176866
Sodium	1410		0.550	5.00	5	10/11/2018 03:36	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	3.31		0.0314	0.100	1	10/08/2018 19:54	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*99.2*			*78.0-120*		*10/08/2018 19:54*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 05:33	WG1177440
Benzene	U		0.000331	0.00100	1	10/08/2018 05:33	WG1177440
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 05:33	WG1177440
Bromoform	U		0.000469	0.00100	1	10/08/2018 05:33	WG1177440
Bromomethane	U		0.000866	0.00500	1	10/08/2018 05:33	WG1177440
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 05:33	WG1177440
sec-Butylbenzene	0.000955	J	0.000365	0.00100	1	10/08/2018 05:33	WG1177440
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 05:33	WG1177440
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 05:33	WG1177440
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 05:33	WG1177440
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 05:33	WG1177440
Chloroethane	U		0.000453	0.00500	1	10/08/2018 05:33	WG1177440
Chloroform	U		0.000324	0.00500	1	10/08/2018 05:33	WG1177440

MW-75
Collected date/time: 10/03/18 08:25

SAMPLE RESULTS - 10

L1032143

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.000276	0.00250	1	10/08/2018 05:33	WG1177440
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 05:33	WG1177440
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 05:33	WG1177440
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 05:33	WG1177440
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 05:33	WG1177440
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 05:33	WG1177440
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 05:33	WG1177440
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 05:33	WG1177440
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 05:33	WG1177440
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 05:33	WG1177440
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 05:33	WG1177440
Isopropylbenzene	0.0106		0.000326	0.00100	1	10/08/2018 05:33	WG1177440
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 05:33	WG1177440
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 05:33	WG1177440
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 05:33	WG1177440
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 05:33	WG1177440
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 05:33	WG1177440
Methyl tert-butyl ether	0.00276		0.000367	0.00100	1	10/08/2018 05:33	WG1177440
Naphthalene	U		0.00100	0.00500	1	10/08/2018 05:33	WG1177440
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 05:33	WG1177440
Styrene	U		0.000307	0.00100	1	10/08/2018 05:33	WG1177440
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 05:33	WG1177440
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 05:33	WG1177440
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 05:33	WG1177440
Toluene	U		0.000412	0.00100	1	10/08/2018 05:33	WG1177440
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 05:33	WG1177440
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 05:33	WG1177440
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 05:33	WG1177440
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 05:33	WG1177440
1,3,5-Trimethylbenzene	0.000709	J	0.000387	0.00100	1	10/08/2018 05:33	WG1177440
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 05:33	WG1177440
o-Xylene	U		0.000341	0.00100	1	10/08/2018 05:33	WG1177440
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 05:33	WG1177440
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 05:33	WG1177440
(S) Toluene-d8	*103*			*80.0-120*		*10/08/2018 05:33*	WG1177440
(S) Dibromofluoromethane	*98.9*			*75.0-120*		*10/08/2018 05:33*	WG1177440
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/08/2018 05:33*	WG1177440

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	14.4		0.0494	0.200	2	10/12/2018 08:40	WG1178287
(S) o-Terphenyl	*101*			*31.0-160*		*10/12/2018 08:40*	WG1178287

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	26.0	J4	2.82	10.0	1	10/10/2018 20:18	WG1178370

Sample Narrative:

L1032143-11 WG1178370: Results confirmed

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 23:08	WG1178866

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	0.501	B J P1	0.0519	1.00	1	10/12/2018 06:11	WG1176730
Fluoride	U		0.00990	0.100	1	10/12/2018 06:11	WG1176730
Sulfate	1.03	B J P1	0.0774	5.00	1	10/12/2018 06:11	WG1176730

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	U		0.000250	0.00200	1	10/11/2018 01:52	WG1176866
Barium	0.000732	J	0.000360	0.00500	1	10/11/2018 01:52	WG1176866
Calcium	0.0706	J	0.0460	1.00	1	10/11/2018 01:52	WG1176866
Chromium	U		0.000540	0.00200	1	10/11/2018 01:52	WG1176866
Iron	U		0.0150	0.100	1	10/11/2018 01:52	WG1176866
Lead	U		0.000240	0.00200	1	10/11/2018 01:52	WG1176866
Manganese	0.000511	J	0.000250	0.00500	1	10/11/2018 01:52	WG1176866
Potassium	0.0636	J	0.0370	1.00	1	10/11/2018 01:52	WG1176866
Selenium	U		0.000380	0.00200	1	10/11/2018 01:52	WG1176866
Sodium	1.76		0.110	1.00	1	10/11/2018 01:52	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 20:17	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 20:17*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/08/2018 05:54	WG1177440
Benzene	U		0.000331	0.00100	1	10/08/2018 05:54	WG1177440
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 05:54	WG1177440
Bromoform	U		0.000469	0.00100	1	10/08/2018 05:54	WG1177440
Bromomethane	U		0.000866	0.00500	1	10/08/2018 05:54	WG1177440
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 05:54	WG1177440
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 05:54	WG1177440
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 05:54	WG1177440
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 05:54	WG1177440
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 05:54	WG1177440
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 05:54	WG1177440
Chloroethane	U		0.000453	0.00500	1	10/08/2018 05:54	WG1177440
Chloroform	U		0.000324	0.00500	1	10/08/2018 05:54	WG1177440

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.000276	0.00250	1	10/08/2018 05:54	WG1177440
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 05:54	WG1177440
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 05:54	WG1177440
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 05:54	WG1177440
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 05:54	WG1177440
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 05:54	WG1177440
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 05:54	WG1177440
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 05:54	WG1177440
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 05:54	WG1177440
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 05:54	WG1177440
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 05:54	WG1177440
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 05:54	WG1177440
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 05:54	WG1177440
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 05:54	WG1177440
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 05:54	WG1177440
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 05:54	WG1177440
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 05:54	WG1177440
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 05:54	WG1177440
Naphthalene	U		0.00100	0.00500	1	10/08/2018 05:54	WG1177440
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 05:54	WG1177440
Styrene	U		0.000307	0.00100	1	10/08/2018 05:54	WG1177440
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 05:54	WG1177440
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 05:54	WG1177440
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 05:54	WG1177440
Toluene	U		0.000412	0.00100	1	10/08/2018 05:54	WG1177440
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 05:54	WG1177440
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 05:54	WG1177440
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 05:54	WG1177440
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 05:54	WG1177440
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 05:54	WG1177440
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 05:54	WG1177440
o-Xylene	U		0.000341	0.00100	1	10/08/2018 05:54	WG1177440
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 05:54	WG1177440
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 05:54	WG1177440
(S) Toluene-d8	*105*			*80.0-120*		*10/08/2018 05:54*	WG1177440
(S) Dibromofluoromethane	*99.4*			*75.0-120*		*10/08/2018 05:54*	WG1177440
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/08/2018 05:54*	WG1177440

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.146		0.0247	0.100	1	10/12/2018 06:20	WG1178287
(S) o-Terphenyl	*76.8*			*31.0-160*		*10/12/2018 06:20*	WG1178287

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5.00	J J4	2.82	10.0	1	10/10/2018 20:18	WG1178370

Sample Narrative:

L1032143-12 WG1178370: Results confirmed

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 23:11	WG1178866

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	0.320	B J P1	0.0519	1.00	1	10/10/2018 00:08	WG1176732
Fluoride	0.126		0.00990	0.100	1	10/10/2018 00:08	WG1176732
Sulfate	U		0.0774	5.00	1	10/10/2018 00:08	WG1176732

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	U		0.000250	0.00200	1	10/11/2018 01:56	WG1176866
Barium	0.000651	J	0.000360	0.00500	1	10/11/2018 01:56	WG1176866
Calcium	0.0737	J	0.0460	1.00	1	10/11/2018 01:56	WG1176866
Chromium	U		0.000540	0.00200	1	10/11/2018 01:56	WG1176866
Iron	U		0.0150	0.100	1	10/11/2018 01:56	WG1176866
Lead	U		0.000240	0.00200	1	10/11/2018 01:56	WG1176866
Manganese	0.000447	J	0.000250	0.00500	1	10/11/2018 01:56	WG1176866
Potassium	0.0409	J	0.0370	1.00	1	10/11/2018 01:56	WG1176866
Selenium	U		0.000380	0.00200	1	10/11/2018 01:56	WG1176866
Sodium	1.37		0.110	1.00	1	10/11/2018 01:56	WG1176866

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 20:40	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 20:40*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 06:15	WG1177440
Benzene	U		0.000331	0.00100	1	10/08/2018 06:15	WG1177440
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 06:15	WG1177440
Bromoform	U		0.000469	0.00100	1	10/08/2018 06:15	WG1177440
Bromomethane	U		0.000866	0.00500	1	10/08/2018 06:15	WG1177440
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 06:15	WG1177440
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 06:15	WG1177440
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 06:15	WG1177440
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 06:15	WG1177440
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 06:15	WG1177440
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 06:15	WG1177440
Chloroethane	U		0.000453	0.00500	1	10/08/2018 06:15	WG1177440
Chloroform	U		0.000324	0.00500	1	10/08/2018 06:15	WG1177440

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.000276	0.00250	1	10/08/2018 06:15	WG1177440
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 06:15	WG1177440
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 06:15	WG1177440
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 06:15	WG1177440
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 06:15	WG1177440
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 06:15	WG1177440
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 06:15	WG1177440
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 06:15	WG1177440
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 06:15	WG1177440
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 06:15	WG1177440
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 06:15	WG1177440
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 06:15	WG1177440
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 06:15	WG1177440
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 06:15	WG1177440
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 06:15	WG1177440
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 06:15	WG1177440
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 06:15	WG1177440
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 06:15	WG1177440
Naphthalene	U		0.00100	0.00500	1	10/08/2018 06:15	WG1177440
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 06:15	WG1177440
Styrene	U		0.000307	0.00100	1	10/08/2018 06:15	WG1177440
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 06:15	WG1177440
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 06:15	WG1177440
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 06:15	WG1177440
Toluene	U		0.000412	0.00100	1	10/08/2018 06:15	WG1177440
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 06:15	WG1177440
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 06:15	WG1177440
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 06:15	WG1177440
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 06:15	WG1177440
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 06:15	WG1177440
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 06:15	WG1177440
o-Xylene	U		0.000341	0.00100	1	10/08/2018 06:15	WG1177440
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 06:15	WG1177440
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 06:15	WG1177440
(S) Toluene-d8	*104*			*80.0-120*		*10/08/2018 06:15*	WG1177440
(S) Dibromofluoromethane	*99.9*			*75.0-120*		*10/08/2018 06:15*	WG1177440
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/08/2018 06:15*	WG1177440

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0591	J	0.0247	0.100	1	10/12/2018 06:38	WG1178287
(S) o-Terphenyl	*81.1*			*31.0-160*		*10/12/2018 06:38*	WG1178287

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/08/2018 01:40	WG1177440
Benzene	U		0.000331	0.00100	1	10/08/2018 01:40	WG1177440
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 01:40	WG1177440
Bromoform	U		0.000469	0.00100	1	10/08/2018 01:40	WG1177440
Bromomethane	U		0.000866	0.00500	1	10/08/2018 01:40	WG1177440
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 01:40	WG1177440
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 01:40	WG1177440
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 01:40	WG1177440
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 01:40	WG1177440
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 01:40	WG1177440
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 01:40	WG1177440
Chloroethane	U		0.000453	0.00500	1	10/08/2018 01:40	WG1177440
Chloroform	U		0.000324	0.00500	1	10/08/2018 01:40	WG1177440
Chloromethane	U		0.000276	0.00250	1	10/08/2018 01:40	WG1177440
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 01:40	WG1177440
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 01:40	WG1177440
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 01:40	WG1177440
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 01:40	WG1177440
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 01:40	WG1177440
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 01:40	WG1177440
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 01:40	WG1177440
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 01:40	WG1177440
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 01:40	WG1177440
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 01:40	WG1177440
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 01:40	WG1177440
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 01:40	WG1177440
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 01:40	WG1177440
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 01:40	WG1177440
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 01:40	WG1177440
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 01:40	WG1177440
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 01:40	WG1177440
Naphthalene	U		0.00100	0.00500	1	10/08/2018 01:40	WG1177440
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 01:40	WG1177440
Styrene	U		0.000307	0.00100	1	10/08/2018 01:40	WG1177440
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 01:40	WG1177440
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 01:40	WG1177440
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 01:40	WG1177440
Toluene	U		0.000412	0.00100	1	10/08/2018 01:40	WG1177440
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 01:40	WG1177440
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 01:40	WG1177440
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 01:40	WG1177440
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 01:40	WG1177440
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 01:40	WG1177440
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 01:40	WG1177440
o-Xylene	U		0.000341	0.00100	1	10/08/2018 01:40	WG1177440
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 01:40	WG1177440
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 01:40	WG1177440
(S) Toluene-d8	*104*			*80.0-120*		*10/08/2018 01:40*	WG1177440
(S) Dibromofluoromethane	*98.2*			*75.0-120*		*10/08/2018 01:40*	WG1177440
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/08/2018 01:40*	WG1177440

WG1178368

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1032143-01,02,03,04,05,06

Method Blank (MB)

(MB) R3350334-1 10/10/18 20:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Dissolved Solids	3.00	J	2.82	10.0

L1032143-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-06 10/10/18 20:59 • (DUP) R3350334-4 10/10/18 20:59

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	9420	9560	1	1.48		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350334-2 10/10/18 20:59 • (LCSD) R3350334-3 10/10/18 20:59

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Dissolved Solids	8800	8770	8840	99.7	100	85.0-115			0.795	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1178370

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1032143-07,08,09,10,11,12

Method Blank (MB)

(MB) R3351776-1 10/10/18 20:18

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Dissolved Solids	U		2.82	10.0

L1032152-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-04 10/10/18 20:18 • (DUP) R3351776-4 10/10/18 20:18

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	U	0.000	1	0.000		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3351776-2 10/10/18 20:18 • (LCSD) R3351776-3 10/10/18 20:18

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Dissolved Solids	8800	12500	12600	142	144	85.0-115	J4	J4	0.954	5

QUALITY CONTROL SUMMARY

L1032143-01,02,03,04,05,06,07,08,09,10,11,12

Method Blank (MB)

(MB) R3349533-1 10/10/18 22:21

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1032119-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1032119-01 10/10/18 22:26 • (DUP) R3349533-4 10/10/18 22:27

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

L1032143-11 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-11 10/10/18 23:08 • (DUP) R3349533-6 10/10/18 23:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349533-2 10/10/18 22:23 • (LCSD) R3349533-3 10/10/18 22:24

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.73	3.73	93.3	93.3	90.0-110			0.0268	20

L1032119-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032119-02 10/10/18 22:29 • (MS) R3349533-5 10/10/18 22:30

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	0.0260	1.79	70.4	1	90.0-110	J6

L1032143-12 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032143-12 10/10/18 23:11 • (MS) R3349533-7 10/10/18 23:12 • (MSD) R3349533-8 10/10/18 23:14

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	U	2.36	2.63	94.4	105	1	90.0-110			10.7	20

WG1176730

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L1032143-01,02,03,04,05,06,07,08,09,10,11

Method Blank (MB)

(MB) R3350028-1 10/11/18 14:58

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	0.245	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.283	J	0.0774	5.00

L1032119-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1032119-07 10/11/18 20:36 • (DUP) R3350028-4 10/11/18 20:53

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.231	0.223	1	3.88	J	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.34	0.715	1	61.2	J P1	15

L1032143-11 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-11 10/12/18 06:11 • (DUP) R3350028-7 10/12/18 06:28

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.501	0.407	1	20.7	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	1.03	0.452	1	78.0	J P1	15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350028-2 10/11/18 15:15 • (LCSD) R3350028-3 10/11/18 15:32

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	38.7	38.7	96.7	96.7	80.0-120			0.0672	15
Fluoride	8.00	7.87	7.89	98.4	98.6	80.0-120			0.200	15
Sulfate	40.0	38.6	38.7	96.6	96.6	80.0-120			0.0926	15

WG1176730

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L1032143-01,02,03,04,05,06,07,08,09,10,11

L1032143-11 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032143-11 10/12/18 06:11 • (MS) R3350028-9 10/12/18 08:18

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	0.501	50.1	99.3	1	80.0-120	
Fluoride	5.00	U	4.98	99.6	1	80.0-120	
Sulfate	50.0	1.03	50.0	97.9	1	80.0-120	

L1032119-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032119-07 10/11/18 20:36 • (MS) R3350028-5 10/11/18 21:10 • (MSD) R3350028-6 10/11/18 21:27

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	0.231	50.2	50.8	99.9	101	1	80.0-120			1.17	15
Fluoride	5.00	U	4.95	5.01	99.0	100	1	80.0-120			1.26	15
Sulfate	50.0	1.34	50.2	50.7	97.6	98.7	1	80.0-120			1.09	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349431-1 10/09/18 20:32

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	0.343	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.501	J	0.0774	5.00

L1032152-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-14 10/10/18 05:56 • (DUP) R3349431-6 10/10/18 06:06

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	0.801	0.784	1	2.12		15

L1032152-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-14 10/10/18 06:25 • (DUP) R3349431-8 10/10/18 06:35

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	240	245	5	1.98		15
Sulfate	324	312	5	3.82		15

L1032143-12 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-12 10/10/18 00:08 • (DUP) R3349431-5 10/10/18 00:27

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.320	0.393	1	20.2	J P1	15
Fluoride	0.126	0.122	1	3.62		15
Sulfate	U	0.000	1	0.000		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349431-2 10/09/18 20:42 • (LCSD) R3349431-3 10/09/18 20:51

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	43.2	38.4	108	95.9	80.0-120			11.9	15
Fluoride	8.00	7.69	7.76	96.1	97.0	80.0-120			0.922	15
Sulfate	40.0	39.7	38.6	99.1	96.4	80.0-120			2.81	15

L1032152-14 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032152-14 10/10/18 05:56 • (MS) R3349431-7 10/10/18 06:15

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	242	279	73.6	1	80.0-120	E V
Fluoride	5.00	0.801	5.26	89.2	1	80.0-120	
Sulfate	50.0	313	341	55.5	1	80.0-120	E V

L1032143-12 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032143-12 10/10/18 00:08 • (MS) R3349431-10 10/10/18 11:21 • (MSD) R3349431-11 10/10/18 11:31

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	0.320	49.0	48.8	97.3	96.9	1	80.0-120			0.412	15
Fluoride	5.00	0.126	4.91	4.89	95.6	95.3	1	80.0-120			0.357	15
Sulfate	50.0	U	49.1	48.8	98.1	97.6	1	80.0-120			0.496	15

Method Blank (MB)

(MB) R3349547-1 10/11/18 00:15

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349547-2 10/11/18 00:20 • (LCSD) R3349547-3 10/11/18 00:24

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0478	0.0489	95.7	97.9	80.0-120			2.23	20
Barium	0.0500	0.0466	0.0455	93.3	90.9	80.0-120			2.55	20
Calcium	5.00	4.78	4.82	95.6	96.4	80.0-120			0.763	20
Chromium	0.0500	0.0501	0.0501	100	100	80.0-120			0.0309	20
Iron	5.00	5.10	5.20	102	104	80.0-120			1.84	20
Lead	0.0500	0.0479	0.0478	95.9	95.5	80.0-120			0.380	20
Manganese	0.0500	0.0480	0.0480	96.0	96.0	80.0-120			0.0756	20
Potassium	5.00	4.71	4.67	94.2	93.4	80.0-120			0.829	20
Selenium	0.0500	0.0485	0.0485	97.0	97.0	80.0-120			0.0252	20
Sodium	5.00	4.98	5.00	99.6	100	80.0-120			0.390	20

L1032143-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032143-01 10/11/18 00:28 • (MS) R3349547-5 10/11/18 00:37 • (MSD) R3349547-6 10/11/18 00:41

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0118	0.0592	0.0606	94.8	97.4	1	75.0-125			2.21	20
Barium	0.0500	0.0126	0.0607	0.0612	96.3	97.3	1	75.0-125			0.813	20
Calcium	5.00	583	586	585	59.6	28.1	1	75.0-125	V	V	0.269	20
Chromium	0.0500	U	0.0491	0.0494	98.3	98.7	1	75.0-125			0.465	20
Potassium	5.00	2.60	7.27	7.27	93.4	93.5	1	75.0-125			0.0289	20
Iron	5.00	4.55	9.33	9.44	95.5	97.9	1	75.0-125			1.25	20
Lead	0.0500	0.000327	0.0480	0.0480	95.4	95.3	1	75.0-125			0.0904	20

WG1176866

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1032143-01,02,03,04,05,06,07,08,09,10,11,12

L1032143-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032143-01 10/11/18 00:28 • (MS) R3349547-5 10/11/18 00:37 • (MSD) R3349547-6 10/11/18 00:41

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Manganese	0.0500	1.35	1.38	1.39	55.2	77.5	1	75.0-125	V		0.807	20
Selenium	0.0500	U	0.0518	0.0510	104	102	1	75.0-125			1.48	20
Sodium	5.00	1260	1270	1260	207	11.1	1	75.0-125	E V	E V	0.776	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

WG1177660

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L1032143-01,02,03,04,05,06,07,08,09,10,11,12

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349851-3 10/08/18 13:19

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349851-1 10/08/18 11:52 • (LCSD) R3349851-2 10/08/18 12:33

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.05	6.08	110	110	72.0-127			0.446	20
(S) a,a,a-Trifluorotoluene(FID)				*107*	*107*	*78.0-120*				

Method Blank (MB)

(MB) R3349840-3 10/07/18 05:28

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

QUALITY CONTROL SUMMARY

L1032143-01,02,03,04,05,06,07,08

Method Blank (MB)

(MB) R3349840-3 10/07/18 05:28

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*103*			*80.0-120*
(S) Dibromofluoromethane	*107*			*75.0-120*
(S) 4-Bromofluorobenzene	*99.9*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349840-1 10/07/18 04:29 • (LCSD) R3349840-2 10/07/18 04:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.138	0.142	110	114	19.0-160			3.03	27
Benzene	0.0250	0.0222	0.0220	88.8	88.0	70.0-123			0.861	20
Bromodichloromethane	0.0250	0.0220	0.0225	88.2	90.2	75.0-120			2.25	20
Bromoform	0.0250	0.0239	0.0239	95.5	95.4	68.0-132			0.0698	20
Bromomethane	0.0250	0.0200	0.0208	80.2	83.2	10.0-160			3.76	25
n-Butylbenzene	0.0250	0.0222	0.0216	88.7	86.3	73.0-125			2.74	20
sec-Butylbenzene	0.0250	0.0246	0.0246	98.5	98.3	75.0-125			0.162	20
Carbon disulfide	0.0250	0.0205	0.0203	82.2	81.3	61.0-128			1.12	20
Carbon tetrachloride	0.0250	0.0248	0.0246	99.2	98.5	68.0-126			0.702	20
Chlorobenzene	0.0250	0.0269	0.0275	108	110	80.0-121			2.30	20
Chlorodibromomethane	0.0250	0.0285	0.0279	114	111	77.0-125			2.20	20
Chloroethane	0.0250	0.0205	0.0214	82.1	85.8	47.0-150			4.42	20
Chloroform	0.0250	0.0234	0.0247	93.7	98.7	73.0-120			5.16	20
Chloromethane	0.0250	0.0226	0.0243	90.5	97.2	41.0-142			7.14	20
1,2-Dibromoethane	0.0250	0.0280	0.0267	112	107	80.0-122			4.65	20
1,1-Dichloroethane	0.0250	0.0233	0.0246	93.3	98.2	70.0-126			5.13	20
1,2-Dichloroethane	0.0250	0.0250	0.0254	99.8	102	70.0-128			1.91	20
1,1-Dichloroethene	0.0250	0.0249	0.0233	99.5	93.1	71.0-124			6.70	20
cis-1,2-Dichloroethene	0.0250	0.0235	0.0235	94.0	94.2	73.0-120			0.184	20
trans-1,2-Dichloroethene	0.0250	0.0227	0.0239	90.7	95.6	73.0-120			5.25	20
1,2-Dichloropropane	0.0250	0.0224	0.0246	89.7	98.5	77.0-125			9.33	20
cis-1,3-Dichloropropene	0.0250	0.0241	0.0238	96.3	95.3	80.0-123			1.06	20
trans-1,3-Dichloropropene	0.0250	0.0256	0.0249	102	99.7	78.0-124			2.59	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349840-1 10/07/18 04:29 • (LCSD) R3349840-2 10/07/18 04:49

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0271	0.0276	108	110	79.0-123			1.89	20
2-Hexanone	0.125	0.161	0.153	129	123	67.0-149			4.85	20
Isopropylbenzene	0.0250	0.0249	0.0251	99.7	100	76.0-127			0.764	20
p-Isopropyltoluene	0.0250	0.0230	0.0245	92.1	98.1	76.0-125			6.27	20
2-Butanone (MEK)	0.125	0.149	0.150	119	120	44.0-160			0.814	20
Methylene Chloride	0.0250	0.0217	0.0221	86.9	88.3	67.0-120			1.66	20
4-Methyl-2-pentanone (MIBK)	0.125	0.166	0.158	133	127	68.0-142			4.66	20
Methyl tert-butyl ether	0.0250	0.0206	0.0232	82.2	92.7	68.0-125			11.9	20
Naphthalene	0.0250	0.0241	0.0263	96.2	105	54.0-135			9.09	20
n-Propylbenzene	0.0250	0.0238	0.0252	95.1	101	77.0-124			5.88	20
Styrene	0.0250	0.0250	0.0241	99.9	96.4	73.0-130			3.56	20
1,1,1,2-Tetrachloroethane	0.0250	0.0282	0.0290	113	116	75.0-125			2.65	20
1,1,2,2-Tetrachloroethane	0.0250	0.0239	0.0243	95.6	97.3	65.0-130			1.80	20
Tetrachloroethene	0.0250	0.0269	0.0255	107	102	72.0-132			5.15	20
Toluene	0.0250	0.0266	0.0254	106	101	79.0-120			4.78	20
1,1,1-Trichloroethane	0.0250	0.0260	0.0260	104	104	73.0-124			0.0360	20
1,1,2-Trichloroethane	0.0250	0.0272	0.0267	109	107	80.0-120			2.08	20
Trichloroethene	0.0250	0.0242	0.0244	96.7	97.5	78.0-124			0.777	20
1,2,4-Trimethylbenzene	0.0250	0.0258	0.0247	103	99.0	76.0-121			3.99	20
1,3,5-Trimethylbenzene	0.0250	0.0252	0.0244	101	97.4	76.0-122			3.49	20
Vinyl chloride	0.0250	0.0223	0.0222	89.1	88.7	67.0-131			0.451	20
Xylenes, Total	0.0750	0.0820	0.0802	109	107	79.0-123			2.22	20
o-Xylene	0.0250	0.0272	0.0266	109	106	80.0-122			2.27	20
m&p-Xylenes	0.0500	0.0548	0.0536	110	107	80.0-122			2.08	20
(S) Toluene-d8				*106*	*114*	*80.0-120*				
(S) Dibromofluoromethane				*107*	*109*	*75.0-120*				
(S) 4-Bromofluorobenzene				*105*	*102*	*77.0-126*				

Method Blank (MB)

(MB) R3349881-3 10/08/18 01:19

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349881-3 10/08/18 01:19

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*105*			*80.0-120*
(S) Dibromofluoromethane	*99.4*			*75.0-120*
(S) 4-Bromofluorobenzene	*102*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349881-1 10/08/18 00:15 • (LCSD) R3349881-2 10/08/18 00:37

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.155	0.147	124	117	19.0-160			5.17	27
Benzene	0.0250	0.0243	0.0244	97.4	97.6	70.0-123			0.277	20
Bromodichloromethane	0.0250	0.0252	0.0252	101	101	75.0-120			0.0998	20
Bromoform	0.0250	0.0259	0.0255	103	102	68.0-132			1.35	20
Bromomethane	0.0250	0.0184	0.0193	73.7	77.2	10.0-160			4.59	25
n-Butylbenzene	0.0250	0.0247	0.0249	98.8	99.6	73.0-125			0.746	20
sec-Butylbenzene	0.0250	0.0251	0.0255	100	102	75.0-125			1.48	20
Carbon disulfide	0.0250	0.0243	0.0245	97.3	97.9	61.0-128			0.617	20
Carbon tetrachloride	0.0250	0.0236	0.0238	94.4	95.3	68.0-126			0.915	20
Chlorobenzene	0.0250	0.0258	0.0255	103	102	80.0-121			1.29	20
Chlorodibromomethane	0.0250	0.0259	0.0258	104	103	77.0-125			0.404	20
Chloroethane	0.0250	0.0259	0.0258	103	103	47.0-150			0.403	20
Chloroform	0.0250	0.0251	0.0254	100	101	73.0-120			1.02	20
Chloromethane	0.0250	0.0279	0.0285	112	114	41.0-142			2.12	20
1,2-Dibromoethane	0.0250	0.0266	0.0267	107	107	80.0-122			0.177	20
1,1-Dichloroethane	0.0250	0.0245	0.0248	98.1	99.4	70.0-126			1.29	20
1,2-Dichloroethane	0.0250	0.0258	0.0253	103	101	70.0-128			2.21	20
1,1-Dichloroethene	0.0250	0.0257	0.0260	103	104	71.0-124			1.21	20
cis-1,2-Dichloroethene	0.0250	0.0246	0.0245	98.6	98.2	73.0-120			0.433	20
trans-1,2-Dichloroethene	0.0250	0.0252	0.0259	101	103	73.0-120			2.77	20
1,2-Dichloropropane	0.0250	0.0247	0.0242	98.7	96.7	77.0-125			2.05	20
cis-1,3-Dichloropropene	0.0250	0.0249	0.0246	99.5	98.2	80.0-123			1.32	20
trans-1,3-Dichloropropene	0.0250	0.0256	0.0256	103	102	78.0-124			0.126	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349881-1 10/08/18 00:15 • (LCSD) R3349881-2 10/08/18 00:37

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0253	0.0249	101	99.7	79.0-123			1.62	20
2-Hexanone	0.125	0.142	0.136	114	109	67.0-149			4.44	20
Isopropylbenzene	0.0250	0.0250	0.0252	100	101	76.0-127			0.686	20
p-Isopropyltoluene	0.0250	0.0256	0.0258	102	103	76.0-125			0.847	20
2-Butanone (MEK)	0.125	0.143	0.136	114	109	44.0-160			5.12	20
Methylene Chloride	0.0250	0.0231	0.0234	92.4	93.7	67.0-120			1.34	20
4-Methyl-2-pentanone (MIBK)	0.125	0.134	0.130	107	104	68.0-142			3.49	20
Methyl tert-butyl ether	0.0250	0.0255	0.0254	102	102	68.0-125			0.597	20
Naphthalene	0.0250	0.0266	0.0262	106	105	54.0-135			1.49	20
n-Propylbenzene	0.0250	0.0248	0.0250	99.3	100	77.0-124			0.786	20
Styrene	0.0250	0.0260	0.0260	104	104	73.0-130			0.153	20
1,1,1,2-Tetrachloroethane	0.0250	0.0257	0.0255	103	102	75.0-125			0.761	20
1,1,2,2-Tetrachloroethane	0.0250	0.0240	0.0238	95.9	95.1	65.0-130			0.885	20
Tetrachloroethene	0.0250	0.0258	0.0260	103	104	72.0-132			0.625	20
Toluene	0.0250	0.0243	0.0243	97.2	97.4	79.0-120			0.184	20
1,1,1-Trichloroethane	0.0250	0.0253	0.0247	101	98.9	73.0-124			2.27	20
1,1,2-Trichloroethane	0.0250	0.0259	0.0256	104	102	80.0-120			1.18	20
Trichloroethene	0.0250	0.0264	0.0263	105	105	78.0-124			0.0926	20
1,2,4-Trimethylbenzene	0.0250	0.0252	0.0255	101	102	76.0-121			1.08	20
1,3,5-Trimethylbenzene	0.0250	0.0251	0.0253	101	101	76.0-122			0.784	20
Vinyl chloride	0.0250	0.0291	0.0292	116	117	67.0-131			0.447	20
Xylenes, Total	0.0750	0.0758	0.0756	101	101	79.0-123			0.264	20
o-Xylene	0.0250	0.0253	0.0254	101	102	80.0-122			0.381	20
m&p-Xylenes	0.0500	0.0505	0.0502	101	100	80.0-122			0.532	20
(S) Toluene-d8				*104*	*102*	*80.0-120*				
(S) Dibromofluoromethane				*101*	*99.9*	*75.0-120*				
(S) 4-Bromofluorobenzene				*101*	*101*	*77.0-126*				

WG1178287

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L1032143-01,02,03,04,05,06,07,08,09,10,11,12

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350066-1 10/12/18 01:08

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*82.0*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350066-2 10/12/18 01:25 • (LCSD) R3350066-3 10/12/18 01:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.47	1.53	98.0	102	50.0-150			4.00	20
(S) o-Terphenyl				*80.0*	*84.0*	*31.0-160*				

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state “ND” (Not Detected) or “BDL” (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
B	The same analyte is found in the associated blank.
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J4	The associated batch QC was outside the established quality control range for accuracy.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
O1	The analyte failed the method required serial dilution test and/or subsequent post-spike criteria. These failures indicate matrix interference.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660
Alaska	17-026
Arizona	AZ0612
Arkansas	88-0469
California	2932
Colorado	TN00003
Connecticut	PH-0197
Florida	E87487
Georgia	NELAP
Georgia[1]	923
Idaho	TN00003
Illinois	200008
Indiana	C-TN-01
Iowa	364
Kansas	E-10277
Kentucky[1,6]	90010
Kentucky[2]	16
Louisiana	AI30792
Louisiana[1]	LA180010
Maine	TN0002
Maryland	324
Massachusetts	M-TN003
Michigan	9958
Minnesota	047-999-395
Mississippi	TN00003
Missouri	340
Montana	CERT0086
Nebraska	NE-OS-15-05
Nevada	TN-03-2002-34
New Hampshire	2975
New Jersey–NELAP	TN002
New Mexico[1]	n/a
New York	11742
North Carolina	Env375
North Carolina[1]	DW21704
North Carolina[3]	41
North Dakota	R-140
Ohio–VAP	CL0069
Oklahoma	9915
Oregon	TN200002
Pennsylvania	68-02979
Rhode Island	LAO00356
South Carolina	84004
South Dakota	n/a
Tennessee[1,4]	2006
Texas	T 104704245-17-14
Texas[5]	LAB0152
Utah	TN00003
Vermont	VT2006
Virginia	460132
Washington	C847
West Virginia	233
Wisconsin	9980939910
Wyoming	A2LA

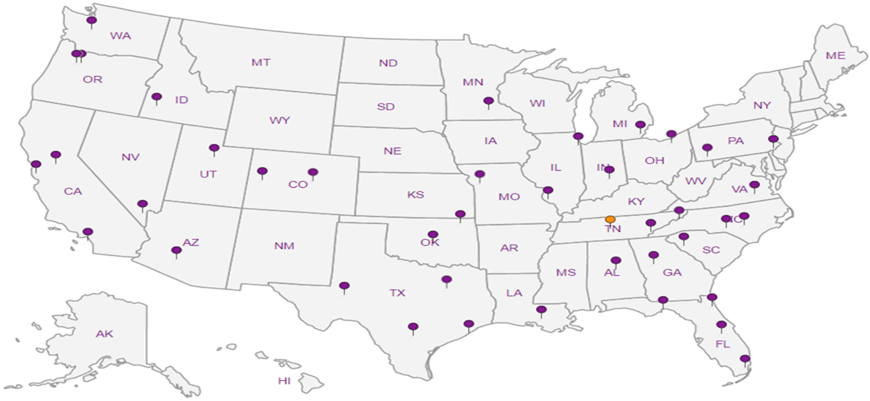
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01
A2LA – ISO 17025[5]	1461.02
Canada	1461.01
EPA–Crypto	TN00003
AIHA-LAP,LLC EMLAP	100789
DOD	1461.01
USDA	P330-15-00234

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



TRC Solutions - Austin, TX **505 E. Huntland Dr, Ste 250** **Austin, TX 78752**	Billing Information: **Accounts Payable** **21 Griffin Road North** **Windsor, CT 06095** **apinvoiceapproval@trcsolutions.com**	Pres Chk
Report to: **Julie Speer**	Email To: **jspeer@trcsolutions.com**	
Project Description: **EP Fall 2018**	City/State Collected: **Artesia, NM**	
Phone: **512-684-3170** Fax:	Client Project # **294318.0000.0000.**	Lab Project # **TRCATX-EP**
Collected by (print): **Scott Ude/HMI Team**	Site/Facility ID # **EP (Navajo - Artesia)**	P.O. # **119503**
Collected by (signature): B. Kh Immediately Packed on Ice N ___ Y ✓	**Rush?** (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day	Quote # Date Results Needed

Analysis / Container / Preservative

Chain of Custody Page 1 of 5

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

L# 1032143

C206

Ta

Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671812**
TSR: **526**
PB:
Shipped Via:

L2

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~MW-85~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL				
~~MW-86~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL		
MW-120	Grab	GW		10-3-18	910	9	X	X	X	X	X	X	X					01
MW-121	Grab	GW			955	9	X	X	X	X	X	X	X					02
MW-84	Grab	GW			1210	9	X	X	X	X	X	X	X					03
MW-122	Grab	GW			1040	9	X	X	X	X	X	X	X					04
MW-79	Grab	GW			1350	9	X	X	X	X	X	X	X					05
MW-74	Grab	GW			1255	9	X	X	X	X	X	X	X					06
MW-2A	Grab	GW			1125	9	X	X	X	X	X	X	X					07
OCD-6	Grab	GW		↓	1210	9	X	X	X	X	X	X	X					08

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP __ Y __ N
COC Signed/Accurate: ✓ Y __ N
Bottles arrive intact: ✓ Y __ N
Correct bottles used: ✓ Y __ N
Sufficient volume sent: ✓ Y __ N
If Applicable
VOA Zero Headspace: ✓ Y __ N
Preservation Correct/Checked: ✓ Y __ N

Relinquished by : (Signature) B. Kh	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No [✓ HCL] / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: [illegible] °C Bottles Received: 109	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 0845	Hold: Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Pres Chk

Chain of Custody Page 2 of 5

Pace Analytical® National Center for Testing & Innovation
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Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature): Brian Kon

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

L# 1032143
Table #
Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671812**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
										✓								
OCD-7AR	Grab	GW		10-3-18	1125	9	X	X	X	X	X	X	X					09
~~MW-76~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
MW-75	Grab	GW		10-3-18	825	9	X	X	X	X	X	X	X					10
~~MW-83~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-3~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-88~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~	~~X~~	~~X~~								
~~MW-22A~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-10~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-123~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-4A~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP ___ Y ___ N
COC Signed/Accurate: ✓ Y ___ N
Bottles arrive intact: ✓ Y ___ N
Correct bottles used: ✓ Y ___ N
Sufficient volume sent: ✓ Y ___ N
If Applicable
VOA Zero Headspace: ✓ Y ___ N
Preservation Correct/Checked: ___ Y ___ N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received:	
Brian Kon	10-4-18	700		[✓ Yes] / No [✓ HCL] / MeoH TBR	

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C	Bottles Received:	If preservation required by Login: Date/Time
				1.8 IT-1 1.8 1.7	109	

Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date:	Time:	Hold:	Condition:
				10/5/18	0845		NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Pres Chk

Analysis / Container / Preservative

Chain of Custody Page 3 of 5

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ✓

L #

Table #

Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671812**
TSR: **526**
PB:

Shipped Via:

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~MW-5A~~	~~Grab~~	~~GW~~				~~9~~	X	X	X	X	X	X	X					
~~MW-7A~~	~~Grab~~	~~GW~~				~~9~~	X	X	X	X	X	X	X					
~~OCD-8A~~	~~Grab~~	~~GW~~				10	X	X	X		X	X	X	X	X			
~~OCD-1R~~	~~Grab~~	~~GW~~				~~9~~	X	X	X	X	X	X	X					
~~OCD-2A~~	~~Grab~~	~~GW~~				~~7~~	X	X	X	X								
~~OCD-3~~	~~Grab~~	~~GW~~				~~7~~	X	X	X	X								
~~OCD-4~~	~~Grab~~	~~GW~~				~~7~~	X	X	X	X								
~~MW-11A~~	~~Grab~~	~~GW~~				~~3~~					X	X	X					
~~OCD-5~~	~~Grab~~	~~GW~~				~~9~~	X	X	X	X	X	X	X					
~~MW-87~~	~~Grab~~	~~GW~~				~~7~~	X	X	X	X								

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP __Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: __Y __N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: [✓ Yes] / No
[✓ HCl] / MeoH
TBR

Temp: 1.8 -.1 = 1.7 °C Bottles Received: 109

Date: 10/5/16 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

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505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
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Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

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Chain of Custody Page 4 of 5

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12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ✓

L# 1032149

Table #

Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671812**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions, TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~MW-18A~~	~~Grab~~	~~GW~~				~~8~~	~~X~~	~~X~~			~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~MW-70~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~	~~X~~	~~X~~								
~~MW-124~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~DUP-EP-01~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~DUP-EP-02~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~DUP-EP-03~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
EB-EP-01	Grab	GW		10-3-18	1310	9	X	X	X	X	X	X	X					11
~~EB-EP-02~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~EB-EP-03~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
EB-EP-04	Grab	GW		10-3-18	1410	9	X	X	X	X	X	X	X					12

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] Y N
COC Signed/Accurate: [✓ Y] N
Bottles arrive intact: [✓ Y] N
Correct bottles used: [✓ Y] N
Sufficient volume sent: [✓ Y] N
If Applicable
VOA Zero Headspace: [✓ Y] N
Preservation Correct/Checked: [✓ Y] N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No [✓ HCl] / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8 15-.1 A+1.7 °C Bottles Received: 109
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 0845

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

Pres Chk

Chain of Custody Page 5 of 5

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12065 Lebanon Rd
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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **EP Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-EP**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **EP (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature): Brian

Rush? (Lab MUST Be Notified)
__ Same Day __ Five Day
__ Next Day __ 5 Day (Rad Only)
__ Two Day __ 10 Day (Rad Only)
__ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ✓

L # 1032143

Table #

Acctnum: **TRCATX**

Template: **T140422**

Prelogin: **P671812**

TSR: **526**

PB:

Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
Trip Blank-EP-01	Grab	GW		10-3-18	—	1										X		07
~~Trip Blank-EP-02~~	~~Grab~~	~~GW~~				~~1~~										X		
~~Trip Blank-EP-03~~	~~Grab~~	~~GW~~				~~1~~										X		

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courlier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP __Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: ✓Y __N

Relinquished by : (Signature) Brian	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No [✓ HCL] / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 15-1 1.8A 1.7 °C Bottles Received: 109	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 0845	Hold: Condition: NCF / [✓ OK]

Pace Analytical®
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ANALYTICAL REPORT

October 18, 2018

TRC Solutions - Austin, TX

Sample Delivery Group:	L1032152
Samples Received:	10/05/2018
Project Number:	294318.0000.0000.
Description:	REST Fall 2018
Site:	REST - NAVAJO-ARTESIA
Report To:	Julie Speer 505 E. Huntland Dr, Ste 250 Austin, TX 78752

Entire Report Reviewed By: Christopher J McCord

Chris McCord
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace National is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.

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2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
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SAMPLE SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-48 L1032152-01 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 14:55	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178370	1	10/10/18 19:46	10/10/18 20:18	MCG
Wet Chemistry by Method 353.2	WG1178871	20	10/10/18 23:29	10/10/18 23:29	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 00:47	10/10/18 00:47	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 00:56	10/10/18 00:56	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 12:36	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	10	10/09/18 11:34	10/09/18 11:34	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	250	10/07/18 14:57	10/07/18 14:57	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 06:55	SHG

MW-130 L1032152-02 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 14:40	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178370	1	10/10/18 19:46	10/10/18 20:18	MCG
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:30	10/10/18 23:30	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 01:06	10/10/18 01:06	ELN
Wet Chemistry by Method 9056A	WG1176732	10	10/10/18 01:35	10/10/18 01:35	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 12:54	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 21:03	10/08/18 21:03	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 15:17	10/07/18 15:17	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 07:13	SHG

MW-52 L1032152-03 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178370	1	10/10/18 19:46	10/10/18 20:18	MCG
Wet Chemistry by Method 353.2	WG1178871	2	10/10/18 23:33	10/10/18 23:33	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	1	10/11/18 15:31	10/12/18 17:50	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 01:45	10/10/18 01:45	ELN
Wet Chemistry by Method 9056A	WG1176732	10	10/10/18 01:55	10/10/18 01:55	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 07:49	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 13:58	ST
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 12:59	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 21:32	10/08/18 21:32	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 15:36	10/07/18 15:36	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 07:30	SHG

MW-109 L1032152-04 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 14:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1180540	1	10/16/18 19:47	10/16/18 20:22	MMF
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:35	10/10/18 23:35	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 02:04	10/10/18 02:04	ELN
Wet Chemistry by Method 9056A	WG1176732	10	10/10/18 02:14	10/10/18 02:14	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 13:23	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	20	10/09/18 11:55	10/09/18 11:55	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	20	10/07/18 15:56	10/07/18 15:56	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 07:47	SHG

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 15:15	10/05/18 08:45

MW-110 L1032152-05 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:38	10/10/18 23:38	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 02:23	10/10/18 02:23	ELN
Wet Chemistry by Method 9056A	WG1176732	10	10/10/18 11:41	10/10/18 11:41	ELN
Wet Chemistry by Method 9056A	WG1176732	5	10/10/18 02:33	10/10/18 02:33	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 13:28	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 21:55	10/08/18 21:55	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 16:16	10/07/18 16:16	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 08:05	SHG

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 10:55	10/05/18 08:45

MW-134 L1032152-06 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	2	10/10/18 23:45	10/10/18 23:45	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 02:43	10/10/18 02:43	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 02:52	10/10/18 02:52	ELN
Wet Chemistry by Method 9056A	WG1176732	50	10/10/18 11:50	10/10/18 11:50	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 13:32	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 22:18	10/08/18 22:18	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 16:36	10/07/18 16:36	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178287	1	10/09/18 23:52	10/12/18 08:22	SHG

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 11:50	10/05/18 08:45

RA-4798 L1032152-07 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:47	10/10/18 23:47	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 03:02	10/10/18 03:02	ELN
Wet Chemistry by Method 9056A	WG1176732	10	10/10/18 03:31	10/10/18 03:31	ELN
Wet Chemistry by Method 9056A	WG1179051	50	10/12/18 00:47	10/12/18 00:47	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 13:37	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 16:55	10/07/18 16:55	JCP

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:20	10/05/18 08:45

RA-4196 L1032152-08 GW

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:48	10/10/18 23:48	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 03:41	10/10/18 03:41	ELN
Wet Chemistry by Method 9056A	WG1176732	10	10/10/18 03:50	10/10/18 03:50	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 12:00	10/10/18 12:00	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 13:42	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 17:15	10/07/18 17:15	JCP

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-115 L1032152-09 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:50	10/10/18 23:50	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 04:00	10/10/18 04:00	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 04:10	10/10/18 04:10	ELN
Wet Chemistry by Method 9056A	WG1176732	50	10/10/18 12:10	10/10/18 12:10	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 13:46	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 22:41	10/08/18 22:41	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 17:35	10/07/18 17:35	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/12/18 22:08	TH

MW-114 L1032152-10 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:50	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:51	10/10/18 23:51	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 04:19	10/10/18 04:19	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 04:29	10/10/18 04:29	ELN
Wet Chemistry by Method 9056A	WG1176732	50	10/10/18 12:19	10/10/18 12:19	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 13:51	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 23:04	10/08/18 23:04	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 17:54	10/07/18 17:54	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/12/18 22:25	TH

MW-117 L1032152-11 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:35	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:53	10/10/18 23:53	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 04:39	10/10/18 04:39	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 04:48	10/10/18 04:48	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 13:55	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 23:27	10/08/18 23:27	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 18:14	10/07/18 18:14	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/12/18 22:43	TH

MW-118 L1032152-12 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 10:20	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	2	10/10/18 23:54	10/10/18 23:54	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 04:58	10/10/18 04:58	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 05:27	10/10/18 05:27	ELN
Wet Chemistry by Method 9056A	WG1176732	50	10/10/18 12:29	10/10/18 12:29	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 14:00	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177660	1	10/08/18 23:50	10/08/18 23:50	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 18:34	10/07/18 18:34	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/12/18 23:00	TH

MW-119 L1032152-13 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 11:05	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:56	10/10/18 23:56	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 05:37	10/10/18 05:37	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 05:46	10/10/18 05:46	ELN
Wet Chemistry by Method 9056A	WG1176732	50	10/10/18 12:39	10/10/18 12:39	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 14:20	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 12:16	10/09/18 12:16	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 18:54	10/07/18 18:54	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/12/18 23:18	TH

KWB-6 L1032152-14 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:55	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178371	1	10/10/18 19:55	10/10/18 20:27	JER
Wet Chemistry by Method 353.2	WG1178871	1	10/10/18 23:57	10/10/18 23:57	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 05:56	10/10/18 05:56	ELN
Wet Chemistry by Method 9056A	WG1176732	5	10/10/18 06:25	10/10/18 06:25	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 14:24	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	20	10/07/18 19:14	10/07/18 19:14	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/12/18 23:35	TH

MW-57 L1032152-15 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 11:50	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178871	10	10/11/18 00:06	10/11/18 00:06	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 06:44	10/10/18 06:44	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 06:54	10/10/18 06:54	ELN
Wet Chemistry by Method 9056A	WG1176732	50	10/10/18 12:48	10/10/18 12:48	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 14:29	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 12:37	10/09/18 12:37	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 19:34	10/07/18 19:34	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/12/18 23:53	TH

KWB-12A L1032152-16 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:30	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178871	5	10/11/18 00:08	10/11/18 00:08	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	1	10/11/18 15:31	10/12/18 17:51	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 07:23	10/10/18 07:23	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 07:33	10/10/18 07:33	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 07:56	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:01	ST
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 14:33	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 12:58	10/09/18 12:58	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 19:54	10/07/18 19:54	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 00:11	TH

KWB-12B L1032152-17 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178871	5	10/11/18 00:09	10/11/18 00:09	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	1	10/11/18 15:31	10/12/18 17:52	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 07:42	10/10/18 07:42	ELN
Wet Chemistry by Method 9056A	WG1176732	20	10/10/18 07:52	10/10/18 07:52	ELN
Wet Chemistry by Method 9056A	WG1176732	50	10/10/18 13:17	10/10/18 13:17	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 07:59	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:10	ST
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 15:27	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 13:19	10/09/18 13:19	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	1	10/07/18 20:43	10/07/18 20:43	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 00:28	TH

MW-58 L1032152-18 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 14:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178871	20	10/11/18 00:11	10/11/18 00:11	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	1	10/11/18 15:31	10/12/18 17:53	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 08:02	10/10/18 08:02	ELN
Wet Chemistry by Method 9056A	WG1176732	5	10/10/18 08:11	10/10/18 08:11	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:01	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:13	ST
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 15:32	JPD
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	50	10/07/18 21:03	10/07/18 21:03	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 00:46	TH

MW-99 L1032152-19 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 10:05	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178871	20	10/11/18 00:12	10/11/18 00:12	JER
Wet Chemistry by Method 9056A	WG1176732	1	10/10/18 08:21	10/10/18 08:21	ELN
Wet Chemistry by Method 9056A	WG1176732	5	10/10/18 08:31	10/10/18 08:31	ELN
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 15:47	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	5	10/09/18 13:40	10/09/18 13:40	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	100	10/07/18 21:23	10/07/18 21:23	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 01:03	TH

MW-66 L1032152-20 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178871	1	10/11/18 00:14	10/11/18 00:14	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	1	10/11/18 15:31	10/12/18 17:56	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 02:53	10/11/18 02:53	ELN
Wet Chemistry by Method 9056A	WG1176733	10	10/11/18 03:31	10/11/18 03:31	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:04	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:15	ST
Metals (ICPMS) by Method 6020	WG1176862	1	10/10/18 10:48	10/12/18 15:42	JPD

MW-66 L1032152-20 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 14:00	10/09/18 14:00	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177306	10	10/07/18 21:43	10/07/18 21:43	JCP
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1178265	50	10/09/18 23:52	10/09/18 23:52	TJJ
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 01:23	TH

MW-60 L1032152-21 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 10:50	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:17	10/11/18 13:17	JER
Wet Chemistry by Method 4500CN E-2011	WG1178772	1	10/11/18 10:44	10/11/18 16:20	KK
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 03:51	10/11/18 03:51	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 04:20	10/11/18 04:20	ELN
Wet Chemistry by Method 9056A	WG1176733	50	10/11/18 12:09	10/11/18 12:09	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:11	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:18	ST
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 19:00	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 14:21	10/09/18 14:21	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 00:41	10/08/18 00:41	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 09:45	TH

MW-128 L1032152-22 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:10	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:20	10/11/18 13:20	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 04:30	10/11/18 04:30	ELN
Wet Chemistry by Method 9056A	WG1176733	10	10/11/18 04:39	10/11/18 04:39	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 18:42	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 14:42	10/09/18 14:42	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	20	10/08/18 01:01	10/08/18 01:01	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 10:02	TH

MW-125 L1032152-23 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:55	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:23	10/11/18 13:23	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 04:49	10/11/18 04:49	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 04:58	10/11/18 04:58	ELN
Wet Chemistry by Method 9056A	WG1176733	50	10/11/18 12:19	10/11/18 12:19	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 19:05	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 15:03	10/09/18 15:03	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 01:21	10/08/18 01:21	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 10:20	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-116 L1032152-24 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:35	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178372	1	10/10/18 19:50	10/10/18 19:51	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:24	10/11/18 13:24	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 05:08	10/11/18 05:08	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 05:18	10/11/18 05:18	ELN
Wet Chemistry by Method 9056A	WG1176733	50	10/11/18 12:28	10/11/18 12:28	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 19:29	JPD
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/12/18 11:21	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 15:23	10/09/18 15:23	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 01:40	10/08/18 01:40	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 10:37	TH

MW-101 L1032152-25 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 09:15	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:26	10/11/18 13:26	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 05:28	10/11/18 05:28	ELN
Wet Chemistry by Method 9056A	WG1176733	10	10/11/18 05:37	10/11/18 05:37	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 19:33	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 15:44	10/09/18 15:44	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 02:00	10/08/18 02:00	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 15:14	SHG

MW-105 L1032152-26 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 08:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	20	10/11/18 13:33	10/11/18 13:33	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 05:47	10/11/18 05:47	ELN
Wet Chemistry by Method 9056A	WG1176733	10	10/11/18 06:16	10/11/18 06:16	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 19:38	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	5	10/09/18 16:05	10/09/18 16:05	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	100	10/08/18 02:20	10/08/18 02:20	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	5	10/09/18 23:55	10/13/18 19:18	SHG

MW-137 L1032152-27 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 14:30	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	100	10/11/18 13:35	10/11/18 13:35	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	100	10/11/18 15:31	10/12/18 17:57	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 06:26	10/11/18 06:26	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 06:35	10/11/18 06:35	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:14	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:21	ST
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 19:43	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	20	10/09/18 16:26	10/09/18 16:26	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	200	10/08/18 02:39	10/08/18 02:39	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 15:49	SHG

SAMPLE SUMMARY

MW-138 L1032152-28 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:45	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:36	10/11/18 13:36	JER
Wet Chemistry by Method 4500CN E-2011	WG1178772	1	10/11/18 10:44	10/11/18 16:21	KK
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 06:45	10/11/18 06:45	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 06:54	10/11/18 06:54	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:16	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:24	ST
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 19:47	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 16:47	10/09/18 16:47	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	5	10/08/18 02:59	10/08/18 02:59	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178288	1	10/09/18 23:55	10/13/18 16:07	SHG

MW-23 L1032152-29 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:38	10/11/18 13:38	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 07:04	10/11/18 07:04	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 07:14	10/11/18 07:14	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 19:52	JPD
Metals (ICPMS) by Method 6020	WG1176863	5	10/10/18 09:12	10/12/18 11:26	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	10	10/09/18 17:08	10/09/18 17:08	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	100	10/08/18 03:19	10/08/18 03:19	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	2	10/10/18 11:10	10/11/18 16:05	TH

MW-39 L1032152-30 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 11:25	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:39	10/11/18 13:39	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 07:23	10/11/18 07:23	ELN
Wet Chemistry by Method 9056A	WG1176733	10	10/11/18 07:33	10/11/18 07:33	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 19:56	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 17:28	10/09/18 17:28	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 03:39	10/08/18 03:39	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	1	10/10/18 11:10	10/11/18 16:26	TH

MW-29 L1032152-31 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:15	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:41	10/11/18 13:41	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 07:43	10/11/18 07:43	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 08:12	10/11/18 08:12	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 20:01	JPD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	1	10/09/18 17:49	10/09/18 17:49	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 03:59	10/08/18 03:59	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	1	10/10/18 11:10	10/11/18 16:46	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

MW-106 L1032152-32 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 10:35	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	50	10/11/18 13:42	10/11/18 13:42	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 08:21	10/11/18 08:21	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 08:31	10/11/18 08:31	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 20:06	JPD
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/12/18 11:30	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1177964	200	10/09/18 18:10	10/09/18 18:10	BMB
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	500	10/08/18 04:19	10/08/18 04:19	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	5	10/10/18 11:10	10/12/18 05:15	TH

DUP-REST-03 L1032152-33 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	2	10/11/18 13:44	10/11/18 13:44	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 08:41	10/11/18 08:41	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 08:50	10/11/18 08:50	ELN
Wet Chemistry by Method 9056A	WG1176733	50	10/11/18 12:38	10/11/18 12:38	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 21:09	JPD
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/12/18 11:34	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1178046	1	10/09/18 14:03	10/09/18 14:03	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 04:38	10/08/18 04:38	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	1	10/10/18 11:10	10/13/18 16:24	SHG

DUP-REST-04 L1032152-34 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178373	1	10/10/18 18:42	10/10/18 19:06	MMF
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:45	10/11/18 13:45	JER
Wet Chemistry by Method 4500CN E-2011	WG1178772	10	10/11/18 10:44	10/11/18 16:22	KK
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 09:00	10/11/18 09:00	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 09:10	10/11/18 09:10	ELN
Wet Chemistry by Method 9056A	WG1176733	50	10/11/18 12:48	10/11/18 12:48	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:18	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:27	ST
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 21:14	JPD
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/12/18 11:39	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1178046	1	10/09/18 14:27	10/09/18 14:27	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 04:58	10/08/18 04:58	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	1	10/10/18 11:10	10/11/18 17:46	TH

DUP-REST-05 L1032152-35 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178376	1	10/10/18 18:05	10/10/18 18:38	JER
Wet Chemistry by Method 353.2	WG1178873	5	10/11/18 13:47	10/11/18 13:47	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	1	10/11/18 15:31	10/12/18 17:58	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 09:19	10/11/18 09:19	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 09:29	10/11/18 09:29	ELN
Wet Chemistry by Method 9056A	WG1176733	50	10/11/18 12:57	10/11/18 12:57	ELN

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

DUP-REST-05 L1032152-35 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 12:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:21	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:30	ST
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 21:18	JPD
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/12/18 11:43	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1178046	1	10/09/18 14:50	10/09/18 14:50	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 05:18	10/08/18 05:18	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	1	10/10/18 11:10	10/11/18 18:07	TH

EB-REST-03 L1032152-36 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 11:05	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178376	1	10/10/18 18:05	10/10/18 18:38	MCG
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:55	10/11/18 13:55	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 09:39	10/11/18 09:39	ELN
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 21:23	JPD
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/12/18 11:48	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1178046	1	10/09/18 15:13	10/09/18 15:13	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 05:37	10/08/18 05:37	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	1	10/10/18 11:10	10/11/18 18:27	TH

EB-REST-04 L1032152-37 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 11:15	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178376	1	10/10/18 18:05	10/10/18 18:38	JER
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:56	10/11/18 13:56	JER
Wet Chemistry by Method 4500CN E-2011	WG1179442	1	10/11/18 15:31	10/12/18 18:01	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 11:59	10/11/18 11:59	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:23	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:33	ST
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 21:28	JPD
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/12/18 11:52	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1178046	1	10/09/18 15:36	10/09/18 15:36	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 05:57	10/08/18 05:57	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	1	10/10/18 11:10	10/11/18 18:47	TH

EB-REST-05 L1032152-38 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:30	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178376	1	10/10/18 18:05	10/10/18 18:38	JER
Wet Chemistry by Method 353.2	WG1178873	1	10/11/18 13:58	10/11/18 13:58	JER
Wet Chemistry by Method 4500CN E-2011	WG1179898	1	10/12/18 08:29	10/12/18 16:14	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 10:37	10/11/18 10:37	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:26	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:36	ST
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 21:32	JPD
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/12/18 11:56	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1178046	1	10/09/18 15:59	10/09/18 15:59	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 06:17	10/08/18 06:17	JCP
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	1	10/10/18 11:10	10/11/18 19:07	TH

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

TRIP BLANK-REST-01 L1032152-39 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 00:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 00:02	10/08/18 00:02	JCP

TRIP BLANK-REST-02 L1032152-40 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 00:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177336	1	10/08/18 00:21	10/08/18 00:21	JCP

TRIP BLANK-REST-03 L1032152-41 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 00:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177440	1	10/08/18 02:01	10/08/18 02:01	JCP

TRIP BLANK-REST-04 L1032152-42 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 00:00	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177440	1	10/08/18 02:22	10/08/18 02:22	JCP

MW-43 L1032152-43 GW

Collected by	Collected date/time	Received date/time
Scott Ude	10/03/18 13:05	10/05/18 08:45

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst
Gravimetric Analysis by Method 2540 C-2011	WG1178376	1	10/10/18 18:05	10/10/18 18:38	JER
Wet Chemistry by Method 353.2	WG1178873	50	10/11/18 14:01	10/11/18 14:01	JER
Wet Chemistry by Method 4500CN E-2011	WG1179898	100	10/12/18 08:29	10/12/18 16:15	JER
Wet Chemistry by Method 9056A	WG1176733	1	10/11/18 10:46	10/11/18 10:46	ELN
Wet Chemistry by Method 9056A	WG1176733	20	10/11/18 10:56	10/11/18 10:56	ELN
Mercury by Method 7470A	WG1177220	1	10/08/18 10:39	10/10/18 08:28	ABL
Metals (ICP) by Method 6010B	WG1176839	1	10/09/18 11:37	10/09/18 14:44	ST
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/11/18 21:37	JPD
Metals (ICPMS) by Method 6020	WG1176863	1	10/10/18 09:12	10/12/18 12:01	WBD
Volatile Organic Compounds (GC) by Method 8015D/GRO	WG1178046	20	10/09/18 16:22	10/09/18 16:22	LRL
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1177440	50	10/08/18 06:37	10/08/18 06:37	JCP
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1179752	500	10/11/18 19:34	10/11/18 19:34	BMB
Semi-Volatile Organic Compounds (GC) by Method 3511/8015	WG1178290	1	10/10/18 11:10	10/11/18 19:28	TH

CASE NARRATIVE

All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris McCord
Project Manager

Project Narrative

TDS is reporting with low biased LCS failures on L1032152-01, -02, -03. The samples were reprepped outside of the 7-day hold time and had confirming results with passing QC. The in-hold results are reporting. L1032152-04 is reporting the out of hold results due to the results not confirming.

Sample Handling and Receiving

The following analysis were performed from an unpreserved, insufficiently or inadequately preserved sample.

Lab Sample ID	Project Sample ID	Method
L1032152-43	MW-43	4500CN E-2011

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1730	J4	14.1	50.0	1	10/10/2018 20:18	WG1178370

Sample Narrative:

L1032152-01 WG1178370: Results confirmed

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.394	2.00	20	10/10/2018 23:29	WG1178871

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	498		1.04	20.0	20	10/10/2018 00:56	WG1176732
Fluoride	1.20		0.00990	0.100	1	10/10/2018 00:47	WG1176732
Sulfate	125		1.55	100	20	10/10/2018 00:56	WG1176732

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00561		0.000250	0.00200	1	10/12/2018 12:36	WG1176862
Barium	1.13	V	0.000360	0.00500	1	10/12/2018 12:36	WG1176862
Calcium	172	V	0.0460	1.00	1	10/12/2018 12:36	WG1176862
Chromium	0.00119	J	0.000540	0.00200	1	10/12/2018 12:36	WG1176862
Iron	0.231		0.0150	0.100	1	10/12/2018 12:36	WG1176862
Lead	0.00268		0.000240	0.00200	1	10/12/2018 12:36	WG1176862
Manganese	0.347		0.000250	0.00500	1	10/12/2018 12:36	WG1176862
Potassium	0.863	J	0.0370	1.00	1	10/12/2018 12:36	WG1176862
Selenium	0.00132	J	0.000380	0.00200	1	10/12/2018 12:36	WG1176862
Sodium	293	V	0.110	1.00	1	10/12/2018 12:36	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	21.8		0.314	1.00	10	10/09/2018 11:34	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*102*			*78.0-120*		*10/09/2018 11:34*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U	J3	2.50	12.5	250	10/07/2018 14:57	WG1177306
Benzene	7.97		0.0828	0.250	250	10/07/2018 14:57	WG1177306
Bromodichloromethane	U		0.0950	0.250	250	10/07/2018 14:57	WG1177306
Bromoform	U		0.117	0.250	250	10/07/2018 14:57	WG1177306
Bromomethane	U		0.216	1.25	250	10/07/2018 14:57	WG1177306
n-Butylbenzene	U		0.0902	0.250	250	10/07/2018 14:57	WG1177306
sec-Butylbenzene	U		0.0912	0.250	250	10/07/2018 14:57	WG1177306
Carbon disulfide	U		0.0688	0.250	250	10/07/2018 14:57	WG1177306
Carbon tetrachloride	U		0.0948	0.250	250	10/07/2018 14:57	WG1177306
Chlorobenzene	U		0.0870	0.250	250	10/07/2018 14:57	WG1177306
Chlorodibromomethane	U		0.0818	0.250	250	10/07/2018 14:57	WG1177306
Chloroethane	U		0.113	1.25	250	10/07/2018 14:57	WG1177306
Chloroform	U		0.0810	1.25	250	10/07/2018 14:57	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.0690	0.625	250	10/07/2018 14:57	WG1177306
1,2-Dibromoethane	U		0.0952	0.250	250	10/07/2018 14:57	WG1177306
1,1-Dichloroethane	U		0.0648	0.250	250	10/07/2018 14:57	WG1177306
1,2-Dichloroethane	U		0.0902	0.250	250	10/07/2018 14:57	WG1177306
1,1-Dichloroethene	U		0.0995	0.250	250	10/07/2018 14:57	WG1177306
cis-1,2-Dichloroethene	U		0.0650	0.250	250	10/07/2018 14:57	WG1177306
trans-1,2-Dichloroethene	U		0.0990	0.250	250	10/07/2018 14:57	WG1177306
1,2-Dichloropropane	U		0.0765	0.250	250	10/07/2018 14:57	WG1177306
cis-1,3-Dichloropropene	U		0.104	0.250	250	10/07/2018 14:57	WG1177306
trans-1,3-Dichloropropene	U		0.105	0.250	250	10/07/2018 14:57	WG1177306
Ethylbenzene	0.479		0.0960	0.250	250	10/07/2018 14:57	WG1177306
Isopropylbenzene	0.0962	J	0.0815	0.250	250	10/07/2018 14:57	WG1177306
p-Isopropyltoluene	U		0.0875	0.250	250	10/07/2018 14:57	WG1177306
2-Butanone (MEK)	U	J3 J4	0.982	2.50	250	10/07/2018 14:57	WG1177306
2-Hexanone	U		0.955	2.50	250	10/07/2018 14:57	WG1177306
Methylene Chloride	U		0.250	1.25	250	10/07/2018 14:57	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.535	2.50	250	10/07/2018 14:57	WG1177306
Methyl tert-butyl ether	0.611		0.0918	0.250	250	10/07/2018 14:57	WG1177306
Naphthalene	U		0.250	1.25	250	10/07/2018 14:57	WG1177306
n-Propylbenzene	0.145	J	0.0872	0.250	250	10/07/2018 14:57	WG1177306
Styrene	U		0.0768	0.250	250	10/07/2018 14:57	WG1177306
1,1,1,2-Tetrachloroethane	U		0.0962	0.250	250	10/07/2018 14:57	WG1177306
1,1,2,2-Tetrachloroethane	U		0.0325	0.250	250	10/07/2018 14:57	WG1177306
Tetrachloroethene	U		0.0930	0.250	250	10/07/2018 14:57	WG1177306
Toluene	U		0.103	0.250	250	10/07/2018 14:57	WG1177306
1,1,1-Trichloroethane	U		0.0798	0.250	250	10/07/2018 14:57	WG1177306
1,1,2-Trichloroethane	U		0.0958	0.250	250	10/07/2018 14:57	WG1177306
Trichloroethene	U		0.0995	0.250	250	10/07/2018 14:57	WG1177306
1,2,4-Trimethylbenzene	0.377		0.0932	0.250	250	10/07/2018 14:57	WG1177306
1,3,5-Trimethylbenzene	U		0.0968	0.250	250	10/07/2018 14:57	WG1177306
Vinyl chloride	U	J3	0.0648	0.250	250	10/07/2018 14:57	WG1177306
o-Xylene	U		0.0852	0.250	250	10/07/2018 14:57	WG1177306
m&p-Xylene	0.358	J	0.180	0.500	250	10/07/2018 14:57	WG1177306
Xylenes, Total	0.358	J	0.265	0.750	250	10/07/2018 14:57	WG1177306
(S) Toluene-d8	*98.6*			*80.0-120*		*10/07/2018 14:57*	WG1177306
(S) Dibromofluoromethane	*106*			*75.0-120*		*10/07/2018 14:57*	WG1177306
(S) 4-Bromofluorobenzene	*106*			*77.0-126*		*10/07/2018 14:57*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	5.56		0.0247	0.100	1	10/12/2018 06:55	WG1178287
(S) o-Terphenyl	*86.8*			*31.0-160*		*10/12/2018 06:55*	WG1178287

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2020	J4	14.1	50.0	1	10/10/2018 20:18	WG1178370

Sample Narrative:

L1032152-02 WG1178370: Results confirmed

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	1.97		0.0197	0.100	1	10/10/2018 23:30	WG1178871

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	237		0.519	10.0	10	10/10/2018 01:35	WG1176732
Fluoride	0.792		0.00990	0.100	1	10/10/2018 01:06	WG1176732
Sulfate	985		0.774	50.0	10	10/10/2018 01:35	WG1176732

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00341		0.000250	0.00200	1	10/12/2018 12:54	WG1176862
Barium	0.0159		0.000360	0.00500	1	10/12/2018 12:54	WG1176862
Calcium	239		0.0460	1.00	1	10/12/2018 12:54	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 12:54	WG1176862
Iron	0.0289	J	0.0150	0.100	1	10/12/2018 12:54	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 12:54	WG1176862
Manganese	0.0888		0.000250	0.00500	1	10/12/2018 12:54	WG1176862
Potassium	0.611	J	0.0370	1.00	1	10/12/2018 12:54	WG1176862
Selenium	0.00722		0.000380	0.00200	1	10/12/2018 12:54	WG1176862
Sodium	273		0.110	1.00	1	10/12/2018 12:54	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 21:03	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 21:03*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 15:17	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 15:17	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 15:17	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 15:17	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 15:17	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 15:17	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 15:17	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 15:17	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 15:17	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 15:17	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 15:17	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 15:17	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 15:17	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.000276	0.00250	1	10/07/2018 15:17	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 15:17	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 15:17	WG1177306
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 15:17	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 15:17	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 15:17	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 15:17	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 15:17	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 15:17	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 15:17	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 15:17	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 15:17	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 15:17	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 15:17	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 15:17	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 15:17	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 15:17	WG1177306
Methyl tert-butyl ether	0.000976	J	0.000367	0.00100	1	10/07/2018 15:17	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 15:17	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 15:17	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 15:17	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 15:17	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 15:17	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 15:17	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 15:17	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 15:17	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 15:17	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 15:17	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 15:17	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 15:17	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 15:17	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 15:17	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 15:17	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 15:17	WG1177306
(S) Toluene-d8	*102*			*80.0-120*		*10/07/2018 15:17*	WG1177306
(S) Dibromofluoromethane	*108*			*75.0-120*		*10/07/2018 15:17*	WG1177306
(S) 4-Bromofluorobenzene	*95.5*			*77.0-126*		*10/07/2018 15:17*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.945		0.0247	0.100	1	10/12/2018 07:13	WG1178287
(S) o-Terphenyl	*81.6*			*31.0-160*		*10/12/2018 07:13*	WG1178287

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2420	J4	14.1	50.0	1	10/10/2018 20:18	WG1178370

Sample Narrative:

L1032152-03 WG1178370: Results confirmed

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	4.22		0.0394	0.200	2	10/10/2018 23:33	WG1178871

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/12/2018 17:50	WG1179442

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	115		0.519	10.0	10	10/10/2018 01:55	WG1176732
Fluoride	1.81		0.00990	0.100	1	10/10/2018 01:45	WG1176732
Sulfate	983		0.774	50.0	10	10/10/2018 01:55	WG1176732

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 07:49	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.723		0.0126	0.200	1	10/09/2018 13:58	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00321		0.000250	0.00200	1	10/12/2018 12:59	WG1176862
Barium	0.00897		0.000360	0.00500	1	10/12/2018 12:59	WG1176862
Cadmium	U		0.000160	0.00100	1	10/12/2018 12:59	WG1176862
Calcium	175		0.0460	1.00	1	10/12/2018 12:59	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 12:59	WG1176862
Cobalt	0.000271	J	0.000260	0.00200	1	10/12/2018 12:59	WG1176862
Iron	U		0.0150	0.100	1	10/12/2018 12:59	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 12:59	WG1176862
Manganese	0.0433		0.000250	0.00500	1	10/12/2018 12:59	WG1176862
Nickel	0.00504		0.000350	0.00200	1	10/12/2018 12:59	WG1176862
Potassium	0.209	J	0.0370	1.00	1	10/12/2018 12:59	WG1176862
Selenium	0.00221		0.000380	0.00200	1	10/12/2018 12:59	WG1176862
Sodium	272		0.110	1.00	1	10/12/2018 12:59	WG1176862
Uranium	0.00888	J	0.000330	0.0100	1	10/12/2018 12:59	WG1176862
Vanadium	0.0232		0.000180	0.00500	1	10/12/2018 12:59	WG1176862

SAMPLE RESULTS - 03

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 21:32	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 21:32*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 15:36	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 15:36	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 15:36	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 15:36	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 15:36	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 15:36	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 15:36	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 15:36	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 15:36	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 15:36	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 15:36	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 15:36	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 15:36	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 15:36	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 15:36	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 15:36	WG1177306
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 15:36	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 15:36	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 15:36	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 15:36	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 15:36	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 15:36	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 15:36	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 15:36	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 15:36	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 15:36	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 15:36	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 15:36	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 15:36	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 15:36	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 15:36	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 15:36	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 15:36	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 15:36	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 15:36	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 15:36	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 15:36	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 15:36	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 15:36	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 15:36	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 15:36	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 15:36	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 15:36	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 15:36	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 15:36	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 15:36	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 15:36	WG1177306
(S) Toluene-d8	*97.8*			*80.0-120*		*10/07/2018 15:36*	WG1177306
(S) Dibromofluoromethane	*104*			*75.0-120*		*10/07/2018 15:36*	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) 4-Bromofluorobenzene	*97.9*			*77.0-126*		*10/07/2018 15:36*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.269		0.0247	0.100	1	10/12/2018 07:30	WG1178287
(S) o-Terphenyl	*81.6*			*31.0-160*		*10/12/2018 07:30*	WG1178287

MW-109

Collected date/time: 10/03/18 14:10

SAMPLE RESULTS - 04

L1032152

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2160	Q	14.1	50.0	1	10/16/2018 20:22	WG1180540

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.108	J6	0.0197	0.100	1	10/10/2018 23:35	WG1178871

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	177		0.519	10.0	10	10/10/2018 02:14	WG1176732
Fluoride	2.23		0.00990	0.100	1	10/10/2018 02:04	WG1176732
Sulfate	764		0.774	50.0	10	10/10/2018 02:14	WG1176732

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00162	J	0.000250	0.00200	1	10/12/2018 13:23	WG1176862
Barium	0.0472		0.000360	0.00500	1	10/12/2018 13:23	WG1176862
Calcium	147		0.0460	1.00	1	10/12/2018 13:23	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 13:23	WG1176862
Iron	0.0416	J	0.0150	0.100	1	10/12/2018 13:23	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 13:23	WG1176862
Manganese	0.0340		0.000250	0.00500	1	10/12/2018 13:23	WG1176862
Potassium	0.906	J	0.0370	1.00	1	10/12/2018 13:23	WG1176862
Selenium	0.000401	J	0.000380	0.00200	1	10/12/2018 13:23	WG1176862
Sodium	373		0.110	1.00	1	10/12/2018 13:23	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	6.56		0.628	2.00	20	10/09/2018 11:55	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*102*			*78.0-120*		*10/09/2018 11:55*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.200	1.00	20	10/07/2018 15:56	WG1177306
Benzene	1.64		0.00662	0.0200	20	10/07/2018 15:56	WG1177306
Bromodichloromethane	U		0.00760	0.0200	20	10/07/2018 15:56	WG1177306
Bromoform	U		0.00938	0.0200	20	10/07/2018 15:56	WG1177306
Bromomethane	U		0.0173	0.100	20	10/07/2018 15:56	WG1177306
n-Butylbenzene	U		0.00722	0.0200	20	10/07/2018 15:56	WG1177306
sec-Butylbenzene	0.00812	J	0.00730	0.0200	20	10/07/2018 15:56	WG1177306
Carbon disulfide	U		0.00550	0.0200	20	10/07/2018 15:56	WG1177306
Carbon tetrachloride	U		0.00758	0.0200	20	10/07/2018 15:56	WG1177306
Chlorobenzene	U		0.00696	0.0200	20	10/07/2018 15:56	WG1177306
Chlorodibromomethane	U		0.00654	0.0200	20	10/07/2018 15:56	WG1177306
Chloroethane	U		0.00906	0.100	20	10/07/2018 15:56	WG1177306
Chloroform	U		0.00648	0.100	20	10/07/2018 15:56	WG1177306
Chloromethane	U		0.00552	0.0500	20	10/07/2018 15:56	WG1177306
1,2-Dibromoethane	U		0.00762	0.0200	20	10/07/2018 15:56	WG1177306
1,1-Dichloroethane	U		0.00518	0.0200	20	10/07/2018 15:56	WG1177306

MW-109

Collected date/time: 10/03/18 14:10

SAMPLE RESULTS - 04

L1032152

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.00722	0.0200	20	10/07/2018 15:56	WG1177306
1,1-Dichloroethene	U		0.00796	0.0200	20	10/07/2018 15:56	WG1177306
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	10/07/2018 15:56	WG1177306
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	10/07/2018 15:56	WG1177306
1,2-Dichloropropane	U		0.00612	0.0200	20	10/07/2018 15:56	WG1177306
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	10/07/2018 15:56	WG1177306
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	10/07/2018 15:56	WG1177306
Ethylbenzene	0.0111	J	0.00768	0.0200	20	10/07/2018 15:56	WG1177306
Isopropylbenzene	0.0639		0.00652	0.0200	20	10/07/2018 15:56	WG1177306
p-Isopropyltoluene	U		0.00700	0.0200	20	10/07/2018 15:56	WG1177306
2-Butanone (MEK)	U	J3 J4	0.0786	0.200	20	10/07/2018 15:56	WG1177306
2-Hexanone	U		0.0764	0.200	20	10/07/2018 15:56	WG1177306
Methylene Chloride	U		0.0200	0.100	20	10/07/2018 15:56	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	10/07/2018 15:56	WG1177306
Methyl tert-butyl ether	U		0.00734	0.0200	20	10/07/2018 15:56	WG1177306
Naphthalene	U		0.0200	0.100	20	10/07/2018 15:56	WG1177306
n-Propylbenzene	0.0670		0.00698	0.0200	20	10/07/2018 15:56	WG1177306
Styrene	U		0.00614	0.0200	20	10/07/2018 15:56	WG1177306
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	10/07/2018 15:56	WG1177306
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	10/07/2018 15:56	WG1177306
Tetrachloroethene	U		0.00744	0.0200	20	10/07/2018 15:56	WG1177306
Toluene	0.0204		0.00824	0.0200	20	10/07/2018 15:56	WG1177306
1,1,1-Trichloroethane	U		0.00638	0.0200	20	10/07/2018 15:56	WG1177306
1,1,2-Trichloroethane	U		0.00766	0.0200	20	10/07/2018 15:56	WG1177306
Trichloroethene	U		0.00796	0.0200	20	10/07/2018 15:56	WG1177306
1,2,4-Trimethylbenzene	U		0.00746	0.0200	20	10/07/2018 15:56	WG1177306
1,3,5-Trimethylbenzene	U		0.00774	0.0200	20	10/07/2018 15:56	WG1177306
Vinyl chloride	U	J3	0.00518	0.0200	20	10/07/2018 15:56	WG1177306
o-Xylene	U		0.00682	0.0200	20	10/07/2018 15:56	WG1177306
m&p-Xylene	0.0220	J	0.0144	0.0400	20	10/07/2018 15:56	WG1177306
Xylenes, Total	0.0220	J	0.0212	0.0600	20	10/07/2018 15:56	WG1177306
(S) Toluene-d8	*103*			*80.0-120*		*10/07/2018 15:56*	WG1177306
(S) Dibromofluoromethane	*106*			*75.0-120*		*10/07/2018 15:56*	WG1177306
(S) 4-Bromofluorobenzene	*99.8*			*77.0-126*		*10/07/2018 15:56*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	3.76		0.0247	0.100	1	10/12/2018 07:47	WG1178287
(S) o-Terphenyl	*88.9*			*31.0-160*		*10/12/2018 07:47*	WG1178287

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1390		7.05	25.0	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 23:38	WG1178871

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	113		0.260	5.00	5	10/10/2018 02:33	WG1176732
Fluoride	1.38		0.00990	0.100	1	10/10/2018 02:23	WG1176732
Sulfate	499		0.774	50.0	10	10/10/2018 11:41	WG1176732

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0231		0.000250	0.00200	1	10/12/2018 13:28	WG1176862
Barium	0.0674		0.000360	0.00500	1	10/12/2018 13:28	WG1176862
Calcium	112		0.0460	1.00	1	10/12/2018 13:28	WG1176862
Chromium	0.00155	J	0.000540	0.00200	1	10/12/2018 13:28	WG1176862
Iron	1.32		0.0150	0.100	1	10/12/2018 13:28	WG1176862
Lead	0.00118	J	0.000240	0.00200	1	10/12/2018 13:28	WG1176862
Manganese	1.60		0.000250	0.00500	1	10/12/2018 13:28	WG1176862
Potassium	0.367	J	0.0370	1.00	1	10/12/2018 13:28	WG1176862
Selenium	U		0.000380	0.00200	1	10/12/2018 13:28	WG1176862
Sodium	268		0.110	1.00	1	10/12/2018 13:28	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.377		0.0314	0.100	1	10/08/2018 21:55	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*99.8*			*78.0-120*		*10/08/2018 21:55*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 16:16	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 16:16	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 16:16	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 16:16	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 16:16	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 16:16	WG1177306
sec-Butylbenzene	0.00300		0.000365	0.00100	1	10/07/2018 16:16	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 16:16	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 16:16	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 16:16	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 16:16	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 16:16	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 16:16	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 16:16	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 16:16	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 16:16	WG1177306

MW-110

Collected date/time: 10/03/18 15:15

SAMPLE RESULTS - 05

L1032152

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 16:16	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 16:16	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 16:16	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 16:16	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 16:16	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 16:16	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 16:16	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 16:16	WG1177306
Isopropylbenzene	0.00680		0.000326	0.00100	1	10/07/2018 16:16	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 16:16	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 16:16	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 16:16	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 16:16	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 16:16	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 16:16	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 16:16	WG1177306
n-Propylbenzene	0.00579		0.000349	0.00100	1	10/07/2018 16:16	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 16:16	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 16:16	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 16:16	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 16:16	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 16:16	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 16:16	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 16:16	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 16:16	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 16:16	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 16:16	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 16:16	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 16:16	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 16:16	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 16:16	WG1177306
(S) Toluene-d8	*99.4*			*80.0-120*		*10/07/2018 16:16*	WG1177306
(S) Dibromofluoromethane	*106*			*75.0-120*		*10/07/2018 16:16*	WG1177306
(S) 4-Bromofluorobenzene	*97.6*			*77.0-126*		*10/07/2018 16:16*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.774		0.0247	0.100	1	10/12/2018 08:05	WG1178287
(S) o-Terphenyl	*81.1*			*31.0-160*		*10/12/2018 08:05*	WG1178287

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	5090		28.2	100	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	3.83		0.0394	0.200	2	10/10/2018 23:45	WG1178871

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	392		1.04	20.0	20	10/10/2018 02:52	WG1176732
Fluoride	0.956		0.00990	0.100	1	10/10/2018 02:43	WG1176732
Sulfate	1950		3.87	250	50	10/10/2018 11:50	WG1176732

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00394		0.000250	0.00200	1	10/12/2018 13:32	WG1176862
Barium	0.00921		0.000360	0.00500	1	10/12/2018 13:32	WG1176862
Calcium	514		0.0460	1.00	1	10/12/2018 13:32	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 13:32	WG1176862
Iron	U		0.0150	0.100	1	10/12/2018 13:32	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 13:32	WG1176862
Manganese	0.0119		0.000250	0.00500	1	10/12/2018 13:32	WG1176862
Potassium	1.50		0.0370	1.00	1	10/12/2018 13:32	WG1176862
Selenium	0.00564		0.000380	0.00200	1	10/12/2018 13:32	WG1176862
Sodium	243		0.110	1.00	1	10/12/2018 13:32	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 22:18	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 22:18*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 16:36	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 16:36	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 16:36	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 16:36	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 16:36	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 16:36	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 16:36	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 16:36	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 16:36	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 16:36	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 16:36	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 16:36	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 16:36	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 16:36	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 16:36	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 16:36	WG1177306

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 16:36	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 16:36	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 16:36	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 16:36	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 16:36	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 16:36	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 16:36	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 16:36	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 16:36	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 16:36	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 16:36	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 16:36	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 16:36	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 16:36	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 16:36	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 16:36	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 16:36	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 16:36	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 16:36	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 16:36	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 16:36	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 16:36	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 16:36	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 16:36	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 16:36	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 16:36	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 16:36	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 16:36	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 16:36	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 16:36	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 16:36	WG1177306
(S) Toluene-d8	*101*			*80.0-120*		*10/07/2018 16:36*	WG1177306
(S) Dibromofluoromethane	*104*			*75.0-120*		*10/07/2018 16:36*	WG1177306
(S) 4-Bromofluorobenzene	*99.5*			*77.0-126*		*10/07/2018 16:36*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	0.0547	J	0.0247	0.100	1	10/12/2018 08:22	WG1178287
(S) o-Terphenyl	*75.8*			*31.0-160*		*10/12/2018 08:22*	WG1178287

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2110		7.05	25.0	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	1.16		0.0197	0.100	1	10/10/2018 23:47	WG1178871

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	110		0.519	10.0	10	10/10/2018 03:31	WG1176732
Fluoride	0.317		0.00990	0.100	1	10/10/2018 03:02	WG1176732
Sulfate	1270		3.87	250	50	10/12/2018 00:47	WG1179051

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Calcium	335		0.0460	1.00	1	10/12/2018 13:37	WG1176862
Potassium	1.97		0.0370	1.00	1	10/12/2018 13:37	WG1176862
Sodium	83.1		0.110	1.00	1	10/12/2018 13:37	WG1176862

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 16:55	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 16:55	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 16:55	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 16:55	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 16:55	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 16:55	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 16:55	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 16:55	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 16:55	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 16:55	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 16:55	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 16:55	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 16:55	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 16:55	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 16:55	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 16:55	WG1177306
1,2-Dichloroethane	0.000981	J	0.000361	0.00100	1	10/07/2018 16:55	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 16:55	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 16:55	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 16:55	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 16:55	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 16:55	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 16:55	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 16:55	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 16:55	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 16:55	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 16:55	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 16:55	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 16:55	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 16:55	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Methyl tert-butyl ether	0.00788		0.000367	0.00100	1	10/07/2018 16:55	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 16:55	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 16:55	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 16:55	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 16:55	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 16:55	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 16:55	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 16:55	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 16:55	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 16:55	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 16:55	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 16:55	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 16:55	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 16:55	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 16:55	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 16:55	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 16:55	WG1177306
(S) Toluene-d8	*99.7*			*80.0-120*		*10/07/2018 16:55*	WG1177306
(S) Dibromofluoromethane	*101*			*75.0-120*		*10/07/2018 16:55*	WG1177306
(S) 4-Bromofluorobenzene	*98.7*			*77.0-126*		*10/07/2018 16:55*	WG1177306

RA-4196

Collected date/time: 10/03/18 12:20

SAMPLE RESULTS - 08

L1032152

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1960		14.1	50.0	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 23:48	WG1178871

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	119		0.519	10.0	10	10/10/2018 03:50	WG1176732
Fluoride	0.291		0.00990	0.100	1	10/10/2018 03:41	WG1176732
Sulfate	935		1.55	100	20	10/10/2018 12:00	WG1176732

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Calcium	345		0.0460	1.00	1	10/12/2018 13:42	WG1176862
Potassium	1.98		0.0370	1.00	1	10/12/2018 13:42	WG1176862
Sodium	90.5		0.110	1.00	1	10/12/2018 13:42	WG1176862

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 17:15	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 17:15	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 17:15	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 17:15	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 17:15	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 17:15	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 17:15	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 17:15	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 17:15	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 17:15	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 17:15	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 17:15	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 17:15	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 17:15	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 17:15	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 17:15	WG1177306
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 17:15	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 17:15	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 17:15	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 17:15	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 17:15	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 17:15	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 17:15	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 17:15	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 17:15	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 17:15	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 17:15	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 17:15	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 17:15	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 17:15	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Methyl tert-butyl ether	0.00753		0.000367	0.00100	1	10/07/2018 17:15	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 17:15	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 17:15	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 17:15	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 17:15	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 17:15	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 17:15	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 17:15	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 17:15	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 17:15	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 17:15	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 17:15	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 17:15	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 17:15	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 17:15	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 17:15	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 17:15	WG1177306
(S) Toluene-d8	*100*			*80.0-120*		*10/07/2018 17:15*	WG1177306
(S) Dibromofluoromethane	*102*			*75.0-120*		*10/07/2018 17:15*	WG1177306
(S) 4-Bromofluorobenzene	*97.8*			*77.0-126*		*10/07/2018 17:15*	WG1177306

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4410		14.1	50.0	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.325		0.0197	0.100	1	10/10/2018 23:50	WG1178871

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	231		1.04	20.0	20	10/10/2018 04:10	WG1176732
Fluoride	1.47		0.00990	0.100	1	10/10/2018 04:00	WG1176732
Sulfate	1720		3.87	250	50	10/10/2018 12:10	WG1176732

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00298		0.000250	0.00200	1	10/12/2018 13:46	WG1176862
Barium	0.00719		0.000360	0.00500	1	10/12/2018 13:46	WG1176862
Calcium	397		0.0460	1.00	1	10/12/2018 13:46	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 13:46	WG1176862
Iron	U		0.0150	0.100	1	10/12/2018 13:46	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 13:46	WG1176862
Manganese	0.0425		0.000250	0.00500	1	10/12/2018 13:46	WG1176862
Potassium	0.549	J	0.0370	1.00	1	10/12/2018 13:46	WG1176862
Selenium	0.00413		0.000380	0.00200	1	10/12/2018 13:46	WG1176862
Sodium	191		0.110	1.00	1	10/12/2018 13:46	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 22:41	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 22:41*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 17:35	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 17:35	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 17:35	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 17:35	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 17:35	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 17:35	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 17:35	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 17:35	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 17:35	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 17:35	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 17:35	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 17:35	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 17:35	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 17:35	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 17:35	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 17:35	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 17:35	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 17:35	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 17:35	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 17:35	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 17:35	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 17:35	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 17:35	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 17:35	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 17:35	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 17:35	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 17:35	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 17:35	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 17:35	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 17:35	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 17:35	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 17:35	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 17:35	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 17:35	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 17:35	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 17:35	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 17:35	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 17:35	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 17:35	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 17:35	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 17:35	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 17:35	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 17:35	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 17:35	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 17:35	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 17:35	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 17:35	WG1177306
(S) Toluene-d8	*99.4*			*80.0-120*		*10/07/2018 17:35*	WG1177306
(S) Dibromofluoromethane	*99.4*			*75.0-120*		*10/07/2018 17:35*	WG1177306
(S) 4-Bromofluorobenzene	*98.8*			*77.0-126*		*10/07/2018 17:35*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	10/12/2018 22:08	WG1178288
(S) o-Terphenyl	*70.0*			*31.0-160*		*10/12/2018 22:08*	WG1178288

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3730		14.1	50.0	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.395		0.0197	0.100	1	10/10/2018 23:51	WG1178871

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	207		1.04	20.0	20	10/10/2018 04:29	WG1176732
Fluoride	1.77		0.00990	0.100	1	10/10/2018 04:19	WG1176732
Sulfate	1050		3.87	250	50	10/10/2018 12:19	WG1176732

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00225		0.000250	0.00200	1	10/12/2018 13:51	WG1176862
Barium	0.0133		0.000360	0.00500	1	10/12/2018 13:51	WG1176862
Calcium	581		0.0460	1.00	1	10/12/2018 13:51	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 13:51	WG1176862
Iron	U		0.0150	0.100	1	10/12/2018 13:51	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 13:51	WG1176862
Manganese	0.867		0.000250	0.00500	1	10/12/2018 13:51	WG1176862
Potassium	2.46		0.0370	1.00	1	10/12/2018 13:51	WG1176862
Selenium	0.00985		0.000380	0.00200	1	10/12/2018 13:51	WG1176862
Sodium	117		0.110	1.00	1	10/12/2018 13:51	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 23:04	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 23:04*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 17:54	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 17:54	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 17:54	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 17:54	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 17:54	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 17:54	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 17:54	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 17:54	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 17:54	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 17:54	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 17:54	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 17:54	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 17:54	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 17:54	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 17:54	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 17:54	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 17:54	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 17:54	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 17:54	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 17:54	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 17:54	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 17:54	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 17:54	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 17:54	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 17:54	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 17:54	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 17:54	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 17:54	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 17:54	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 17:54	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 17:54	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 17:54	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 17:54	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 17:54	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 17:54	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 17:54	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 17:54	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 17:54	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 17:54	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 17:54	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 17:54	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 17:54	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 17:54	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 17:54	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 17:54	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 17:54	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 17:54	WG1177306
(S) Toluene-d8	*98.0*			*80.0-120*		*10/07/2018 17:54*	WG1177306
(S) Dibromofluoromethane	*107*			*75.0-120*		*10/07/2018 17:54*	WG1177306
(S) 4-Bromofluorobenzene	*106*			*77.0-126*		*10/07/2018 17:54*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	10/12/2018 22:25	WG1178288
(S) o-Terphenyl	*72.1*			*31.0-160*		*10/12/2018 22:25*	WG1178288

MW-117

Collected date/time: 10/03/18 09:35

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3500		14.1	50.0	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.102		0.0197	0.100	1	10/10/2018 23:53	WG1178871

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	327		1.04	20.0	20	10/10/2018 04:48	WG1176732
Fluoride	2.78		0.00990	0.100	1	10/10/2018 04:39	WG1176732
Sulfate	1940		1.55	100	20	10/10/2018 04:48	WG1176732

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00224		0.000250	0.00200	1	10/12/2018 13:55	WG1176862
Barium	0.00996		0.000360	0.00500	1	10/12/2018 13:55	WG1176862
Calcium	577		0.0460	1.00	1	10/12/2018 13:55	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 13:55	WG1176862
Iron	0.0302	J	0.0150	0.100	1	10/12/2018 13:55	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 13:55	WG1176862
Manganese	0.000557	J	0.000250	0.00500	1	10/12/2018 13:55	WG1176862
Potassium	6.12		0.0370	1.00	1	10/12/2018 13:55	WG1176862
Selenium	0.0121		0.000380	0.00200	1	10/12/2018 13:55	WG1176862
Sodium	105		0.110	1.00	1	10/12/2018 13:55	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 23:27	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*		*10/08/2018 23:27*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 18:14	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 18:14	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 18:14	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 18:14	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 18:14	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 18:14	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 18:14	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 18:14	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 18:14	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 18:14	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 18:14	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 18:14	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 18:14	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 18:14	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 18:14	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 18:14	WG1177306

MW-117

Collected date/time: 10/03/18 09:35

SAMPLE RESULTS - 11

L1032152

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 18:14	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 18:14	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 18:14	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 18:14	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 18:14	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 18:14	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 18:14	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 18:14	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 18:14	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 18:14	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 18:14	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 18:14	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 18:14	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 18:14	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 18:14	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 18:14	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 18:14	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 18:14	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 18:14	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 18:14	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 18:14	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 18:14	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 18:14	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 18:14	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 18:14	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 18:14	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 18:14	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 18:14	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 18:14	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 18:14	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 18:14	WG1177306
(S) Toluene-d8	*102*			*80.0-120*		*10/07/2018 18:14*	WG1177306
(S) Dibromofluoromethane	*99.3*			*75.0-120*		*10/07/2018 18:14*	WG1177306
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/07/2018 18:14*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	U		0.0247	0.100	1	10/12/2018 22:43	WG1178288
(S) o-Terphenyl	*69.5*			*31.0-160*		*10/12/2018 22:43*	WG1178288

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	4120		14.1	50.0	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	1.88		0.0394	0.200	2	10/10/2018 23:54	WG1178871

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	259		1.04	20.0	20	10/10/2018 05:27	WG1176732
Fluoride	5.06		0.00990	0.100	1	10/10/2018 04:58	WG1176732
Sulfate	1730		3.87	250	50	10/10/2018 12:29	WG1176732

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0103		0.000250	0.00200	1	10/12/2018 14:00	WG1176862
Barium	0.00867		0.000360	0.00500	1	10/12/2018 14:00	WG1176862
Calcium	559		0.0460	1.00	1	10/12/2018 14:00	WG1176862
Chromium	0.000593	J	0.000540	0.00200	1	10/12/2018 14:00	WG1176862
Iron	0.0156	J	0.0150	0.100	1	10/12/2018 14:00	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 14:00	WG1176862
Manganese	0.000403	J	0.000250	0.00500	1	10/12/2018 14:00	WG1176862
Potassium	4.98		0.0370	1.00	1	10/12/2018 14:00	WG1176862
Selenium	0.00774		0.000380	0.00200	1	10/12/2018 14:00	WG1176862
Sodium	136		0.110	1.00	1	10/12/2018 14:00	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/08/2018 23:50	WG1177660
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/08/2018 23:50*	WG1177660

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 18:34	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 18:34	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 18:34	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 18:34	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 18:34	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 18:34	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 18:34	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 18:34	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 18:34	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 18:34	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 18:34	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 18:34	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 18:34	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 18:34	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 18:34	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 18:34	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 18:34	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 18:34	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 18:34	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 18:34	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 18:34	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 18:34	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 18:34	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 18:34	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 18:34	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 18:34	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 18:34	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 18:34	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 18:34	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 18:34	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 18:34	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 18:34	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 18:34	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 18:34	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 18:34	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 18:34	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 18:34	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 18:34	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 18:34	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 18:34	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 18:34	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 18:34	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 18:34	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 18:34	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 18:34	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 18:34	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 18:34	WG1177306
(S) Toluene-d8	*100*			*80.0-120*		*10/07/2018 18:34*	WG1177306
(S) Dibromofluoromethane	*102*			*75.0-120*		*10/07/2018 18:34*	WG1177306
(S) 4-Bromofluorobenzene	*98.2*			*77.0-126*		*10/07/2018 18:34*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0325	J	0.0247	0.100	1	10/12/2018 23:00	WG1178288
(S) o-Terphenyl	*74.2*			*31.0-160*		*10/12/2018 23:00*	WG1178288

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4200		14.1	50.0	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0610	J	0.0197	0.100	1	10/10/2018 23:56	WG1178871

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	439		1.04	20.0	20	10/10/2018 05:46	WG1176732
Fluoride	2.56		0.00990	0.100	1	10/10/2018 05:37	WG1176732
Sulfate	1390		3.87	250	50	10/10/2018 12:39	WG1176732

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00462		0.000250	0.00200	1	10/12/2018 14:20	WG1176862
Barium	0.0110		0.000360	0.00500	1	10/12/2018 14:20	WG1176862
Calcium	596		0.0460	1.00	1	10/12/2018 14:20	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 14:20	WG1176862
Iron	U		0.0150	0.100	1	10/12/2018 14:20	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 14:20	WG1176862
Manganese	0.00375	J	0.000250	0.00500	1	10/12/2018 14:20	WG1176862
Potassium	1.49		0.0370	1.00	1	10/12/2018 14:20	WG1176862
Selenium	0.00112	J	0.000380	0.00200	1	10/12/2018 14:20	WG1176862
Sodium	225		0.110	1.00	1	10/12/2018 14:20	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 12:16	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/09/2018 12:16*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 18:54	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 18:54	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 18:54	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 18:54	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 18:54	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 18:54	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 18:54	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 18:54	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 18:54	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 18:54	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 18:54	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 18:54	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 18:54	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 18:54	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 18:54	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 18:54	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 18:54	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 18:54	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 18:54	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 18:54	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 18:54	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 18:54	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 18:54	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 18:54	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 18:54	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 18:54	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 18:54	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 18:54	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 18:54	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 18:54	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 18:54	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 18:54	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 18:54	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 18:54	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 18:54	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 18:54	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 18:54	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 18:54	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 18:54	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 18:54	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 18:54	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 18:54	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 18:54	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 18:54	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 18:54	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 18:54	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 18:54	WG1177306
(S) Toluene-d8	*103*			*80.0-120*		*10/07/2018 18:54*	WG1177306
(S) Dibromofluoromethane	*109*			*75.0-120*		*10/07/2018 18:54*	WG1177306
(S) 4-Bromofluorobenzene	*96.6*			*77.0-126*		*10/07/2018 18:54*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0470	J	0.0247	0.100	1	10/12/2018 23:18	WG1178288
(S) o-Terphenyl	*70.0*			*31.0-160*		*10/12/2018 23:18*	WG1178288

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1680	J3	7.05	25.0	1	10/10/2018 20:27	WG1178371

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/10/2018 23:57	WG1178871

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	240		0.260	5.00	5	10/10/2018 06:25	WG1176732
Fluoride	0.801		0.00990	0.100	1	10/10/2018 05:56	WG1176732
Sulfate	324		0.387	25.0	5	10/10/2018 06:25	WG1176732

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00813		0.000250	0.00200	1	10/12/2018 14:24	WG1176862
Barium	0.0699		0.000360	0.00500	1	10/12/2018 14:24	WG1176862
Calcium	223		0.0460	1.00	1	10/12/2018 14:24	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 14:24	WG1176862
Iron	0.149		0.0150	0.100	1	10/12/2018 14:24	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 14:24	WG1176862
Manganese	1.91		0.000250	0.00500	1	10/12/2018 14:24	WG1176862
Potassium	0.230	J	0.0370	1.00	1	10/12/2018 14:24	WG1176862
Selenium	0.000421	J	0.000380	0.00200	1	10/12/2018 14:24	WG1176862
Sodium	122		0.110	1.00	1	10/12/2018 14:24	WG1176862

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.200	1.00	20	10/07/2018 19:14	WG1177306
Benzene	2.64		0.00662	0.0200	20	10/07/2018 19:14	WG1177306
Bromodichloromethane	U		0.00760	0.0200	20	10/07/2018 19:14	WG1177306
Bromoform	U		0.00938	0.0200	20	10/07/2018 19:14	WG1177306
Bromomethane	U		0.0173	0.100	20	10/07/2018 19:14	WG1177306
n-Butylbenzene	U		0.00722	0.0200	20	10/07/2018 19:14	WG1177306
sec-Butylbenzene	U		0.00730	0.0200	20	10/07/2018 19:14	WG1177306
Carbon disulfide	U		0.00550	0.0200	20	10/07/2018 19:14	WG1177306
Carbon tetrachloride	U		0.00758	0.0200	20	10/07/2018 19:14	WG1177306
Chlorobenzene	U		0.00696	0.0200	20	10/07/2018 19:14	WG1177306
Chlorodibromomethane	U		0.00654	0.0200	20	10/07/2018 19:14	WG1177306
Chloroethane	U		0.00906	0.100	20	10/07/2018 19:14	WG1177306
Chloroform	U		0.00648	0.100	20	10/07/2018 19:14	WG1177306
Chloromethane	U		0.00552	0.0500	20	10/07/2018 19:14	WG1177306
1,2-Dibromoethane	U		0.00762	0.0200	20	10/07/2018 19:14	WG1177306
1,1-Dichloroethane	U		0.00518	0.0200	20	10/07/2018 19:14	WG1177306
1,2-Dichloroethane	U		0.00722	0.0200	20	10/07/2018 19:14	WG1177306
1,1-Dichloroethene	U		0.00796	0.0200	20	10/07/2018 19:14	WG1177306
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	10/07/2018 19:14	WG1177306
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	10/07/2018 19:14	WG1177306
1,2-Dichloropropane	U		0.00612	0.0200	20	10/07/2018 19:14	WG1177306
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	10/07/2018 19:14	WG1177306
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	10/07/2018 19:14	WG1177306

KWB-6

Collected date/time: 10/03/18 13:55

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Ethylbenzene	0.102		0.00768	0.0200	20	10/07/2018 19:14	WG1177306
Isopropylbenzene	0.0133	J	0.00652	0.0200	20	10/07/2018 19:14	WG1177306
p-Isopropyltoluene	0.00755	J	0.00700	0.0200	20	10/07/2018 19:14	WG1177306
2-Butanone (MEK)	U	J3 J4	0.0786	0.200	20	10/07/2018 19:14	WG1177306
2-Hexanone	U		0.0764	0.200	20	10/07/2018 19:14	WG1177306
Methylene Chloride	U		0.0200	0.100	20	10/07/2018 19:14	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	10/07/2018 19:14	WG1177306
Methyl tert-butyl ether	0.120		0.00734	0.0200	20	10/07/2018 19:14	WG1177306
Naphthalene	0.0469	J	0.0200	0.100	20	10/07/2018 19:14	WG1177306
n-Propylbenzene	0.0234		0.00698	0.0200	20	10/07/2018 19:14	WG1177306
Styrene	U		0.00614	0.0200	20	10/07/2018 19:14	WG1177306
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	10/07/2018 19:14	WG1177306
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	10/07/2018 19:14	WG1177306
Tetrachloroethene	U		0.00744	0.0200	20	10/07/2018 19:14	WG1177306
Toluene	0.0126	J	0.00824	0.0200	20	10/07/2018 19:14	WG1177306
1,1,1-Trichloroethane	U		0.00638	0.0200	20	10/07/2018 19:14	WG1177306
1,1,2-Trichloroethane	U		0.00766	0.0200	20	10/07/2018 19:14	WG1177306
Trichloroethene	U		0.00796	0.0200	20	10/07/2018 19:14	WG1177306
1,2,4-Trimethylbenzene	0.122		0.00746	0.0200	20	10/07/2018 19:14	WG1177306
1,3,5-Trimethylbenzene	0.0611		0.00774	0.0200	20	10/07/2018 19:14	WG1177306
Vinyl chloride	U	J3	0.00518	0.0200	20	10/07/2018 19:14	WG1177306
o-Xylene	0.0234		0.00682	0.0200	20	10/07/2018 19:14	WG1177306
m&p-Xylene	0.356		0.0144	0.0400	20	10/07/2018 19:14	WG1177306
Xylenes, Total	0.379		0.0212	0.0600	20	10/07/2018 19:14	WG1177306
(S) Toluene-d8	*96.4*			*80.0-120*		*10/07/2018 19:14*	WG1177306
(S) Dibromofluoromethane	*105*			*75.0-120*		*10/07/2018 19:14*	WG1177306
(S) 4-Bromofluorobenzene	*96.7*			*77.0-126*		*10/07/2018 19:14*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	1.52		0.0247	0.100	1	10/12/2018 23:35	WG1178288
(S) o-Terphenyl	*73.2*			*31.0-160*		*10/12/2018 23:35*	WG1178288

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4850		28.2	100	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	25.6		0.197	1.00	10	10/11/2018 00:06	WG1178871

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	159		1.04	20.0	20	10/10/2018 06:54	WG1176732
Fluoride	1.91		0.00990	0.100	1	10/10/2018 06:44	WG1176732
Sulfate	2220		3.87	250	50	10/10/2018 12:48	WG1176732

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00512		0.000250	0.00200	1	10/12/2018 14:29	WG1176862
Barium	0.0170		0.000360	0.00500	1	10/12/2018 14:29	WG1176862
Calcium	536		0.0460	1.00	1	10/12/2018 14:29	WG1176862
Chromium	0.000612	J	0.000540	0.00200	1	10/12/2018 14:29	WG1176862
Iron	0.209		0.0150	0.100	1	10/12/2018 14:29	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 14:29	WG1176862
Manganese	0.0900		0.000250	0.00500	1	10/12/2018 14:29	WG1176862
Potassium	1.28		0.0370	1.00	1	10/12/2018 14:29	WG1176862
Selenium	0.0120		0.000380	0.00200	1	10/12/2018 14:29	WG1176862
Sodium	386		0.110	1.00	1	10/12/2018 14:29	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 12:37	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/09/2018 12:37*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 19:34	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 19:34	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 19:34	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 19:34	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 19:34	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 19:34	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 19:34	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 19:34	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 19:34	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 19:34	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 19:34	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 19:34	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 19:34	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 19:34	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 19:34	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 19:34	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 19:34	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 19:34	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 19:34	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 19:34	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 19:34	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 19:34	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 19:34	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 19:34	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 19:34	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 19:34	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 19:34	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 19:34	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 19:34	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 19:34	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 19:34	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 19:34	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 19:34	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 19:34	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 19:34	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 19:34	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 19:34	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 19:34	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 19:34	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 19:34	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 19:34	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 19:34	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 19:34	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 19:34	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 19:34	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 19:34	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 19:34	WG1177306
(S) Toluene-d8	*99.3*			*80.0-120*		*10/07/2018 19:34*	WG1177306
(S) Dibromofluoromethane	*104*			*75.0-120*		*10/07/2018 19:34*	WG1177306
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/07/2018 19:34*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0417	J	0.0247	0.100	1	10/12/2018 23:53	WG1178288
(S) o-Terphenyl	*73.7*			*31.0-160*		*10/12/2018 23:53*	WG1178288

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2850		14.1	50.0	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	9.14		0.0985	0.500	5	10/11/2018 00:08	WG1178871

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/12/2018 17:51	WG1179442

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	92.4		1.04	20.0	20	10/10/2018 07:33	WG1176732
Fluoride	0.439		0.00990	0.100	1	10/10/2018 07:23	WG1176732
Sulfate	1890		1.55	100	20	10/10/2018 07:33	WG1176732

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 07:56	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.592		0.0126	0.200	1	10/09/2018 14:01	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00135	J	0.000250	0.00200	1	10/12/2018 14:33	WG1176862
Barium	0.0138		0.000360	0.00500	1	10/12/2018 14:33	WG1176862
Cadmium	U		0.000160	0.00100	1	10/12/2018 14:33	WG1176862
Calcium	475		0.0460	1.00	1	10/12/2018 14:33	WG1176862
Chromium	0.000549	J	0.000540	0.00200	1	10/12/2018 14:33	WG1176862
Cobalt	U		0.000260	0.00200	1	10/12/2018 14:33	WG1176862
Iron	U		0.0150	0.100	1	10/12/2018 14:33	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 14:33	WG1176862
Manganese	0.000829	J	0.000250	0.00500	1	10/12/2018 14:33	WG1176862
Nickel	0.000350	J	0.000350	0.00200	1	10/12/2018 14:33	WG1176862
Potassium	0.696	J	0.0370	1.00	1	10/12/2018 14:33	WG1176862
Selenium	0.00302		0.000380	0.00200	1	10/12/2018 14:33	WG1176862
Sodium	120		0.110	1.00	1	10/12/2018 14:33	WG1176862
Uranium	0.0234		0.000330	0.0100	1	10/12/2018 14:33	WG1176862
Vanadium	0.0120		0.000180	0.00500	1	10/12/2018 14:33	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 12:58	WG1177964

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/09/2018 12:58*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 19:54	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 19:54	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 19:54	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 19:54	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 19:54	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 19:54	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 19:54	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 19:54	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 19:54	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 19:54	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 19:54	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 19:54	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 19:54	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 19:54	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 19:54	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 19:54	WG1177306
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 19:54	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 19:54	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 19:54	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 19:54	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 19:54	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 19:54	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 19:54	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 19:54	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 19:54	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 19:54	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 19:54	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 19:54	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 19:54	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 19:54	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 19:54	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 19:54	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 19:54	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 19:54	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 19:54	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 19:54	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 19:54	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 19:54	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 19:54	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 19:54	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 19:54	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 19:54	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 19:54	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 19:54	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 19:54	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 19:54	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 19:54	WG1177306
(S) Toluene-d8	*101*			*80.0-120*		*10/07/2018 19:54*	WG1177306
(S) Dibromofluoromethane	*96.9*			*75.0-120*		*10/07/2018 19:54*	WG1177306
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/07/2018 19:54*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.132		0.0247	0.100	1	10/13/2018 00:11	WG1178288
(S) o-Terphenyl	*83.7*			*31.0-160*		*10/13/2018 00:11*	WG1178288

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3340		14.1	50.0	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	8.52		0.0985	0.500	5	10/11/2018 00:09	WG1178871

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/12/2018 17:52	WG1179442

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	104		1.04	20.0	20	10/10/2018 07:52	WG1176732
Fluoride	0.312		0.00990	0.100	1	10/10/2018 07:42	WG1176732
Sulfate	1330		3.87	250	50	10/10/2018 13:17	WG1176732

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 07:59	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.602		0.0126	0.200	1	10/09/2018 14:10	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00155	J	0.000250	0.00200	1	10/12/2018 15:27	WG1176862
Barium	0.00876		0.000360	0.00500	1	10/12/2018 15:27	WG1176862
Cadmium	U		0.000160	0.00100	1	10/12/2018 15:27	WG1176862
Calcium	507		0.0460	1.00	1	10/12/2018 15:27	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 15:27	WG1176862
Cobalt	U		0.000260	0.00200	1	10/12/2018 15:27	WG1176862
Iron	0.0949	J	0.0150	0.100	1	10/12/2018 15:27	WG1176862
Lead	U		0.000240	0.00200	1	10/12/2018 15:27	WG1176862
Manganese	0.000451	J	0.000250	0.00500	1	10/12/2018 15:27	WG1176862
Nickel	U		0.000350	0.00200	1	10/12/2018 15:27	WG1176862
Potassium	0.739	J	0.0370	1.00	1	10/12/2018 15:27	WG1176862
Selenium	0.00277		0.000380	0.00200	1	10/12/2018 15:27	WG1176862
Sodium	128		0.110	1.00	1	10/12/2018 15:27	WG1176862
Uranium	0.0248		0.000330	0.0100	1	10/12/2018 15:27	WG1176862
Vanadium	0.0112		0.000180	0.00500	1	10/12/2018 15:27	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 13:19	WG1177964

KWB-12B

Collected date/time: 10/03/18 13:10

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L1032152

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/09/2018 13:19*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.0100	0.0500	1	10/07/2018 20:43	WG1177306
Benzene	U		0.000331	0.00100	1	10/07/2018 20:43	WG1177306
Bromodichloromethane	U		0.000380	0.00100	1	10/07/2018 20:43	WG1177306
Bromoform	U		0.000469	0.00100	1	10/07/2018 20:43	WG1177306
Bromomethane	U		0.000866	0.00500	1	10/07/2018 20:43	WG1177306
n-Butylbenzene	U		0.000361	0.00100	1	10/07/2018 20:43	WG1177306
sec-Butylbenzene	U		0.000365	0.00100	1	10/07/2018 20:43	WG1177306
Carbon disulfide	U		0.000275	0.00100	1	10/07/2018 20:43	WG1177306
Carbon tetrachloride	U		0.000379	0.00100	1	10/07/2018 20:43	WG1177306
Chlorobenzene	U		0.000348	0.00100	1	10/07/2018 20:43	WG1177306
Chlorodibromomethane	U		0.000327	0.00100	1	10/07/2018 20:43	WG1177306
Chloroethane	U		0.000453	0.00500	1	10/07/2018 20:43	WG1177306
Chloroform	U		0.000324	0.00500	1	10/07/2018 20:43	WG1177306
Chloromethane	U		0.000276	0.00250	1	10/07/2018 20:43	WG1177306
1,2-Dibromoethane	U		0.000381	0.00100	1	10/07/2018 20:43	WG1177306
1,1-Dichloroethane	U		0.000259	0.00100	1	10/07/2018 20:43	WG1177306
1,2-Dichloroethane	U		0.000361	0.00100	1	10/07/2018 20:43	WG1177306
1,1-Dichloroethene	U		0.000398	0.00100	1	10/07/2018 20:43	WG1177306
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/07/2018 20:43	WG1177306
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/07/2018 20:43	WG1177306
1,2-Dichloropropane	U		0.000306	0.00100	1	10/07/2018 20:43	WG1177306
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/07/2018 20:43	WG1177306
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/07/2018 20:43	WG1177306
Ethylbenzene	U		0.000384	0.00100	1	10/07/2018 20:43	WG1177306
Isopropylbenzene	U		0.000326	0.00100	1	10/07/2018 20:43	WG1177306
p-Isopropyltoluene	U		0.000350	0.00100	1	10/07/2018 20:43	WG1177306
2-Butanone (MEK)	U	J3 J4	0.00393	0.0100	1	10/07/2018 20:43	WG1177306
2-Hexanone	U		0.00382	0.0100	1	10/07/2018 20:43	WG1177306
Methylene Chloride	U		0.00100	0.00500	1	10/07/2018 20:43	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/07/2018 20:43	WG1177306
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/07/2018 20:43	WG1177306
Naphthalene	U		0.00100	0.00500	1	10/07/2018 20:43	WG1177306
n-Propylbenzene	U		0.000349	0.00100	1	10/07/2018 20:43	WG1177306
Styrene	U		0.000307	0.00100	1	10/07/2018 20:43	WG1177306
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/07/2018 20:43	WG1177306
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/07/2018 20:43	WG1177306
Tetrachloroethene	U		0.000372	0.00100	1	10/07/2018 20:43	WG1177306
Toluene	U		0.000412	0.00100	1	10/07/2018 20:43	WG1177306
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/07/2018 20:43	WG1177306
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/07/2018 20:43	WG1177306
Trichloroethene	U		0.000398	0.00100	1	10/07/2018 20:43	WG1177306
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/07/2018 20:43	WG1177306
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/07/2018 20:43	WG1177306
Vinyl chloride	U	J3	0.000259	0.00100	1	10/07/2018 20:43	WG1177306
o-Xylene	U		0.000341	0.00100	1	10/07/2018 20:43	WG1177306
m&p-Xylene	U		0.000719	0.00200	1	10/07/2018 20:43	WG1177306
Xylenes, Total	U		0.00106	0.00300	1	10/07/2018 20:43	WG1177306
(S) Toluene-d8	*99.0*			*80.0-120*		*10/07/2018 20:43*	WG1177306
(S) Dibromofluoromethane	*104*			*75.0-120*		*10/07/2018 20:43*	WG1177306
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/07/2018 20:43*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0425	J	0.0247	0.100	1	10/13/2018 00:28	WG1178288
(S) o-Terphenyl	*72.1*			*31.0-160*		*10/13/2018 00:28*	WG1178288

MW-58

Collected date/time: 10/03/18 14:25

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L1032152

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1040		5.64	20.0	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.394	2.00	20	10/11/2018 00:11	WG1178871

Sample Narrative:

L1032152-18 WG1178871: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U	J3 J6	0.00180	0.00500	1	10/12/2018 17:53	WG1179442

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	151		0.260	5.00	5	10/10/2018 08:11	WG1176732
Fluoride	1.06		0.00990	0.100	1	10/10/2018 08:02	WG1176732
Sulfate	56.9		0.0774	5.00	1	10/10/2018 08:02	WG1176732

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:01	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.348		0.0126	0.200	1	10/09/2018 14:13	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00336		0.000250	0.00200	1	10/12/2018 15:32	WG1176862
Barium	1.29		0.000360	0.00500	1	10/12/2018 15:32	WG1176862
Cadmium	U		0.000160	0.00100	1	10/12/2018 15:32	WG1176862
Calcium	176		0.0460	1.00	1	10/12/2018 15:32	WG1176862
Chromium	0.000567	J	0.000540	0.00200	1	10/12/2018 15:32	WG1176862
Cobalt	U		0.000260	0.00200	1	10/12/2018 15:32	WG1176862
Iron	0.721		0.0150	0.100	1	10/12/2018 15:32	WG1176862
Lead	0.00167	J	0.000240	0.00200	1	10/12/2018 15:32	WG1176862
Manganese	0.335		0.000250	0.00500	1	10/12/2018 15:32	WG1176862
Nickel	0.000975	J	0.000350	0.00200	1	10/12/2018 15:32	WG1176862
Potassium	1.20		0.0370	1.00	1	10/12/2018 15:32	WG1176862
Selenium	U		0.000380	0.00200	1	10/12/2018 15:32	WG1176862
Sodium	74.3		0.110	1.00	1	10/12/2018 15:32	WG1176862
Uranium	0.000458	J	0.000330	0.0100	1	10/12/2018 15:32	WG1176862
Vanadium	0.00305	J	0.000180	0.00500	1	10/12/2018 15:32	WG1176862

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.500	2.50	50	10/07/2018 21:03	WG1177306
Benzene	7.11		0.0166	0.0500	50	10/07/2018 21:03	WG1177306
Bromodichloromethane	U		0.0190	0.0500	50	10/07/2018 21:03	WG1177306
Bromoform	U		0.0234	0.0500	50	10/07/2018 21:03	WG1177306
Bromomethane	U		0.0433	0.250	50	10/07/2018 21:03	WG1177306
n-Butylbenzene	U		0.0180	0.0500	50	10/07/2018 21:03	WG1177306
sec-Butylbenzene	U		0.0182	0.0500	50	10/07/2018 21:03	WG1177306
Carbon disulfide	U		0.0138	0.0500	50	10/07/2018 21:03	WG1177306
Carbon tetrachloride	U		0.0190	0.0500	50	10/07/2018 21:03	WG1177306
Chlorobenzene	U		0.0174	0.0500	50	10/07/2018 21:03	WG1177306
Chlorodibromomethane	U		0.0164	0.0500	50	10/07/2018 21:03	WG1177306
Chloroethane	U		0.0226	0.250	50	10/07/2018 21:03	WG1177306
Chloroform	U		0.0162	0.250	50	10/07/2018 21:03	WG1177306
Chloromethane	U		0.0138	0.125	50	10/07/2018 21:03	WG1177306
1,2-Dibromoethane	U		0.0190	0.0500	50	10/07/2018 21:03	WG1177306
1,1-Dichloroethane	U		0.0130	0.0500	50	10/07/2018 21:03	WG1177306
1,2-Dichloroethane	U		0.0180	0.0500	50	10/07/2018 21:03	WG1177306
1,1-Dichloroethene	U		0.0199	0.0500	50	10/07/2018 21:03	WG1177306
cis-1,2-Dichloroethene	U		0.0130	0.0500	50	10/07/2018 21:03	WG1177306
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	10/07/2018 21:03	WG1177306
1,2-Dichloropropane	U		0.0153	0.0500	50	10/07/2018 21:03	WG1177306
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	10/07/2018 21:03	WG1177306
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	10/07/2018 21:03	WG1177306
Ethylbenzene	0.0351	J	0.0192	0.0500	50	10/07/2018 21:03	WG1177306
Isopropylbenzene	0.0461	J	0.0163	0.0500	50	10/07/2018 21:03	WG1177306
p-Isopropyltoluene	U		0.0175	0.0500	50	10/07/2018 21:03	WG1177306
2-Butanone (MEK)	U	J3 J4	0.196	0.500	50	10/07/2018 21:03	WG1177306
2-Hexanone	U		0.191	0.500	50	10/07/2018 21:03	WG1177306
Methylene Chloride	U		0.0500	0.250	50	10/07/2018 21:03	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	10/07/2018 21:03	WG1177306
Methyl tert-butyl ether	0.0624		0.0184	0.0500	50	10/07/2018 21:03	WG1177306
Naphthalene	U		0.0500	0.250	50	10/07/2018 21:03	WG1177306
n-Propylbenzene	0.0900		0.0174	0.0500	50	10/07/2018 21:03	WG1177306
Styrene	U		0.0154	0.0500	50	10/07/2018 21:03	WG1177306
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	10/07/2018 21:03	WG1177306
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	10/07/2018 21:03	WG1177306
Tetrachloroethene	U		0.0186	0.0500	50	10/07/2018 21:03	WG1177306
Toluene	U		0.0206	0.0500	50	10/07/2018 21:03	WG1177306
1,1,1-Trichloroethane	U		0.0160	0.0500	50	10/07/2018 21:03	WG1177306
1,1,2-Trichloroethane	U		0.0192	0.0500	50	10/07/2018 21:03	WG1177306
Trichloroethene	U		0.0199	0.0500	50	10/07/2018 21:03	WG1177306
1,2,4-Trimethylbenzene	0.0235	J	0.0186	0.0500	50	10/07/2018 21:03	WG1177306
1,3,5-Trimethylbenzene	U		0.0194	0.0500	50	10/07/2018 21:03	WG1177306
Vinyl chloride	U	J3	0.0130	0.0500	50	10/07/2018 21:03	WG1177306
o-Xylene	U		0.0170	0.0500	50	10/07/2018 21:03	WG1177306
m&p-Xylene	U		0.0360	0.100	50	10/07/2018 21:03	WG1177306
Xylenes, Total	U		0.0530	0.150	50	10/07/2018 21:03	WG1177306
(S) Toluene-d8	*103*			*80.0-120*		*10/07/2018 21:03*	WG1177306
(S) Dibromofluoromethane	*103*			*75.0-120*		*10/07/2018 21:03*	WG1177306
(S) 4-Bromofluorobenzene	*97.0*			*77.0-126*		*10/07/2018 21:03*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.86		0.0247	0.100	1	10/13/2018 00:46	WG1178288
(S) o-Terphenyl	*74.7*			*31.0-160*		*10/13/2018 00:46*	WG1178288

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1420		7.05	25.0	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.394	2.00	20	10/11/2018 00:12	WG1178871

Sample Narrative:

L1032152-19 WG1178871: Diluted to matrix interference: High sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	254		0.260	5.00	5	10/10/2018 08:31	WG1176732
Fluoride	0.612		0.00990	0.100	1	10/10/2018 08:21	WG1176732
Sulfate	124		0.387	25.0	5	10/10/2018 08:31	WG1176732

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00821		0.000250	0.00200	1	10/12/2018 15:47	WG1176862
Barium	0.452		0.000360	0.00500	1	10/12/2018 15:47	WG1176862
Calcium	162		0.0460	1.00	1	10/12/2018 15:47	WG1176862
Chromium	0.000542	J	0.000540	0.00200	1	10/12/2018 15:47	WG1176862
Iron	0.163		0.0150	0.100	1	10/12/2018 15:47	WG1176862
Lead	0.000718	J	0.000240	0.00200	1	10/12/2018 15:47	WG1176862
Manganese	0.224		0.000250	0.00500	1	10/12/2018 15:47	WG1176862
Potassium	0.792	J	0.0370	1.00	1	10/12/2018 15:47	WG1176862
Selenium	0.00169	J	0.000380	0.00200	1	10/12/2018 15:47	WG1176862
Sodium	212		0.110	1.00	1	10/12/2018 15:47	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	11.9		0.157	0.500	5	10/09/2018 13:40	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*103*			*78.0-120*		*10/09/2018 13:40*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U	J3	1.00	5.00	100	10/07/2018 21:23	WG1177306
Benzene	2.54		0.0331	0.100	100	10/07/2018 21:23	WG1177306
Bromodichloromethane	U		0.0380	0.100	100	10/07/2018 21:23	WG1177306
Bromoform	U		0.0469	0.100	100	10/07/2018 21:23	WG1177306
Bromomethane	U		0.0866	0.500	100	10/07/2018 21:23	WG1177306
n-Butylbenzene	U		0.0361	0.100	100	10/07/2018 21:23	WG1177306
sec-Butylbenzene	U		0.0365	0.100	100	10/07/2018 21:23	WG1177306
Carbon disulfide	U		0.0275	0.100	100	10/07/2018 21:23	WG1177306
Carbon tetrachloride	U		0.0379	0.100	100	10/07/2018 21:23	WG1177306
Chlorobenzene	U		0.0348	0.100	100	10/07/2018 21:23	WG1177306
Chlorodibromomethane	U		0.0327	0.100	100	10/07/2018 21:23	WG1177306
Chloroethane	U		0.0453	0.500	100	10/07/2018 21:23	WG1177306
Chloroform	U		0.0324	0.500	100	10/07/2018 21:23	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.0276	0.250	100	10/07/2018 21:23	WG1177306
1,2-Dibromoethane	U		0.0381	0.100	100	10/07/2018 21:23	WG1177306
1,1-Dichloroethane	U		0.0259	0.100	100	10/07/2018 21:23	WG1177306
1,2-Dichloroethane	U		0.0361	0.100	100	10/07/2018 21:23	WG1177306
1,1-Dichloroethene	U		0.0398	0.100	100	10/07/2018 21:23	WG1177306
cis-1,2-Dichloroethene	U		0.0260	0.100	100	10/07/2018 21:23	WG1177306
trans-1,2-Dichloroethene	U		0.0396	0.100	100	10/07/2018 21:23	WG1177306
1,2-Dichloropropane	U		0.0306	0.100	100	10/07/2018 21:23	WG1177306
cis-1,3-Dichloropropene	U		0.0418	0.100	100	10/07/2018 21:23	WG1177306
trans-1,3-Dichloropropene	U		0.0419	0.100	100	10/07/2018 21:23	WG1177306
Ethylbenzene	0.201		0.0384	0.100	100	10/07/2018 21:23	WG1177306
Isopropylbenzene	0.0672	J	0.0326	0.100	100	10/07/2018 21:23	WG1177306
p-Isopropyltoluene	U		0.0350	0.100	100	10/07/2018 21:23	WG1177306
2-Butanone (MEK)	U	J3 J4	0.393	1.00	100	10/07/2018 21:23	WG1177306
2-Hexanone	U		0.382	1.00	100	10/07/2018 21:23	WG1177306
Methylene Chloride	U		0.100	0.500	100	10/07/2018 21:23	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	10/07/2018 21:23	WG1177306
Methyl tert-butyl ether	3.10		0.0367	0.100	100	10/07/2018 21:23	WG1177306
Naphthalene	U		0.100	0.500	100	10/07/2018 21:23	WG1177306
n-Propylbenzene	0.101		0.0349	0.100	100	10/07/2018 21:23	WG1177306
Styrene	U		0.0307	0.100	100	10/07/2018 21:23	WG1177306
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	10/07/2018 21:23	WG1177306
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	10/07/2018 21:23	WG1177306
Tetrachloroethene	U		0.0372	0.100	100	10/07/2018 21:23	WG1177306
Toluene	U		0.0412	0.100	100	10/07/2018 21:23	WG1177306
1,1,1-Trichloroethane	U		0.0319	0.100	100	10/07/2018 21:23	WG1177306
1,1,2-Trichloroethane	U		0.0383	0.100	100	10/07/2018 21:23	WG1177306
Trichloroethene	U		0.0398	0.100	100	10/07/2018 21:23	WG1177306
1,2,4-Trimethylbenzene	0.284		0.0373	0.100	100	10/07/2018 21:23	WG1177306
1,3,5-Trimethylbenzene	U		0.0387	0.100	100	10/07/2018 21:23	WG1177306
Vinyl chloride	U	J3	0.0259	0.100	100	10/07/2018 21:23	WG1177306
o-Xylene	U		0.0341	0.100	100	10/07/2018 21:23	WG1177306
m&p-Xylene	0.358		0.0719	0.200	100	10/07/2018 21:23	WG1177306
Xylenes, Total	0.358		0.106	0.300	100	10/07/2018 21:23	WG1177306
(S) Toluene-d8	*101*			*80.0-120*		*10/07/2018 21:23*	WG1177306
(S) Dibromofluoromethane	*96.8*			*75.0-120*		*10/07/2018 21:23*	WG1177306
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/07/2018 21:23*	WG1177306

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.23		0.0247	0.100	1	10/13/2018 01:03	WG1178288
(S) o-Terphenyl	*82.1*			*31.0-160*		*10/13/2018 01:03*	WG1178288

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1180		5.64	20.0	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U	J6	0.0197	0.100	1	10/11/2018 00:14	WG1178871

Wet Chemistry by Method 4500CN E-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Cyanide	U		0.00180	0.00500	1	10/12/2018 17:56	WG1179442

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	204		0.519	10.0	10	10/11/2018 03:31	WG1176733
Fluoride	1.26		0.00990	0.100	1	10/11/2018 02:53	WG1176733
Sulfate	0.781	J	0.0774	5.00	1	10/11/2018 02:53	WG1176733

Mercury by Method 7470A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:04	WG1177220

Metals (ICP) by Method 6010B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Boron	0.324		0.0126	0.200	1	10/09/2018 14:15	WG1176839

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00258		0.000250	0.00200	1	10/12/2018 15:42	WG1176862
Barium	1.88		0.000360	0.00500	1	10/12/2018 15:42	WG1176862
Cadmium	U		0.000160	0.00100	1	10/12/2018 15:42	WG1176862
Calcium	138		0.0460	1.00	1	10/12/2018 15:42	WG1176862
Chromium	U		0.000540	0.00200	1	10/12/2018 15:42	WG1176862
Cobalt	U		0.000260	0.00200	1	10/12/2018 15:42	WG1176862
Iron	0.833		0.0150	0.100	1	10/12/2018 15:42	WG1176862
Lead	0.00280		0.000240	0.00200	1	10/12/2018 15:42	WG1176862
Manganese	0.278		0.000250	0.00500	1	10/12/2018 15:42	WG1176862
Nickel	0.00661		0.000350	0.00200	1	10/12/2018 15:42	WG1176862
Potassium	0.868	J	0.0370	1.00	1	10/12/2018 15:42	WG1176862
Selenium	U		0.000380	0.00200	1	10/12/2018 15:42	WG1176862
Sodium	174		0.110	1.00	1	10/12/2018 15:42	WG1176862
Uranium	U		0.000330	0.0100	1	10/12/2018 15:42	WG1176862
Vanadium	0.000708	J	0.000180	0.00500	1	10/12/2018 15:42	WG1176862

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	6.51		0.0314	0.100	1	10/09/2018 14:00	WG1177964

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*88.8*			*78.0-120*		*10/09/2018 14:00*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U	J3	0.100	0.500	10	10/07/2018 21:43	WG1177306
Benzene	1.95		0.0166	0.0500	50	10/09/2018 23:52	WG1178265
Bromodichloromethane	U		0.00380	0.0100	10	10/07/2018 21:43	WG1177306
Bromoform	U		0.00469	0.0100	10	10/07/2018 21:43	WG1177306
Bromomethane	U		0.00866	0.0500	10	10/07/2018 21:43	WG1177306
n-Butylbenzene	U		0.00361	0.0100	10	10/07/2018 21:43	WG1177306
sec-Butylbenzene	0.0118		0.00365	0.0100	10	10/07/2018 21:43	WG1177306
Carbon disulfide	U		0.00275	0.0100	10	10/07/2018 21:43	WG1177306
Carbon tetrachloride	U		0.00379	0.0100	10	10/07/2018 21:43	WG1177306
Chlorobenzene	U		0.00348	0.0100	10	10/07/2018 21:43	WG1177306
Chlorodibromomethane	U		0.00327	0.0100	10	10/07/2018 21:43	WG1177306
Chloroethane	U		0.00453	0.0500	10	10/07/2018 21:43	WG1177306
Chloroform	U		0.00324	0.0500	10	10/07/2018 21:43	WG1177306
Chloromethane	U		0.00276	0.0250	10	10/07/2018 21:43	WG1177306
1,2-Dibromoethane	U		0.00381	0.0100	10	10/07/2018 21:43	WG1177306
1,1-Dichloroethane	U		0.00259	0.0100	10	10/07/2018 21:43	WG1177306
1,2-Dichloroethane	U		0.00361	0.0100	10	10/07/2018 21:43	WG1177306
1,1-Dichloroethene	U		0.00398	0.0100	10	10/07/2018 21:43	WG1177306
cis-1,2-Dichloroethene	U		0.00260	0.0100	10	10/07/2018 21:43	WG1177306
trans-1,2-Dichloroethene	U		0.00396	0.0100	10	10/07/2018 21:43	WG1177306
1,2-Dichloropropane	U		0.00306	0.0100	10	10/07/2018 21:43	WG1177306
cis-1,3-Dichloropropene	U		0.00418	0.0100	10	10/07/2018 21:43	WG1177306
trans-1,3-Dichloropropene	U		0.00419	0.0100	10	10/07/2018 21:43	WG1177306
Ethylbenzene	0.00686	J	0.00384	0.0100	10	10/07/2018 21:43	WG1177306
Isopropylbenzene	0.0634		0.00326	0.0100	10	10/07/2018 21:43	WG1177306
p-Isopropyltoluene	U		0.00350	0.0100	10	10/07/2018 21:43	WG1177306
2-Butanone (MEK)	U	J3 J4	0.0393	0.100	10	10/07/2018 21:43	WG1177306
2-Hexanone	U		0.0382	0.100	10	10/07/2018 21:43	WG1177306
Methylene Chloride	U		0.0100	0.0500	10	10/07/2018 21:43	WG1177306
4-Methyl-2-pentanone (MIBK)	U		0.0214	0.100	10	10/07/2018 21:43	WG1177306
Methyl tert-butyl ether	2.05		0.0184	0.0500	50	10/09/2018 23:52	WG1178265
Naphthalene	0.161		0.0100	0.0500	10	10/07/2018 21:43	WG1177306
n-Propylbenzene	0.104		0.00349	0.0100	10	10/07/2018 21:43	WG1177306
Styrene	U		0.00307	0.0100	10	10/07/2018 21:43	WG1177306
1,1,1,2-Tetrachloroethane	U		0.00385	0.0100	10	10/07/2018 21:43	WG1177306
1,1,2,2-Tetrachloroethane	U		0.00130	0.0100	10	10/07/2018 21:43	WG1177306
Tetrachloroethene	U		0.00372	0.0100	10	10/07/2018 21:43	WG1177306
Toluene	0.00704	J	0.00412	0.0100	10	10/07/2018 21:43	WG1177306
1,1,1-Trichloroethane	U		0.00319	0.0100	10	10/07/2018 21:43	WG1177306
1,1,2-Trichloroethane	U		0.00383	0.0100	10	10/07/2018 21:43	WG1177306
Trichloroethene	U		0.00398	0.0100	10	10/07/2018 21:43	WG1177306
1,2,4-Trimethylbenzene	U		0.00373	0.0100	10	10/07/2018 21:43	WG1177306
1,3,5-Trimethylbenzene	U		0.00387	0.0100	10	10/07/2018 21:43	WG1177306
Vinyl chloride	U	J3	0.00259	0.0100	10	10/07/2018 21:43	WG1177306
o-Xylene	U		0.00341	0.0100	10	10/07/2018 21:43	WG1177306
m&p-Xylene	0.0102	J	0.00719	0.0200	10	10/07/2018 21:43	WG1177306
Xylenes, Total	U		0.0106	0.0300	10	10/07/2018 21:43	WG1177306
(S) Toluene-d8	*105*			*80.0-120*		*10/07/2018 21:43*	WG1177306
(S) Toluene-d8	*98.2*			*80.0-120*		*10/09/2018 23:52*	WG1178265
(S) Dibromofluoromethane	*106*			*75.0-120*		*10/07/2018 21:43*	WG1177306

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
(S) Dibromofluoromethane	*117*			*75.0-120*		*10/09/2018 23:52*	WG1178265
(S) 4-Bromofluorobenzene	*98.9*			*77.0-126*		*10/07/2018 21:43*	WG1177306
(S) 4-Bromofluorobenzene	*113*			*77.0-126*		*10/09/2018 23:52*	WG1178265

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	4.31		0.0247	0.100	1	10/13/2018 01:23	WG1178288
(S) o-Terphenyl	*123*			*31.0-160*		*10/13/2018 01:23*	WG1178288

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3020		14.1	50.0	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0640	J P1	0.0197	0.100	1	10/11/2018 13:17	WG1178873

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	0.00291	J	0.00180	0.00500	1	10/11/2018 16:20	WG1178772

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	231		1.04	20.0	20	10/11/2018 04:20	WG1176733
Fluoride	1.00		0.00990	0.100	1	10/11/2018 03:51	WG1176733
Sulfate	2030		3.87	250	50	10/11/2018 12:09	WG1176733

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:11	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.690		0.0126	0.200	1	10/09/2018 14:18	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00751		0.000250	0.00200	1	10/11/2018 19:00	WG1176863
Barium	0.0193		0.000360	0.00500	1	10/11/2018 19:00	WG1176863
Cadmium	U		0.000160	0.00100	1	10/11/2018 19:00	WG1176863
Calcium	432		0.0460	1.00	1	10/11/2018 19:00	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 19:00	WG1176863
Cobalt	0.000515	J	0.000260	0.00200	1	10/11/2018 19:00	WG1176863
Iron	0.204		0.0150	0.100	1	10/11/2018 19:00	WG1176863
Lead	0.000520	J	0.000240	0.00200	1	10/11/2018 19:00	WG1176863
Manganese	0.270		0.000250	0.00500	1	10/11/2018 19:00	WG1176863
Nickel	0.000952	J	0.000350	0.00200	1	10/11/2018 19:00	WG1176863
Potassium	0.836	J	0.0370	1.00	1	10/11/2018 19:00	WG1176863
Selenium	U		0.000380	0.00200	1	10/11/2018 19:00	WG1176863
Sodium	227		0.110	1.00	1	10/11/2018 19:00	WG1176863
Uranium	0.00140	J	0.000330	0.0100	1	10/11/2018 19:00	WG1176863
Vanadium	0.000370	J	0.000180	0.00500	1	10/11/2018 19:00	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.593		0.0314	0.100	1	10/09/2018 14:21	WG1177964

MW-60
Collected date/time: 10/03/18 10:50

SAMPLE RESULTS - 21
L1032152

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
(S) a,a,a-Trifluorotoluene(FID)	*102*			*78.0-120*		*10/09/2018 14:21*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/08/2018 00:41	WG1177336
Benzene	0.0265		0.000331	0.00100	1	10/08/2018 00:41	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 00:41	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 00:41	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 00:41	WG1177336
n-Butylbenzene	0.000837	J	0.000361	0.00100	1	10/08/2018 00:41	WG1177336
sec-Butylbenzene	0.00428		0.000365	0.00100	1	10/08/2018 00:41	WG1177336
Carbon disulfide	0.000588	J	0.000275	0.00100	1	10/08/2018 00:41	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 00:41	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 00:41	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 00:41	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 00:41	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 00:41	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 00:41	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 00:41	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 00:41	WG1177336
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 00:41	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 00:41	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 00:41	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 00:41	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 00:41	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 00:41	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 00:41	WG1177336
Ethylbenzene	0.00115		0.000384	0.00100	1	10/08/2018 00:41	WG1177336
Isopropylbenzene	0.0240		0.000326	0.00100	1	10/08/2018 00:41	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 00:41	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 00:41	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 00:41	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 00:41	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 00:41	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 00:41	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 00:41	WG1177336
n-Propylbenzene	0.00306		0.000349	0.00100	1	10/08/2018 00:41	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 00:41	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 00:41	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 00:41	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 00:41	WG1177336
Toluene	0.000664	J	0.000412	0.00100	1	10/08/2018 00:41	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 00:41	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 00:41	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 00:41	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 00:41	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 00:41	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 00:41	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 00:41	WG1177336
m&p-Xylene	0.00573		0.000719	0.00200	1	10/08/2018 00:41	WG1177336
Xylenes, Total	0.00573		0.00106	0.00300	1	10/08/2018 00:41	WG1177336
(S) Toluene-d8	*99.3*			*80.0-120*		*10/08/2018 00:41*	WG1177336
(S) Dibromofluoromethane	*101*			*75.0-120*		*10/08/2018 00:41*	WG1177336
(S) 4-Bromofluorobenzene	*99.7*			*77.0-126*		*10/08/2018 00:41*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.23		0.0247	0.100	1	10/13/2018 09:45	WG1178288
(S) o-Terphenyl	*84.7*			*31.0-160*		*10/13/2018 09:45*	WG1178288

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1650		5.64	20.0	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0230	J J6	0.0197	0.100	1	10/11/2018 13:20	WG1178873

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	170		0.519	10.0	10	10/11/2018 04:39	WG1176733
Fluoride	1.13		0.00990	0.100	1	10/11/2018 04:30	WG1176733
Sulfate	147		0.774	50.0	10	10/11/2018 04:39	WG1176733

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0447		0.000250	0.00200	1	10/11/2018 18:42	WG1176863
Barium	0.0604		0.000360	0.00500	1	10/11/2018 18:42	WG1176863
Calcium	161	V	0.0460	1.00	1	10/11/2018 18:42	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 18:42	WG1176863
Iron	2.40		0.0150	0.100	1	10/11/2018 18:42	WG1176863
Lead	0.000261	J	0.000240	0.00200	1	10/11/2018 18:42	WG1176863
Manganese	1.78	O1 V	0.000250	0.00500	1	10/11/2018 18:42	WG1176863
Potassium	0.412	J	0.0370	1.00	1	10/11/2018 18:42	WG1176863
Selenium	U		0.000380	0.00200	1	10/11/2018 18:42	WG1176863
Sodium	97.3	O1 V	0.110	1.00	1	10/11/2018 18:42	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	2.76		0.0314	0.100	1	10/09/2018 14:42	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*102*			*78.0-120*		*10/09/2018 14:42*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.200	1.00	20	10/08/2018 01:01	WG1177336
Benzene	0.729		0.00662	0.0200	20	10/08/2018 01:01	WG1177336
Bromodichloromethane	U		0.00760	0.0200	20	10/08/2018 01:01	WG1177336
Bromoform	U		0.00938	0.0200	20	10/08/2018 01:01	WG1177336
Bromomethane	U		0.0173	0.100	20	10/08/2018 01:01	WG1177336
n-Butylbenzene	U		0.00722	0.0200	20	10/08/2018 01:01	WG1177336
sec-Butylbenzene	U		0.00730	0.0200	20	10/08/2018 01:01	WG1177336
Carbon disulfide	U		0.00550	0.0200	20	10/08/2018 01:01	WG1177336
Carbon tetrachloride	U		0.00758	0.0200	20	10/08/2018 01:01	WG1177336
Chlorobenzene	U		0.00696	0.0200	20	10/08/2018 01:01	WG1177336
Chlorodibromomethane	U		0.00654	0.0200	20	10/08/2018 01:01	WG1177336
Chloroethane	U		0.00906	0.100	20	10/08/2018 01:01	WG1177336
Chloroform	U		0.00648	0.100	20	10/08/2018 01:01	WG1177336
Chloromethane	U		0.00552	0.0500	20	10/08/2018 01:01	WG1177336
1,2-Dibromoethane	U		0.00762	0.0200	20	10/08/2018 01:01	WG1177336
1,1-Dichloroethane	U		0.00518	0.0200	20	10/08/2018 01:01	WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.00722	0.0200	20	10/08/2018 01:01	WG1177336
1,1-Dichloroethene	U		0.00796	0.0200	20	10/08/2018 01:01	WG1177336
cis-1,2-Dichloroethene	U		0.00520	0.0200	20	10/08/2018 01:01	WG1177336
trans-1,2-Dichloroethene	U		0.00792	0.0200	20	10/08/2018 01:01	WG1177336
1,2-Dichloropropane	U		0.00612	0.0200	20	10/08/2018 01:01	WG1177336
cis-1,3-Dichloropropene	U		0.00836	0.0200	20	10/08/2018 01:01	WG1177336
trans-1,3-Dichloropropene	U		0.00838	0.0200	20	10/08/2018 01:01	WG1177336
Ethylbenzene	0.0247		0.00768	0.0200	20	10/08/2018 01:01	WG1177336
Isopropylbenzene	U		0.00652	0.0200	20	10/08/2018 01:01	WG1177336
p-Isopropyltoluene	U		0.00700	0.0200	20	10/08/2018 01:01	WG1177336
2-Butanone (MEK)	U		0.0786	0.200	20	10/08/2018 01:01	WG1177336
2-Hexanone	U		0.0764	0.200	20	10/08/2018 01:01	WG1177336
Methylene Chloride	U		0.0200	0.100	20	10/08/2018 01:01	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.0428	0.200	20	10/08/2018 01:01	WG1177336
Methyl tert-butyl ether	0.963		0.00734	0.0200	20	10/08/2018 01:01	WG1177336
Naphthalene	U		0.0200	0.100	20	10/08/2018 01:01	WG1177336
n-Propylbenzene	0.00759	J	0.00698	0.0200	20	10/08/2018 01:01	WG1177336
Styrene	U		0.00614	0.0200	20	10/08/2018 01:01	WG1177336
1,1,1,2-Tetrachloroethane	U		0.00770	0.0200	20	10/08/2018 01:01	WG1177336
1,1,2,2-Tetrachloroethane	U		0.00260	0.0200	20	10/08/2018 01:01	WG1177336
Tetrachloroethene	U		0.00744	0.0200	20	10/08/2018 01:01	WG1177336
Toluene	U		0.00824	0.0200	20	10/08/2018 01:01	WG1177336
1,1,1-Trichloroethane	U		0.00638	0.0200	20	10/08/2018 01:01	WG1177336
1,1,2-Trichloroethane	U		0.00766	0.0200	20	10/08/2018 01:01	WG1177336
Trichloroethene	U		0.00796	0.0200	20	10/08/2018 01:01	WG1177336
1,2,4-Trimethylbenzene	U		0.00746	0.0200	20	10/08/2018 01:01	WG1177336
1,3,5-Trimethylbenzene	U		0.00774	0.0200	20	10/08/2018 01:01	WG1177336
Vinyl chloride	U		0.00518	0.0200	20	10/08/2018 01:01	WG1177336
o-Xylene	U		0.00682	0.0200	20	10/08/2018 01:01	WG1177336
m&p-Xylene	U		0.0144	0.0400	20	10/08/2018 01:01	WG1177336
Xylenes, Total	U		0.0212	0.0600	20	10/08/2018 01:01	WG1177336
(S) Toluene-d8	*103*			*80.0-120*		*10/08/2018 01:01*	WG1177336
(S) Dibromofluoromethane	*103*			*75.0-120*		*10/08/2018 01:01*	WG1177336
(S) 4-Bromofluorobenzene	*97.2*			*77.0-126*		*10/08/2018 01:01*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	2.04		0.0247	0.100	1	10/13/2018 10:02	WG1178288
(S) o-Terphenyl	*76.8*			*31.0-160*		*10/13/2018 10:02*	WG1178288

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	3910		14.1	50.0	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	0.440		0.0197	0.100	1	10/11/2018 13:23	WG1178873

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	284		1.04	20.0	20	10/11/2018 04:58	WG1176733
Fluoride	0.995		0.00990	0.100	1	10/11/2018 04:49	WG1176733
Sulfate	2300		3.87	250	50	10/11/2018 12:19	WG1176733

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00334		0.000250	0.00200	1	10/11/2018 19:05	WG1176863
Barium	0.00858		0.000360	0.00500	1	10/11/2018 19:05	WG1176863
Calcium	534		0.0460	1.00	1	10/11/2018 19:05	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 19:05	WG1176863
Iron	U		0.0150	0.100	1	10/11/2018 19:05	WG1176863
Lead	U		0.000240	0.00200	1	10/11/2018 19:05	WG1176863
Manganese	0.390		0.000250	0.00500	1	10/11/2018 19:05	WG1176863
Potassium	1.31		0.0370	1.00	1	10/11/2018 19:05	WG1176863
Selenium	0.00238		0.000380	0.00200	1	10/11/2018 19:05	WG1176863
Sodium	211		0.110	1.00	1	10/11/2018 19:05	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 15:03	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/09/2018 15:03*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 01:21	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 01:21	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 01:21	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 01:21	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 01:21	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 01:21	WG1177336
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 01:21	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 01:21	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 01:21	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 01:21	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 01:21	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 01:21	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 01:21	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 01:21	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 01:21	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 01:21	WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 01:21	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 01:21	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 01:21	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 01:21	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 01:21	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 01:21	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 01:21	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 01:21	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 01:21	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 01:21	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 01:21	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 01:21	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 01:21	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 01:21	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 01:21	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 01:21	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 01:21	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 01:21	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 01:21	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 01:21	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 01:21	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 01:21	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 01:21	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 01:21	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 01:21	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 01:21	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 01:21	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 01:21	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 01:21	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 01:21	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 01:21	WG1177336
(S) Toluene-d8	*102*			*80.0-120*		*10/08/2018 01:21*	WG1177336
(S) Dibromofluoromethane	*103*			*75.0-120*		*10/08/2018 01:21*	WG1177336
(S) 4-Bromofluorobenzene	*109*			*77.0-126*		*10/08/2018 01:21*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.211		0.0247	0.100	1	10/13/2018 10:20	WG1178288
(S) o-Terphenyl	*71.6*			*31.0-160*		*10/13/2018 10:20*	WG1178288

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4090		14.1	50.0	1	10/10/2018 19:51	WG1178372

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.727		0.0197	0.100	1	10/11/2018 13:24	WG1178873

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	226		1.04	20.0	20	10/11/2018 05:18	WG1176733
Fluoride	1.15		0.00990	0.100	1	10/11/2018 05:08	WG1176733
Sulfate	2150		3.87	250	50	10/11/2018 12:28	WG1176733

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00304		0.000250	0.00200	1	10/11/2018 19:29	WG1176863
Barium	0.00833		0.000360	0.00500	1	10/11/2018 19:29	WG1176863
Calcium	557		0.0460	1.00	1	10/11/2018 19:29	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 19:29	WG1176863
Iron	U		0.0150	0.100	1	10/11/2018 19:29	WG1176863
Lead	U		0.000240	0.00200	1	10/11/2018 19:29	WG1176863
Manganese	0.0211		0.000250	0.00500	1	10/11/2018 19:29	WG1176863
Potassium	1.18		0.0370	1.00	1	10/11/2018 19:29	WG1176863
Selenium	0.00475		0.000380	0.00200	1	10/12/2018 11:21	WG1176863
Sodium	170		0.110	1.00	1	10/11/2018 19:29	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 15:23	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*106*			*78.0-120*		*10/09/2018 15:23*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/08/2018 01:40	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 01:40	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 01:40	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 01:40	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 01:40	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 01:40	WG1177336
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 01:40	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 01:40	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 01:40	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 01:40	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 01:40	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 01:40	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 01:40	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 01:40	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 01:40	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 01:40	WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 01:40	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 01:40	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 01:40	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 01:40	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 01:40	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 01:40	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 01:40	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 01:40	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 01:40	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 01:40	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 01:40	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 01:40	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 01:40	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 01:40	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 01:40	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 01:40	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 01:40	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 01:40	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 01:40	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 01:40	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 01:40	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 01:40	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 01:40	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 01:40	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 01:40	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 01:40	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 01:40	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 01:40	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 01:40	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 01:40	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 01:40	WG1177336
(S) Toluene-d8	*101*			*80.0-120*		*10/08/2018 01:40*	WG1177336
(S) Dibromofluoromethane	*102*			*75.0-120*		*10/08/2018 01:40*	WG1177336
(S) 4-Bromofluorobenzene	*99.6*			*77.0-126*		*10/08/2018 01:40*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0468	J	0.0247	0.100	1	10/13/2018 10:37	WG1178288
(S) o-Terphenyl	*71.1*			*31.0-160*		*10/13/2018 10:37*	WG1178288

MW-101

Collected date/time: 10/03/18 09:15

SAMPLE RESULTS - 25

L1032152

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1280	J3	5.64	20.0	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/11/2018 13:26	WG1178873

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	215		0.519	10.0	10	10/11/2018 05:37	WG1176733
Fluoride	0.759		0.00990	0.100	1	10/11/2018 05:28	WG1176733
Sulfate	163		0.774	50.0	10	10/11/2018 05:37	WG1176733

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.0819		0.000250	0.00200	1	10/11/2018 19:33	WG1176863
Barium	0.0374		0.000360	0.00500	1	10/11/2018 19:33	WG1176863
Calcium	183		0.0460	1.00	1	10/11/2018 19:33	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 19:33	WG1176863
Iron	2.68		0.0150	0.100	1	10/11/2018 19:33	WG1176863
Lead	U		0.000240	0.00200	1	10/11/2018 19:33	WG1176863
Manganese	1.12		0.000250	0.00500	1	10/11/2018 19:33	WG1176863
Potassium	0.482	J	0.0370	1.00	1	10/11/2018 19:33	WG1176863
Selenium	U		0.000380	0.00200	1	10/11/2018 19:33	WG1176863
Sodium	133		0.110	1.00	1	10/11/2018 19:33	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.452		0.0314	0.100	1	10/09/2018 15:44	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*106*			*78.0-120*		*10/09/2018 15:44*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 02:00	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 02:00	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 02:00	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 02:00	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 02:00	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 02:00	WG1177336
sec-Butylbenzene	0.000464	J	0.000365	0.00100	1	10/08/2018 02:00	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 02:00	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 02:00	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 02:00	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 02:00	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 02:00	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 02:00	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 02:00	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 02:00	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 02:00	WG1177336

MW-101

Collected date/time: 10/03/18 09:15

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 02:00	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 02:00	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 02:00	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 02:00	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 02:00	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 02:00	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 02:00	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 02:00	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 02:00	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 02:00	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 02:00	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 02:00	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 02:00	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 02:00	WG1177336
Methyl tert-butyl ether	0.125		0.000367	0.00100	1	10/08/2018 02:00	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 02:00	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 02:00	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 02:00	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 02:00	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 02:00	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 02:00	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 02:00	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 02:00	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 02:00	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 02:00	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 02:00	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 02:00	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 02:00	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 02:00	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 02:00	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 02:00	WG1177336
(S) Toluene-d8	*98.9*			*80.0-120*		*10/08/2018 02:00*	WG1177336
(S) Dibromofluoromethane	*110*			*75.0-120*		*10/08/2018 02:00*	WG1177336
(S) 4-Bromofluorobenzene	*97.5*			*77.0-126*		*10/08/2018 02:00*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	5.05		0.0247	0.100	1	10/13/2018 15:14	WG1178288
(S) o-Terphenyl	*86.8*			*31.0-160*		*10/13/2018 15:14*	WG1178288

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1470		5.64	20.0	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.394	2.00	20	10/11/2018 13:33	WG1178873

Sample Narrative:

L1032152-26 WG1178873: Diluted matrix interference due to high sulfide content

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	99.9		0.0519	1.00	1	10/11/2018 05:47	WG1176733
Fluoride	1.12		0.00990	0.100	1	10/11/2018 05:47	WG1176733
Sulfate	414		0.774	50.0	10	10/11/2018 06:16	WG1176733

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00742		0.000250	0.00200	1	10/11/2018 19:38	WG1176863
Barium	0.283		0.000360	0.00500	1	10/11/2018 19:38	WG1176863
Calcium	291		0.0460	1.00	1	10/11/2018 19:38	WG1176863
Chromium	0.00246		0.000540	0.00200	1	10/11/2018 19:38	WG1176863
Iron	0.848		0.0150	0.100	1	10/11/2018 19:38	WG1176863
Lead	0.000804	J	0.000240	0.00200	1	10/11/2018 19:38	WG1176863
Manganese	0.216		0.000250	0.00500	1	10/11/2018 19:38	WG1176863
Potassium	6.13		0.0370	1.00	1	10/11/2018 19:38	WG1176863
Selenium	0.000508	J	0.000380	0.00200	1	10/11/2018 19:38	WG1176863
Sodium	74.8		0.110	1.00	1	10/11/2018 19:38	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	17.7		0.157	0.500	5	10/09/2018 16:05	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*94.6*			*78.0-120*		*10/09/2018 16:05*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		1.00	5.00	100	10/08/2018 02:20	WG1177336
Benzene	6.29		0.0331	0.100	100	10/08/2018 02:20	WG1177336
Bromodichloromethane	U		0.0380	0.100	100	10/08/2018 02:20	WG1177336
Bromoform	U		0.0469	0.100	100	10/08/2018 02:20	WG1177336
Bromomethane	U		0.0866	0.500	100	10/08/2018 02:20	WG1177336
n-Butylbenzene	U		0.0361	0.100	100	10/08/2018 02:20	WG1177336
sec-Butylbenzene	U		0.0365	0.100	100	10/08/2018 02:20	WG1177336
Carbon disulfide	U		0.0275	0.100	100	10/08/2018 02:20	WG1177336
Carbon tetrachloride	U		0.0379	0.100	100	10/08/2018 02:20	WG1177336
Chlorobenzene	U		0.0348	0.100	100	10/08/2018 02:20	WG1177336
Chlorodibromomethane	U		0.0327	0.100	100	10/08/2018 02:20	WG1177336
Chloroethane	U		0.0453	0.500	100	10/08/2018 02:20	WG1177336
Chloroform	U		0.0324	0.500	100	10/08/2018 02:20	WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.0276	0.250	100	10/08/2018 02:20	WG1177336
1,2-Dibromoethane	U		0.0381	0.100	100	10/08/2018 02:20	WG1177336
1,1-Dichloroethane	U		0.0259	0.100	100	10/08/2018 02:20	WG1177336
1,2-Dichloroethane	U		0.0361	0.100	100	10/08/2018 02:20	WG1177336
1,1-Dichloroethene	U		0.0398	0.100	100	10/08/2018 02:20	WG1177336
cis-1,2-Dichloroethene	U		0.0260	0.100	100	10/08/2018 02:20	WG1177336
trans-1,2-Dichloroethene	U		0.0396	0.100	100	10/08/2018 02:20	WG1177336
1,2-Dichloropropane	U		0.0306	0.100	100	10/08/2018 02:20	WG1177336
cis-1,3-Dichloropropene	U		0.0418	0.100	100	10/08/2018 02:20	WG1177336
trans-1,3-Dichloropropene	U		0.0419	0.100	100	10/08/2018 02:20	WG1177336
Ethylbenzene	0.257		0.0384	0.100	100	10/08/2018 02:20	WG1177336
Isopropylbenzene	0.0436	J	0.0326	0.100	100	10/08/2018 02:20	WG1177336
p-Isopropyltoluene	U		0.0350	0.100	100	10/08/2018 02:20	WG1177336
2-Butanone (MEK)	U		0.393	1.00	100	10/08/2018 02:20	WG1177336
2-Hexanone	U		0.382	1.00	100	10/08/2018 02:20	WG1177336
Methylene Chloride	U		0.100	0.500	100	10/08/2018 02:20	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	10/08/2018 02:20	WG1177336
Methyl tert-butyl ether	U		0.0367	0.100	100	10/08/2018 02:20	WG1177336
Naphthalene	U		0.100	0.500	100	10/08/2018 02:20	WG1177336
n-Propylbenzene	0.0508	J	0.0349	0.100	100	10/08/2018 02:20	WG1177336
Styrene	U		0.0307	0.100	100	10/08/2018 02:20	WG1177336
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	10/08/2018 02:20	WG1177336
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	10/08/2018 02:20	WG1177336
Tetrachloroethene	U		0.0372	0.100	100	10/08/2018 02:20	WG1177336
Toluene	U		0.0412	0.100	100	10/08/2018 02:20	WG1177336
1,1,1-Trichloroethane	U		0.0319	0.100	100	10/08/2018 02:20	WG1177336
1,1,2-Trichloroethane	U		0.0383	0.100	100	10/08/2018 02:20	WG1177336
Trichloroethene	U		0.0398	0.100	100	10/08/2018 02:20	WG1177336
1,2,4-Trimethylbenzene	0.0751	J	0.0373	0.100	100	10/08/2018 02:20	WG1177336
1,3,5-Trimethylbenzene	U		0.0387	0.100	100	10/08/2018 02:20	WG1177336
Vinyl chloride	U		0.0259	0.100	100	10/08/2018 02:20	WG1177336
o-Xylene	U		0.0341	0.100	100	10/08/2018 02:20	WG1177336
m&p-Xylene	0.277		0.0719	0.200	100	10/08/2018 02:20	WG1177336
Xylenes, Total	0.277	J	0.106	0.300	100	10/08/2018 02:20	WG1177336
(S) Toluene-d8	*97.2*			*80.0-120*		*10/08/2018 02:20*	WG1177336
(S) Dibromofluoromethane	*102*			*75.0-120*		*10/08/2018 02:20*	WG1177336
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/08/2018 02:20*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	13.4		0.123	0.500	5	10/13/2018 19:18	WG1178288
(S) o-Terphenyl	*109*			*31.0-160*		*10/13/2018 19:18*	WG1178288

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2730		14.1	50.0	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		1.97	10.0	100	10/11/2018 13:35	WG1178873

Sample Narrative:

L1032152-27 WG1178873: Diluted matrix interference due to high sulfide content

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.180	0.500	100	10/12/2018 17:57	WG1179442

Sample Narrative:

L1032152-27 WG1179442: matrix interference: high sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	406		1.04	20.0	20	10/11/2018 06:35	WG1176733
Fluoride	0.873		0.00990	0.100	1	10/11/2018 06:26	WG1176733
Sulfate	384		1.55	100	20	10/11/2018 06:35	WG1176733

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:14	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.989		0.0126	0.200	1	10/09/2018 14:21	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0129		0.000250	0.00200	1	10/11/2018 19:43	WG1176863
Barium	0.0942		0.000360	0.00500	1	10/11/2018 19:43	WG1176863
Cadmium	U		0.000160	0.00100	1	10/11/2018 19:43	WG1176863
Calcium	133		0.0460	1.00	1	10/11/2018 19:43	WG1176863
Chromium	0.000586	J	0.000540	0.00200	1	10/11/2018 19:43	WG1176863
Cobalt	U		0.000260	0.00200	1	10/11/2018 19:43	WG1176863
Iron	0.0553	J	0.0150	0.100	1	10/11/2018 19:43	WG1176863
Lead	0.00318		0.000240	0.00200	1	10/11/2018 19:43	WG1176863
Manganese	0.183		0.000250	0.00500	1	10/11/2018 19:43	WG1176863
Nickel	0.0126		0.000350	0.00200	1	10/11/2018 19:43	WG1176863
Potassium	0.971	J	0.0370	1.00	1	10/11/2018 19:43	WG1176863
Selenium	0.341		0.000380	0.00200	1	10/11/2018 19:43	WG1176863
Sodium	632		0.110	1.00	1	10/11/2018 19:43	WG1176863
Uranium	U		0.000330	0.0100	1	10/11/2018 19:43	WG1176863
Vanadium	0.00844		0.000180	0.00500	1	10/11/2018 19:43	WG1176863

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	32.6		0.628	2.00	20	10/09/2018 16:26	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*103*			*78.0-120*		*10/09/2018 16:26*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		2.00	10.0	200	10/08/2018 02:39	WG1177336
Benzene	10.6		0.0662	0.200	200	10/08/2018 02:39	WG1177336
Bromodichloromethane	U		0.0760	0.200	200	10/08/2018 02:39	WG1177336
Bromoform	U		0.0938	0.200	200	10/08/2018 02:39	WG1177336
Bromomethane	U		0.173	1.00	200	10/08/2018 02:39	WG1177336
n-Butylbenzene	U		0.0722	0.200	200	10/08/2018 02:39	WG1177336
sec-Butylbenzene	U		0.0730	0.200	200	10/08/2018 02:39	WG1177336
Carbon disulfide	U		0.0550	0.200	200	10/08/2018 02:39	WG1177336
Carbon tetrachloride	U		0.0758	0.200	200	10/08/2018 02:39	WG1177336
Chlorobenzene	U		0.0696	0.200	200	10/08/2018 02:39	WG1177336
Chlorodibromomethane	U		0.0654	0.200	200	10/08/2018 02:39	WG1177336
Chloroethane	U		0.0906	1.00	200	10/08/2018 02:39	WG1177336
Chloroform	U		0.0648	1.00	200	10/08/2018 02:39	WG1177336
Chloromethane	U		0.0552	0.500	200	10/08/2018 02:39	WG1177336
1,2-Dibromoethane	U		0.0762	0.200	200	10/08/2018 02:39	WG1177336
1,1-Dichloroethane	U		0.0518	0.200	200	10/08/2018 02:39	WG1177336
1,2-Dichloroethane	U		0.0722	0.200	200	10/08/2018 02:39	WG1177336
1,1-Dichloroethene	U		0.0796	0.200	200	10/08/2018 02:39	WG1177336
cis-1,2-Dichloroethene	U		0.0520	0.200	200	10/08/2018 02:39	WG1177336
trans-1,2-Dichloroethene	U		0.0792	0.200	200	10/08/2018 02:39	WG1177336
1,2-Dichloropropane	U		0.0612	0.200	200	10/08/2018 02:39	WG1177336
cis-1,3-Dichloropropene	U		0.0836	0.200	200	10/08/2018 02:39	WG1177336
trans-1,3-Dichloropropene	U		0.0838	0.200	200	10/08/2018 02:39	WG1177336
Ethylbenzene	1.09		0.0768	0.200	200	10/08/2018 02:39	WG1177336
Isopropylbenzene	0.0812	J	0.0652	0.200	200	10/08/2018 02:39	WG1177336
p-Isopropyltoluene	U		0.0700	0.200	200	10/08/2018 02:39	WG1177336
2-Butanone (MEK)	U		0.786	2.00	200	10/08/2018 02:39	WG1177336
2-Hexanone	U		0.764	2.00	200	10/08/2018 02:39	WG1177336
Methylene Chloride	U		0.200	1.00	200	10/08/2018 02:39	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.428	2.00	200	10/08/2018 02:39	WG1177336
Methyl tert-butyl ether	0.0876	J	0.0734	0.200	200	10/08/2018 02:39	WG1177336
Naphthalene	0.237	J	0.200	1.00	200	10/08/2018 02:39	WG1177336
n-Propylbenzene	0.101	J	0.0698	0.200	200	10/08/2018 02:39	WG1177336
Styrene	U		0.0614	0.200	200	10/08/2018 02:39	WG1177336
1,1,1,2-Tetrachloroethane	U		0.0770	0.200	200	10/08/2018 02:39	WG1177336
1,1,2,2-Tetrachloroethane	U		0.0260	0.200	200	10/08/2018 02:39	WG1177336
Tetrachloroethene	U		0.0744	0.200	200	10/08/2018 02:39	WG1177336
Toluene	0.977		0.0824	0.200	200	10/08/2018 02:39	WG1177336
1,1,1-Trichloroethane	U		0.0638	0.200	200	10/08/2018 02:39	WG1177336
1,1,2-Trichloroethane	U		0.0766	0.200	200	10/08/2018 02:39	WG1177336
Trichloroethene	U		0.0796	0.200	200	10/08/2018 02:39	WG1177336
1,2,4-Trimethylbenzene	0.342		0.0746	0.200	200	10/08/2018 02:39	WG1177336
1,3,5-Trimethylbenzene	U		0.0774	0.200	200	10/08/2018 02:39	WG1177336
Vinyl chloride	U		0.0518	0.200	200	10/08/2018 02:39	WG1177336
o-Xylene	0.165	J	0.0682	0.200	200	10/08/2018 02:39	WG1177336
m&p-Xylene	0.523		0.144	0.400	200	10/08/2018 02:39	WG1177336
Xylenes, Total	0.688		0.212	0.600	200	10/08/2018 02:39	WG1177336
(S) Toluene-d8	*99.7*			*80.0-120*		*10/08/2018 02:39*	WG1177336
(S) Dibromofluoromethane	*109*			*75.0-120*		*10/08/2018 02:39*	WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/08/2018 02:39*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	8.76		0.0247	0.100	1	10/13/2018 15:49	WG1178288
(S) o-Terphenyl	*64.2*			*31.0-160*		*10/13/2018 15:49*	WG1178288

MW-138

Collected date/time: 10/03/18 13:45

SAMPLE RESULTS - 28

L1032152

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1510		14.1	50.0	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/11/2018 13:36	WG1178873

Wet Chemistry by Method 4500CN E-2011

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/11/2018 16:21	WG1178772

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Chloride	408		1.04	20.0	20	10/11/2018 06:54	WG1176733
Fluoride	0.802		0.00990	0.100	1	10/11/2018 06:45	WG1176733
Sulfate	30.3		0.0774	5.00	1	10/11/2018 06:45	WG1176733

Mercury by Method 7470A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:16	WG1177220

Metals (ICP) by Method 6010B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Boron	0.927		0.0126	0.200	1	10/09/2018 14:24	WG1176839

Metals (ICPMS) by Method 6020

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00464		0.000250	0.00200	1	10/11/2018 19:47	WG1176863
Barium	0.108		0.000360	0.00500	1	10/11/2018 19:47	WG1176863
Cadmium	U		0.000160	0.00100	1	10/11/2018 19:47	WG1176863
Calcium	122		0.0460	1.00	1	10/11/2018 19:47	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 19:47	WG1176863
Cobalt	U		0.000260	0.00200	1	10/11/2018 19:47	WG1176863
Iron	0.0235	J	0.0150	0.100	1	10/11/2018 19:47	WG1176863
Lead	0.000249	J	0.000240	0.00200	1	10/11/2018 19:47	WG1176863
Manganese	0.111		0.000250	0.00500	1	10/11/2018 19:47	WG1176863
Nickel	0.00490		0.000350	0.00200	1	10/11/2018 19:47	WG1176863
Potassium	1.60		0.0370	1.00	1	10/11/2018 19:47	WG1176863
Selenium	0.0973		0.000380	0.00200	1	10/11/2018 19:47	WG1176863
Sodium	362		0.110	1.00	1	10/11/2018 19:47	WG1176863
Uranium	U		0.000330	0.0100	1	10/11/2018 19:47	WG1176863
Vanadium	0.00120	J	0.000180	0.00500	1	10/11/2018 19:47	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	4.06		0.0314	0.100	1	10/09/2018 16:47	WG1177964

MW-138
Collected date/time: 10/03/18 13:45

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*90.7*			*78.0-120*		*10/09/2018 16:47*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0500	0.250	5	10/08/2018 02:59	WG1177336
Benzene	0.628		0.00166	0.00500	5	10/08/2018 02:59	WG1177336
Bromodichloromethane	U		0.00190	0.00500	5	10/08/2018 02:59	WG1177336
Bromoform	U		0.00234	0.00500	5	10/08/2018 02:59	WG1177336
Bromomethane	U		0.00433	0.0250	5	10/08/2018 02:59	WG1177336
n-Butylbenzene	U		0.00180	0.00500	5	10/08/2018 02:59	WG1177336
sec-Butylbenzene	0.00906		0.00182	0.00500	5	10/08/2018 02:59	WG1177336
Carbon disulfide	U		0.00138	0.00500	5	10/08/2018 02:59	WG1177336
Carbon tetrachloride	U		0.00190	0.00500	5	10/08/2018 02:59	WG1177336
Chlorobenzene	U		0.00174	0.00500	5	10/08/2018 02:59	WG1177336
Chlorodibromomethane	U		0.00164	0.00500	5	10/08/2018 02:59	WG1177336
Chloroethane	U		0.00226	0.0250	5	10/08/2018 02:59	WG1177336
Chloroform	U		0.00162	0.0250	5	10/08/2018 02:59	WG1177336
Chloromethane	U		0.00138	0.0125	5	10/08/2018 02:59	WG1177336
1,2-Dibromoethane	U		0.00190	0.00500	5	10/08/2018 02:59	WG1177336
1,1-Dichloroethane	U		0.00130	0.00500	5	10/08/2018 02:59	WG1177336
1,2-Dichloroethane	U		0.00180	0.00500	5	10/08/2018 02:59	WG1177336
1,1-Dichloroethene	U		0.00199	0.00500	5	10/08/2018 02:59	WG1177336
cis-1,2-Dichloroethene	U		0.00130	0.00500	5	10/08/2018 02:59	WG1177336
trans-1,2-Dichloroethene	U		0.00198	0.00500	5	10/08/2018 02:59	WG1177336
1,2-Dichloropropane	U		0.00153	0.00500	5	10/08/2018 02:59	WG1177336
cis-1,3-Dichloropropene	U		0.00209	0.00500	5	10/08/2018 02:59	WG1177336
trans-1,3-Dichloropropene	U		0.00210	0.00500	5	10/08/2018 02:59	WG1177336
Ethylbenzene	0.423		0.00192	0.00500	5	10/08/2018 02:59	WG1177336
Isopropylbenzene	0.0543		0.00163	0.00500	5	10/08/2018 02:59	WG1177336
p-Isopropyltoluene	0.00303	J	0.00175	0.00500	5	10/08/2018 02:59	WG1177336
2-Butanone (MEK)	U		0.0196	0.0500	5	10/08/2018 02:59	WG1177336
2-Hexanone	U		0.0191	0.0500	5	10/08/2018 02:59	WG1177336
Methylene Chloride	0.00504	J	0.00500	0.0250	5	10/08/2018 02:59	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.0107	0.0500	5	10/08/2018 02:59	WG1177336
Methyl tert-butyl ether	0.269		0.00184	0.00500	5	10/08/2018 02:59	WG1177336
Naphthalene	0.0379		0.00500	0.0250	5	10/08/2018 02:59	WG1177336
n-Propylbenzene	0.0724		0.00174	0.00500	5	10/08/2018 02:59	WG1177336
Styrene	U		0.00154	0.00500	5	10/08/2018 02:59	WG1177336
1,1,1,2-Tetrachloroethane	U		0.00192	0.00500	5	10/08/2018 02:59	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000650	0.00500	5	10/08/2018 02:59	WG1177336
Tetrachloroethene	U		0.00186	0.00500	5	10/08/2018 02:59	WG1177336
Toluene	0.00806		0.00206	0.00500	5	10/08/2018 02:59	WG1177336
1,1,1-Trichloroethane	U		0.00160	0.00500	5	10/08/2018 02:59	WG1177336
1,1,2-Trichloroethane	U		0.00192	0.00500	5	10/08/2018 02:59	WG1177336
Trichloroethene	U		0.00199	0.00500	5	10/08/2018 02:59	WG1177336
1,2,4-Trimethylbenzene	0.0799		0.00186	0.00500	5	10/08/2018 02:59	WG1177336
1,3,5-Trimethylbenzene	0.0121		0.00194	0.00500	5	10/08/2018 02:59	WG1177336
Vinyl chloride	U		0.00130	0.00500	5	10/08/2018 02:59	WG1177336
o-Xylene	0.00635		0.00170	0.00500	5	10/08/2018 02:59	WG1177336
m&p-Xylene	0.109		0.00360	0.0100	5	10/08/2018 02:59	WG1177336
Xylenes, Total	0.115		0.00530	0.0150	5	10/08/2018 02:59	WG1177336
(S) Toluene-d8	*122*	J1		*80.0-120*		*10/08/2018 02:59*	WG1177336
(S) Dibromofluoromethane	*105*			*75.0-120*		*10/08/2018 02:59*	WG1177336
(S) 4-Bromofluorobenzene	*98.4*			*77.0-126*		*10/08/2018 02:59*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	6.00		0.0247	0.100	1	10/13/2018 16:07	WG1178288
(S) o-Terphenyl	*95.3*			*31.0-160*		*10/13/2018 16:07*	WG1178288

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	1830		14.1	50.0	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/11/2018 13:38	WG1178873

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	418		1.04	20.0	20	10/11/2018 07:14	WG1176733
Fluoride	1.49		0.00990	0.100	1	10/11/2018 07:04	WG1176733
Sulfate	10.8		0.0774	5.00	1	10/11/2018 07:04	WG1176733

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00455		0.000250	0.00200	1	10/11/2018 19:52	WG1176863
Barium	8.55		0.00180	0.0250	5	10/12/2018 11:26	WG1176863
Calcium	104		0.0460	1.00	1	10/11/2018 19:52	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 19:52	WG1176863
Iron	0.0527	J	0.0150	0.100	1	10/11/2018 19:52	WG1176863
Lead	0.00657		0.000240	0.00200	1	10/11/2018 19:52	WG1176863
Manganese	0.0630		0.000250	0.00500	1	10/11/2018 19:52	WG1176863
Potassium	1.41		0.0370	1.00	1	10/11/2018 19:52	WG1176863
Selenium	0.0661		0.000380	0.00200	1	10/11/2018 19:52	WG1176863
Sodium	429		0.110	1.00	1	10/11/2018 19:52	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	13.4		0.314	1.00	10	10/09/2018 17:08	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/09/2018 17:08*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		1.00	5.00	100	10/08/2018 03:19	WG1177336
Benzene	6.27		0.0331	0.100	100	10/08/2018 03:19	WG1177336
Bromodichloromethane	U		0.0380	0.100	100	10/08/2018 03:19	WG1177336
Bromoform	U		0.0469	0.100	100	10/08/2018 03:19	WG1177336
Bromomethane	U		0.0866	0.500	100	10/08/2018 03:19	WG1177336
n-Butylbenzene	U		0.0361	0.100	100	10/08/2018 03:19	WG1177336
sec-Butylbenzene	U		0.0365	0.100	100	10/08/2018 03:19	WG1177336
Carbon disulfide	U		0.0275	0.100	100	10/08/2018 03:19	WG1177336
Carbon tetrachloride	U		0.0379	0.100	100	10/08/2018 03:19	WG1177336
Chlorobenzene	U		0.0348	0.100	100	10/08/2018 03:19	WG1177336
Chlorodibromomethane	U		0.0327	0.100	100	10/08/2018 03:19	WG1177336
Chloroethane	U		0.0453	0.500	100	10/08/2018 03:19	WG1177336
Chloroform	U		0.0324	0.500	100	10/08/2018 03:19	WG1177336
Chloromethane	U		0.0276	0.250	100	10/08/2018 03:19	WG1177336
1,2-Dibromoethane	U		0.0381	0.100	100	10/08/2018 03:19	WG1177336
1,1-Dichloroethane	U		0.0259	0.100	100	10/08/2018 03:19	WG1177336

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.0361	0.100	100	10/08/2018 03:19	WG1177336
1,1-Dichloroethene	U		0.0398	0.100	100	10/08/2018 03:19	WG1177336
cis-1,2-Dichloroethene	U		0.0260	0.100	100	10/08/2018 03:19	WG1177336
trans-1,2-Dichloroethene	U		0.0396	0.100	100	10/08/2018 03:19	WG1177336
1,2-Dichloropropane	U		0.0306	0.100	100	10/08/2018 03:19	WG1177336
cis-1,3-Dichloropropene	U		0.0418	0.100	100	10/08/2018 03:19	WG1177336
trans-1,3-Dichloropropene	U		0.0419	0.100	100	10/08/2018 03:19	WG1177336
Ethylbenzene	0.0392	J	0.0384	0.100	100	10/08/2018 03:19	WG1177336
Isopropylbenzene	0.108		0.0326	0.100	100	10/08/2018 03:19	WG1177336
p-Isopropyltoluene	U		0.0350	0.100	100	10/08/2018 03:19	WG1177336
2-Butanone (MEK)	U		0.393	1.00	100	10/08/2018 03:19	WG1177336
2-Hexanone	U		0.382	1.00	100	10/08/2018 03:19	WG1177336
Methylene Chloride	U		0.100	0.500	100	10/08/2018 03:19	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.214	1.00	100	10/08/2018 03:19	WG1177336
Methyl tert-butyl ether	U		0.0367	0.100	100	10/08/2018 03:19	WG1177336
Naphthalene	0.145	J	0.100	0.500	100	10/08/2018 03:19	WG1177336
n-Propylbenzene	0.176		0.0349	0.100	100	10/08/2018 03:19	WG1177336
Styrene	U		0.0307	0.100	100	10/08/2018 03:19	WG1177336
1,1,1,2-Tetrachloroethane	U		0.0385	0.100	100	10/08/2018 03:19	WG1177336
1,1,2,2-Tetrachloroethane	U		0.0130	0.100	100	10/08/2018 03:19	WG1177336
Tetrachloroethene	U		0.0372	0.100	100	10/08/2018 03:19	WG1177336
Toluene	U		0.0412	0.100	100	10/08/2018 03:19	WG1177336
1,1,1-Trichloroethane	U		0.0319	0.100	100	10/08/2018 03:19	WG1177336
1,1,2-Trichloroethane	U		0.0383	0.100	100	10/08/2018 03:19	WG1177336
Trichloroethene	U		0.0398	0.100	100	10/08/2018 03:19	WG1177336
1,2,4-Trimethylbenzene	U		0.0373	0.100	100	10/08/2018 03:19	WG1177336
1,3,5-Trimethylbenzene	U		0.0387	0.100	100	10/08/2018 03:19	WG1177336
Vinyl chloride	U		0.0259	0.100	100	10/08/2018 03:19	WG1177336
o-Xylene	U		0.0341	0.100	100	10/08/2018 03:19	WG1177336
m&p-Xylene	U		0.0719	0.200	100	10/08/2018 03:19	WG1177336
Xylenes, Total	U		0.106	0.300	100	10/08/2018 03:19	WG1177336
(S) Toluene-d8	*97.5*			*80.0-120*		*10/08/2018 03:19*	WG1177336
(S) Dibromofluoromethane	*106*			*75.0-120*		*10/08/2018 03:19*	WG1177336
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/08/2018 03:19*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	13.7		0.0494	0.200	2	10/11/2018 16:05	WG1178290
(S) o-Terphenyl	*118*			*31.0-160*		*10/11/2018 16:05*	WG1178290

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Dissolved Solids	2490		14.1	50.0	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Nitrate-Nitrite	U		0.0197	0.100	1	10/11/2018 13:39	WG1178873

Wet Chemistry by Method 9056A

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloride	95.9		0.519	10.0	10	10/11/2018 07:33	WG1176733
Fluoride	3.62		0.00990	0.100	1	10/11/2018 07:23	WG1176733
Sulfate	770		0.774	50.0	10	10/11/2018 07:33	WG1176733

Metals (ICPMS) by Method 6020

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Arsenic	0.00800		0.000250	0.00200	1	10/11/2018 19:56	WG1176863
Barium	0.0687		0.000360	0.00500	1	10/11/2018 19:56	WG1176863
Calcium	51.5		0.0460	1.00	1	10/11/2018 19:56	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 19:56	WG1176863
Iron	U		0.0150	0.100	1	10/11/2018 19:56	WG1176863
Lead	0.000324	J	0.000240	0.00200	1	10/11/2018 19:56	WG1176863
Manganese	0.0200		0.000250	0.00500	1	10/11/2018 19:56	WG1176863
Potassium	0.295	J	0.0370	1.00	1	10/11/2018 19:56	WG1176863
Selenium	0.0389		0.000380	0.00200	1	10/11/2018 19:56	WG1176863
Sodium	779		0.110	1.00	1	10/11/2018 19:56	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.758		0.0314	0.100	1	10/09/2018 17:28	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/09/2018 17:28*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 03:39	WG1177336
Benzene	0.0638		0.000331	0.00100	1	10/08/2018 03:39	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 03:39	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 03:39	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 03:39	WG1177336
n-Butylbenzene	0.00199		0.000361	0.00100	1	10/08/2018 03:39	WG1177336
sec-Butylbenzene	0.00321		0.000365	0.00100	1	10/08/2018 03:39	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 03:39	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 03:39	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 03:39	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 03:39	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 03:39	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 03:39	WG1177336
Chloromethane	0.000300	J	0.000276	0.00250	1	10/08/2018 03:39	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 03:39	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 03:39	WG1177336

MW-39

Collected date/time: 10/03/18 11:25

SAMPLE RESULTS - 30

L1032152

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 03:39	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 03:39	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 03:39	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 03:39	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 03:39	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 03:39	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 03:39	WG1177336
Ethylbenzene	0.0100		0.000384	0.00100	1	10/08/2018 03:39	WG1177336
Isopropylbenzene	0.0198		0.000326	0.00100	1	10/08/2018 03:39	WG1177336
p-Isopropyltoluene	0.000843	J	0.000350	0.00100	1	10/08/2018 03:39	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 03:39	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 03:39	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 03:39	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 03:39	WG1177336
Methyl tert-butyl ether	0.00180		0.000367	0.00100	1	10/08/2018 03:39	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 03:39	WG1177336
n-Propylbenzene	0.0165		0.000349	0.00100	1	10/08/2018 03:39	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 03:39	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 03:39	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 03:39	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 03:39	WG1177336
Toluene	0.00321		0.000412	0.00100	1	10/08/2018 03:39	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 03:39	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 03:39	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 03:39	WG1177336
1,2,4-Trimethylbenzene	0.0156		0.000373	0.00100	1	10/08/2018 03:39	WG1177336
1,3,5-Trimethylbenzene	0.00347		0.000387	0.00100	1	10/08/2018 03:39	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 03:39	WG1177336
o-Xylene	0.0244		0.000341	0.00100	1	10/08/2018 03:39	WG1177336
m&p-Xylene	0.0493		0.000719	0.00200	1	10/08/2018 03:39	WG1177336
Xylenes, Total	0.0737		0.00106	0.00300	1	10/08/2018 03:39	WG1177336
(S) Toluene-d8	*98.9*			*80.0-120*		*10/08/2018 03:39*	WG1177336
(S) Dibromofluoromethane	*110*			*75.0-120*		*10/08/2018 03:39*	WG1177336
(S) 4-Bromofluorobenzene	*97.8*			*77.0-126*		*10/08/2018 03:39*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	4.99		0.0247	0.100	1	10/11/2018 16:26	WG1178290
(S) o-Terphenyl	*116*			*31.0-160*		*10/11/2018 16:26*	WG1178290

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2990		14.1	50.0	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/11/2018 13:41	WG1178873

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	263		1.04	20.0	20	10/11/2018 08:12	WG1176733
Fluoride	0.953		0.00990	0.100	1	10/11/2018 07:43	WG1176733
Sulfate	1450		1.55	100	20	10/11/2018 08:12	WG1176733

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00209		0.000250	0.00200	1	10/11/2018 20:01	WG1176863
Barium	0.0289		0.000360	0.00500	1	10/11/2018 20:01	WG1176863
Calcium	344		0.0460	1.00	1	10/11/2018 20:01	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 20:01	WG1176863
Iron	U		0.0150	0.100	1	10/11/2018 20:01	WG1176863
Lead	U		0.000240	0.00200	1	10/11/2018 20:01	WG1176863
Manganese	0.341		0.000250	0.00500	1	10/11/2018 20:01	WG1176863
Potassium	1.08		0.0370	1.00	1	10/11/2018 20:01	WG1176863
Selenium	0.0275		0.000380	0.00200	1	10/11/2018 20:01	WG1176863
Sodium	324		0.110	1.00	1	10/11/2018 20:01	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	0.126		0.0314	0.100	1	10/09/2018 17:49	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/09/2018 17:49*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/08/2018 03:59	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 03:59	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 03:59	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 03:59	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 03:59	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 03:59	WG1177336
sec-Butylbenzene	0.000405	J	0.000365	0.00100	1	10/08/2018 03:59	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 03:59	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 03:59	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 03:59	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 03:59	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 03:59	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 03:59	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 03:59	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 03:59	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 03:59	WG1177336

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 03:59	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 03:59	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 03:59	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 03:59	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 03:59	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 03:59	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 03:59	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 03:59	WG1177336
Isopropylbenzene	0.00163		0.000326	0.00100	1	10/08/2018 03:59	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 03:59	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 03:59	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 03:59	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 03:59	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 03:59	WG1177336
Methyl tert-butyl ether	0.00403		0.000367	0.00100	1	10/08/2018 03:59	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 03:59	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 03:59	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 03:59	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 03:59	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 03:59	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 03:59	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 03:59	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 03:59	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 03:59	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 03:59	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 03:59	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 03:59	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 03:59	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 03:59	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 03:59	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 03:59	WG1177336
(S) Toluene-d8	*100*			*80.0-120*		*10/08/2018 03:59*	WG1177336
(S) Dibromofluoromethane	*105*			*75.0-120*		*10/08/2018 03:59*	WG1177336
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/08/2018 03:59*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.10		0.0247	0.100	1	10/11/2018 16:46	WG1178290
(S) o-Terphenyl	*105*			*31.0-160*		*10/11/2018 16:46*	WG1178290

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2650		14.1	50.0	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	10/11/2018 13:42	WG1178873

Sample Narrative:

L1032152-32 WG1178873: Diluted matrix interference due to high sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	208		1.04	20.0	20	10/11/2018 08:31	WG1176733
Fluoride	1.02		0.00990	0.100	1	10/11/2018 08:21	WG1176733
Sulfate	979		1.55	100	20	10/11/2018 08:31	WG1176733

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.0165		0.000250	0.00200	1	10/11/2018 20:06	WG1176863
Barium	0.0397		0.000360	0.00500	1	10/11/2018 20:06	WG1176863
Calcium	298		0.0460	1.00	1	10/11/2018 20:06	WG1176863
Chromium	0.00134	J	0.000540	0.00200	1	10/11/2018 20:06	WG1176863
Iron	0.102		0.0150	0.100	1	10/11/2018 20:06	WG1176863
Lead	0.00291		0.000240	0.00200	1	10/11/2018 20:06	WG1176863
Manganese	0.00317	J	0.000250	0.00500	1	10/11/2018 20:06	WG1176863
Potassium	0.979	J	0.0370	1.00	1	10/11/2018 20:06	WG1176863
Selenium	0.000436	J	0.000380	0.00200	1	10/12/2018 11:30	WG1176863
Sodium	265		0.110	1.00	1	10/11/2018 20:06	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	33.9		6.28	20.0	200	10/09/2018 18:10	WG1177964
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*		*10/09/2018 18:10*	WG1177964

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		5.00	25.0	500	10/08/2018 04:19	WG1177336
Benzene	11.6		0.166	0.500	500	10/08/2018 04:19	WG1177336
Bromodichloromethane	U		0.190	0.500	500	10/08/2018 04:19	WG1177336
Bromoform	U		0.234	0.500	500	10/08/2018 04:19	WG1177336
Bromomethane	U		0.433	2.50	500	10/08/2018 04:19	WG1177336
n-Butylbenzene	U		0.180	0.500	500	10/08/2018 04:19	WG1177336
sec-Butylbenzene	U		0.182	0.500	500	10/08/2018 04:19	WG1177336
Carbon disulfide	U		0.138	0.500	500	10/08/2018 04:19	WG1177336
Carbon tetrachloride	U		0.190	0.500	500	10/08/2018 04:19	WG1177336
Chlorobenzene	U		0.174	0.500	500	10/08/2018 04:19	WG1177336
Chlorodibromomethane	U		0.164	0.500	500	10/08/2018 04:19	WG1177336
Chloroethane	U		0.226	2.50	500	10/08/2018 04:19	WG1177336
Chloroform	U		0.162	2.50	500	10/08/2018 04:19	WG1177336

MW-106

Collected date/time: 10/03/18 10:35

SAMPLE RESULTS - 32

L1032152

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloromethane	U		0.138	1.25	500	10/08/2018 04:19	WG1177336
1,2-Dibromoethane	U		0.190	0.500	500	10/08/2018 04:19	WG1177336
1,1-Dichloroethane	U		0.130	0.500	500	10/08/2018 04:19	WG1177336
1,2-Dichloroethane	U		0.180	0.500	500	10/08/2018 04:19	WG1177336
1,1-Dichloroethene	U		0.199	0.500	500	10/08/2018 04:19	WG1177336
cis-1,2-Dichloroethene	U		0.130	0.500	500	10/08/2018 04:19	WG1177336
trans-1,2-Dichloroethene	U		0.198	0.500	500	10/08/2018 04:19	WG1177336
1,2-Dichloropropane	U		0.153	0.500	500	10/08/2018 04:19	WG1177336
cis-1,3-Dichloropropene	U		0.209	0.500	500	10/08/2018 04:19	WG1177336
trans-1,3-Dichloropropene	U		0.210	0.500	500	10/08/2018 04:19	WG1177336
Ethylbenzene	U		0.192	0.500	500	10/08/2018 04:19	WG1177336
Isopropylbenzene	U		0.163	0.500	500	10/08/2018 04:19	WG1177336
p-Isopropyltoluene	U		0.175	0.500	500	10/08/2018 04:19	WG1177336
2-Butanone (MEK)	U		1.96	5.00	500	10/08/2018 04:19	WG1177336
2-Hexanone	U		1.91	5.00	500	10/08/2018 04:19	WG1177336
Methylene Chloride	U		0.500	2.50	500	10/08/2018 04:19	WG1177336
4-Methyl-2-pentanone (MIBK)	U		1.07	5.00	500	10/08/2018 04:19	WG1177336
Methyl tert-butyl ether	U		0.184	0.500	500	10/08/2018 04:19	WG1177336
Naphthalene	U		0.500	2.50	500	10/08/2018 04:19	WG1177336
n-Propylbenzene	U		0.174	0.500	500	10/08/2018 04:19	WG1177336
Styrene	U		0.154	0.500	500	10/08/2018 04:19	WG1177336
1,1,1,2-Tetrachloroethane	U		0.192	0.500	500	10/08/2018 04:19	WG1177336
1,1,2,2-Tetrachloroethane	U		0.0650	0.500	500	10/08/2018 04:19	WG1177336
Tetrachloroethene	U		0.186	0.500	500	10/08/2018 04:19	WG1177336
Toluene	0.250	J	0.206	0.500	500	10/08/2018 04:19	WG1177336
1,1,1-Trichloroethane	U		0.160	0.500	500	10/08/2018 04:19	WG1177336
1,1,2-Trichloroethane	U		0.192	0.500	500	10/08/2018 04:19	WG1177336
Trichloroethene	U		0.199	0.500	500	10/08/2018 04:19	WG1177336
1,2,4-Trimethylbenzene	U		0.186	0.500	500	10/08/2018 04:19	WG1177336
1,3,5-Trimethylbenzene	U		0.194	0.500	500	10/08/2018 04:19	WG1177336
Vinyl chloride	U		0.130	0.500	500	10/08/2018 04:19	WG1177336
o-Xylene	U		0.170	0.500	500	10/08/2018 04:19	WG1177336
m&p-Xylene	U		0.360	1.00	500	10/08/2018 04:19	WG1177336
Xylenes, Total	U		0.530	1.50	500	10/08/2018 04:19	WG1177336
(S) Toluene-d8	*101*			*80.0-120*		*10/08/2018 04:19*	WG1177336
(S) Dibromofluoromethane	*100*			*75.0-120*		*10/08/2018 04:19*	WG1177336
(S) 4-Bromofluorobenzene	*97.2*			*77.0-126*		*10/08/2018 04:19*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) High Fraction	11.2		0.123	0.500	5	10/12/2018 05:15	WG1178290
(S) o-Terphenyl	*131*			*31.0-160*		*10/12/2018 05:15*	WG1178290

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	5460		28.2	100	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	1.52		0.0394	0.200	2	10/11/2018 13:44	WG1178873

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	405		1.04	20.0	20	10/11/2018 08:50	WG1176733
Fluoride	0.947		0.00990	0.100	1	10/11/2018 08:41	WG1176733
Sulfate	2170		3.87	250	50	10/11/2018 12:38	WG1176733

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00388		0.000250	0.00200	1	10/11/2018 21:09	WG1176863
Barium	0.00989		0.000360	0.00500	1	10/11/2018 21:09	WG1176863
Calcium	546		0.0460	1.00	1	10/11/2018 21:09	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 21:09	WG1176863
Iron	U		0.0150	0.100	1	10/11/2018 21:09	WG1176863
Lead	U		0.000240	0.00200	1	10/11/2018 21:09	WG1176863
Manganese	0.0134		0.000250	0.00500	1	10/11/2018 21:09	WG1176863
Potassium	1.60		0.0370	1.00	1	10/11/2018 21:09	WG1176863
Selenium	0.00539		0.000380	0.00200	1	10/12/2018 11:34	WG1176863
Sodium	241		0.110	1.00	1	10/11/2018 21:09	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 14:03	WG1178046
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/09/2018 14:03*	WG1178046

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/08/2018 04:38	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 04:38	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 04:38	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 04:38	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 04:38	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 04:38	WG1177336
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 04:38	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 04:38	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 04:38	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 04:38	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 04:38	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 04:38	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 04:38	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 04:38	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 04:38	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 04:38	WG1177336

DUP-REST-03

Collected date/time: 10/03/18 12:00

SAMPLE RESULTS - 33

L1032152

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 04:38	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 04:38	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 04:38	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 04:38	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 04:38	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 04:38	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 04:38	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 04:38	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 04:38	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 04:38	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 04:38	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 04:38	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 04:38	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 04:38	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 04:38	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 04:38	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 04:38	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 04:38	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 04:38	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 04:38	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 04:38	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 04:38	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 04:38	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 04:38	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 04:38	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 04:38	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 04:38	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 04:38	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 04:38	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 04:38	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 04:38	WG1177336
(S) Toluene-d8	*103*			*80.0-120*		*10/08/2018 04:38*	WG1177336
(S) Dibromofluoromethane	*105*			*75.0-120*		*10/08/2018 04:38*	WG1177336
(S) 4-Bromofluorobenzene	*97.9*			*77.0-126*		*10/08/2018 04:38*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0883	J	0.0247	0.100	1	10/13/2018 16:24	WG1178290
(S) o-Terphenyl	*85.8*			*31.0-160*		*10/13/2018 16:24*	WG1178290

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	4100		14.1	50.0	1	10/10/2018 19:06	WG1178373

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	0.0810	J	0.0197	0.100	1	10/11/2018 13:45	WG1178873

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.0180	0.0500	10	10/11/2018 16:22	WG1178772

Sample Narrative:

L1032152-34 WG1178772: Diluted due to sulfide interference

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	230		1.04	20.0	20	10/11/2018 09:10	WG1176733
Fluoride	0.978		0.00990	0.100	1	10/11/2018 09:00	WG1176733
Sulfate	1730		3.87	250	50	10/11/2018 12:48	WG1176733

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:18	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.677		0.0126	0.200	1	10/09/2018 14:27	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00684		0.000250	0.00200	1	10/11/2018 21:14	WG1176863
Barium	0.0172		0.000360	0.00500	1	10/11/2018 21:14	WG1176863
Cadmium	U		0.000160	0.00100	1	10/11/2018 21:14	WG1176863
Calcium	432		0.0460	1.00	1	10/11/2018 21:14	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 21:14	WG1176863
Cobalt	0.000409	J	0.000260	0.00200	1	10/11/2018 21:14	WG1176863
Iron	0.190		0.0150	0.100	1	10/11/2018 21:14	WG1176863
Lead	0.000289	J	0.000240	0.00200	1	10/11/2018 21:14	WG1176863
Manganese	0.268		0.000250	0.00500	1	10/11/2018 21:14	WG1176863
Nickel	0.000846	J	0.000350	0.00200	1	10/11/2018 21:14	WG1176863
Potassium	0.750	J	0.0370	1.00	1	10/11/2018 21:14	WG1176863
Selenium	U		0.000380	0.00200	1	10/12/2018 11:39	WG1176863
Sodium	223		0.110	1.00	1	10/11/2018 21:14	WG1176863
Uranium	0.00143	J	0.000330	0.0100	1	10/11/2018 21:14	WG1176863
Vanadium	0.000313	J	0.000180	0.00500	1	10/11/2018 21:14	WG1176863

DUP-REST-04
Collected date/time: 10/03/18 12:00

SAMPLE RESULTS - 34

L1032152

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	0.502		0.0314	0.100	1	10/09/2018 14:27	WG1178046
(S) a,a,a-Trifluorotoluene(FID)	*102*			*78.0-120*		*10/09/2018 14:27*	WG1178046

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 04:58	WG1177336
Benzene	0.0277		0.000331	0.00100	1	10/08/2018 04:58	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 04:58	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 04:58	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 04:58	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 04:58	WG1177336
sec-Butylbenzene	0.00437		0.000365	0.00100	1	10/08/2018 04:58	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 04:58	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 04:58	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 04:58	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 04:58	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 04:58	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 04:58	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 04:58	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 04:58	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 04:58	WG1177336
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 04:58	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 04:58	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 04:58	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 04:58	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 04:58	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 04:58	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 04:58	WG1177336
Ethylbenzene	0.000973	J	0.000384	0.00100	1	10/08/2018 04:58	WG1177336
Isopropylbenzene	0.0242		0.000326	0.00100	1	10/08/2018 04:58	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 04:58	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 04:58	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 04:58	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 04:58	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 04:58	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 04:58	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 04:58	WG1177336
n-Propylbenzene	0.00334		0.000349	0.00100	1	10/08/2018 04:58	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 04:58	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 04:58	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 04:58	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 04:58	WG1177336
Toluene	0.000704	J	0.000412	0.00100	1	10/08/2018 04:58	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 04:58	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 04:58	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 04:58	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 04:58	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 04:58	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 04:58	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 04:58	WG1177336
m&p-Xylene	0.00540		0.000719	0.00200	1	10/08/2018 04:58	WG1177336
Xylenes, Total	0.00540		0.00106	0.00300	1	10/08/2018 04:58	WG1177336
(S) Toluene-d8	*97.0*			*80.0-120*		*10/08/2018 04:58*	WG1177336
(S) Dibromofluoromethane	*106*			*75.0-120*		*10/08/2018 04:58*	WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/08/2018 04:58*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	1.09		0.0247	0.100	1	10/11/2018 17:46	WG1178290
(S) o-Terphenyl	*102*			*31.0-160*		*10/11/2018 17:46*	WG1178290

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	3380	J3	14.1	50.0	1	10/10/2018 18:38	WG1178376

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	8.26		0.0985	0.500	5	10/11/2018 13:47	WG1178873

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/12/2018 17:58	WG1179442

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	106		1.04	20.0	20	10/11/2018 09:29	WG1176733
Fluoride	0.307		0.00990	0.100	1	10/11/2018 09:19	WG1176733
Sulfate	1660		3.87	250	50	10/11/2018 12:57	WG1176733

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:21	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.585		0.0126	0.200	1	10/09/2018 14:30	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00157	J	0.000250	0.00200	1	10/11/2018 21:18	WG1176863
Barium	0.00884		0.000360	0.00500	1	10/11/2018 21:18	WG1176863
Cadmium	U		0.000160	0.00100	1	10/11/2018 21:18	WG1176863
Calcium	538		0.0460	1.00	1	10/11/2018 21:18	WG1176863
Chromium	0.000608	J	0.000540	0.00200	1	10/11/2018 21:18	WG1176863
Cobalt	U		0.000260	0.00200	1	10/11/2018 21:18	WG1176863
Iron	U		0.0150	0.100	1	10/11/2018 21:18	WG1176863
Lead	U		0.000240	0.00200	1	10/11/2018 21:18	WG1176863
Manganese	0.000456	J	0.000250	0.00500	1	10/11/2018 21:18	WG1176863
Nickel	0.000531	J	0.000350	0.00200	1	10/11/2018 21:18	WG1176863
Potassium	0.653	J	0.0370	1.00	1	10/11/2018 21:18	WG1176863
Selenium	0.00294		0.000380	0.00200	1	10/12/2018 11:43	WG1176863
Sodium	129		0.110	1.00	1	10/11/2018 21:18	WG1176863
Uranium	0.0269		0.000330	0.0100	1	10/11/2018 21:18	WG1176863
Vanadium	0.0117		0.000180	0.00500	1	10/11/2018 21:18	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 14:50	WG1178046

DUP-REST-05

Collected date/time: 10/03/18 12:00

SAMPLE RESULTS - 35

L1032152

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/09/2018 14:50*	WG1178046

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 05:18	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 05:18	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 05:18	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 05:18	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 05:18	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 05:18	WG1177336
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 05:18	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 05:18	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 05:18	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 05:18	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 05:18	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 05:18	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 05:18	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 05:18	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 05:18	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 05:18	WG1177336
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 05:18	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 05:18	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 05:18	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 05:18	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 05:18	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 05:18	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 05:18	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 05:18	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 05:18	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 05:18	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 05:18	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 05:18	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 05:18	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 05:18	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 05:18	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 05:18	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 05:18	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 05:18	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 05:18	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 05:18	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 05:18	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 05:18	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 05:18	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 05:18	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 05:18	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 05:18	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 05:18	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 05:18	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 05:18	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 05:18	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 05:18	WG1177336
(S) Toluene-d8	*103*			*80.0-120*		*10/08/2018 05:18*	WG1177336
(S) Dibromofluoromethane	*104*			*75.0-120*		*10/08/2018 05:18*	WG1177336
(S) 4-Bromofluorobenzene	*100*			*77.0-126*		*10/08/2018 05:18*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0643	J	0.0247	0.100	1	10/11/2018 18:07	WG1178290
(S) o-Terphenyl	*76.3*			*31.0-160*		*10/11/2018 18:07*	WG1178290

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	U		2.82	10.0	1	10/10/2018 18:38	WG1178376

Sample Narrative:

L1032152-36 WG1178376: BDL result confirmed on reanalysis

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/11/2018 13:55	WG1178873

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	0.370	J	0.0519	1.00	1	10/11/2018 09:39	WG1176733
Fluoride	0.109		0.00990	0.100	1	10/11/2018 09:39	WG1176733
Sulfate	0.502	J	0.0774	5.00	1	10/11/2018 09:39	WG1176733

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	U		0.000250	0.00200	1	10/11/2018 21:23	WG1176863
Barium	0.000827	J	0.000360	0.00500	1	10/11/2018 21:23	WG1176863
Calcium	0.141	J	0.0460	1.00	1	10/11/2018 21:23	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 21:23	WG1176863
Iron	U		0.0150	0.100	1	10/11/2018 21:23	WG1176863
Lead	U		0.000240	0.00200	1	10/11/2018 21:23	WG1176863
Manganese	0.000408	J	0.000250	0.00500	1	10/11/2018 21:23	WG1176863
Potassium	U		0.0370	1.00	1	10/11/2018 21:23	WG1176863
Selenium	U		0.000380	0.00200	1	10/12/2018 11:48	WG1176863
Sodium	0.399	J	0.110	1.00	1	10/11/2018 21:23	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 15:13	WG1178046
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*		*10/09/2018 15:13*	WG1178046

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/08/2018 05:37	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 05:37	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 05:37	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 05:37	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 05:37	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 05:37	WG1177336
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 05:37	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 05:37	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 05:37	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 05:37	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 05:37	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 05:37	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 05:37	WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Chloromethane	U		0.000276	0.00250	1	10/08/2018 05:37	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 05:37	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 05:37	WG1177336
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 05:37	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 05:37	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 05:37	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 05:37	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 05:37	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 05:37	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 05:37	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 05:37	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 05:37	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 05:37	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 05:37	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 05:37	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 05:37	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 05:37	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 05:37	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 05:37	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 05:37	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 05:37	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 05:37	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 05:37	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 05:37	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 05:37	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 05:37	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 05:37	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 05:37	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 05:37	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 05:37	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 05:37	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 05:37	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 05:37	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 05:37	WG1177336
(S) Toluene-d8	*101*			*80.0-120*		*10/08/2018 05:37*	WG1177336
(S) Dibromofluoromethane	*103*			*75.0-120*		*10/08/2018 05:37*	WG1177336
(S) 4-Bromofluorobenzene	*94.7*			*77.0-126*		*10/08/2018 05:37*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0575	J	0.0247	0.100	1	10/11/2018 18:27	WG1178290
(S) o-Terphenyl	*80.0*			*31.0-160*		*10/11/2018 18:27*	WG1178290

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	6.00	J	2.82	10.0	1	10/10/2018 18:38	WG1178376

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/11/2018 13:56	WG1178873

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/12/2018 18:01	WG1179442

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	0.267	J P1	0.0519	1.00	1	10/11/2018 11:59	WG1176733
Fluoride	U		0.00990	0.100	1	10/11/2018 11:59	WG1176733
Sulfate	U		0.0774	5.00	1	10/11/2018 11:59	WG1176733

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:23	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.0538	J	0.0126	0.200	1	10/09/2018 14:33	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	U		0.000250	0.00200	1	10/11/2018 21:28	WG1176863
Barium	0.000835	J	0.000360	0.00500	1	10/11/2018 21:28	WG1176863
Cadmium	U		0.000160	0.00100	1	10/11/2018 21:28	WG1176863
Calcium	0.0917	J	0.0460	1.00	1	10/11/2018 21:28	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 21:28	WG1176863
Cobalt	U		0.000260	0.00200	1	10/11/2018 21:28	WG1176863
Iron	U		0.0150	0.100	1	10/11/2018 21:28	WG1176863
Lead	U		0.000240	0.00200	1	10/11/2018 21:28	WG1176863
Manganese	0.000451	J	0.000250	0.00500	1	10/11/2018 21:28	WG1176863
Nickel	U		0.000350	0.00200	1	10/11/2018 21:28	WG1176863
Potassium	U		0.0370	1.00	1	10/11/2018 21:28	WG1176863
Selenium	U		0.000380	0.00200	1	10/12/2018 11:52	WG1176863
Sodium	0.383	J	0.110	1.00	1	10/11/2018 21:28	WG1176863
Uranium	U		0.000330	0.0100	1	10/11/2018 21:28	WG1176863
Vanadium	U		0.000180	0.00500	1	10/11/2018 21:28	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 15:36	WG1178046

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) a,a,a-Trifluorotoluene(FID)	*102*			*78.0-120*		*10/09/2018 15:36*	WG1178046

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 05:57	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 05:57	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 05:57	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 05:57	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 05:57	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 05:57	WG1177336
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 05:57	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 05:57	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 05:57	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 05:57	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 05:57	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 05:57	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 05:57	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 05:57	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 05:57	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 05:57	WG1177336
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 05:57	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 05:57	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 05:57	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 05:57	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 05:57	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 05:57	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 05:57	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 05:57	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 05:57	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 05:57	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 05:57	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 05:57	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 05:57	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 05:57	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 05:57	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 05:57	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 05:57	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 05:57	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 05:57	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 05:57	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 05:57	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 05:57	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 05:57	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 05:57	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 05:57	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 05:57	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 05:57	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 05:57	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 05:57	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 05:57	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 05:57	WG1177336
(S) Toluene-d8	*97.5*			*80.0-120*		*10/08/2018 05:57*	WG1177336
(S) Dibromofluoromethane	*103*			*75.0-120*		*10/08/2018 05:57*	WG1177336
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/08/2018 05:57*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0897	J	0.0247	0.100	1	10/11/2018 18:47	WG1178290
(S) o-Terphenyl	*79.5*			*31.0-160*		*10/11/2018 18:47*	WG1178290

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	U		2.82	10.0	1	10/10/2018 18:38	WG1178376

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.0197	0.100	1	10/11/2018 13:58	WG1178873

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.00180	0.00500	1	10/12/2018 16:14	WG1179898

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	0.397	J	0.0519	1.00	1	10/11/2018 10:37	WG1176733
Fluoride	0.107		0.00990	0.100	1	10/11/2018 10:37	WG1176733
Sulfate	U		0.0774	5.00	1	10/11/2018 10:37	WG1176733

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:26	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	0.0508	J	0.0126	0.200	1	10/09/2018 14:36	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	U		0.000250	0.00200	1	10/11/2018 21:32	WG1176863
Barium	0.000693	J	0.000360	0.00500	1	10/11/2018 21:32	WG1176863
Cadmium	U		0.000160	0.00100	1	10/11/2018 21:32	WG1176863
Calcium	U		0.0460	1.00	1	10/11/2018 21:32	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 21:32	WG1176863
Cobalt	U		0.000260	0.00200	1	10/11/2018 21:32	WG1176863
Iron	U		0.0150	0.100	1	10/11/2018 21:32	WG1176863
Lead	U		0.000240	0.00200	1	10/11/2018 21:32	WG1176863
Manganese	0.000551	J	0.000250	0.00500	1	10/11/2018 21:32	WG1176863
Nickel	U		0.000350	0.00200	1	10/11/2018 21:32	WG1176863
Potassium	U		0.0370	1.00	1	10/11/2018 21:32	WG1176863
Selenium	U		0.000380	0.00200	1	10/12/2018 11:56	WG1176863
Sodium	0.323	J	0.110	1.00	1	10/11/2018 21:32	WG1176863
Uranium	U		0.000330	0.0100	1	10/11/2018 21:32	WG1176863
Vanadium	U		0.000180	0.00500	1	10/11/2018 21:32	WG1176863

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
TPH (GC/FID) Low Fraction	U		0.0314	0.100	1	10/09/2018 15:59	WG1178046

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC) by Method 8015D/GRO

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
(S) a,a,a-Trifluorotoluene(FID)	*102*			*78.0-120*		*10/09/2018 15:59*	WG1178046

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/08/2018 06:17	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 06:17	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 06:17	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 06:17	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 06:17	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 06:17	WG1177336
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 06:17	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 06:17	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 06:17	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 06:17	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 06:17	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 06:17	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 06:17	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 06:17	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 06:17	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 06:17	WG1177336
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 06:17	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 06:17	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 06:17	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 06:17	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 06:17	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 06:17	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 06:17	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 06:17	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 06:17	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 06:17	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 06:17	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 06:17	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 06:17	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 06:17	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 06:17	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 06:17	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 06:17	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 06:17	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 06:17	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 06:17	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 06:17	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 06:17	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 06:17	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 06:17	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 06:17	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 06:17	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 06:17	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 06:17	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 06:17	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 06:17	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 06:17	WG1177336
(S) Toluene-d8	*102*			*80.0-120*		*10/08/2018 06:17*	WG1177336
(S) Dibromofluoromethane	*108*			*75.0-120*		*10/08/2018 06:17*	WG1177336
(S) 4-Bromofluorobenzene	*98.7*			*77.0-126*		*10/08/2018 06:17*	WG1177336

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	0.0441	J	0.0247	0.100	1	10/11/2018 19:07	WG1178290
(S) o-Terphenyl	*71.6*			*31.0-160*		*10/11/2018 19:07*	WG1178290

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Volatile Organic Compounds (GC/MS) by Method 8260B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Acetone	U		0.0100	0.0500	1	10/08/2018 00:02	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 00:02	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 00:02	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 00:02	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 00:02	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 00:02	WG1177336
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 00:02	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 00:02	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 00:02	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 00:02	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 00:02	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 00:02	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 00:02	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 00:02	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 00:02	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 00:02	WG1177336
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 00:02	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 00:02	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 00:02	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 00:02	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 00:02	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 00:02	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 00:02	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 00:02	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 00:02	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 00:02	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 00:02	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 00:02	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 00:02	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 00:02	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 00:02	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 00:02	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 00:02	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 00:02	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 00:02	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 00:02	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 00:02	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 00:02	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 00:02	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 00:02	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 00:02	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 00:02	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 00:02	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 00:02	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 00:02	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 00:02	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 00:02	WG1177336
(S) Toluene-d8	*103*			*80.0-120*		*10/08/2018 00:02*	WG1177336
(S) Dibromofluoromethane	*105*			*75.0-120*		*10/08/2018 00:02*	WG1177336
(S) 4-Bromofluorobenzene	*96.1*			*77.0-126*		*10/08/2018 00:02*	WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 00:21	WG1177336
Benzene	U		0.000331	0.00100	1	10/08/2018 00:21	WG1177336
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 00:21	WG1177336
Bromoform	U		0.000469	0.00100	1	10/08/2018 00:21	WG1177336
Bromomethane	U		0.000866	0.00500	1	10/08/2018 00:21	WG1177336
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 00:21	WG1177336
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 00:21	WG1177336
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 00:21	WG1177336
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 00:21	WG1177336
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 00:21	WG1177336
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 00:21	WG1177336
Chloroethane	U		0.000453	0.00500	1	10/08/2018 00:21	WG1177336
Chloroform	U		0.000324	0.00500	1	10/08/2018 00:21	WG1177336
Chloromethane	U		0.000276	0.00250	1	10/08/2018 00:21	WG1177336
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 00:21	WG1177336
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 00:21	WG1177336
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 00:21	WG1177336
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 00:21	WG1177336
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 00:21	WG1177336
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 00:21	WG1177336
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 00:21	WG1177336
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 00:21	WG1177336
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 00:21	WG1177336
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 00:21	WG1177336
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 00:21	WG1177336
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 00:21	WG1177336
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 00:21	WG1177336
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 00:21	WG1177336
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 00:21	WG1177336
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 00:21	WG1177336
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 00:21	WG1177336
Naphthalene	U		0.00100	0.00500	1	10/08/2018 00:21	WG1177336
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 00:21	WG1177336
Styrene	U		0.000307	0.00100	1	10/08/2018 00:21	WG1177336
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 00:21	WG1177336
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 00:21	WG1177336
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 00:21	WG1177336
Toluene	U		0.000412	0.00100	1	10/08/2018 00:21	WG1177336
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 00:21	WG1177336
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 00:21	WG1177336
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 00:21	WG1177336
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 00:21	WG1177336
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 00:21	WG1177336
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 00:21	WG1177336
o-Xylene	U		0.000341	0.00100	1	10/08/2018 00:21	WG1177336
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 00:21	WG1177336
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 00:21	WG1177336
(S) Toluene-d8	*104*			*80.0-120*		*10/08/2018 00:21*	WG1177336
(S) Dibromofluoromethane	*99.5*			*75.0-120*		*10/08/2018 00:21*	WG1177336
(S) 4-Bromofluorobenzene	*101*			*77.0-126*		*10/08/2018 00:21*	WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 02:01	WG1177440
Benzene	U		0.000331	0.00100	1	10/08/2018 02:01	WG1177440
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 02:01	WG1177440
Bromoform	U		0.000469	0.00100	1	10/08/2018 02:01	WG1177440
Bromomethane	U		0.000866	0.00500	1	10/08/2018 02:01	WG1177440
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 02:01	WG1177440
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 02:01	WG1177440
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 02:01	WG1177440
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 02:01	WG1177440
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 02:01	WG1177440
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 02:01	WG1177440
Chloroethane	U		0.000453	0.00500	1	10/08/2018 02:01	WG1177440
Chloroform	U		0.000324	0.00500	1	10/08/2018 02:01	WG1177440
Chloromethane	U		0.000276	0.00250	1	10/08/2018 02:01	WG1177440
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 02:01	WG1177440
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 02:01	WG1177440
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 02:01	WG1177440
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 02:01	WG1177440
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 02:01	WG1177440
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 02:01	WG1177440
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 02:01	WG1177440
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 02:01	WG1177440
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 02:01	WG1177440
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 02:01	WG1177440
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 02:01	WG1177440
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 02:01	WG1177440
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 02:01	WG1177440
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 02:01	WG1177440
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 02:01	WG1177440
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 02:01	WG1177440
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 02:01	WG1177440
Naphthalene	U		0.00100	0.00500	1	10/08/2018 02:01	WG1177440
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 02:01	WG1177440
Styrene	U		0.000307	0.00100	1	10/08/2018 02:01	WG1177440
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 02:01	WG1177440
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 02:01	WG1177440
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 02:01	WG1177440
Toluene	U		0.000412	0.00100	1	10/08/2018 02:01	WG1177440
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 02:01	WG1177440
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 02:01	WG1177440
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 02:01	WG1177440
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 02:01	WG1177440
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 02:01	WG1177440
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 02:01	WG1177440
o-Xylene	U		0.000341	0.00100	1	10/08/2018 02:01	WG1177440
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 02:01	WG1177440
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 02:01	WG1177440
(S) Toluene-d8	*104*			*80.0-120*		*10/08/2018 02:01*	WG1177440
(S) Dibromofluoromethane	*99.2*			*75.0-120*		*10/08/2018 02:01*	WG1177440
(S) 4-Bromofluorobenzene	*104*			*77.0-126*		*10/08/2018 02:01*	WG1177440

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.0100	0.0500	1	10/08/2018 02:22	WG1177440
Benzene	U		0.000331	0.00100	1	10/08/2018 02:22	WG1177440
Bromodichloromethane	U		0.000380	0.00100	1	10/08/2018 02:22	WG1177440
Bromoform	U		0.000469	0.00100	1	10/08/2018 02:22	WG1177440
Bromomethane	U		0.000866	0.00500	1	10/08/2018 02:22	WG1177440
n-Butylbenzene	U		0.000361	0.00100	1	10/08/2018 02:22	WG1177440
sec-Butylbenzene	U		0.000365	0.00100	1	10/08/2018 02:22	WG1177440
Carbon disulfide	U		0.000275	0.00100	1	10/08/2018 02:22	WG1177440
Carbon tetrachloride	U		0.000379	0.00100	1	10/08/2018 02:22	WG1177440
Chlorobenzene	U		0.000348	0.00100	1	10/08/2018 02:22	WG1177440
Chlorodibromomethane	U		0.000327	0.00100	1	10/08/2018 02:22	WG1177440
Chloroethane	U		0.000453	0.00500	1	10/08/2018 02:22	WG1177440
Chloroform	U		0.000324	0.00500	1	10/08/2018 02:22	WG1177440
Chloromethane	U		0.000276	0.00250	1	10/08/2018 02:22	WG1177440
1,2-Dibromoethane	U		0.000381	0.00100	1	10/08/2018 02:22	WG1177440
1,1-Dichloroethane	U		0.000259	0.00100	1	10/08/2018 02:22	WG1177440
1,2-Dichloroethane	U		0.000361	0.00100	1	10/08/2018 02:22	WG1177440
1,1-Dichloroethene	U		0.000398	0.00100	1	10/08/2018 02:22	WG1177440
cis-1,2-Dichloroethene	U		0.000260	0.00100	1	10/08/2018 02:22	WG1177440
trans-1,2-Dichloroethene	U		0.000396	0.00100	1	10/08/2018 02:22	WG1177440
1,2-Dichloropropane	U		0.000306	0.00100	1	10/08/2018 02:22	WG1177440
cis-1,3-Dichloropropene	U		0.000418	0.00100	1	10/08/2018 02:22	WG1177440
trans-1,3-Dichloropropene	U		0.000419	0.00100	1	10/08/2018 02:22	WG1177440
Ethylbenzene	U		0.000384	0.00100	1	10/08/2018 02:22	WG1177440
Isopropylbenzene	U		0.000326	0.00100	1	10/08/2018 02:22	WG1177440
p-Isopropyltoluene	U		0.000350	0.00100	1	10/08/2018 02:22	WG1177440
2-Butanone (MEK)	U		0.00393	0.0100	1	10/08/2018 02:22	WG1177440
2-Hexanone	U		0.00382	0.0100	1	10/08/2018 02:22	WG1177440
Methylene Chloride	U		0.00100	0.00500	1	10/08/2018 02:22	WG1177440
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100	1	10/08/2018 02:22	WG1177440
Methyl tert-butyl ether	U		0.000367	0.00100	1	10/08/2018 02:22	WG1177440
Naphthalene	U		0.00100	0.00500	1	10/08/2018 02:22	WG1177440
n-Propylbenzene	U		0.000349	0.00100	1	10/08/2018 02:22	WG1177440
Styrene	U		0.000307	0.00100	1	10/08/2018 02:22	WG1177440
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100	1	10/08/2018 02:22	WG1177440
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100	1	10/08/2018 02:22	WG1177440
Tetrachloroethene	U		0.000372	0.00100	1	10/08/2018 02:22	WG1177440
Toluene	U		0.000412	0.00100	1	10/08/2018 02:22	WG1177440
1,1,1-Trichloroethane	U		0.000319	0.00100	1	10/08/2018 02:22	WG1177440
1,1,2-Trichloroethane	U		0.000383	0.00100	1	10/08/2018 02:22	WG1177440
Trichloroethene	U		0.000398	0.00100	1	10/08/2018 02:22	WG1177440
1,2,4-Trimethylbenzene	U		0.000373	0.00100	1	10/08/2018 02:22	WG1177440
1,3,5-Trimethylbenzene	U		0.000387	0.00100	1	10/08/2018 02:22	WG1177440
Vinyl chloride	U		0.000259	0.00100	1	10/08/2018 02:22	WG1177440
o-Xylene	U		0.000341	0.00100	1	10/08/2018 02:22	WG1177440
m&p-Xylene	U		0.000719	0.00200	1	10/08/2018 02:22	WG1177440
Xylenes, Total	U		0.00106	0.00300	1	10/08/2018 02:22	WG1177440
(S) Toluene-d8	*105*			*80.0-120*		*10/08/2018 02:22*	WG1177440
(S) Dibromofluoromethane	*99.6*			*75.0-120*		*10/08/2018 02:22*	WG1177440
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/08/2018 02:22*	WG1177440

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Gravimetric Analysis by Method 2540 C-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Dissolved Solids	2900		14.1	50.0	1	10/10/2018 18:38	WG1178376

Wet Chemistry by Method 353.2

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Nitrate-Nitrite	U		0.985	5.00	50	10/11/2018 14:01	WG1178873

Sample Narrative:

L1032152-43 WG1178873: Diluted matrix interference due to high sulfide content

Wet Chemistry by Method 4500CN E-2011

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Cyanide	U		0.180	0.500	100	10/12/2018 16:15	WG1179898

Sample Narrative:

L1032152-43 WG1179898: matrix interference: high sulfide content

Wet Chemistry by Method 9056A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Chloride	636		1.04	20.0	20	10/11/2018 10:56	WG1176733
Fluoride	1.61		0.00990	0.100	1	10/11/2018 10:46	WG1176733
Sulfate	311		1.55	100	20	10/11/2018 10:56	WG1176733

Mercury by Method 7470A

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Mercury	U		0.0000490	0.000200	1	10/10/2018 08:28	WG1177220

Metals (ICP) by Method 6010B

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Boron	1.22		0.0126	0.200	1	10/09/2018 14:44	WG1176839

Metals (ICPMS) by Method 6020

	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
Analyte	mg/l		mg/l	mg/l		date / time	
Arsenic	0.00997		0.000250	0.00200	1	10/11/2018 21:37	WG1176863
Barium	0.137		0.000360	0.00500	1	10/11/2018 21:37	WG1176863
Cadmium	U		0.000160	0.00100	1	10/11/2018 21:37	WG1176863
Calcium	155		0.0460	1.00	1	10/11/2018 21:37	WG1176863
Chromium	U		0.000540	0.00200	1	10/11/2018 21:37	WG1176863
Cobalt	U		0.000260	0.00200	1	10/11/2018 21:37	WG1176863
Iron	0.0287	J	0.0150	0.100	1	10/11/2018 21:37	WG1176863
Lead	0.000253	J	0.000240	0.00200	1	10/11/2018 21:37	WG1176863
Manganese	0.151		0.000250	0.00500	1	10/11/2018 21:37	WG1176863
Nickel	0.00608		0.000350	0.00200	1	10/11/2018 21:37	WG1176863
Potassium	1.01		0.0370	1.00	1	10/11/2018 21:37	WG1176863
Selenium	0.000723	J	0.000380	0.00200	1	10/12/2018 12:01	WG1176863
Sodium	483		0.110	1.00	1	10/11/2018 21:37	WG1176863
Uranium	U		0.000330	0.0100	1	10/11/2018 21:37	WG1176863
Vanadium	0.00207	J	0.000180	0.00500	1	10/11/2018 21:37	WG1176863

MW-43
Collected date/time: 10/03/18 13:05

SAMPLE RESULTS - 43

L1032152

Volatile Organic Compounds (GC) by Method 8015D/GRO

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) Low Fraction	35.8		0.628	2.00	20	10/09/2018 16:22	WG1178046
(S) a,a,a-Trifluorotoluene(FID)	*99.5*			*78.0-120*		*10/09/2018 16:22*	WG1178046

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Acetone	U		0.500	2.50	50	10/08/2018 06:37	WG1177440
Benzene	10.7		0.166	0.500	500	10/11/2018 19:34	WG1179752
Bromodichloromethane	U		0.0190	0.0500	50	10/08/2018 06:37	WG1177440
Bromoform	U		0.0234	0.0500	50	10/08/2018 06:37	WG1177440
Bromomethane	U		0.0433	0.250	50	10/08/2018 06:37	WG1177440
n-Butylbenzene	U		0.0180	0.0500	50	10/08/2018 06:37	WG1177440
sec-Butylbenzene	U		0.0182	0.0500	50	10/08/2018 06:37	WG1177440
Carbon disulfide	U		0.0138	0.0500	50	10/08/2018 06:37	WG1177440
Carbon tetrachloride	U		0.0190	0.0500	50	10/08/2018 06:37	WG1177440
Chlorobenzene	U		0.0174	0.0500	50	10/08/2018 06:37	WG1177440
Chlorodibromomethane	U		0.0164	0.0500	50	10/08/2018 06:37	WG1177440
Chloroethane	U		0.0226	0.250	50	10/08/2018 06:37	WG1177440
Chloroform	U		0.0162	0.250	50	10/08/2018 06:37	WG1177440
Chloromethane	U		0.0138	0.125	50	10/08/2018 06:37	WG1177440
1,2-Dibromoethane	U		0.0190	0.0500	50	10/08/2018 06:37	WG1177440
1,1-Dichloroethane	U		0.0130	0.0500	50	10/08/2018 06:37	WG1177440
1,2-Dichloroethane	U		0.0180	0.0500	50	10/08/2018 06:37	WG1177440
1,1-Dichloroethene	U		0.0199	0.0500	50	10/08/2018 06:37	WG1177440
cis-1,2-Dichloroethene	U		0.0130	0.0500	50	10/08/2018 06:37	WG1177440
trans-1,2-Dichloroethene	U		0.0198	0.0500	50	10/08/2018 06:37	WG1177440
1,2-Dichloropropane	U		0.0153	0.0500	50	10/08/2018 06:37	WG1177440
cis-1,3-Dichloropropene	U		0.0209	0.0500	50	10/08/2018 06:37	WG1177440
trans-1,3-Dichloropropene	U		0.0210	0.0500	50	10/08/2018 06:37	WG1177440
Ethylbenzene	0.0818		0.0192	0.0500	50	10/08/2018 06:37	WG1177440
Isopropylbenzene	0.0770		0.0163	0.0500	50	10/08/2018 06:37	WG1177440
p-Isopropyltoluene	U		0.0175	0.0500	50	10/08/2018 06:37	WG1177440
2-Butanone (MEK)	U		0.196	0.500	50	10/08/2018 06:37	WG1177440
2-Hexanone	U		0.191	0.500	50	10/08/2018 06:37	WG1177440
Methylene Chloride	U		0.0500	0.250	50	10/08/2018 06:37	WG1177440
4-Methyl-2-pentanone (MIBK)	U		0.107	0.500	50	10/08/2018 06:37	WG1177440
Methyl tert-butyl ether	0.0545		0.0184	0.0500	50	10/08/2018 06:37	WG1177440
Naphthalene	0.235	J	0.0500	0.250	50	10/08/2018 06:37	WG1177440
n-Propylbenzene	0.118		0.0174	0.0500	50	10/08/2018 06:37	WG1177440
Styrene	U		0.0154	0.0500	50	10/08/2018 06:37	WG1177440
1,1,1,2-Tetrachloroethane	U		0.0192	0.0500	50	10/08/2018 06:37	WG1177440
1,1,2,2-Tetrachloroethane	U		0.00650	0.0500	50	10/08/2018 06:37	WG1177440
Tetrachloroethene	U		0.0186	0.0500	50	10/08/2018 06:37	WG1177440
Toluene	0.239		0.0206	0.0500	50	10/08/2018 06:37	WG1177440
1,1,1-Trichloroethane	U		0.0160	0.0500	50	10/08/2018 06:37	WG1177440
1,1,2-Trichloroethane	U		0.0192	0.0500	50	10/08/2018 06:37	WG1177440
Trichloroethene	U		0.0199	0.0500	50	10/08/2018 06:37	WG1177440
1,2,4-Trimethylbenzene	0.585		0.0186	0.0500	50	10/08/2018 06:37	WG1177440
1,3,5-Trimethylbenzene	0.131		0.0194	0.0500	50	10/08/2018 06:37	WG1177440
Vinyl chloride	U		0.0130	0.0500	50	10/08/2018 06:37	WG1177440
o-Xylene	0.237		0.0170	0.0500	50	10/08/2018 06:37	WG1177440
m&p-Xylene	1.33		0.0360	0.100	50	10/08/2018 06:37	WG1177440
Xylenes, Total	1.57		0.0530	0.150	50	10/08/2018 06:37	WG1177440
(S) Toluene-d8	*106*			*80.0-120*		*10/08/2018 06:37*	WG1177440
(S) Toluene-d8	*104*			*80.0-120*		*10/11/2018 19:34*	WG1179752

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
(S) Dibromofluoromethane	*97.3*			*75.0-120*		*10/08/2018 06:37*	WG1177440
(S) Dibromofluoromethane	*94.0*			*75.0-120*		*10/11/2018 19:34*	WG1179752
(S) 4-Bromofluorobenzene	*102*			*77.0-126*		*10/08/2018 06:37*	WG1177440
(S) 4-Bromofluorobenzene	*103*			*77.0-126*		*10/11/2018 19:34*	WG1179752

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
TPH (GC/FID) High Fraction	6.37		0.0247	0.100	1	10/11/2018 19:28	WG1178290
(S) o-Terphenyl	*118*			*31.0-160*		*10/11/2018 19:28*	WG1178290

Method Blank (MB)

(MB) R3351776-1 10/10/18 20:18

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1032152-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-04 10/10/18 20:18 • (DUP) R3351776-4 10/10/18 20:18

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	mg/l	mg/l		%		%
Dissolved Solids	U	0.000	1	0.000		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3351776-2 10/10/18 20:18 • (LCSD) R3351776-3 10/10/18 20:18

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	12500	12600	142	144	85.0-115	J4	J4	0.954	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350314-1 10/10/18 20:27

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1032152-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-14 10/10/18 20:27 • (DUP) R3350314-4 10/10/18 20:27

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	1680	1570	1	6.76	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350314-2 10/10/18 20:27 • (LCSD) R3350314-3 10/10/18 20:27

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8570	8580	97.4	97.5	85.0-115			0.117	5

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350290-1 10/10/18 19:51

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1032152-24 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-24 10/10/18 19:51 • (DUP) R3350290-4 10/10/18 19:51

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	4090	4100	1	0.244		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350290-2 10/10/18 19:51 • (LCSD) R3350290-3 10/10/18 19:51

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8640	8630	98.2	98.1	85.0-115			0.116	5

QUALITY CONTROL SUMMARY

L1032152-25,26,27,28,29,30,31,32,33,34

Method Blank (MB)

(MB) R3350343-1 10/10/18 19:06

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1032152-25 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-25 10/10/18 19:06 • (DUP) R3350343-4 10/10/18 19:06

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	1280	1220	1	5.28	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350343-2 10/10/18 19:06 • (LCSD) R3350343-3 10/10/18 19:06

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8600	8810	97.7	100	85.0-115			2.41	5

WG1178376

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1032152-35,36,37,38,43

Method Blank (MB)

(MB) R3350321-1 10/10/18 18:38

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1032152-35 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-35 10/10/18 18:38 • (DUP) R3350321-4 10/10/18 18:38

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	3380	3100	1	8.49	J3	5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350321-2 10/10/18 18:38 • (LCSD) R3350321-3 10/10/18 18:38

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8690	8640	98.8	98.2	85.0-115			0.577	5

WG1180540

Gravimetric Analysis by Method 2540 C-2011

QUALITY CONTROL SUMMARY

L1032152-04

Method Blank (MB)

(MB) R3351618-1 10/16/18 20:22

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Dissolved Solids	U		2.82	10.0

L1032152-04 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-04 10/16/18 20:22 • (DUP) R3351618-4 10/16/18 20:22

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Dissolved Solids	2160	2180	1	0.692		5

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3351618-2 10/16/18 20:22 • (LCSD) R3351618-3 10/16/18 20:22

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Dissolved Solids	8800	8620	8700	98.0	98.9	85.0-115			0.924	5

WG1178871

Wet Chemistry by Method 353.2

QUALITY CONTROL SUMMARY

L1032152-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349534-1 10/10/18 23:24

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1032152-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-02 10/10/18 23:30 • (DUP) R3349534-4 10/10/18 23:32

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	1.97	1.96	1	0.203		20

L1032152-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-14 10/10/18 23:57 • (DUP) R3349534-6 10/10/18 23:59

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349534-2 10/10/18 23:26 • (LCSD) R3349534-3 10/10/18 23:27

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.80	3.76	95.1	94.0	90.0-110			1.11	20

L1032152-04 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032152-04 10/10/18 23:35 • (MS) R3349534-5 10/10/18 23:36

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	0.108	0.220	4.48	1	90.0-110	J6

L1032152-20 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032152-20 10/11/18 00:14 • (MS) R3349534-7 10/11/18 00:15 • (MSD) R3349534-8 10/11/18 00:17

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	U	2.22	2.25	88.8	89.8	1	90.0-110	J6	J6	1.21	20

QUALITY CONTROL SUMMARY

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349913-1 10/11/18 13:12

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Nitrate-Nitrite	U		0.0197	0.100

L1032152-21 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-21 10/11/18 13:17 • (DUP) R3349913-4 10/11/18 13:18

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	0.0640	0.000	1	30.6	J P1	20

L1032152-38 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-38 10/11/18 13:58 • (DUP) R3349913-6 10/11/18 13:59

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Nitrate-Nitrite	U	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349913-2 10/11/18 13:14 • (LCSD) R3349913-3 10/11/18 13:15

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Nitrate-Nitrite	4.00	3.68	3.67	91.9	91.8	90.0-110			0.109	20

L1032152-22 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032152-22 10/11/18 13:20 • (MS) R3349913-5 10/11/18 13:21

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Nitrate-Nitrite	2.50	0.0230	2.27	89.9	1	90.0-110	J6

L1032762-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032762-01 10/11/18 14:02 • (MS) R3349913-7 10/11/18 14:04 • (MSD) R3349913-8 10/11/18 14:05

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Nitrate-Nitrite	2.50	0.655	2.74	3.23	83.2	103	1	90.0-110	J6		16.4	20

QUALITY CONTROL SUMMARY

Method Blank (MB)

(MB) R3349887-1 10/11/18 16:07

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L1031280-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1031280-01 10/11/18 16:14 • (DUP) R3349887-4 10/11/18 16:15

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

L1032261-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1032261-02 10/11/18 16:28 • (DUP) R3349887-5 10/11/18 16:29

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349887-2 10/11/18 16:08 • (LCSD) R3349887-3 10/11/18 16:09

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0986	0.0918	98.6	91.8	85.0-115			7.14	20

L1032261-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032261-03 10/11/18 16:32 • (MS) R3349887-6 10/11/18 16:33 • (MSD) R3349887-7 10/11/18 16:34

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	ND	0.0940	0.0897	94.0	89.7	1	75.0-125			4.68	20

L1032261-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032261-04 10/11/18 16:35 • (MS) R3349887-8 10/11/18 16:36 • (MSD) R3349887-9 10/11/18 16:37

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	ND	0.0906	0.0925	88.4	90.3	1	75.0-125			2.08	20

WG1179442

Wet Chemistry by Method 4500CN E-2011

QUALITY CONTROL SUMMARY

L1032152-03,16,17,18,20,27,35,37

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350247-1 10/12/18 16:59

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L1031192-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1031192-02 10/12/18 17:04 • (DUP) R3350247-4 10/12/18 17:05

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.00356	1	0.000		20

L1032142-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1032142-05 10/12/18 17:45 • (DUP) R3350247-7 10/12/18 17:48

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350247-2 10/12/18 17:00 • (LCSD) R3350247-3 10/12/18 17:01

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0998	0.0967	99.8	96.7	85.0-115			3.16	20

L1031946-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1031946-02 10/12/18 17:36 • (MS) R3350247-5 10/12/18 17:37 • (MSD) R3350247-6 10/12/18 17:38

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	ND	0.0732	0.0753	73.2	75.3	1	75.0-125	J6		2.83	20

L1032152-18 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032152-18 10/12/18 17:53 • (MS) R3350247-8 10/12/18 17:54 • (MSD) R3350247-9 10/12/18 17:55

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	U	0.0477	0.0798	47.7	79.8	1	75.0-125	J6	J3	50.4	20

WG1179898

Wet Chemistry by Method 4500CN E-2011

QUALITY CONTROL SUMMARY

L1032152-38,43

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350235-1 10/12/18 16:09

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Cyanide	U		0.00180	0.00500

L1032261-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1032261-06 10/12/18 16:23 • (DUP) R3350235-4 10/12/18 16:24

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.00207	1	0.000		20

L1032261-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1032261-14 10/12/18 16:35 • (DUP) R3350235-7 10/12/18 16:36

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Cyanide	ND	0.000	1	0.000		20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350235-2 10/12/18 16:10 • (LCSD) R3350235-3 10/12/18 16:11

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Cyanide	0.100	0.0949	0.106	94.9	106	85.0-115			11.1	20

L1032261-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032261-07 10/12/18 16:25 • (MS) R3350235-5 10/12/18 16:26 • (MSD) R3350235-6 10/12/18 16:27

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	ND	0.0937	0.0896	89.8	85.7	1	75.0-125			4.47	20

L1032281-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032281-01 10/12/18 16:37 • (MS) R3350235-8 10/12/18 16:38 • (MSD) R3350235-9 10/12/18 16:39

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Cyanide	0.100	ND	0.0814	0.0837	81.4	83.7	1	75.0-125			2.79	20

WG1176732

Wet Chemistry by Method 9056A

QUALITY CONTROL SUMMARY

L1032152-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349431-1 10/09/18 20:32

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	0.343	J	0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	0.501	J	0.0774	5.00

L1032152-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-14 10/10/18 05:56 • (DUP) R3349431-6 10/10/18 06:06

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Fluoride	0.801	0.784	1	2.12		15

L1032152-14 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-14 10/10/18 06:25 • (DUP) R3349431-8 10/10/18 06:35

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	240	245	5	1.98		15
Sulfate	324	312	5	3.82		15

L1032143-12 Original Sample (OS) • Duplicate (DUP)

(OS) L1032143-12 10/10/18 00:08 • (DUP) R3349431-5 10/10/18 00:27

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	0.320	0.393	1	20.2	J P1	15
Fluoride	0.126	0.122	1	3.62		15
Sulfate	U	0.000	1	0.000		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349431-2 10/09/18 20:42 • (LCSD) R3349431-3 10/09/18 20:51

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Chloride	40.0	43.2	38.4	108	95.9	80.0-120			11.9	15
Fluoride	8.00	7.69	7.76	96.1	97.0	80.0-120			0.922	15
Sulfate	40.0	39.7	38.6	99.1	96.4	80.0-120			2.81	15

L1032152-14 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032152-14 10/10/18 05:56 • (MS) R3349431-7 10/10/18 06:15

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50.0	242	279	73.6	1	80.0-120	E V
Fluoride	5.00	0.801	5.26	89.2	1	80.0-120	
Sulfate	50.0	313	341	55.5	1	80.0-120	E V

L1032143-12 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032143-12 10/10/18 00:08 • (MS) R3349431-10 10/10/18 11:21 • (MSD) R3349431-11 10/10/18 11:31

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50.0	0.320	49.0	48.8	97.3	96.9	1	80.0-120			0.412	15
Fluoride	5.00	0.126	4.91	4.89	95.6	95.3	1	80.0-120			0.357	15
Sulfate	50.0	U	49.1	48.8	98.1	97.6	1	80.0-120			0.496	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349826-1 10/11/18 01:23

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Chloride	U		0.0519	1.00
Fluoride	U		0.00990	0.100
Sulfate	U		0.0774	5.00

L1032152-20 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-20 10/11/18 02:53 • (DUP) R3349826-4 10/11/18 03:02

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	1.26	1.27	1	0.300		15

L1032152-20 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-20 10/11/18 03:31 • (DUP) R3349826-7 10/11/18 03:41

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	204	213	10	4.35		15

L1032152-37 Original Sample (OS) • Duplicate (DUP)

(OS) L1032152-37 10/11/18 11:59 • (DUP) R3349826-8 10/11/18 10:17

Analyte	Original Result mg/l	DUP Result mg/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	0.267	0.352	1	27.4	J P1	15
Fluoride	U	0.000	1	0.000		15
Sulfate	U	0.000	1	0.000		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349826-2 10/11/18 01:33 • (LCSD) R3349826-3 10/11/18 01:42

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Chloride	40.0	43.3	38.5	108	96.3	80.0-120			11.6	15
Fluoride	8.00	7.64	7.73	95.5	96.6	80.0-120			1.18	15
Sulfate	40.0	39.7	38.6	99.3	96.5	80.0-120			2.91	15

L1032152-20 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032152-20 10/11/18 02:53 • (MS) R3349826-5 10/11/18 03:12 • (MSD) R3349826-6 10/11/18 03:22

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Fluoride	5.00	1.26	5.87	6.00	92.1	94.8	1	80.0-120			2.26	15
Sulfate	50.0	0.781	46.7	48.3	91.8	95.0	1	80.0-120			3.41	15

L1032152-37 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032152-37 10/11/18 11:59 • (MS) R3349826-9 10/11/18 10:27

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	0.267	46.4	92.3	1	80.0-120	
Fluoride	5.00	U	4.67	93.4	1	80.0-120	
Sulfate	50.0	U	46.8	93.6	1	80.0-120	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350063-1 10/11/18 13:12

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Sulfate	U		0.0774	5.00

L1032282-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1032282-07 10/12/18 02:24 • (DUP) R3350063-4 10/12/18 02:38

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	ND	0.000	1	0.000		15

L1032292-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1032292-07 10/12/18 05:11 • (DUP) R3350063-7 10/12/18 05:25

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Sulfate	ND	0.000	1	0.000		15

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350063-2 10/11/18 13:26 • (LCSD) R3350063-3 10/11/18 13:40

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Sulfate	40.0	40.0	40.0	100	100	80.0-120			0.0245	15

L1032292-07 Original Sample (OS) • Matrix Spike (MS)

(OS) L1032292-07 10/12/18 05:11 • (MS) R3350063-9 10/12/18 09:08

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Sulfate	50.0	ND	47.1	94.2	1	80.0-120	

L1032282-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032282-07 10/12/18 02:24 • (MS) R3350063-5 10/12/18 02:52 • (MSD) R3350063-6 10/12/18 03:34

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Sulfate	50.0	ND	47.3	53.2	94.6	106	1	80.0-120			11.8	15

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349293-1 10/10/18 07:42

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Mercury	U		0.0000490	0.000200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349293-2 10/10/18 07:44 • (LCSD) R3349293-3 10/10/18 07:47

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Mercury	0.00300	0.00305	0.00306	102	102	80.0-120			0.282	20

L1032152-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032152-03 10/10/18 07:49 • (MS) R3349293-4 10/10/18 07:52 • (MSD) R3349293-5 10/10/18 07:54

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Mercury	0.00300	U	0.00269	0.00267	89.7	89.0	1	75.0-125			0.802	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349078-1 10/09/18 13:36

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Boron	U		0.0126	0.200

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349078-2 10/09/18 13:39 • (LCSD) R3349078-3 10/09/18 13:42

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Boron	1.00	0.955	0.959	95.5	95.9	80.0-120			0.466	20

L1032265-07 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032265-07 10/09/18 13:44 • (MS) R3349078-5 10/09/18 13:50 • (MSD) R3349078-6 10/09/18 13:53

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1.00	0.303	1.28	1.27	98.0	96.5	1	75.0-125			1.18	20

WG1176862

Metals (ICPMS) by Method 6020

QUALITY CONTROL SUMMARY

L1032152-01,02,03,04,05,06,07,08,09,10,11,12,13,14,15,16,17,18,19,20

Method Blank (MB)

(MB) R3350204-6 10/12/18 13:19

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350204-1 10/12/18 12:27 • (LCSD) R3350204-2 10/12/18 12:32

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0439	0.0453	87.8	90.6	80.0-120			3.22	20
Barium	0.0500	0.0426	0.0429	85.3	85.7	80.0-120			0.494	20
Cadmium	0.0500	0.0448	0.0444	89.6	88.9	80.0-120			0.830	20
Calcium	5.00	4.46	4.52	89.3	90.4	80.0-120			1.20	20
Chromium	0.0500	0.0448	0.0462	89.6	92.4	80.0-120			3.05	20
Cobalt	0.0500	0.0455	0.0478	91.1	95.5	80.0-120			4.73	20
Iron	5.00	4.51	4.61	90.2	92.2	80.0-120			2.19	20
Lead	0.0500	0.0445	0.0447	88.9	89.5	80.0-120			0.593	20
Manganese	0.0500	0.0442	0.0453	88.4	90.6	80.0-120			2.48	20
Nickel	0.0500	0.0448	0.0472	89.6	94.4	80.0-120			5.16	20
Potassium	5.00	4.37	4.40	87.4	88.0	80.0-120			0.647	20
Selenium	0.0500	0.0435	0.0458	87.1	91.6	80.0-120			5.08	20
Sodium	5.00	4.58	4.60	91.6	92.0	80.0-120			0.443	20
Uranium	0.0500	0.0430	0.0438	86.0	87.6	80.0-120			1.81	20
Vanadium	0.0500	0.0447	0.0455	89.5	91.0	80.0-120			1.62	20

L1032152-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032152-01 10/12/18 12:36 • (MS) R3350204-4 10/12/18 12:45 • (MSD) R3350204-5 10/12/18 12:50

Analyte	Spike Amount mg/l	Original Result mg/l	MS Result mg/l	MSD Result mg/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.00561	0.0490	0.0496	86.8	88.1	1	75.0-125			1.30	20
Barium	0.0500	1.13	1.16	1.20	71.6	140	1	75.0-125	V	V	2.92	20
Cadmium	0.0500	0.000874	0.0436	0.0442	85.5	86.7	1	75.0-125			1.37	20
Calcium	5.00	172	178	181	119	174	1	75.0-125		V	1.52	20
Chromium	0.0500	0.00119	0.0443	0.0445	86.3	86.5	1	75.0-125			0.278	20
Cobalt	0.0500	0.000903	0.0438	0.0446	85.7	87.5	1	75.0-125			2.03	20
Potassium	5.00	0.863	4.97	4.97	82.2	82.0	1	75.0-125			0.149	20
Iron	5.00	0.231	4.44	4.54	84.2	86.3	1	75.0-125			2.26	20
Lead	0.0500	0.00268	0.0463	0.0469	87.1	88.5	1	75.0-125			1.48	20
Manganese	0.0500	0.347	0.389	0.398	82.3	101	1	75.0-125			2.35	20
Nickel	0.0500	0.00123	0.0436	0.0444	84.7	86.3	1	75.0-125			1.85	20
Selenium	0.0500	0.00132	0.0435	0.0470	84.4	91.3	1	75.0-125			7.62	20
Sodium	5.00	293	300	305	145	234	1	75.0-125	V	V	1.47	20
Uranium	0.0500	0.000734	0.0447	0.0451	88.0	88.6	1	75.0-125			0.685	20
Vanadium	0.0500	0.00197	0.0447	0.0458	85.4	87.7	1	75.0-125			2.56	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350009-1 10/11/18 18:28

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Arsenic	U		0.000250	0.00200
Barium	U		0.000360	0.00500
Cadmium	U		0.000160	0.00100
Calcium	U		0.0460	1.00
Chromium	U		0.000540	0.00200
Cobalt	U		0.000260	0.00200
Iron	U		0.0150	0.100
Lead	U		0.000240	0.00200
Manganese	U		0.000250	0.00500
Nickel	U		0.000350	0.00200
Potassium	U		0.0370	1.00
Selenium	U		0.000380	0.00200
Sodium	U		0.110	1.00
Uranium	U		0.000330	0.0100
Vanadium	U		0.000180	0.00500

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350009-2 10/11/18 18:33 • (LCSD) R3350009-3 10/11/18 18:37

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Arsenic	0.0500	0.0477	0.0480	95.3	96.1	80.0-120			0.798	20
Barium	0.0500	0.0465	0.0470	93.1	94.0	80.0-120			0.961	20
Cadmium	0.0500	0.0470	0.0477	94.0	95.4	80.0-120			1.52	20
Calcium	5.00	4.86	4.90	97.2	98.0	80.0-120			0.843	20
Chromium	0.0500	0.0475	0.0482	95.0	96.4	80.0-120			1.48	20
Cobalt	0.0500	0.0493	0.0487	98.5	97.4	80.0-120			1.11	20
Iron	5.00	4.91	4.97	98.2	99.4	80.0-120			1.24	20
Lead	0.0500	0.0485	0.0486	97.0	97.1	80.0-120			0.170	20
Manganese	0.0500	0.0479	0.0479	95.8	95.8	80.0-120			0.0165	20
Nickel	0.0500	0.0492	0.0487	98.3	97.4	80.0-120			0.949	20
Potassium	5.00	4.64	4.67	92.7	93.5	80.0-120			0.807	20
Selenium	0.0500	0.0469	0.0462	93.8	92.5	80.0-120			1.46	20
Sodium	5.00	4.72	4.75	94.4	95.0	80.0-120			0.621	20
Uranium	0.0500	0.0457	0.0457	91.5	91.4	80.0-120			0.0437	20
Vanadium	0.0500	0.0469	0.0476	93.8	95.3	80.0-120			1.59	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

L1032152-22 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032152-22 10/11/18 18:42 • (MS) R3350009-5 10/11/18 18:51 • (MSD) R3350009-6 10/11/18 18:56

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Arsenic	0.0500	0.0447	0.0916	0.0889	93.8	88.3	1	75.0-125			3.00	20
Barium	0.0500	0.0604	0.109	0.104	97.9	88.1	1	75.0-125			4.58	20
Cadmium	0.0500	0.000241	0.0486	0.0460	96.6	91.6	1	75.0-125			5.33	20
Calcium	5.00	161	168	162	142	24.7	1	75.0-125	V	V	3.57	20
Chromium	0.0500	U	0.0468	0.0441	93.7	88.2	1	75.0-125			6.05	20
Cobalt	0.0500	0.0103	0.0568	0.0544	93.0	88.3	1	75.0-125			4.24	20
Potassium	5.00	0.412	5.04	4.73	92.6	86.3	1	75.0-125			6.42	20
Iron	5.00	2.40	7.16	6.90	95.1	89.9	1	75.0-125			3.70	20
Lead	0.0500	0.000261	0.0497	0.0472	98.9	93.9	1	75.0-125			5.19	20
Manganese	0.0500	1.78	1.82	1.77	77.4	0.000	1	75.0-125		V	2.59	20
Nickel	0.0500	0.0147	0.0622	0.0593	94.8	89.2	1	75.0-125			4.62	20
Selenium	0.0500	U	0.0518	0.0472	104	94.5	1	75.0-125			9.14	20
Sodium	5.00	97.3	104	101	141	69.8	1	75.0-125	V	V	3.46	20
Uranium	0.0500	U	0.0478	0.0457	95.5	91.4	1	75.0-125			4.36	20
Vanadium	0.0500	0.000547	0.0469	0.0441	92.6	87.0	1	75.0-125			6.16	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349851-3 10/08/18 13:19

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*100*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349851-1 10/08/18 11:52 • (LCSD) R3349851-2 10/08/18 12:33

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) Low Fraction	5.50	6.05	6.08	110	110	72.0-127			0.446	20
(S) a,a,a-Trifluorotoluene(FID)				*107*	*107*	*78.0-120*				

WG1177964

Volatile Organic Compounds (GC) by Method 8015D/GRO

QUALITY CONTROL SUMMARY

L1032152-01,04,13,15,16,17,19,20,21,22,23,24,25,26,27,28,29,30,31,32

Method Blank (MB)

(MB) R3349884-3 10/09/18 10:41

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	mg/l		mg/l	mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*105*			*78.0-120*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349884-1 10/09/18 09:38 • (LCSD) R3349884-2 10/09/18 09:59

Analyte	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	%	%	%			%	%
TPH (GC/FID) Low Fraction	5.50	6.14	6.01	112	109	72.0-127			2.13	20
(S) a,a,a-Trifluorotoluene(FID)				*101*	*100*	*78.0-120*				

L1032152-13 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1032152-13 10/09/18 12:16 • (MS) R3349884-4 10/09/18 18:30 • (MSD) R3349884-5 10/09/18 18:51

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
TPH (GC/FID) Low Fraction	5.50	U	5.26	4.94	95.6	89.8	1	10.0-160			6.20	22
(S) a,a,a-Trifluorotoluene(FID)					*96.7*	*97.4*		*78.0-120*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349218-3 10/09/18 12:46

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) Low Fraction	U		0.0314	0.100
(S) a,a,a-Trifluorotoluene(FID)	*101*			*78.0-120*

Laboratory Control Sample (LCS)

(LCS) R3349218-2 10/09/18 12:00

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
TPH (GC/FID) Low Fraction	5.50	6.08	111	72.0-127	
(S) a,a,a-Trifluorotoluene(FID)			*108*	*78.0-120*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3348968-3 10/07/18 12:18

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3348968-3 10/07/18 12:18

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*100*			*80.0-120*
(S) Dibromofluoromethane	*107*			*75.0-120*
(S) 4-Bromofluorobenzene	*97.7*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348968-1 10/07/18 11:18 • (LCSD) R3348968-2 10/07/18 11:38

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Acetone	0.125	0.176	0.117	141	93.9	19.0-160		J3	40.2	27
Benzene	0.0250	0.0294	0.0283	118	113	70.0-123			3.57	20
Bromodichloromethane	0.0250	0.0235	0.0222	94.2	88.8	75.0-120			5.85	20
Bromoform	0.0250	0.0254	0.0220	102	88.1	68.0-132			14.3	20
Bromomethane	0.0250	0.0176	0.0146	70.5	58.5	10.0-160			18.5	25
n-Butylbenzene	0.0250	0.0268	0.0264	107	106	73.0-125			1.24	20
sec-Butylbenzene	0.0250	0.0272	0.0266	109	106	75.0-125			2.03	20
Carbon disulfide	0.0250	0.0272	0.0262	109	105	61.0-128			3.86	20
Carbon tetrachloride	0.0250	0.0238	0.0216	95.1	86.3	68.0-126			9.69	20
Chlorobenzene	0.0250	0.0263	0.0257	105	103	80.0-121			2.35	20
Chlorodibromomethane	0.0250	0.0248	0.0240	99.0	96.0	77.0-125			3.07	20
Chloroethane	0.0250	0.0172	0.0157	68.9	62.7	47.0-150			9.41	20
Chloroform	0.0250	0.0291	0.0277	117	111	73.0-120			5.00	20
Chloromethane	0.0250	0.0289	0.0285	116	114	41.0-142			1.40	20
1,2-Dibromoethane	0.0250	0.0279	0.0270	112	108	80.0-122			3.17	20
1,1-Dichloroethane	0.0250	0.0282	0.0257	113	103	70.0-126			9.32	20
1,2-Dichloroethane	0.0250	0.0293	0.0262	117	105	70.0-128			10.9	20
1,1-Dichloroethene	0.0250	0.0272	0.0266	109	106	71.0-124			2.05	20
cis-1,2-Dichloroethene	0.0250	0.0277	0.0272	111	109	73.0-120			1.73	20
trans-1,2-Dichloroethene	0.0250	0.0264	0.0241	106	96.5	73.0-120			9.02	20
1,2-Dichloropropane	0.0250	0.0272	0.0257	109	103	77.0-125			5.62	20
cis-1,3-Dichloropropene	0.0250	0.0266	0.0252	106	101	80.0-123			5.51	20
trans-1,3-Dichloropropene	0.0250	0.0253	0.0248	101	99.2	78.0-124			1.90	20

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3348968-1 10/07/18 11:18 • (LCSD) R3348968-2 10/07/18 11:38

	Spike Amount	LCS Result	LCSD Result	LCS Rec.	LCSD Rec.	Rec. Limits	LCS Qualifier	LCSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	%	%	%			%	%
Ethylbenzene	0.0250	0.0270	0.0265	108	106	79.0-123			1.95	20
2-Hexanone	0.125	0.152	0.133	121	106	67.0-149			13.3	20
Isopropylbenzene	0.0250	0.0274	0.0254	109	102	76.0-127			7.32	20
p-Isopropyltoluene	0.0250	0.0271	0.0267	109	107	76.0-125			1.48	20
2-Butanone (MEK)	0.125	0.202	0.157	162	126	44.0-160	J4	J3	24.9	20
Methylene Chloride	0.0250	0.0245	0.0237	98.0	94.8	67.0-120			3.25	20
4-Methyl-2-pentanone (MIBK)	0.125	0.146	0.130	117	104	68.0-142			11.5	20
Methyl tert-butyl ether	0.0250	0.0277	0.0241	111	96.5	68.0-125			13.9	20
Naphthalene	0.0250	0.0249	0.0248	99.4	99.1	54.0-135			0.346	20
n-Propylbenzene	0.0250	0.0288	0.0273	115	109	77.0-124			5.57	20
Styrene	0.0250	0.0279	0.0244	112	97.4	73.0-130			13.6	20
1,1,1,2-Tetrachloroethane	0.0250	0.0246	0.0230	98.5	92.2	75.0-125			6.65	20
1,1,2,2-Tetrachloroethane	0.0250	0.0301	0.0263	120	105	65.0-130			13.5	20
Tetrachloroethene	0.0250	0.0243	0.0248	97.3	99.4	72.0-132			2.10	20
Toluene	0.0250	0.0254	0.0251	102	100	79.0-120			1.04	20
1,1,1-Trichloroethane	0.0250	0.0280	0.0275	112	110	73.0-124			1.58	20
1,1,2-Trichloroethane	0.0250	0.0261	0.0250	104	100	80.0-120			4.44	20
Trichloroethene	0.0250	0.0261	0.0253	104	101	78.0-124			3.11	20
1,2,4-Trimethylbenzene	0.0250	0.0274	0.0253	110	101	76.0-121			8.04	20
1,3,5-Trimethylbenzene	0.0250	0.0261	0.0247	104	98.7	76.0-122			5.60	20
Vinyl chloride	0.0250	0.0289	0.0198	115	79.3	67.0-131		J3	37.2	20
Xylenes, Total	0.0750	0.0777	0.0756	104	101	79.0-123			2.74	20
o-Xylene	0.0250	0.0258	0.0251	103	100	80.0-122			2.99	20
m&p-Xylenes	0.0500	0.0519	0.0505	104	101	80.0-122			2.69	20
(S) Toluene-d8				*97.2*	*97.9*	*80.0-120*				
(S) Dibromofluoromethane				*105*	*103*	*75.0-120*				
(S) 4-Bromofluorobenzene				*95.5*	*92.6*	*77.0-126*				

Method Blank (MB)

(MB) R3348969-2 10/07/18 23:42

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

WG1177336

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1032152-21,22,23,24,25,26,27,28,29,30,31,32,33,34,35,36,37,38,39,40

Method Blank (MB)

(MB) R3348969-2 10/07/18 23:42

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*100*			*80.0-120*
(S) Dibromofluoromethane	*103*			*75.0-120*
(S) 4-Bromofluorobenzene	*99.0*			*77.0-126*

Laboratory Control Sample (LCS)

(LCS) R3348969-1 10/07/18 23:02

	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
Analyte	mg/l	mg/l	%	%	
Acetone	0.125	0.107	85.5	19.0-160	
Benzene	0.0250	0.0286	114	70.0-123	
Bromodichloromethane	0.0250	0.0241	96.6	75.0-120	
Bromoform	0.0250	0.0246	98.4	68.0-132	
Bromomethane	0.0250	0.0264	105	10.0-160	
n-Butylbenzene	0.0250	0.0252	101	73.0-125	
sec-Butylbenzene	0.0250	0.0261	104	75.0-125	
Carbon disulfide	0.0250	0.0273	109	61.0-128	
Carbon tetrachloride	0.0250	0.0220	87.8	68.0-126	
Chlorobenzene	0.0250	0.0245	97.9	80.0-121	
Chlorodibromomethane	0.0250	0.0229	91.5	77.0-125	
Chloroethane	0.0250	0.0280	112	47.0-150	
Chloroform	0.0250	0.0273	109	73.0-120	
Chloromethane	0.0250	0.0293	117	41.0-142	
1,2-Dibromoethane	0.0250	0.0257	103	80.0-122	
1,1-Dichloroethane	0.0250	0.0281	112	70.0-126	
1,2-Dichloroethane	0.0250	0.0273	109	70.0-128	
1,1-Dichloroethene	0.0250	0.0271	108	71.0-124	
cis-1,2-Dichloroethene	0.0250	0.0281	112	73.0-120	
trans-1,2-Dichloroethene	0.0250	0.0266	106	73.0-120	
1,2-Dichloropropane	0.0250	0.0269	108	77.0-125	
cis-1,3-Dichloropropene	0.0250	0.0237	94.9	80.0-123	
trans-1,3-Dichloropropene	0.0250	0.0234	93.5	78.0-124	

Laboratory Control Sample (LCS)

(LCS) R3348969-1 10/07/18 23:02

Analyte	Spike Amount mg/l	LCS Result mg/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Ethylbenzene	0.0250	0.0243	97.1	79.0-123	
2-Hexanone	0.125	0.132	105	67.0-149	
Isopropylbenzene	0.0250	0.0262	105	76.0-127	
p-Isopropyltoluene	0.0250	0.0264	105	76.0-125	
2-Butanone (MEK)	0.125	0.149	119	44.0-160	
Methylene Chloride	0.0250	0.0255	102	67.0-120	
4-Methyl-2-pentanone (MIBK)	0.125	0.128	102	68.0-142	
Methyl tert-butyl ether	0.0250	0.0267	107	68.0-125	
Naphthalene	0.0250	0.0252	101	54.0-135	
n-Propylbenzene	0.0250	0.0274	110	77.0-124	
Styrene	0.0250	0.0266	107	73.0-130	
1,1,1,2-Tetrachloroethane	0.0250	0.0216	86.4	75.0-125	
1,1,2,2-Tetrachloroethane	0.0250	0.0276	111	65.0-130	
Tetrachloroethene	0.0250	0.0232	92.6	72.0-132	
Toluene	0.0250	0.0233	93.4	79.0-120	
1,1,1-Trichloroethane	0.0250	0.0262	105	73.0-124	
1,1,2-Trichloroethane	0.0250	0.0247	98.7	80.0-120	
Trichloroethene	0.0250	0.0259	104	78.0-124	
1,2,4-Trimethylbenzene	0.0250	0.0263	105	76.0-121	
1,3,5-Trimethylbenzene	0.0250	0.0252	101	76.0-122	
Vinyl chloride	0.0250	0.0280	112	67.0-131	
Xylenes, Total	0.0750	0.0714	95.2	79.0-123	
o-Xylene	0.0250	0.0240	96.2	80.0-122	
m&p-Xylenes	0.0500	0.0474	94.8	80.0-122	
(S) Toluene-d8			*94.6*	*80.0-120*	
(S) Dibromofluoromethane			*107*	*75.0-120*	
(S) 4-Bromofluorobenzene			*97.9*	*77.0-126*	

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3349881-3 10/08/18 01:19

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Acetone	U		0.0100	0.0500
Benzene	U		0.000331	0.00100
Bromodichloromethane	U		0.000380	0.00100
Bromoform	U		0.000469	0.00100
Bromomethane	U		0.000866	0.00500
n-Butylbenzene	U		0.000361	0.00100
sec-Butylbenzene	U		0.000365	0.00100
Carbon disulfide	U		0.000275	0.00100
Carbon tetrachloride	U		0.000379	0.00100
Chlorobenzene	U		0.000348	0.00100
Chlorodibromomethane	U		0.000327	0.00100
Chloroethane	U		0.000453	0.00500
Chloroform	U		0.000324	0.00500
Chloromethane	U		0.000276	0.00250
1,2-Dibromoethane	U		0.000381	0.00100
1,1-Dichloroethane	U		0.000259	0.00100
1,2-Dichloroethane	U		0.000361	0.00100
1,1-Dichloroethene	U		0.000398	0.00100
cis-1,2-Dichloroethene	U		0.000260	0.00100
trans-1,2-Dichloroethene	U		0.000396	0.00100
1,2-Dichloropropane	U		0.000306	0.00100
cis-1,3-Dichloropropene	U		0.000418	0.00100
trans-1,3-Dichloropropene	U		0.000419	0.00100
Ethylbenzene	U		0.000384	0.00100
2-Hexanone	U		0.00382	0.0100
Isopropylbenzene	U		0.000326	0.00100
p-Isopropyltoluene	U		0.000350	0.00100
2-Butanone (MEK)	U		0.00393	0.0100
Methylene Chloride	U		0.00100	0.00500
4-Methyl-2-pentanone (MIBK)	U		0.00214	0.0100
Methyl tert-butyl ether	U		0.000367	0.00100
Naphthalene	U		0.00100	0.00500
n-Propylbenzene	U		0.000349	0.00100
Styrene	U		0.000307	0.00100
1,1,1,2-Tetrachloroethane	U		0.000385	0.00100
1,1,2,2-Tetrachloroethane	U		0.000130	0.00100
Tetrachloroethene	U		0.000372	0.00100
Toluene	U		0.000412	0.00100
1,1,1-Trichloroethane	U		0.000319	0.00100
1,1,2-Trichloroethane	U		0.000383	0.00100

Method Blank (MB)

(MB) R3349881-3 10/08/18 01:19

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Trichloroethene	U		0.000398	0.00100
1,2,4-Trimethylbenzene	U		0.000373	0.00100
1,3,5-Trimethylbenzene	U		0.000387	0.00100
Vinyl chloride	U		0.000259	0.00100
Xylenes, Total	U		0.00106	0.00300
o-Xylene	U		0.000341	0.00100
m&p-Xylenes	U		0.000719	0.00200
(S) Toluene-d8	*105*			*80.0-120*
(S) Dibromofluoromethane	*99.4*			*75.0-120*
(S) 4-Bromofluorobenzene	*102*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349881-1 10/08/18 00:15 • (LCSD) R3349881-2 10/08/18 00:37

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Acetone	0.125	0.155	0.147	124	117	19.0-160			5.17	27
Benzene	0.0250	0.0243	0.0244	97.4	97.6	70.0-123			0.277	20
Bromodichloromethane	0.0250	0.0252	0.0252	101	101	75.0-120			0.0998	20
Bromoform	0.0250	0.0259	0.0255	103	102	68.0-132			1.35	20
Bromomethane	0.0250	0.0184	0.0193	73.7	77.2	10.0-160			4.59	25
n-Butylbenzene	0.0250	0.0247	0.0249	98.8	99.6	73.0-125			0.746	20
sec-Butylbenzene	0.0250	0.0251	0.0255	100	102	75.0-125			1.48	20
Carbon disulfide	0.0250	0.0243	0.0245	97.3	97.9	61.0-128			0.617	20
Carbon tetrachloride	0.0250	0.0236	0.0238	94.4	95.3	68.0-126			0.915	20
Chlorobenzene	0.0250	0.0258	0.0255	103	102	80.0-121			1.29	20
Chlorodibromomethane	0.0250	0.0259	0.0258	104	103	77.0-125			0.404	20
Chloroethane	0.0250	0.0259	0.0258	103	103	47.0-150			0.403	20
Chloroform	0.0250	0.0251	0.0254	100	101	73.0-120			1.02	20
Chloromethane	0.0250	0.0279	0.0285	112	114	41.0-142			2.12	20
1,2-Dibromoethane	0.0250	0.0266	0.0267	107	107	80.0-122			0.177	20
1,1-Dichloroethane	0.0250	0.0245	0.0248	98.1	99.4	70.0-126			1.29	20
1,2-Dichloroethane	0.0250	0.0258	0.0253	103	101	70.0-128			2.21	20
1,1-Dichloroethene	0.0250	0.0257	0.0260	103	104	71.0-124			1.21	20
cis-1,2-Dichloroethene	0.0250	0.0246	0.0245	98.6	98.2	73.0-120			0.433	20
trans-1,2-Dichloroethene	0.0250	0.0252	0.0259	101	103	73.0-120			2.77	20
1,2-Dichloropropane	0.0250	0.0247	0.0242	98.7	96.7	77.0-125			2.05	20
cis-1,3-Dichloropropene	0.0250	0.0249	0.0246	99.5	98.2	80.0-123			1.32	20
trans-1,3-Dichloropropene	0.0250	0.0256	0.0256	103	102	78.0-124			0.126	20

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349881-1 10/08/18 00:15 • (LCSD) R3349881-2 10/08/18 00:37

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Ethylbenzene	0.0250	0.0253	0.0249	101	99.7	79.0-123			1.62	20
2-Hexanone	0.125	0.142	0.136	114	109	67.0-149			4.44	20
Isopropylbenzene	0.0250	0.0250	0.0252	100	101	76.0-127			0.686	20
p-Isopropyltoluene	0.0250	0.0256	0.0258	102	103	76.0-125			0.847	20
2-Butanone (MEK)	0.125	0.143	0.136	114	109	44.0-160			5.12	20
Methylene Chloride	0.0250	0.0231	0.0234	92.4	93.7	67.0-120			1.34	20
4-Methyl-2-pentanone (MIBK)	0.125	0.134	0.130	107	104	68.0-142			3.49	20
Methyl tert-butyl ether	0.0250	0.0255	0.0254	102	102	68.0-125			0.597	20
Naphthalene	0.0250	0.0266	0.0262	106	105	54.0-135			1.49	20
n-Propylbenzene	0.0250	0.0248	0.0250	99.3	100	77.0-124			0.786	20
Styrene	0.0250	0.0260	0.0260	104	104	73.0-130			0.153	20
1,1,1,2-Tetrachloroethane	0.0250	0.0257	0.0255	103	102	75.0-125			0.761	20
1,1,2,2-Tetrachloroethane	0.0250	0.0240	0.0238	95.9	95.1	65.0-130			0.885	20
Tetrachloroethene	0.0250	0.0258	0.0260	103	104	72.0-132			0.625	20
Toluene	0.0250	0.0243	0.0243	97.2	97.4	79.0-120			0.184	20
1,1,1-Trichloroethane	0.0250	0.0253	0.0247	101	98.9	73.0-124			2.27	20
1,1,2-Trichloroethane	0.0250	0.0259	0.0256	104	102	80.0-120			1.18	20
Trichloroethene	0.0250	0.0264	0.0263	105	105	78.0-124			0.0926	20
1,2,4-Trimethylbenzene	0.0250	0.0252	0.0255	101	102	76.0-121			1.08	20
1,3,5-Trimethylbenzene	0.0250	0.0251	0.0253	101	101	76.0-122			0.784	20
Vinyl chloride	0.0250	0.0291	0.0292	116	117	67.0-131			0.447	20
Xylenes, Total	0.0750	0.0758	0.0756	101	101	79.0-123			0.264	20
o-Xylene	0.0250	0.0253	0.0254	101	102	80.0-122			0.381	20
m&p-Xylenes	0.0500	0.0505	0.0502	101	100	80.0-122			0.532	20
(S) Toluene-d8				*104*	*102*	*80.0-120*				
(S) Dibromofluoromethane				*101*	*99.9*	*75.0-120*				
(S) 4-Bromofluorobenzene				*101*	*101*	*77.0-126*				

WG1178265

Volatile Organic Compounds (GC/MS) by Method 8260B

QUALITY CONTROL SUMMARY

L1032152-20

Method Blank (MB)

(MB) R3349897-4 10/09/18 23:09

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Benzene	U		0.000331	0.00100
Methyl tert-butyl ether	U		0.000367	0.00100
(S) Toluene-d8	*99.0*			*80.0-120*
(S) Dibromofluoromethane	*114*			*75.0-120*
(S) 4-Bromofluorobenzene	*115*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3349897-1 10/09/18 21:48 • (LCSD) R3349897-2 10/09/18 22:08

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Benzene	0.0250	0.0256	0.0263	102	105	70.0-123			2.95	20
Methyl tert-butyl ether	0.0250	0.0268	0.0312	107	125	68.0-125			15.2	20
(S) Toluene-d8				*105*	*95.9*	*80.0-120*				
(S) Dibromofluoromethane				*117*	*117*	*75.0-120*				
(S) 4-Bromofluorobenzene				*109*	*107*	*77.0-126*				

Method Blank (MB)

(MB) R3350081-3 10/11/18 16:59

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Benzene	U		0.000331	0.00100
(S) Toluene-d8	*105*			*80.0-120*
(S) Dibromofluoromethane	*95.7*			*75.0-120*
(S) 4-Bromofluorobenzene	*102*			*77.0-126*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350081-1 10/11/18 15:42 • (LCSD) R3350081-2 10/11/18 16:01

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Benzene	0.0250	0.0245	0.0250	98.1	100	70.0-123			2.08	20
(S) Toluene-d8				*104*	*103*	*80.0-120*				
(S) Dibromofluoromethane				*92.9*	*93.9*	*75.0-120*				
(S) 4-Bromofluorobenzene				*100*	*100*	*77.0-126*				

WG1178287

Semi-Volatile Organic Compounds (GC) by Method 3511/8015

QUALITY CONTROL SUMMARY

L1032152-01,02,03,04,05,06

Method Blank (MB)

(MB) R3350066-1 10/12/18 01:08

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*82.0*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350066-2 10/12/18 01:25 • (LCSD) R3350066-3 10/12/18 01:43

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.47	1.53	98.0	102	50.0-150			4.00	20
(S) o-Terphenyl				*80.0*	*84.0*	*31.0-160*				

WG1178288

QUALITY CONTROL SUMMARY

Semi-Volatile Organic Compounds (GC) by Method 3511/8015 L1032152-09,10,11,12,13,14,15,16,17,18,19,20,21,22,23,24,25,26,27,28

Method Blank (MB)

(MB) R3350067-1 10/12/18 02:00

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*82.0*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350067-2 10/12/18 02:17 • (LCSD) R3350067-3 10/12/18 02:35

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.51	1.66	101	111	50.0-150			9.46	20
(S) o-Terphenyl				*78.5*	*90.0*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Method Blank (MB)

(MB) R3350030-1 10/11/18 13:03

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
TPH (GC/FID) High Fraction	U		0.0247	0.100
(S) o-Terphenyl	*60.5*			*31.0-160*

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3350030-2 10/11/18 13:24 • (LCSD) R3350030-3 10/11/18 13:44

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
TPH (GC/FID) High Fraction	1.50	1.47	1.39	98.0	92.7	50.0-150			5.59	20
(S) o-Terphenyl				*98.5*	*93.0*	*31.0-160*				

1 Cp
2 Tc
3 Ss
4 Cn
5 Sr
6 Qc
7 Gl
8 Al
9 Sc

Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Abbreviations and Definitions

MDL	Method Detection Limit.
ND	Not detected at the Reporting Limit (or MDL where applicable).
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J1	Surrogate recovery limits have been exceeded; values are outside upper control limits.
J3	The associated batch QC was outside the established quality control range for precision.
J4	The associated batch QC was outside the established quality control range for accuracy.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
O1	The analyte failed the method required serial dilution test and/or subsequent post-spike criteria. These failures indicate matrix interference.
P1	RPD value not applicable for sample concentrations less than 5 times the reporting limit.
Q	Sample was prepared and/or analyzed past recommended holding time. Concentrations should be considered minimum values.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.
* Not all certifications held by the laboratory are applicable to the results reported in the attached report.
* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO00356
Kentucky [1,6]	90010	South Carolina	84004
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1,4]	2006
Louisiana [1]	LA180010	Texas	T 104704245-17-14
Maine	TN0002	Texas [5]	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

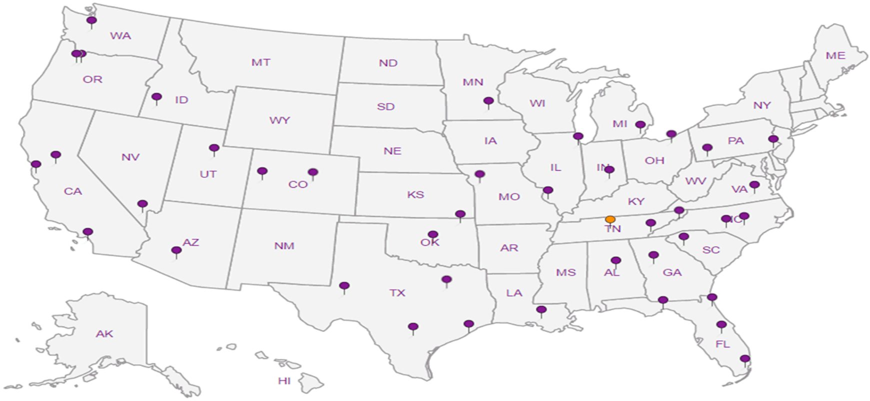
Third Party Federal Accreditations

A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

[1] Drinking Water [2] Underground Storage Tanks [3] Aquatic Toxicity [4] Chemical/Microbiological [5] Mold [6] Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
apinvoiceapproval@trcsolutions.com

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Chain of Custody Page 1 of 9

Pace Analytical®
National Center for Testing & Innovation

12065 Lebanon Rd
Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: Julie Speer

Email To: jspeer@trcsolutions.com

Project Description: REST Fall 2018

City/State Collected: Artesia, NM

Phone: 512-684-3170

Fax:

Client Project # 294318.0000.0000.

Lab Project # TRCATX-REST

Collected by (print): Scott Ude/HMI Team

Site/Facility ID # REST (Navajo - Artesia)

P.O. # 119503

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ✓

L # 1032152
G012

Acctnum: TRCATX
Template: T140424
Prelogin: P671814
TSR: 526
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
MW-48	Grab	GW		10-3-18	1455	9	x	x	x	x	x	x	x					01
MW-130	Grab	GW		↓	1440	9	x	x	x	x	x	x	x					02
~~KWB-4~~	~~Grab~~	~~GW~~				~~7~~	~~x~~	~~x~~		~~x~~	~~x~~	~~x~~	~~x~~	LNAPL				
MW-52	Grab	GW		10-3-18	1325	10	x	x	x		x	x	x	x	x			03
MW-109	Grab	GW		↓	1410	9	x	x	x	x	x	x	x					04
MW-110	Grab	GW			1515	9	x	x	x	x	x	x	x					05
~~MW-113~~	~~Grab~~	~~GW~~				~~9~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~					
~~KWB-8~~	~~Grab~~	~~GW~~				~~8~~	~~x~~	~~x~~			~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	LNAPL		
~~MW-133~~	~~Grab~~	~~GW~~				~~9~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	~~x~~	LNAPL				
MW-134	Grab	GW		10-3-18	1055	9	x	x	x	x	x	x	x					06

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP ___Y ___N
COC Signed/Accurate: ✓Y ___N
Bottles arrive intact: ✓Y ___N
Correct bottles used: ✓Y ___N
Sufficient volume sent: ✓Y ___N
If Applicable
VOA Zero Headspace: ✓Y ___N
Preservation Correct/Checked: ✓Y ___N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8-1 1.7 °C	Bottles Received: 356
					If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18	Time: 8:45
				Hold:	Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
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Chain of Custody Page 2 of 9

Pace Analytical®
National Center for Testing & Innovation

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Mount Juliet, TN 37122
Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
__ Same Day __ Five Day
__ Next Day __ 5 Day (Rad Only)
__ Two Day __ 10 Day (Rad Only)
__ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N __ Y ✓

L # 103215

Table #

Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
RA-4798	Grab	GW		10-3-18	1150	5	X				X	X	X					07
RA-4196	Grab	GW		↓	1220	5	X				X	X	X					08
~~KWB-7~~	~~Grab~~	~~GW~~				~~8~~	~~X~~	~~X~~			~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~MW-135~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~KWB-11A~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~KWB-11B~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
MW-115	Grab	GW		10-3-18	910	9	X	X	X	X	X	X	X					09
MW-114	Grab	GW			950	9	X	X	X	X	X	X	X					10
MW-117	Grab	GW			935	9	X	X	X	X	X	X	X					11
MW-118	Grab	GW		↓	1020	9	X	X	X	X	X	X	X					12

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP __Y __N
COC Signed/Accurate: ✓Y __N
Bottles arrive intact: ✓Y __N
Correct bottles used: ✓Y __N
Sufficient volume sent: ✓Y __N
If Applicable
VOA Zero Headspace: ✓Y __N
Preservation Correct/Checked: __Y __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	
	10-4-18	700		Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8 cf -.1 1.7 °C Bottles Received: 356
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/15/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

TRC Solutions - Austin, TX
505 E. Huntland Dr, Ste 250
Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
Windsor, CT 06095
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Chain of Custody Page 3 of 9

Pace Analytical®
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Mount Juliet, TN 37122
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Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Fall 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Quote #
Immediately Packed on Ice N ___ [✓ Y]

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Date Results Needed

L# 1032152
Table #
Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
MW-119	Grab	GW		10-3-18	1105	9	X				X	X	X					13
~~MW-136~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~MW-126A~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-126B~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-127~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~KWB-1A~~	~~Grab~~	~~GW~~				~~8~~	~~X~~	~~X~~			~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
~~KWB-10R~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-131~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~LNAPL~~				
~~KWB-5~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-111~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
__ UPS [✓ FedEx] __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP [✓ Y] __N
COC Signed/Accurate: [✓ Y] __N
Bottles arrive intact: [✓ Y] __N
Correct bottles used: [✓ Y] __N
Sufficient volume sent: [✓ Y] __N
If Applicable
VOA Zero Headspace: N __N
Preservation Correct/Checked: [✓ Y] __N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8 -.1 1.7 °C Bottles Received: 356
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

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Austin, TX 78752

Billing Information:
Accounts Payable
21 Griffin Road North
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Chain of Custody Page 4 of 9

Pace Analytical®
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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**
City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:
Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**

Collected by (signature):
Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #
Date Results Needed

L #
Table #
Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	Pres Chk / No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
KWB-6	Grab	GW		10-3-18	1355	7	X	X		X	X	X	X					14
~~MW-112~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL				
~~MW-132~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	LNAPL				
MW-57	Grab	GW		10-3-18	1150	9	X	X	X	X	X	X	X					15
KWB-12A	Grab	GW		↓	1230	10	X	X	X		X	X	X	X	X			16
KWB-12B	Grab	GW			1310	10	X	X	X		X	X	X	X	X			17
~~KWB-2R~~	~~Grab~~	~~GW~~				~~7~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	NOT SAMPLED				
MW-58	Grab	GW		10-3-18	1425	8	X	X			X	X	X	X	X			18
~~MW-104~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-64~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ___

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP ___ Y ___ N
COC Signed/Accurate: ✓ Y ___ N
Bottles arrive intact: ✓ Y ___ N
Correct bottles used: ✓ Y ___ N
Sufficient volume sent: ✓ Y ___ N
If Applicable
VOA Zero Headspace: ✓ Y ___ N
Preservation Correct/Checked: ✓ Y ___ N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.0 15-.1 [illegible] 1.7 °C Bottles Received: 356
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

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Pace Analytical®
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Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project #: **294318.0000.0000.**

Lab Project #: **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID #: **REST (Navajo - Artesia)**

P.O. #: **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

L #
Table #
Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
~~MW-65~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-102~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
MW-99	Grab	GW		10-3-18	1005	9	X	X	X	X	X	X	X					19
MW-66	Grab	GW		↓	925	10	X	X	X		X	X	X	X	X			20
~~MW-28~~	~~Grab~~	~~GW~~				~~10~~	~~X~~	~~X~~	~~X~~		~~X~~	~~X~~	~~X~~	~~X~~	~~X~~			
MW-60	Grab	GW		10-3-18	1050	10	X	X	X		X	X	X	X	X			21
MW-128	Grab	GW			1210	9	X	X	X	X	X	X	X					22
MW-125	Grab	GW			1255	9	X	X	X	X	X	X	X					23
MW-116	Grab	GW			1335	9	X	X	X	X	X	X	X					24
MW-101	Grab	GW		↓	915	9	X	X	X	X	X	X	X					25

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS ✓ FedEx ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP _Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: ✓Y _N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: ✓Y _N
Preservation Correct/Checked: ✓Y _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)		
	10-4-18	700		Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8+-.1 1.7 °C Bottles Received: 356	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 8:45	Hold: Condition: NCF / [✓ OK]

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Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Fall 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Immediately Packed on Ice N ___ [✓ Y]
Quote #
Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Date Results Needed

L #
Table #
Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions, TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
MW-105	Grab	GW		10-3-18	825	9	X	X	X	X	X	X	X					24
~~MW-61~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~MW-62~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
MW-137	Grab	GW		10-3-18	1430	10	X	X	X		X	X	X	X	X			27
MW-138	Grab	GW		↓	1345	10	X	X	X		X	X	X	X	X			28
MW-23	Grab	GW			1300	9	X	X	X	X	X	X	X					29
MW-39	Grab	GW			1125	9	X	X	X	X	X	X	X					30
~~MW-98~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
MW-29	Grab	GW		10-3-18	1215	9	X	X	X	X	X	X	X					31
MW-106	Grab	GW		↓	1035	9	X	X	X	X	X	X	X					32

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:
RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via:
___ UPS [✓ FedEx] ___ Courier ___ ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] [✓ Y] ___ N
COC Signed/Accurate: [✓ Y] ___ N
Bottles arrive intact: [✓ Y] ___ N
Correct bottles used: [✓ Y] ___ N
Sufficient volume sent: [✓ Y] ___ N
If Applicable
VOA Zero Headspace: [✓ Y] ___ N
Preservation Correct/Checked: [✓ Y] ___ N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8 15-.1 A 1.7 °C Bottles Received: 356	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 8:45	Hold: Condition: NCF / [✓ OK]

Chain of Custody Page 7 of 9

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Austin, TX 78752

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apinvoiceapproval@trcsolutions.com

Pres Chk

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

Immediately Packed on Ice N ___ Y ✓

L #
Table #
Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
MW-50	Grab	GW				7	X	X		X	X	X	X					
MW-97	Grab	GW				9	X	X	X	X	X	X	X	LNAPL				
MW-92	Grab	GW				9	X	X	X	X	X	X	X	LNAPL				
MW-91	Grab	GW				9	X	X	X	X	X	X	X					
MW-90	Grab	GW				9	X	X	X	X	X	X	X					
MW-96	Grab	GW				9	X	X	X	X	X	X	X					
MW-94	Grab	GW				9	X	X	X	X	X	X	X	LNAPL				
MW-67	Grab	GW				10	X	X	X		X	X	X	X	X			
DUP-REST-01	Grab	GW				9	X	X	X	X	X	X	X					
DUP-REST-02	Grab	GW				9	X	X	X	X	X	X	X					

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
___ UPS [✓ FedEx] ___ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓ NP __Y __N
COC Signed/Accurate: __Y __N
Bottles arrive intact: __Y __N
Correct bottles used: __Y __N
Sufficient volume sent: __Y __N
If Applicable
VOA Zero Headspace: __Y __N
Preservation Correct/Checked: __Y __N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: [illegible] 1.7 °C	Bottles Received: 356
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18	Time: 8:45

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

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Fax: 615-758-5859

Report to: **Julie Speer**
Email To: **jspeer@trcsolutions.com**
Project Description: **REST Fall 2018**
City/State Collected: **Artesia, NM**
Phone: **512-684-3170**
Fax:
Client Project # **294318.0000.0000.**
Lab Project # **TRCATX-REST**
Collected by (print): **Scott Ude/HMI Team**
Site/Facility ID # **REST (Navajo - Artesia)**
P.O. # **119503**
Collected by (signature):
Quote #
Immediately Packed on Ice N ___ Y ✓
Rush? (Lab MUST Be Notified) ___ Same Day ___ Next Day ___ Two Day ___ Three Day ___ Five Day ___ 5 Day (Rad Only) ___ 10 Day (Rad Only)
Date Results Needed

L #
Table #
Acctnum: **TRCATX**
Template: **T140424**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions. TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
DUP-REST-03	Grab	GW		10-3-18	1200	9	X	X	X	X	X	X	X					33
DUP-REST-04	Grab	GW		↓	1200	10	X	X	X		X	X	X	X	X			34
DUP-REST-05	Grab	GW			1200	10	X	X	X		X	X	X	X	X			35
~~EB-REST-01~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
~~EB-REST-02~~	~~Grab~~	~~GW~~				~~9~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~					
EB-REST-03	Grab	GW		10-3-18	1105	9	X	X	X	X	X	X	X					36
EB-REST-04	Grab	GW			1115	10	X	X	X		X	X	X	X	X			37
EB-REST-05	Grab	GW			1330	10	X	X	X		X	X	X	X	X			38
TRIP BLANK-REST-01	Grab	GW			—	1										X		39
TRIP BLANK-REST-02	Grab	GW		↓	—	1										X		46

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ______

Remarks:
RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______
Flow ______ Other ______

Samples returned via: ___ UPS ✓ FedEx ___ Courier ___ ______
Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: [✓ NP] Y N
COC Signed/Accurate: [✓ Y] N
Bottles arrive intact: [✓ Y] N
Correct bottles used: [✓ Y] N
Sufficient volume sent: [✓ Y] N
If Applicable
VOA Zero Headspace: [✓ Y] N
Preservation Correct/Checked: [✓ Y] N

Relinquished by : (Signature)	Date: 10-4-18	Time: 700	Received by: (Signature)	Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8 15-1 1.7 °C Bottles Received: 356	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 8:45	Hold: Condition: NCF / OK

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Austin, TX 78752

Billing Information:
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Phone: 615-758-5858
Phone: 800-767-5859
Fax: 615-758-5859

Report to: **Julie Speer**

Email To: **jspeer@trcsolutions.com**

Project Description: **REST Fall 2018**

City/State Collected: **Artesia, NM**

Phone: **512-684-3170**
Fax:

Client Project # **294318.0000.0000.**

Lab Project # **TRCATX-REST**

Collected by (print): **Scott Ude/HMI Team**

Site/Facility ID # **REST (Navajo - Artesia)**

P.O. # **119503**

Collected by (signature):

Immediately Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed

L# 1032152

Table #

Acctnum: **TRCATX**
Template: **T140422**
Prelogin: **P671814**
TSR: **526**
PB:
Shipped Via:

Pres Chk

Analysis / Container / Preservative

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	VOC - 40mlAmb HCl	DRO - 40mlAmb-HCl-BT	GRO - 40mlAmb HCl	Total Short List Metals 250mlHDPE-HNO3	Cations (from "total metals" bottle)	Anions, TDS - 250mlHDPE-NoPres	NO2NO3 - 250mlHDPE-H2SO4	Total Long List Metals 250mlHDPE-HNO3	Cyanide - 250mlHDPEAmb-NaOH	VOC - 40mlAmb-HCl-Blk	Remarks	Sample # (lab only)
TRIP BLANK-REST-03	Grab	GW		10-3-18	—	1										X		41
TRIP BLANK-REST-04	Grab	GW		↓	—	1										X		42
MW-43	Grab	GW			1305	10	X	X	X		X	X	X	X	X			43

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ________

Remarks:

RAD SCREEN: <0.5 mR/hr

pH ______ Temp ______

Flow ______ Other ______

Samples returned via:
__ UPS ✓ FedEx __ Courier ______

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: ✓NP _Y _N
COC Signed/Accurate: ✓Y _N
Bottles arrive intact: ✓Y _N
Correct bottles used: ✓Y _N
Sufficient volume sent: ✓Y _N
If Applicable
VOA Zero Headspace: ✓N _N
Preservation Correct/Checked: ✓Y _N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	
Bri Ko	10-4-18	700		Trip Blank Received: [✓ Yes] / No HCL / MeoH TBR
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: 1.8 -.1 1.7 °C Bottles Received: 356
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 10/5/18 Time: 8:45

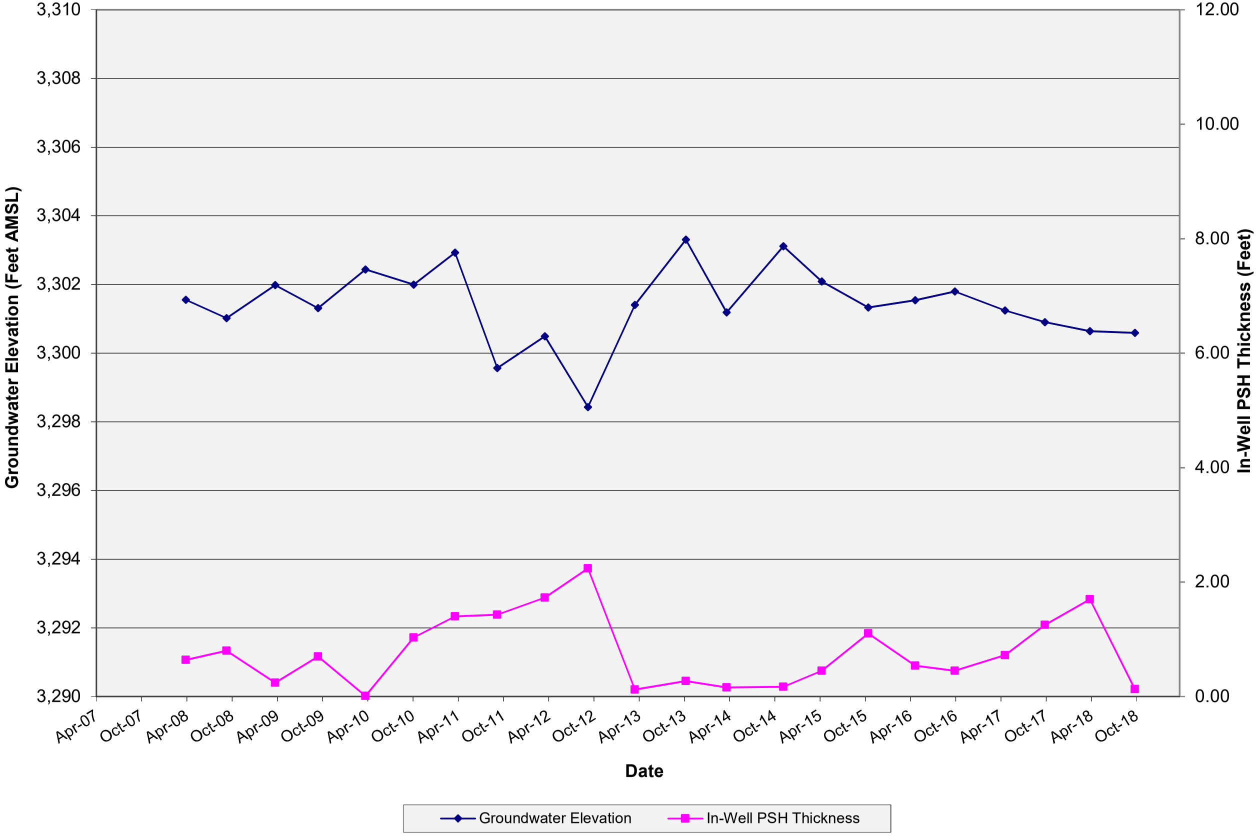
If preservation required by Login: Date/Time

Hold:

Condition: NCF / [✓ OK]

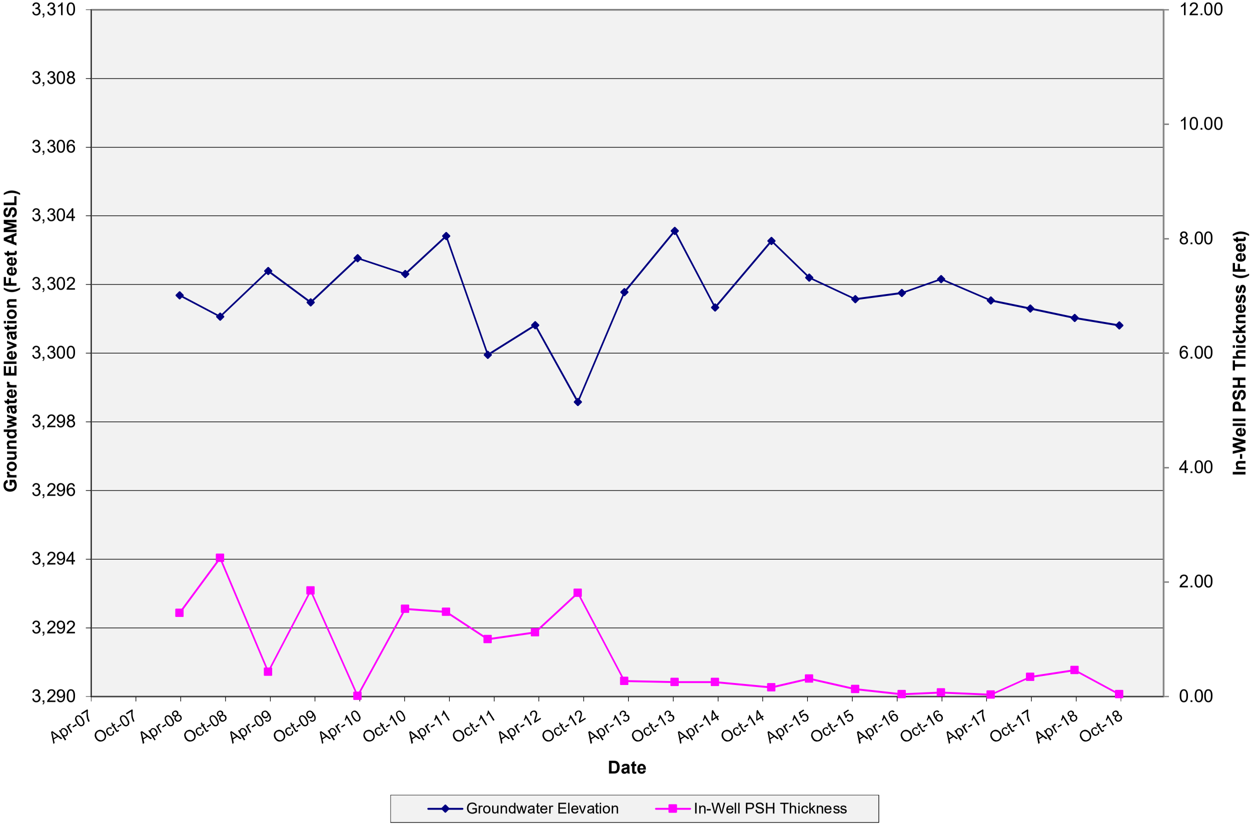
MW-85: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Evaporation Ponds



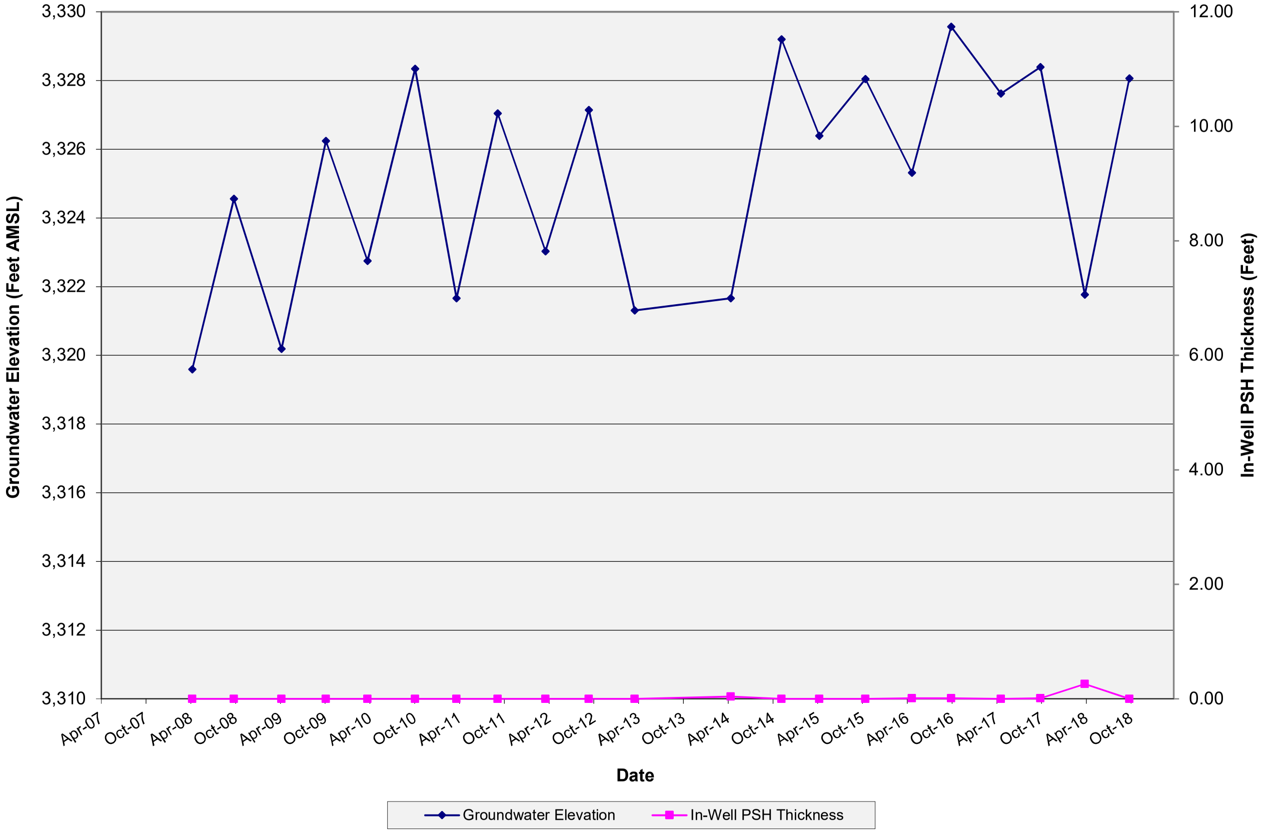
MW-86: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Evaporation Ponds



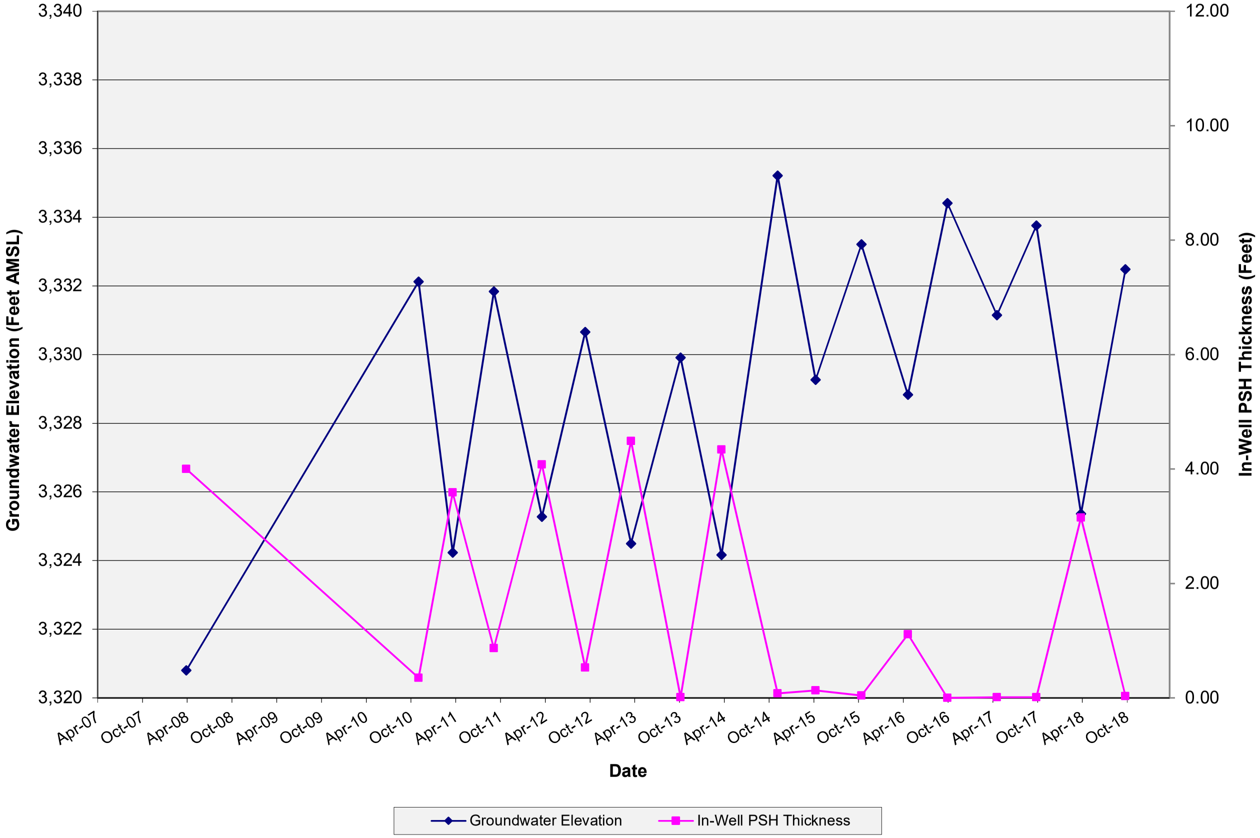
KWB-7: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



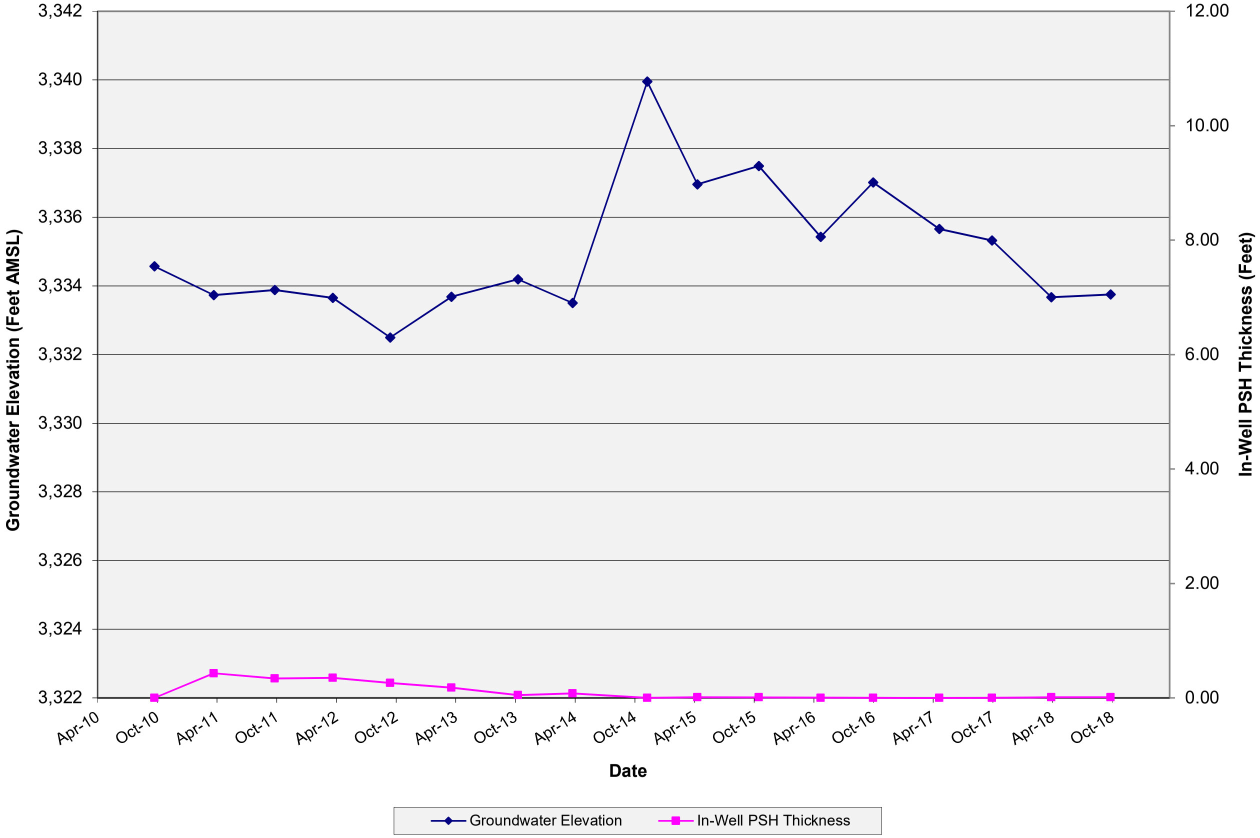
KWB-8: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



KWB-10R: Groundwater Elevations and In-Well PSH Thicknesses

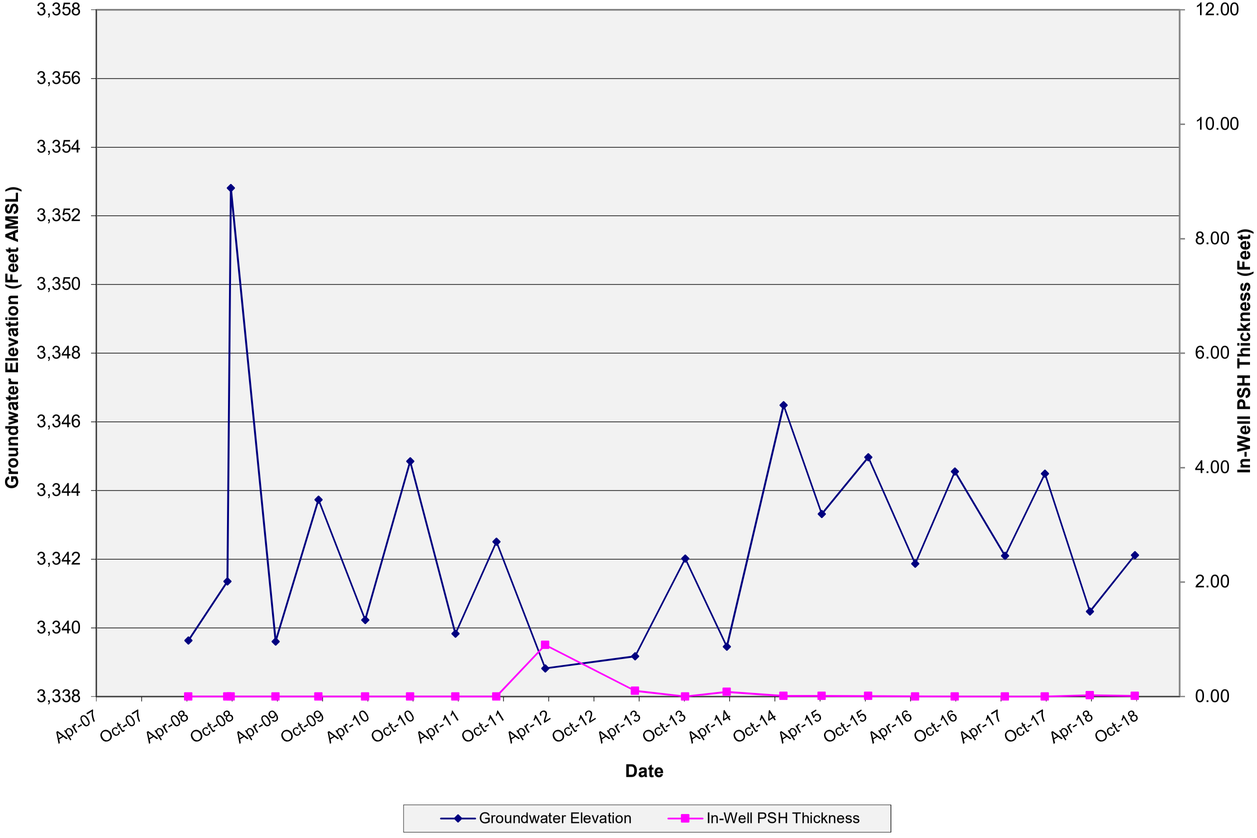
HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



MW-58: Groundwater Elevations and In-Well PSH Thicknesses

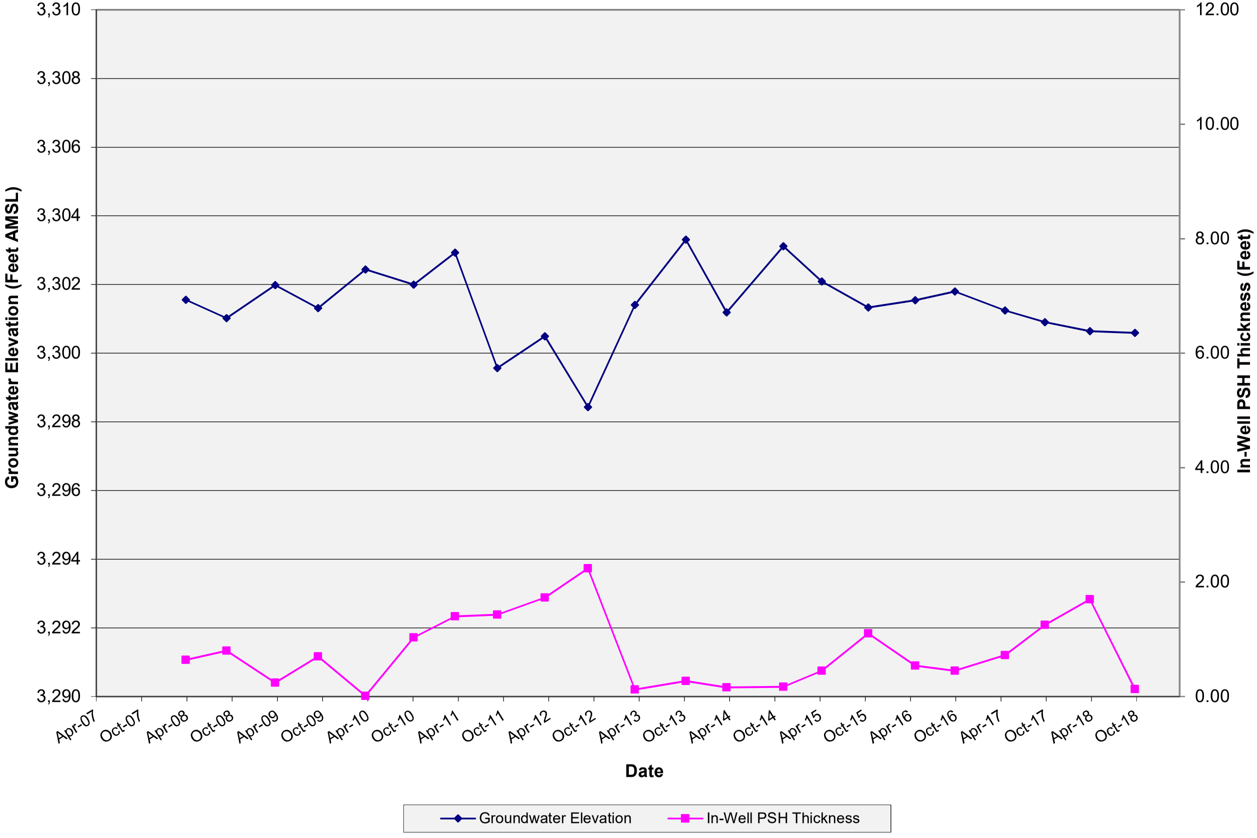
HollyFrontier Navajo Refining LLC - Artesia Refinery

Field East of Refinery



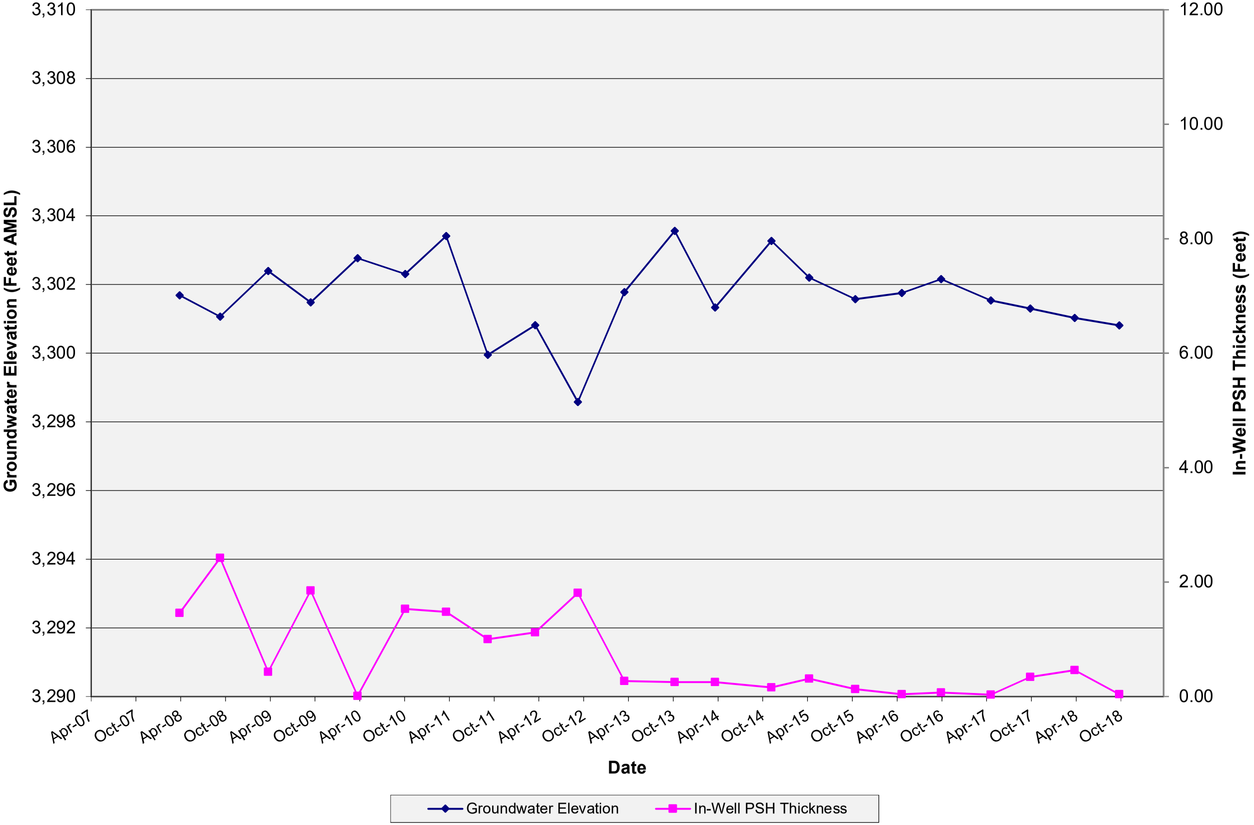
MW-85: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Evaporation Ponds



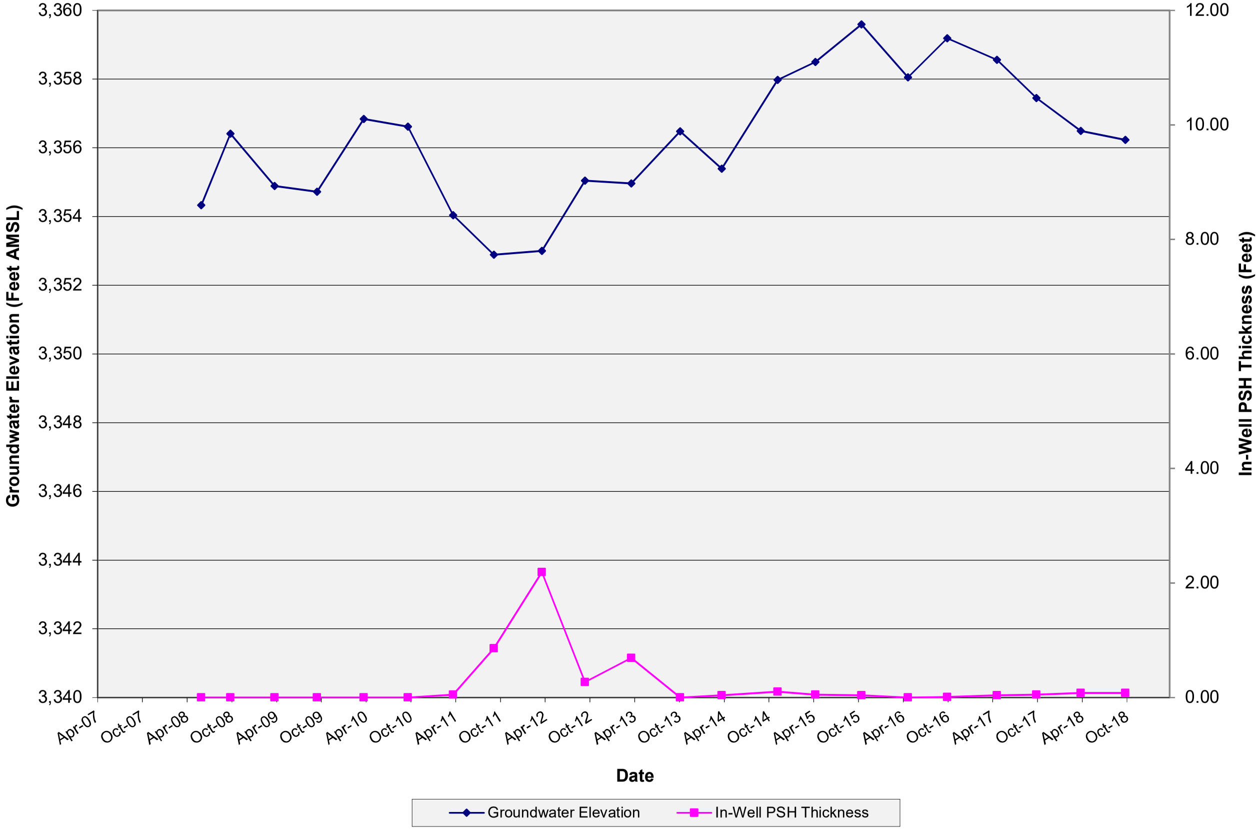
MW-86: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Evaporation Ponds



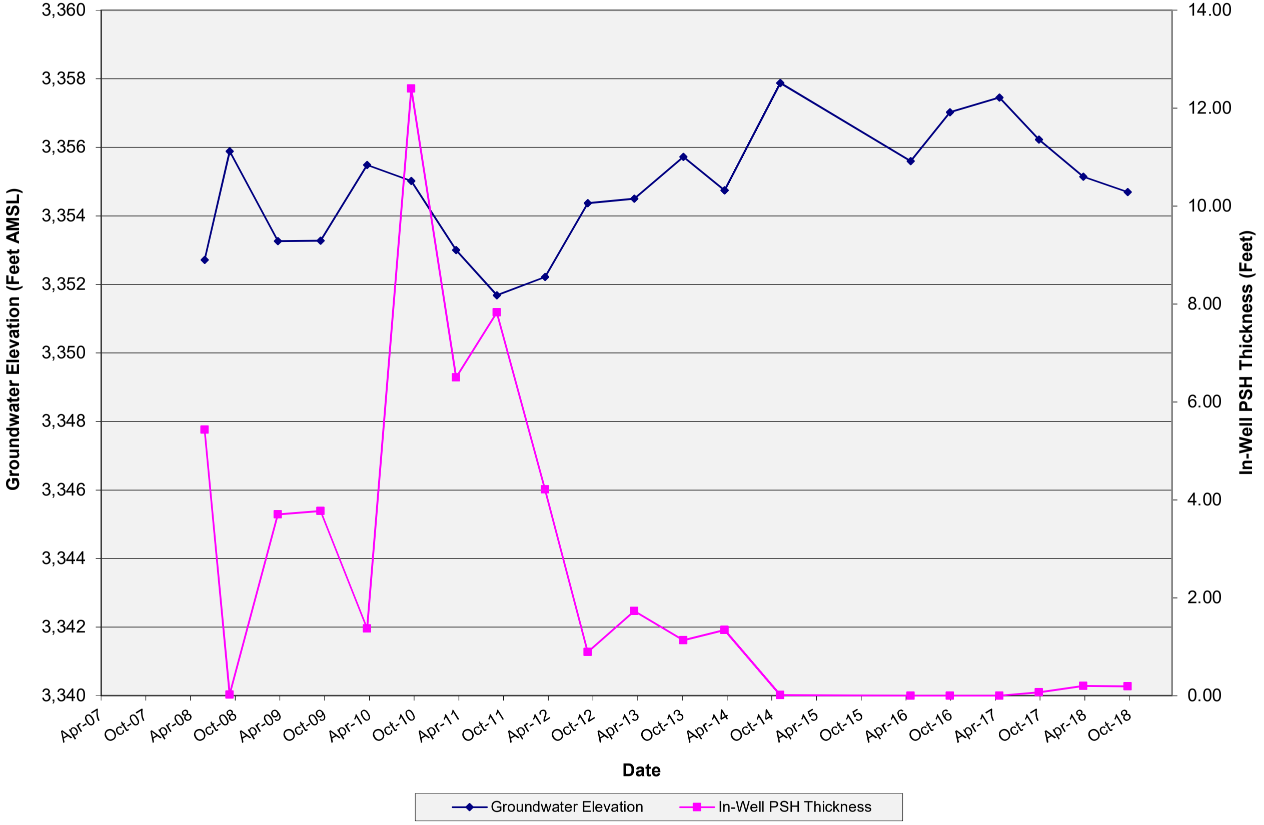
MW-92: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



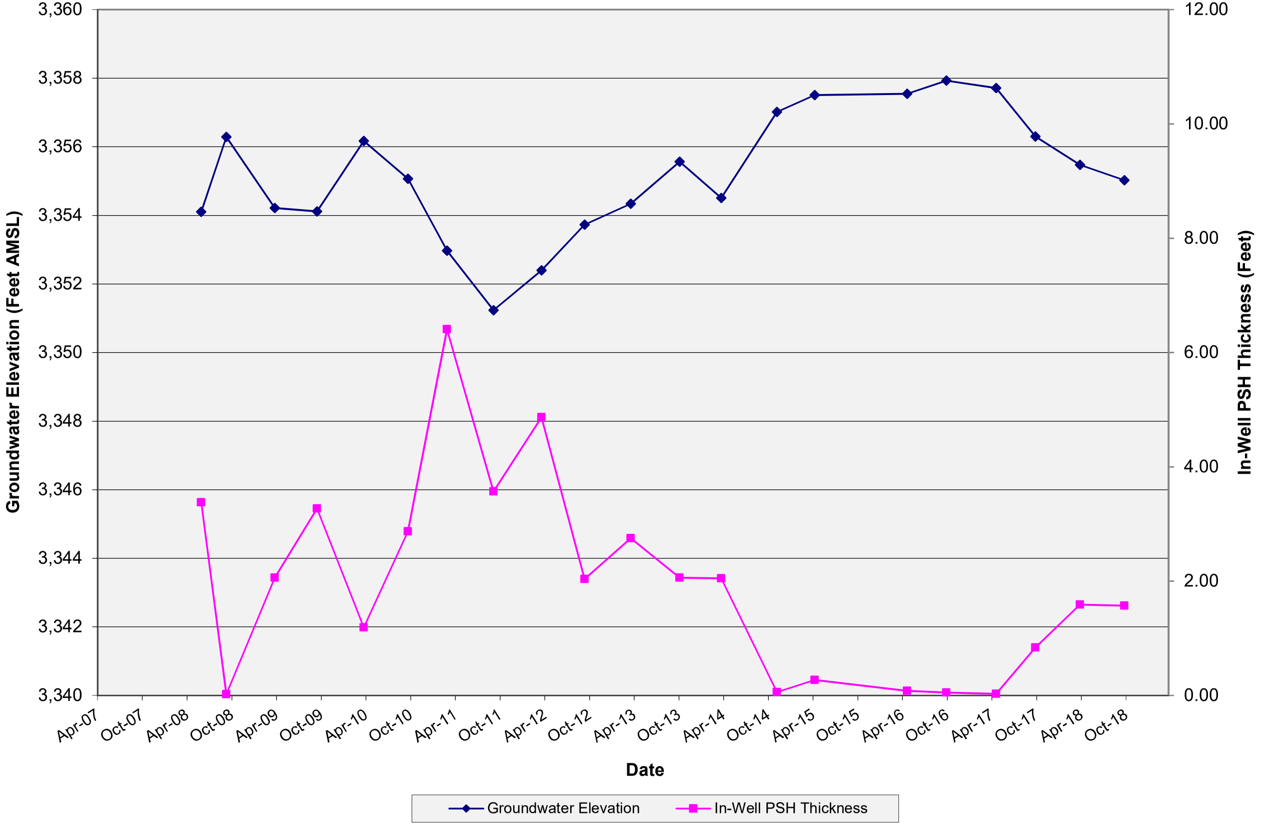
MW-94: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



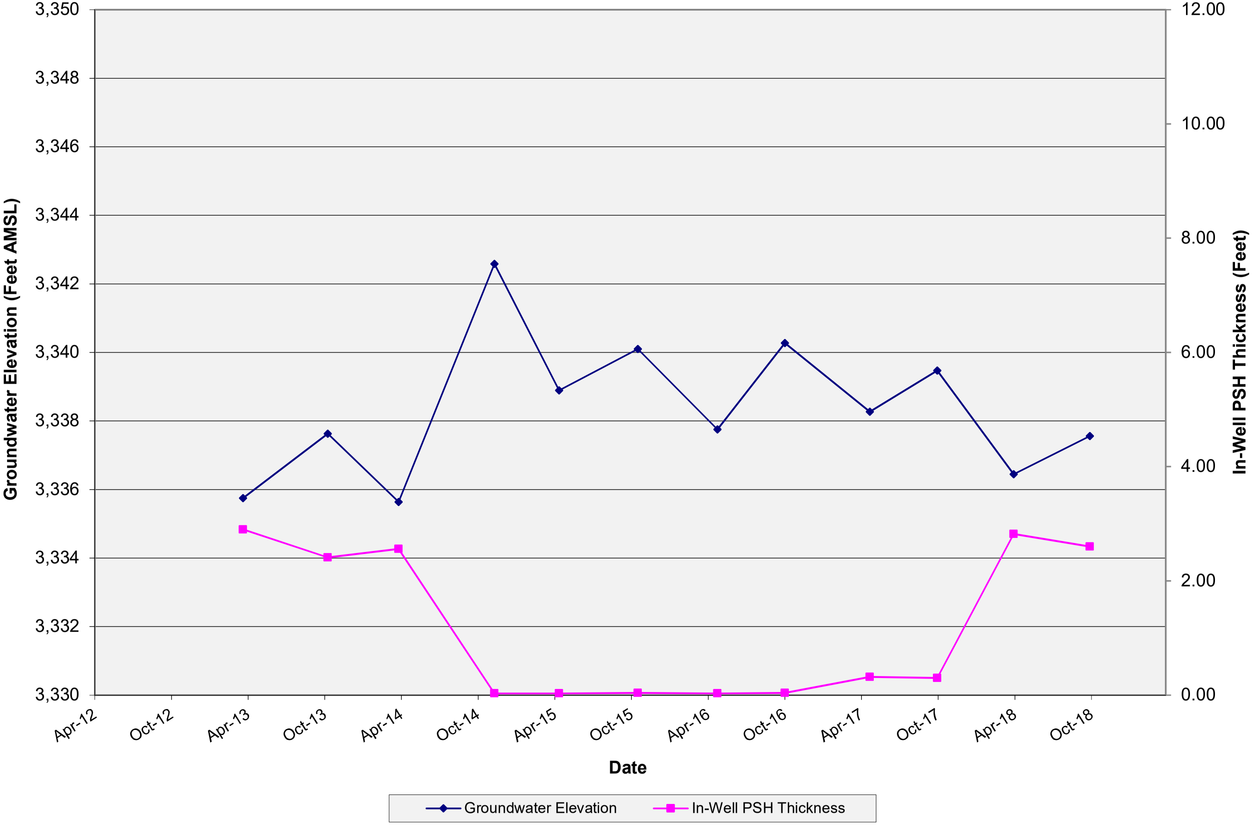
MW-97: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



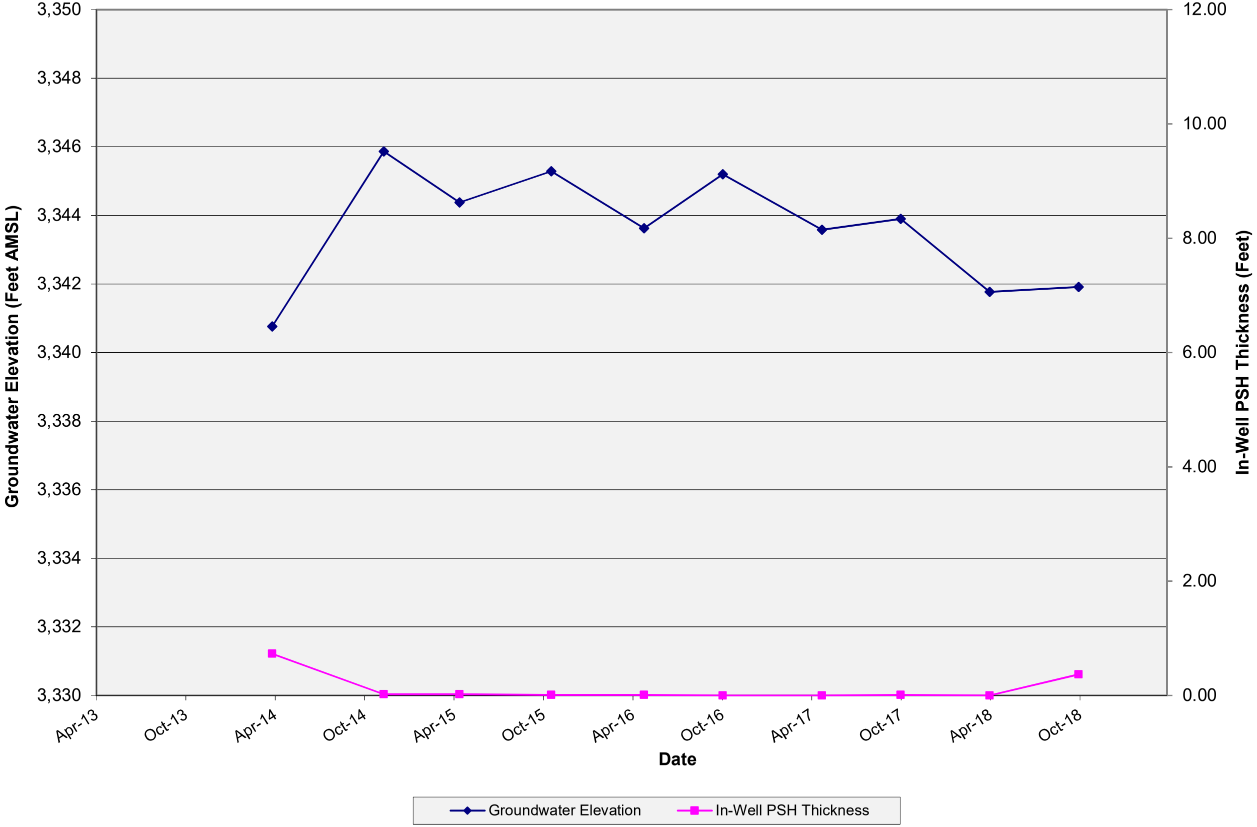
MW-112: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



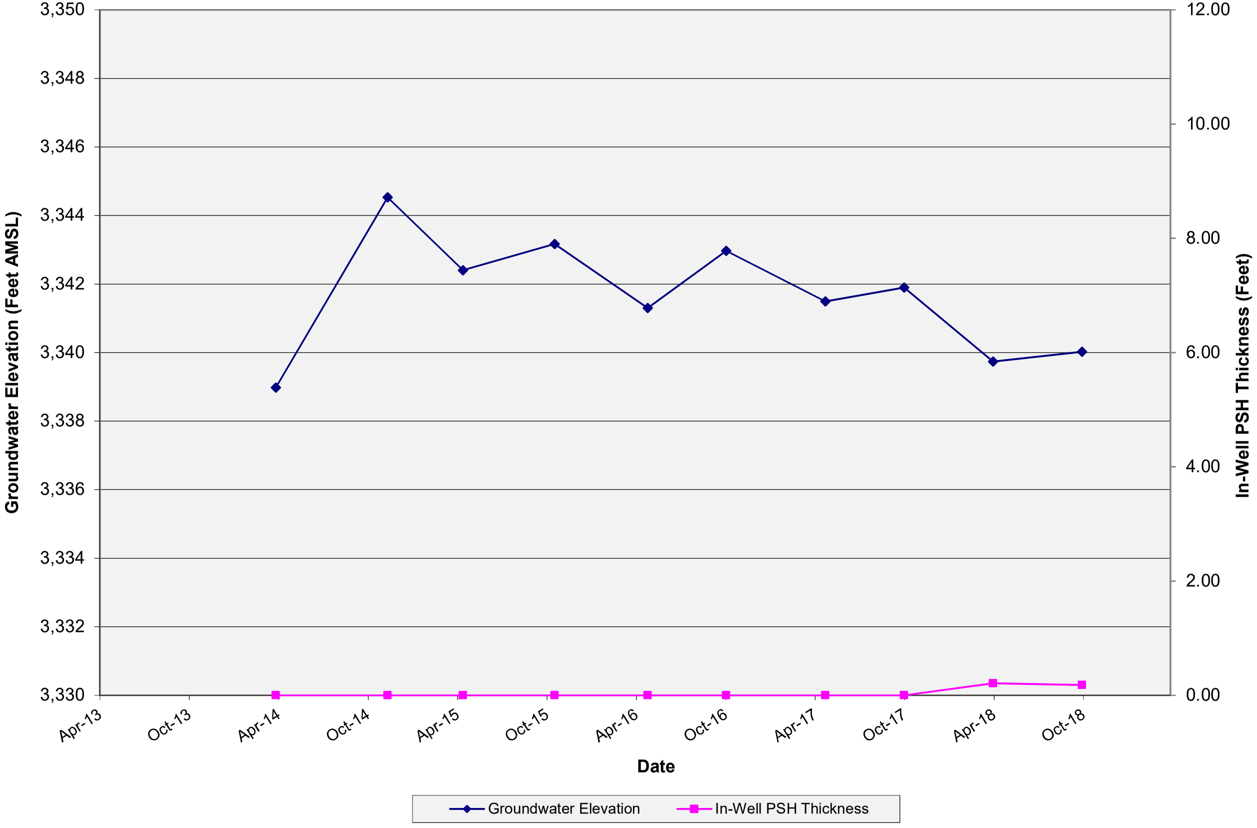
MW-129: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



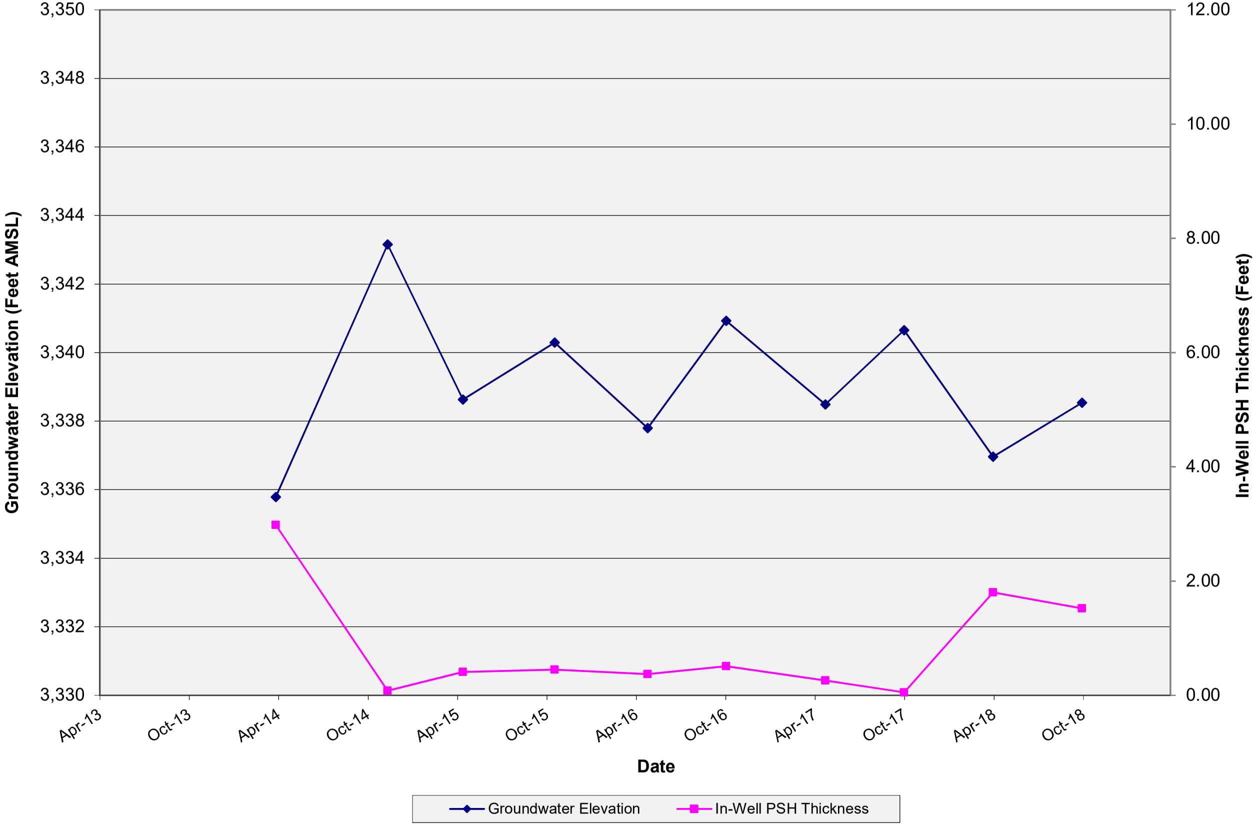
MW-131: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



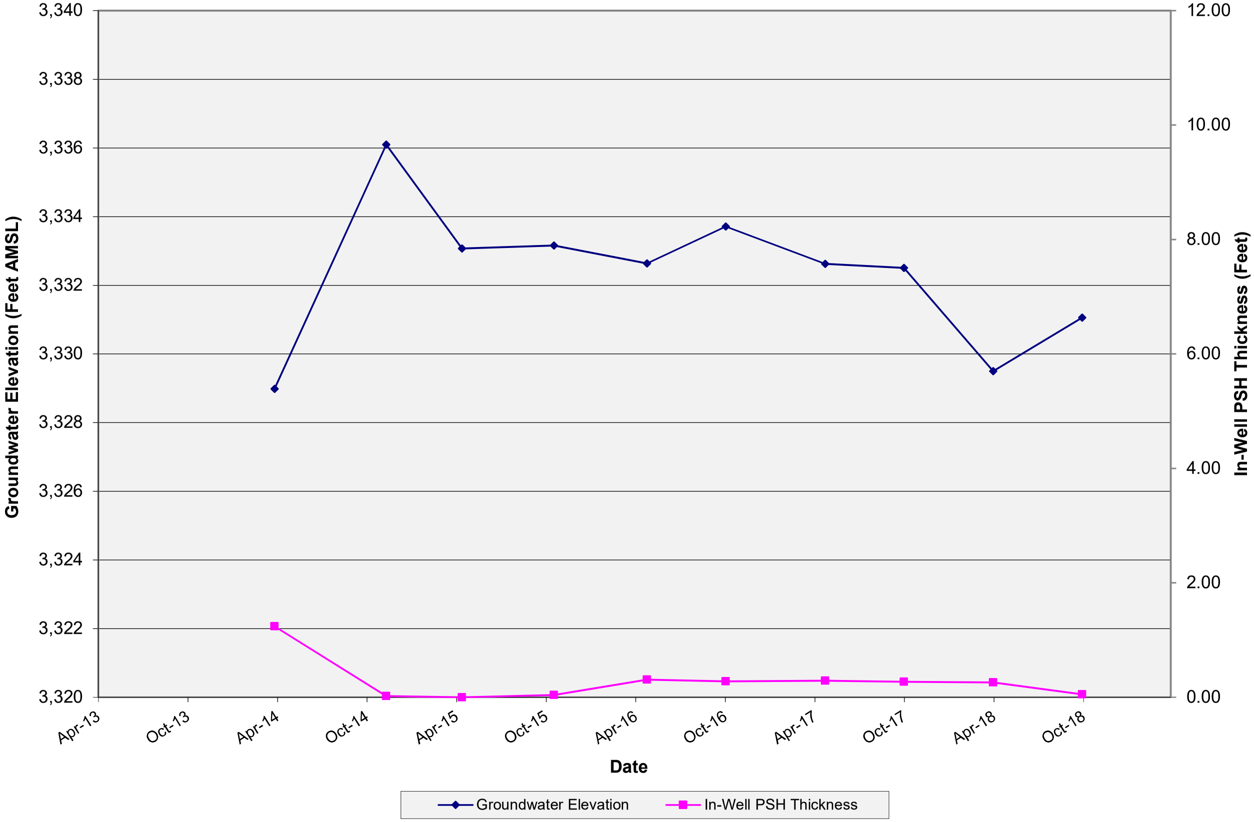
MW-132: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



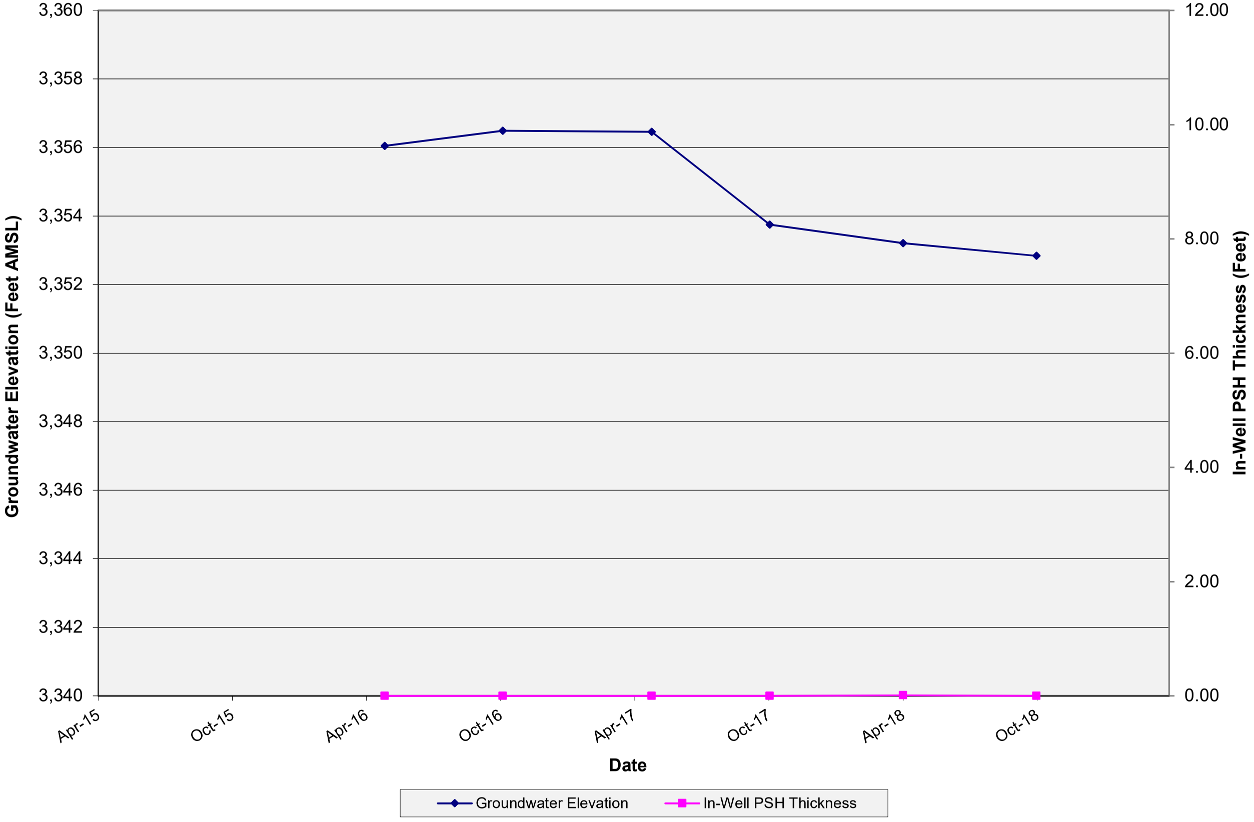
MW-133: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



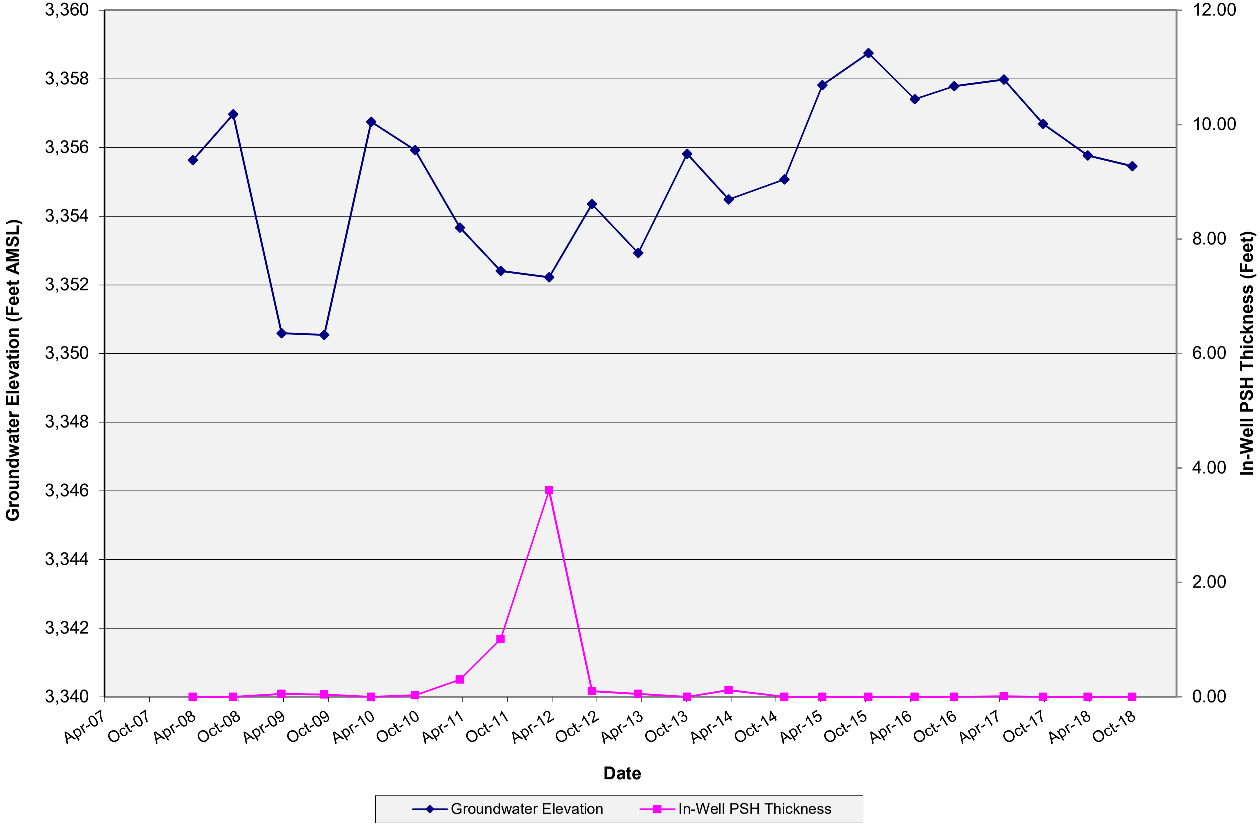
MW-138: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



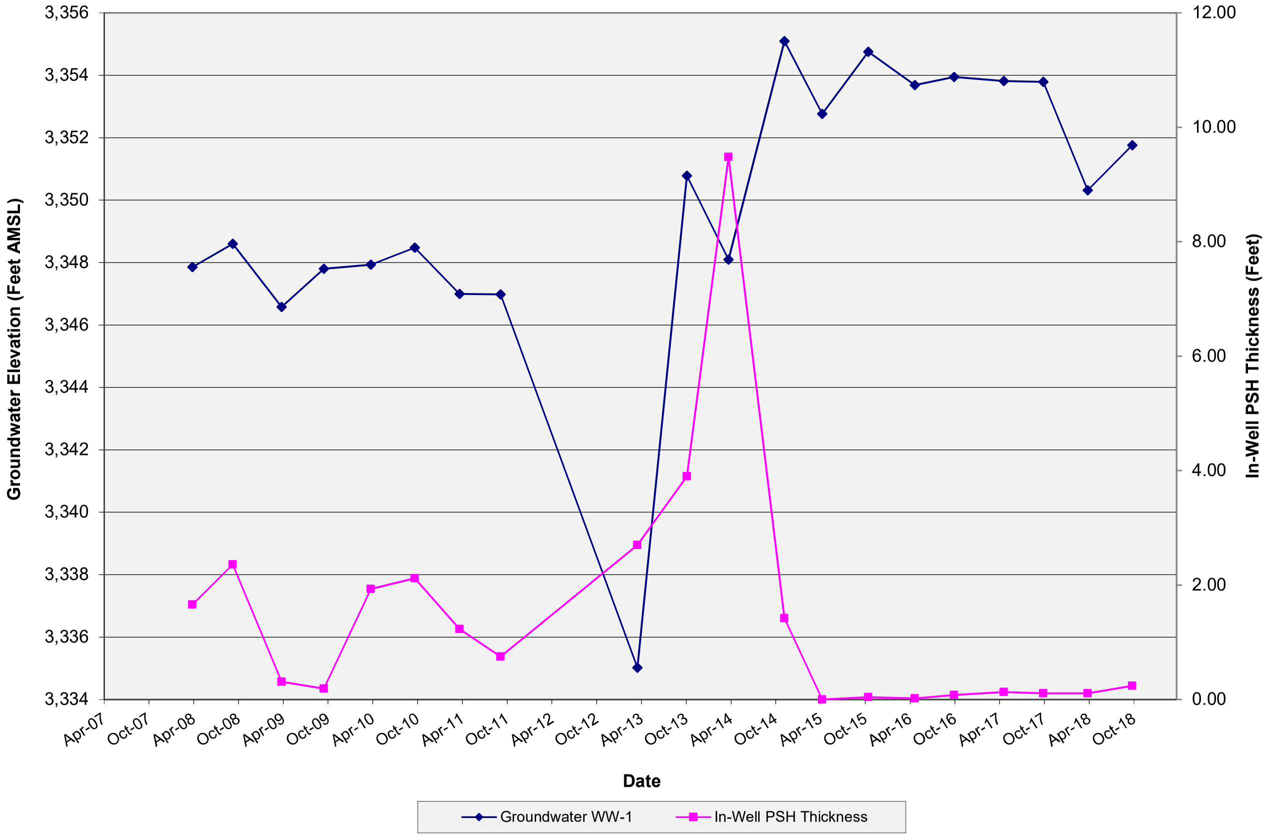
RW-2: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



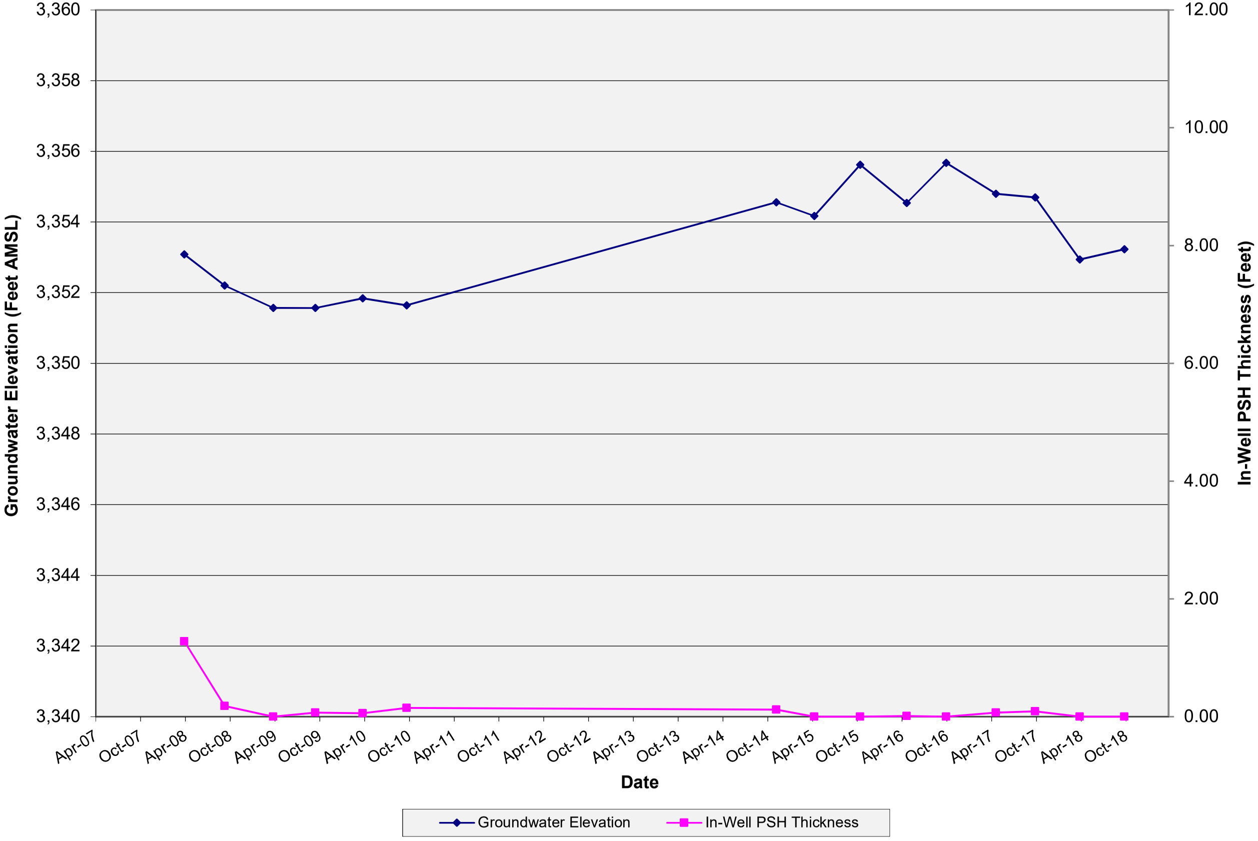
RW-5 & RW-5R: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
South Refinery Area



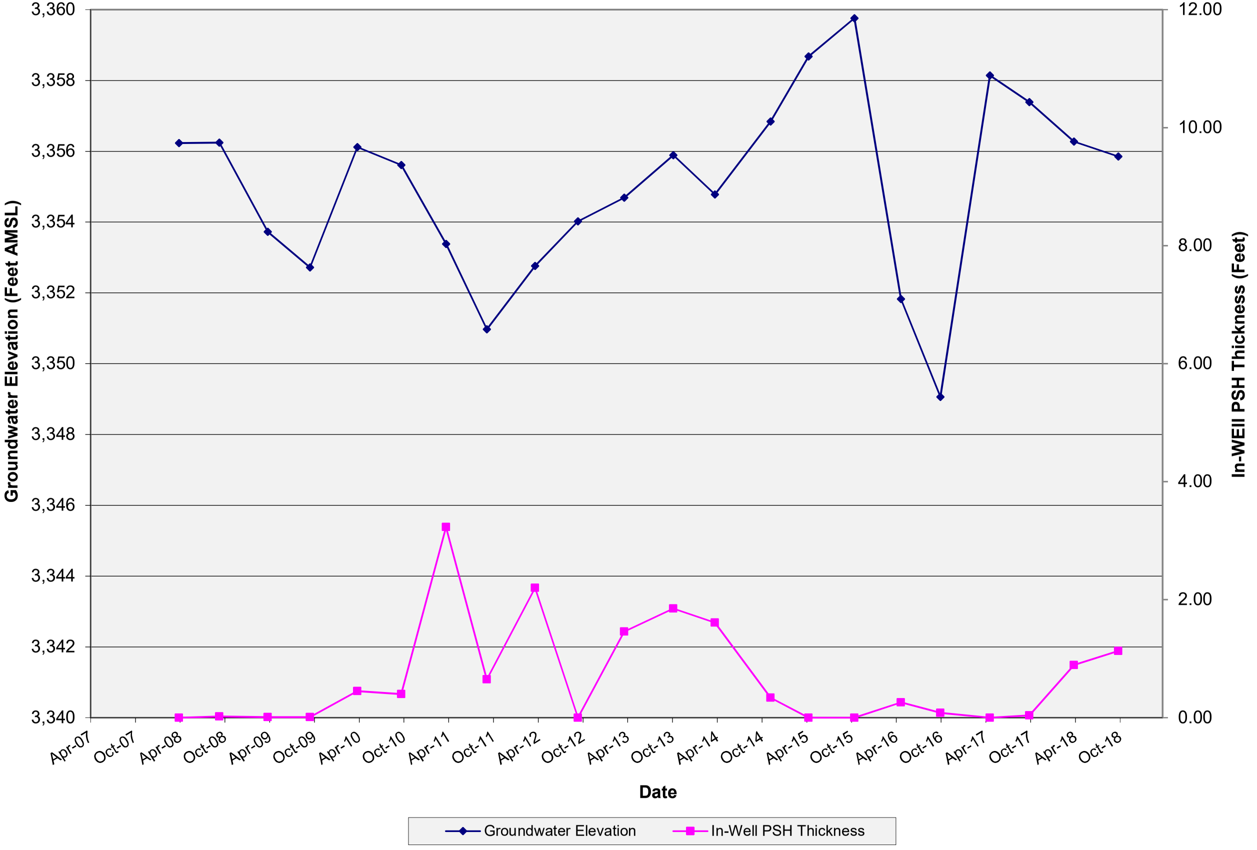
RW-6: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
South Refinery Area



RW-8: Groundwater Elevations and In-Well PSH Thicknesses

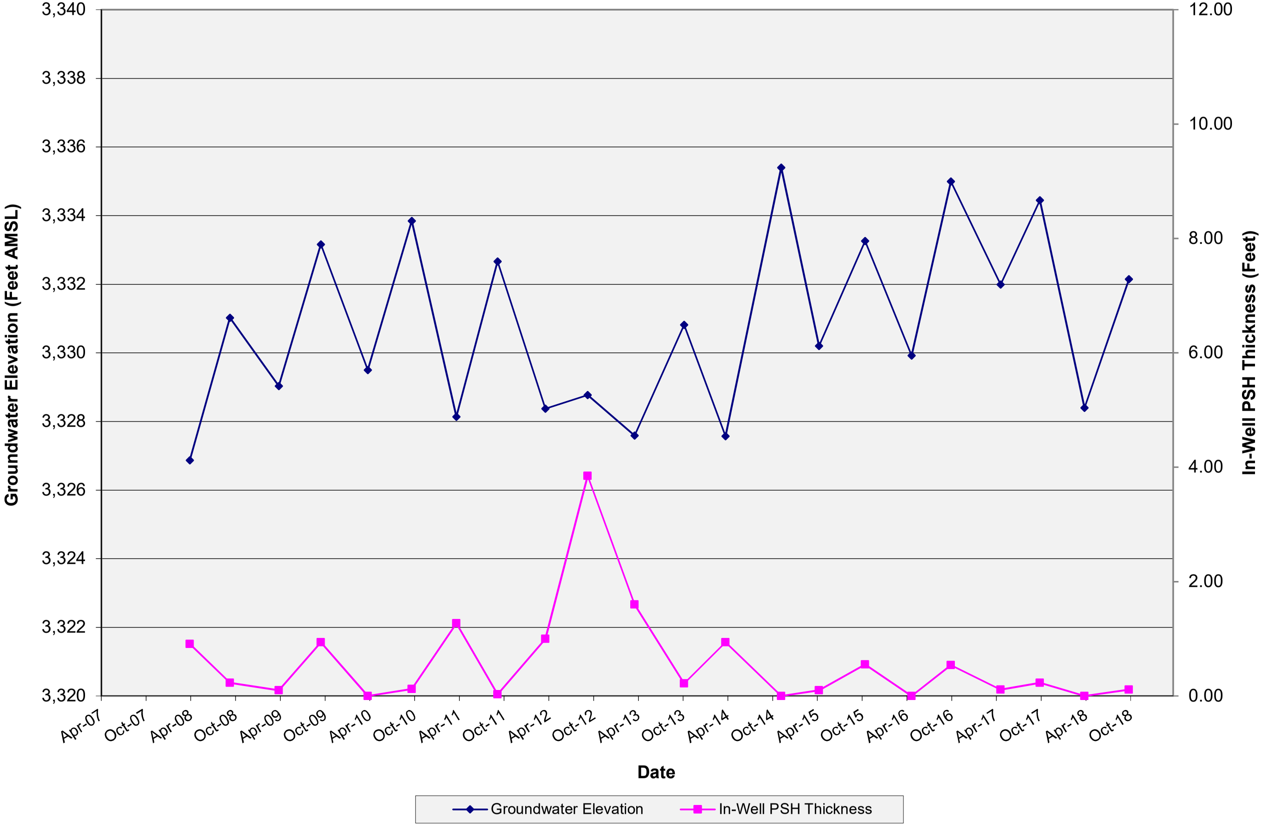
HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



RW-13 & RW-13R: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery

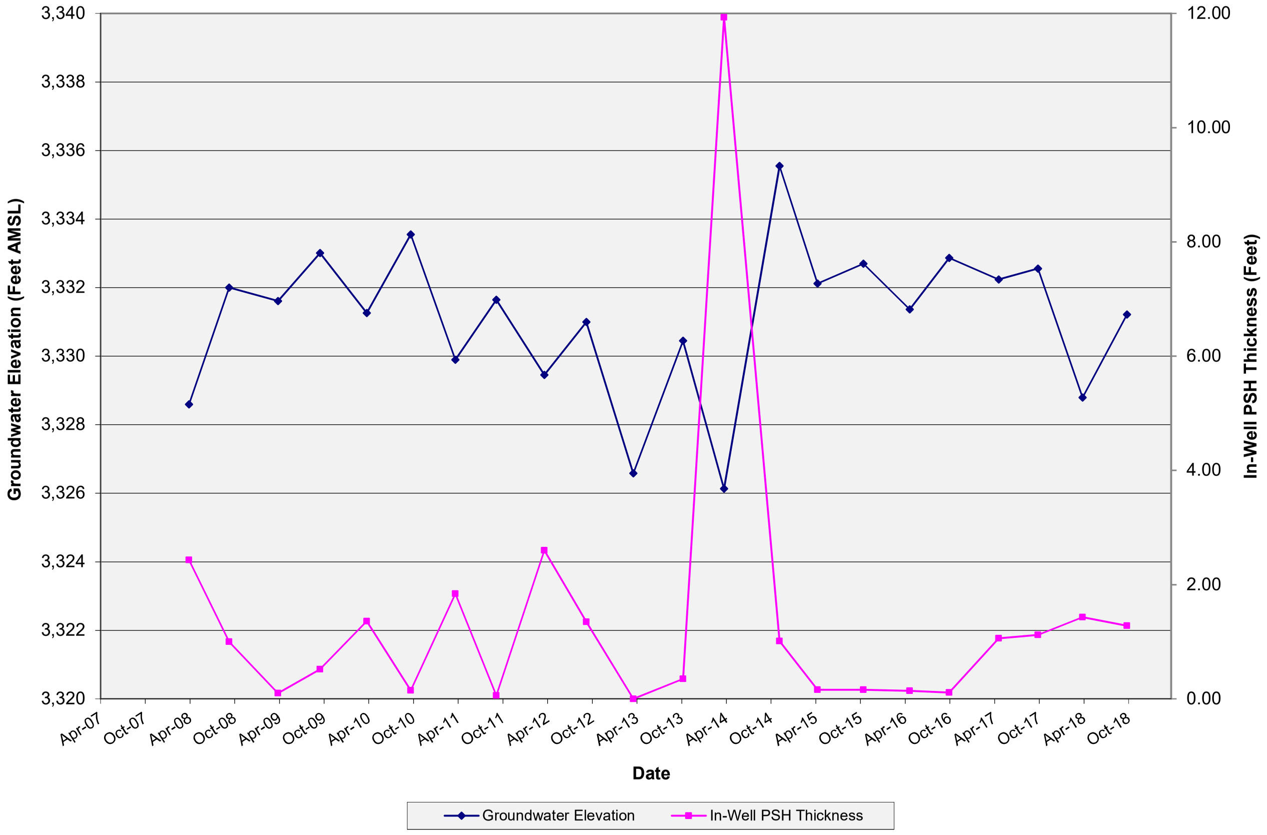
Field East of Refinery



RW-14 & RW-14R: Groundwater Elevations and In-Well PSH Thicknesses

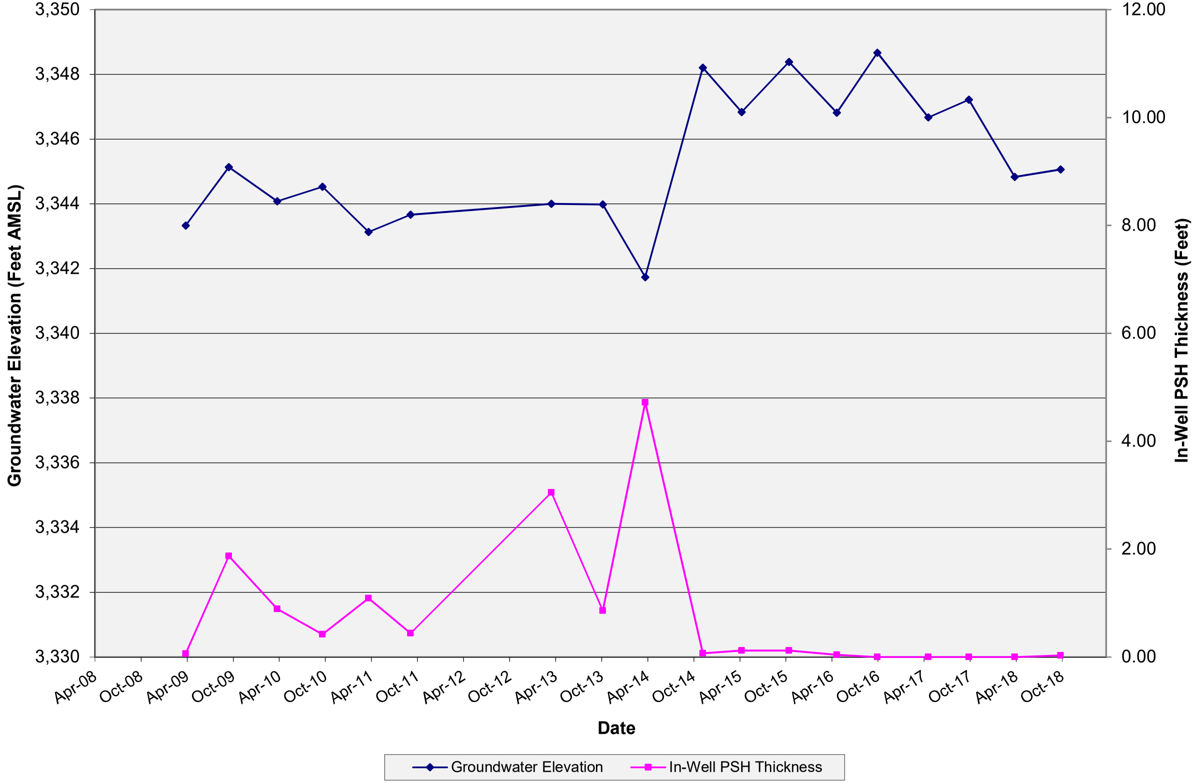
HollyFrontier Navajo Refining LLC - Artesia Refinery

Field East of Refinery



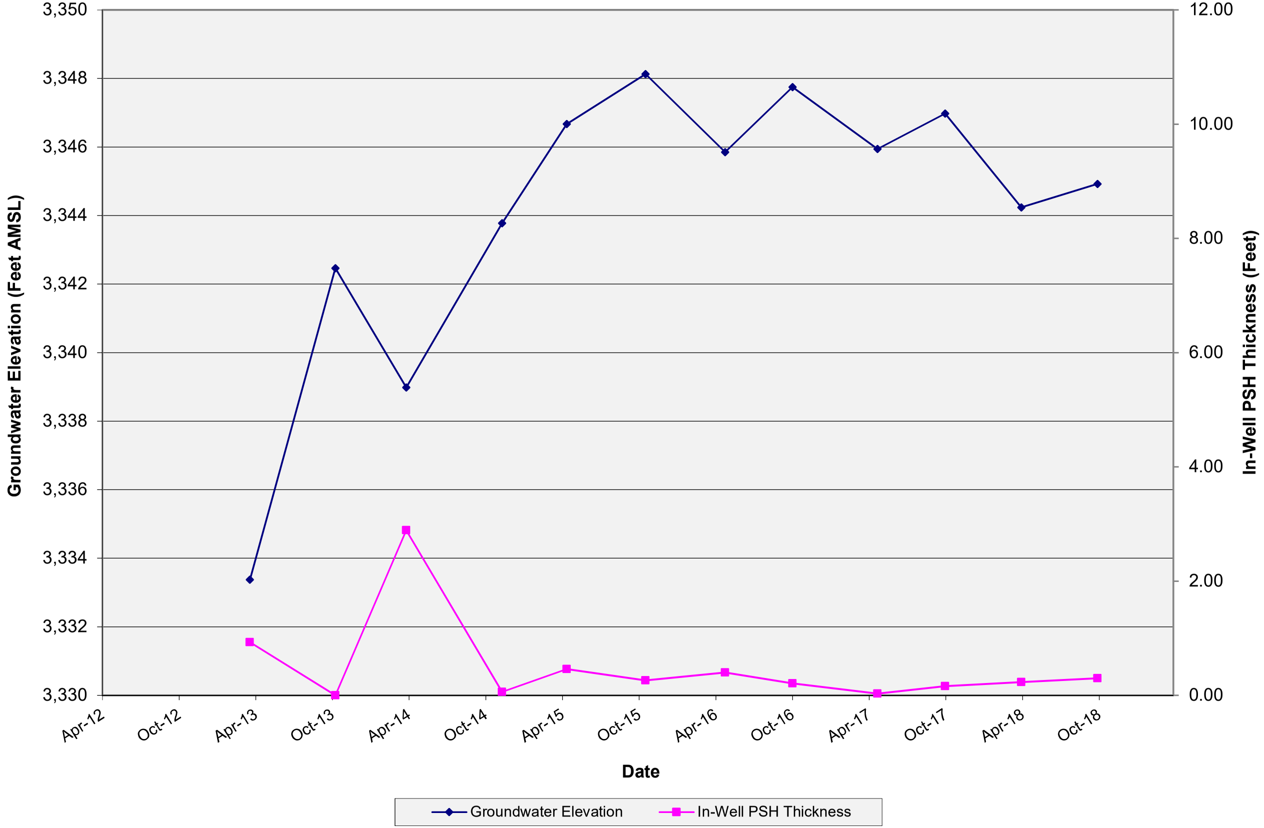
RW-15C: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
South Refinery Area



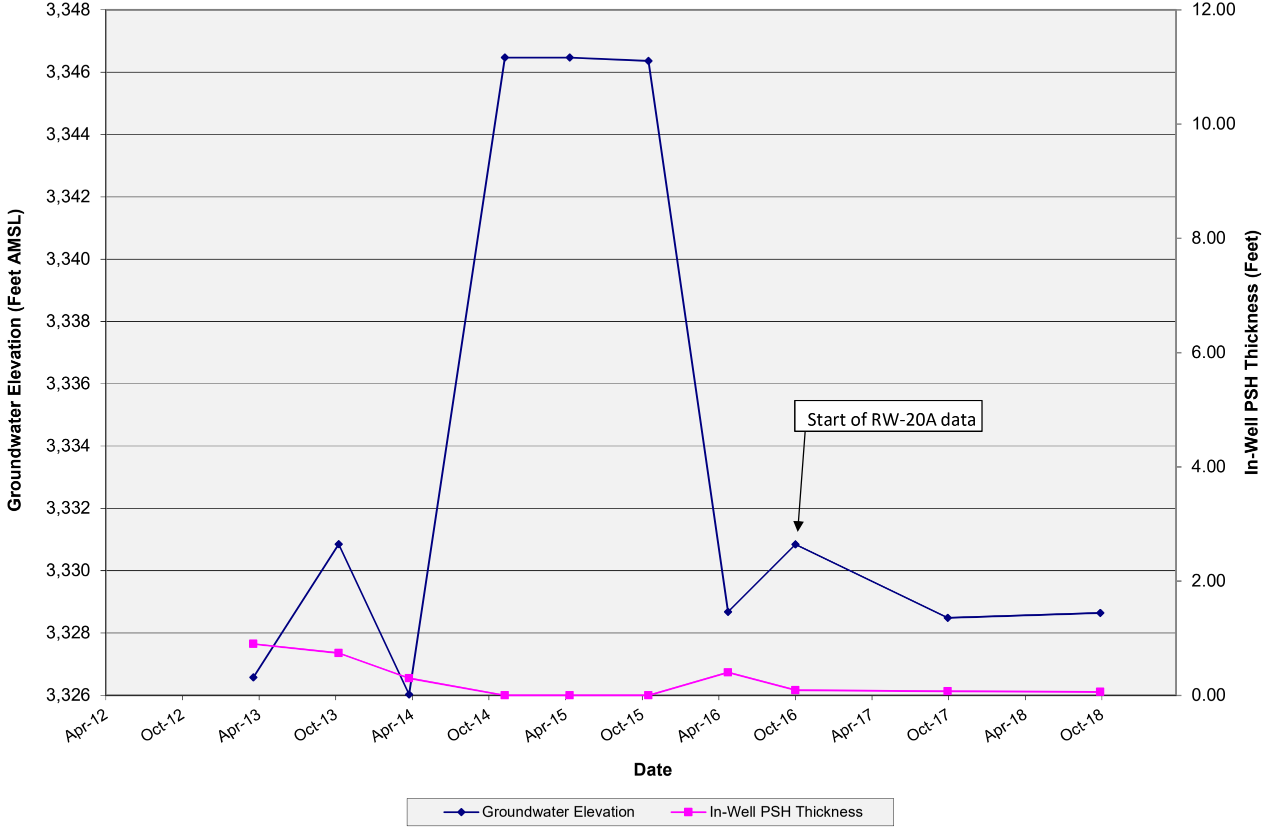
RW-19: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
South Refinery Area



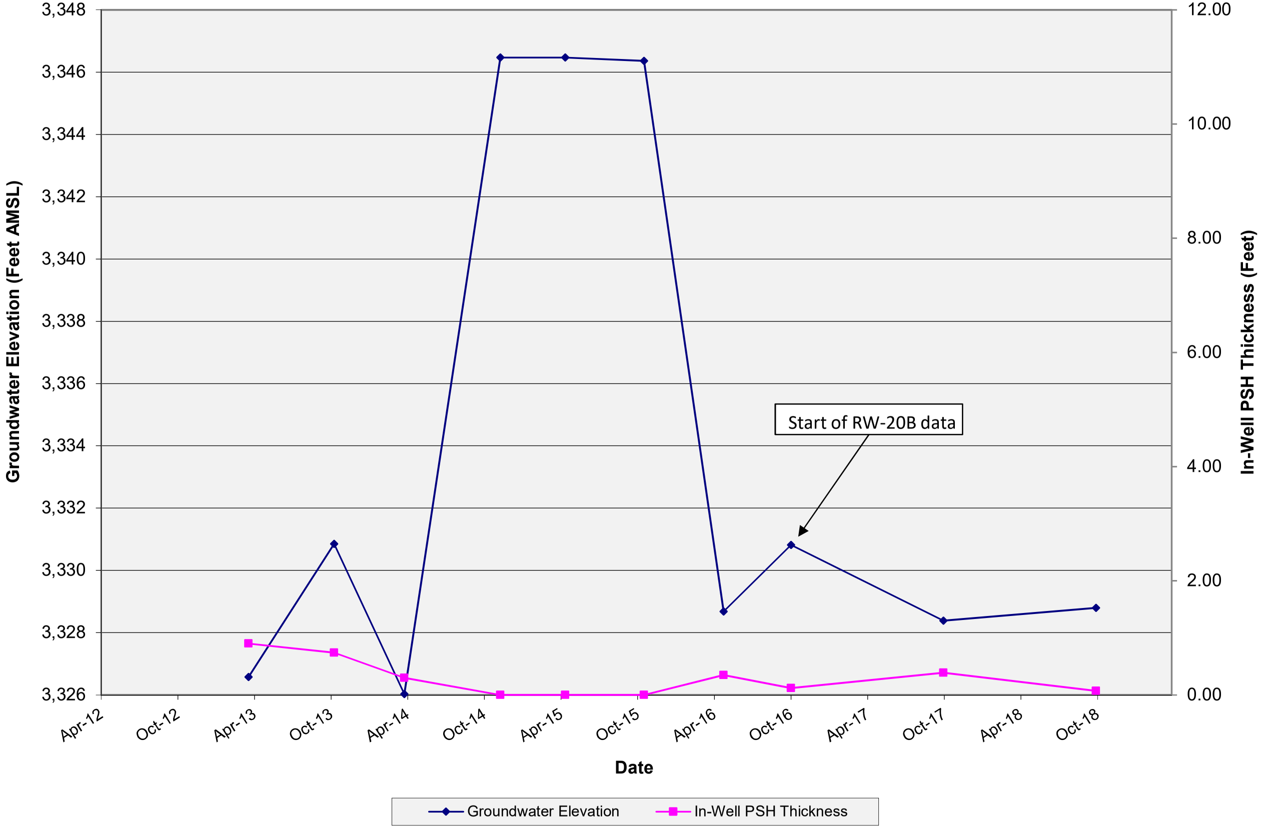
RW-20 & RW-20A: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



RW-20 & RW-20B: Groundwater Elevations and In-Well PSH Thicknesses

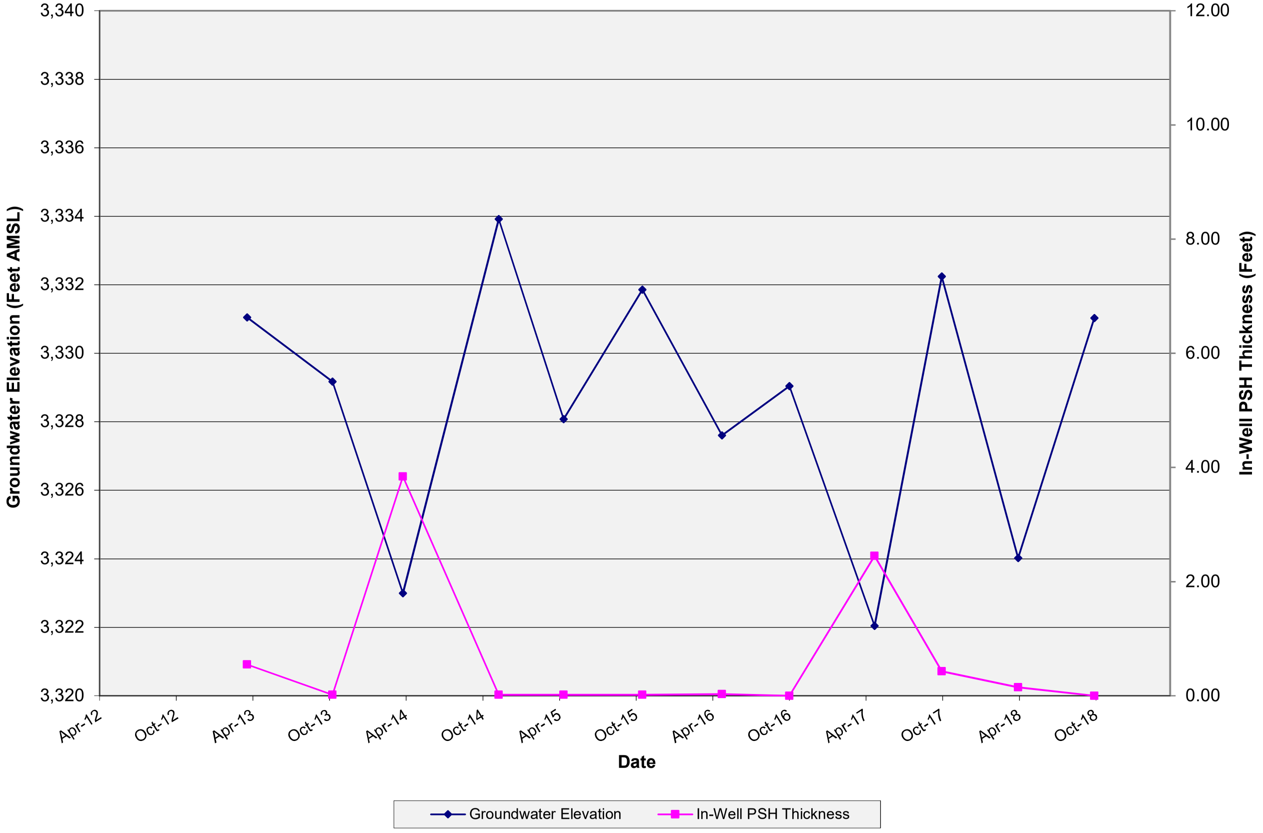
HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



RW-22: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery

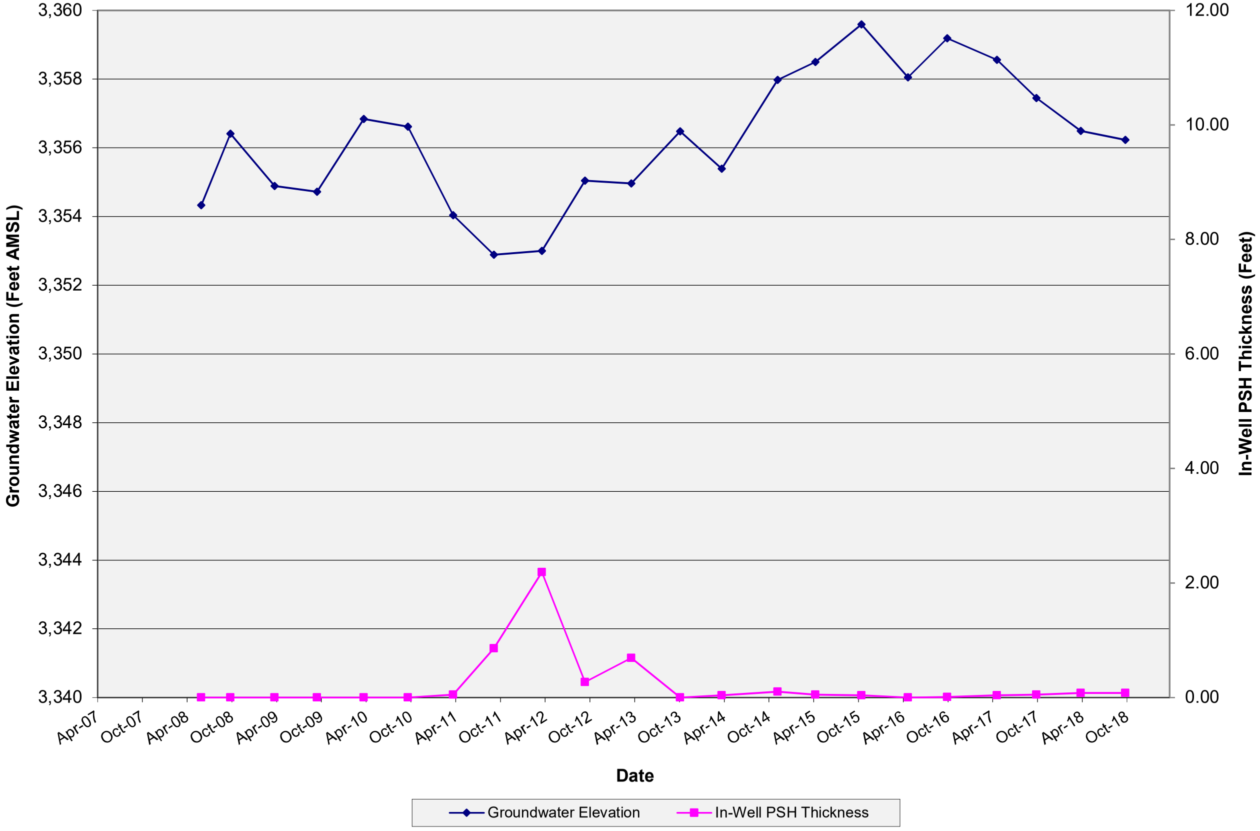
Field East of Refinery



MW-92: Groundwater Elevations and In-Well PSH Thicknesses

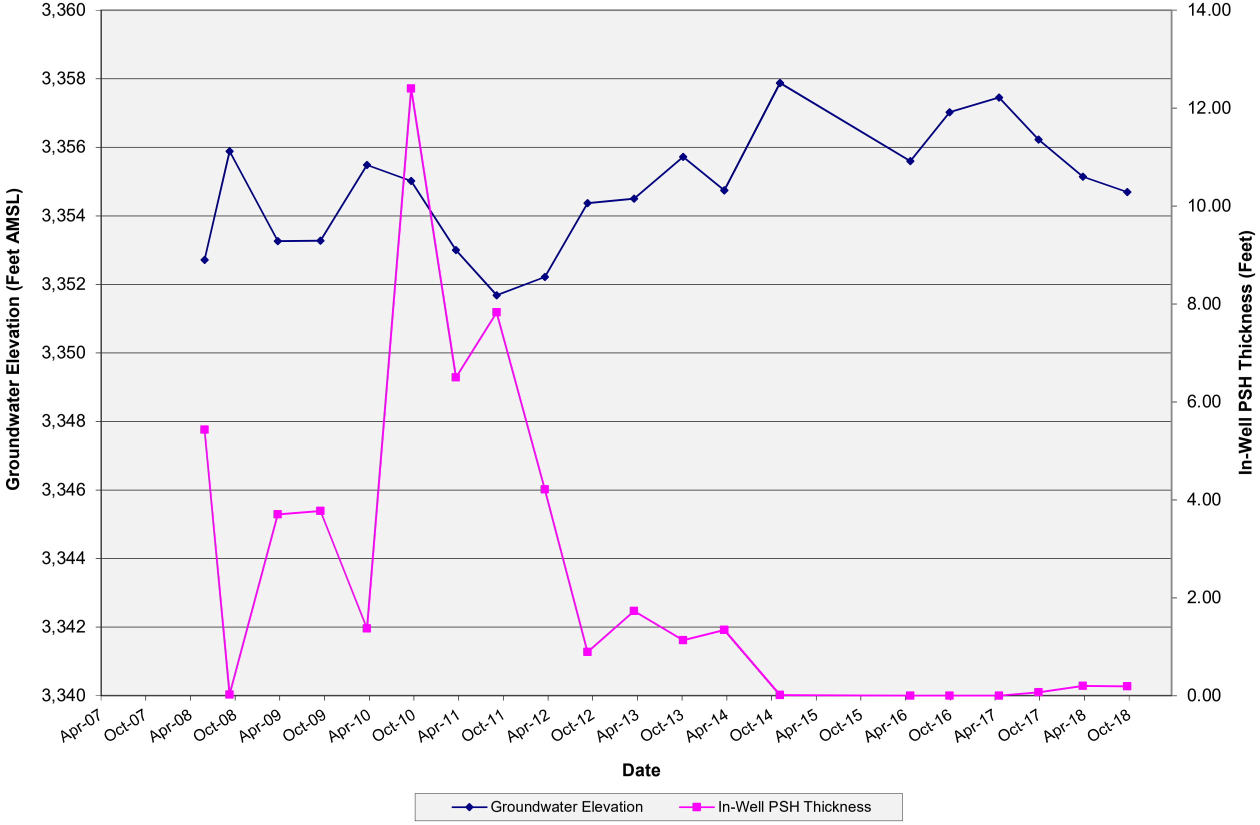
HollyFrontier Navajo Refining LLC - Artesia Refinery

North Refinery Area



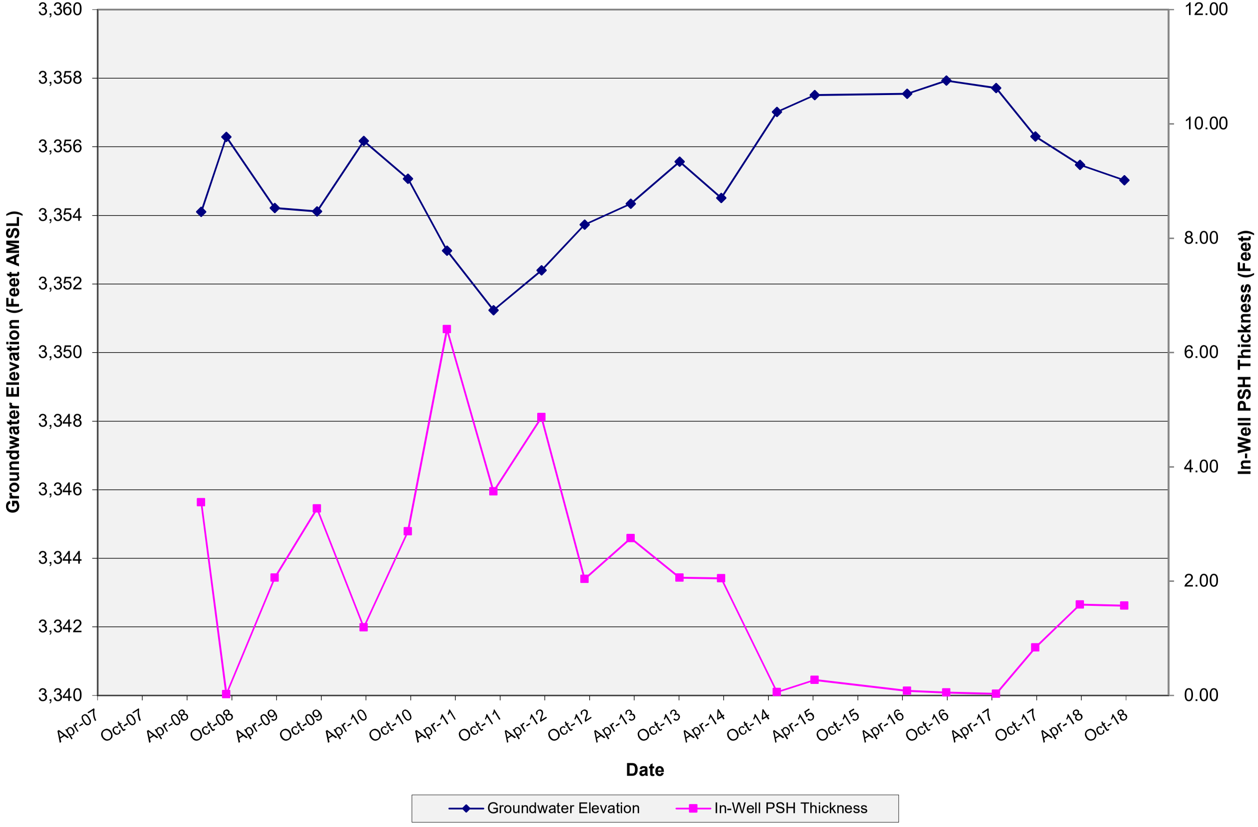
MW-94: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



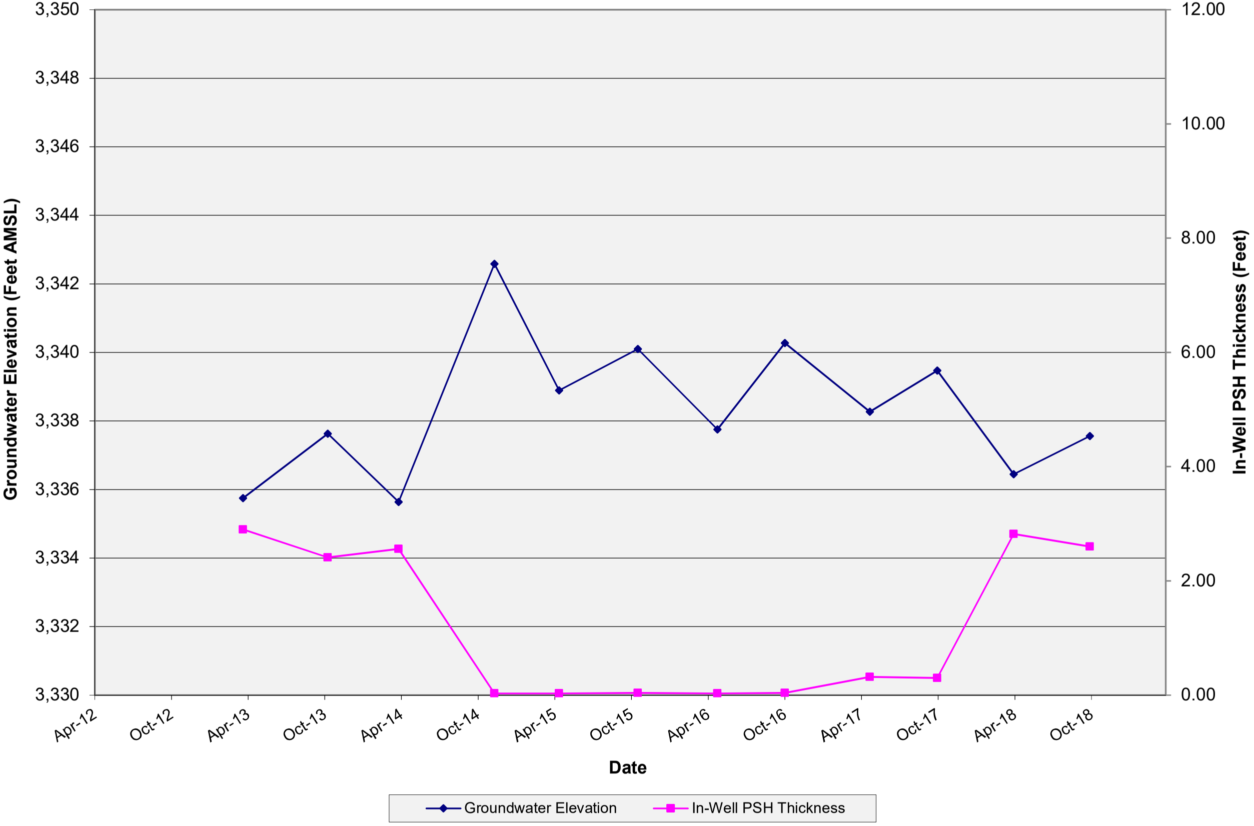
MW-97: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



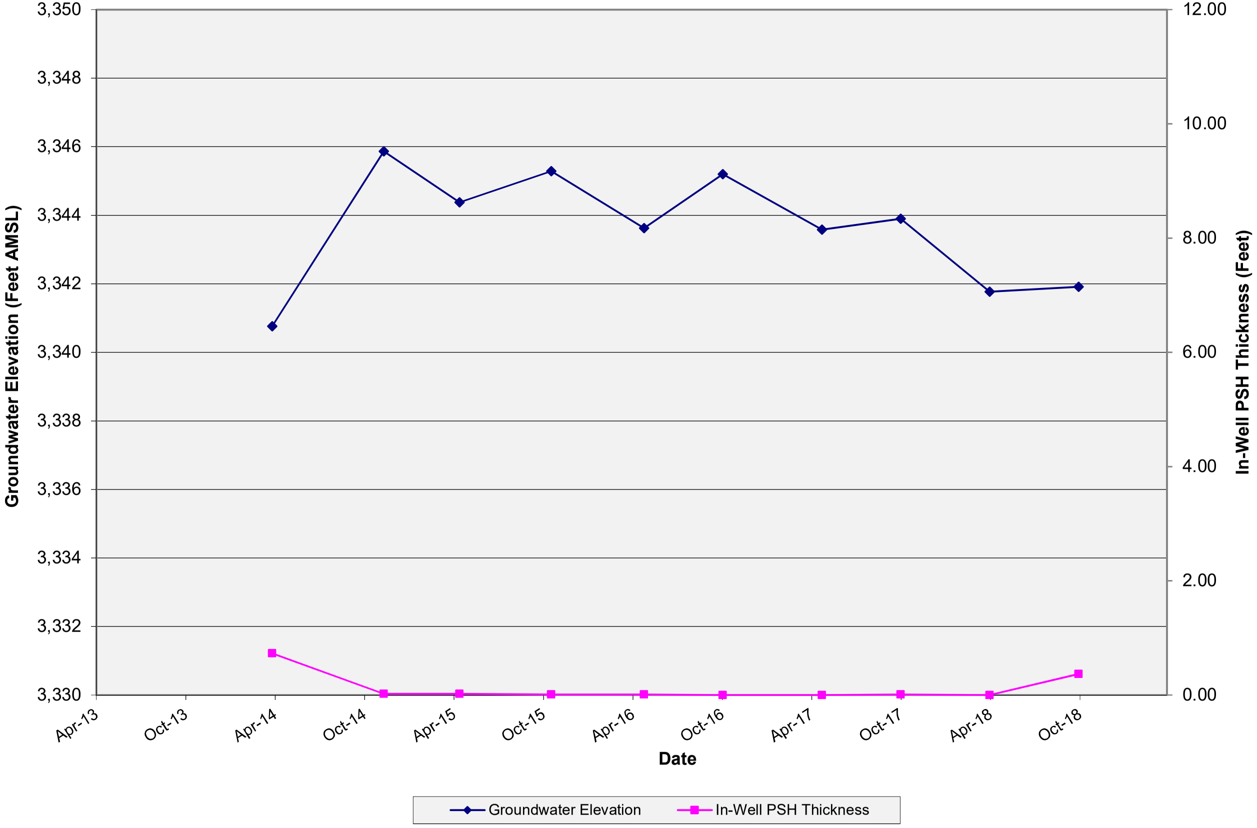
MW-112: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



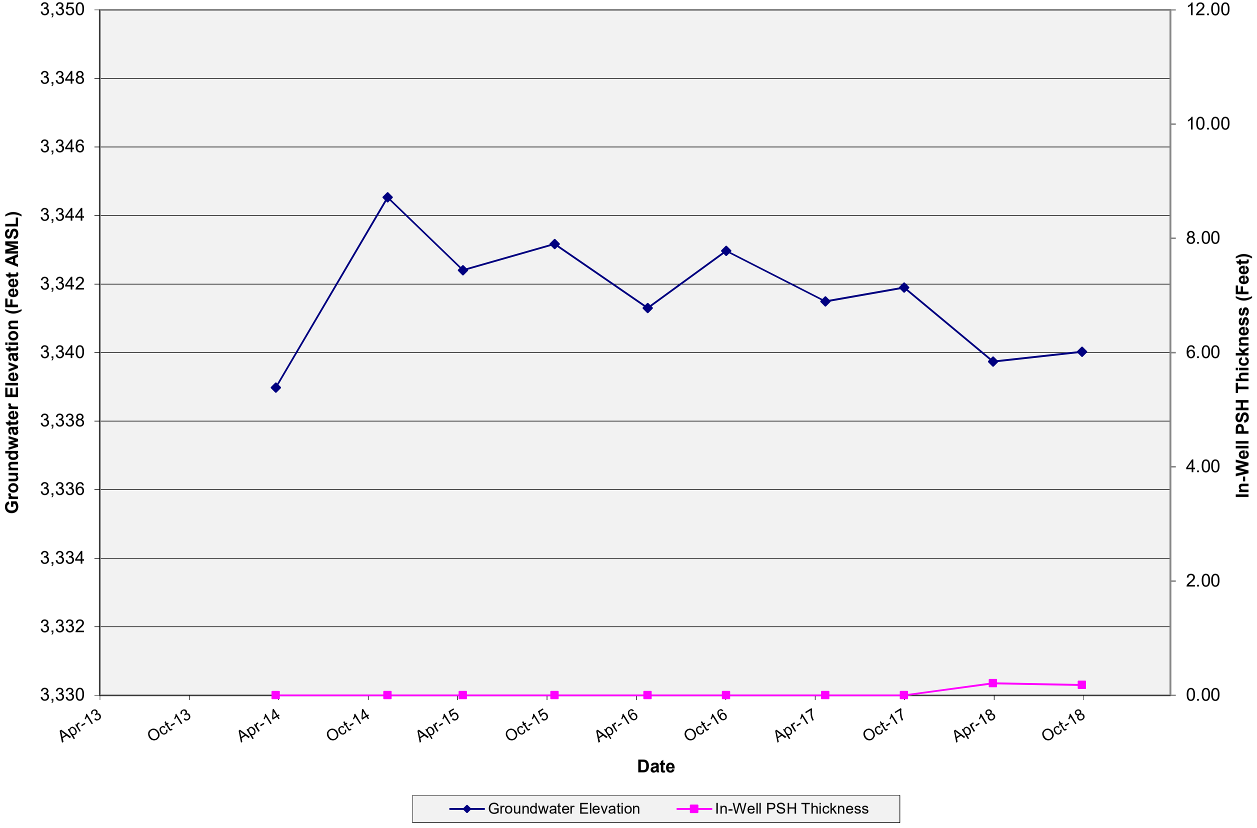
MW-129: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



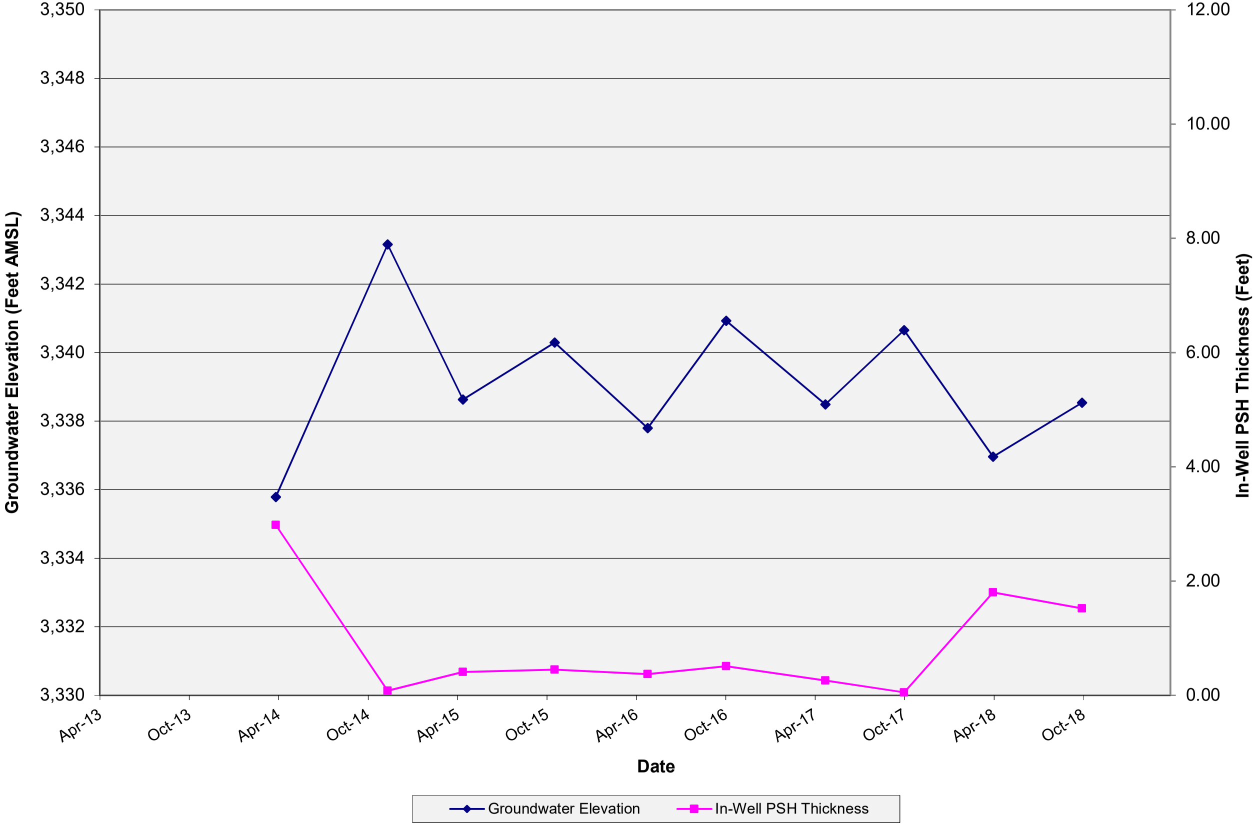
MW-131: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



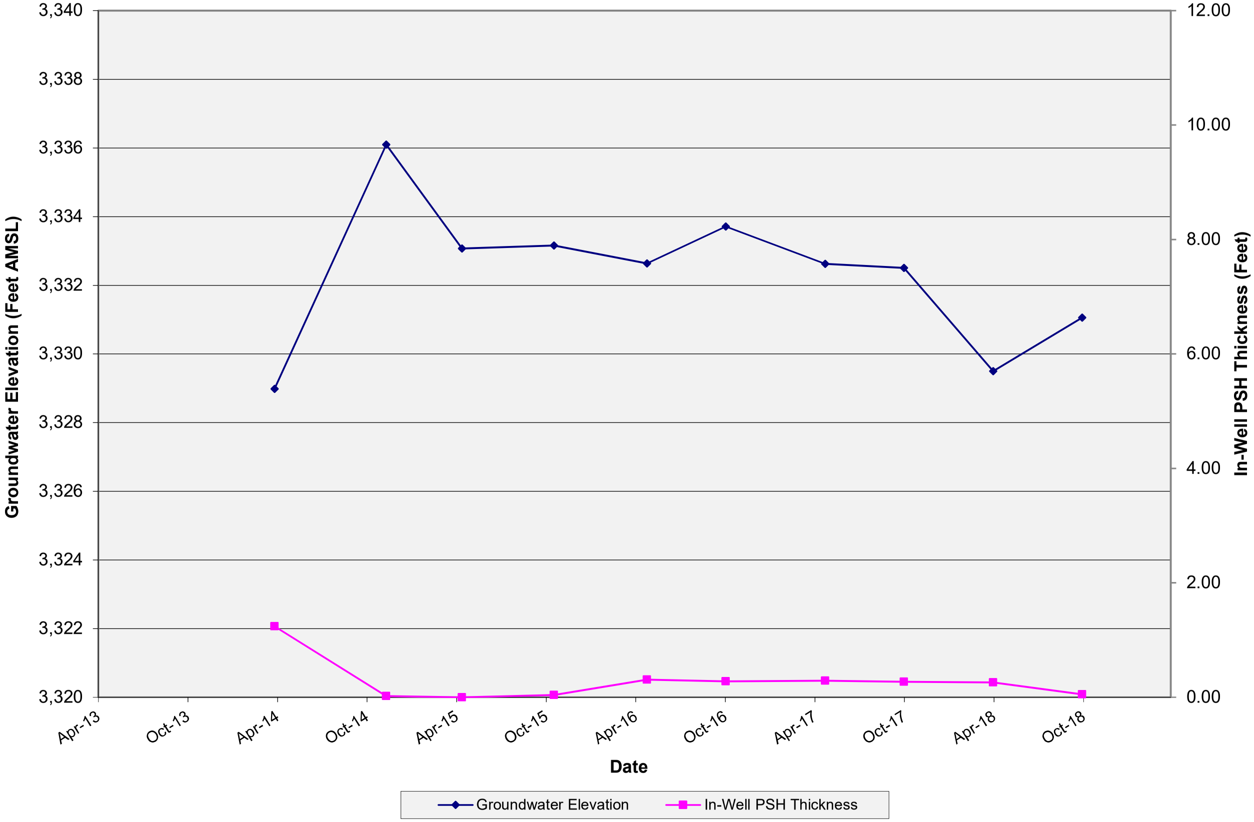
MW-132: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



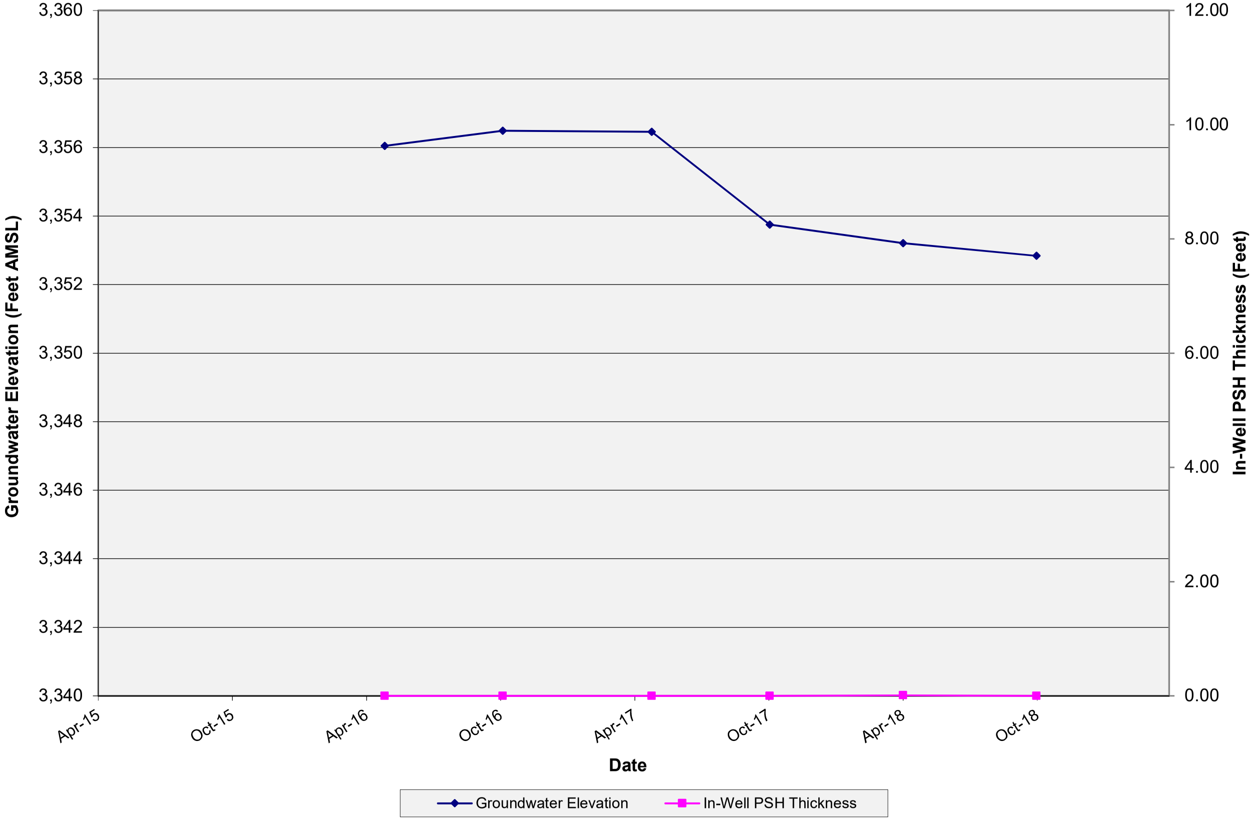
MW-133: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
Field East of Refinery



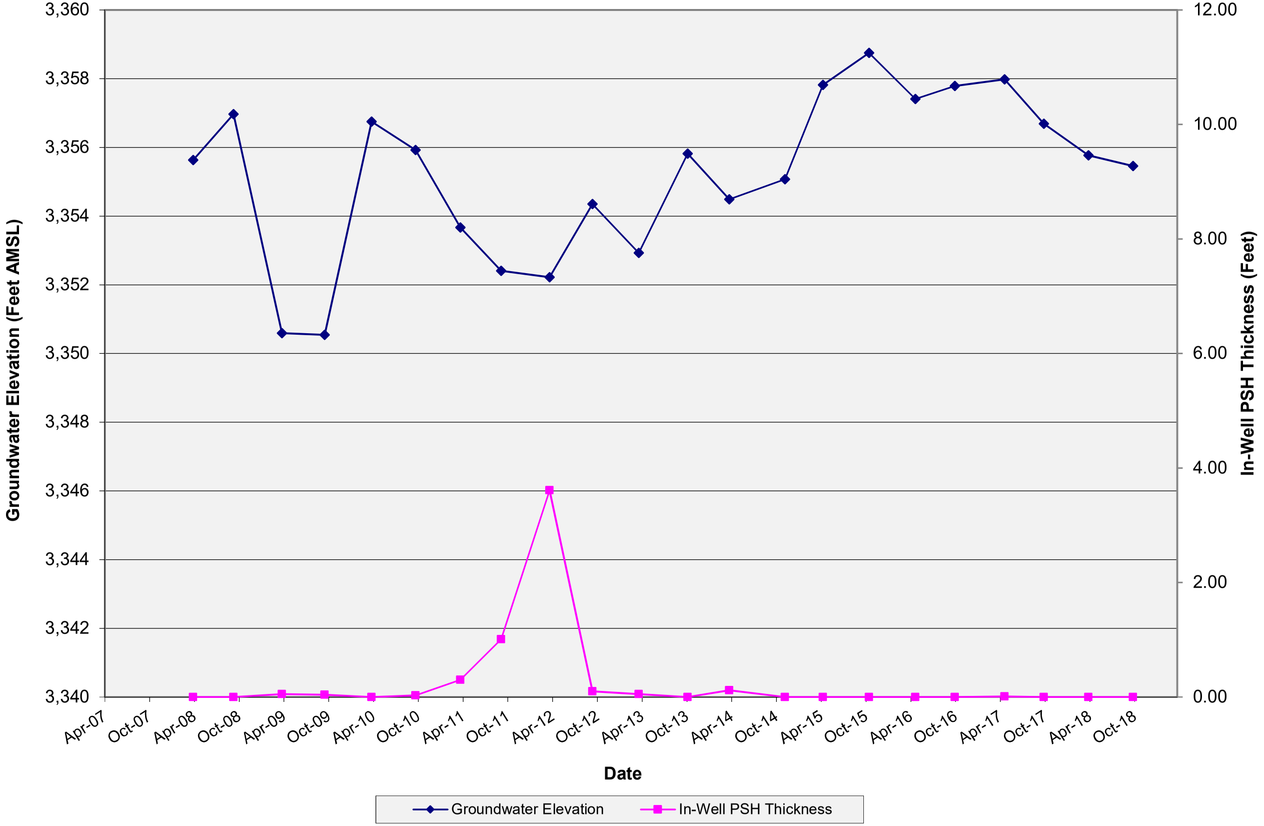
MW-138: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



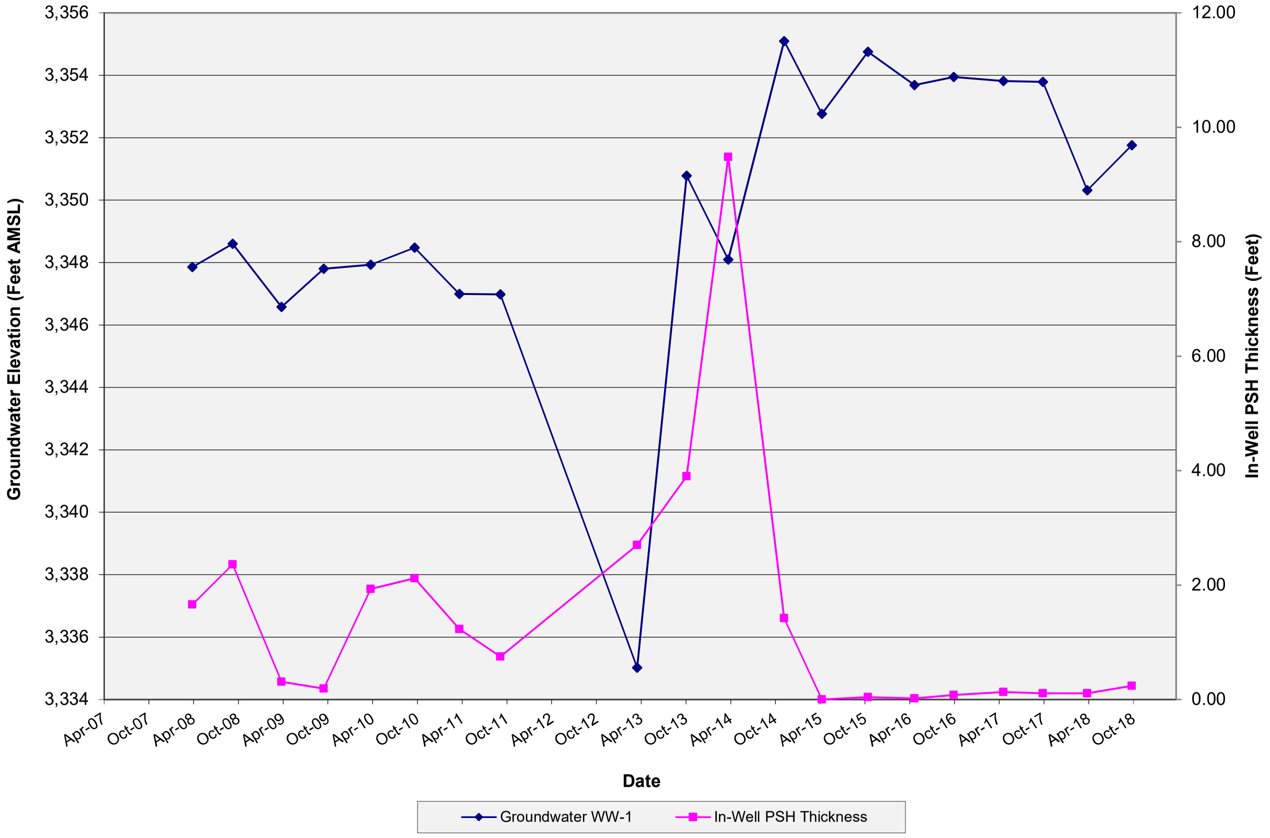
RW-2: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



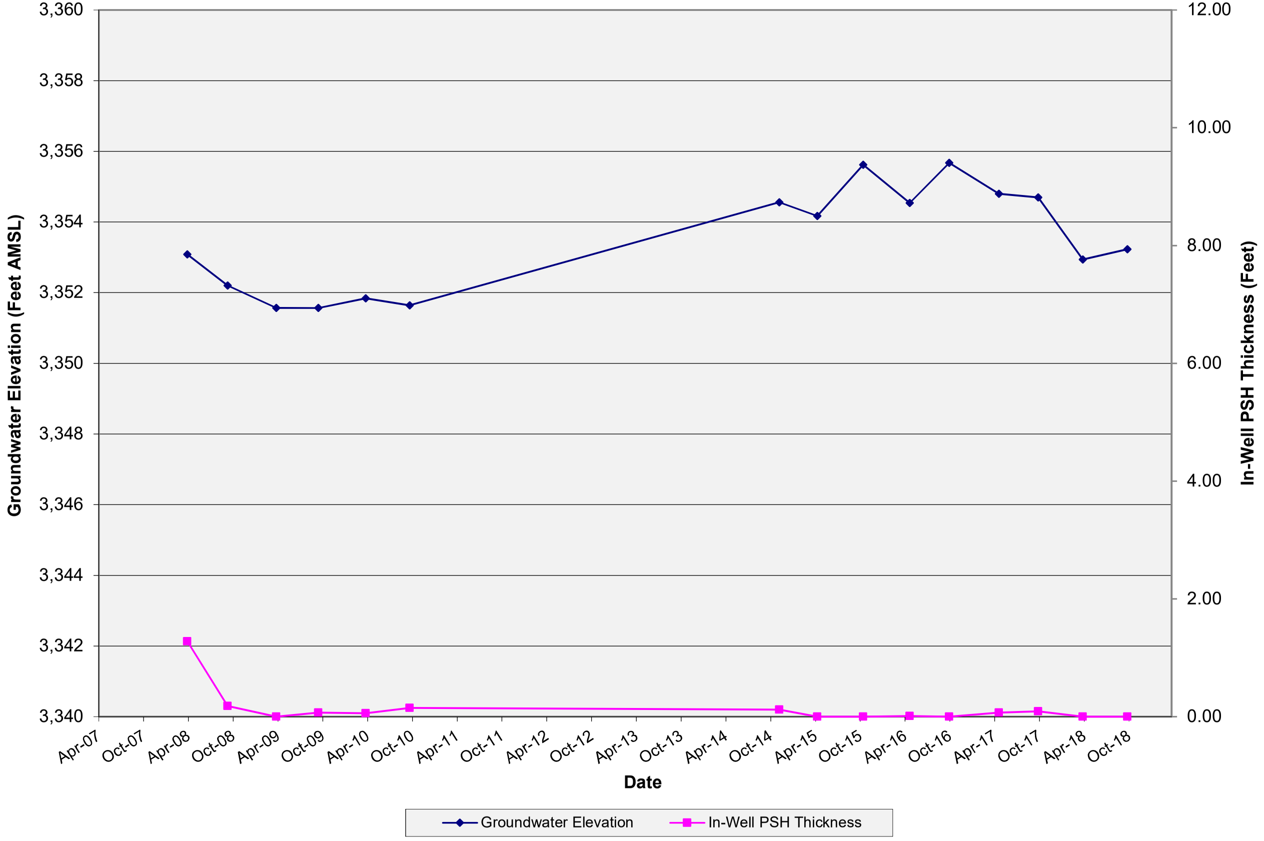
RW-5 & RW-5R: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
South Refinery Area



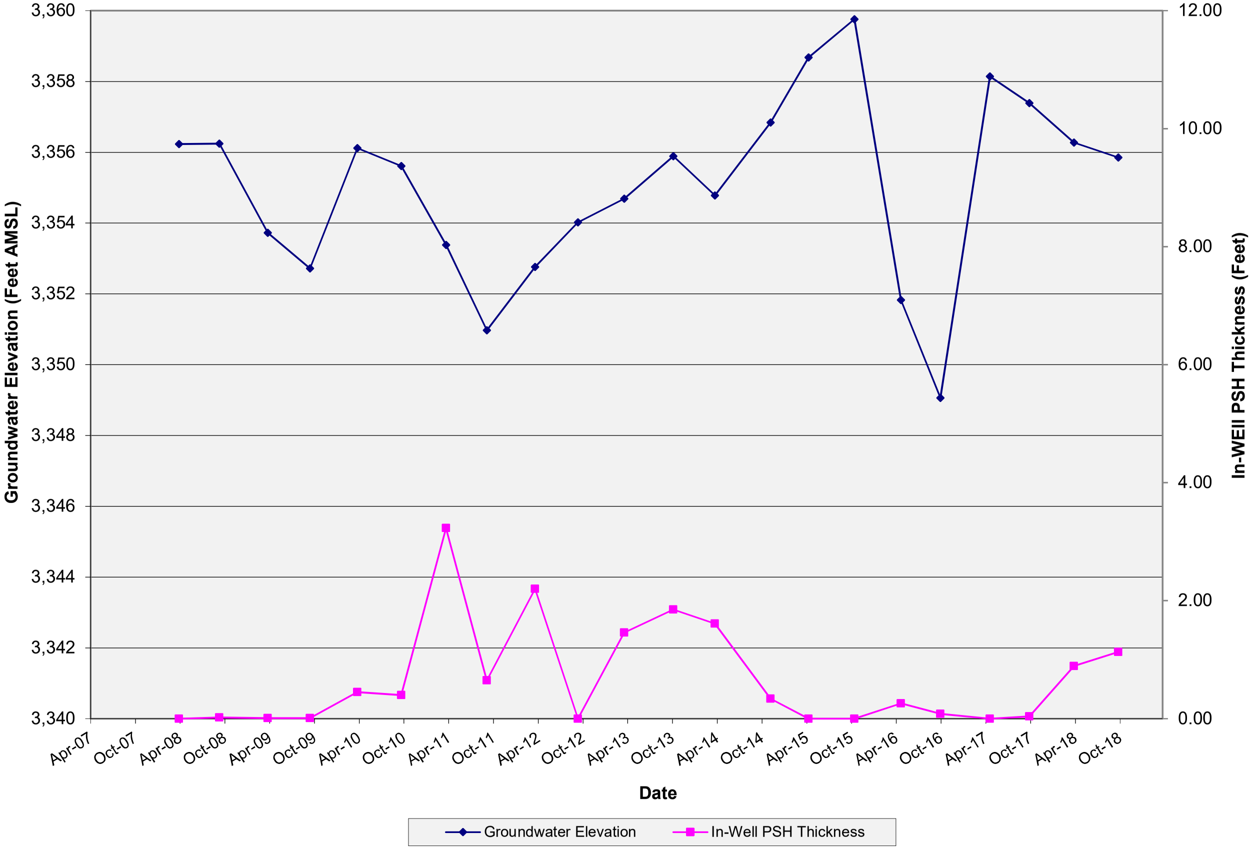
RW-6: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
South Refinery Area



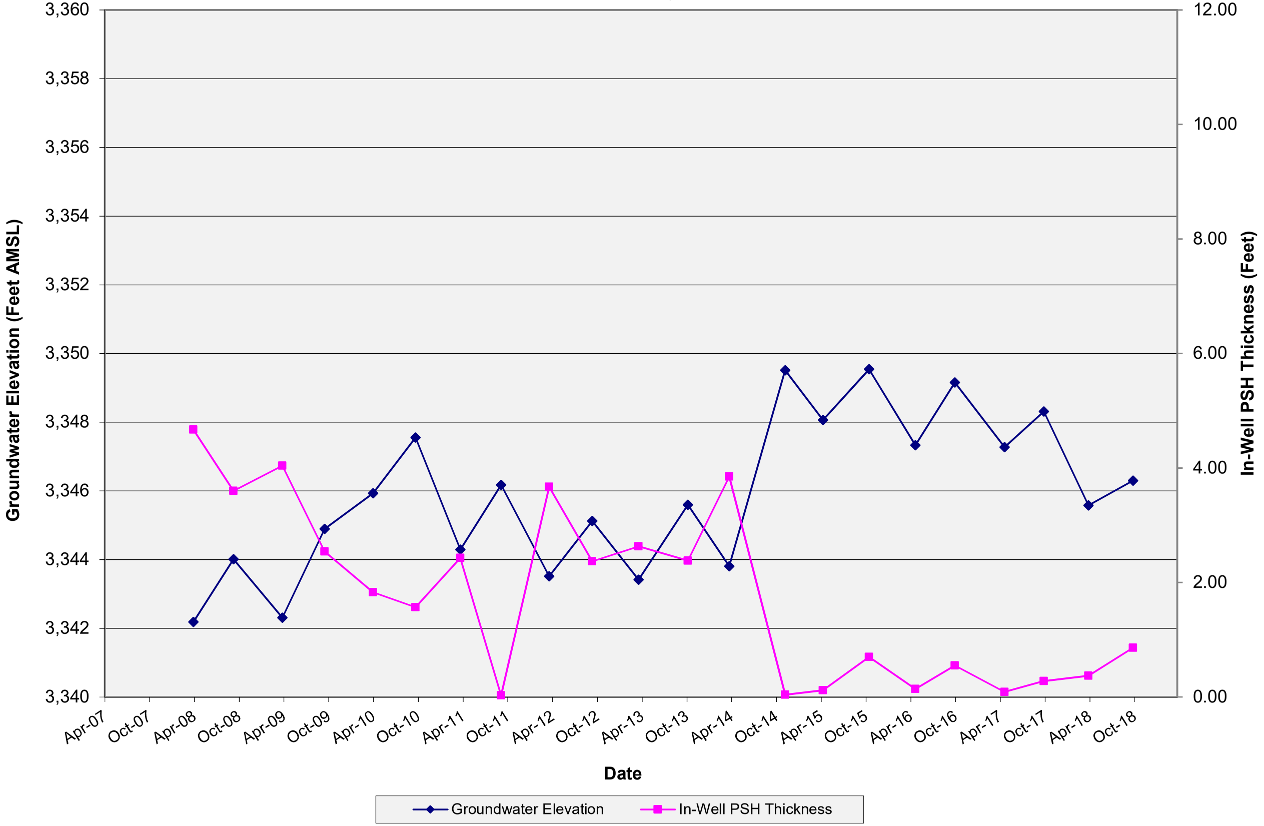
RW-8: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
North Refinery Area



KWB-4: Groundwater Elevations and In-Well PSH Thicknesses

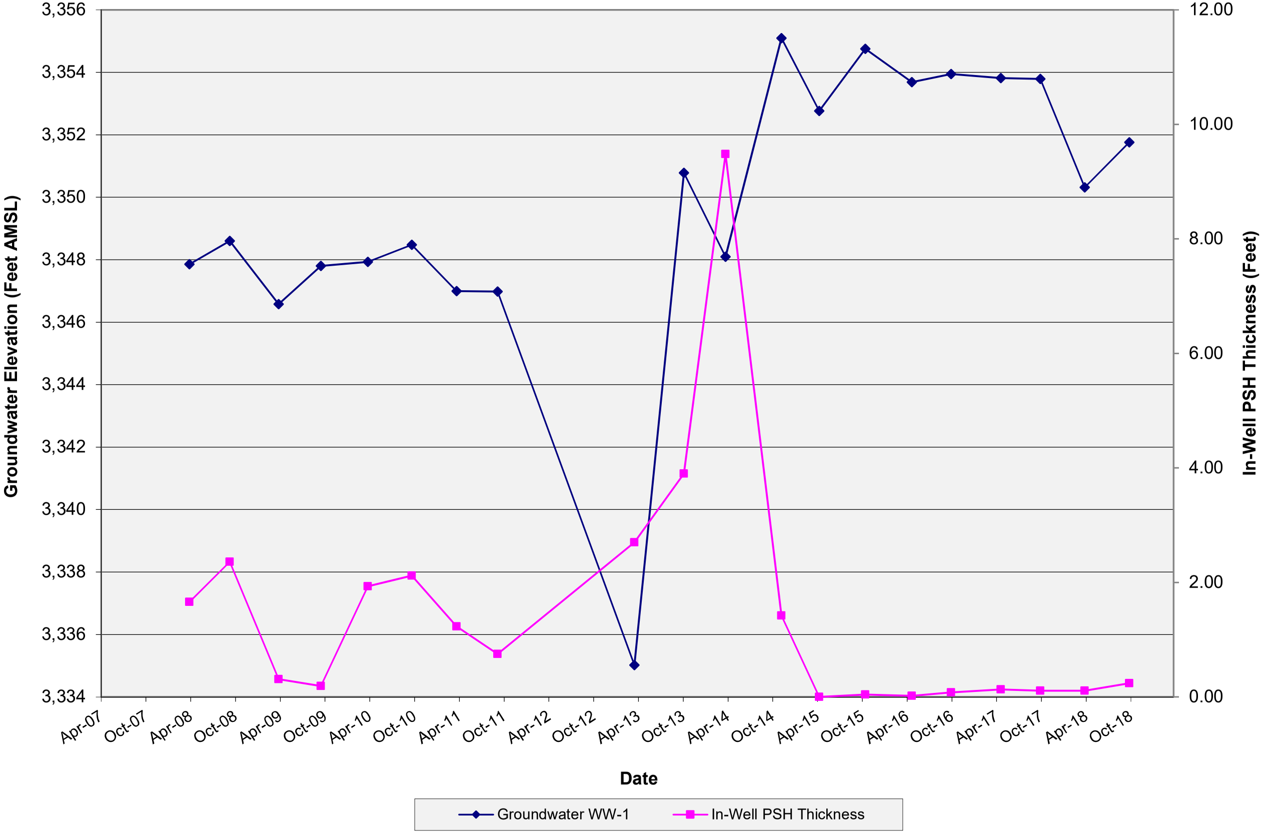
HollyFrontier Navajo Refining LLC - Artesia Refinery
South Refinery Area



RW-5 & RW-5R: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery

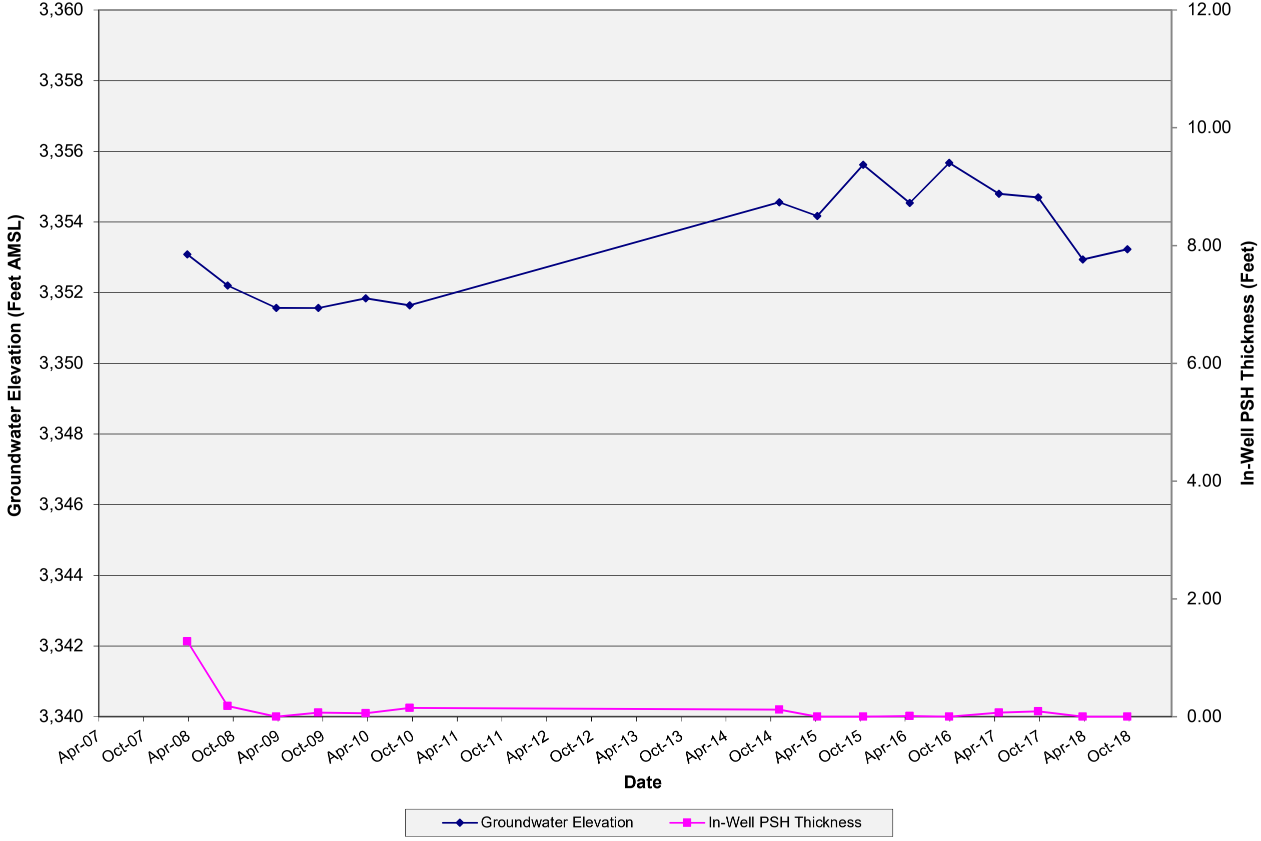
South Refinery Area



RW-6: Groundwater Elevations and In-Well PSH Thicknesses

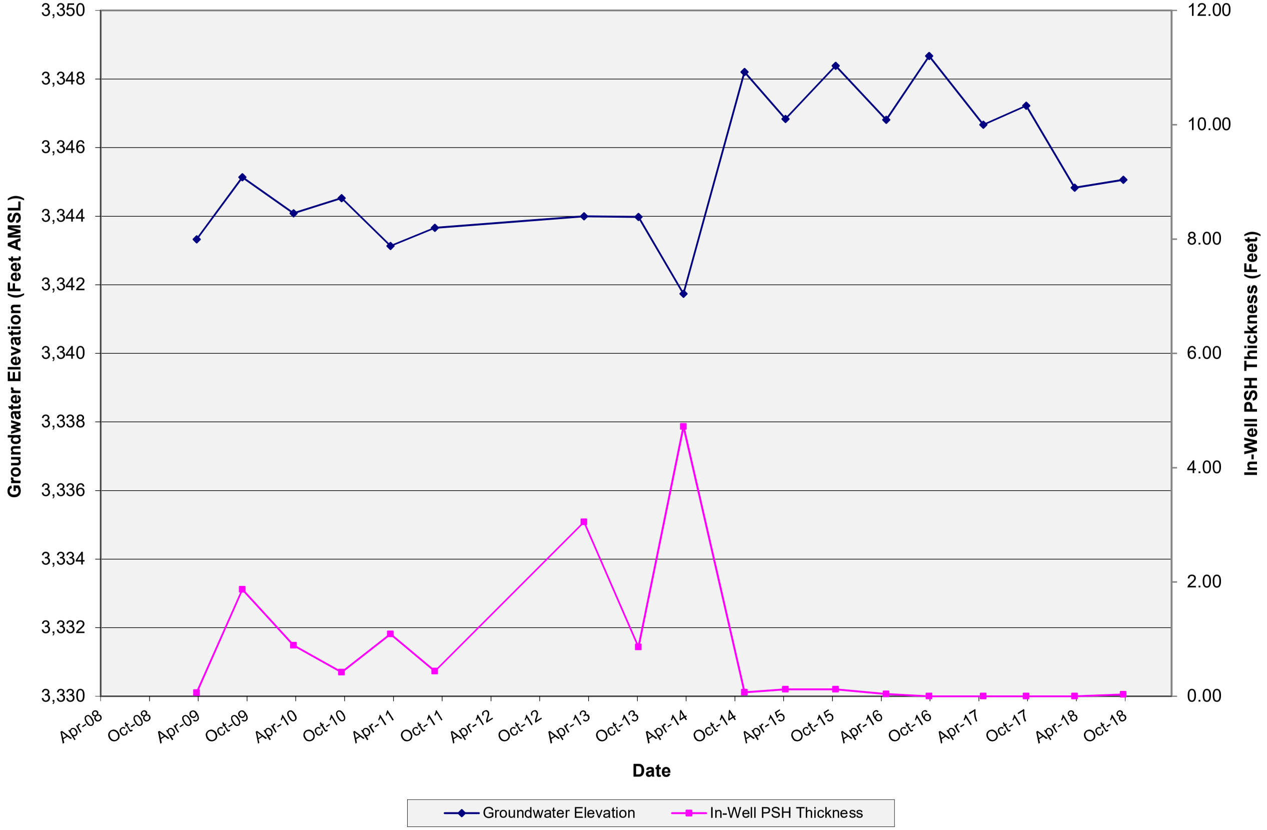
HollyFrontier Navajo Refining LLC - Artesia Refinery

South Refinery Area



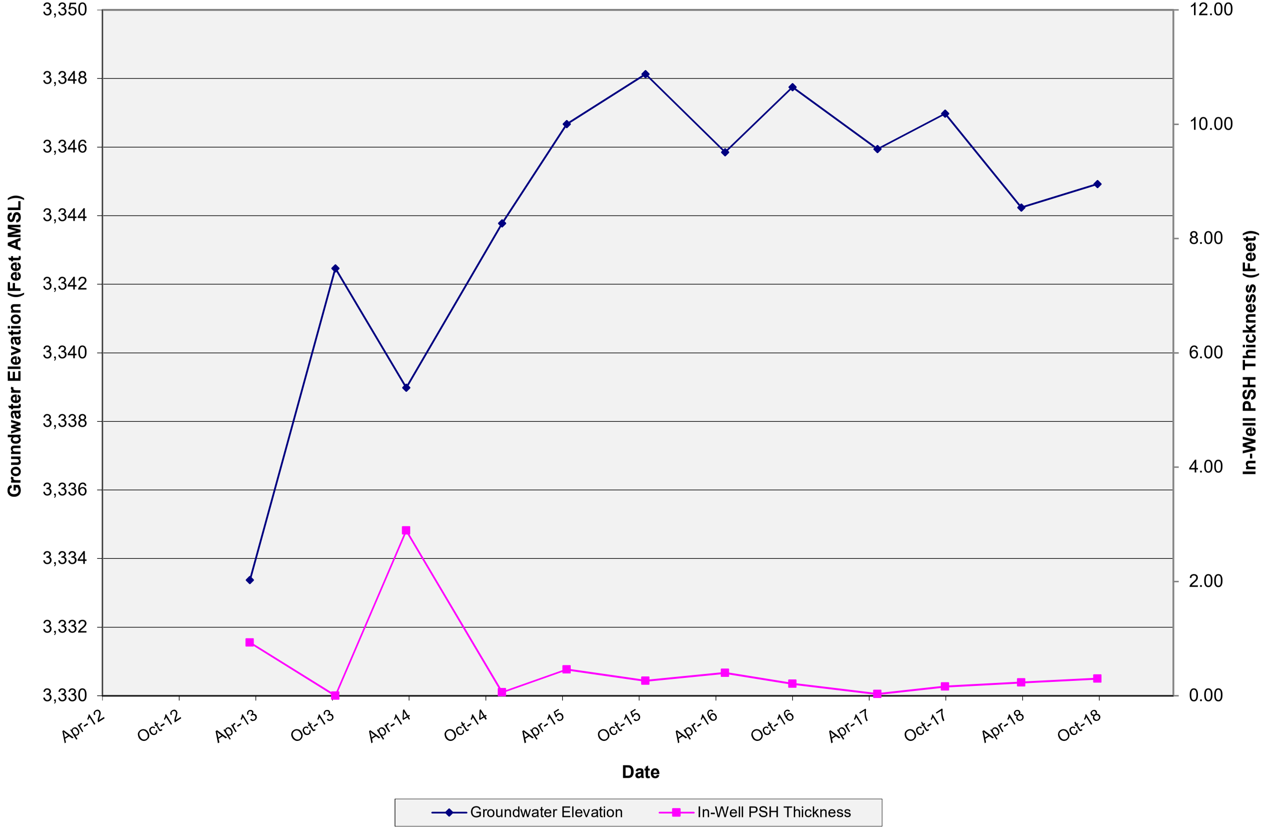
RW-15C: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
South Refinery Area



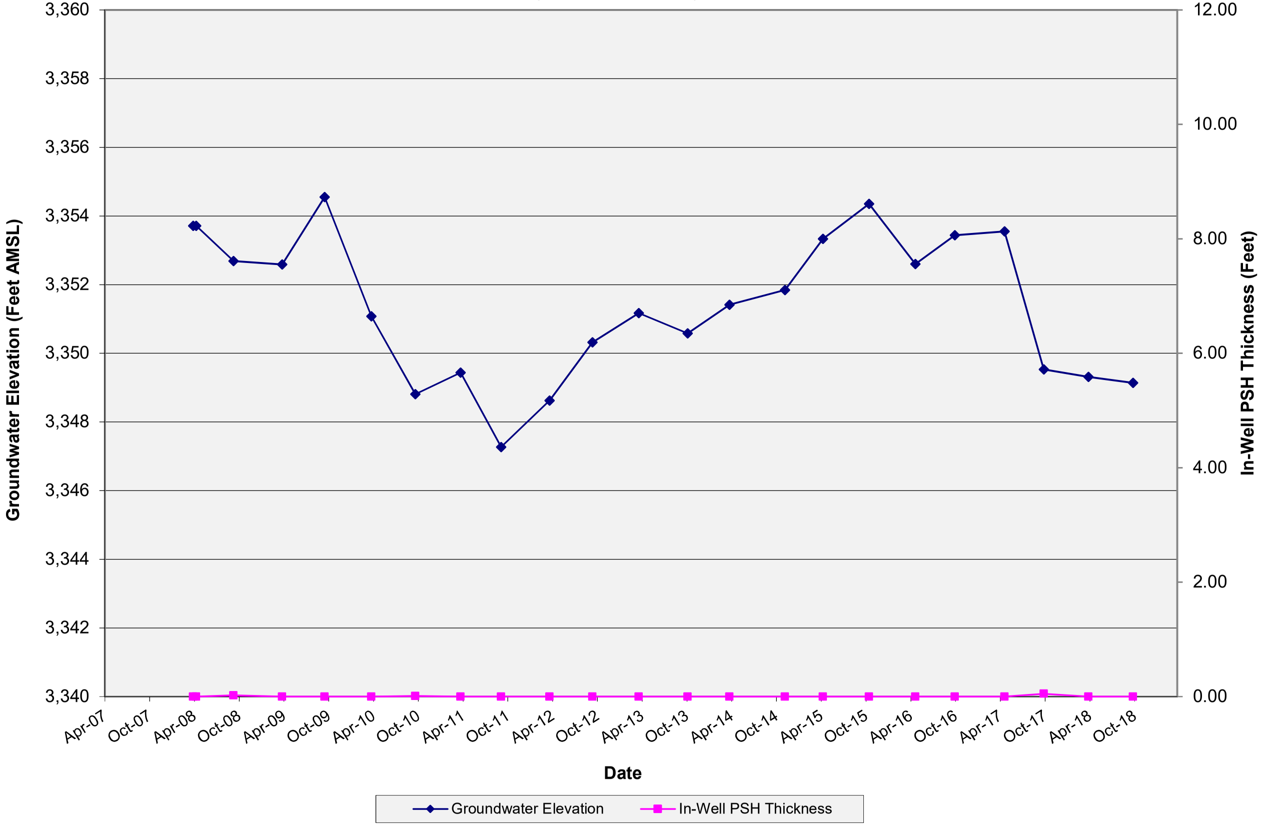
RW-19: Groundwater Elevations and In-Well PSH Thicknesses

HollyFrontier Navajo Refining LLC - Artesia Refinery
South Refinery Area



TEL-3: Groundwater Elevations and In-Well PSH Thicknesses

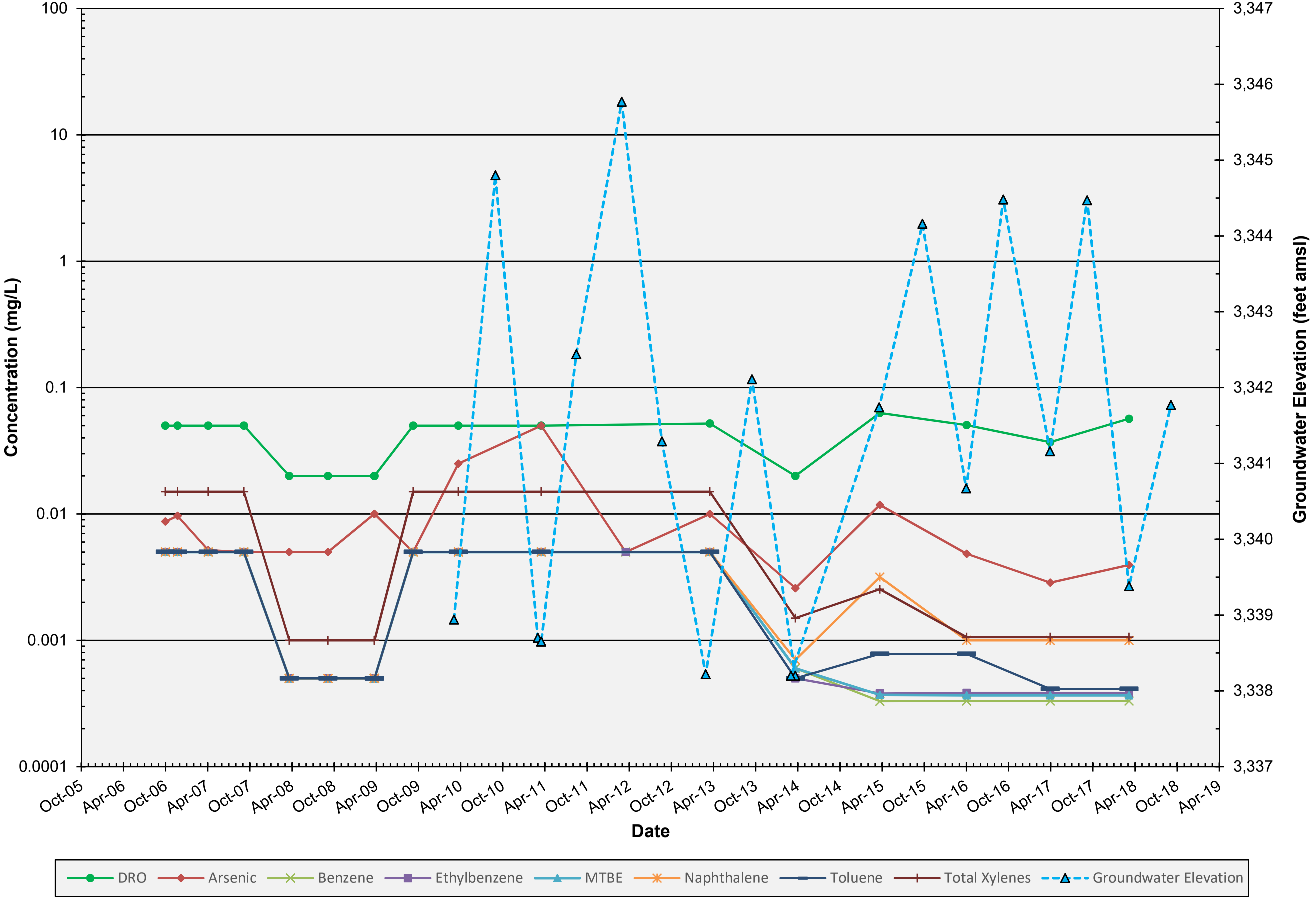
HollyFrontier Navajo Refining LLC - Artesia Refinery
Tetra Ethyl Lead Surface Impoundment



KWB-13: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

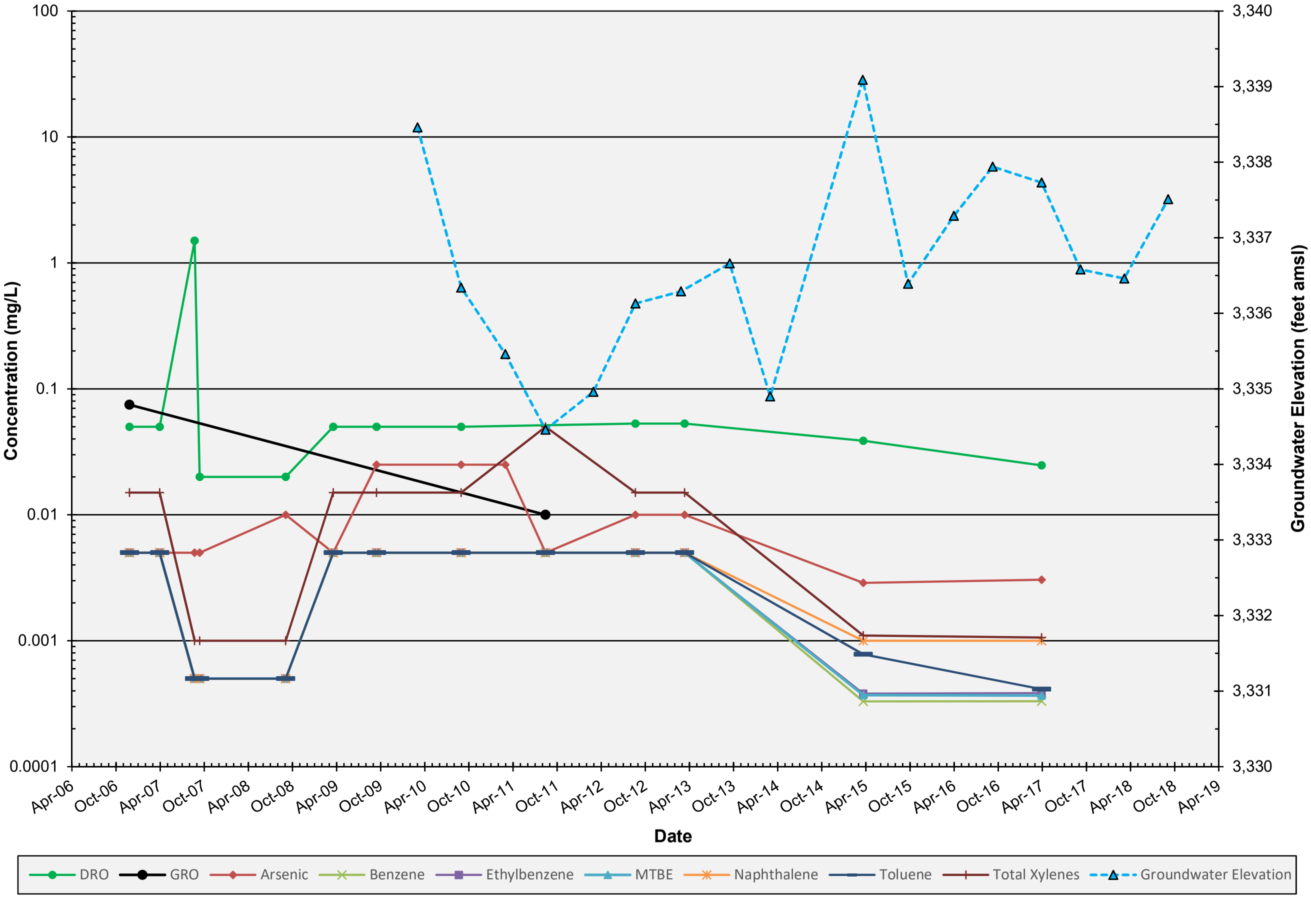
Cross-Gradient of Refinery



NP-5: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

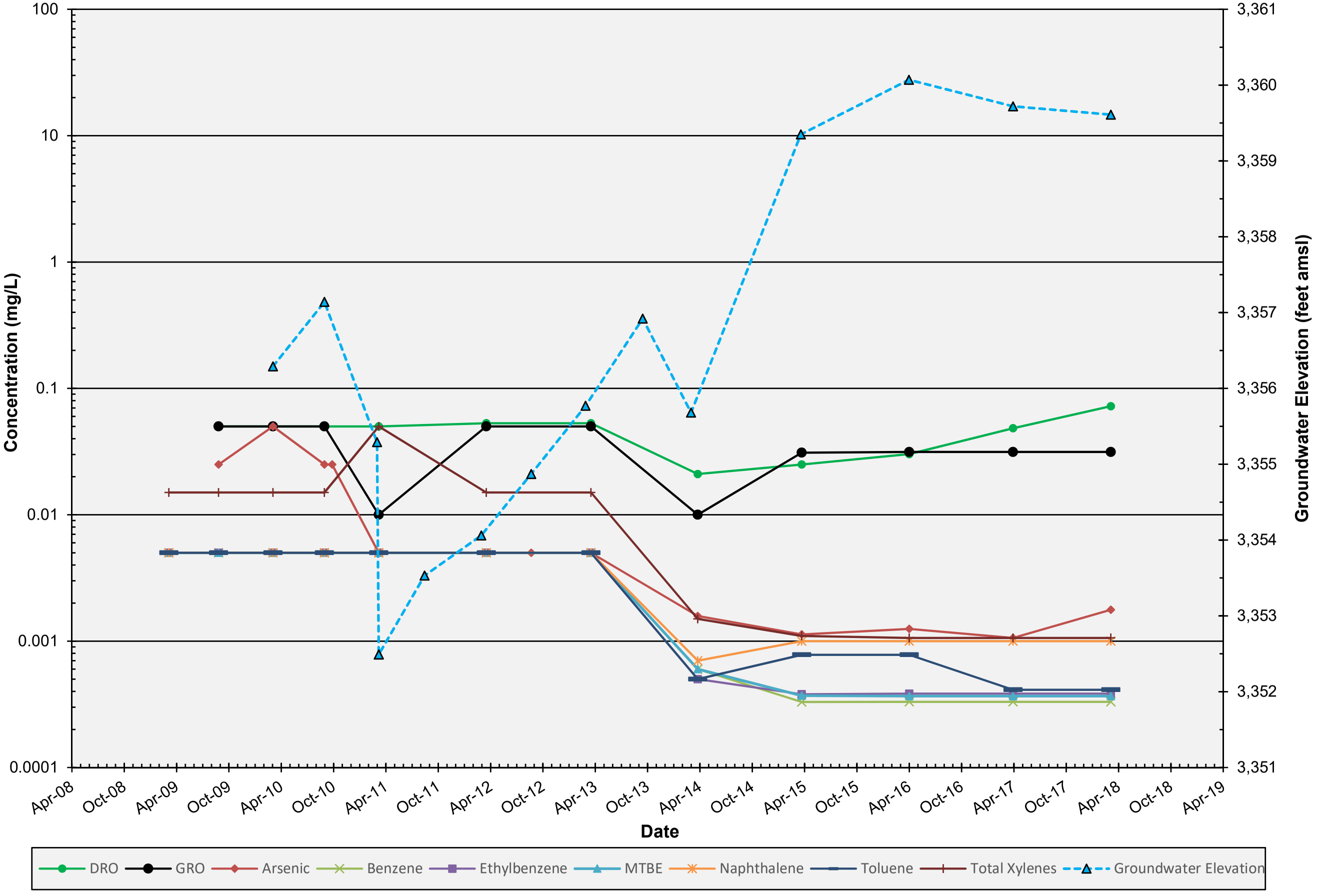
Cross-Gradient of Refinery



UG-1: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

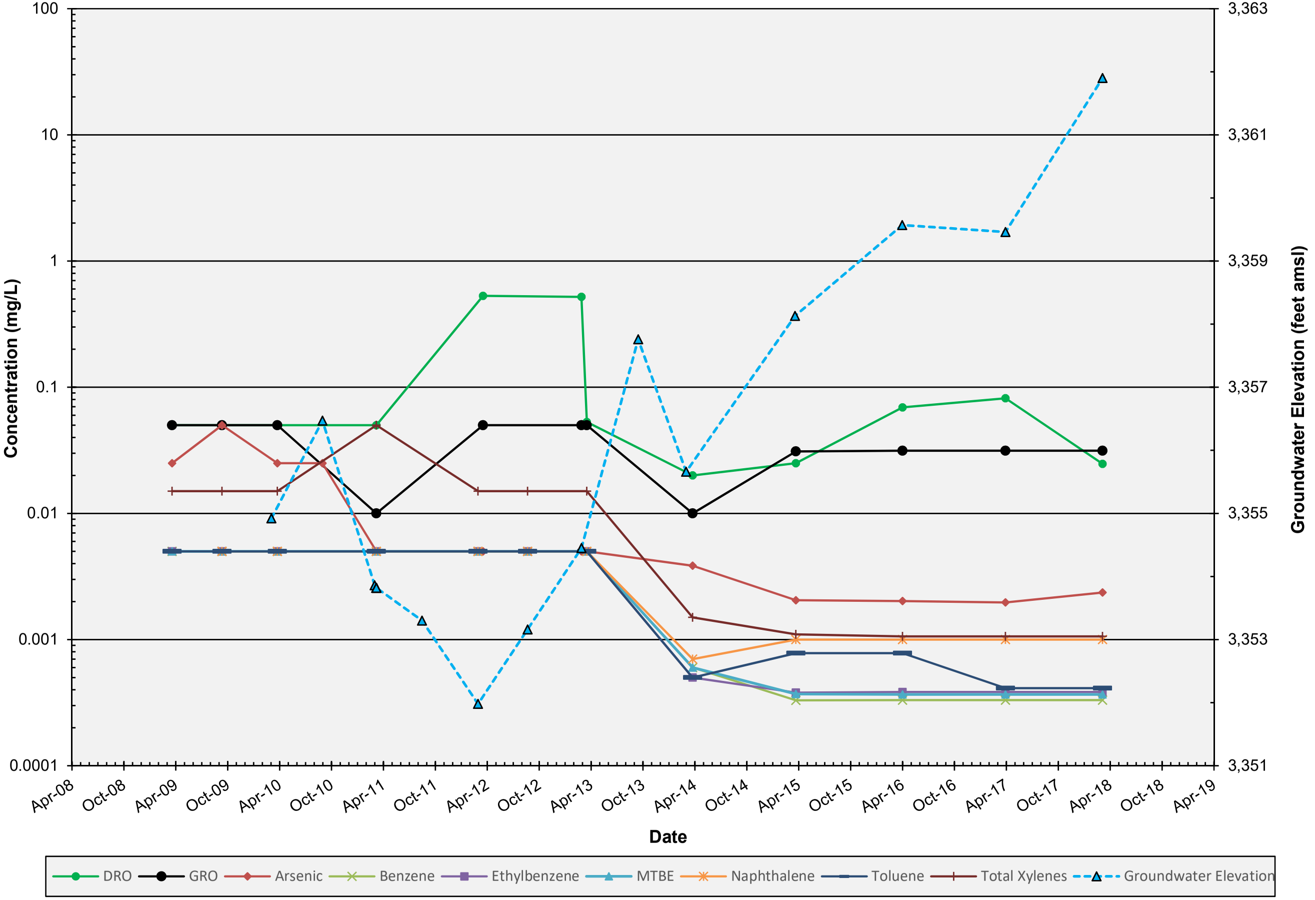
Up-Gradient of Refinery



UG-2: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

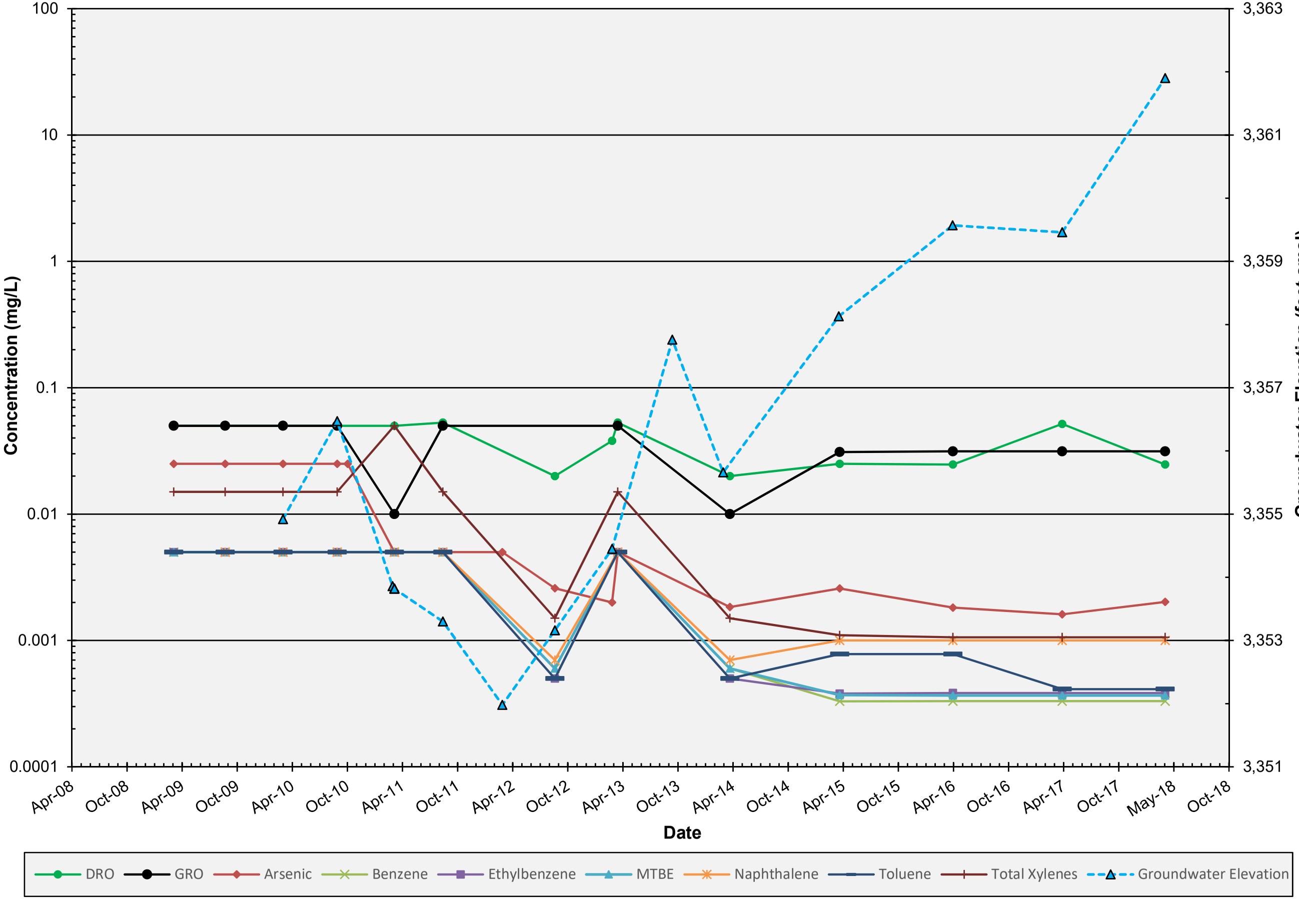
Up-Gradient of Refinery



UG-3R: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

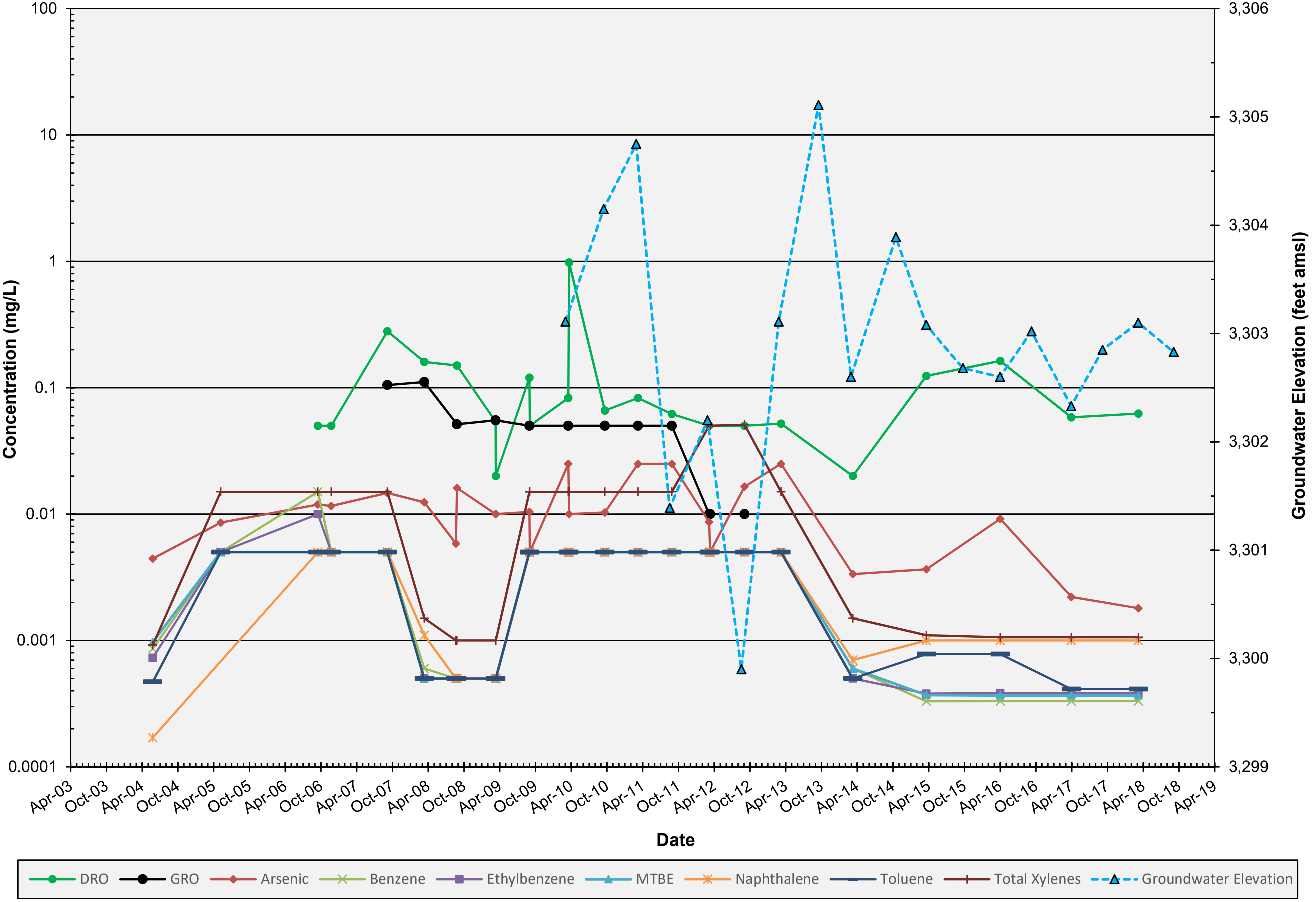
Up-Gradient of Refinery



MW-1R: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

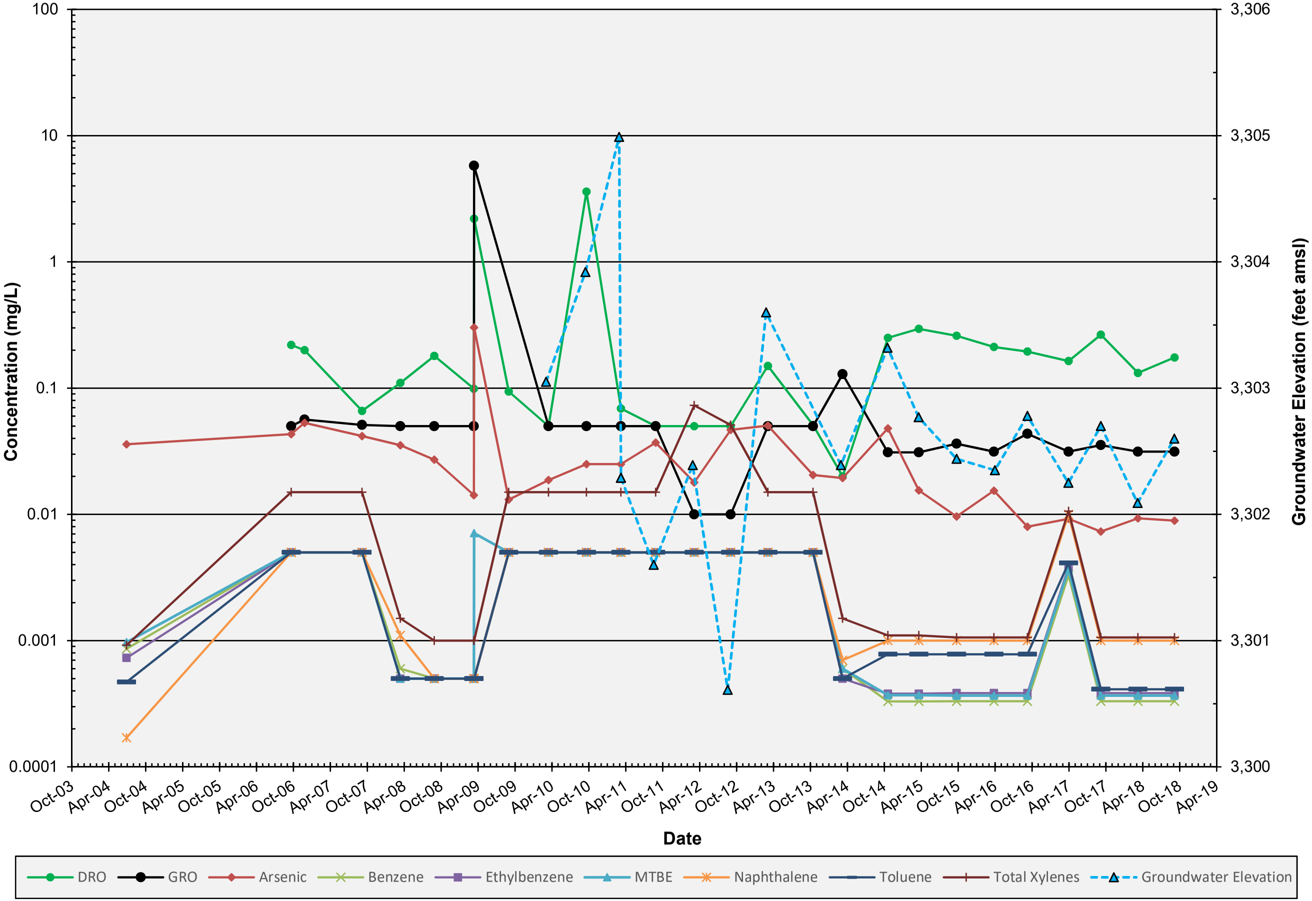
Evaporation Ponds



MW-2A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

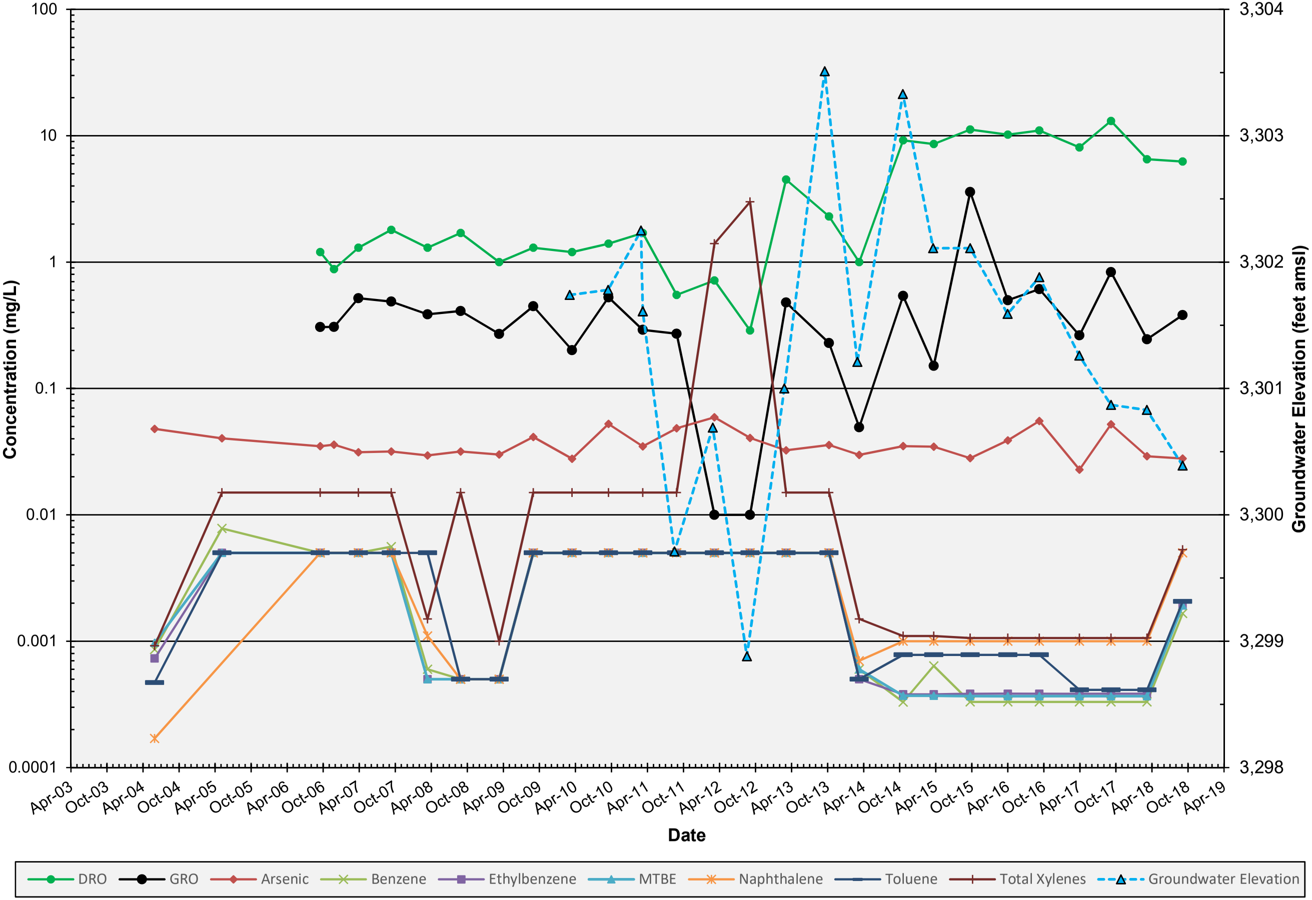
Evaporation Ponds



MW-3: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

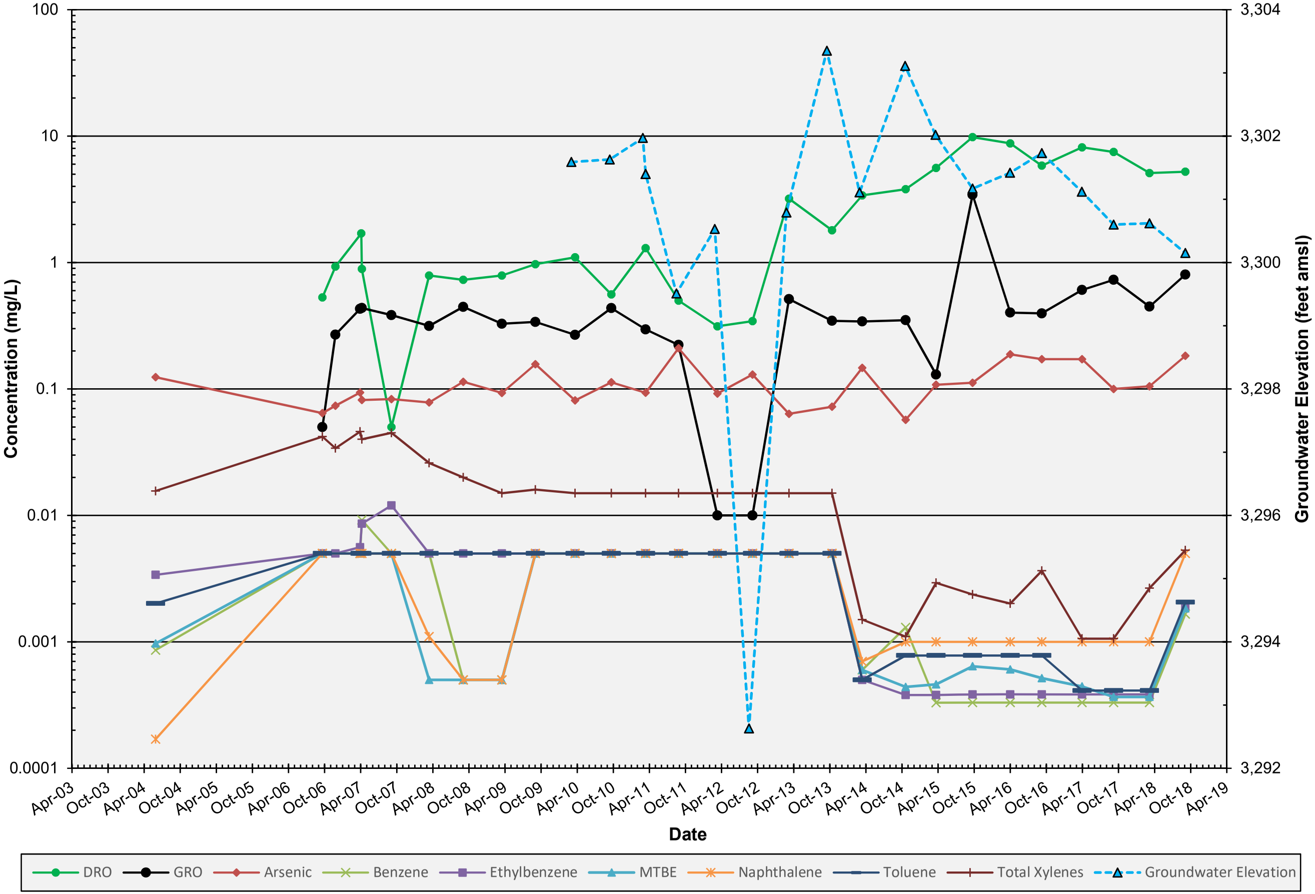
Evaporation Ponds



MW-4A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

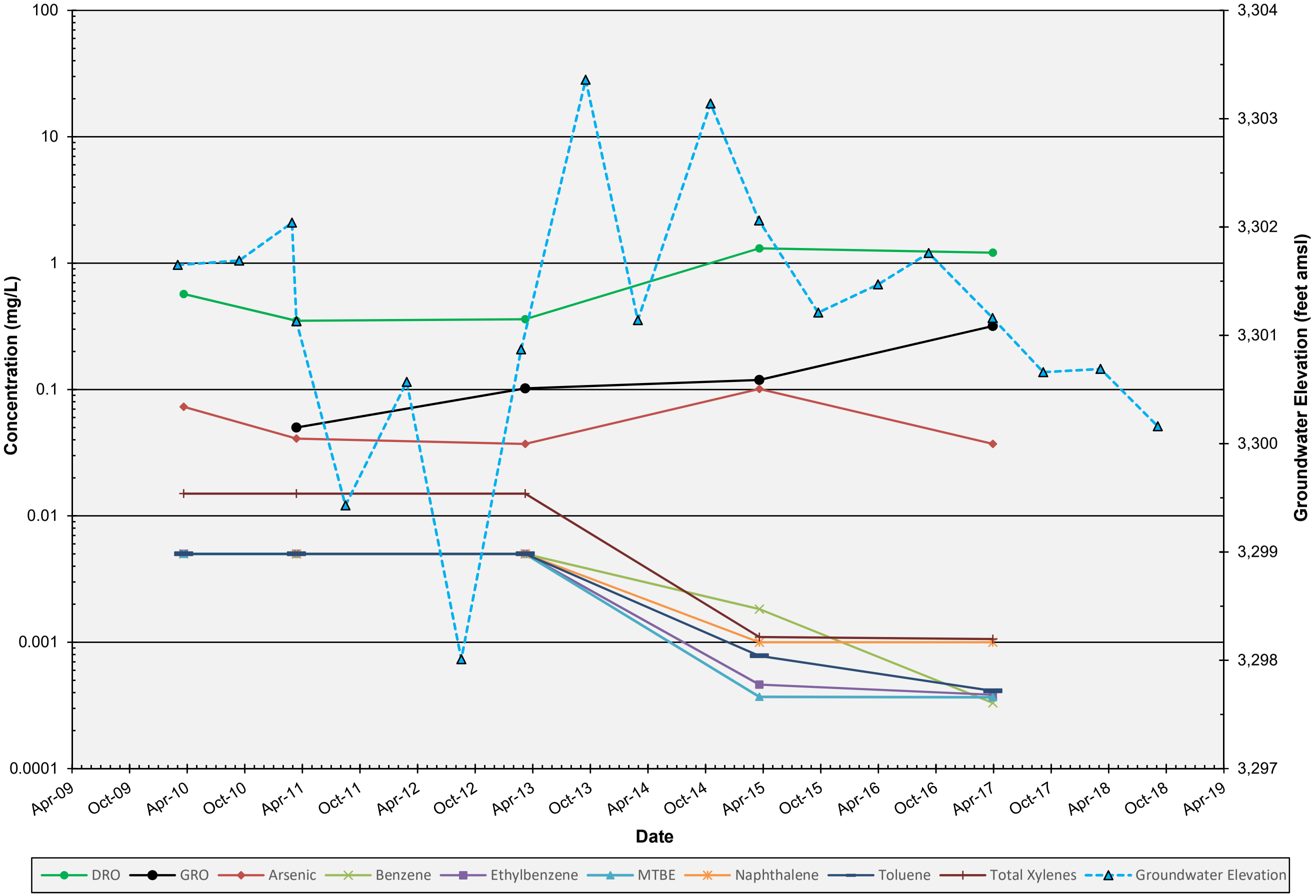
Evaporation Ponds



MW-4B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

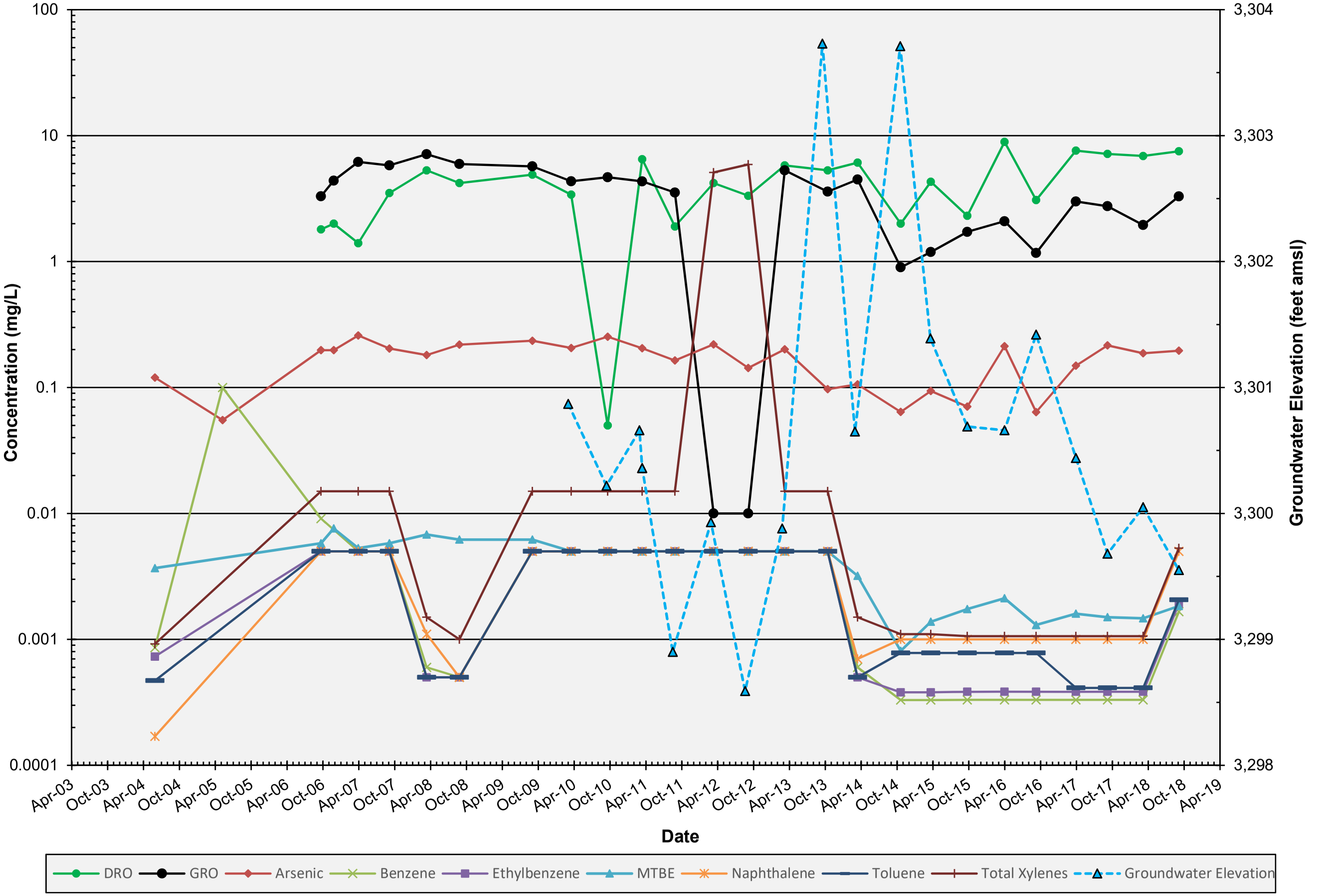
Evaporation Ponds



MW-5A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

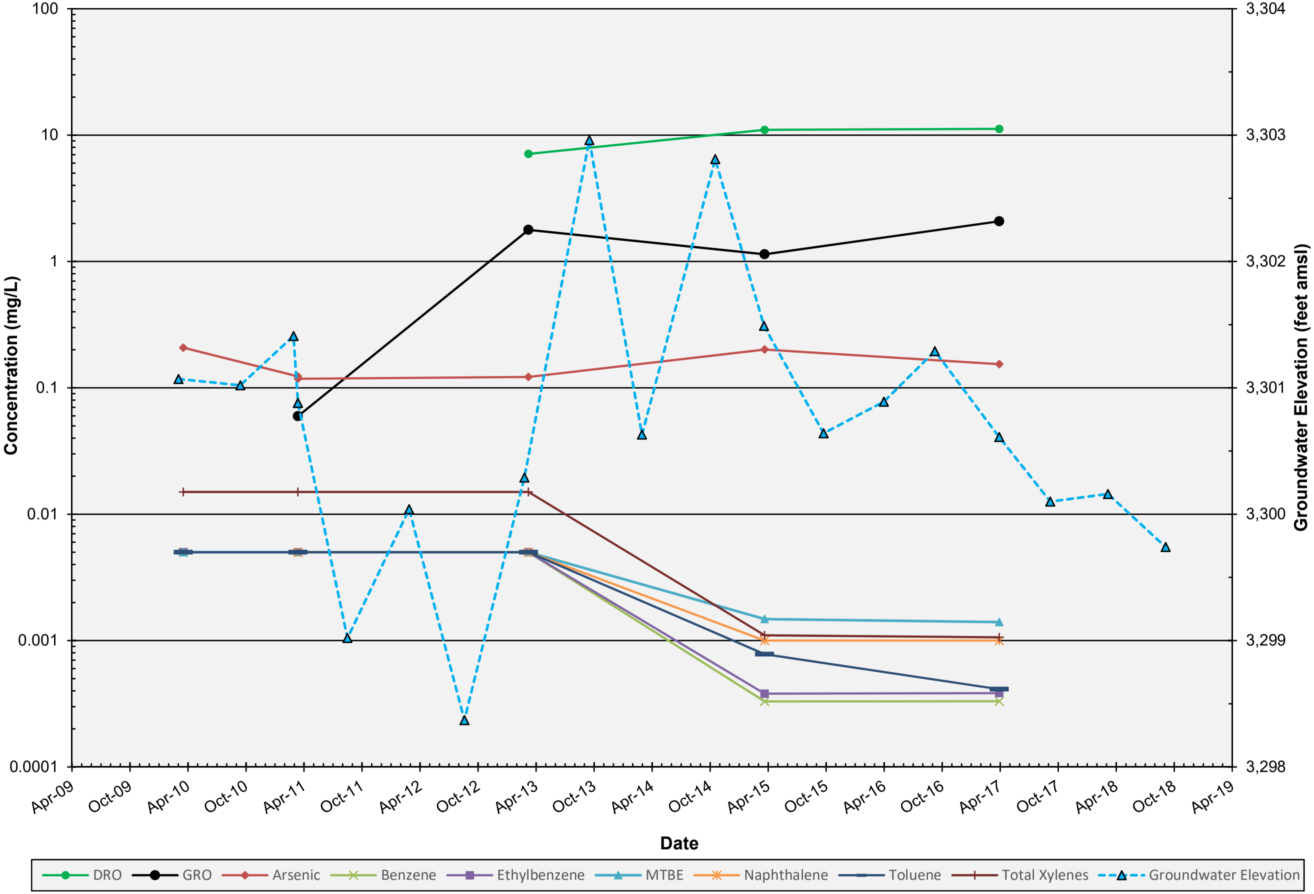
Evaporation Ponds



MW-5B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

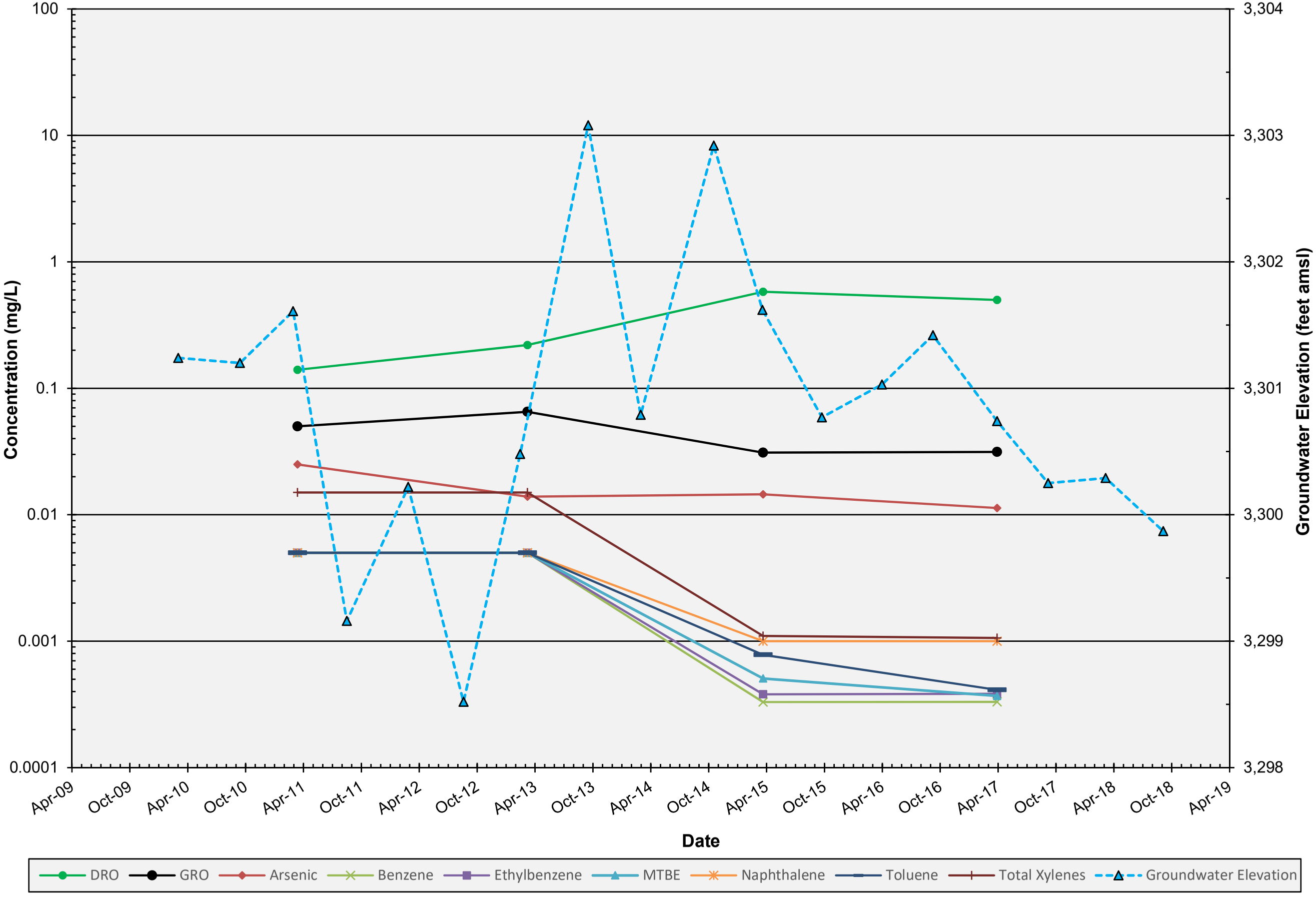
Evaporation Ponds



MW-5C: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

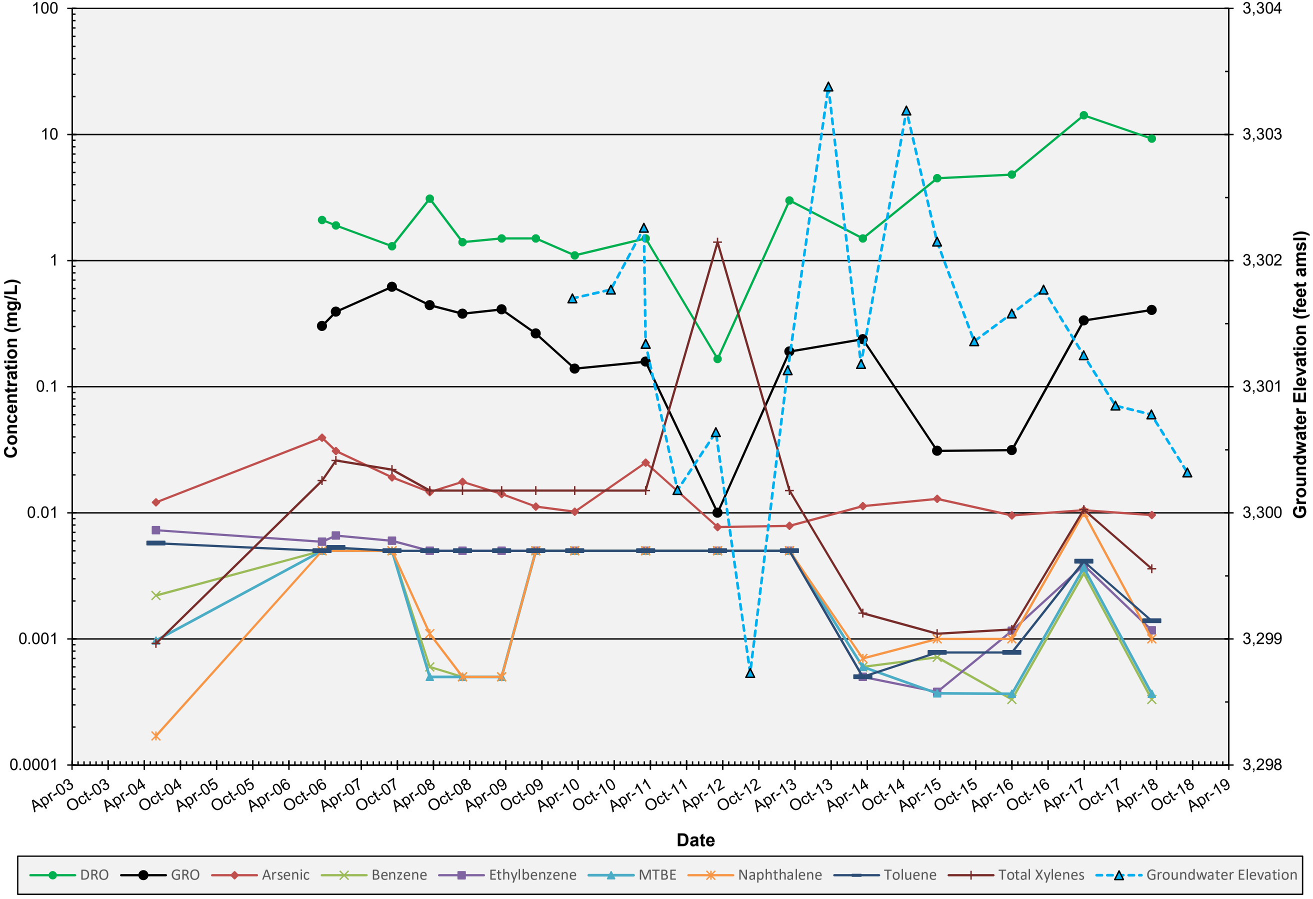
Evaporation Ponds



MW-6A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

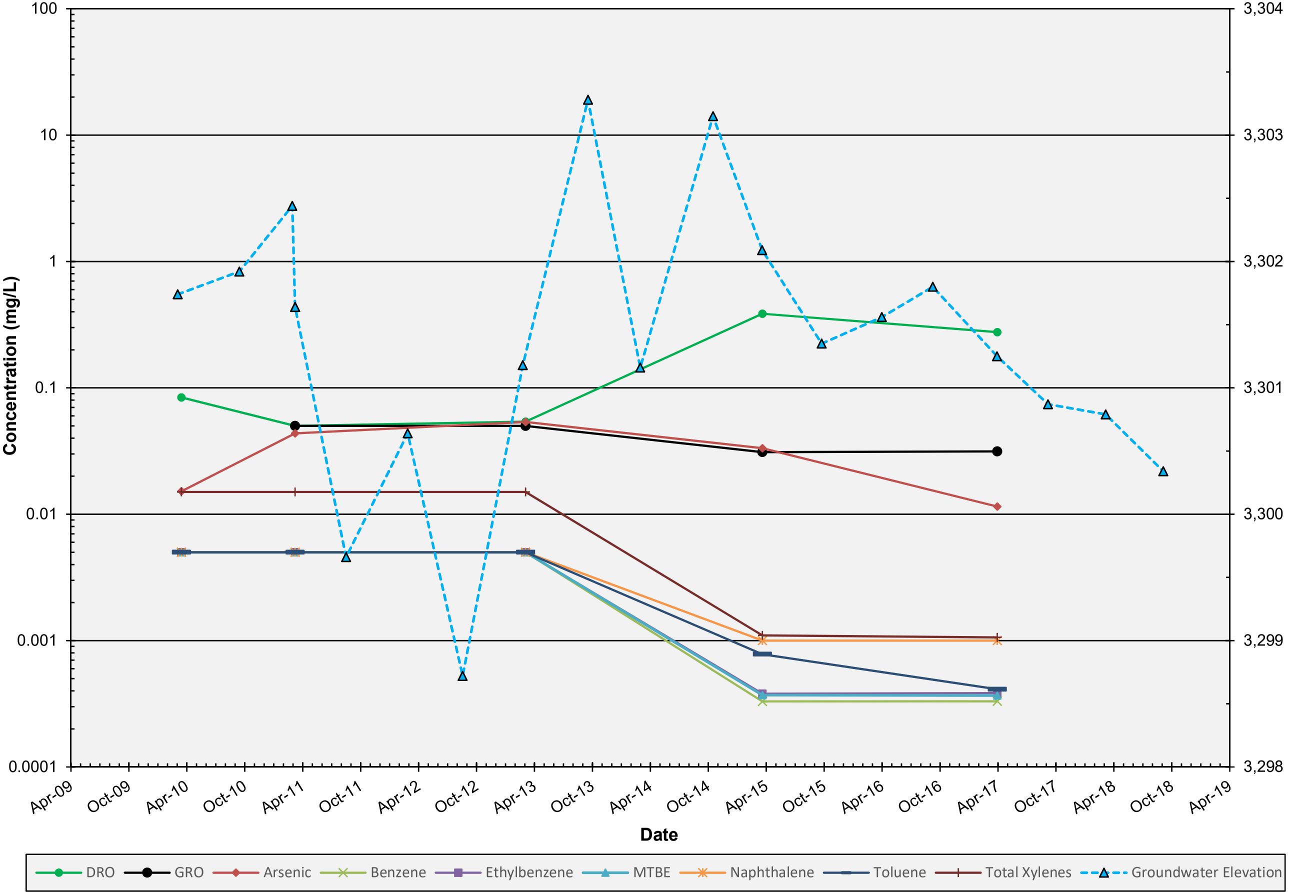
Evaporation Ponds



MW-6B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

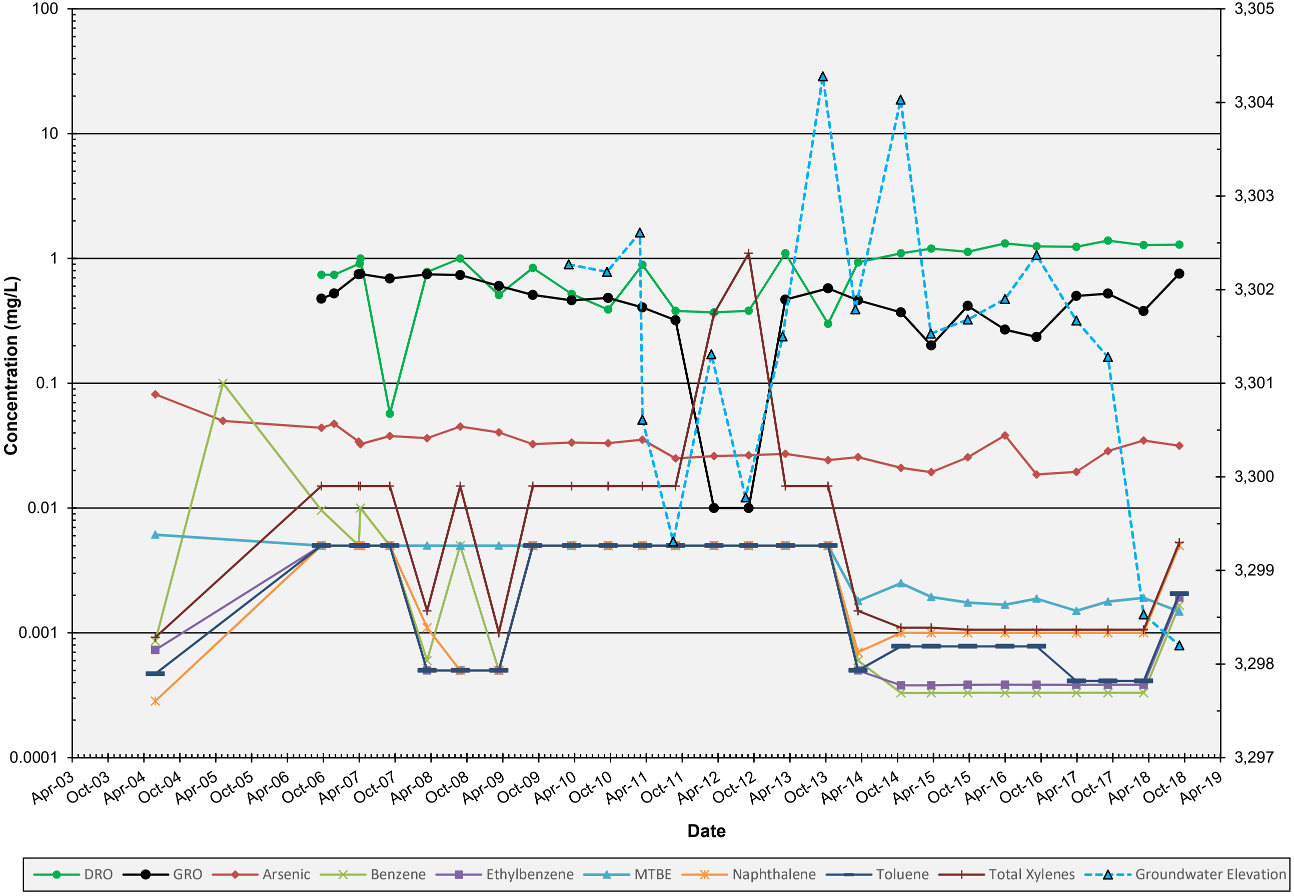
Evaporation Ponds



MW-7A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

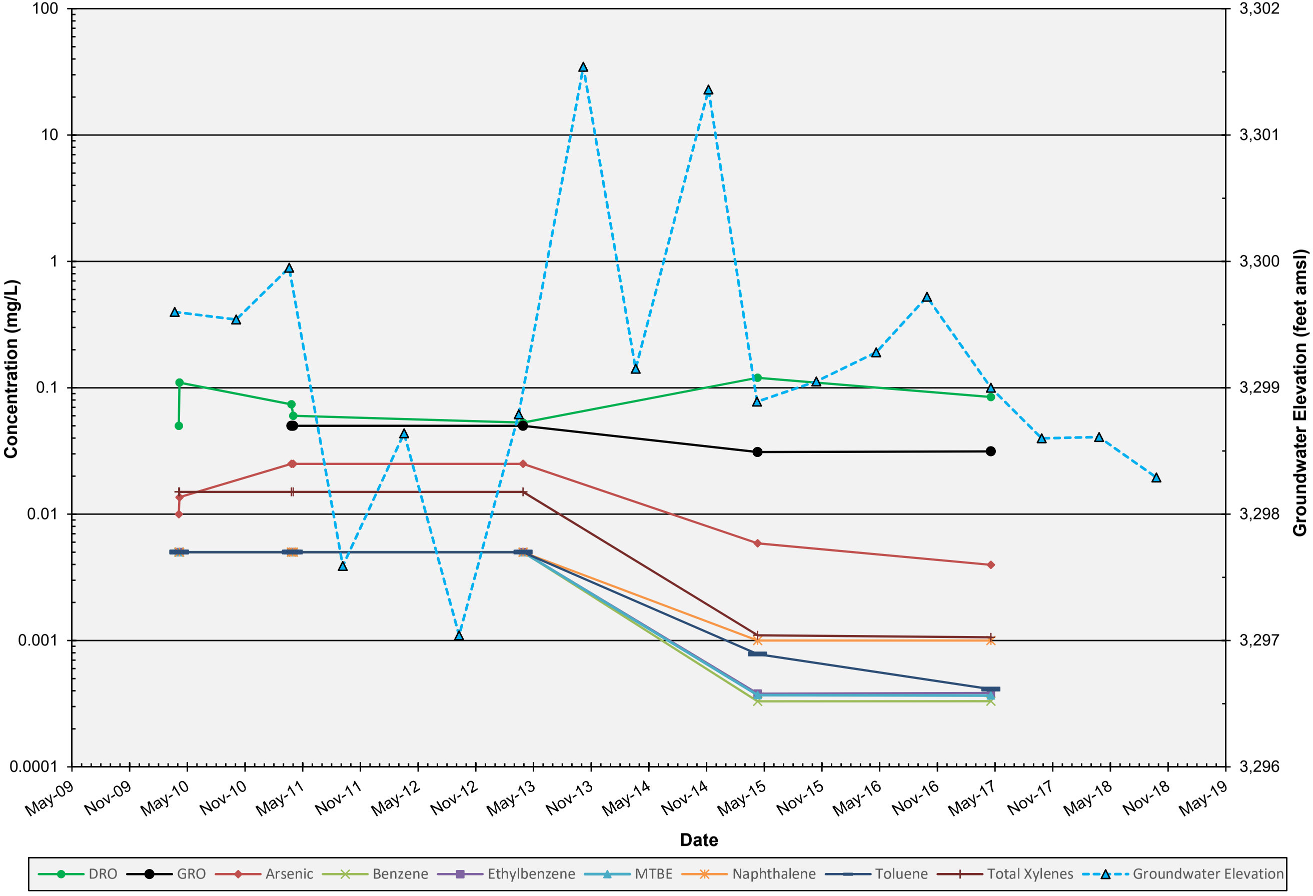
Evaporation Ponds



MW-7B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

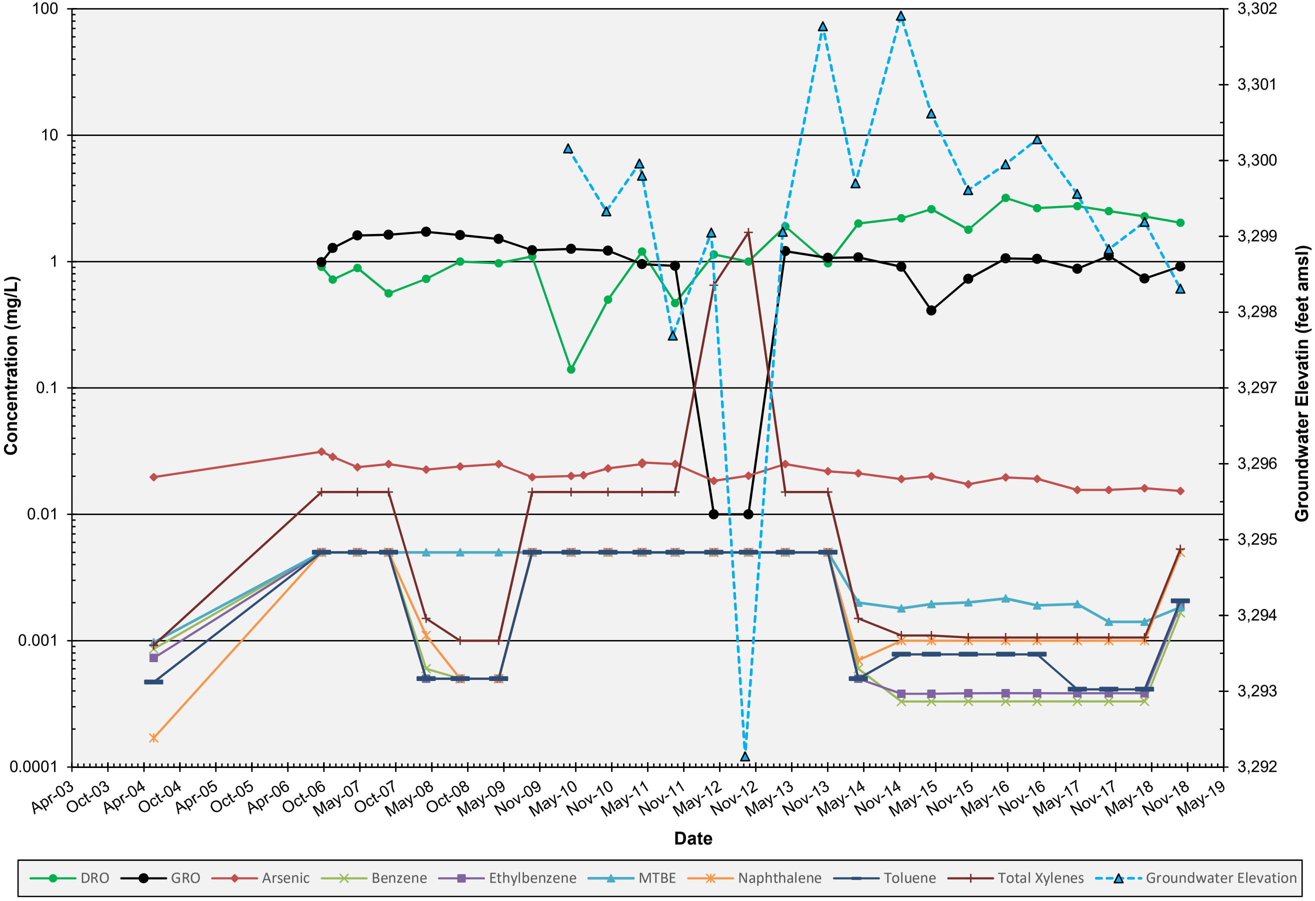
Evaporation Ponds



MW-10: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

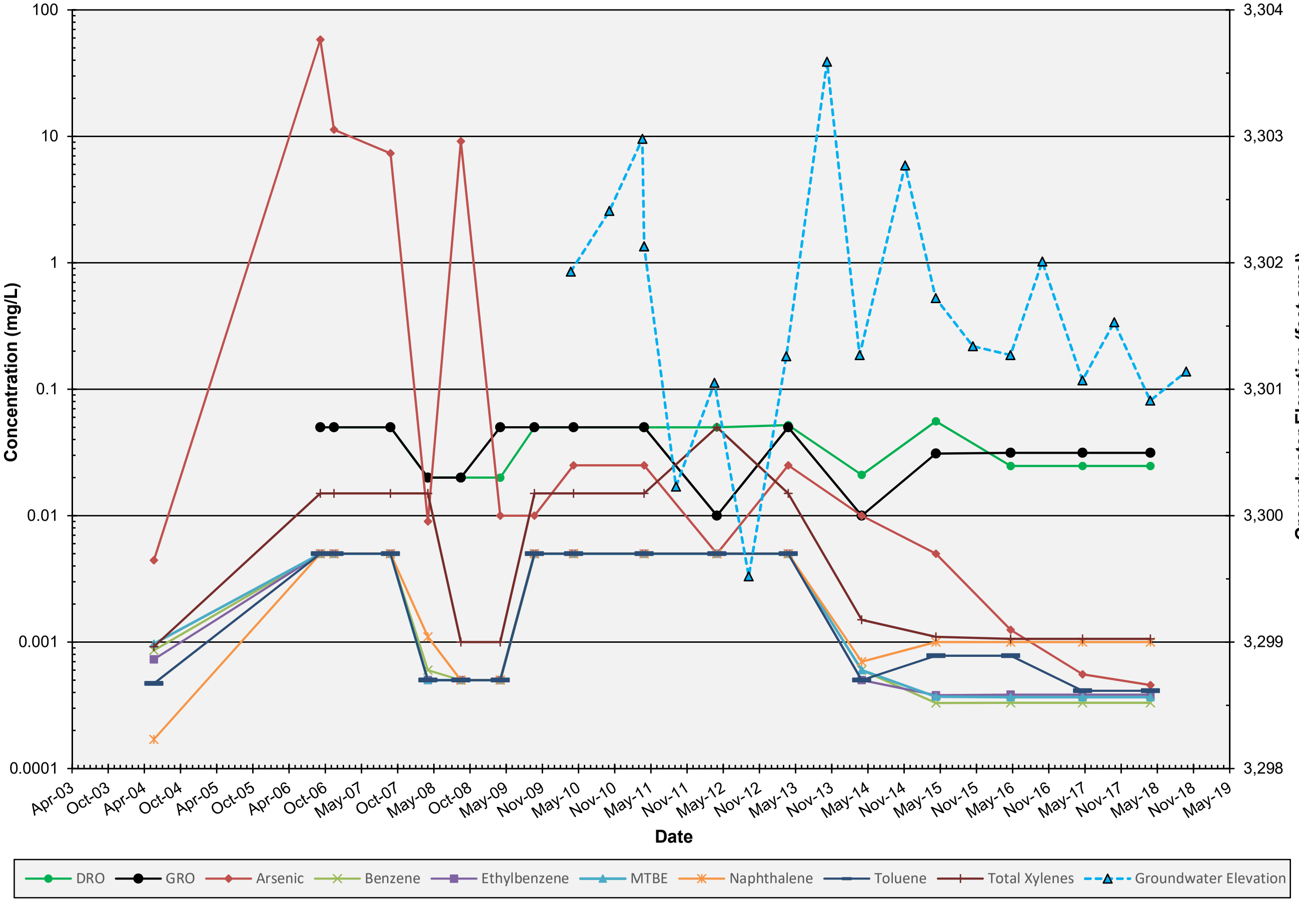
Evaporation Ponds



MW-11A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

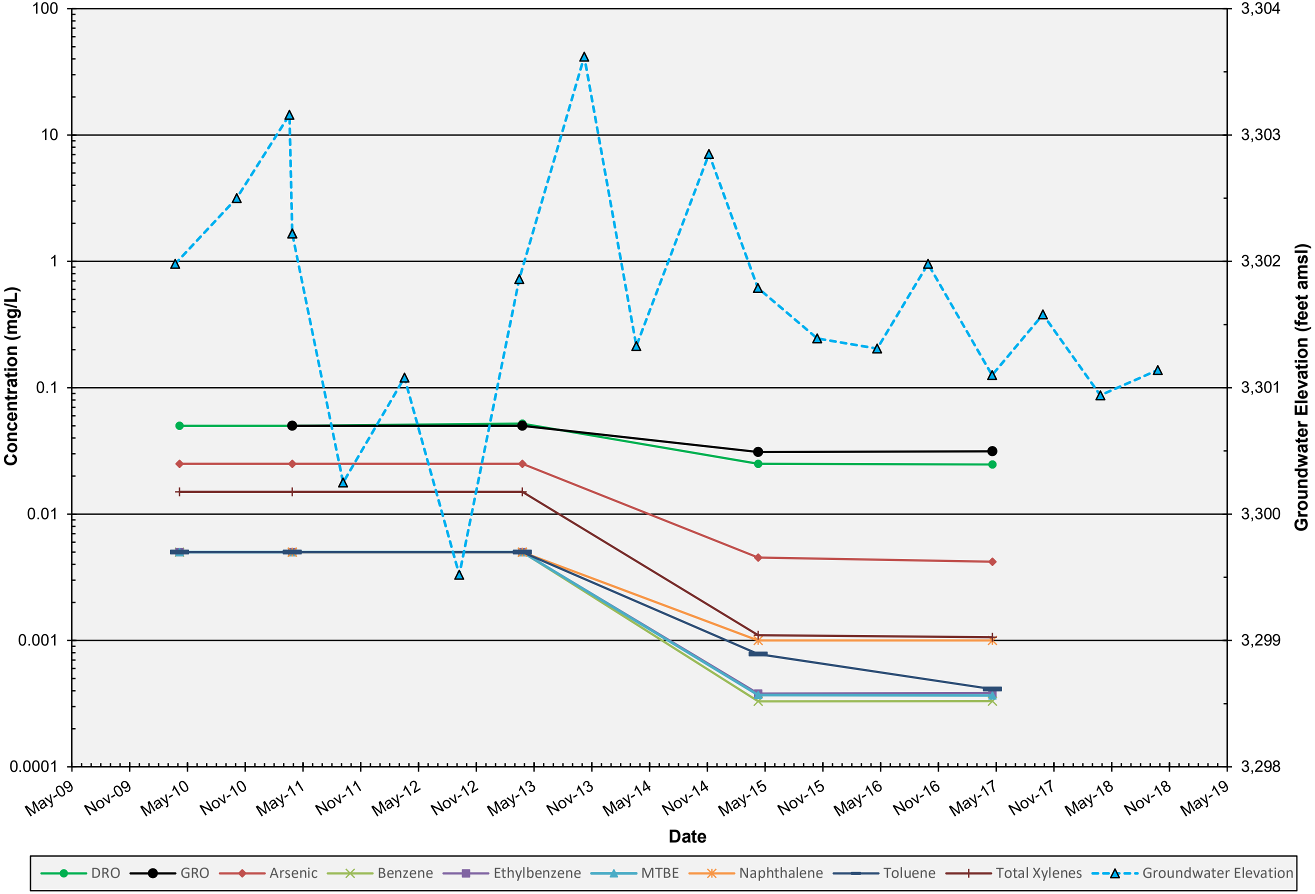
Evaporation Ponds



MW-11B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

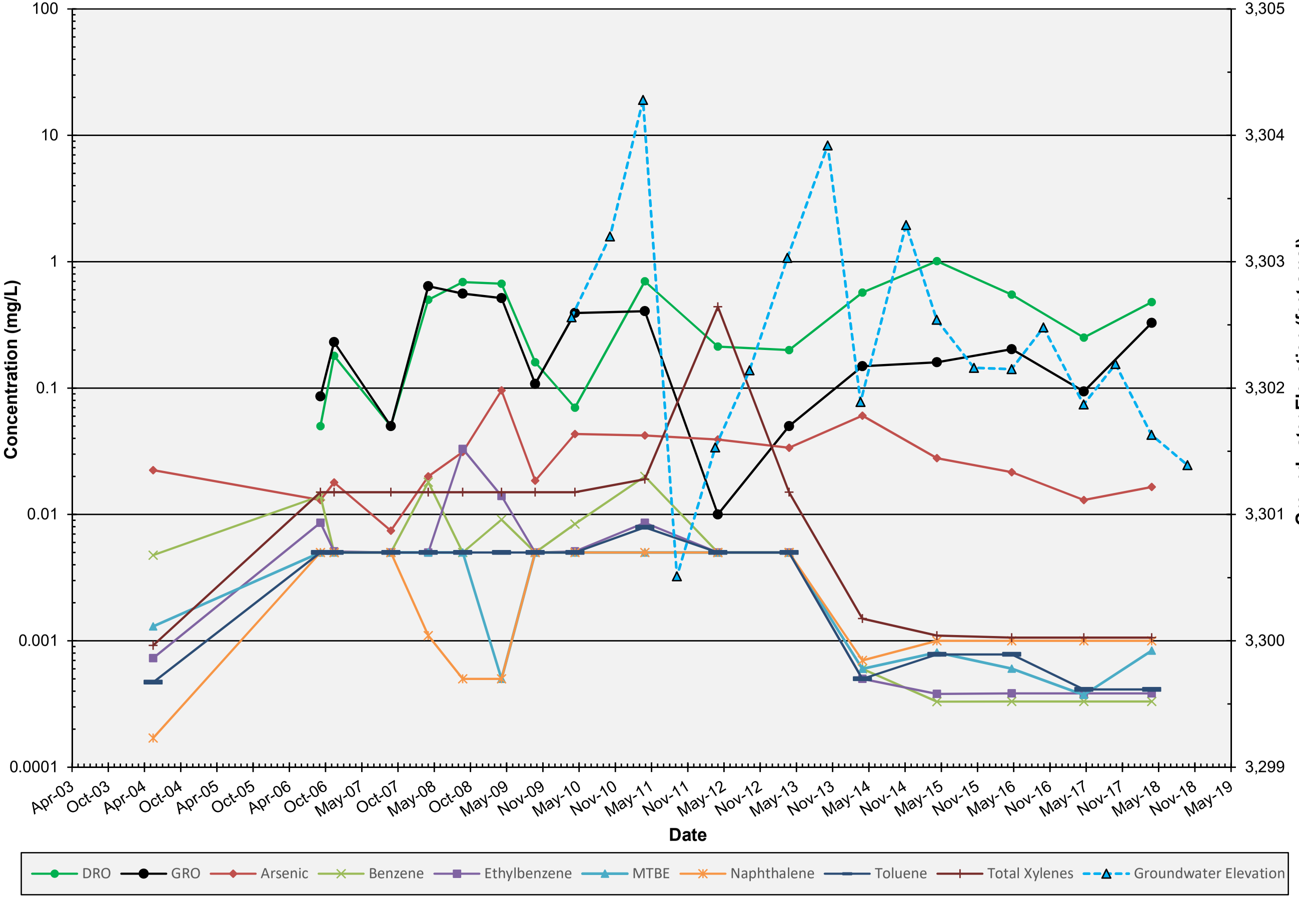
Evaporation Ponds



MW-15: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

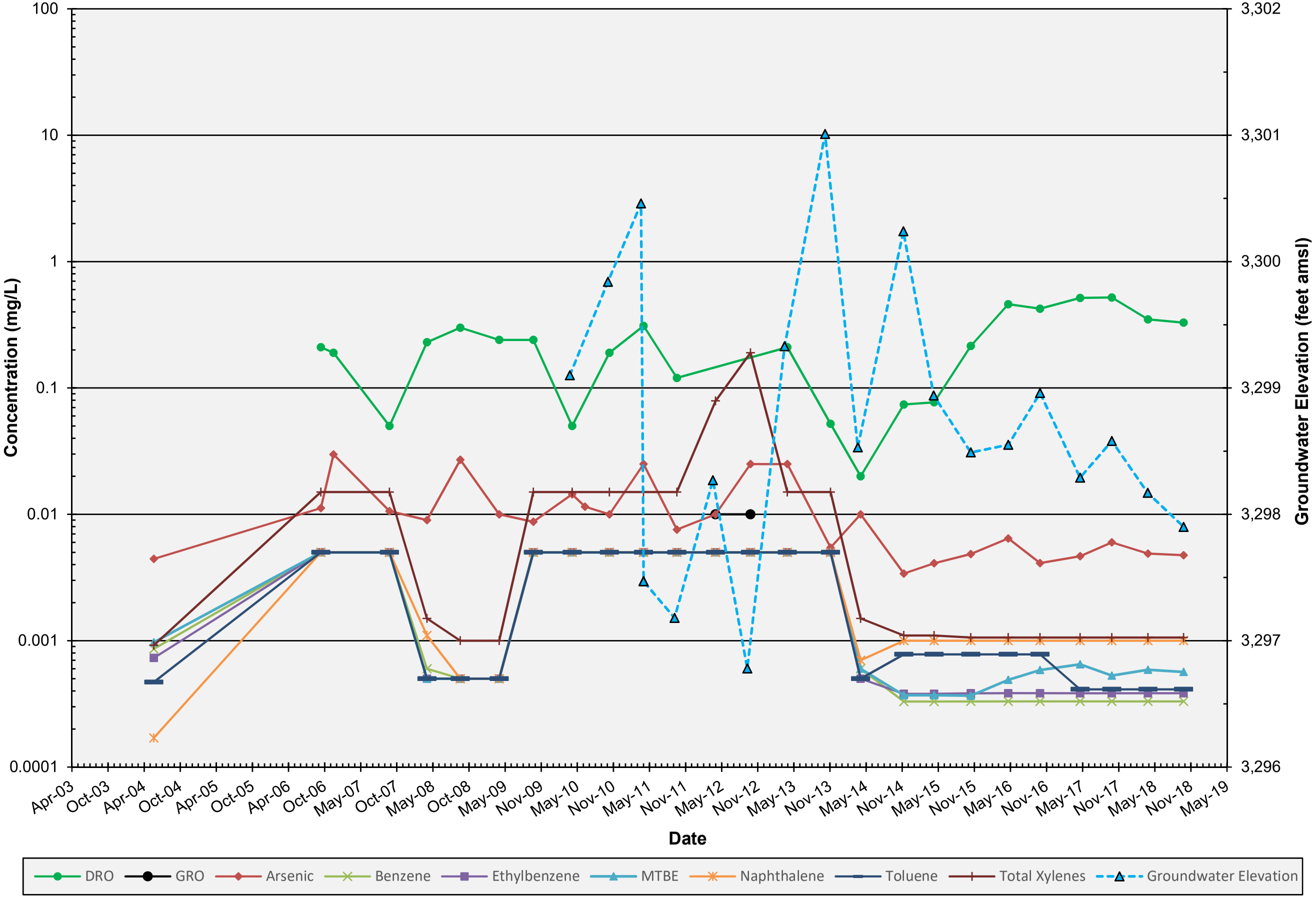
Evaporation Ponds



MW-18A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

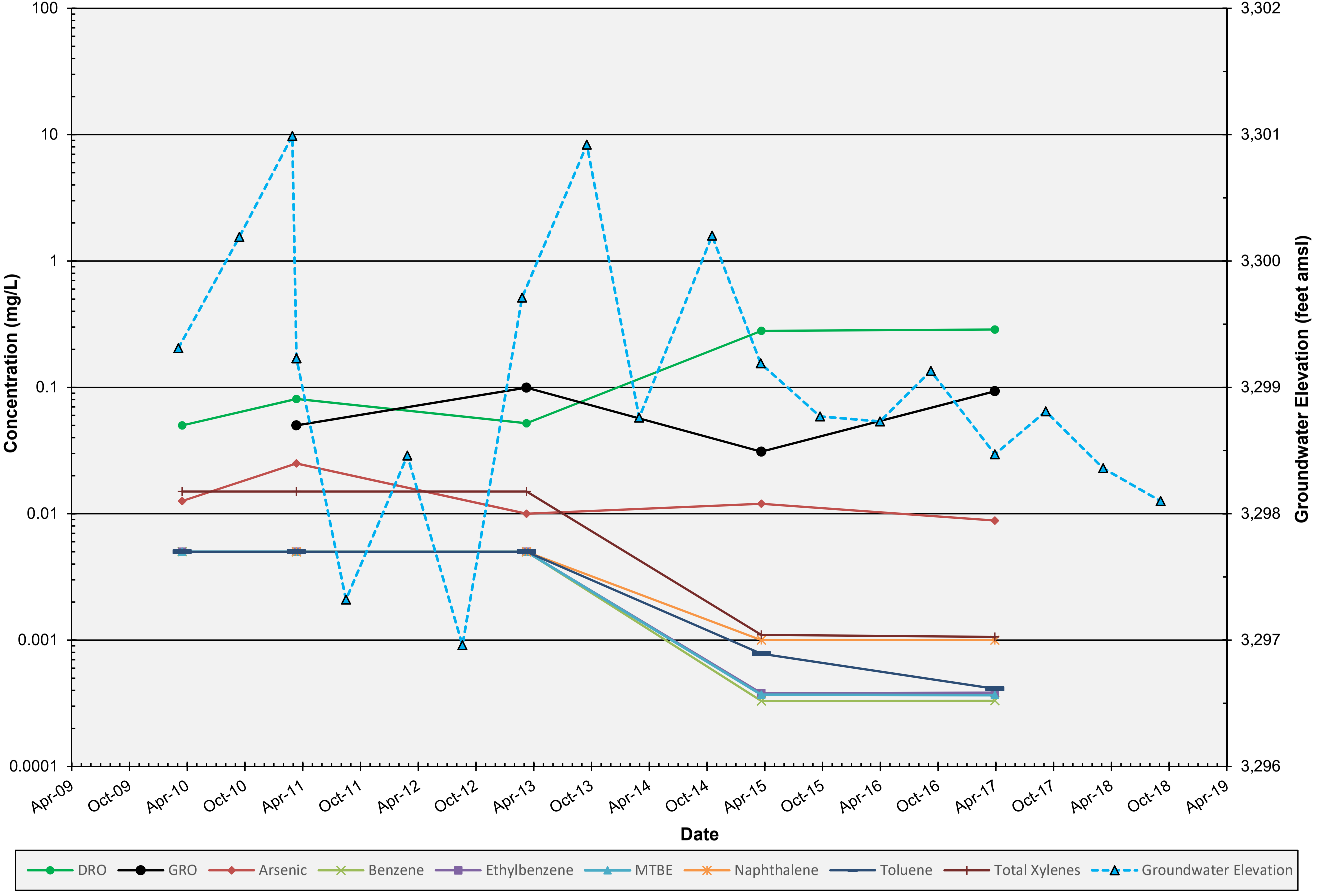
Evaporation Ponds



MW-18B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

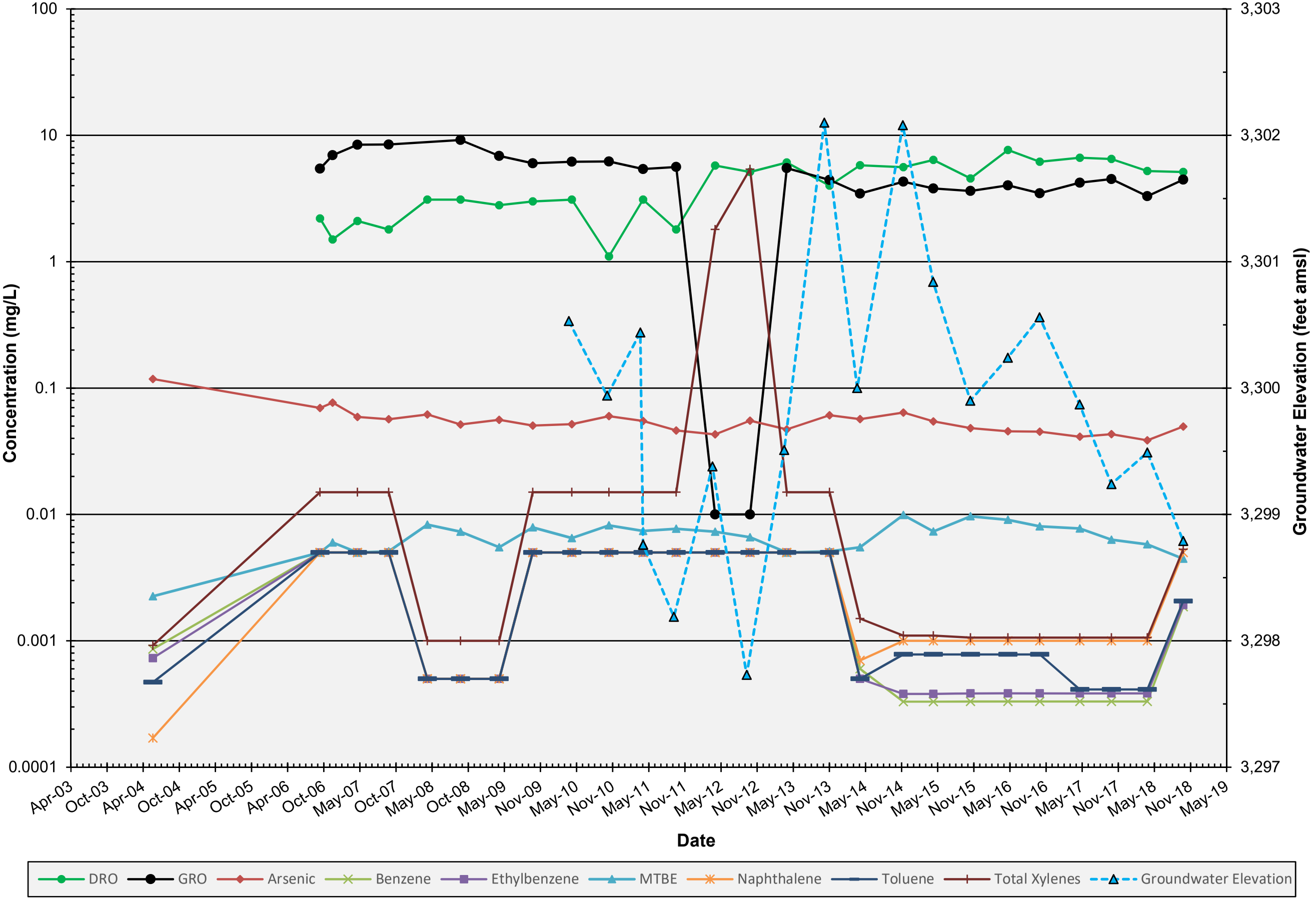
Evaporation Ponds



MW-22A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

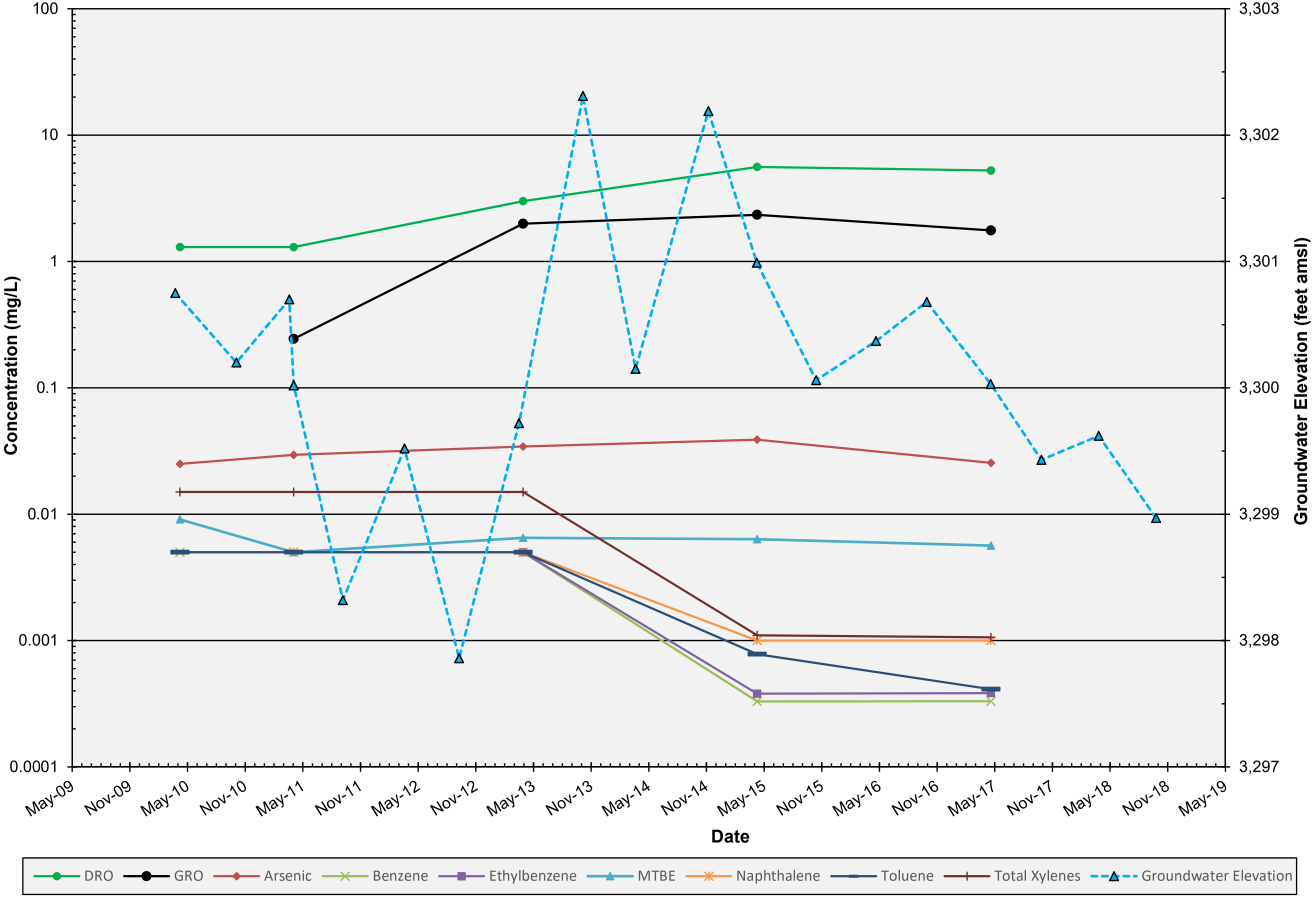
Evaporation Ponds



MW-22B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

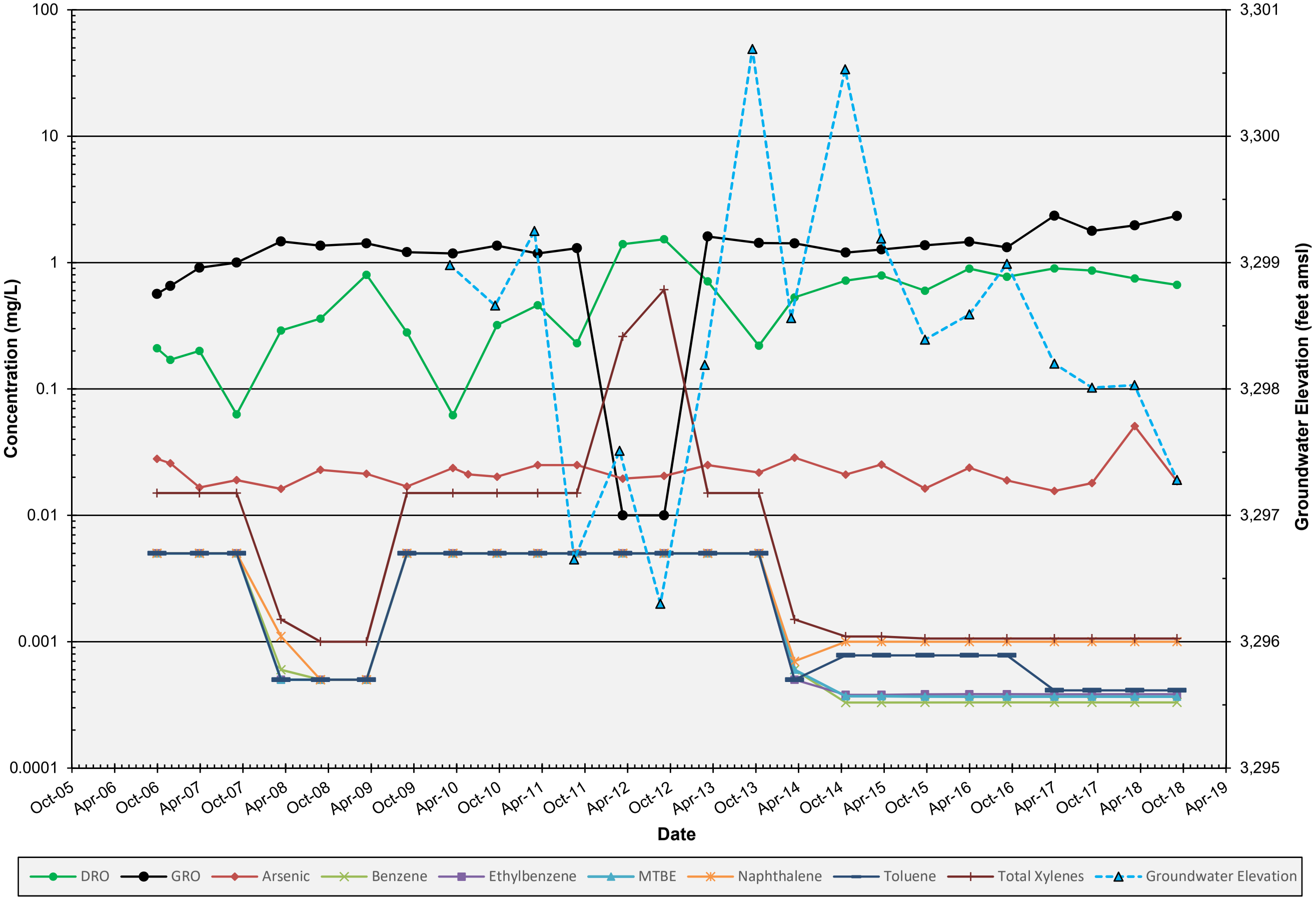
Evaporation Ponds



MW-70: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

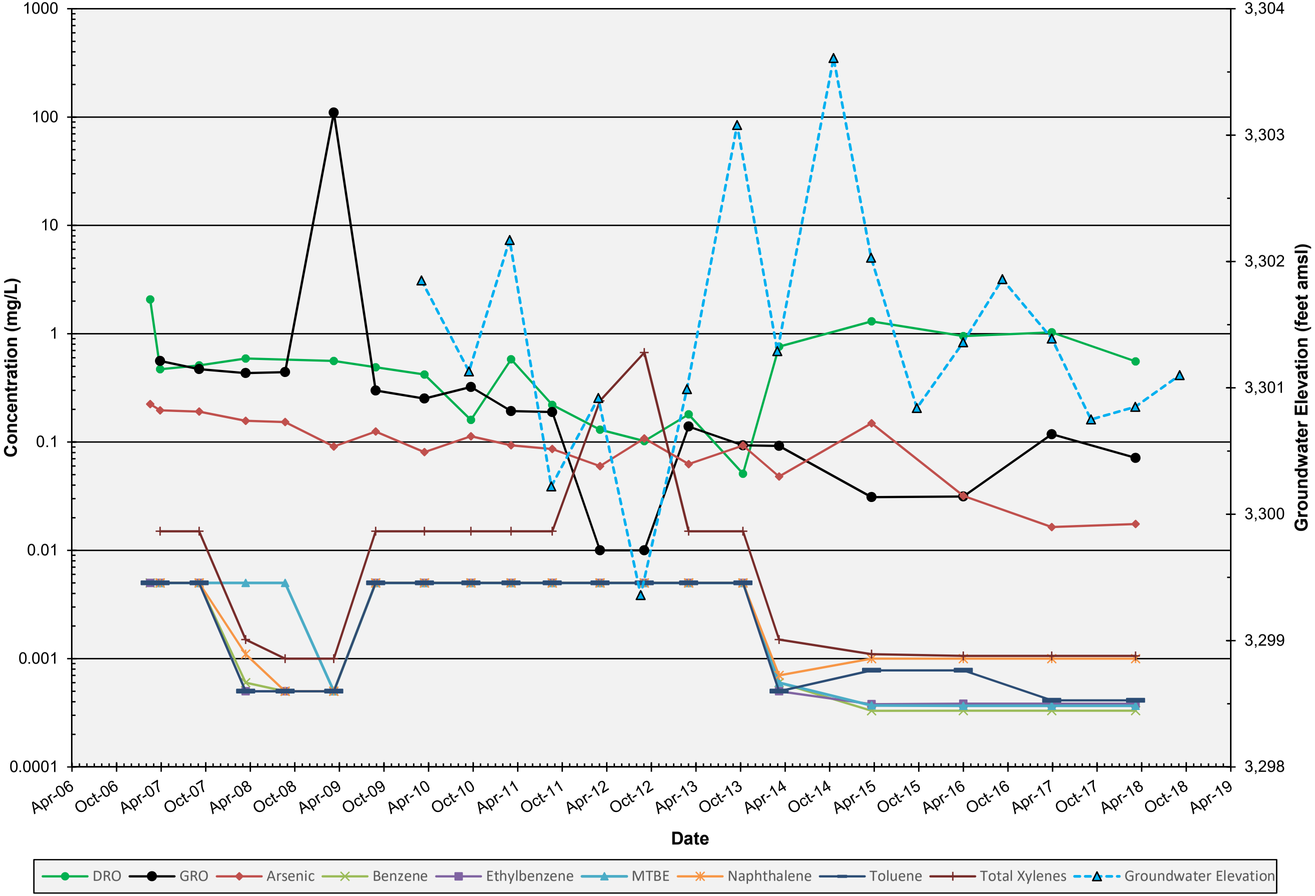
Evaporation Ponds



MW-72: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

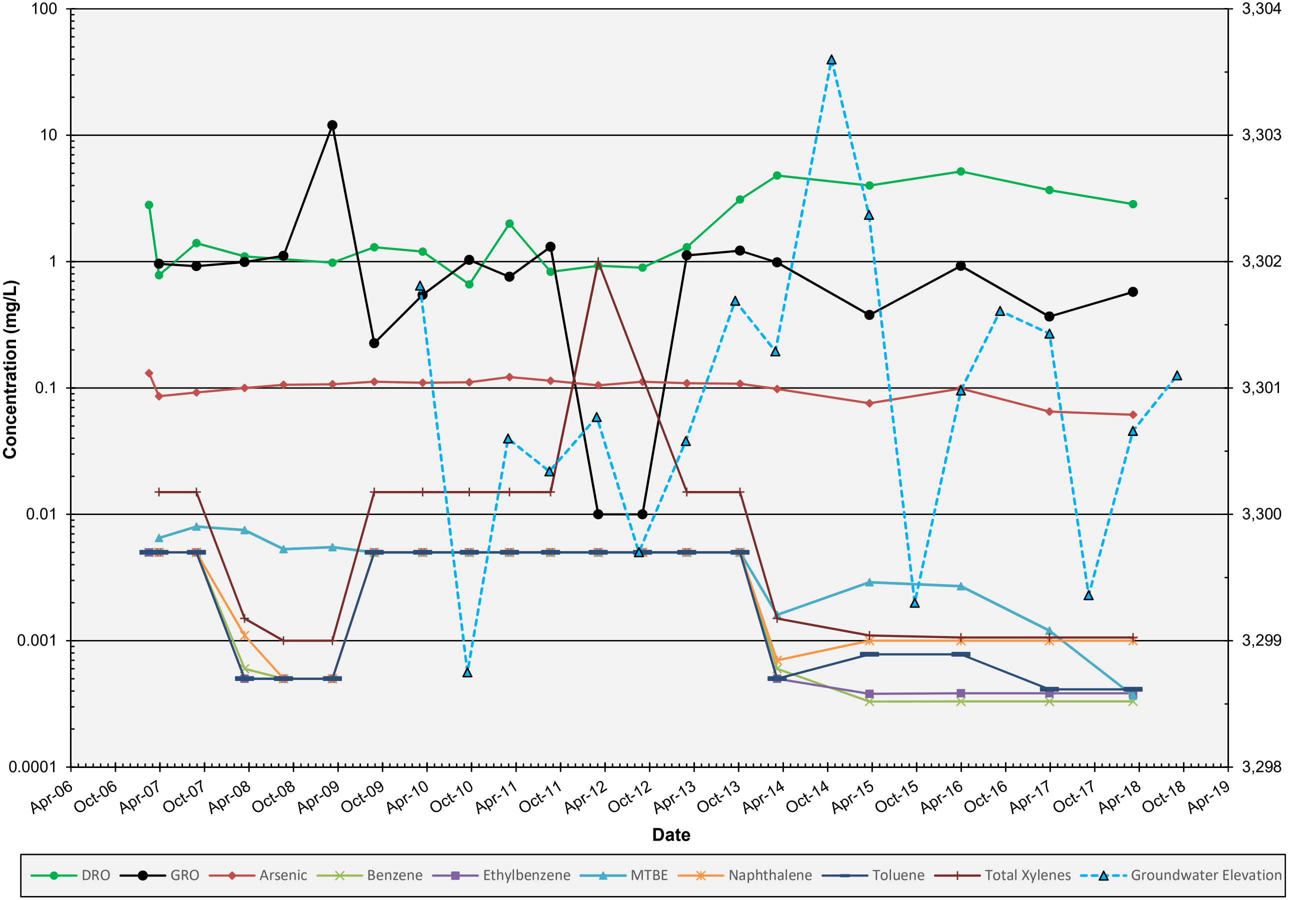
Evaporation Ponds



MW-73: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

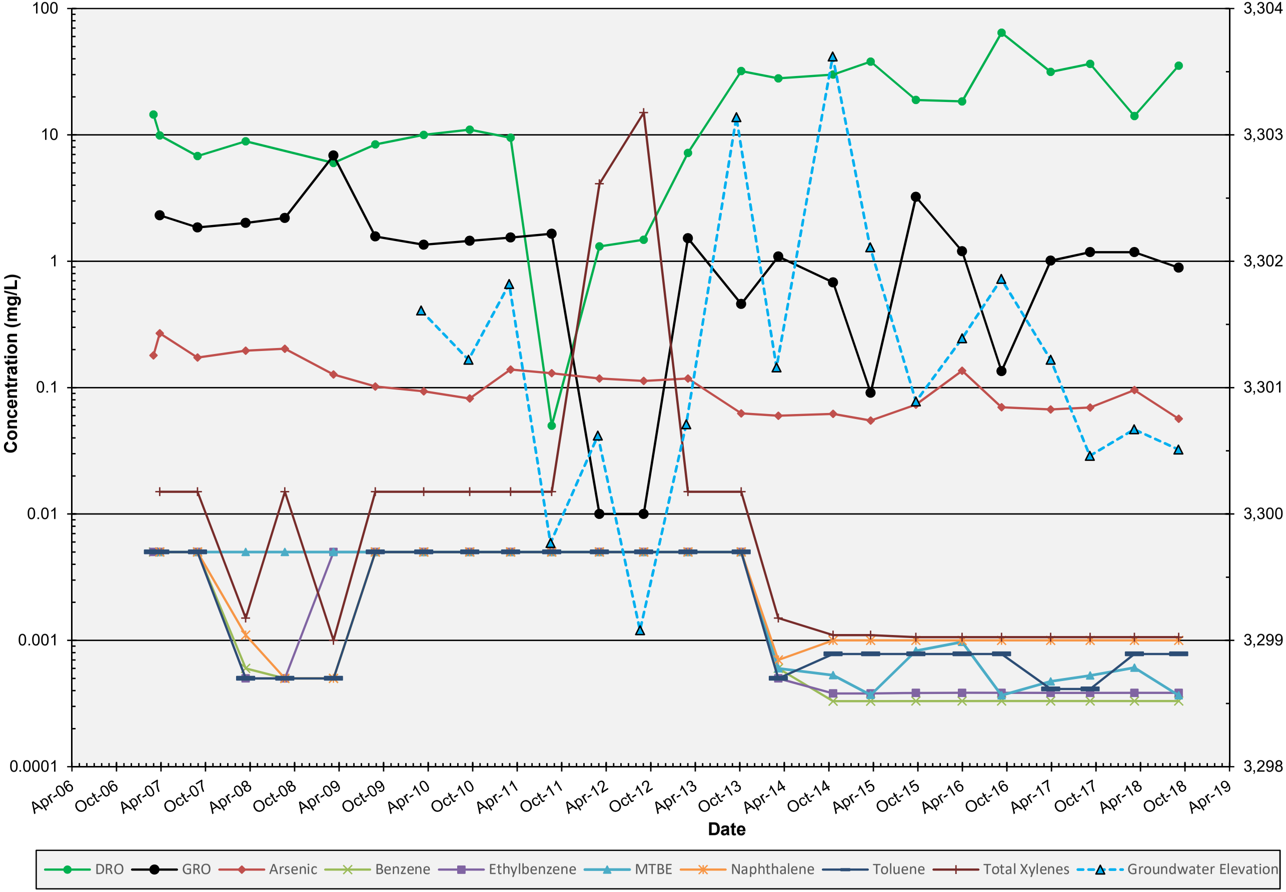
Evaporation Ponds



MW-74: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

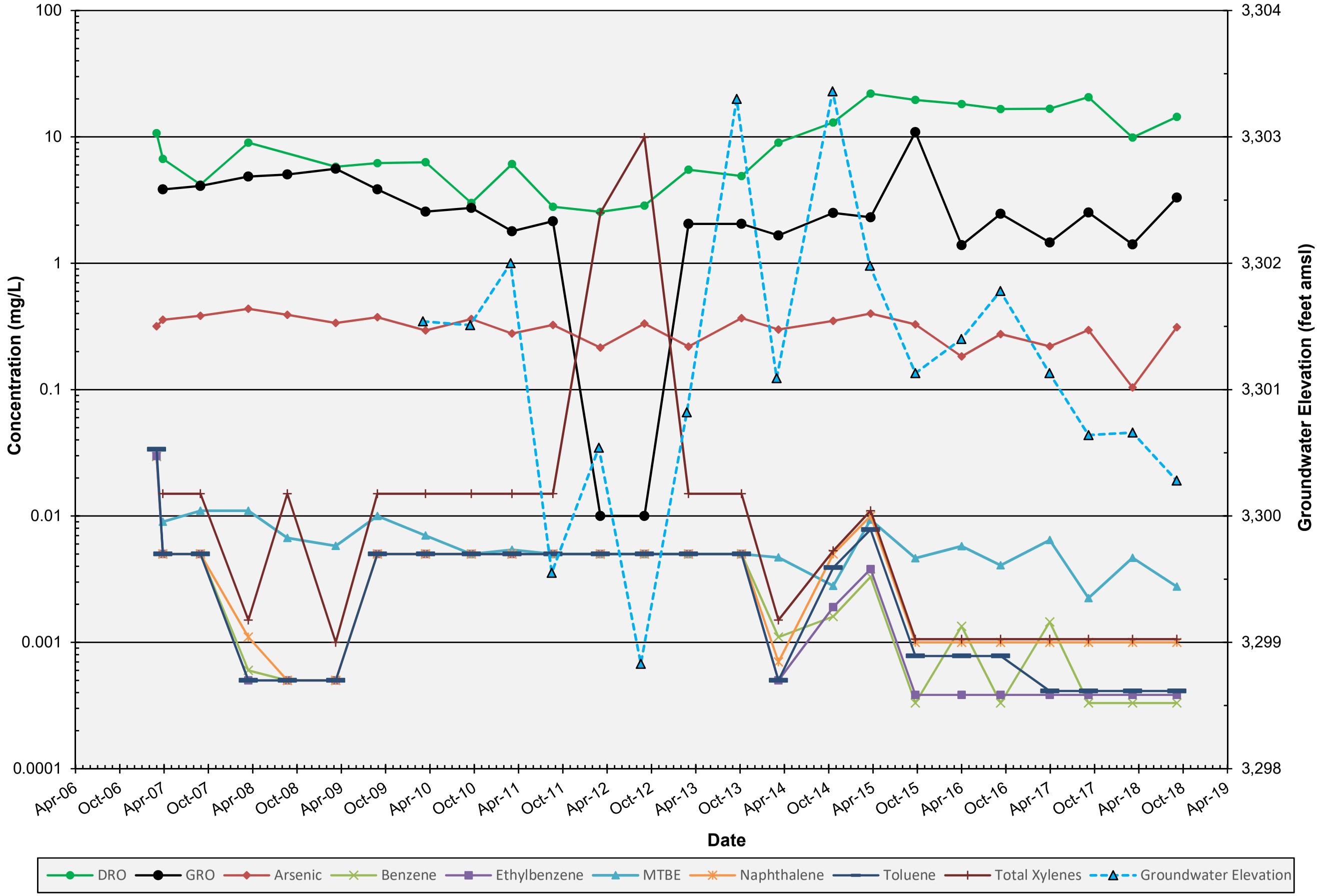
Evaporation Ponds



MW-75: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

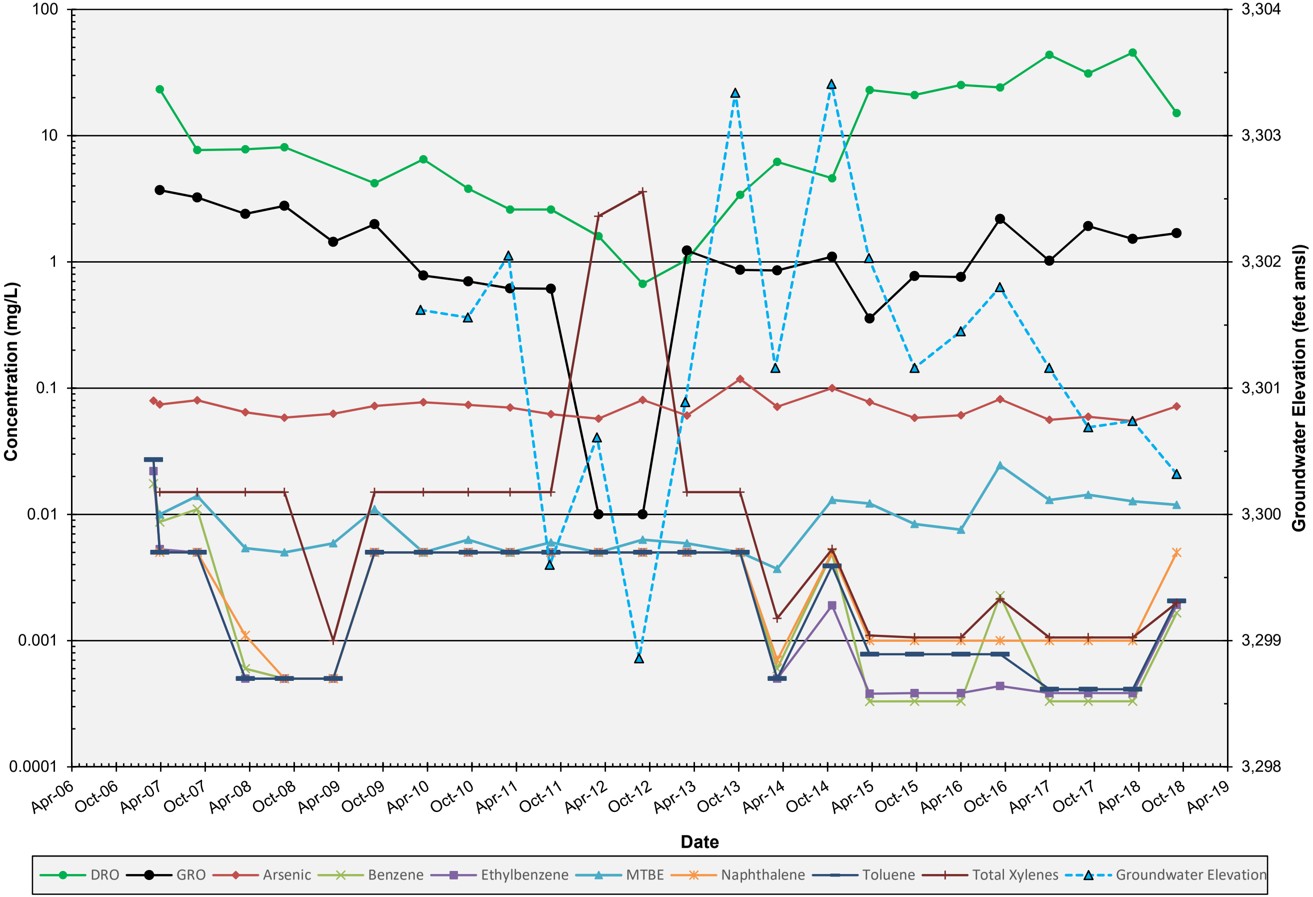
Evaporation Ponds



MW-76: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

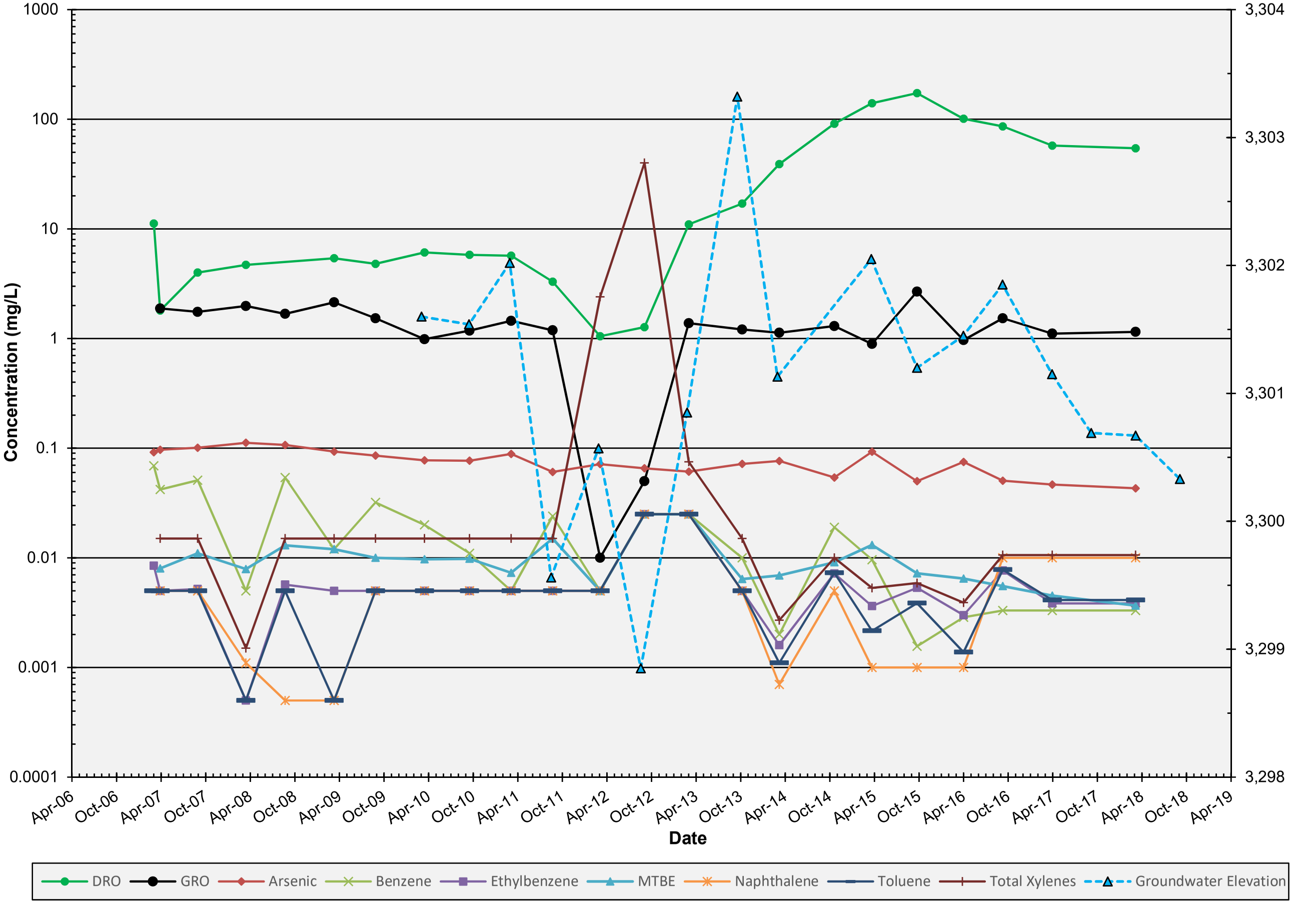
Evaporation Ponds



MW-77: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

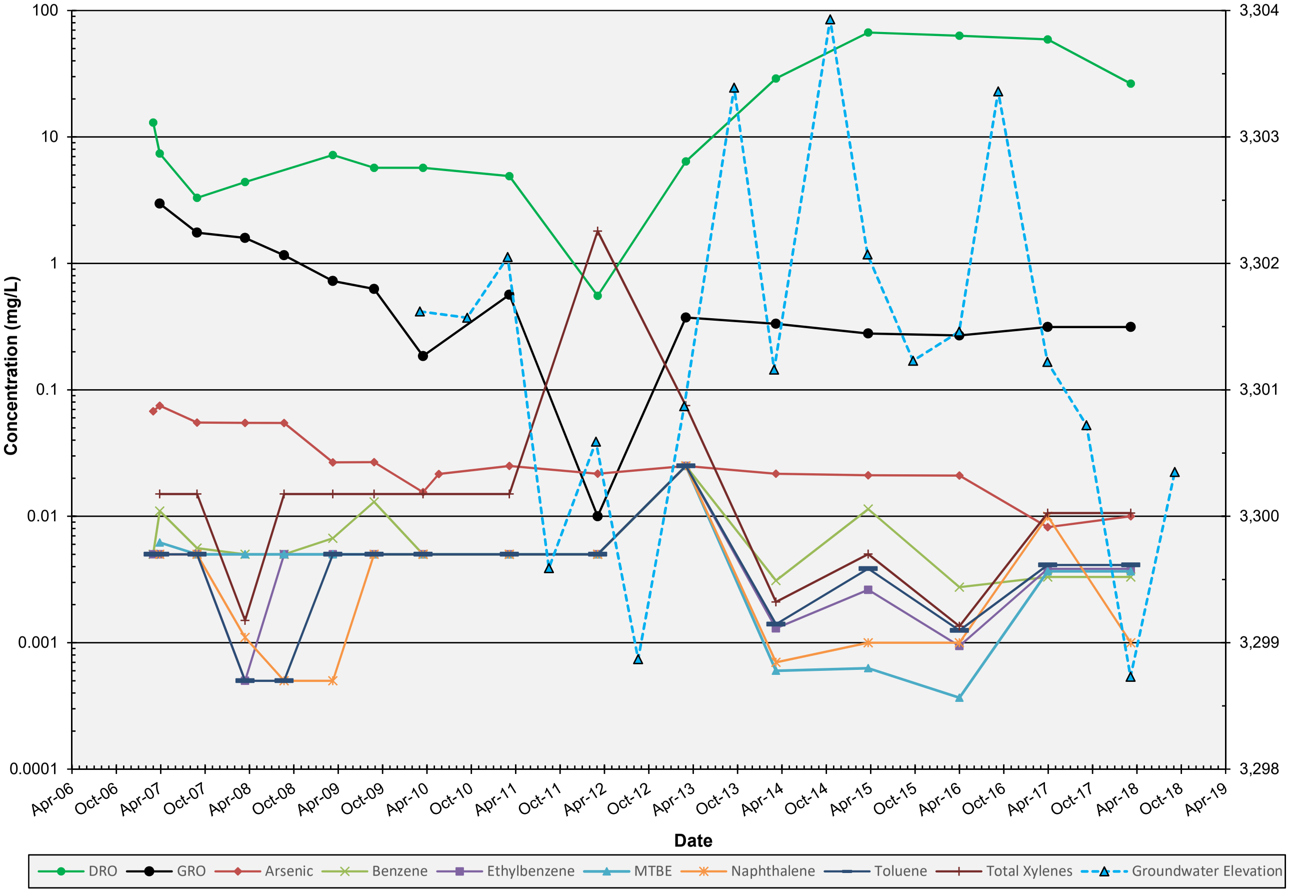
Evaporation Ponds



MW-78: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

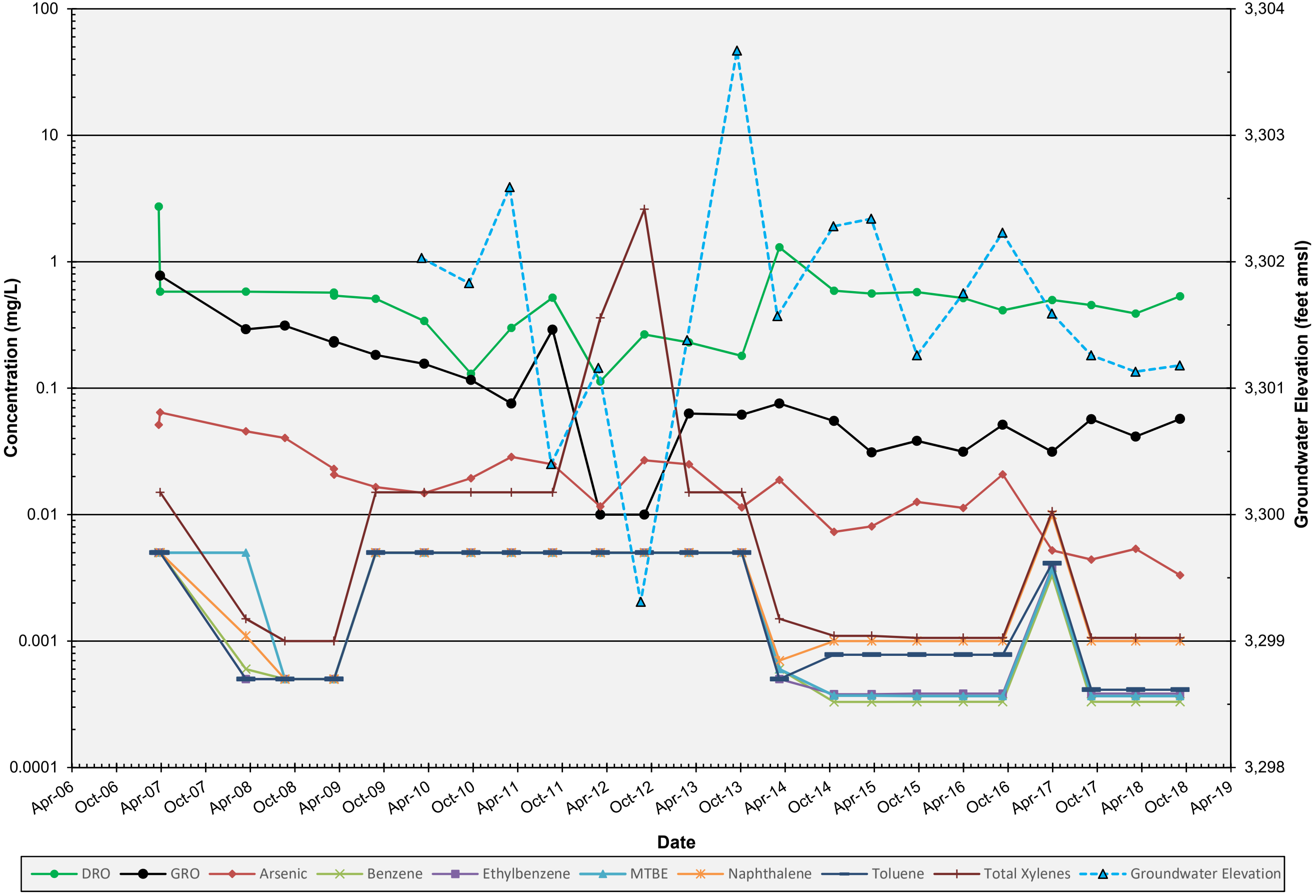
Evaporation Ponds



MW-79: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

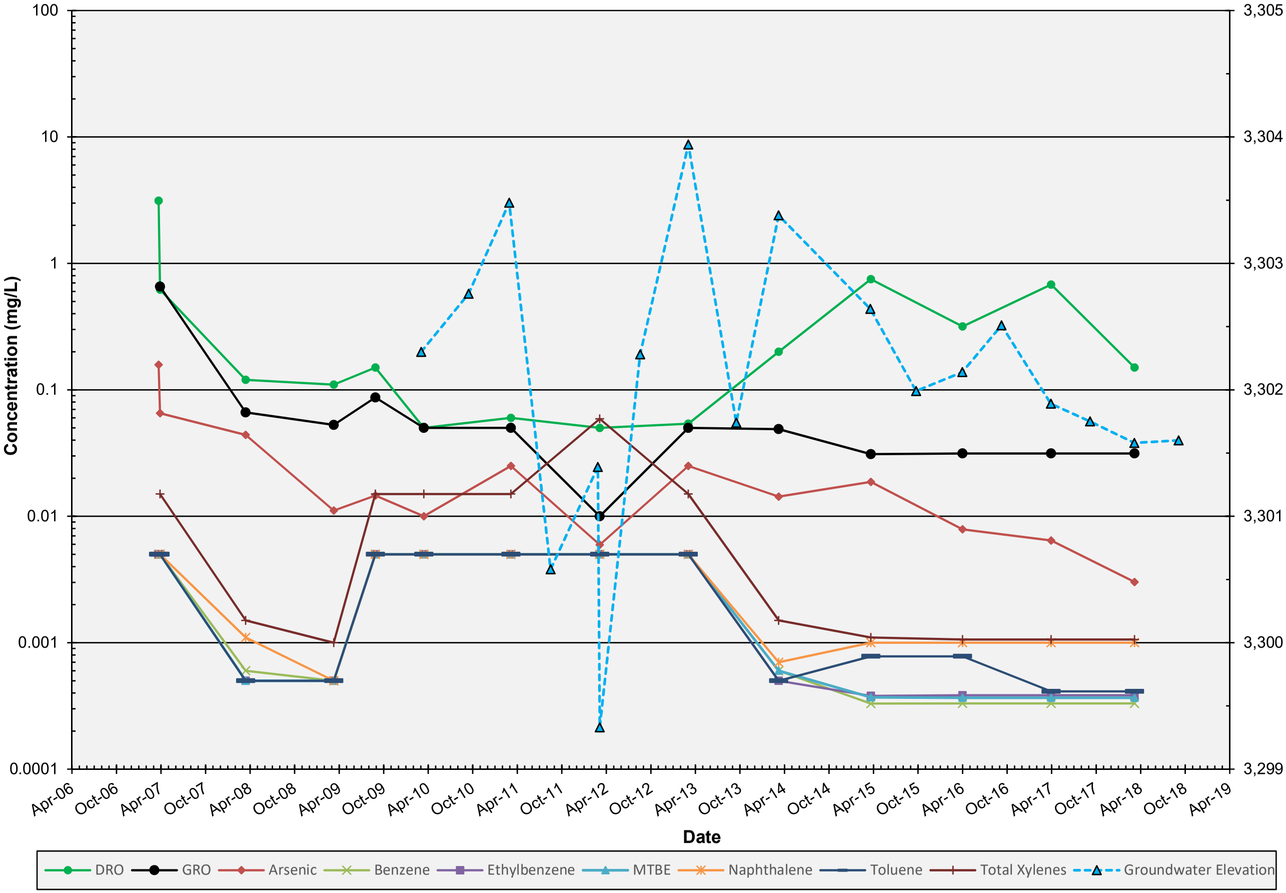
Evaporation Ponds



MW-80: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

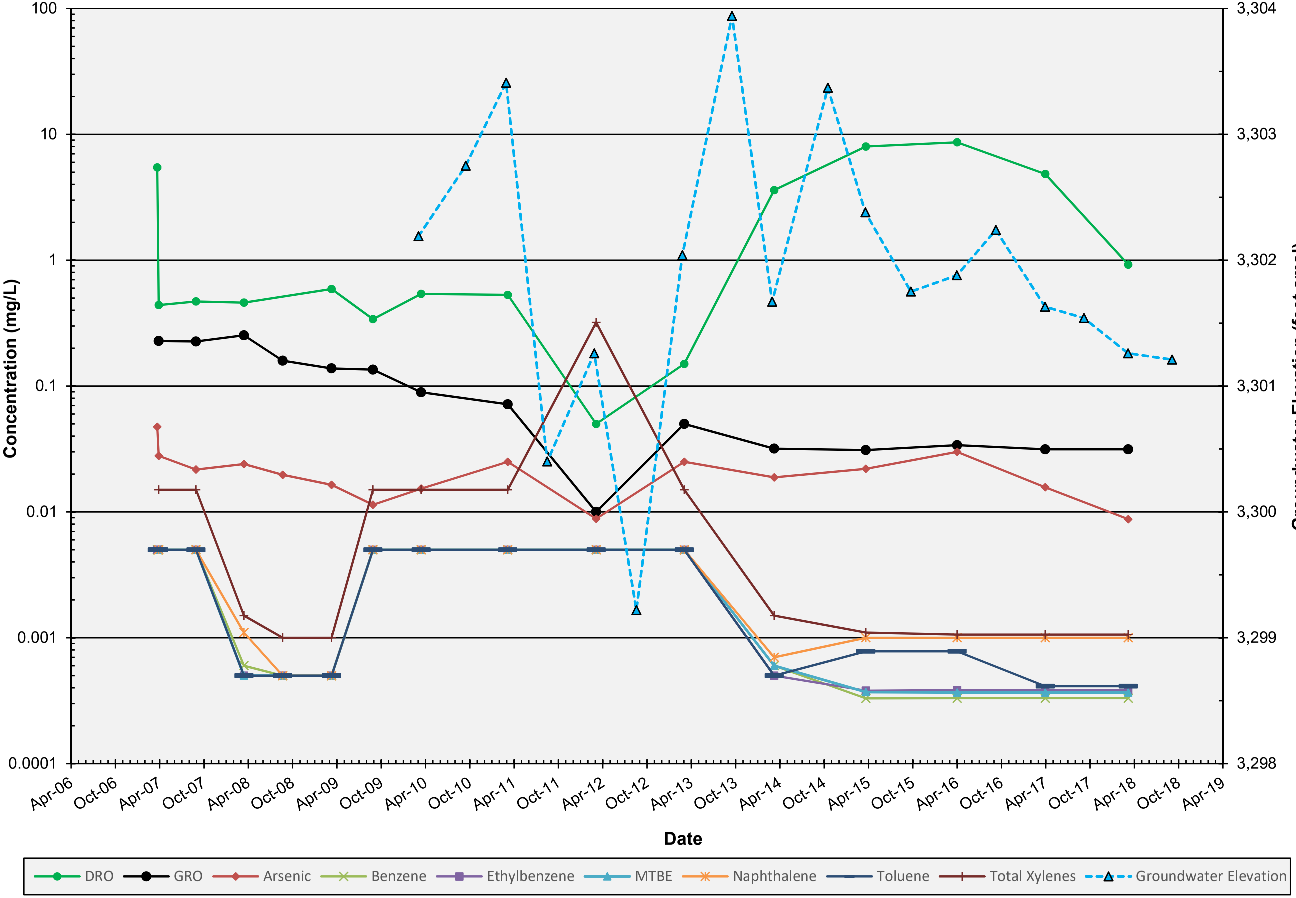
Evaporation Ponds



MW-81: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

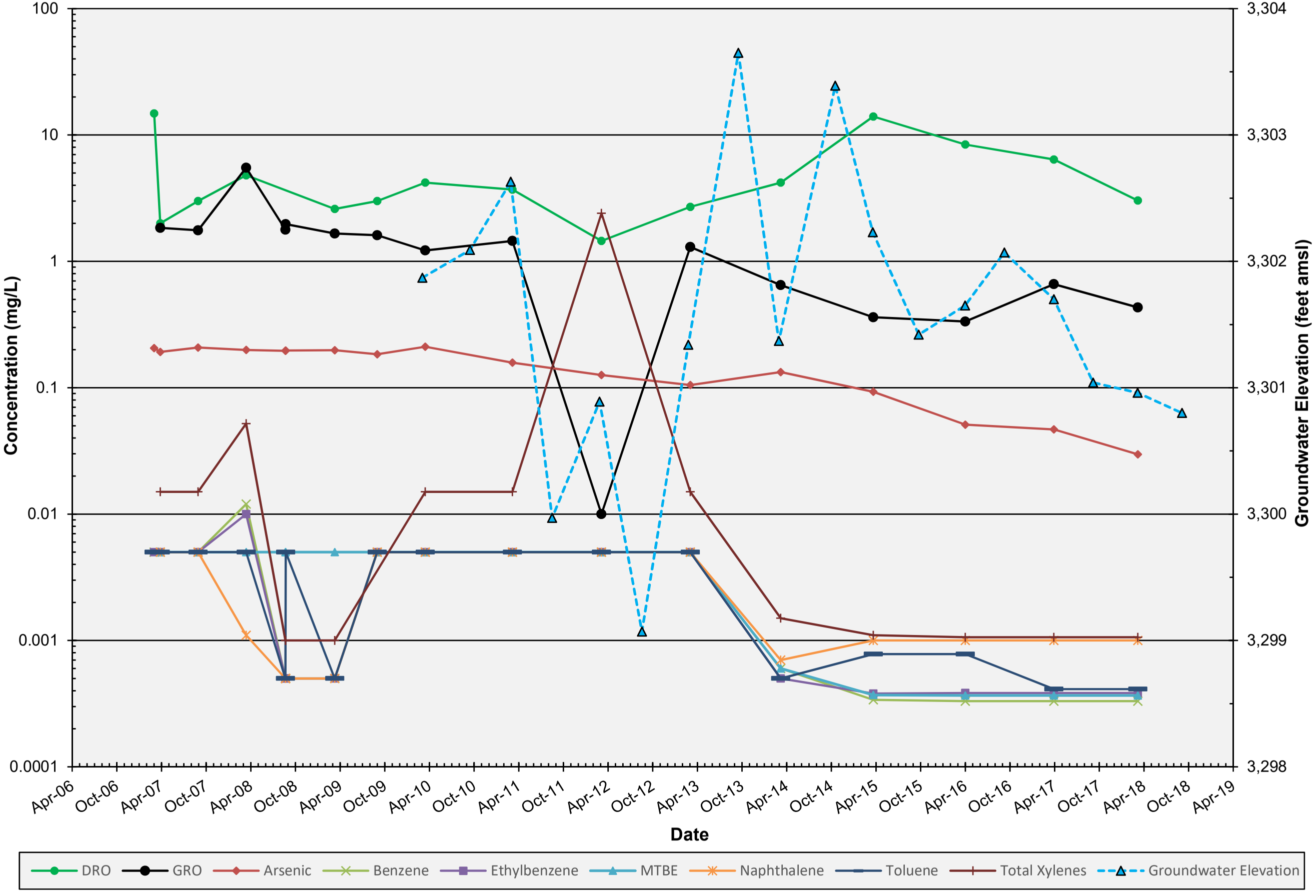
Evaporation Ponds



MW-82: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

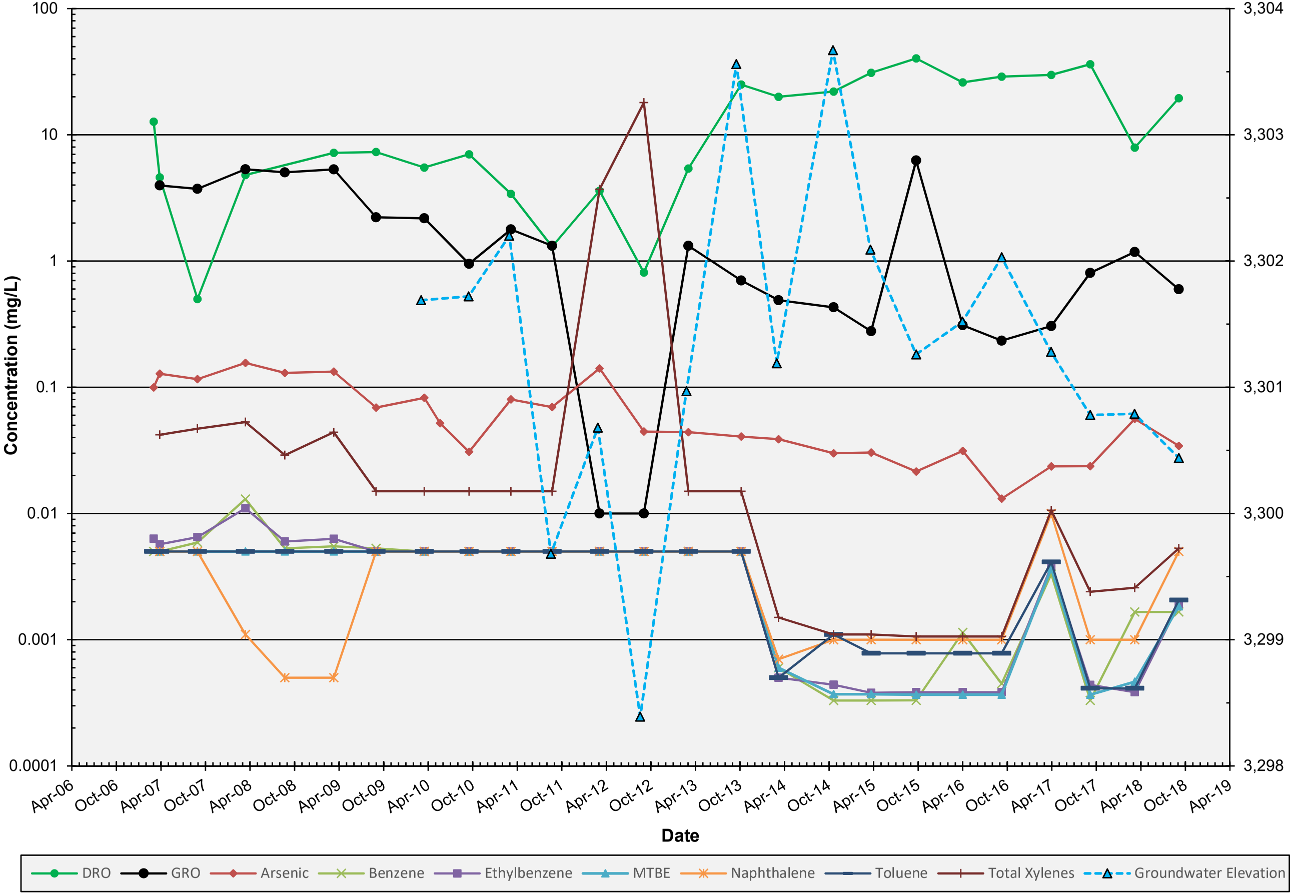
Evaporation Ponds



MW-83: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

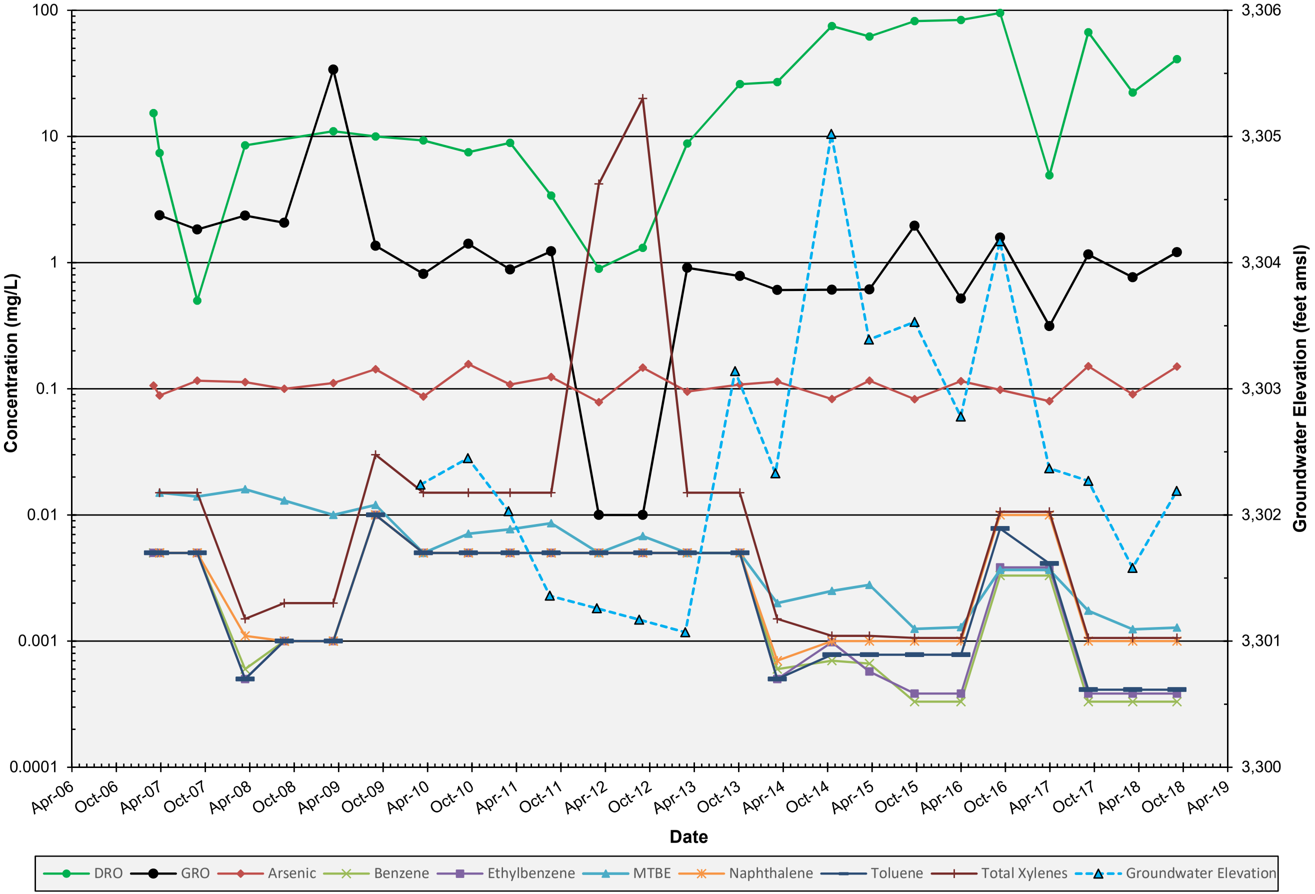
Evaporation Ponds



MW-84: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

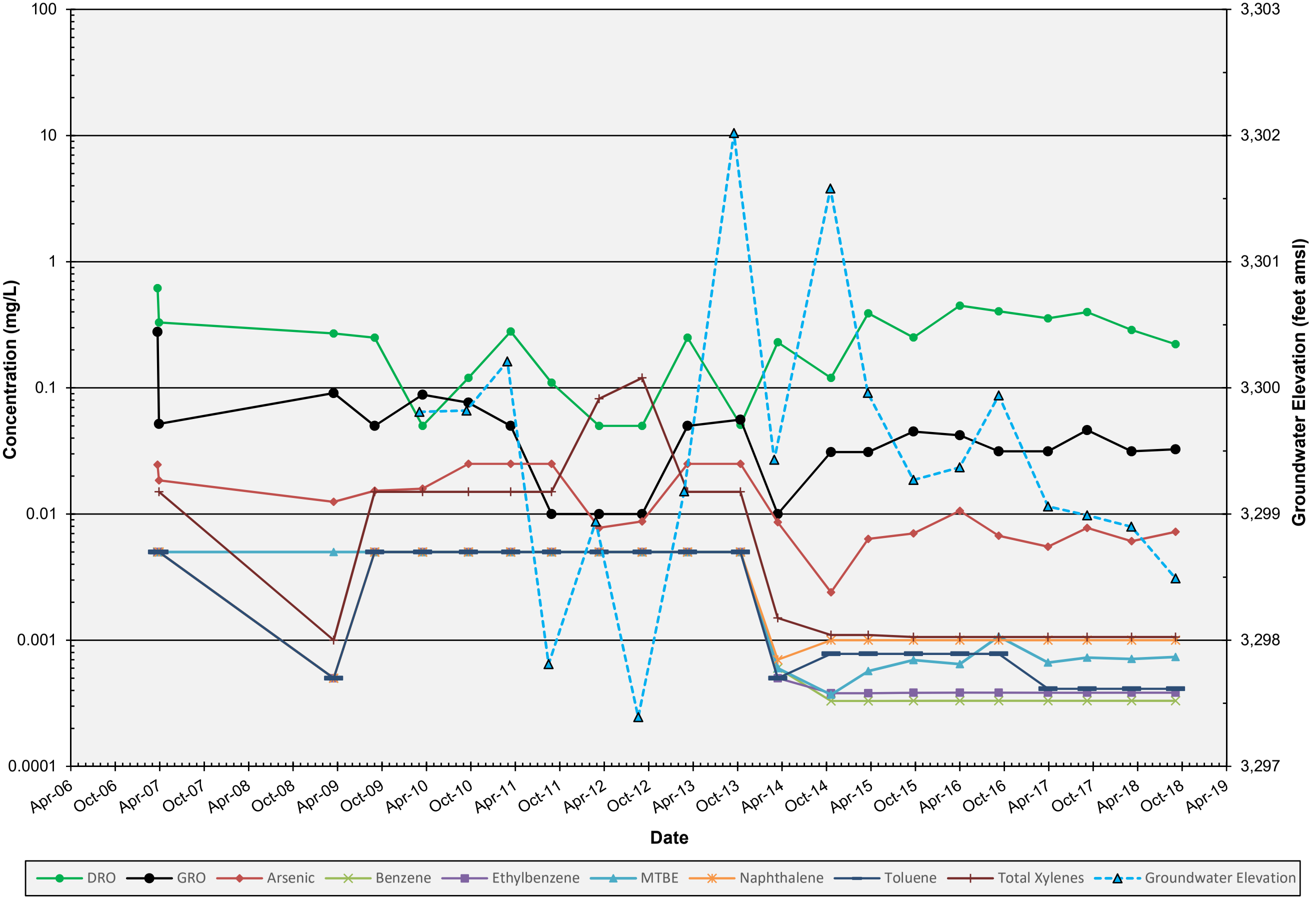
Evaporation Ponds



MW-87: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

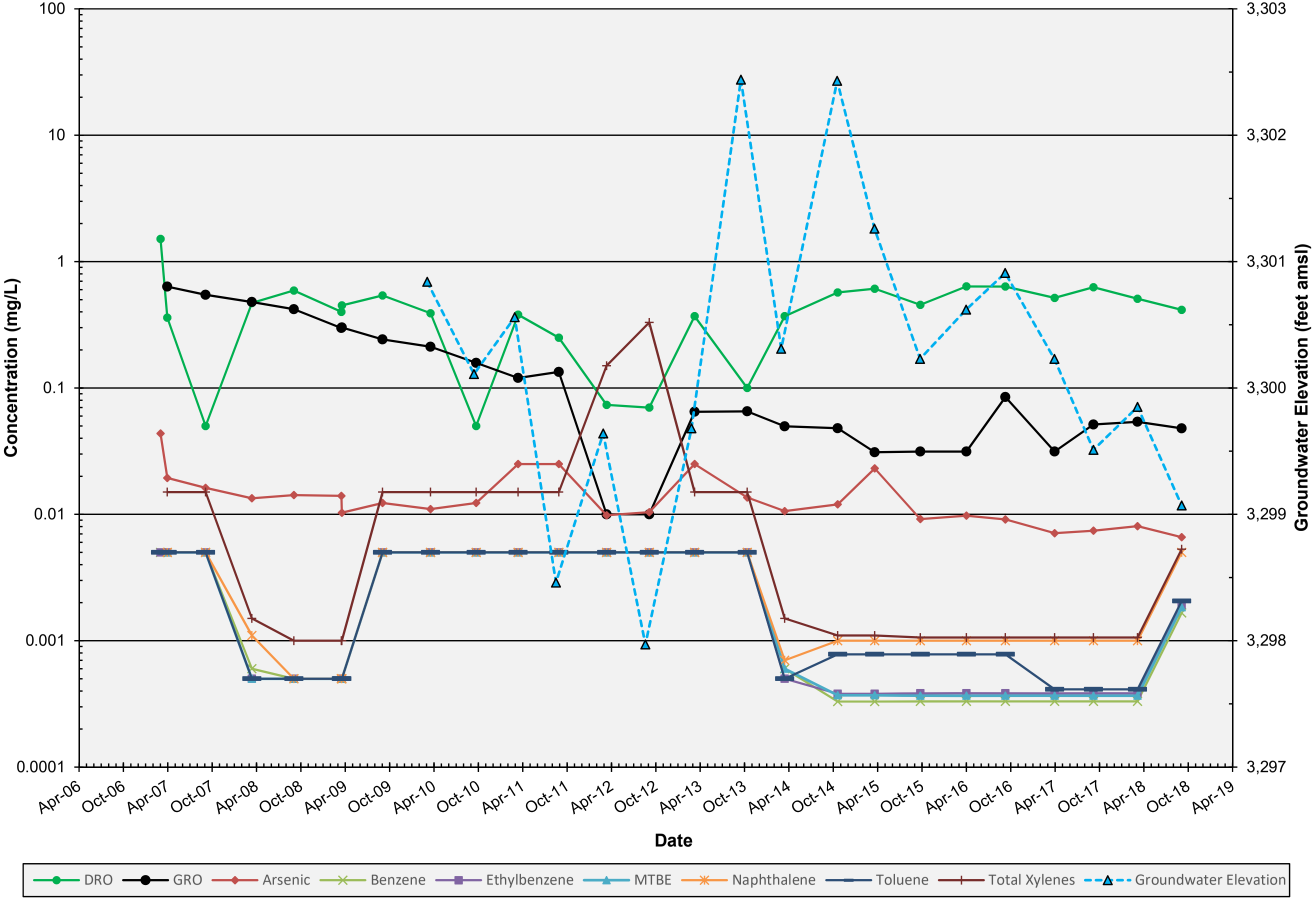
Evaporation Ponds



MW-88: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

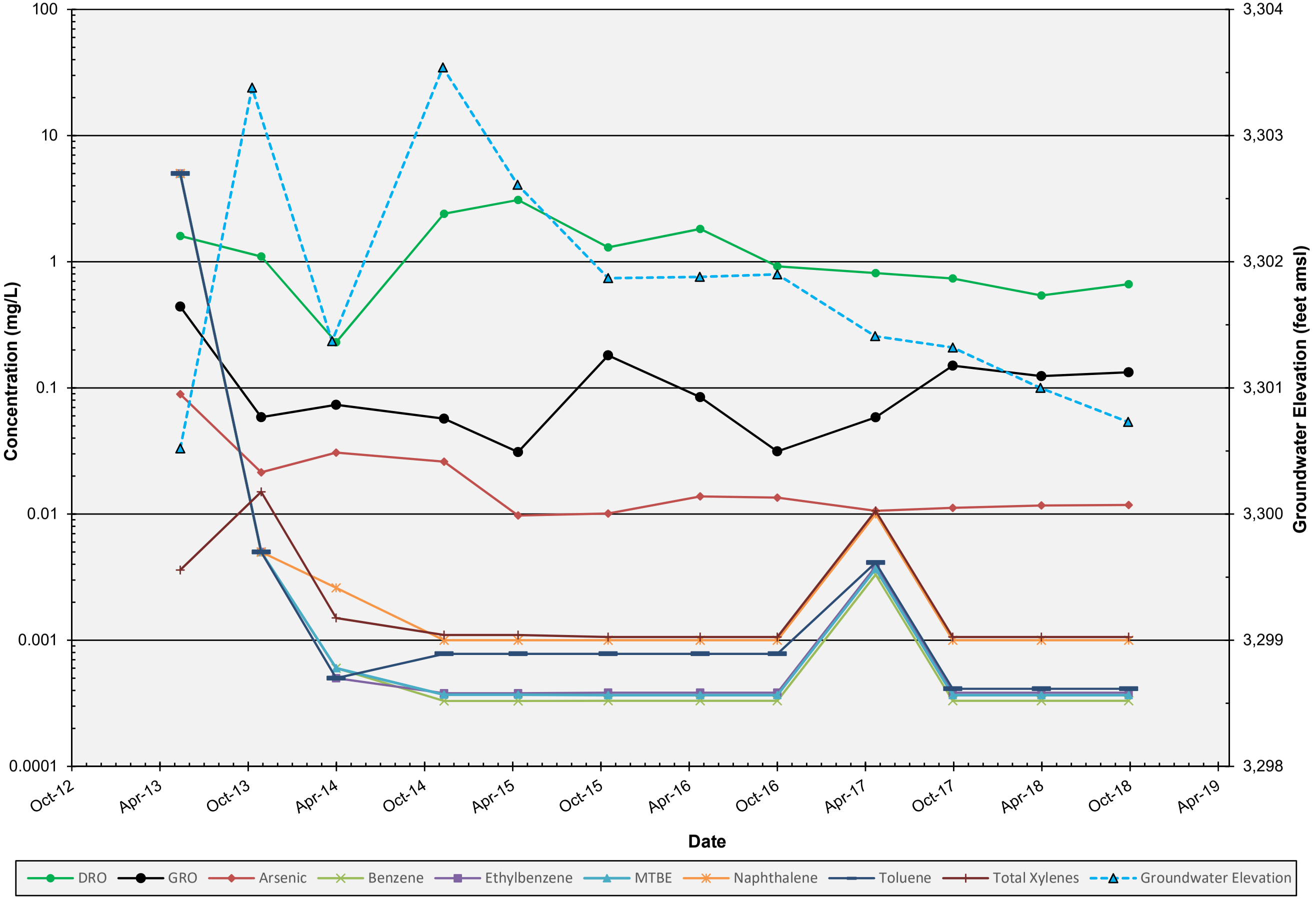
Evaporation Ponds



MW-120: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

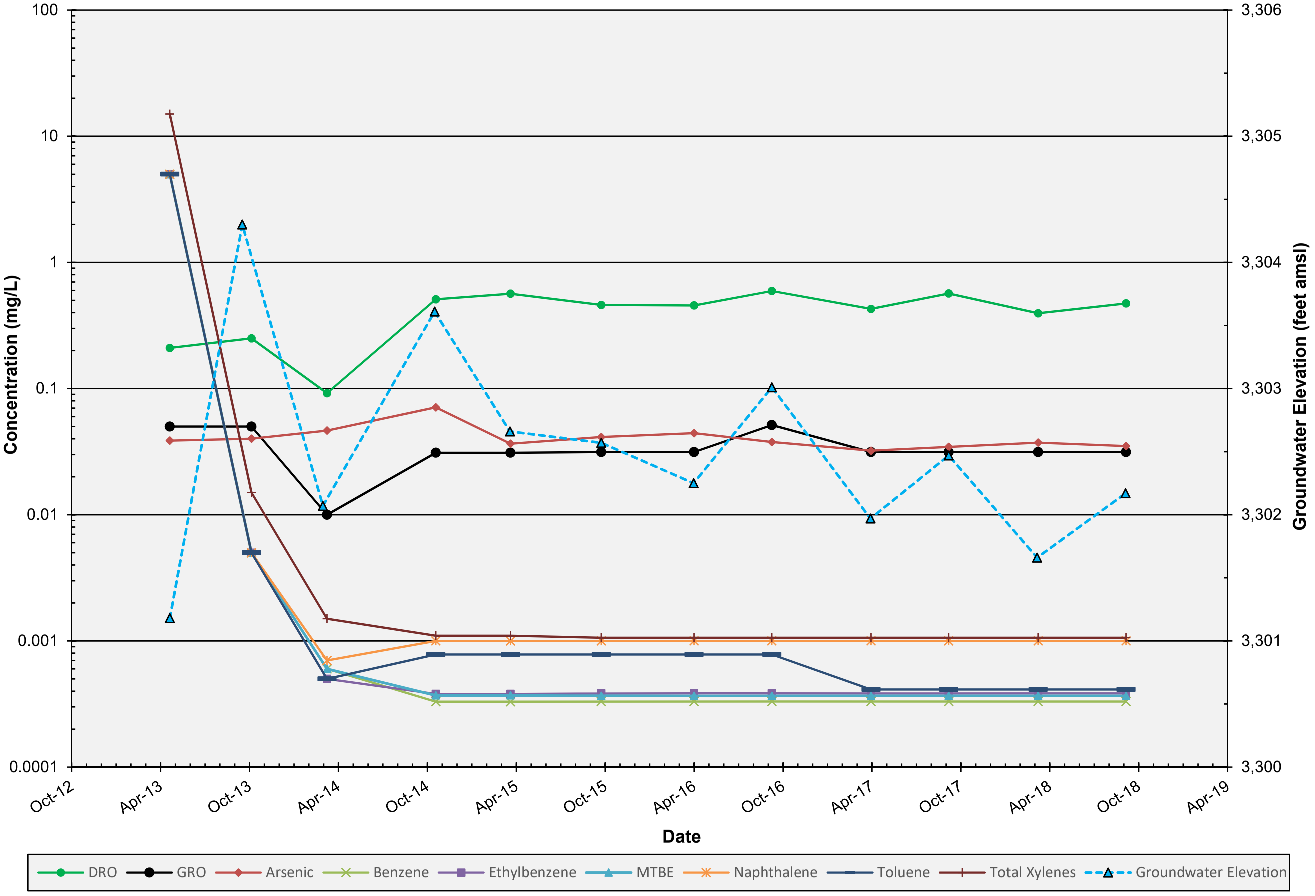
Evaporation Ponds



MW-121: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

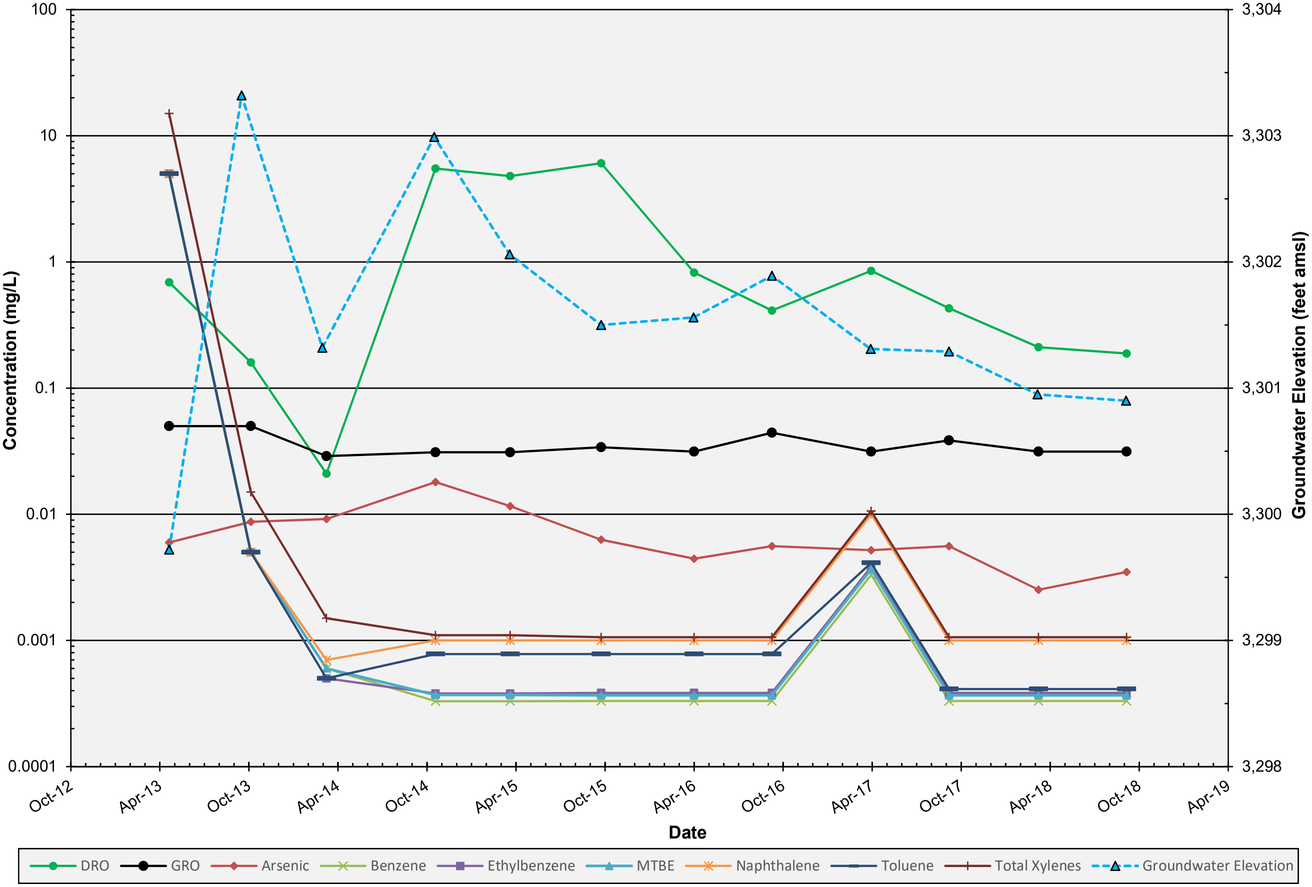
Evaporation Ponds



MW-122: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

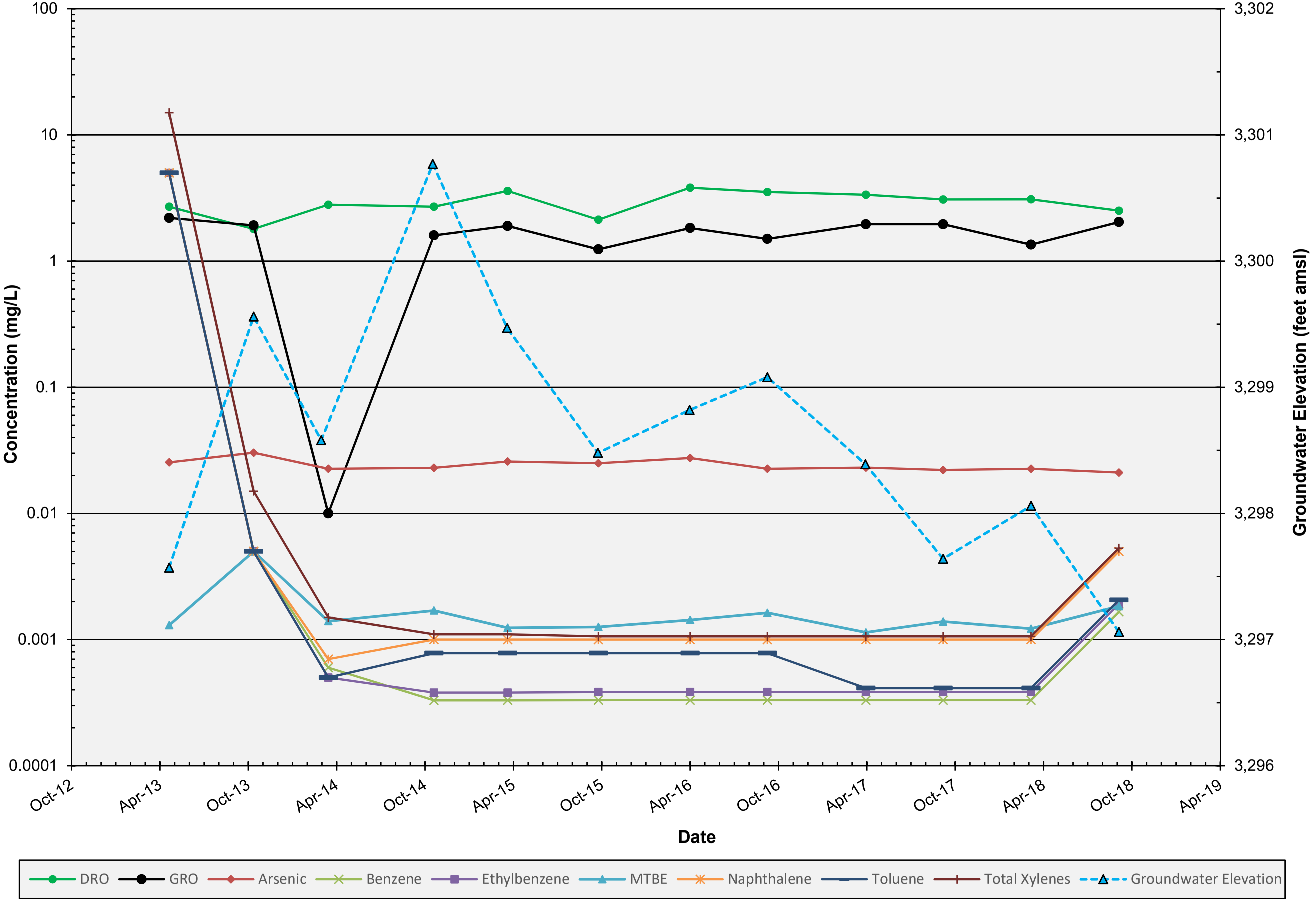
Evaporation Ponds



MW-123: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

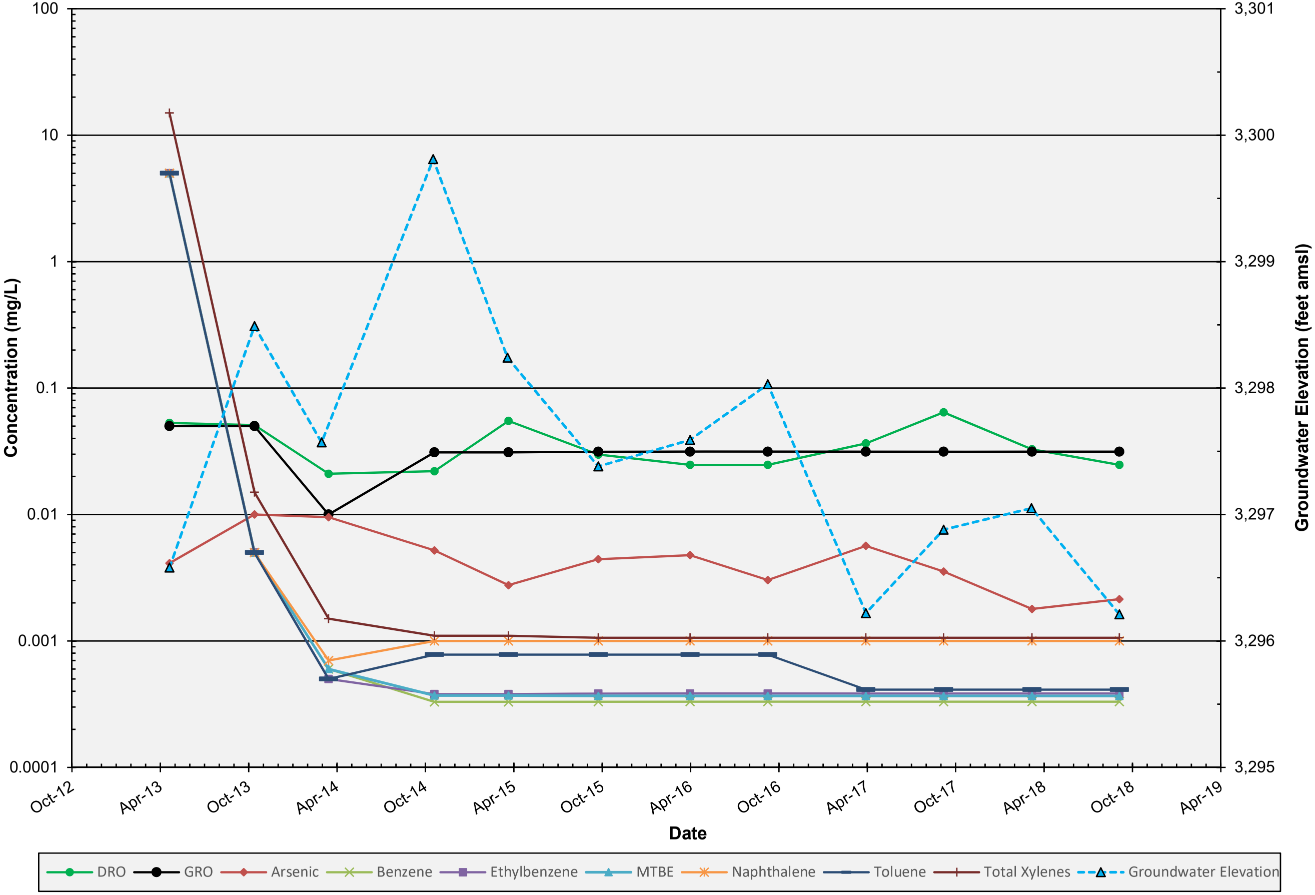
Evaporation Ponds



MW-124: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

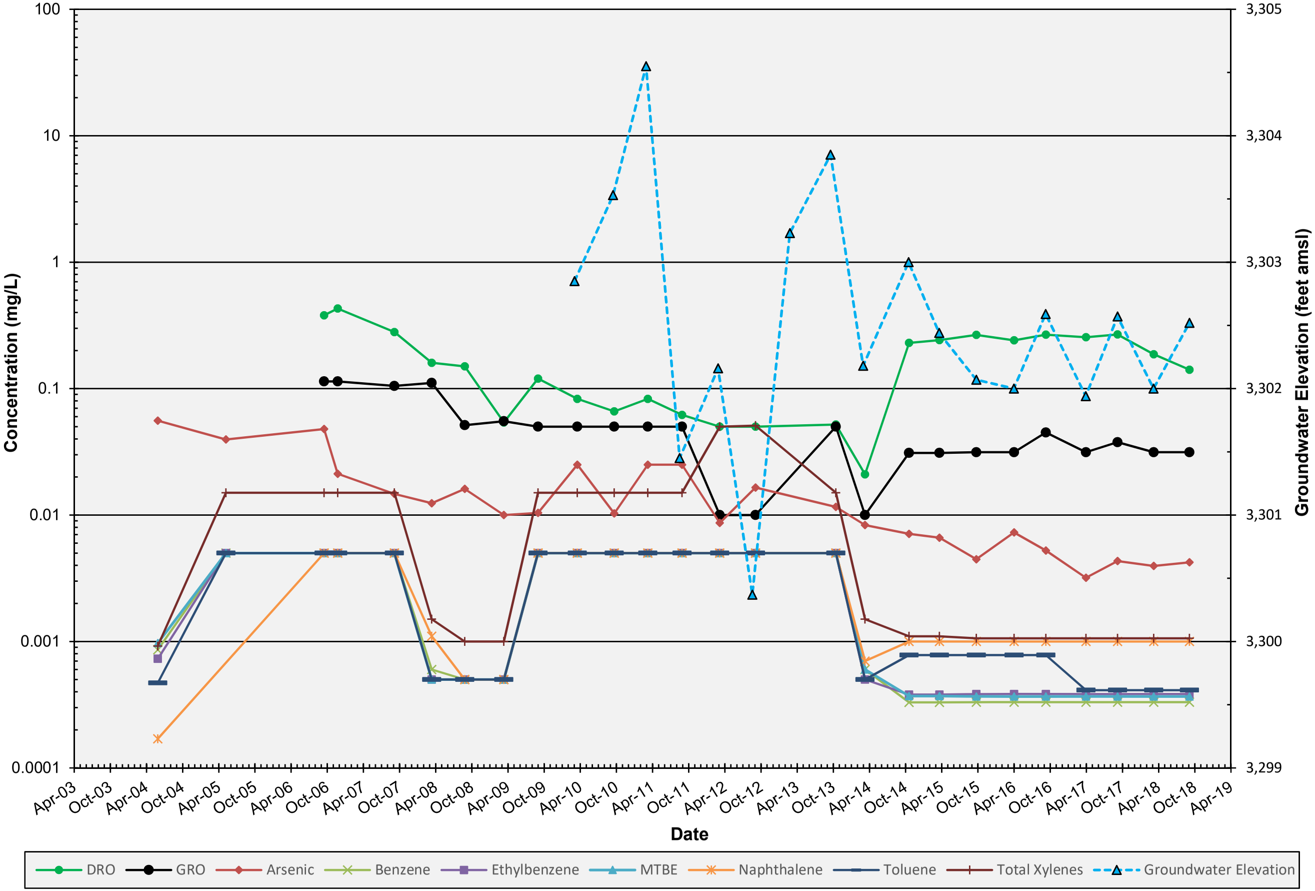
Evaporation Ponds



OCD-1 & OCD-1R: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

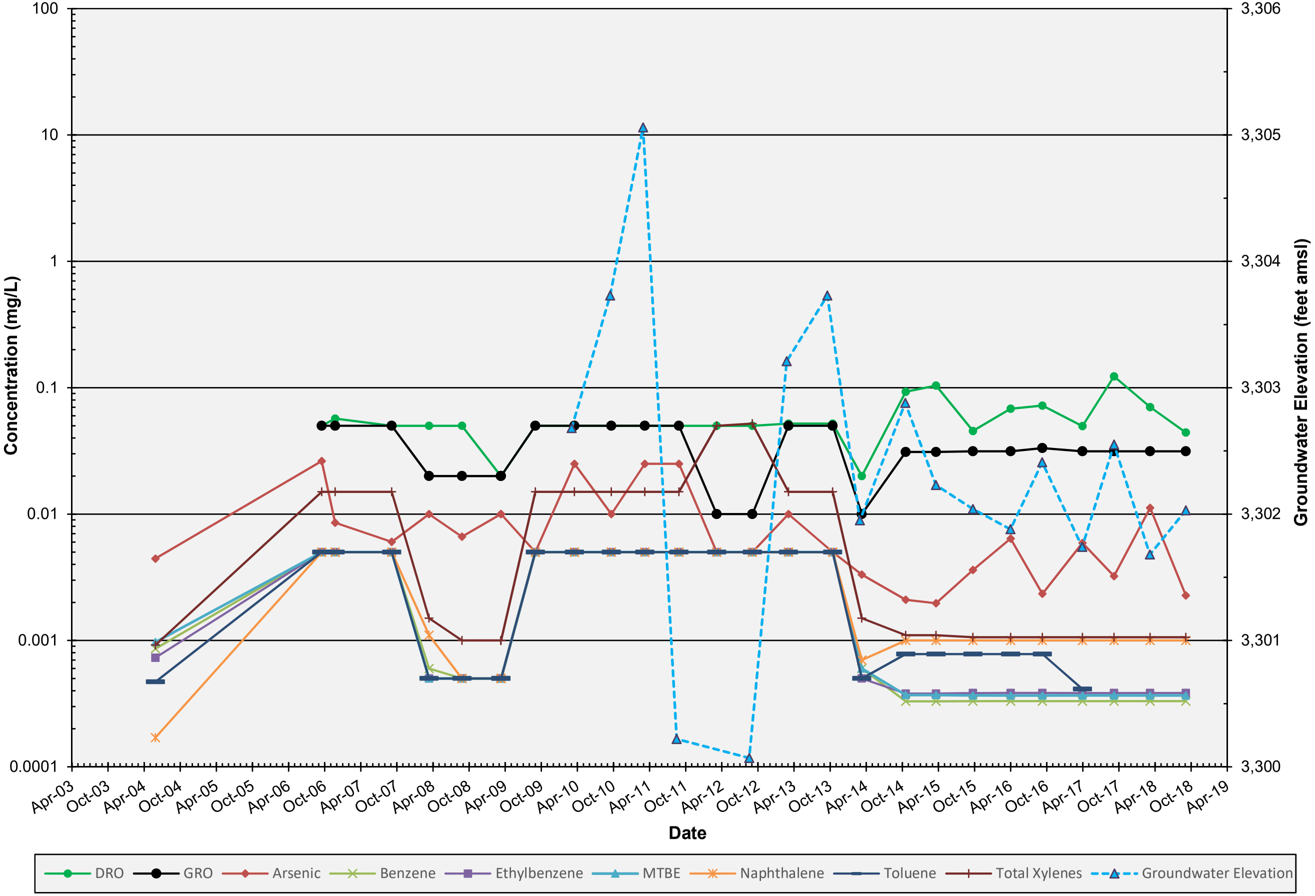
Evaporation Ponds



OCD-2A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

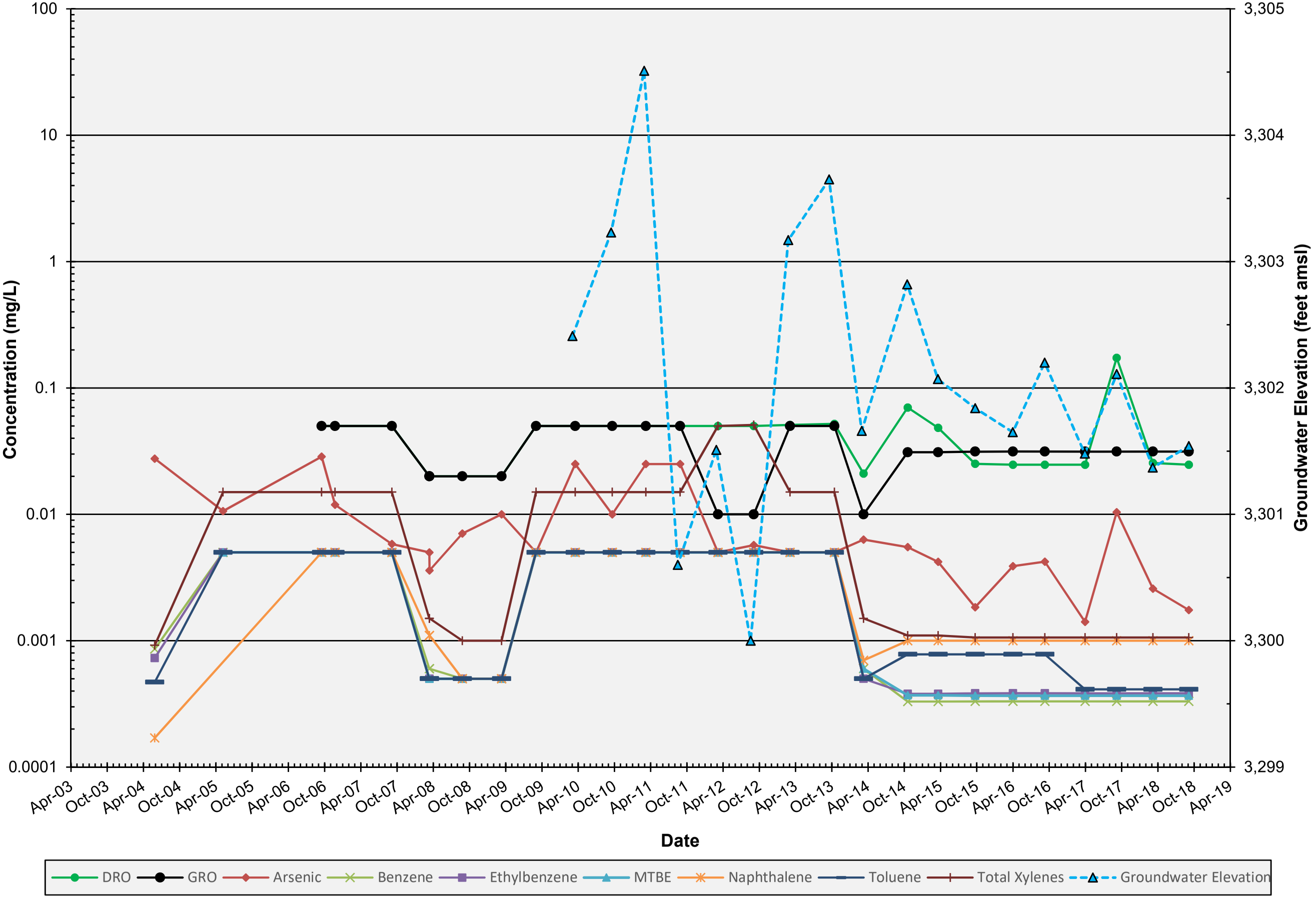
Evaporation Ponds



OCD-3: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

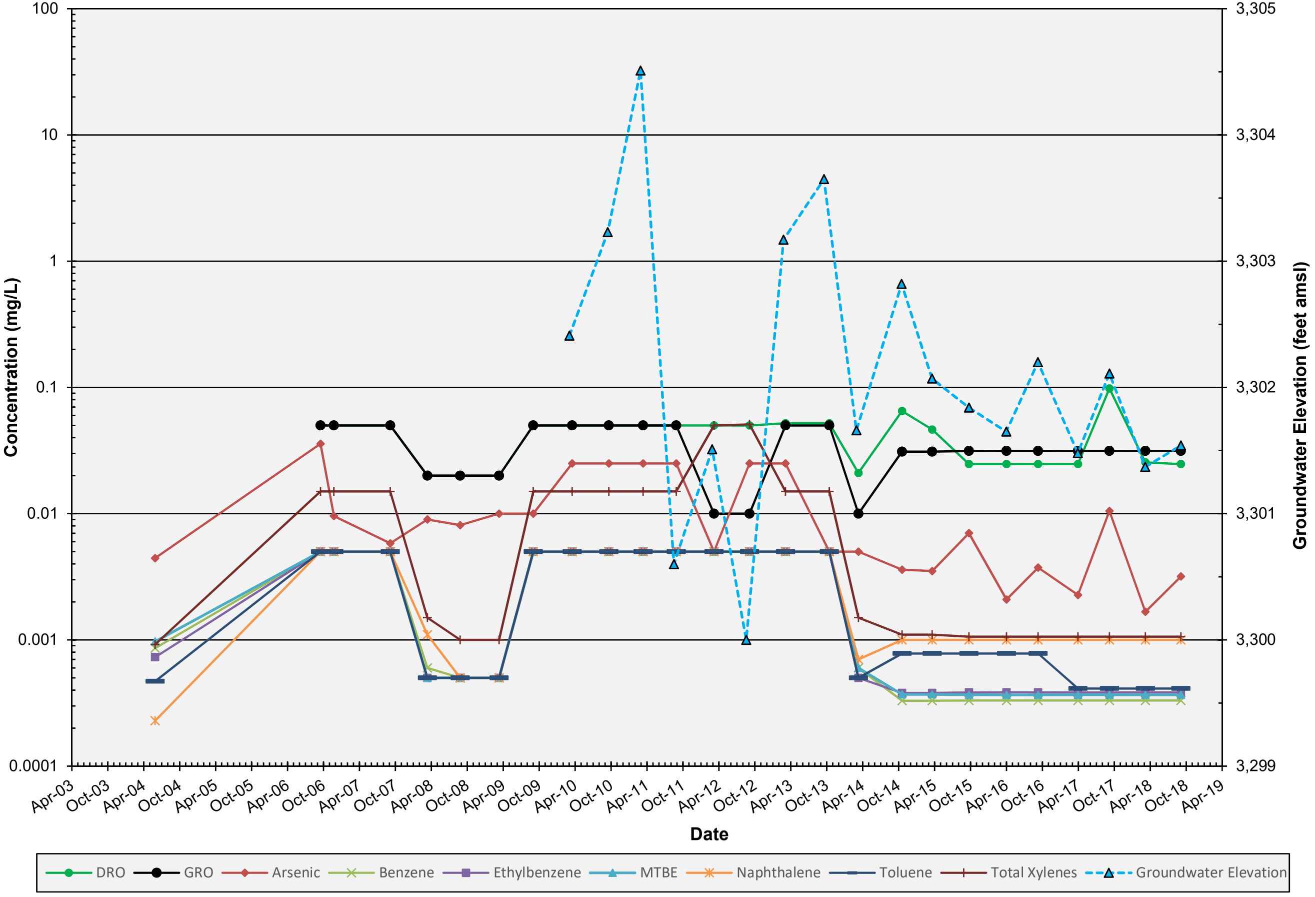
Evaporation Ponds



OCD-4: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

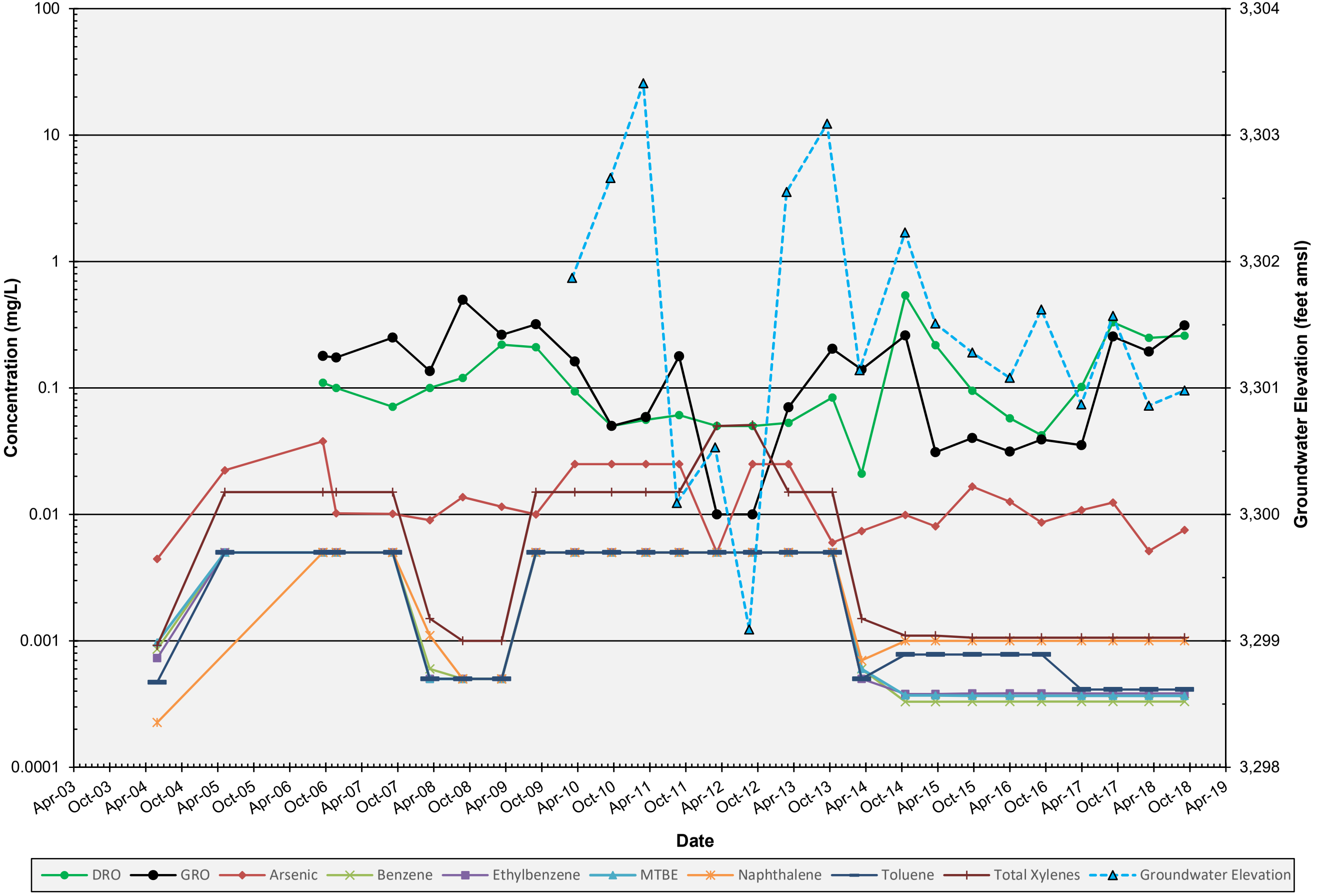
Evaporation Ponds



OCD-5: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

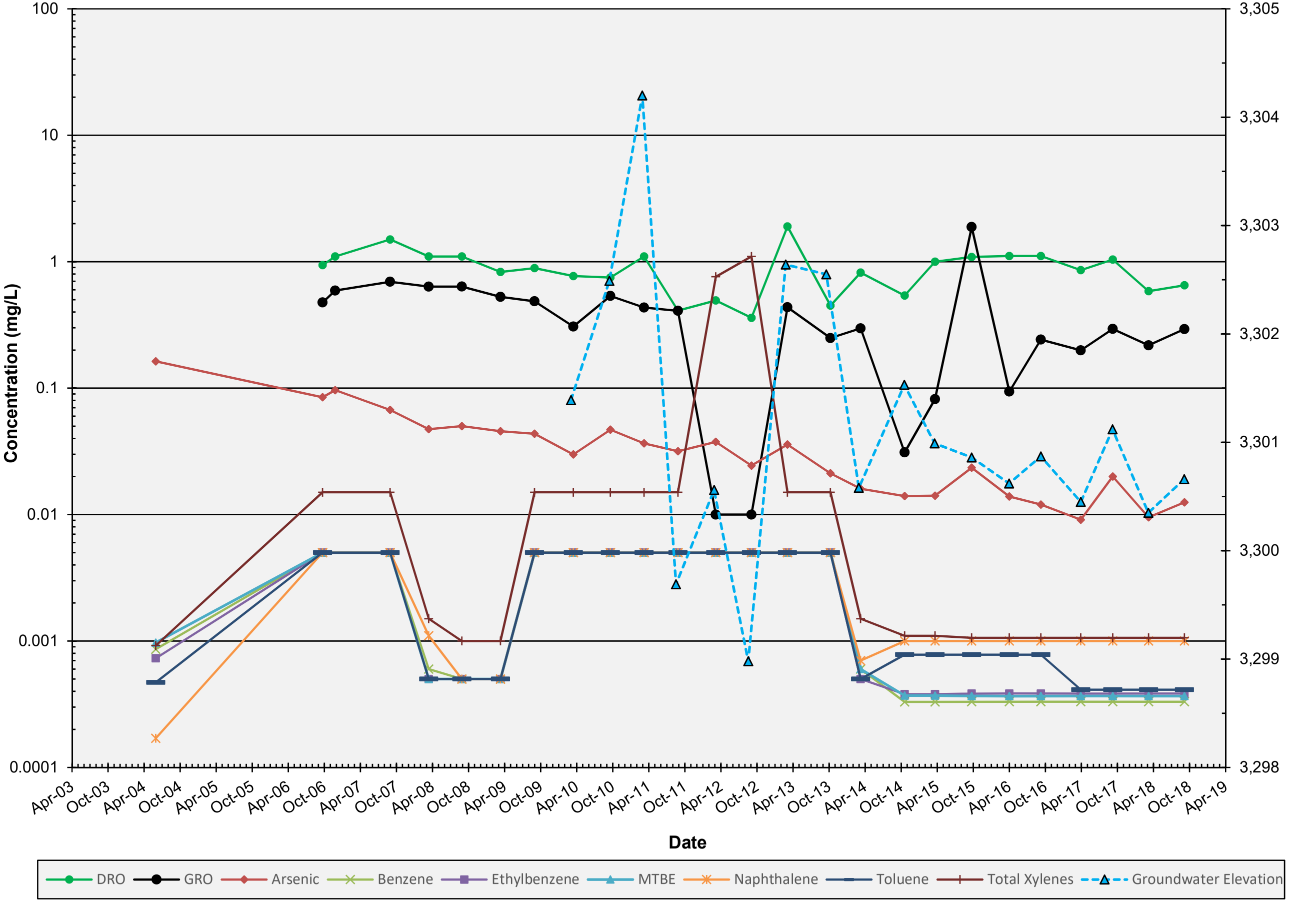
Evaporation Ponds



OCD-6: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

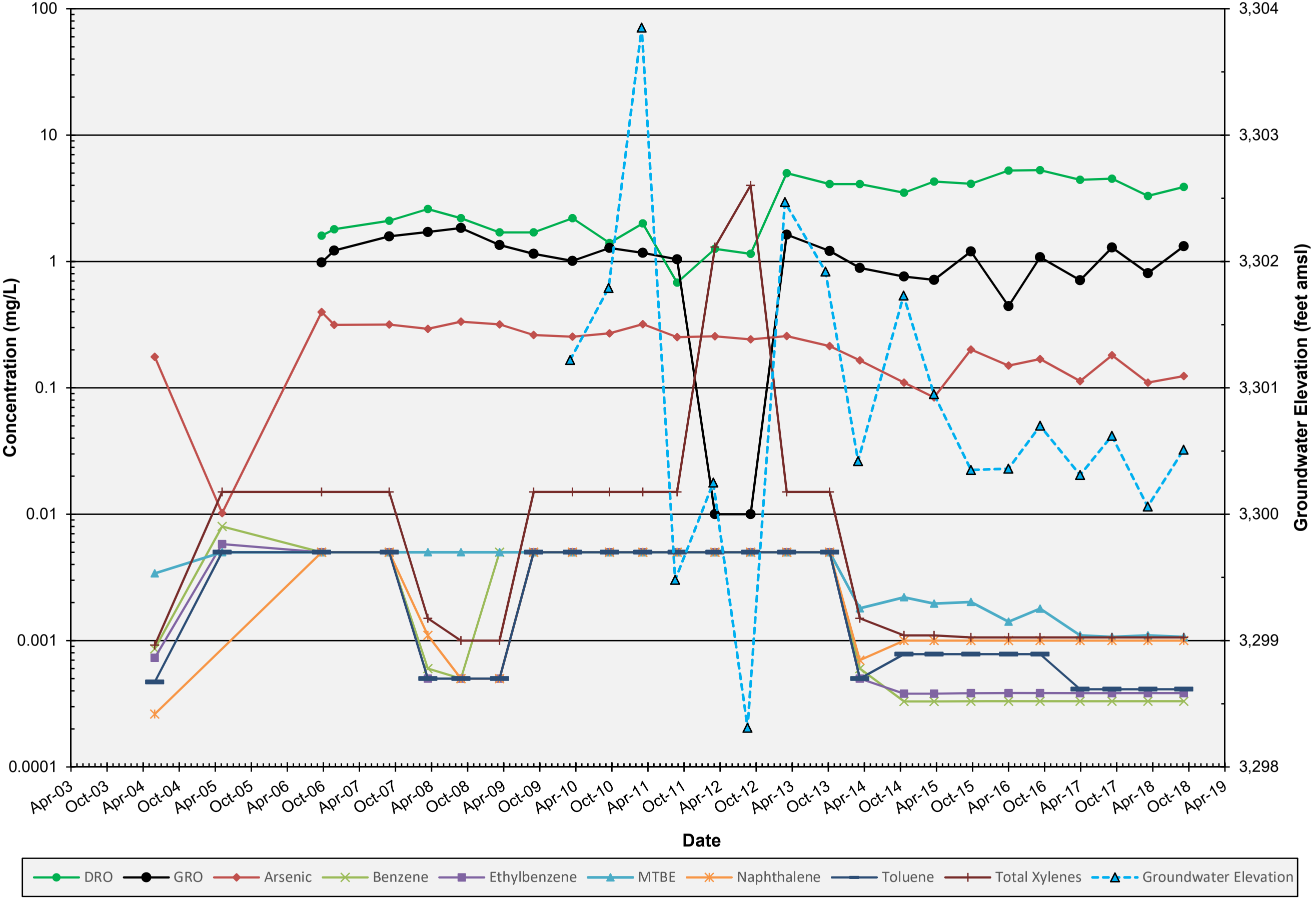
Evaporation Ponds



OCD-7A & OCD-7AR: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

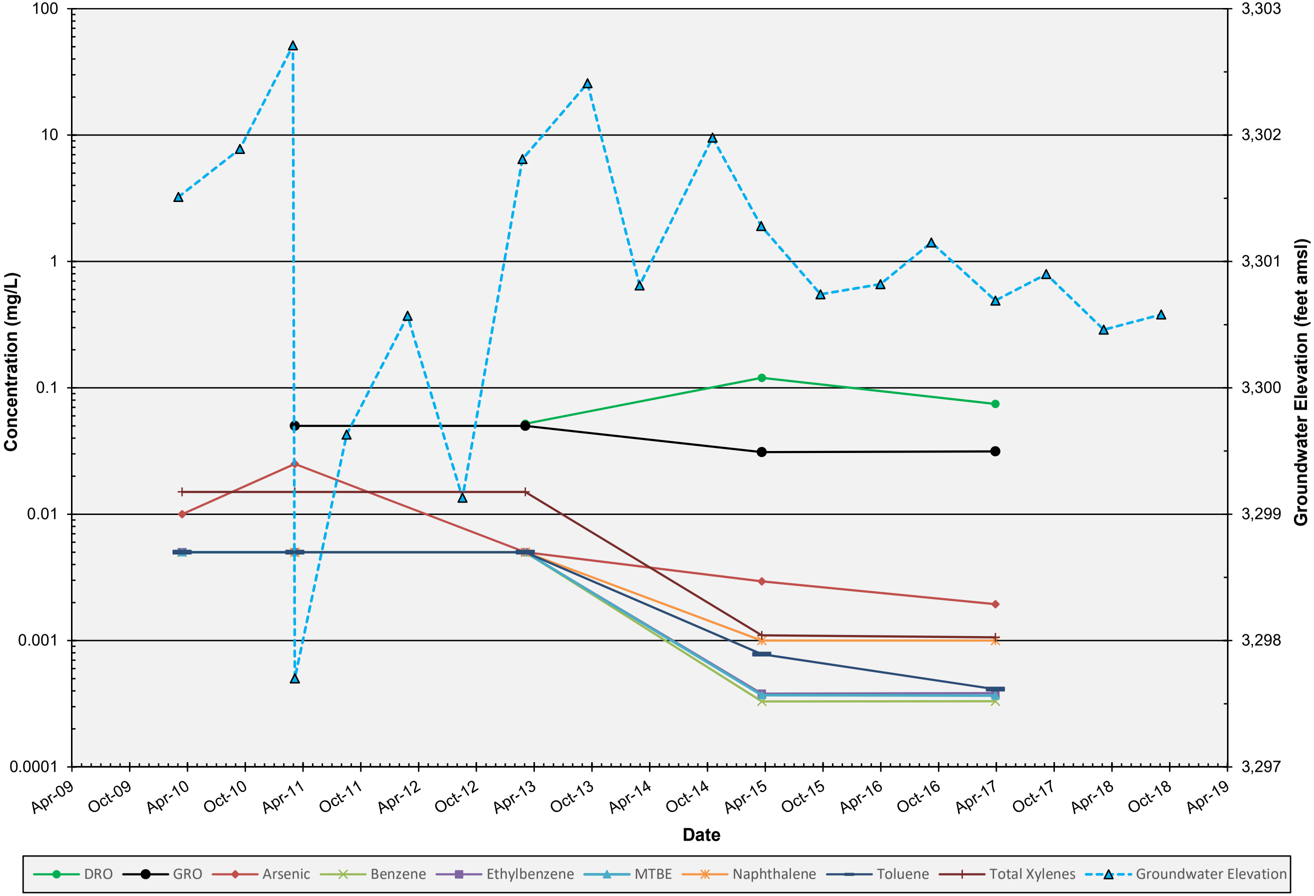
Evaporation Ponds



OCD-7B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

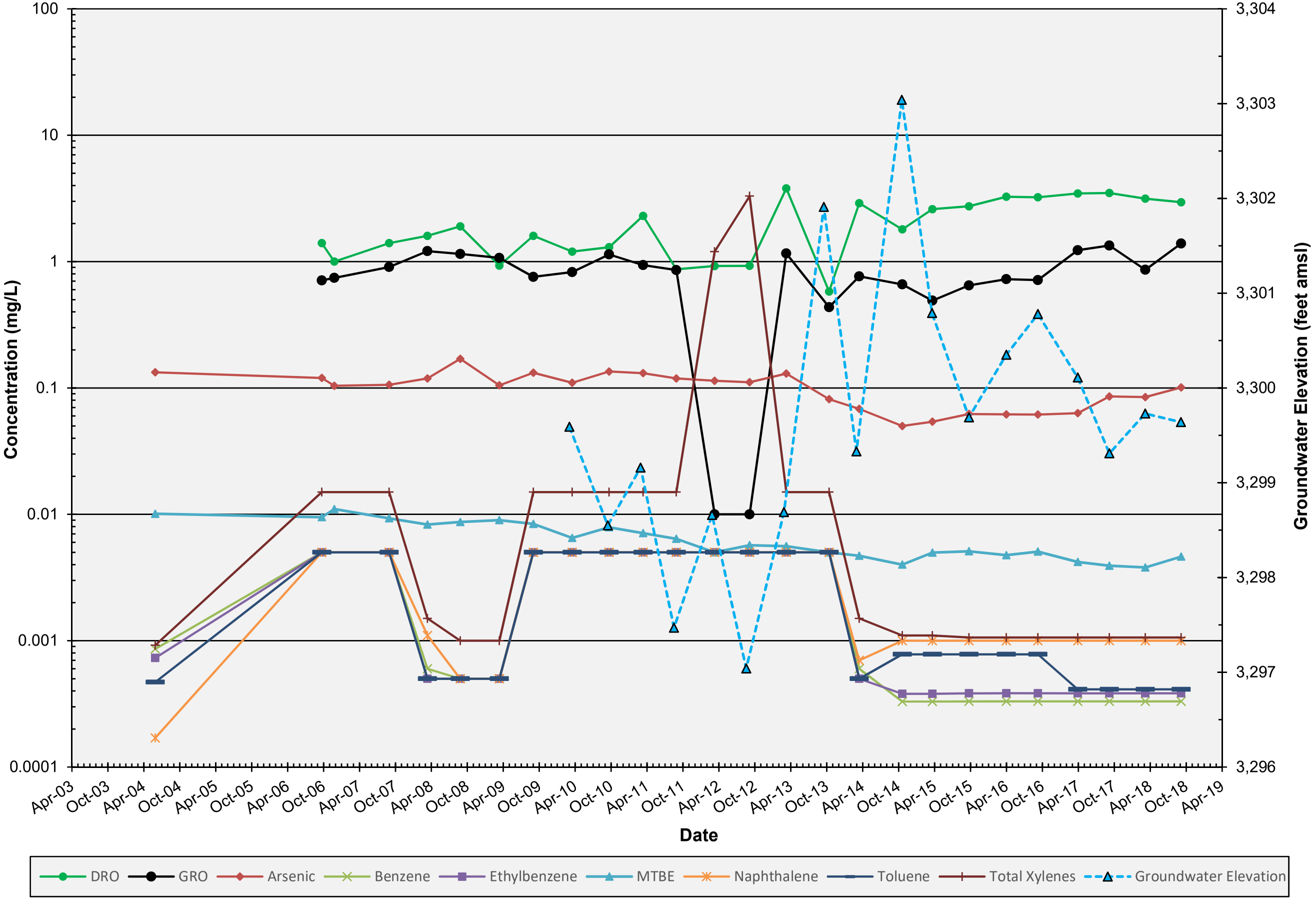
Evaporation Ponds



OCD-8A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

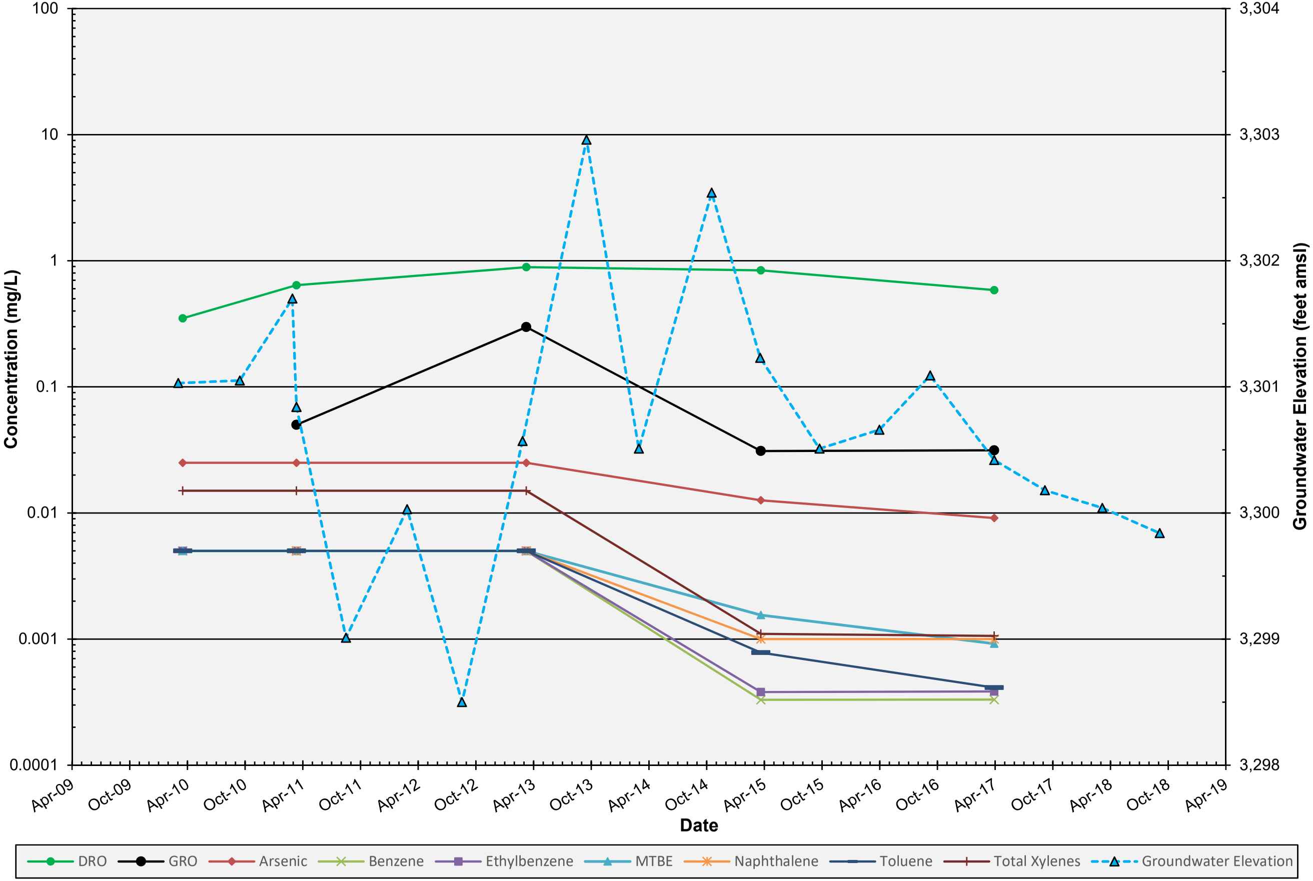
Evaporation Ponds



OCD-8B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

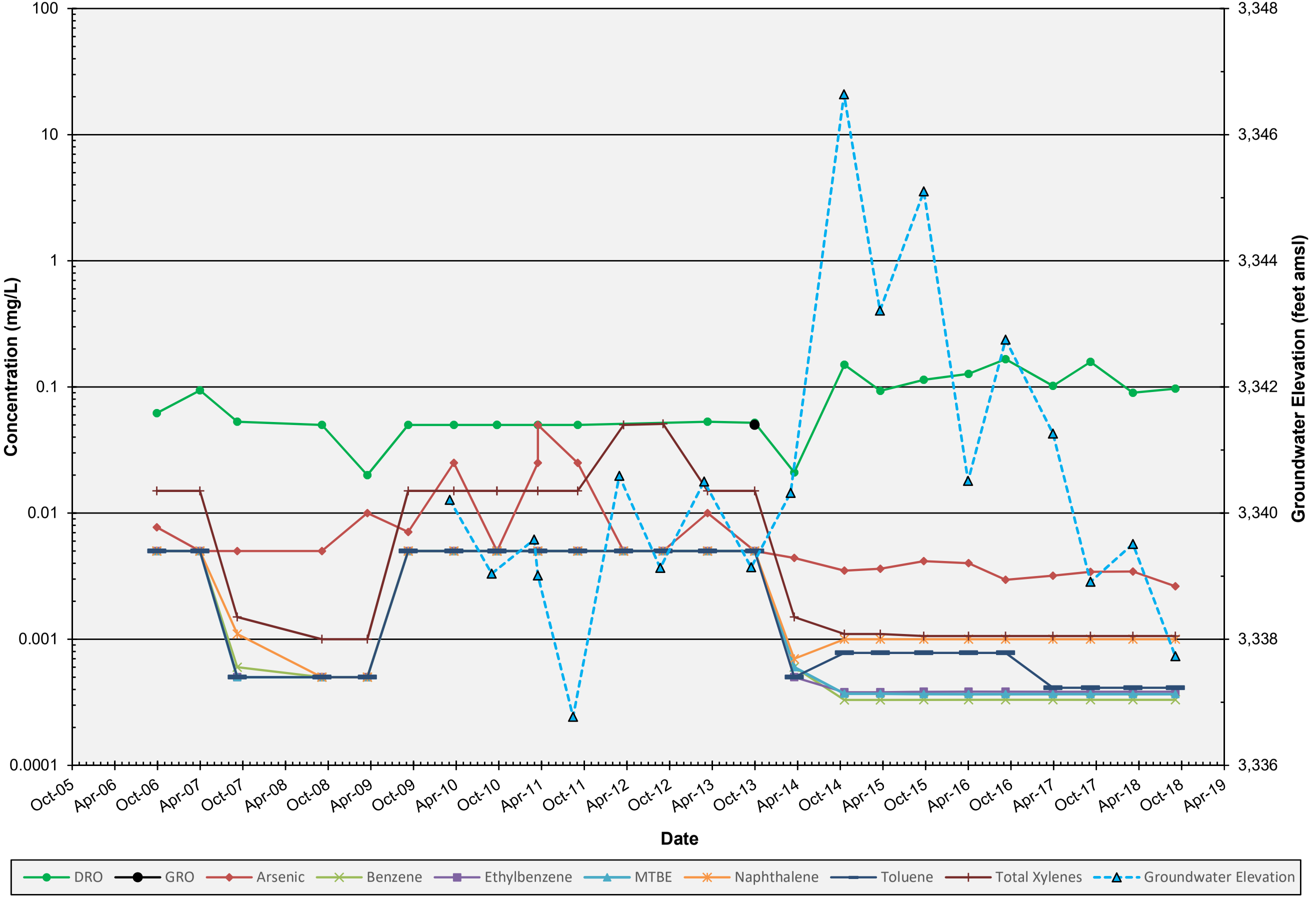
Evaporation Ponds



KWB-1A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

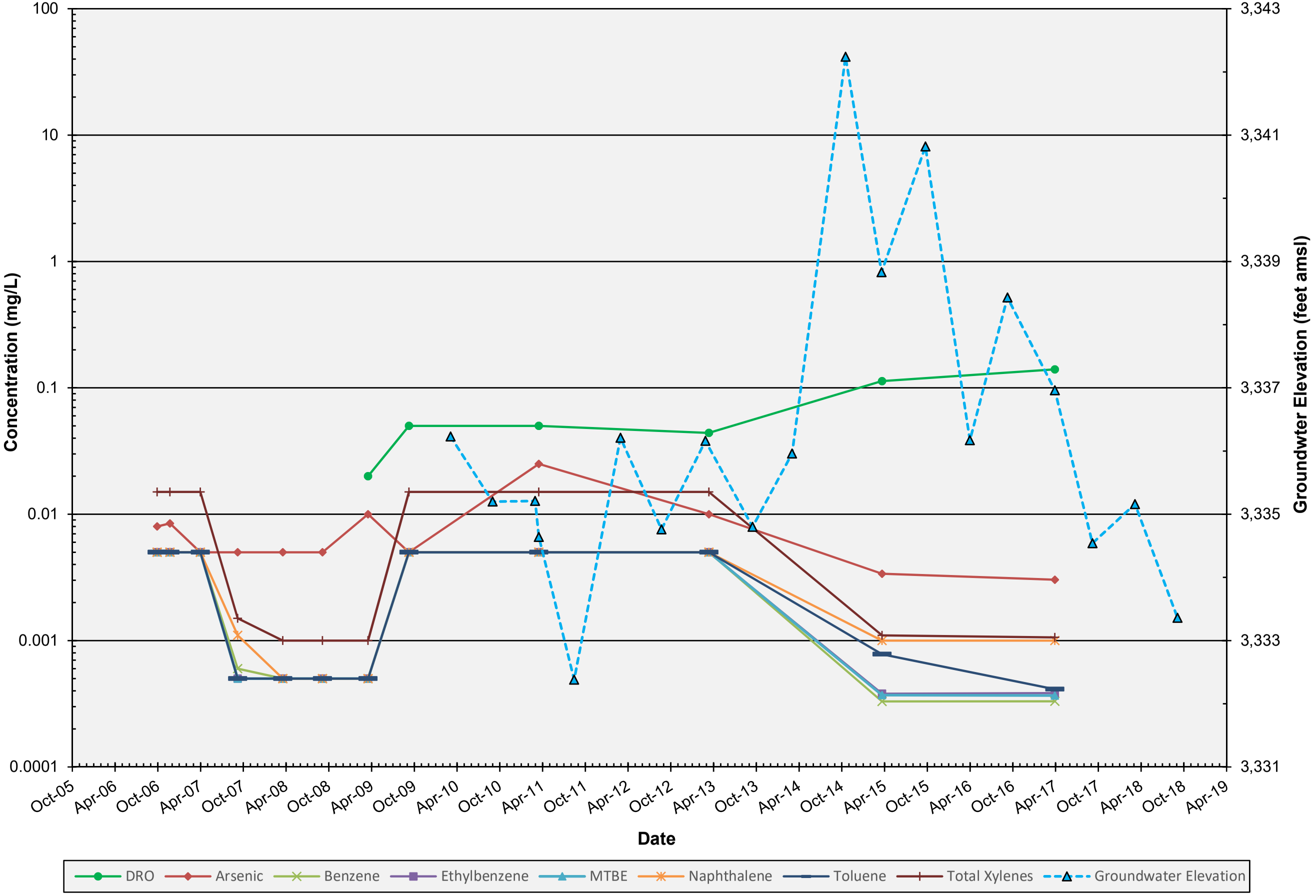
Field East of Refinery



KWB-1C: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

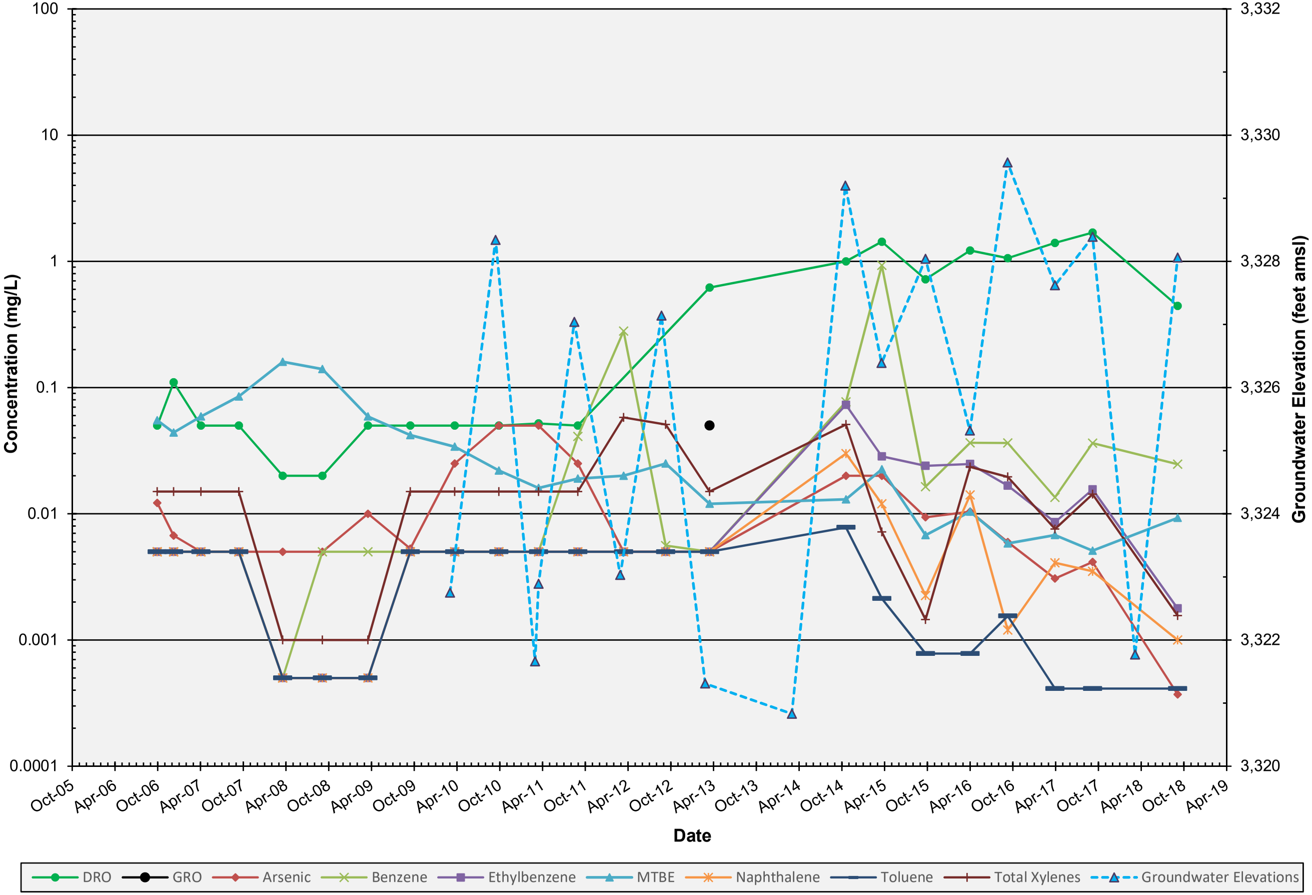
Field East of Refinery



KWB-7: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

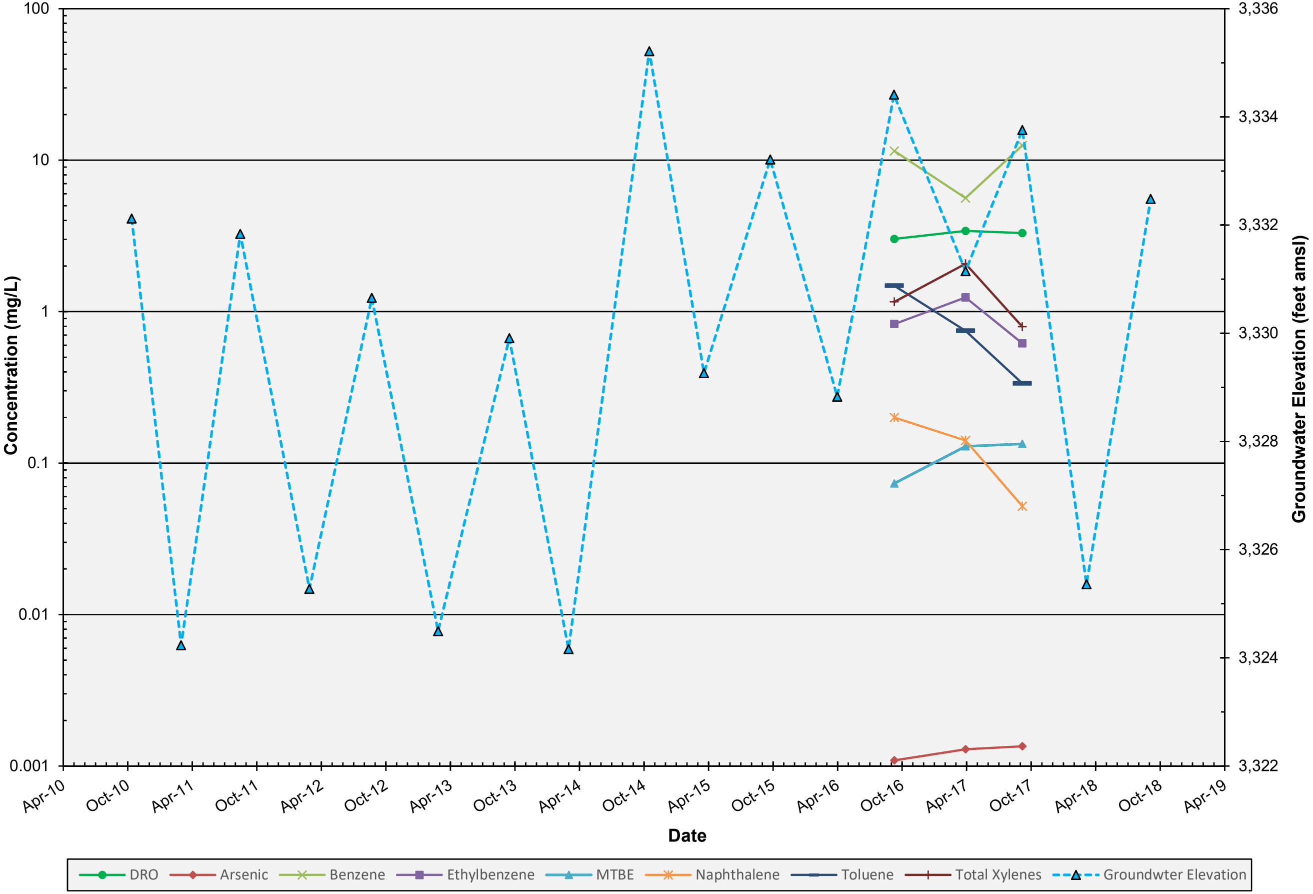
Field East of Refinery



KWB-8: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

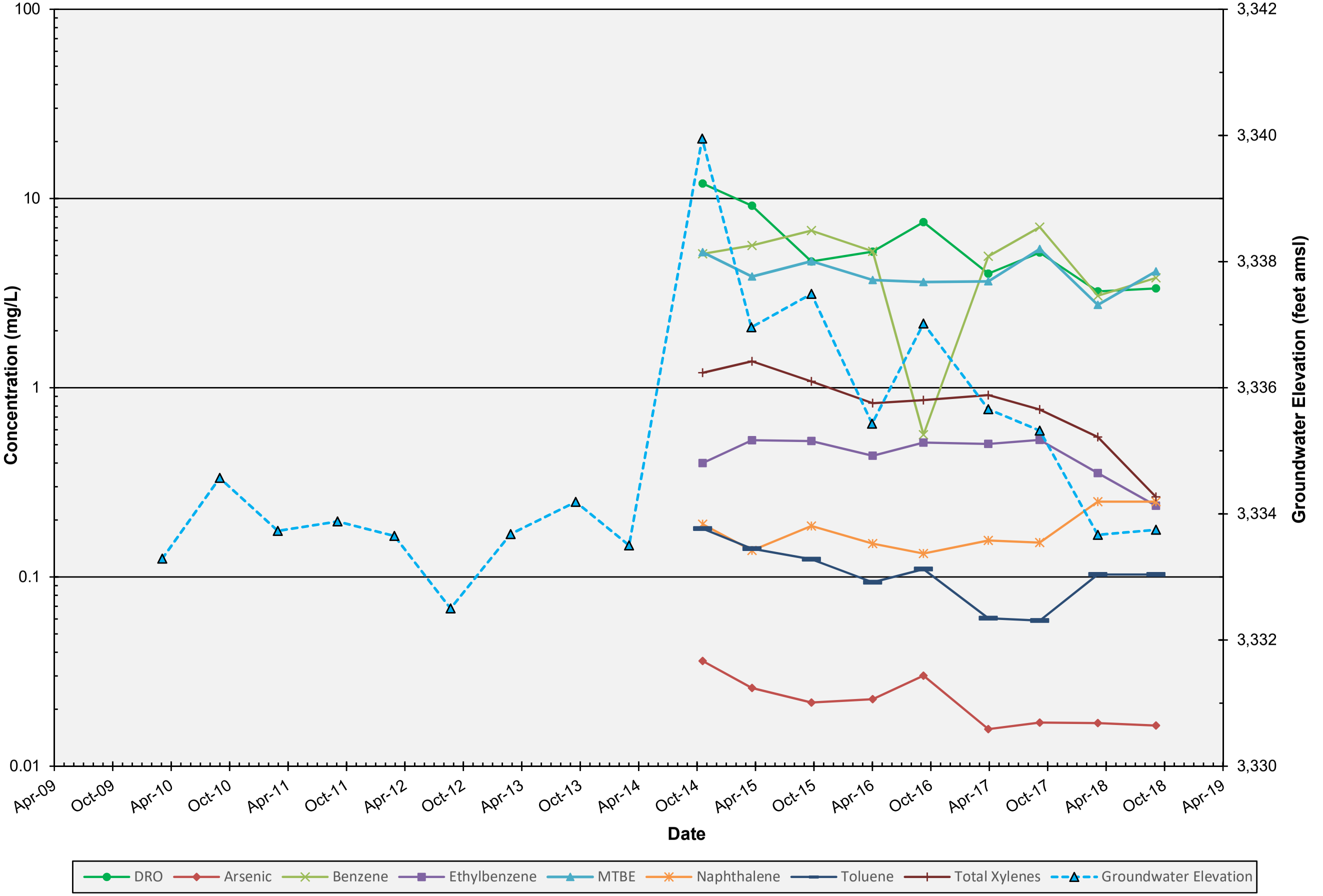
Field East of Refinery



KWB-10R: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

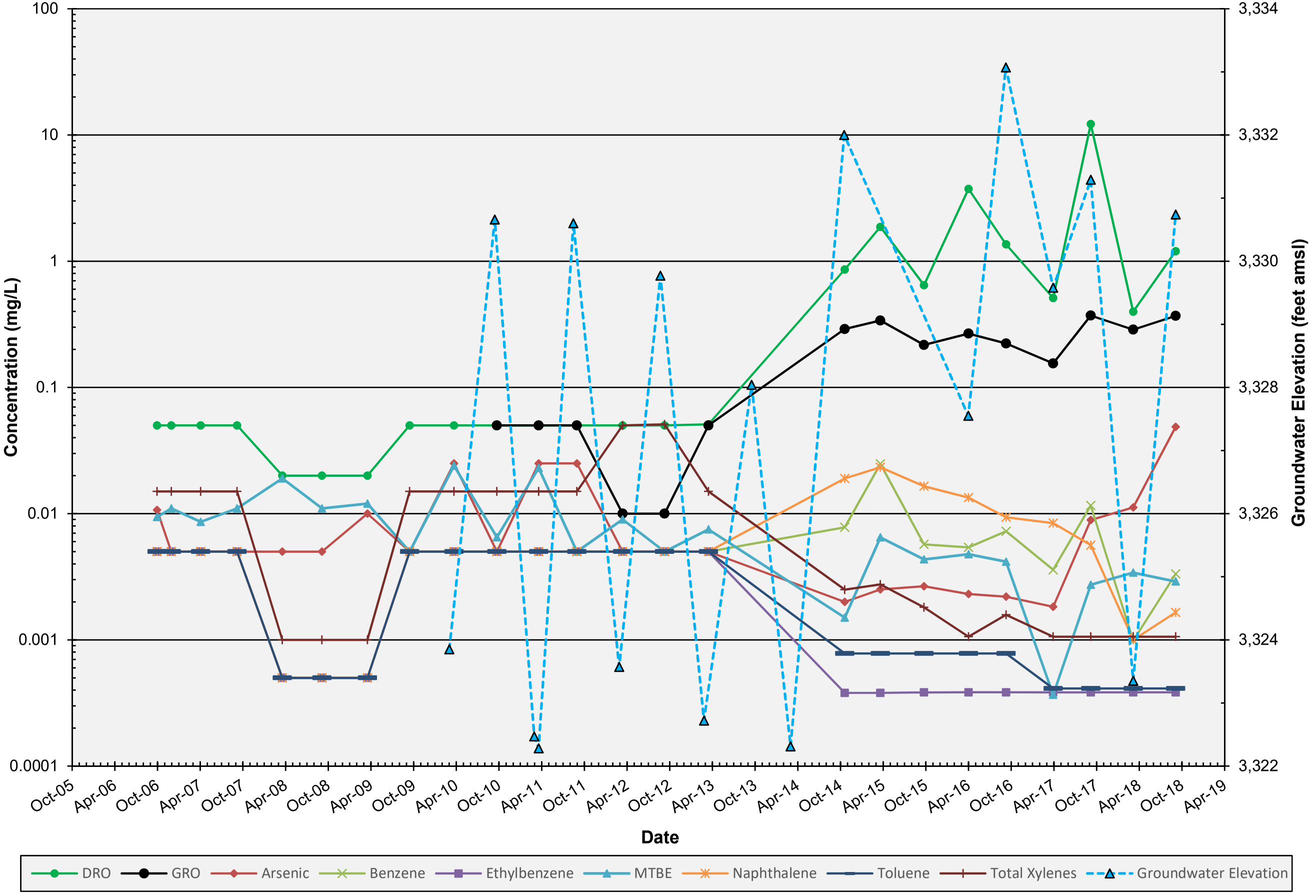
Field East of Refinery



KWB-11A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

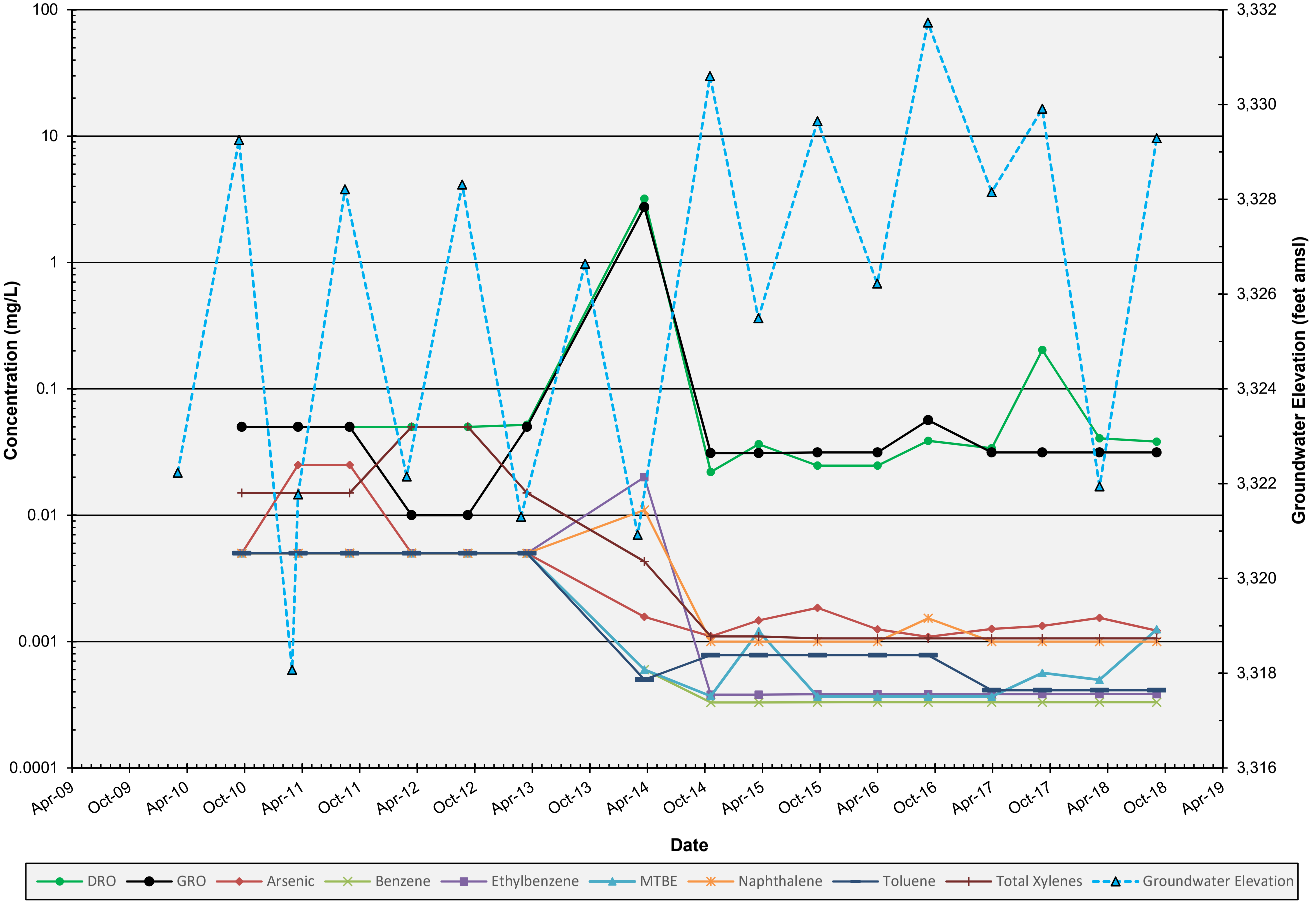
Field East of Refinery



KWB-11B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

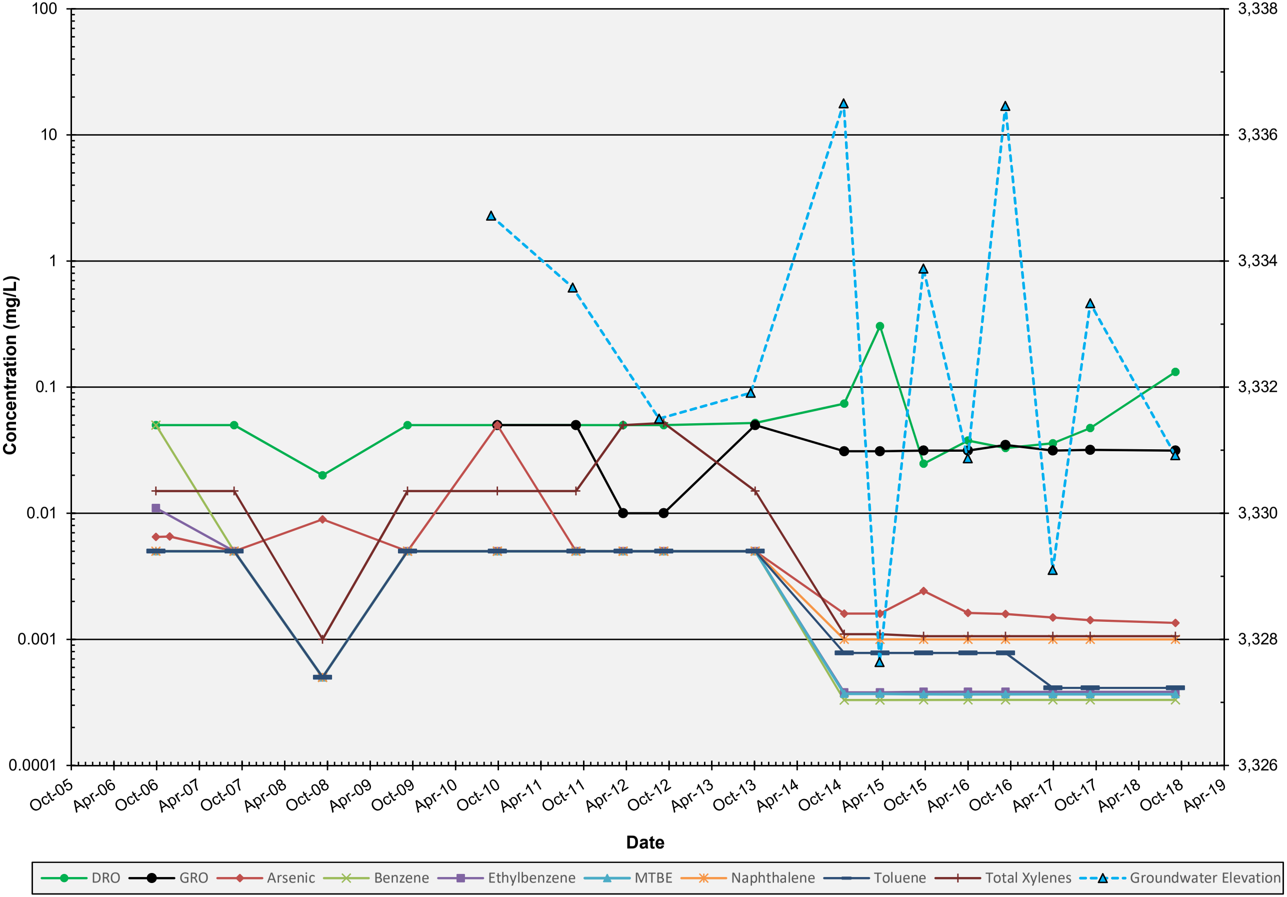
Field East of Refinery



KWB-12A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

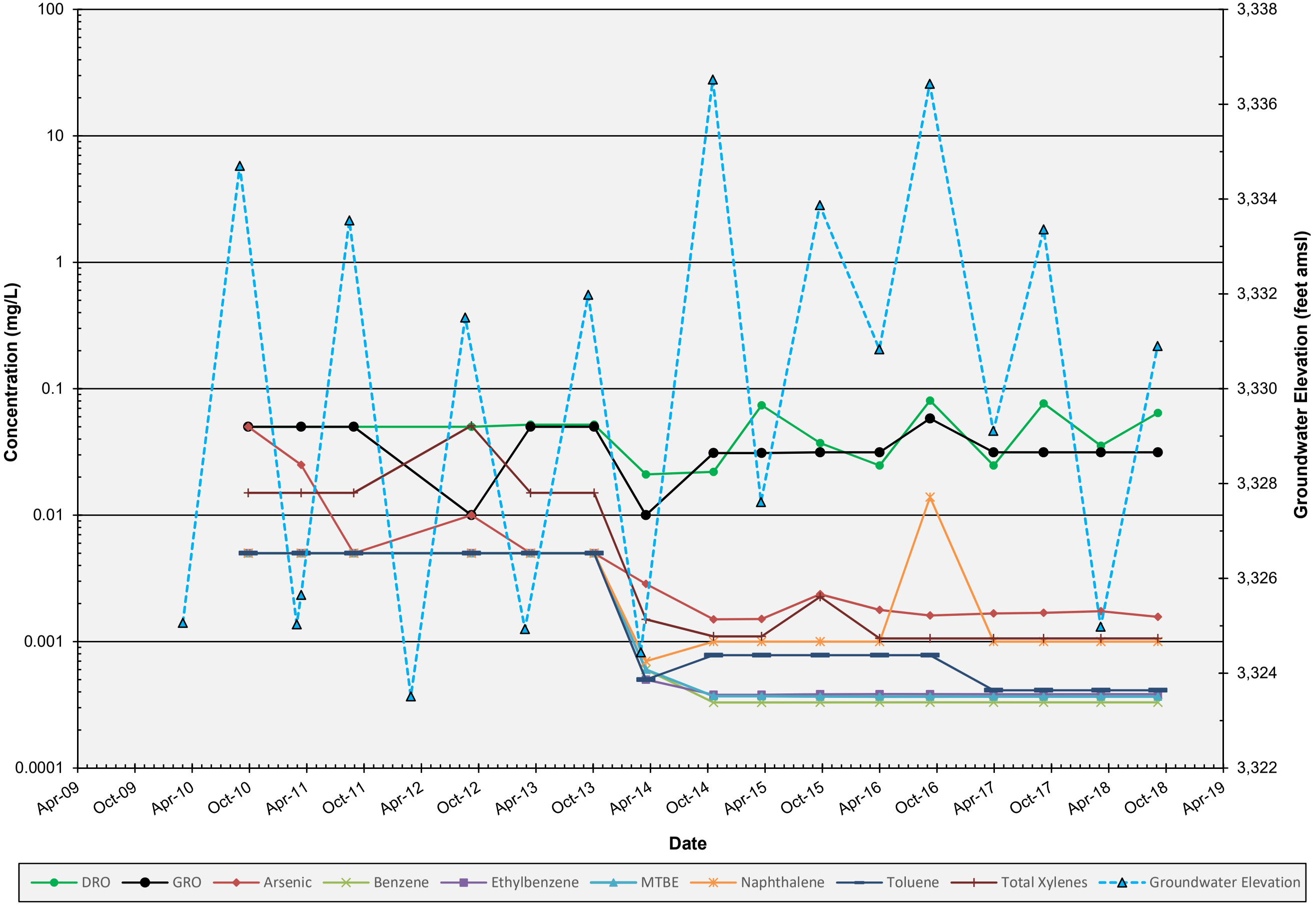
Field East of Refinery



KWB-12B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

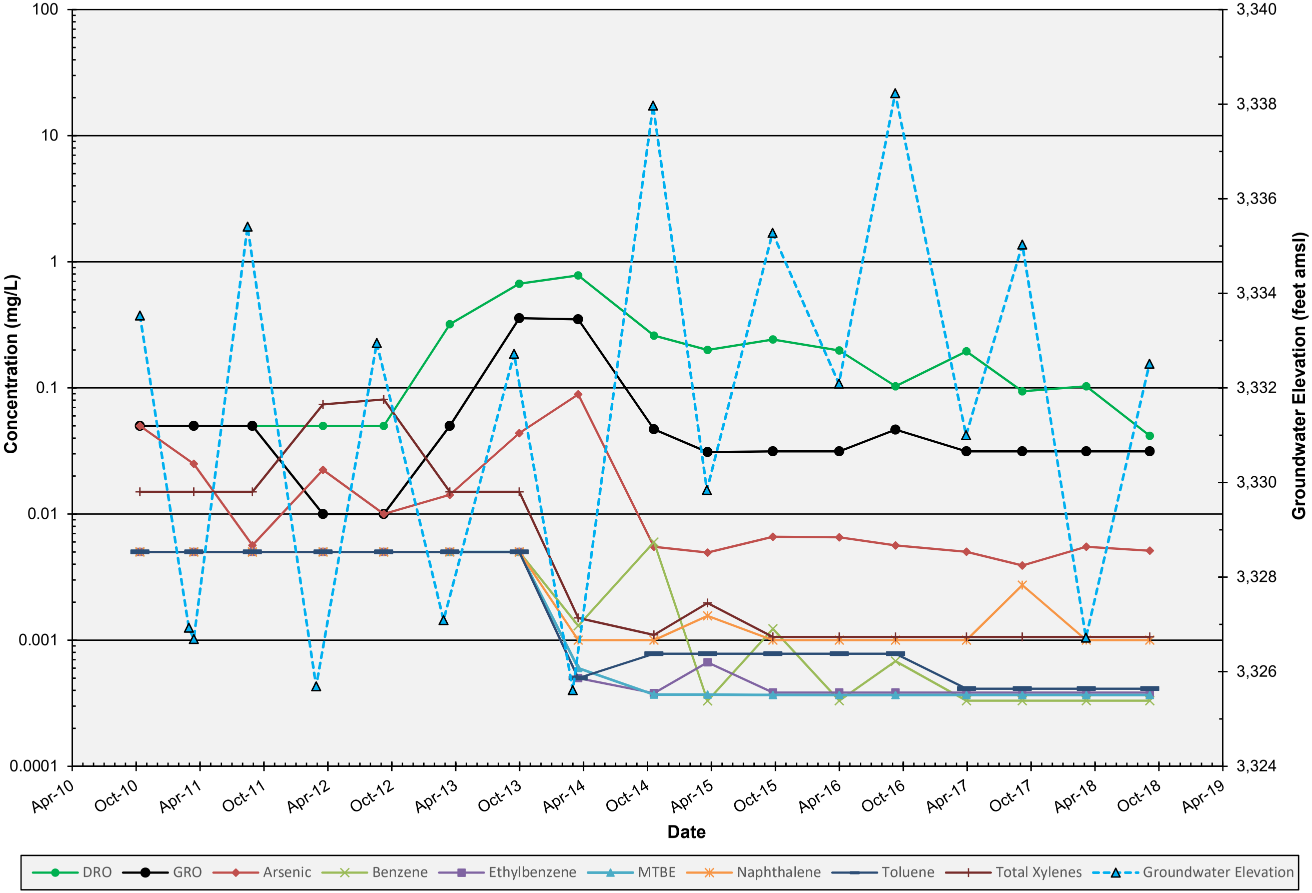
Field East of Refinery



MW-57: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

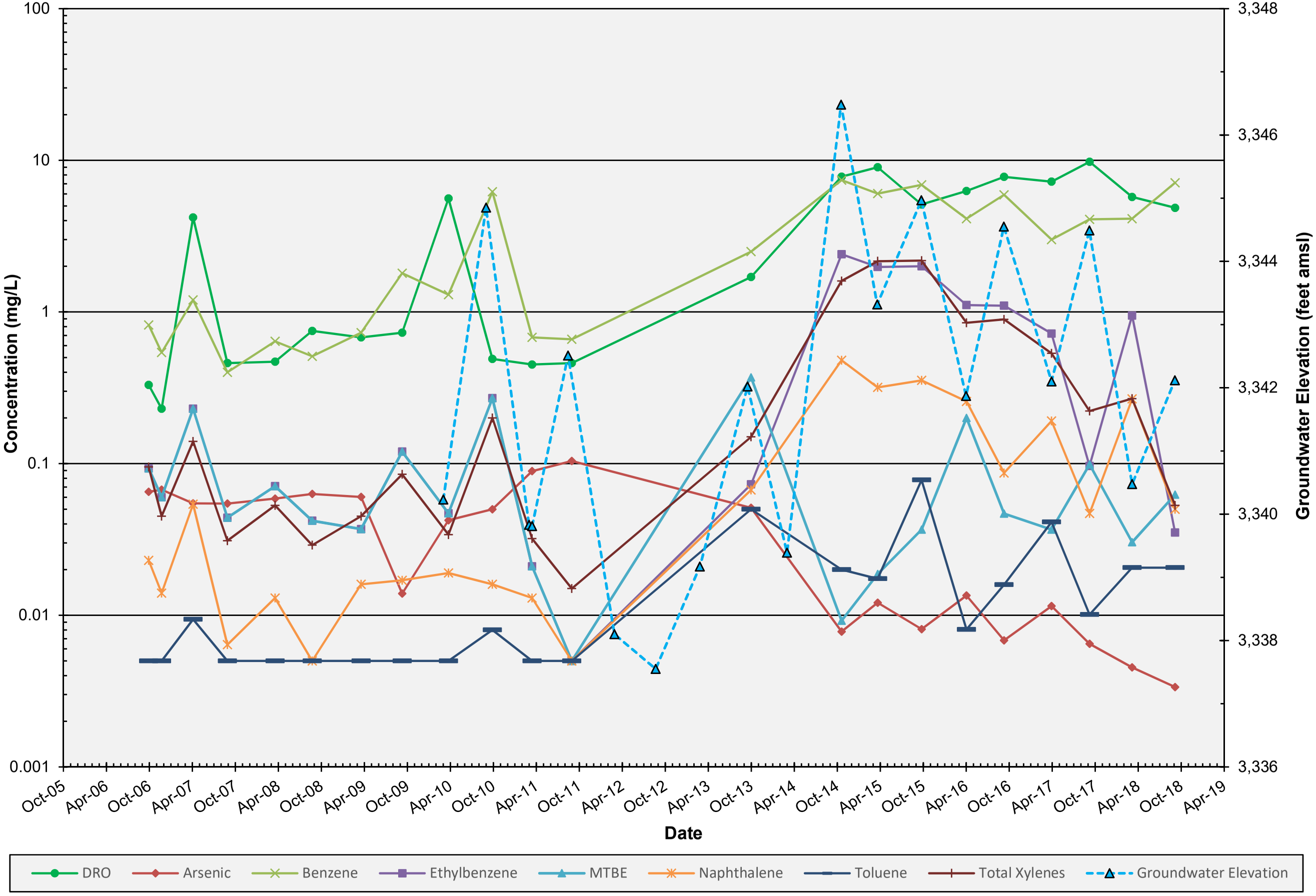
Field East of Refinery



MW-58: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

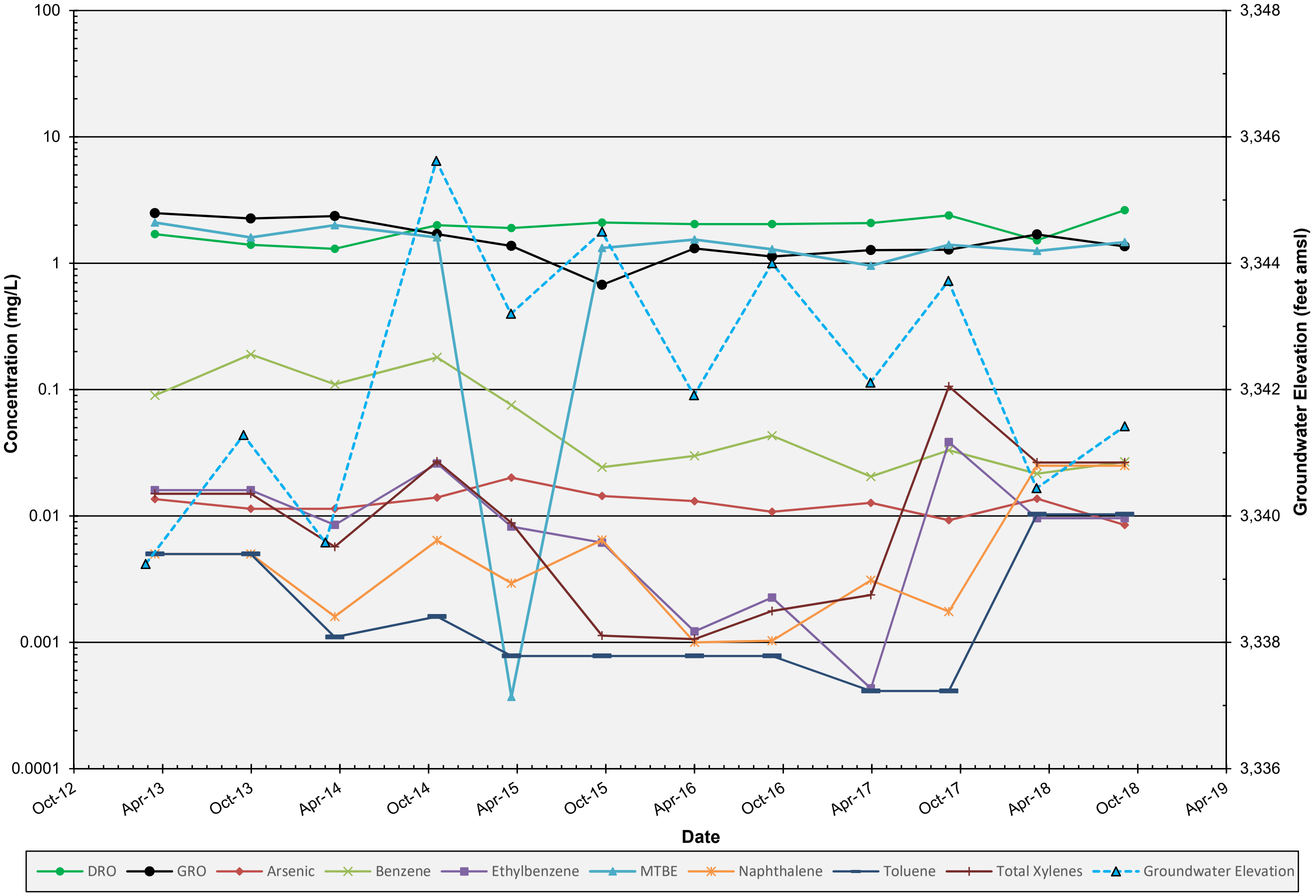
Field East of Refinery



MW-111: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

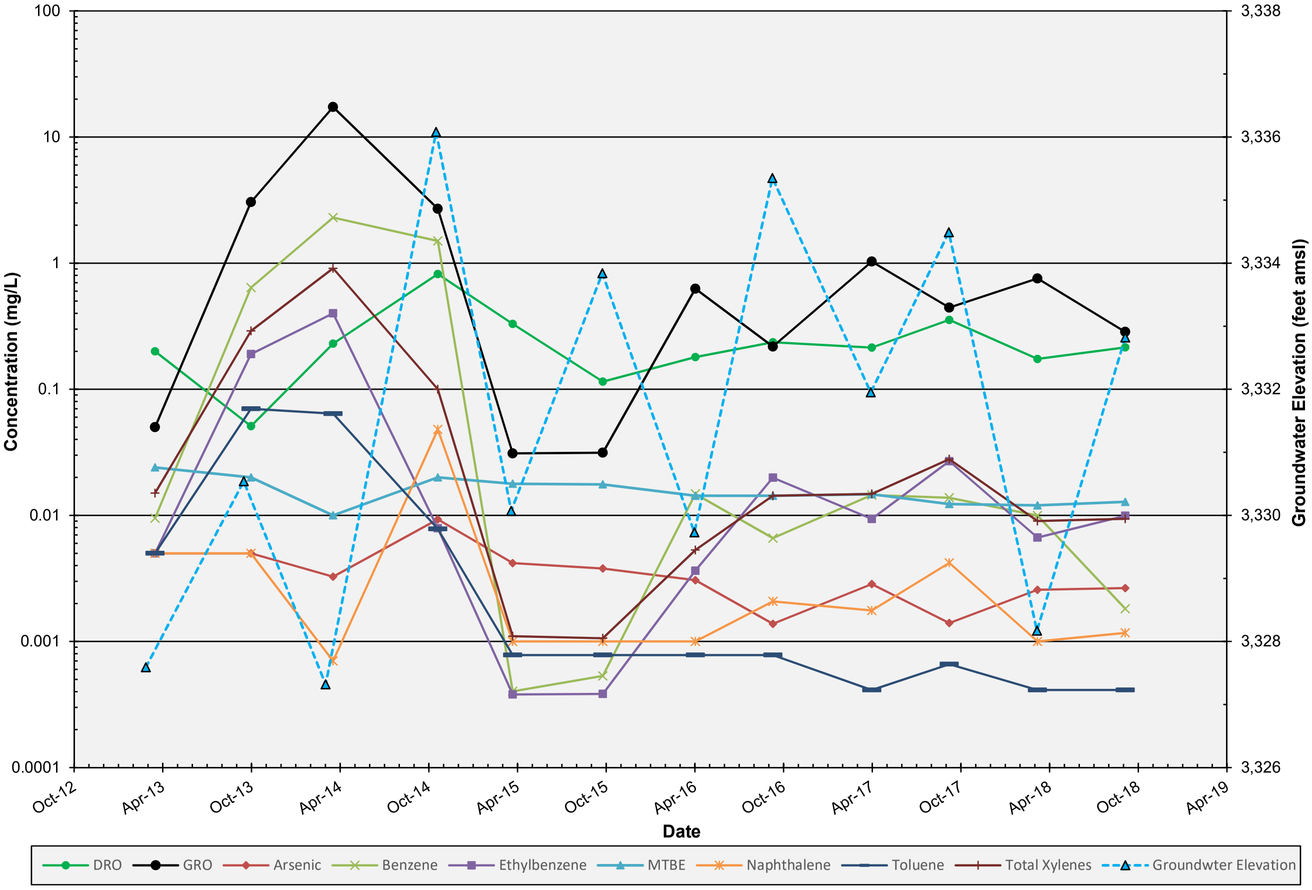
Field East of Refinery



MW-113: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

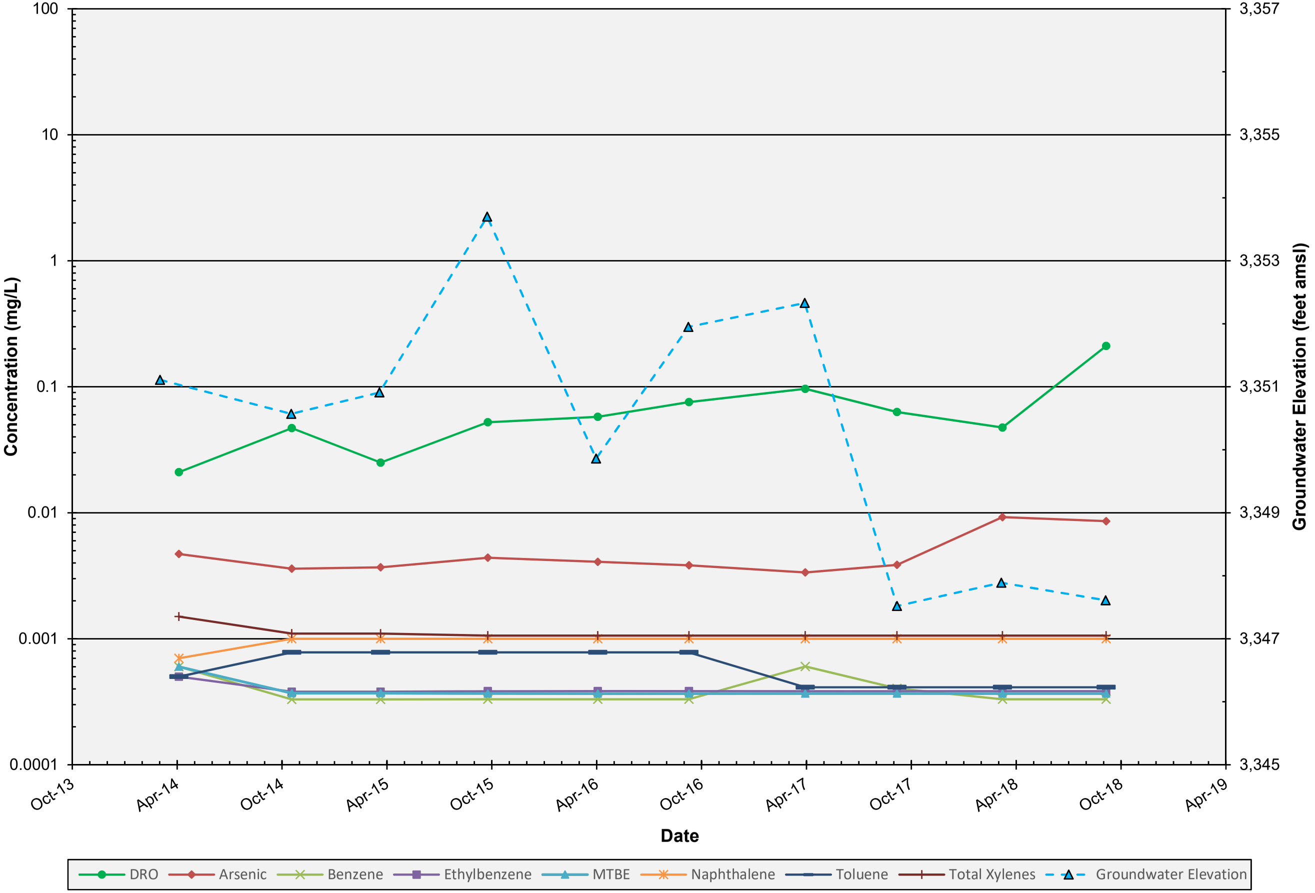
Field East of Refinery



MW-125: COC Concentrations

HollyFrontier Navajo Refining LLC - Artesia Refinery

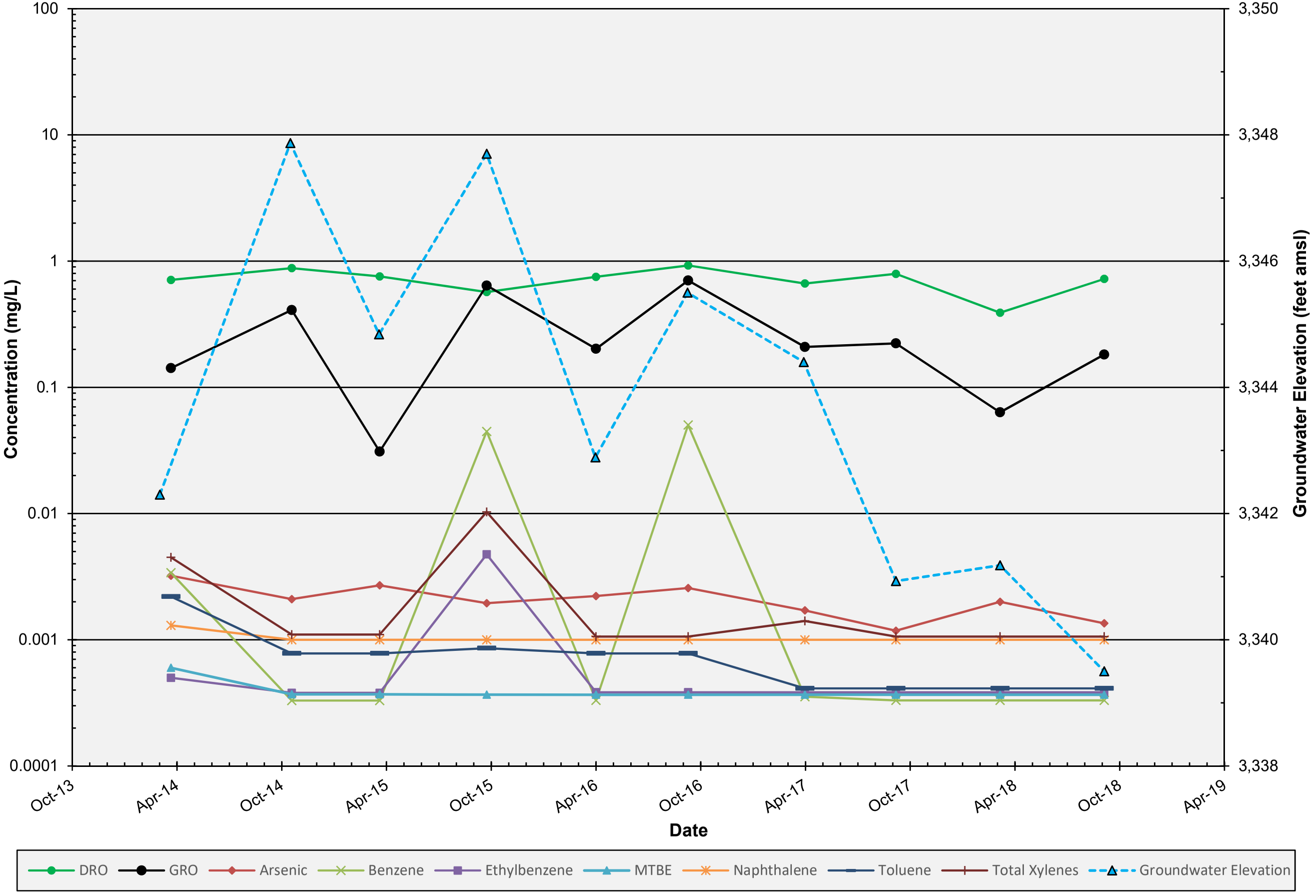
Field East of Refinery



MW-126A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

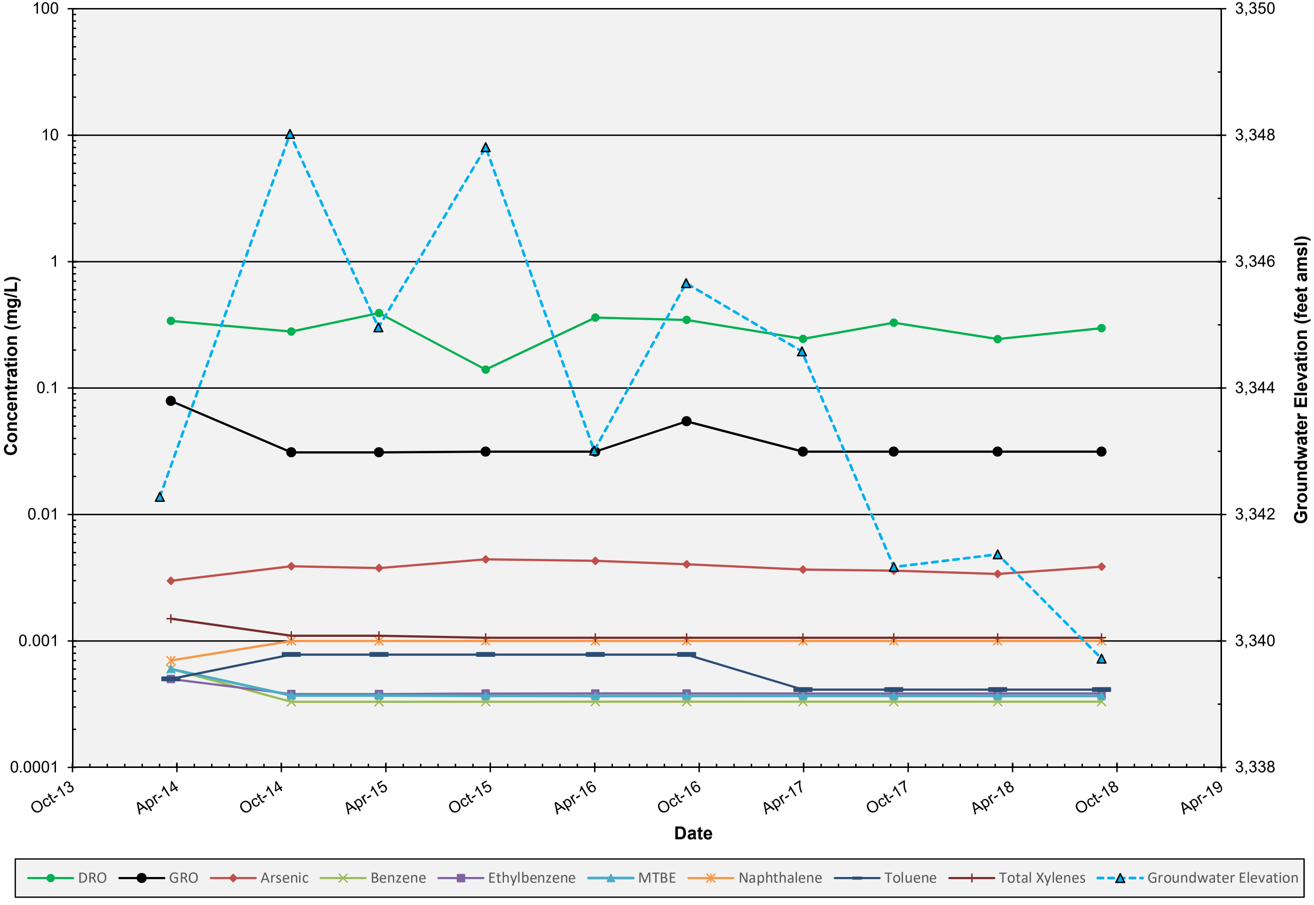
Field East of Refinery



MW-126B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

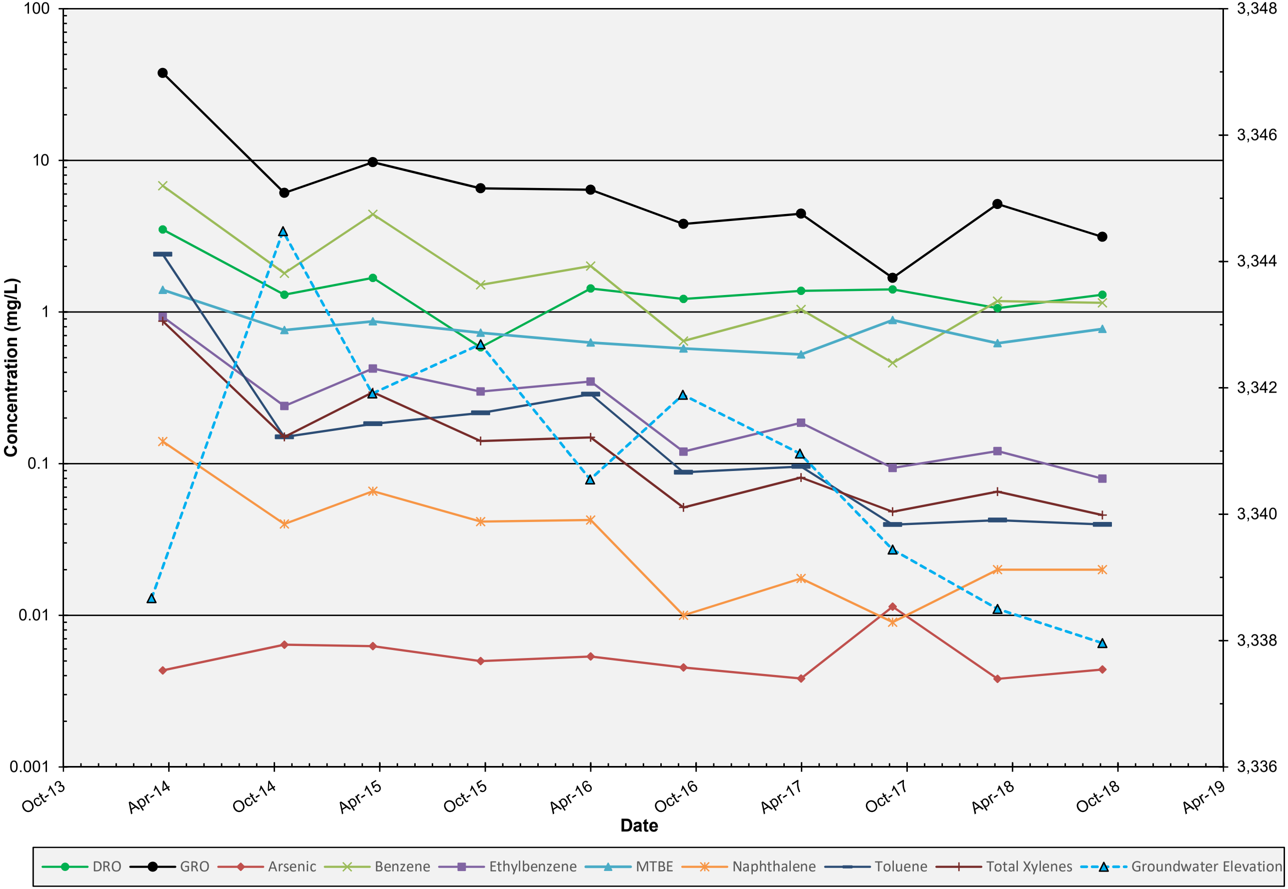
Field East of Refinery



MW-127: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

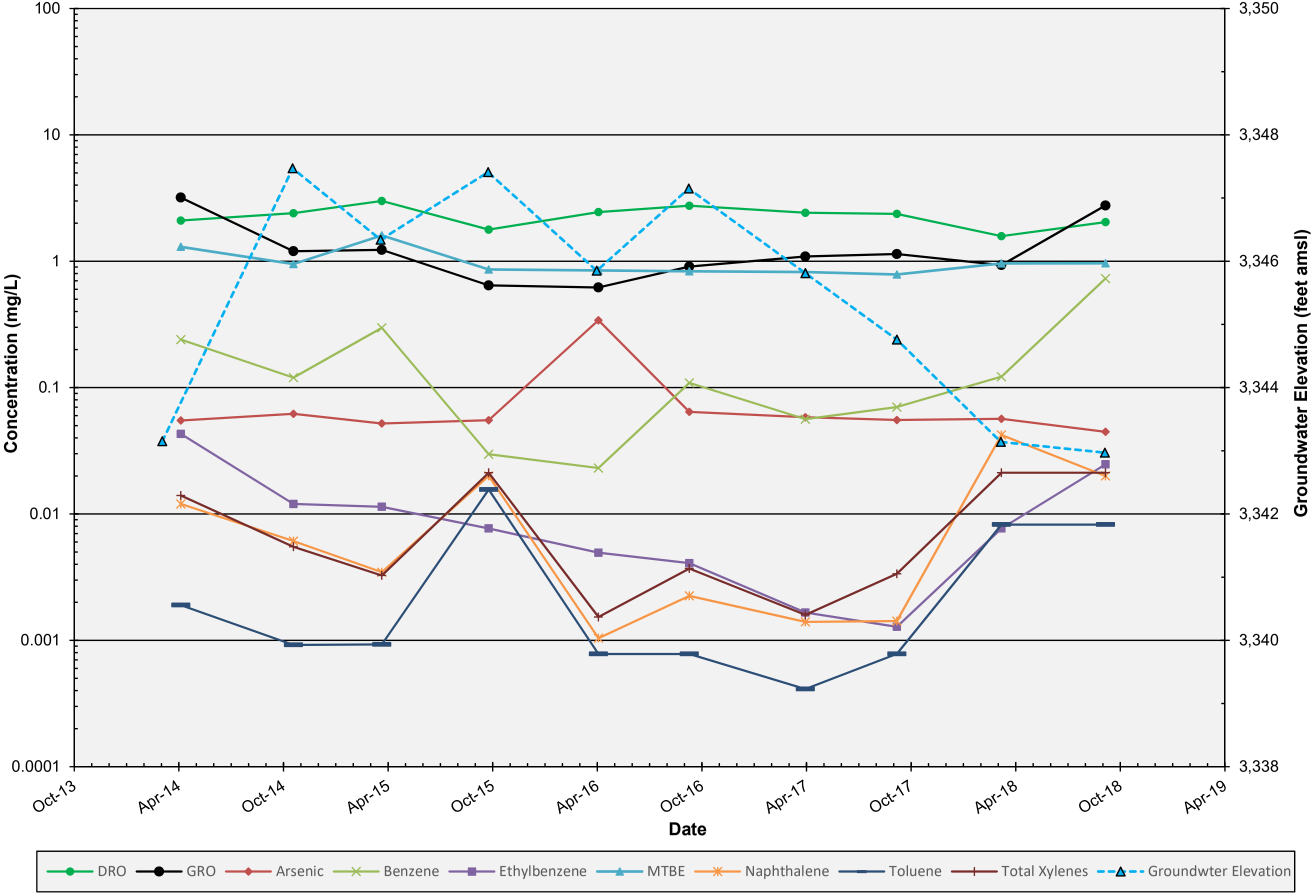
Field East of Refinery



MW-128: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

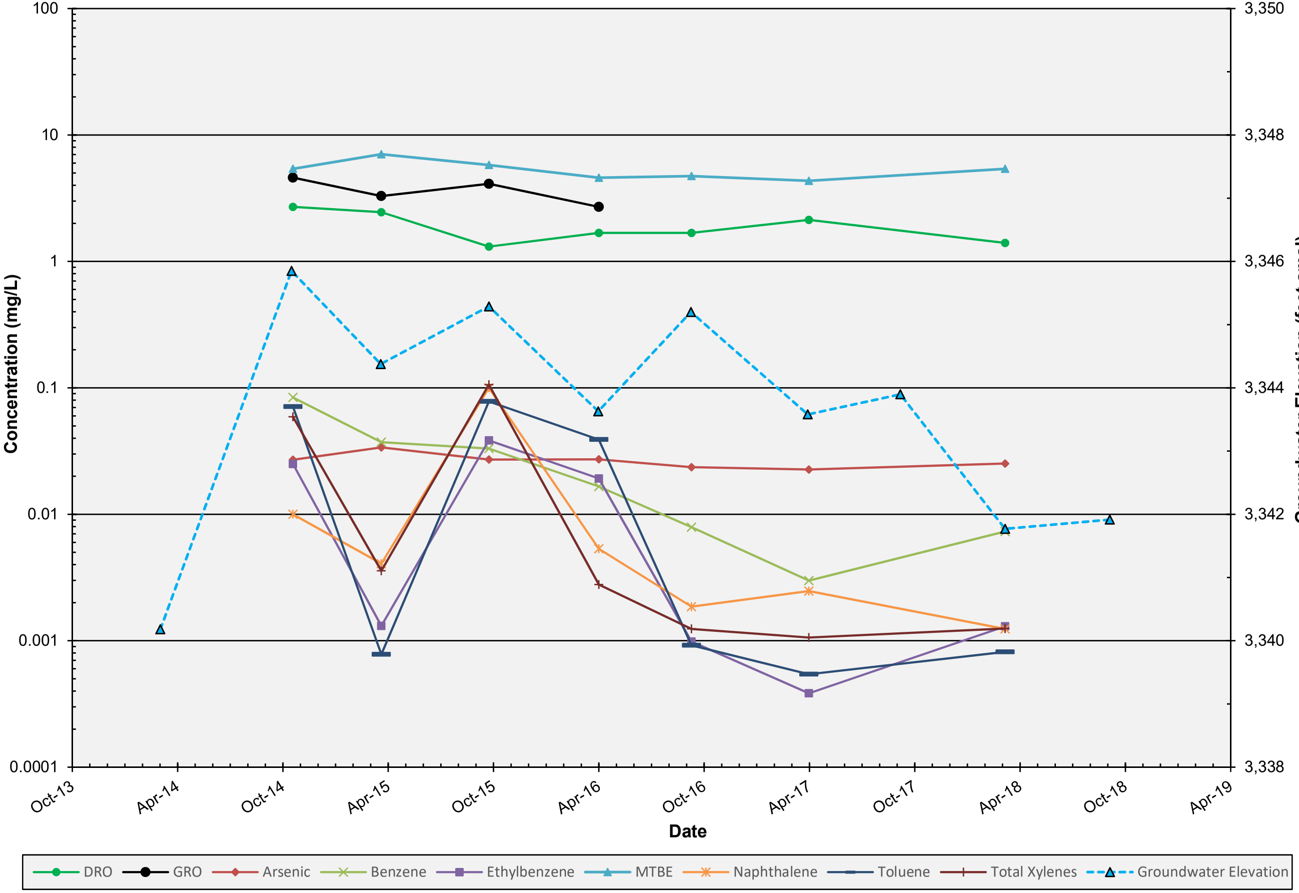
Field East of Refinery



MW-129: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

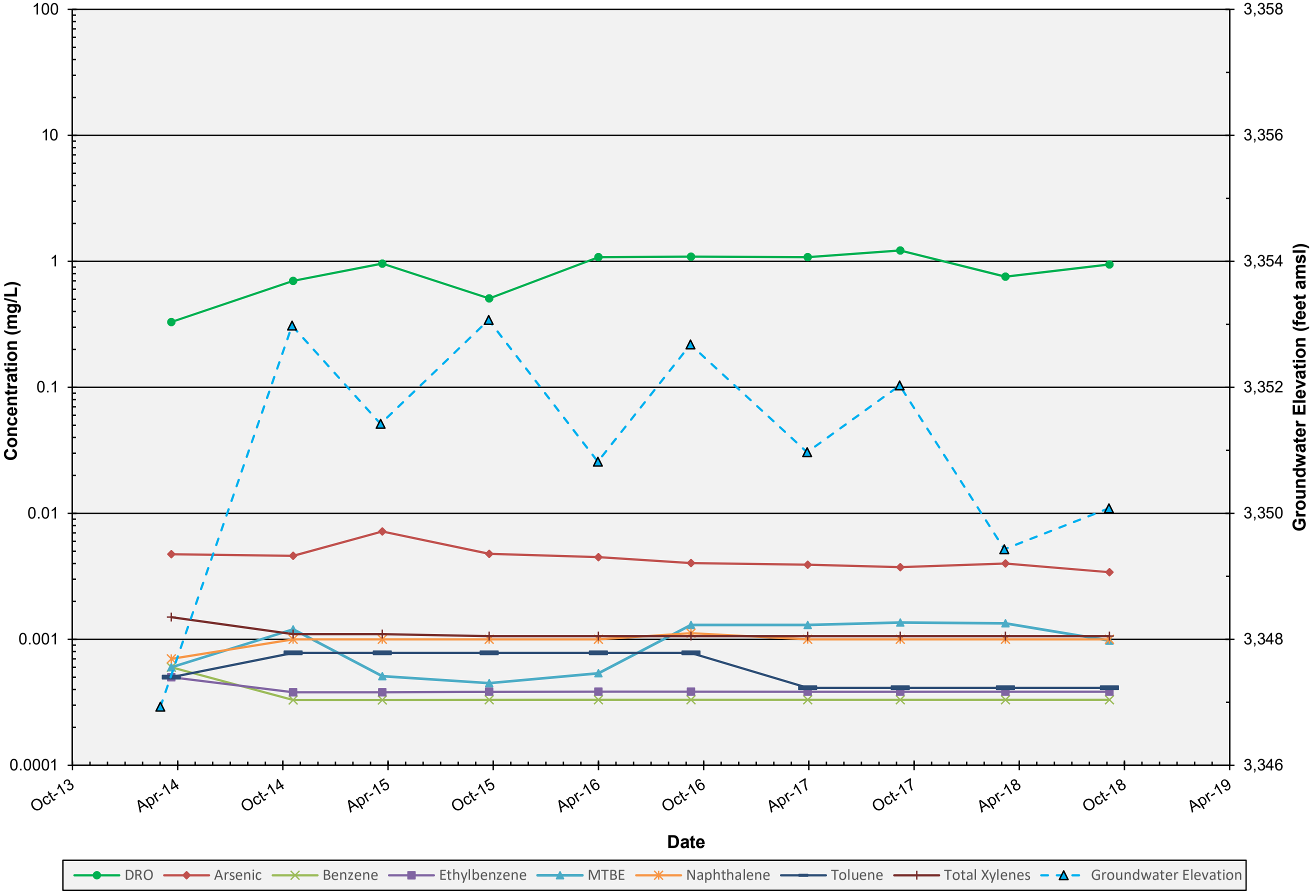
Field East of Refinery



MW-130: COC Concentrations

HollyFrontier Navajo Refining LLC - Artesia Refinery

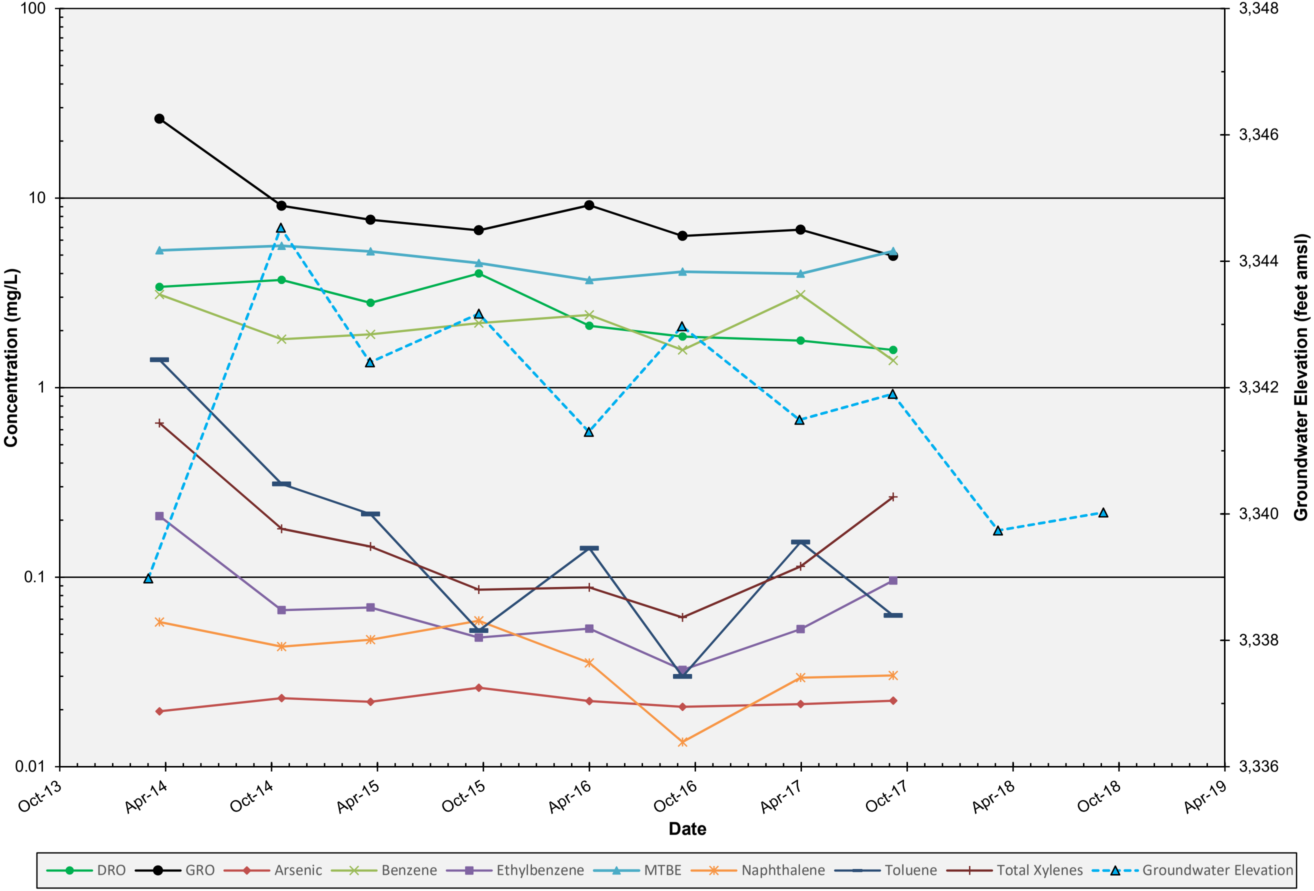
Field East of Refinery



MW-131: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

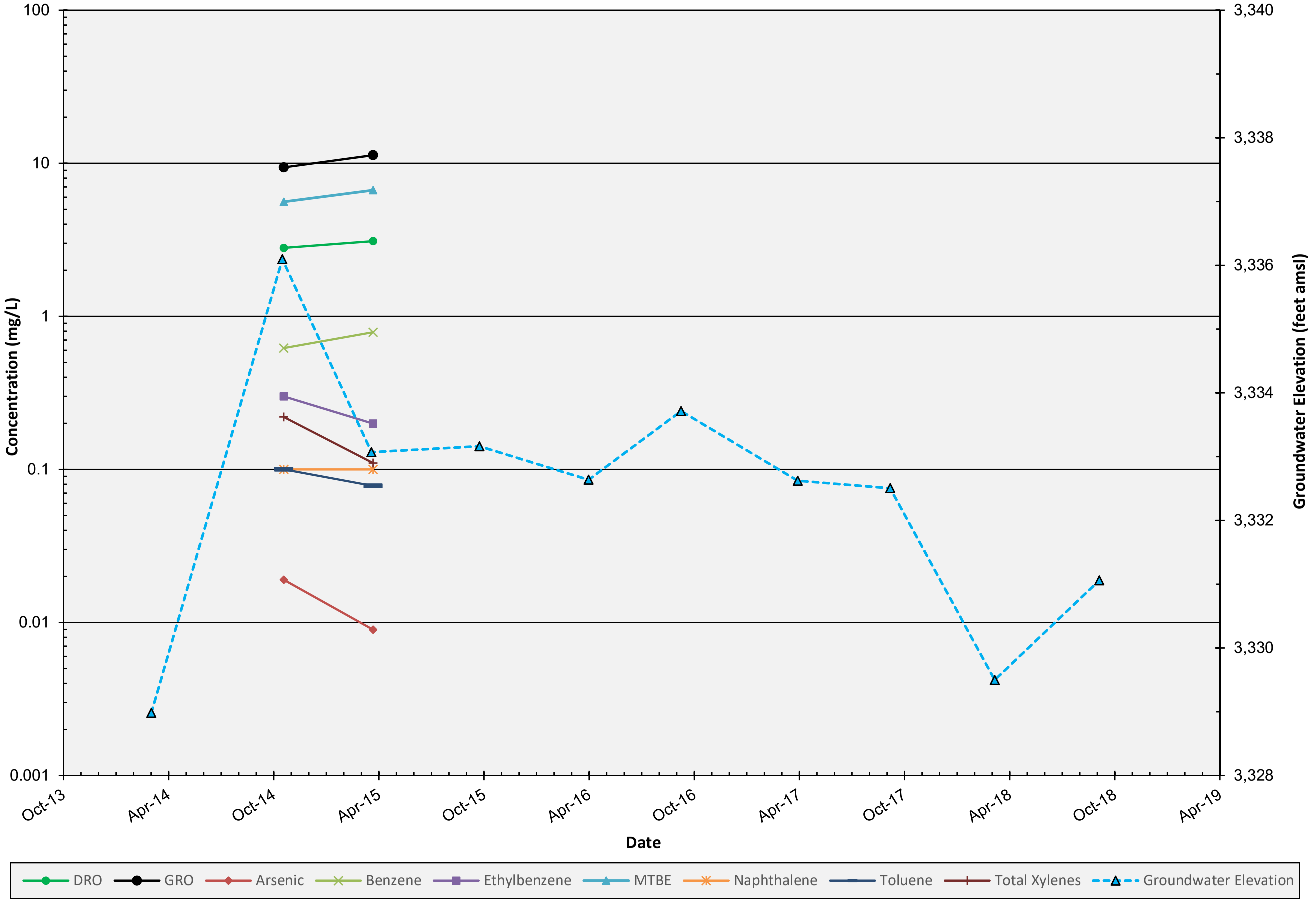
Field East of Refinery



MW-133: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

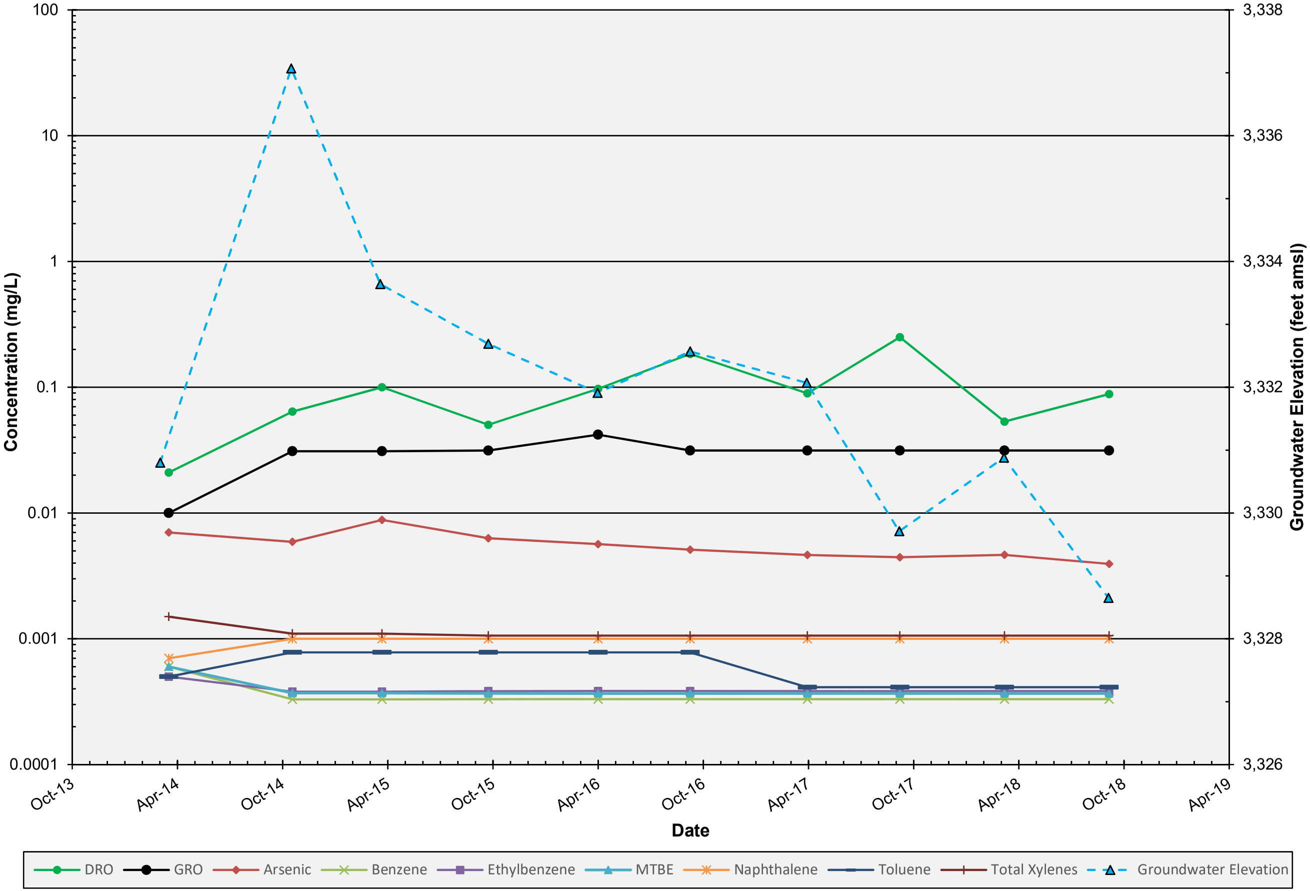
Field East of Refinery



MW-134: COC Concentrations

HollyFrontier Navajo Refining LLC - Artesia Refinery

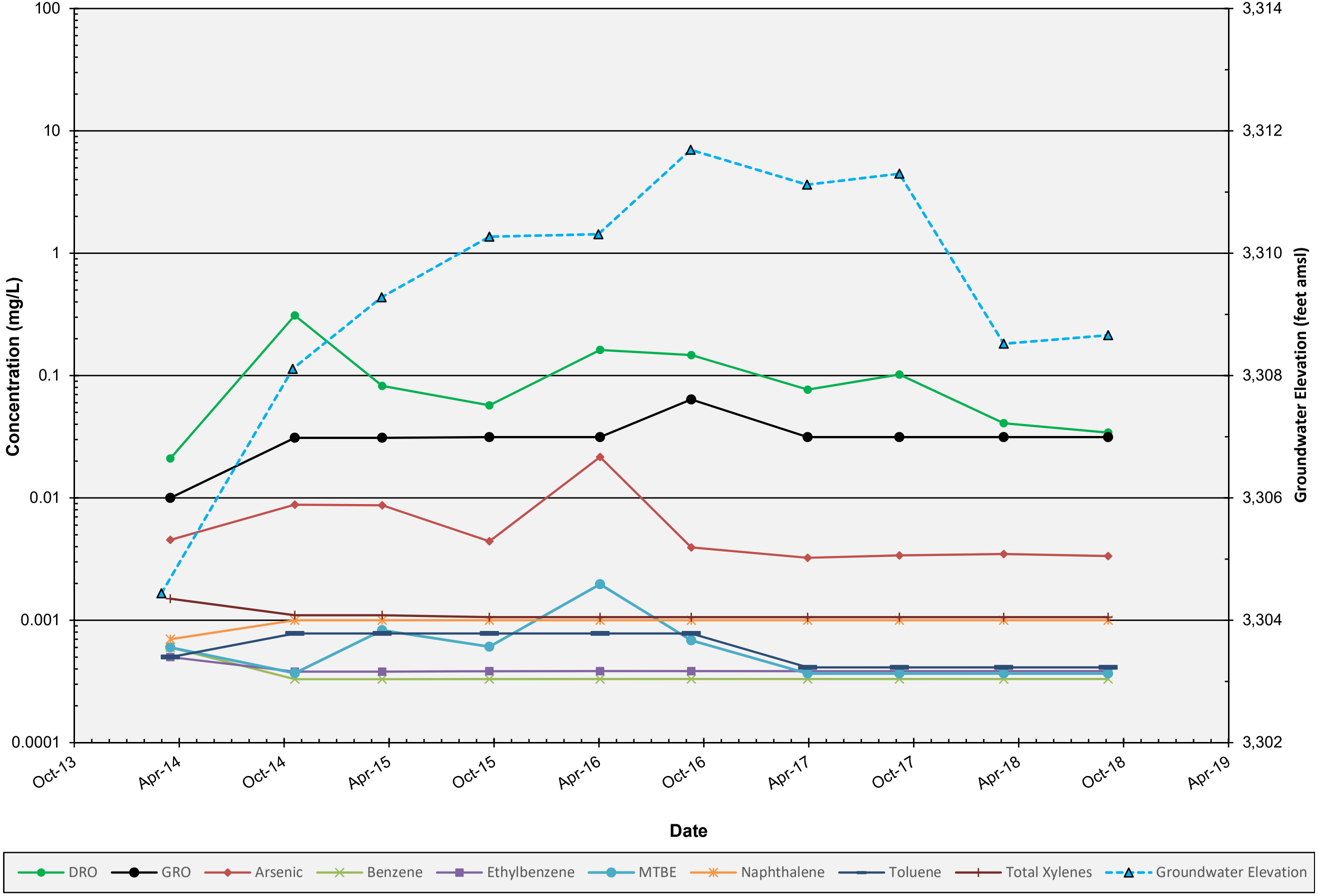
Field East of Refinery



MW-135: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

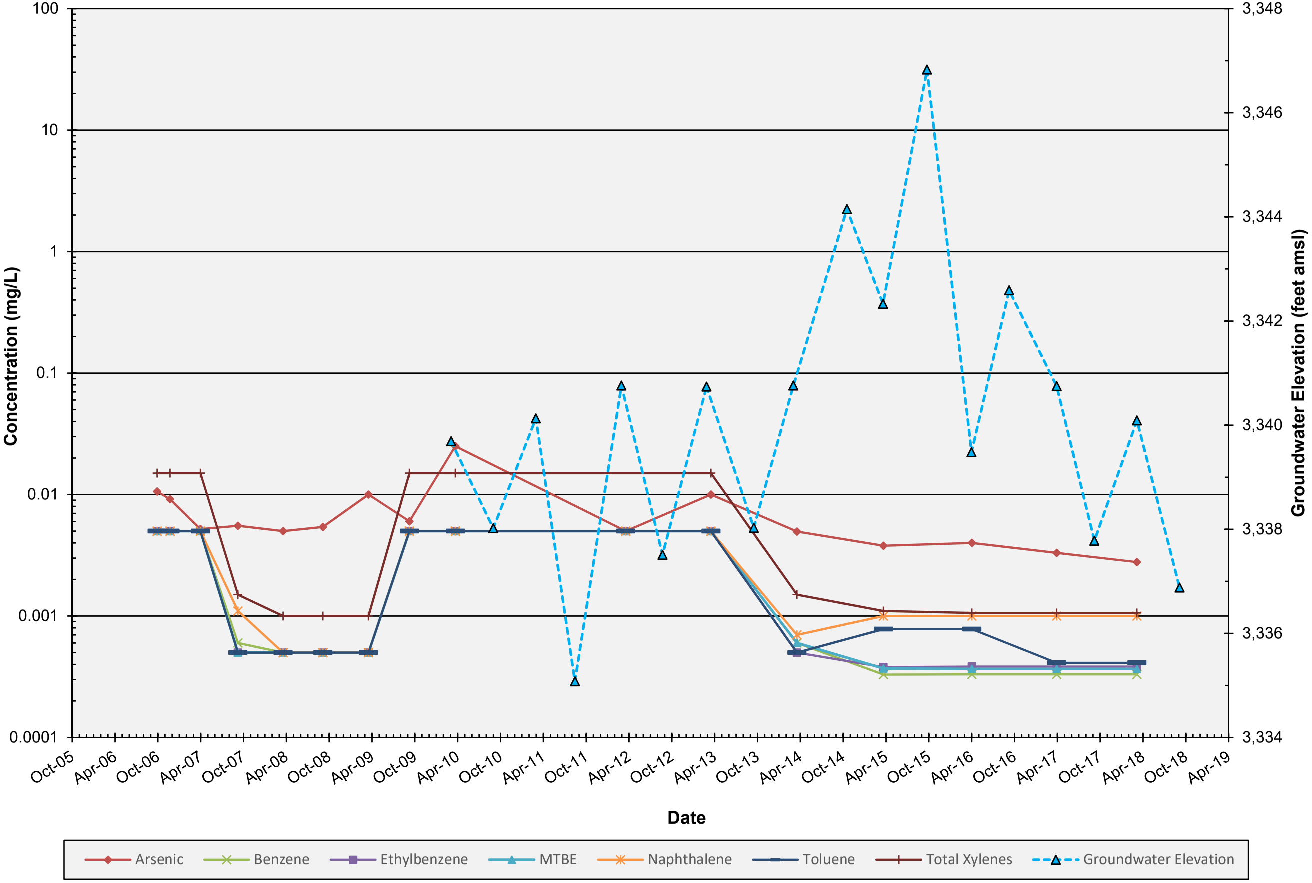
Field East of Refinery



RW-18A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

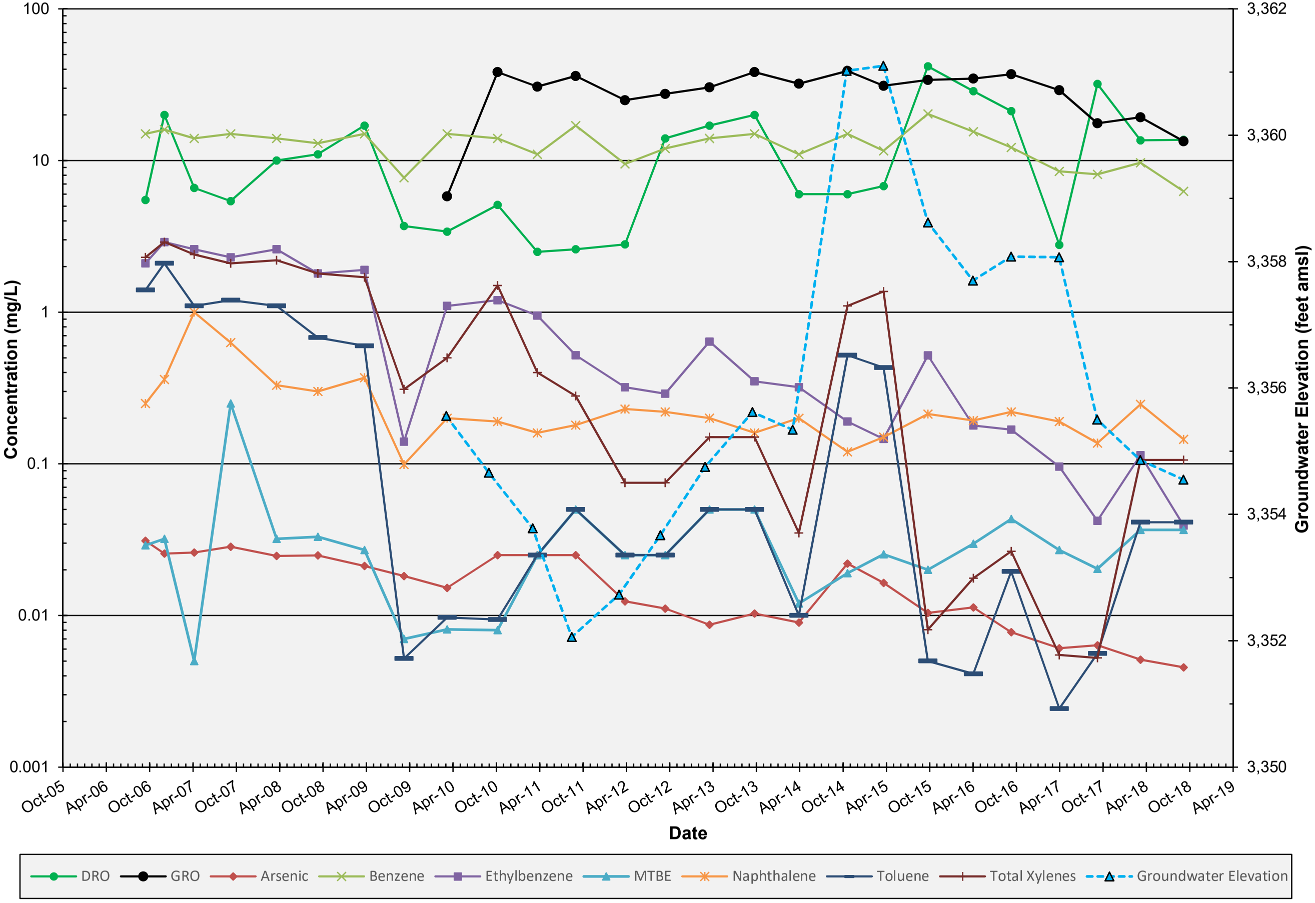
Field East of Refinery



MW-23: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

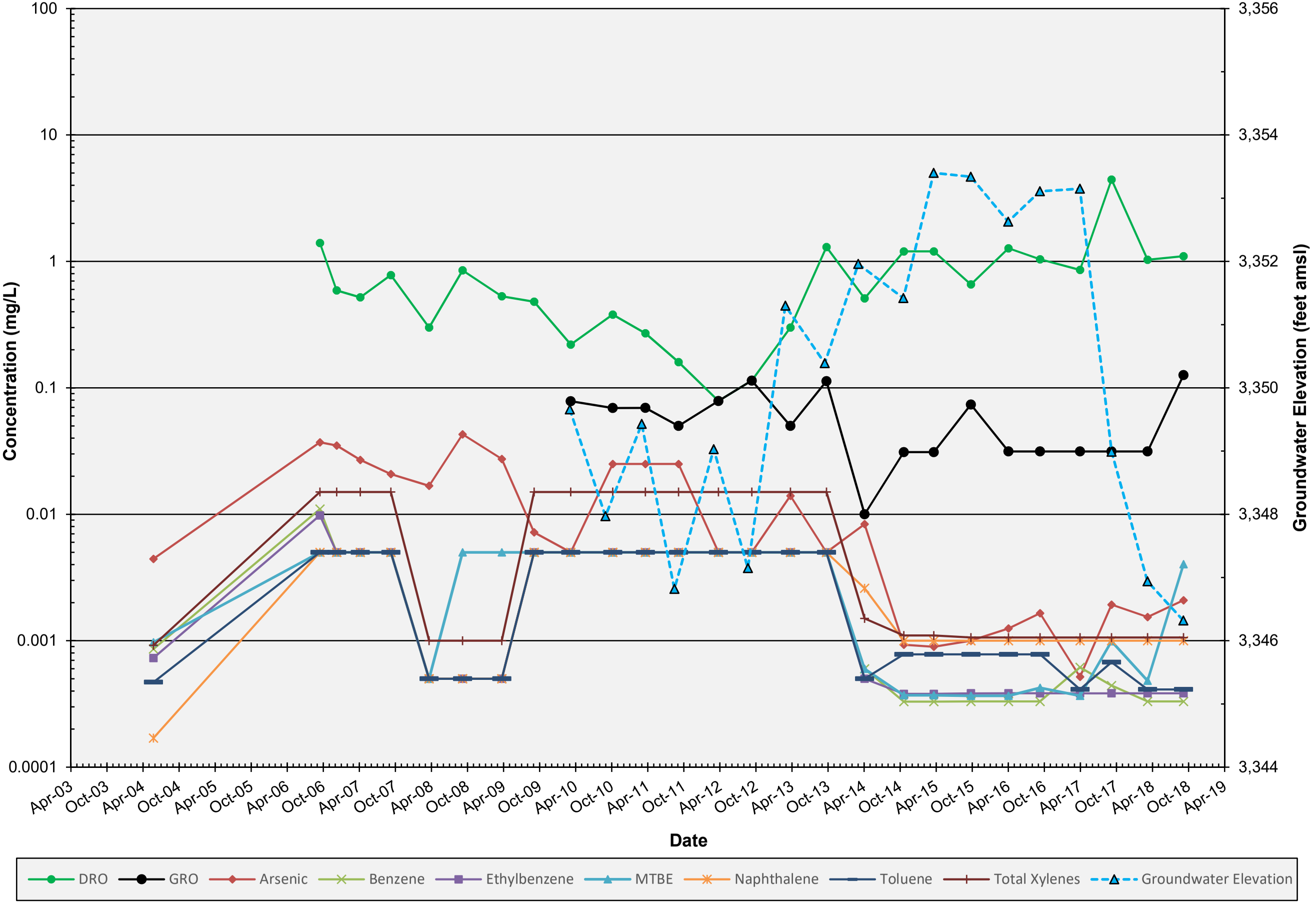
North Refinery Area



MW-29: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

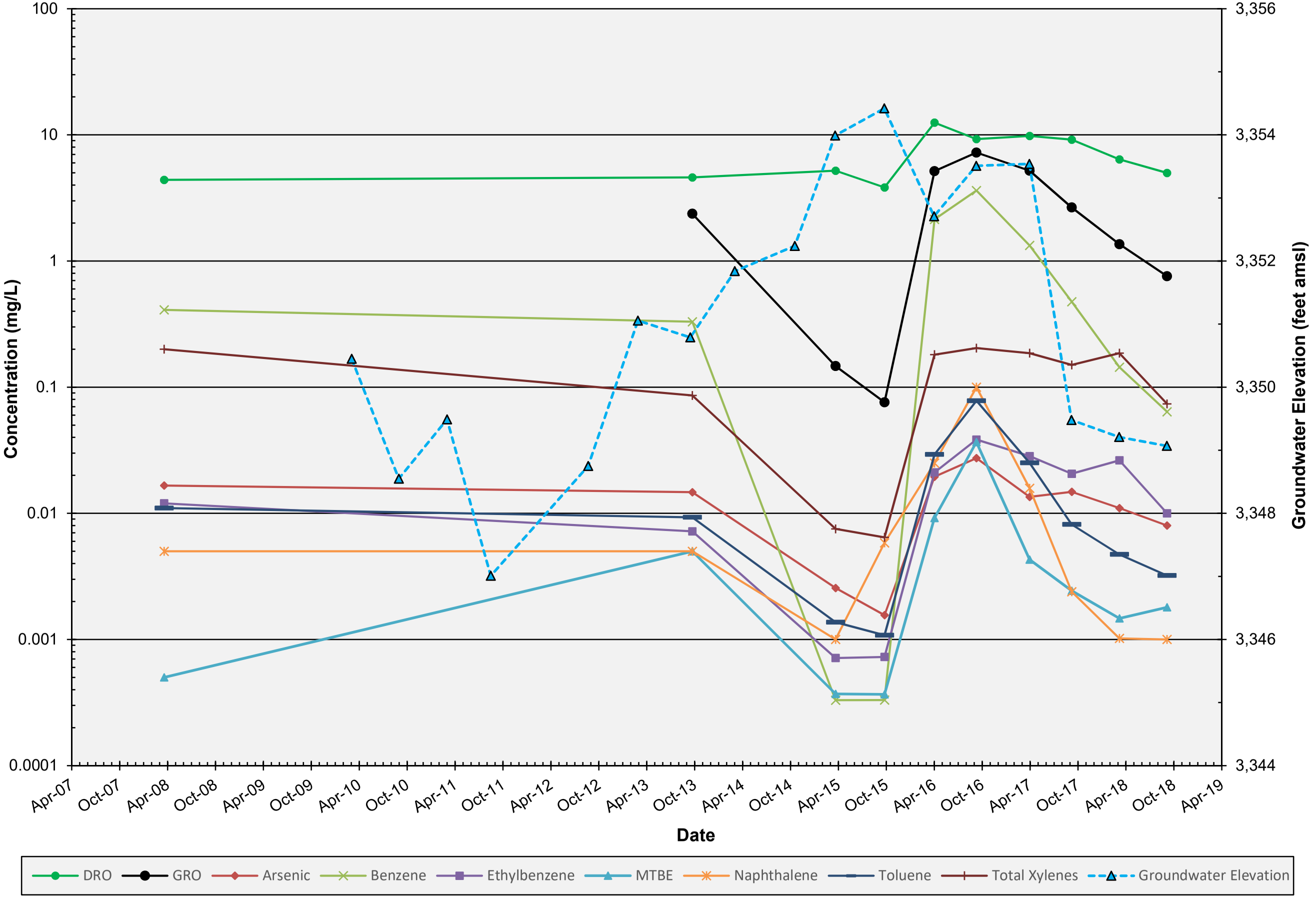
North Refinery Area



MW-39: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

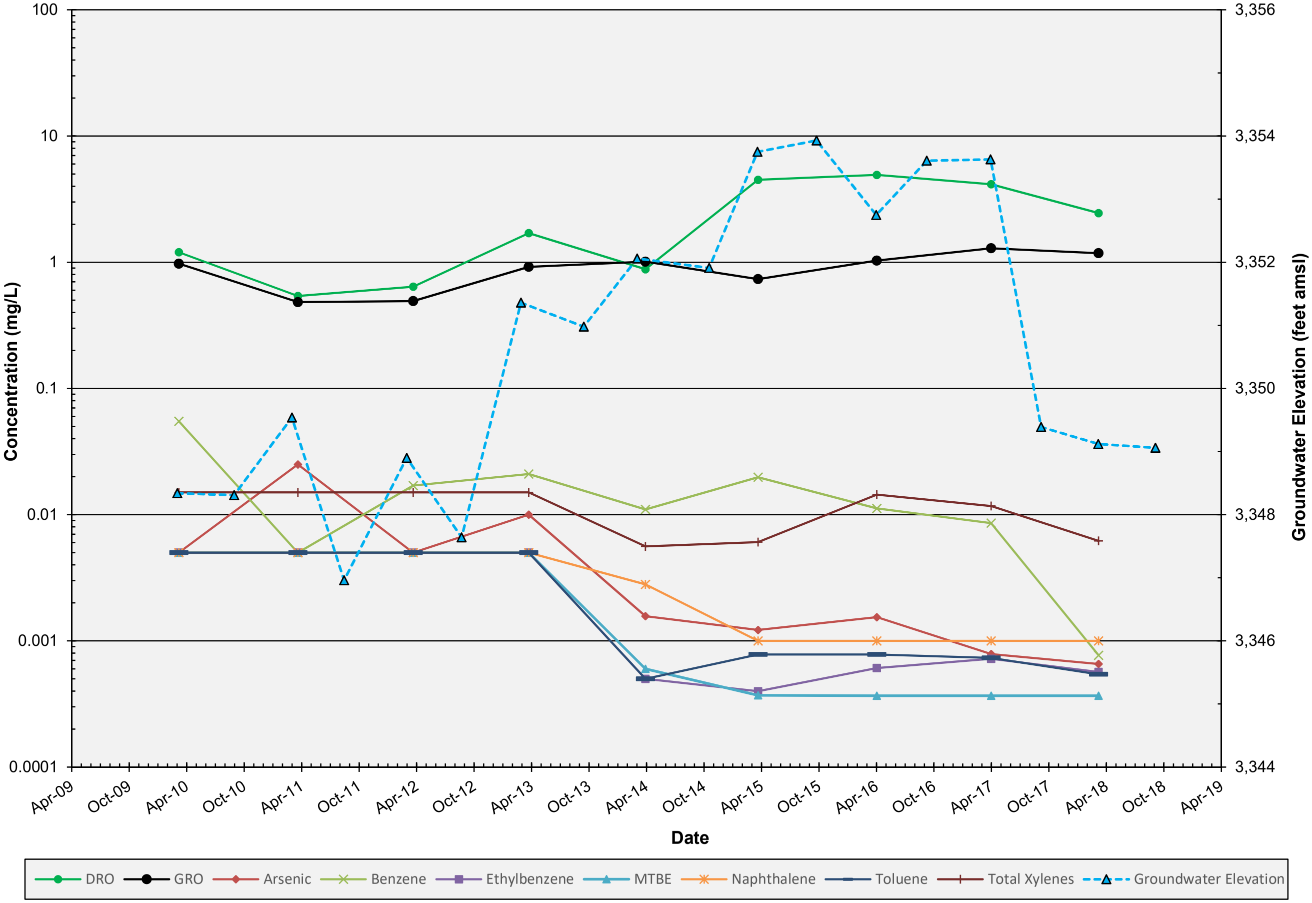
North Refinery Area



MW-40: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

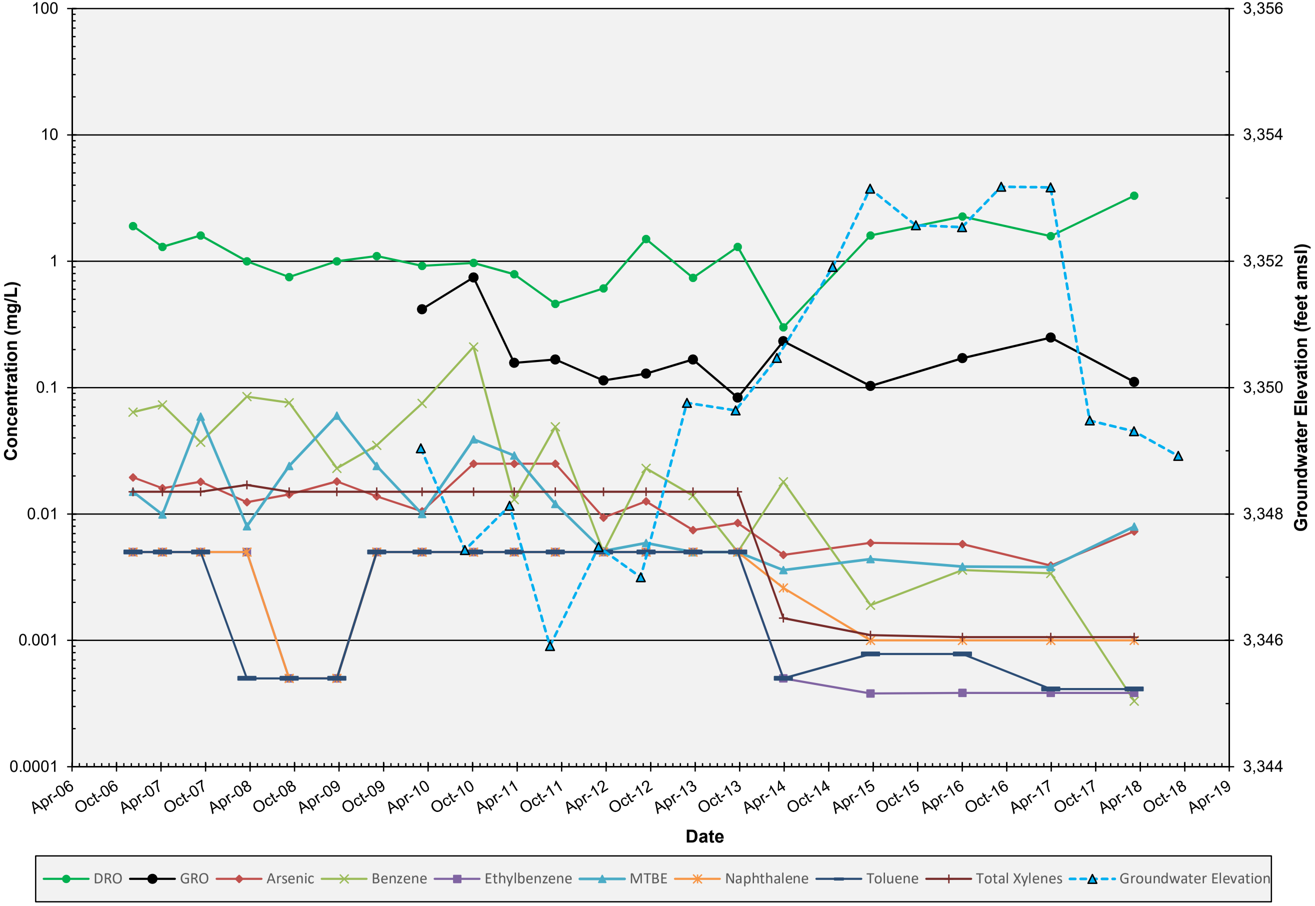
North Refinery Area



MW-41: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

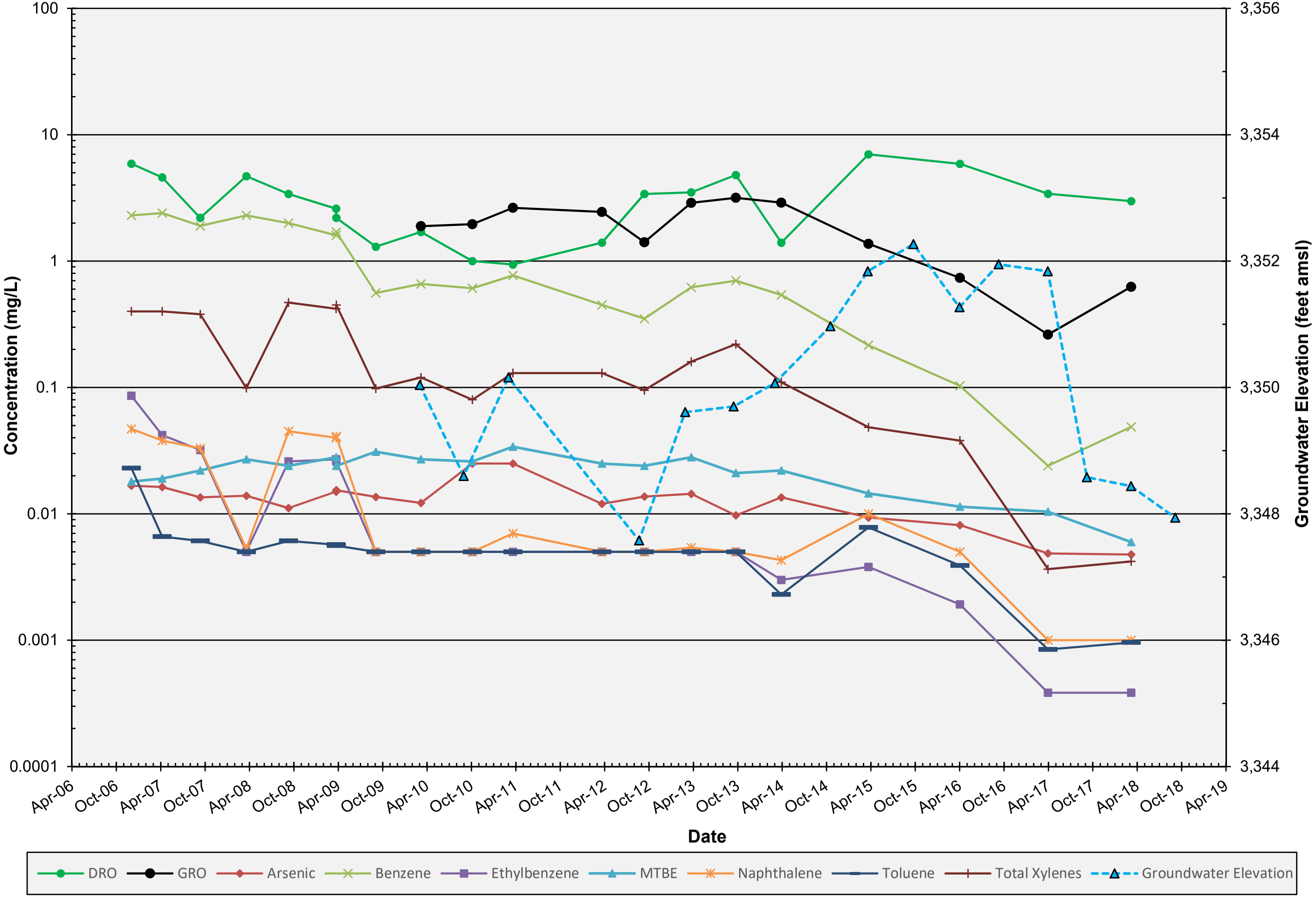
North Refinery Area



MW-42: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

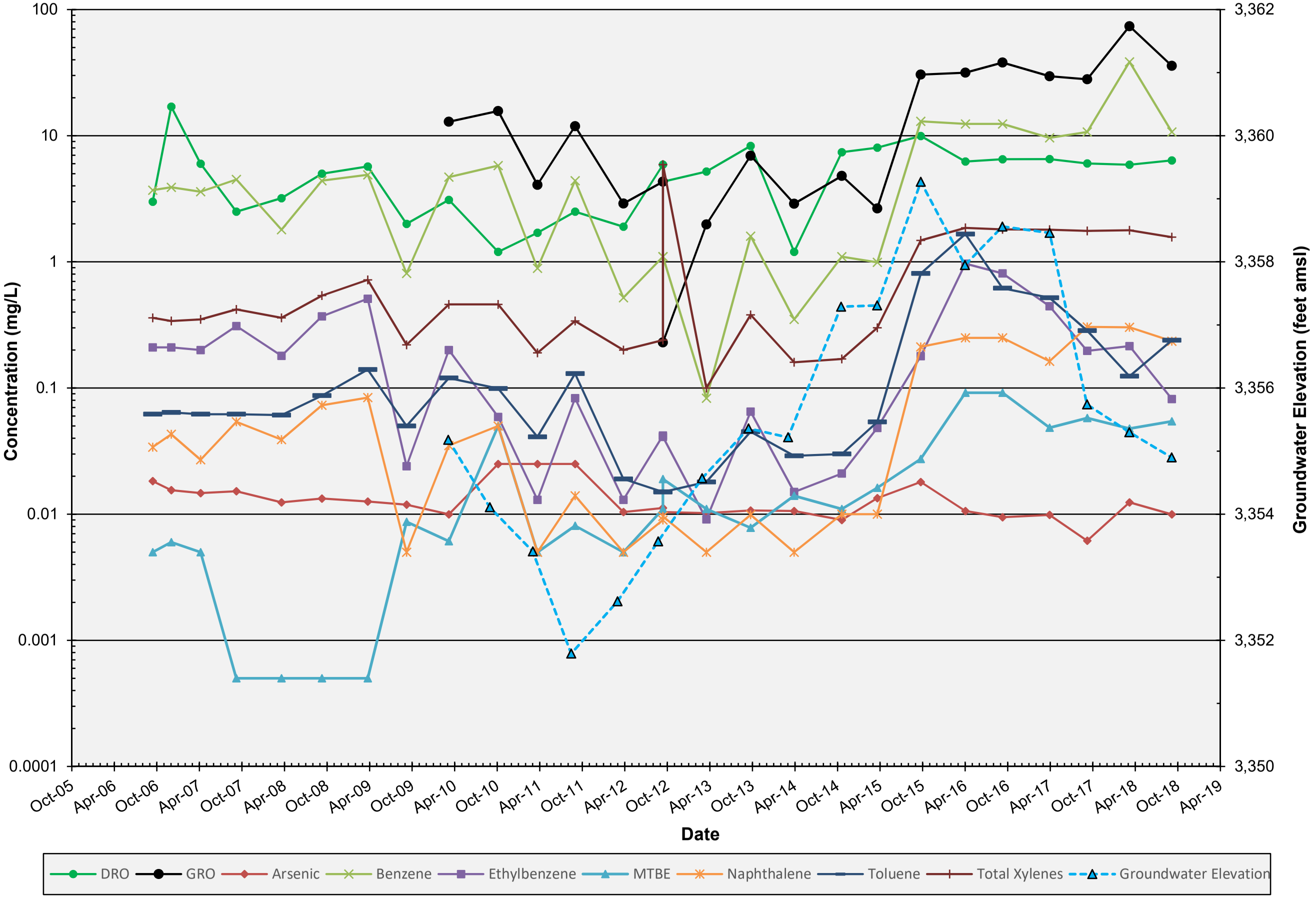
North Refinery Area



MW-43: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

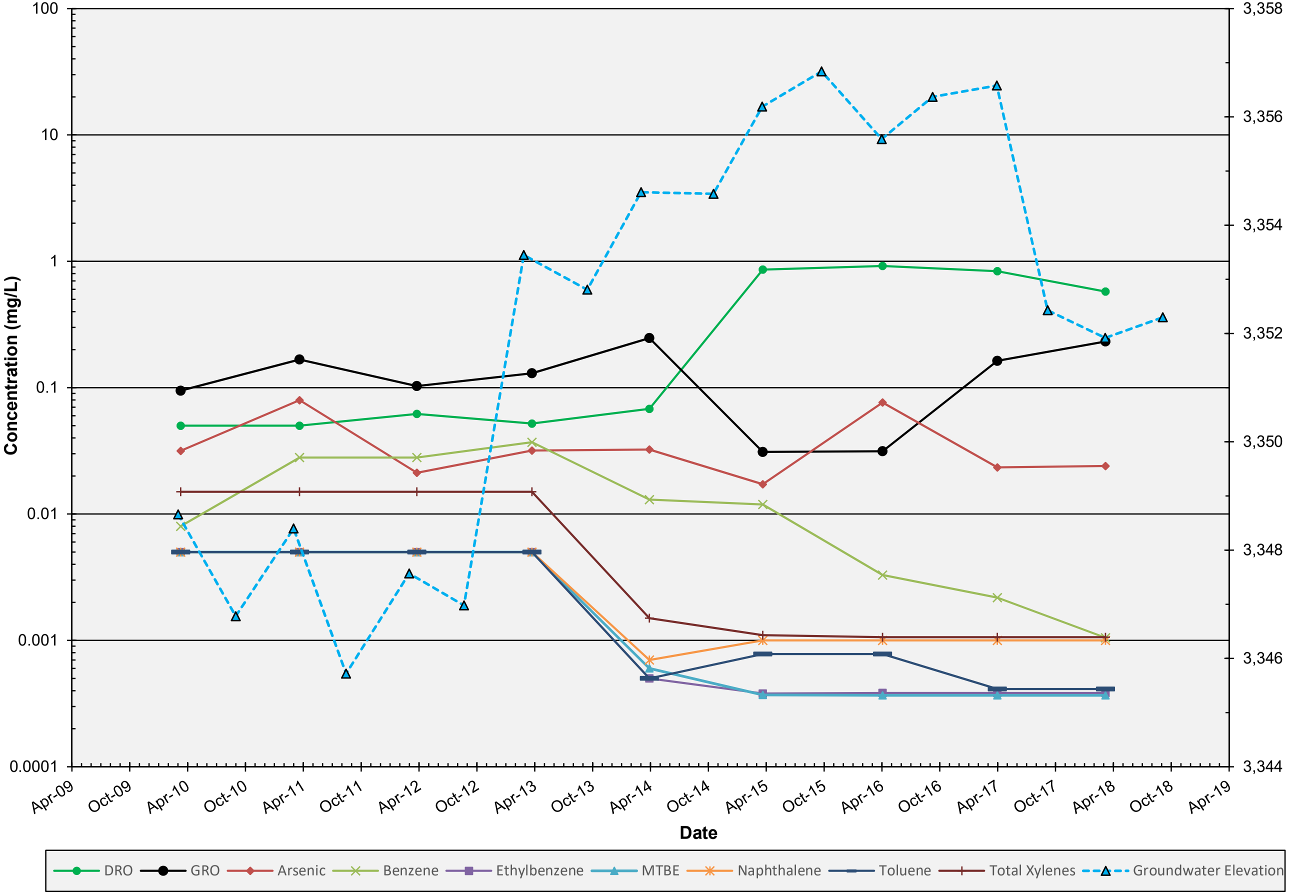
North Refinery Area



MW-59: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

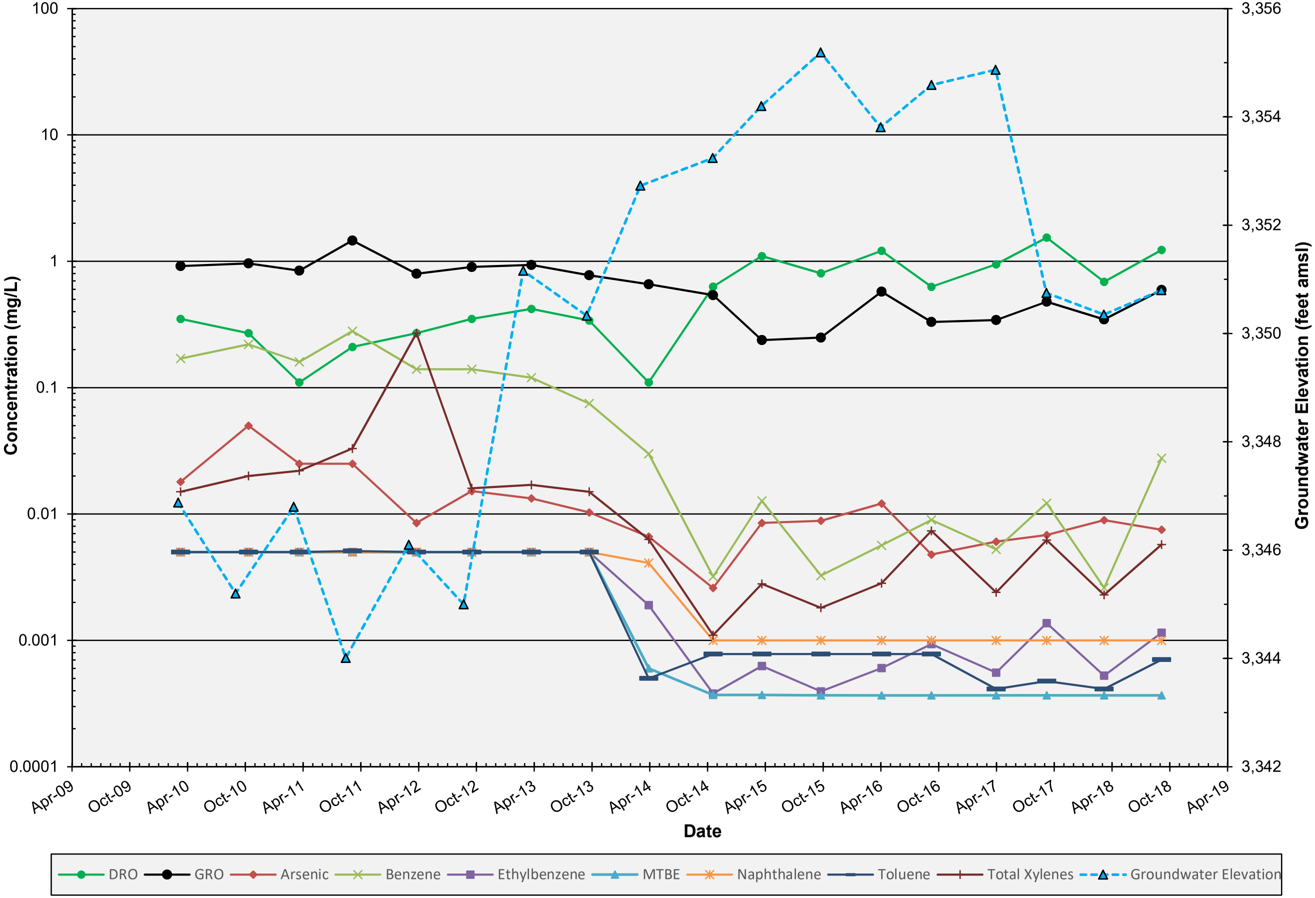
North Refinery Area



MW-60: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

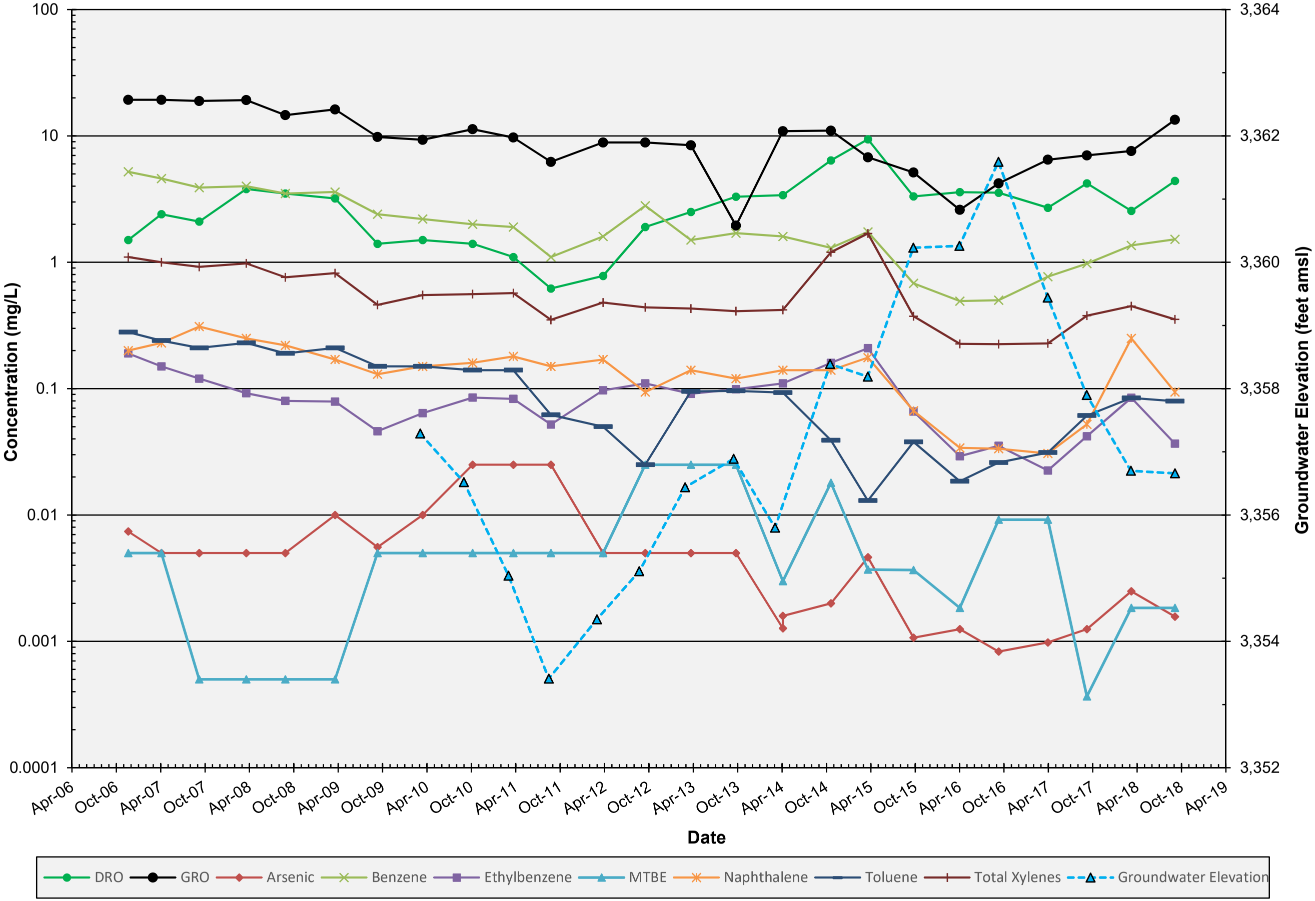
North Refinery Area



MW-61: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

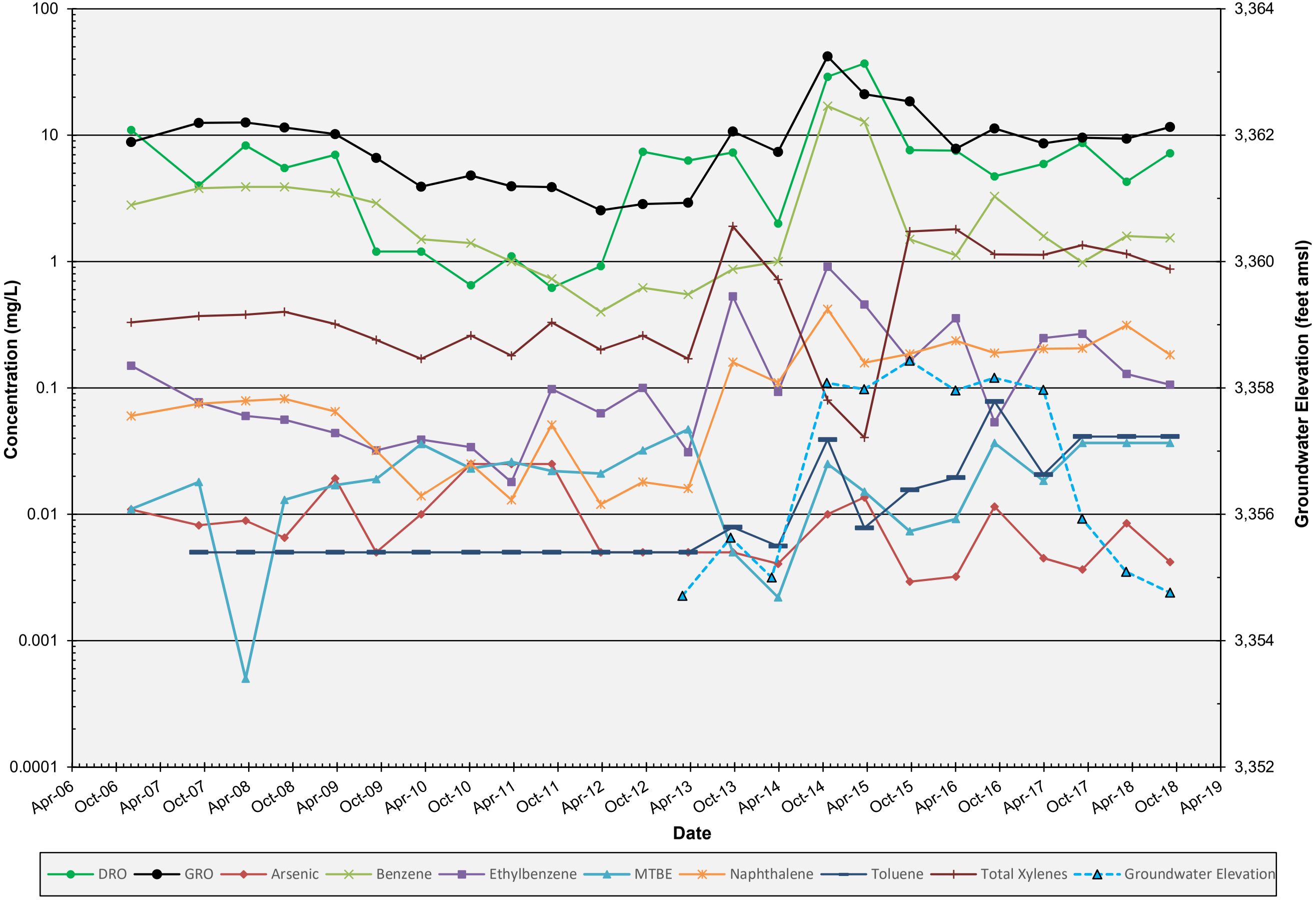
North Refinery Area



MW-62: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

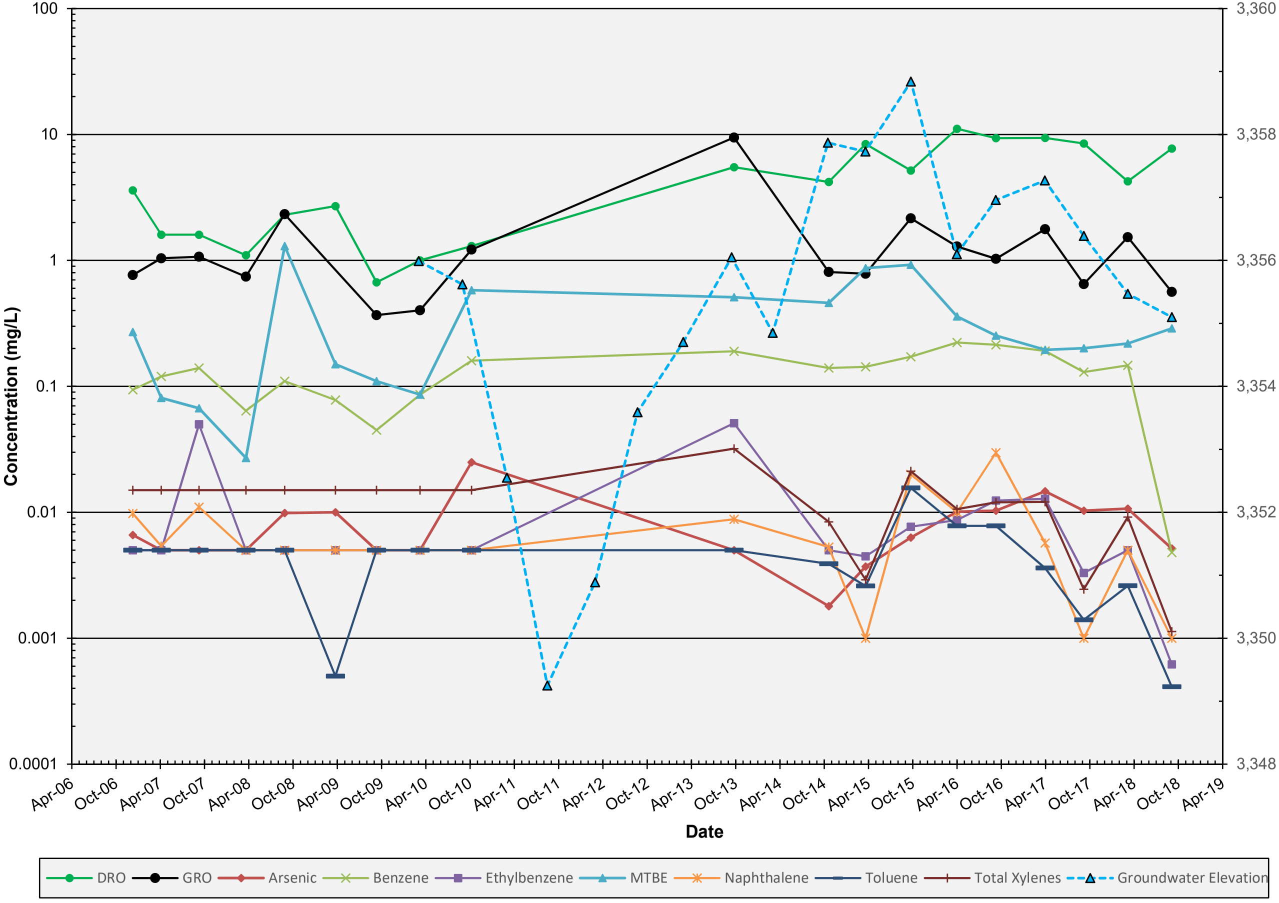
North Refinery Area



MW-67: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

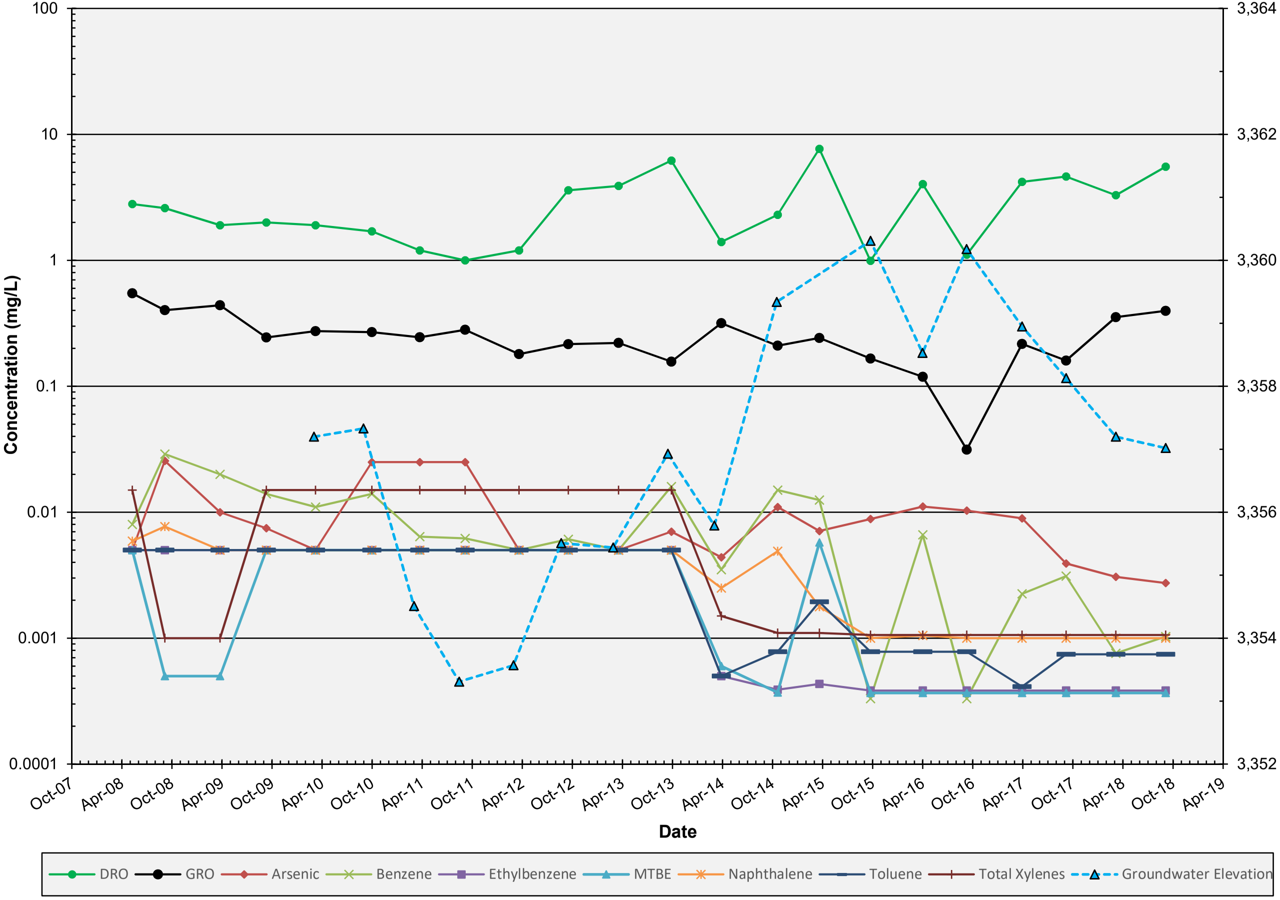
North Refinery Area



MW-90: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

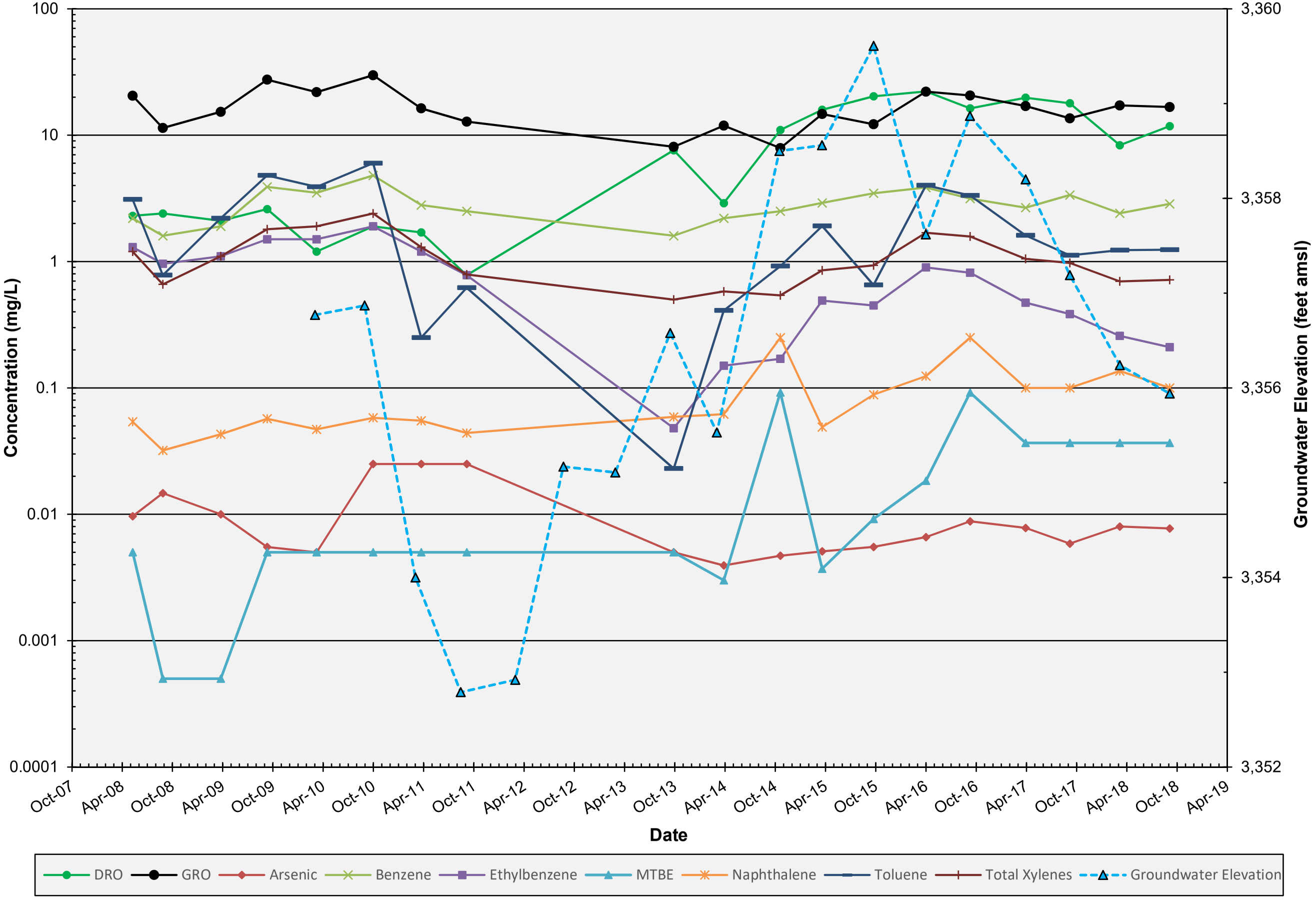
North Refinery Area



MW-91: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

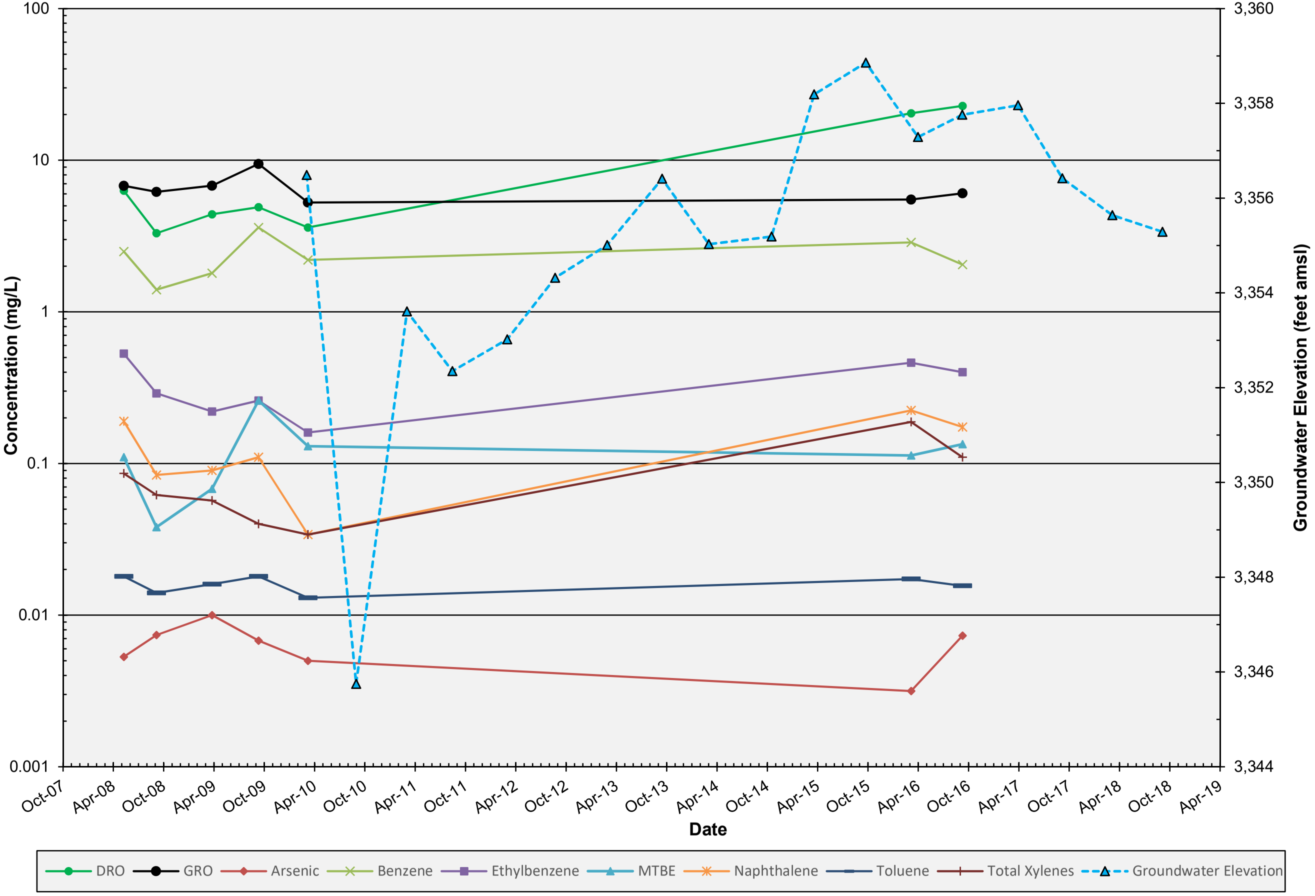
North Refinery Area



MW-92: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

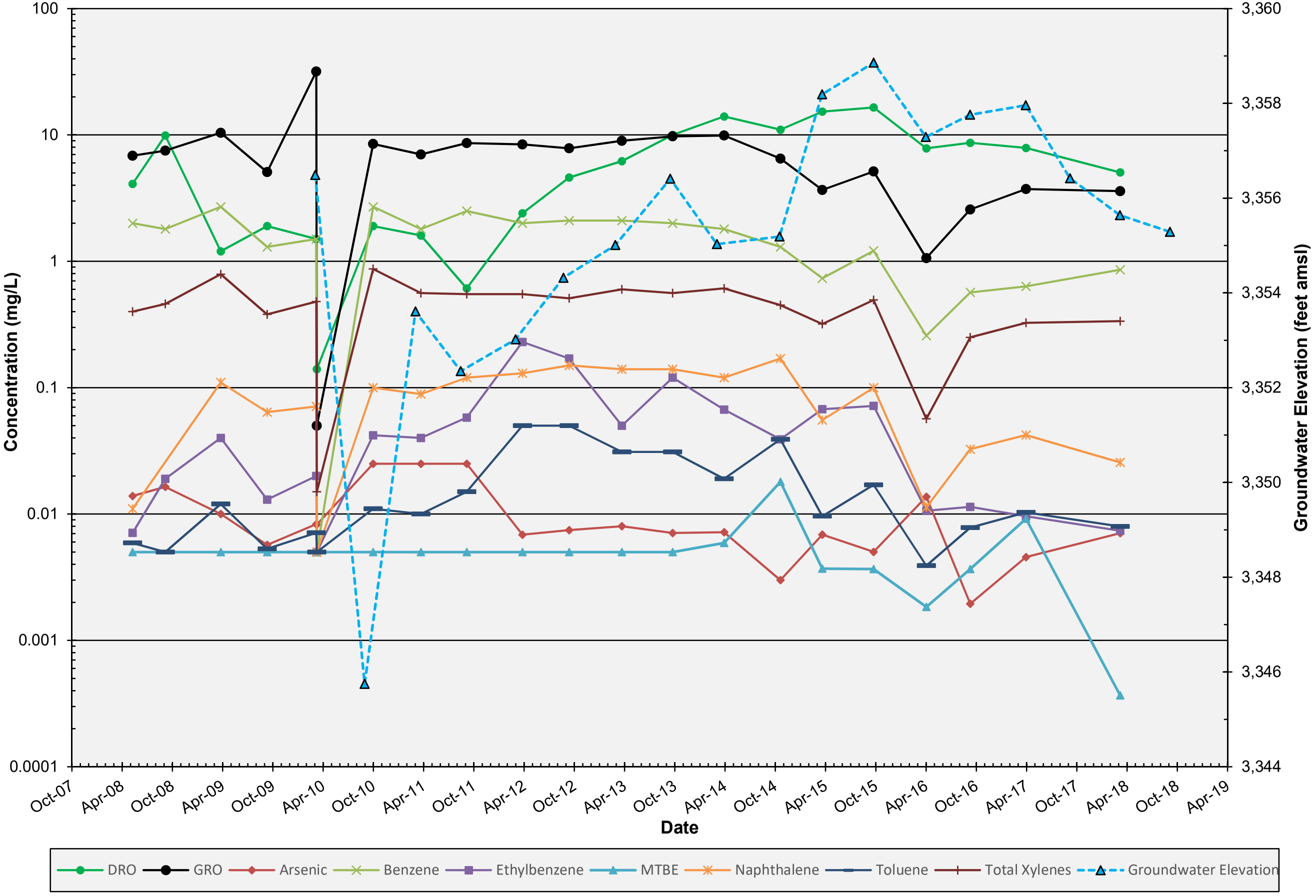
North Refinery Area



MW-93: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

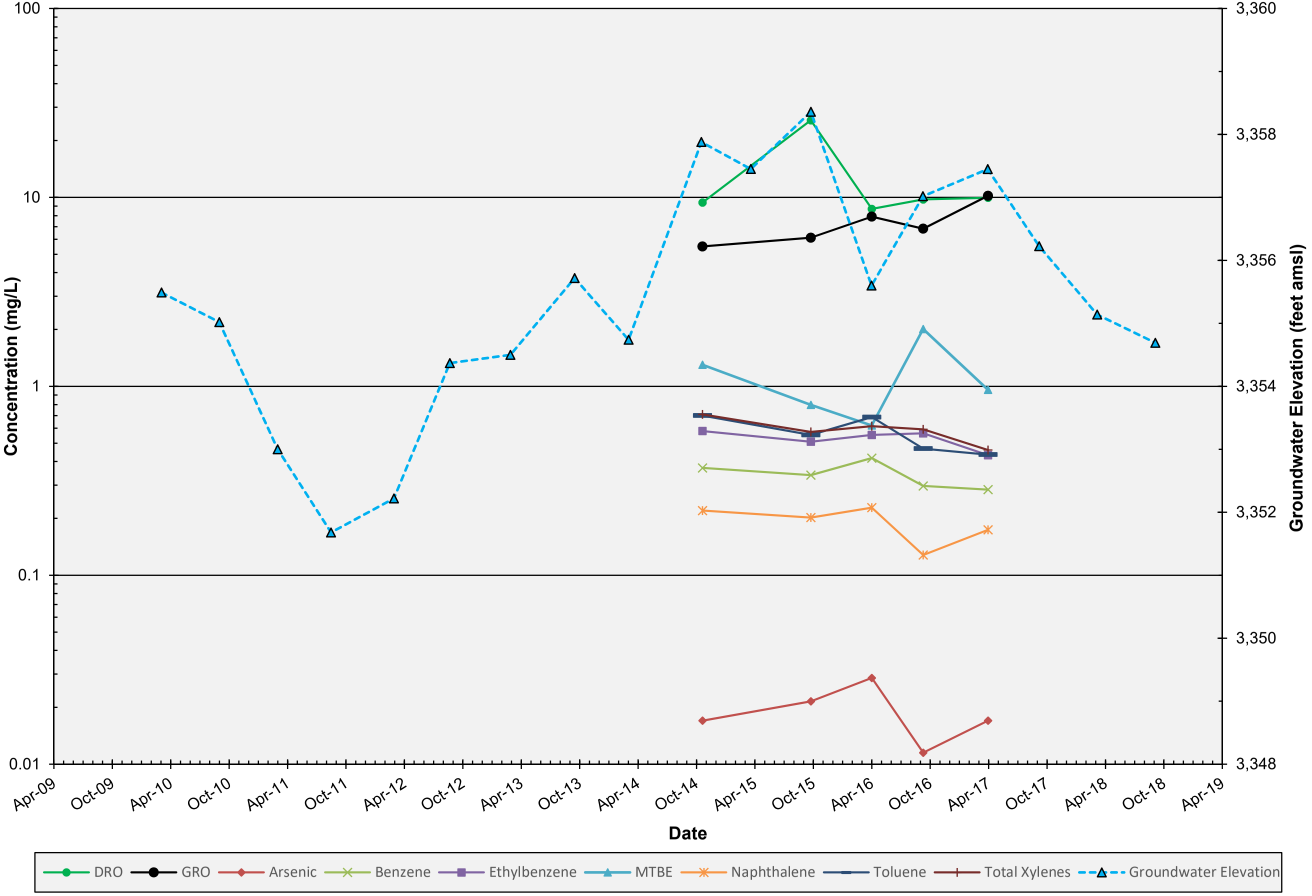
North Refinery Area



MW-94: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

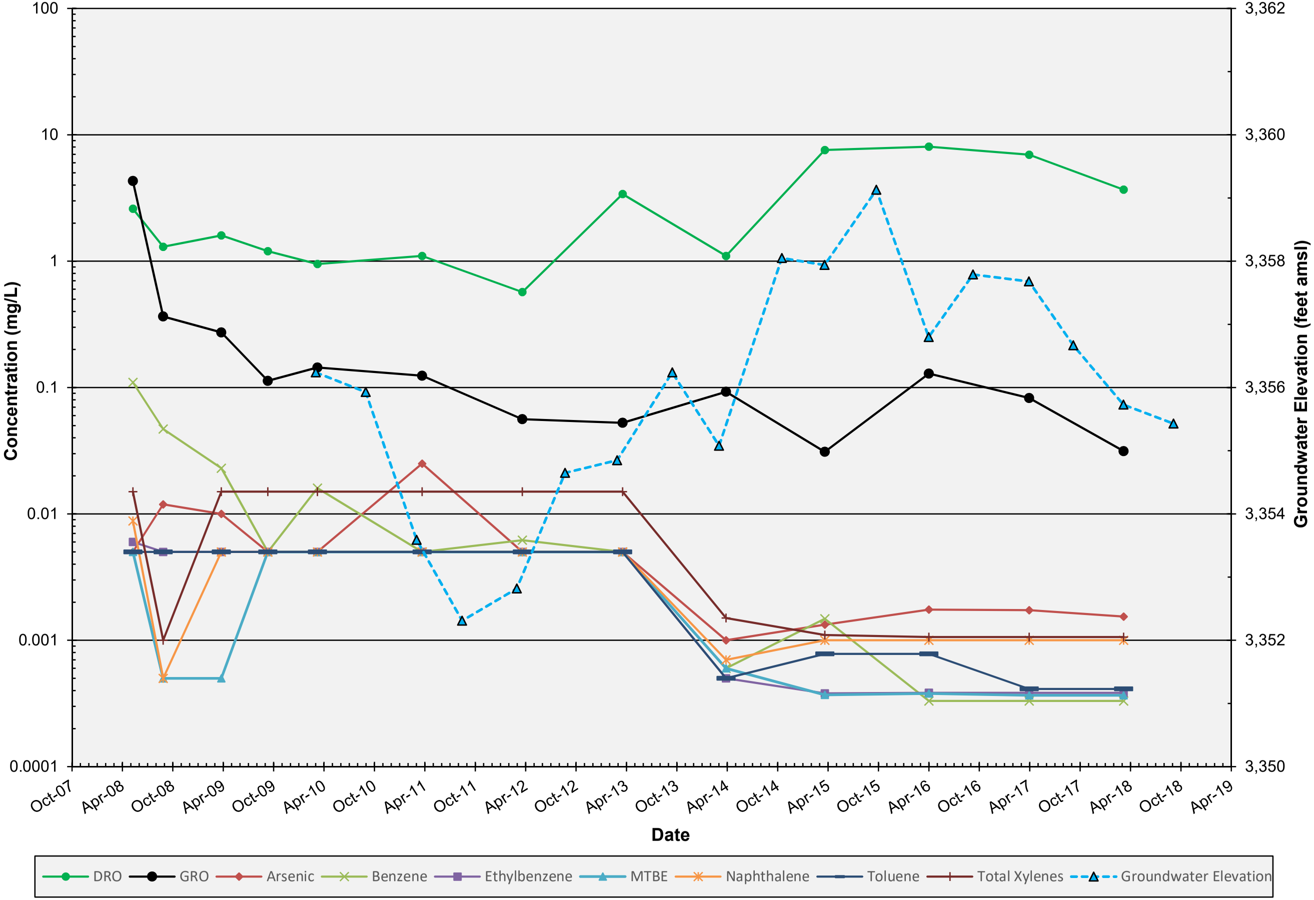
North Refinery Area



MW-95: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

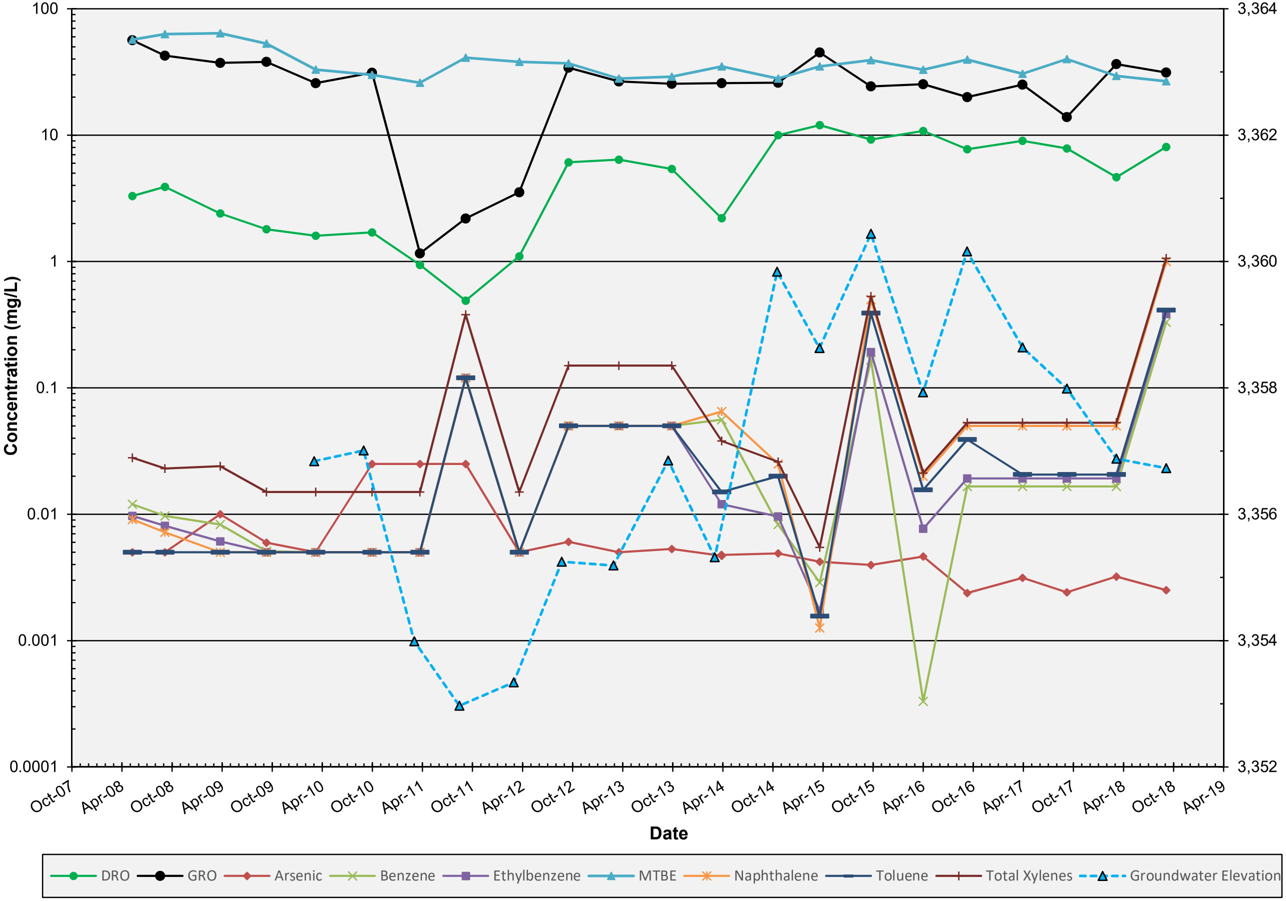
North Refinery Area



MW-96: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

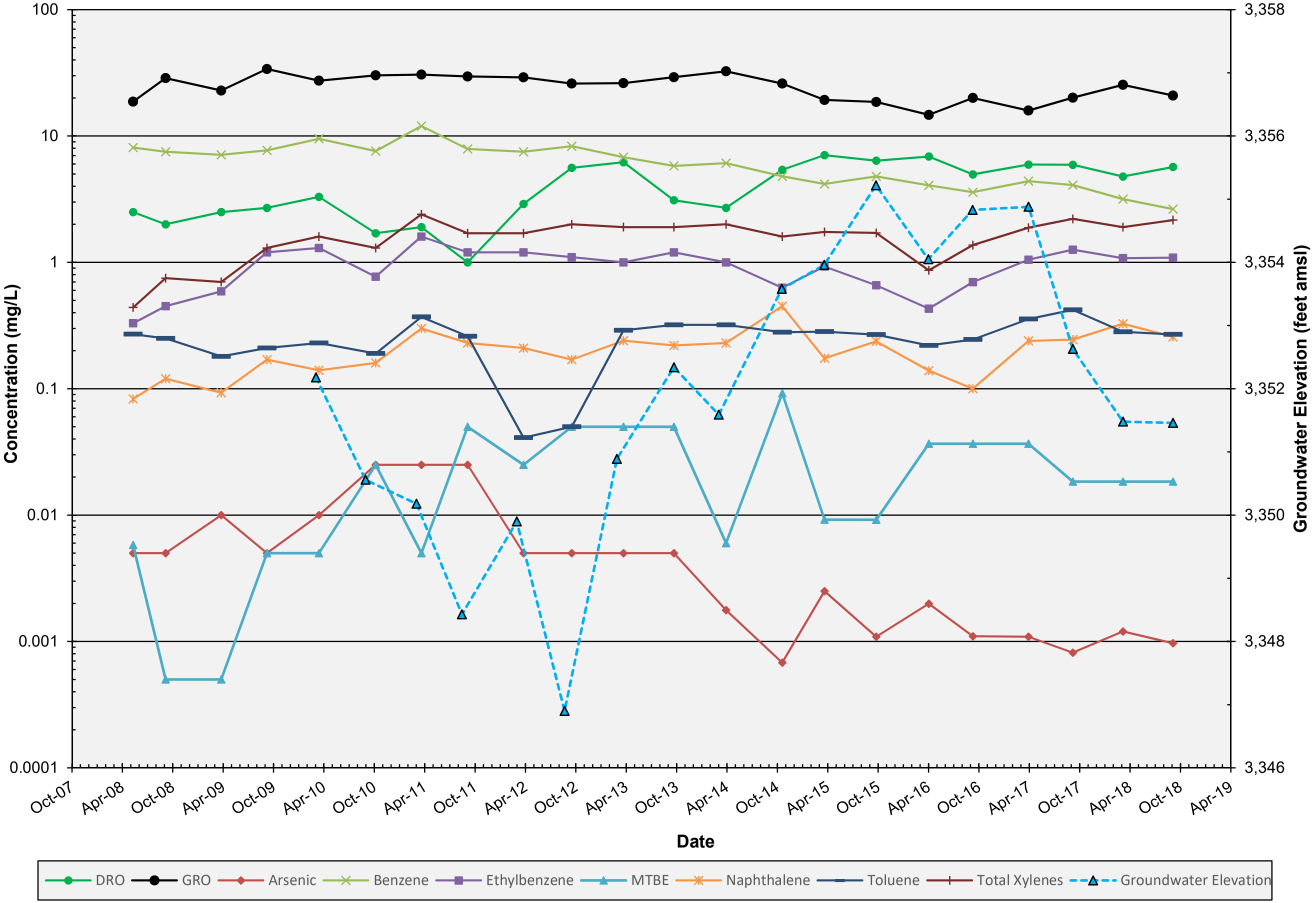
North Refinery Area



MW-98: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

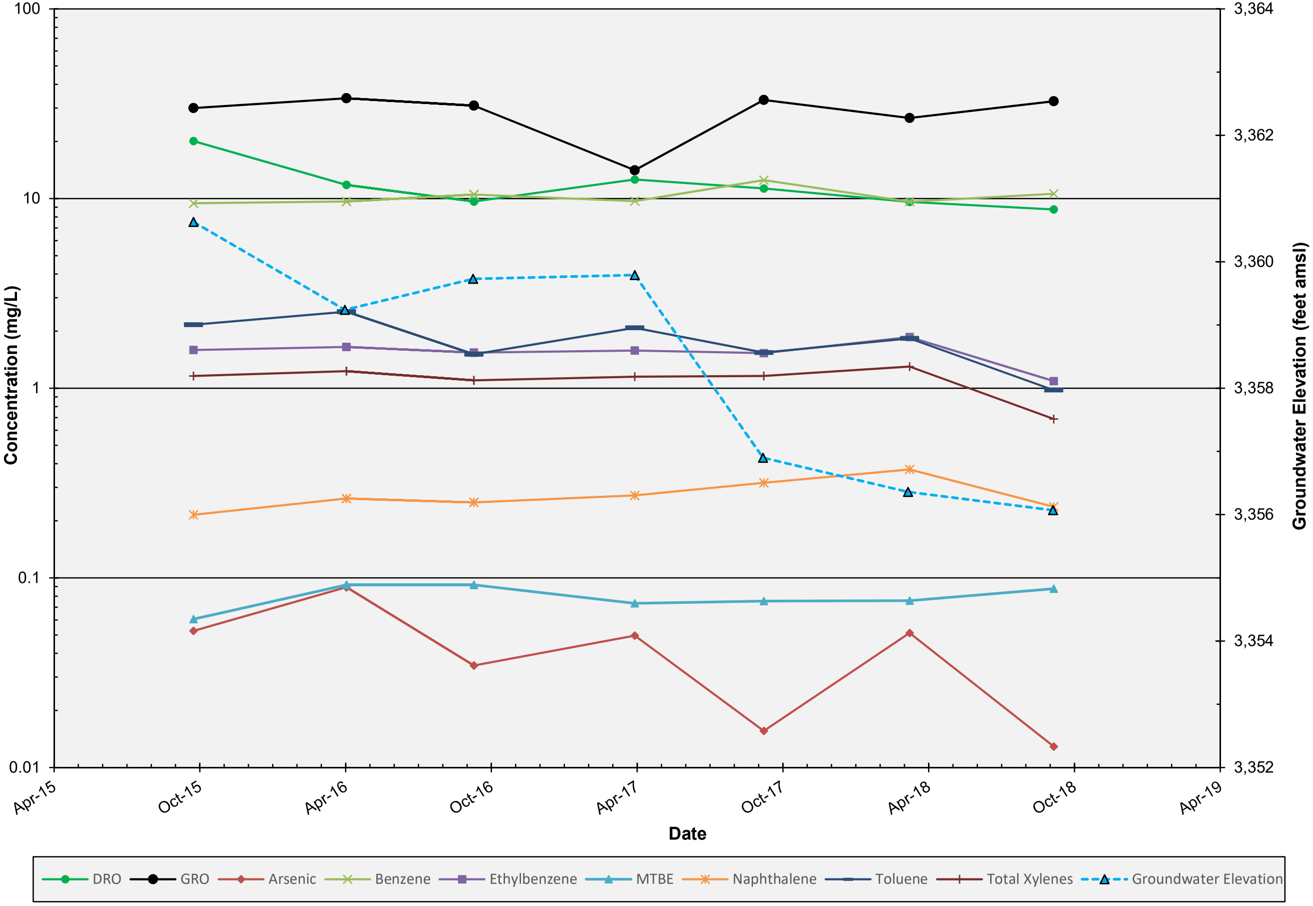
North Refinery Area



MW-137: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

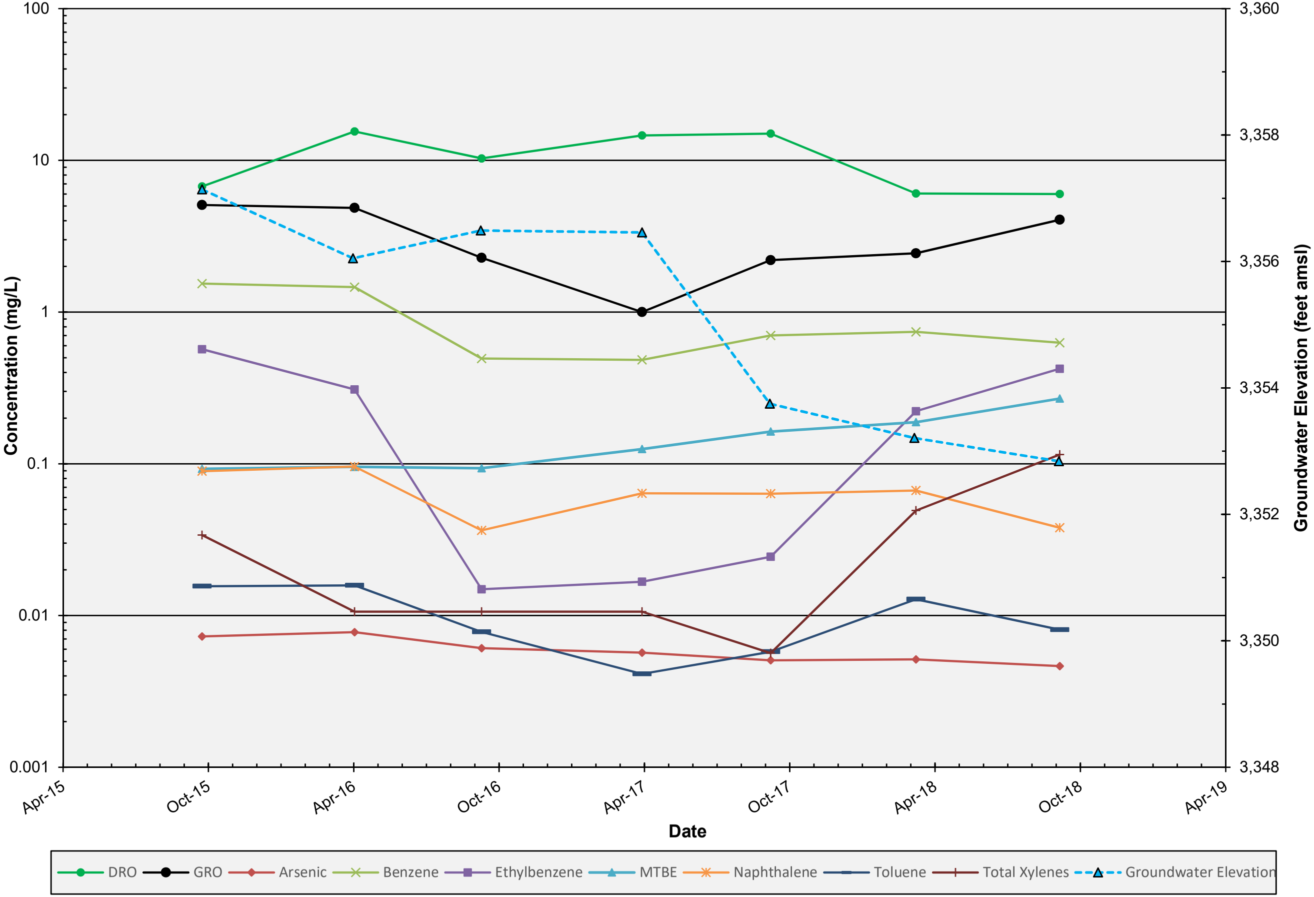
North Refinery Area



MW-138: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

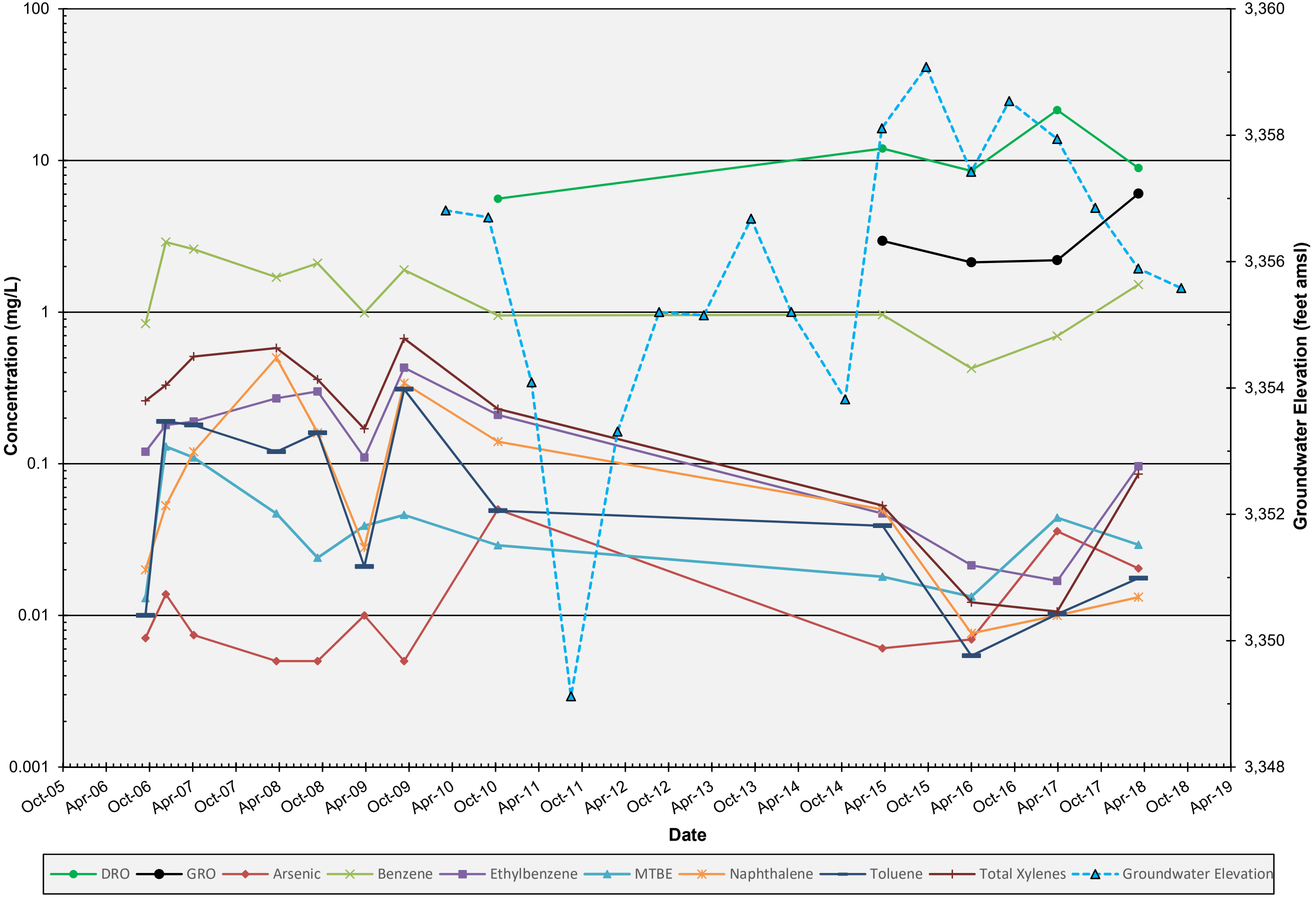
North Refinery Area



RW-1: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

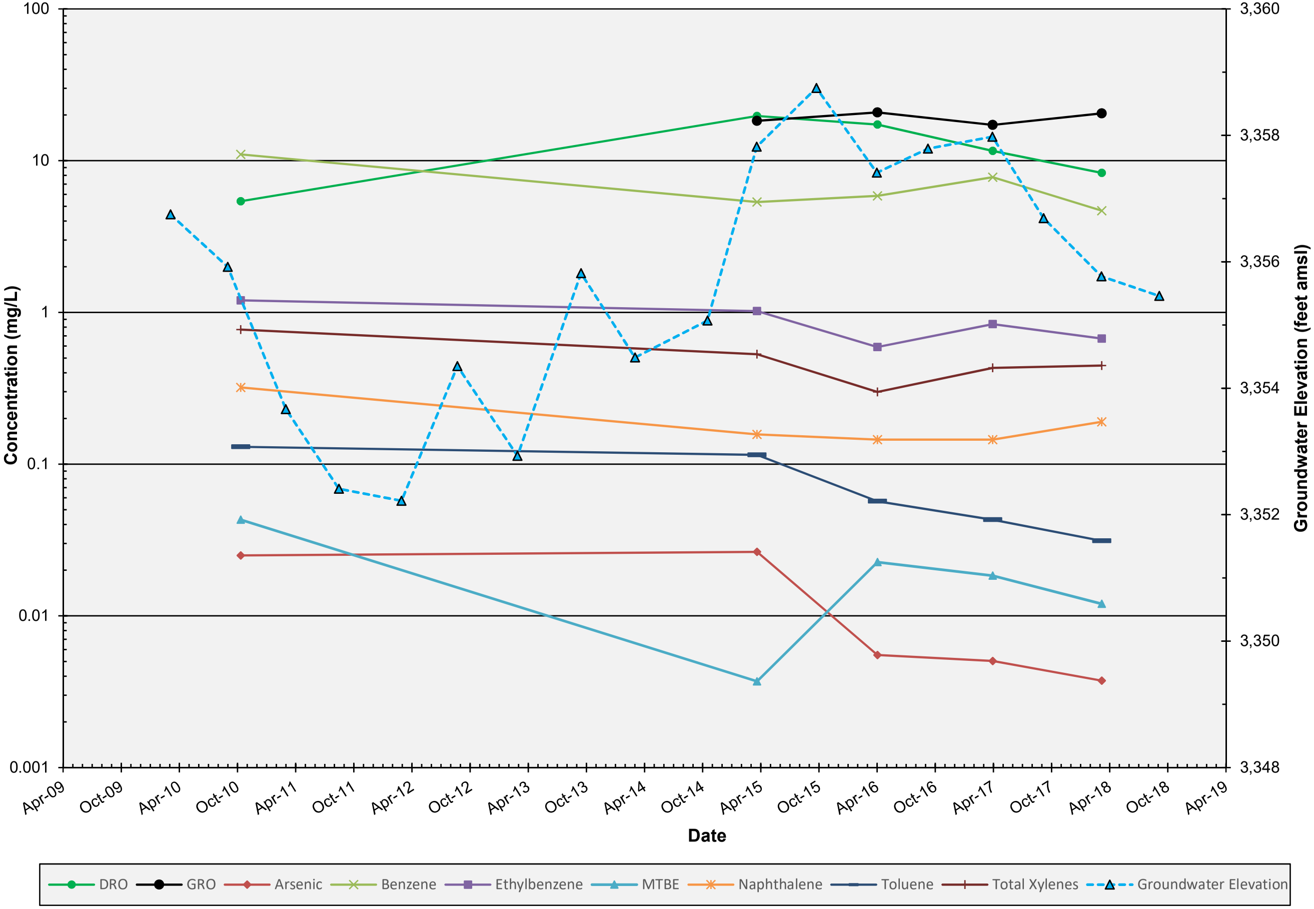
North Refinery Area



RW-2: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

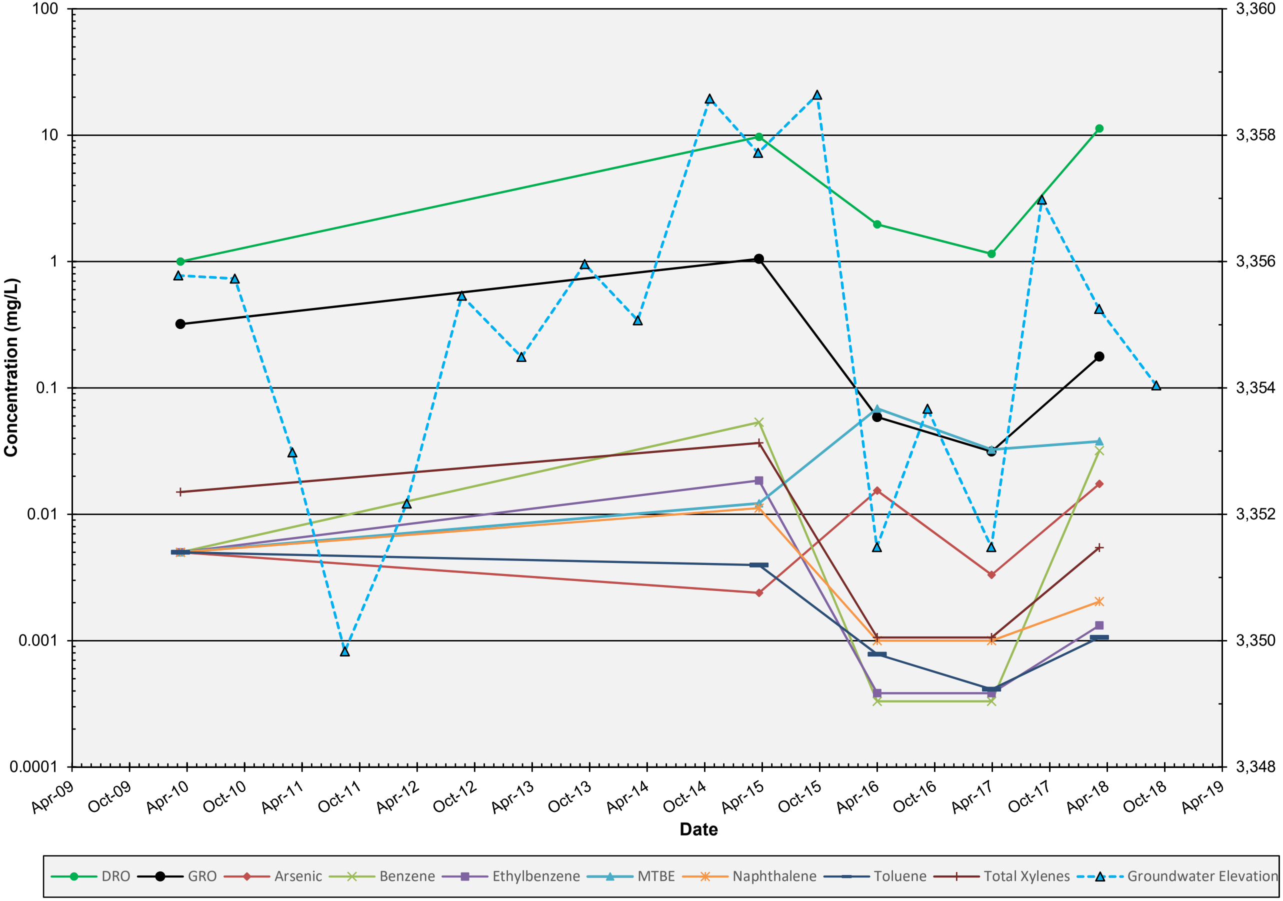
North Refinery Area



RW-7: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

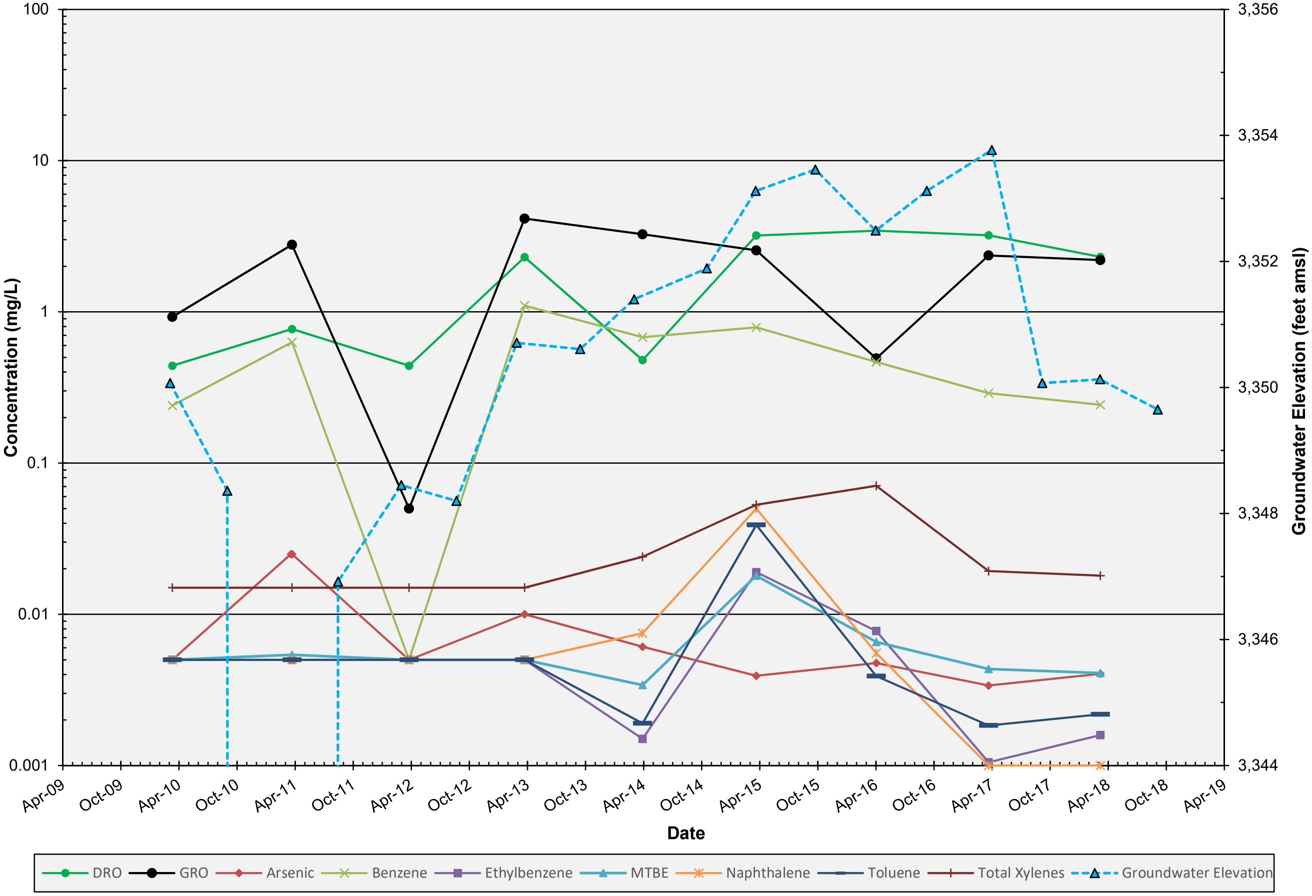
North Refinery Area



RW-9: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

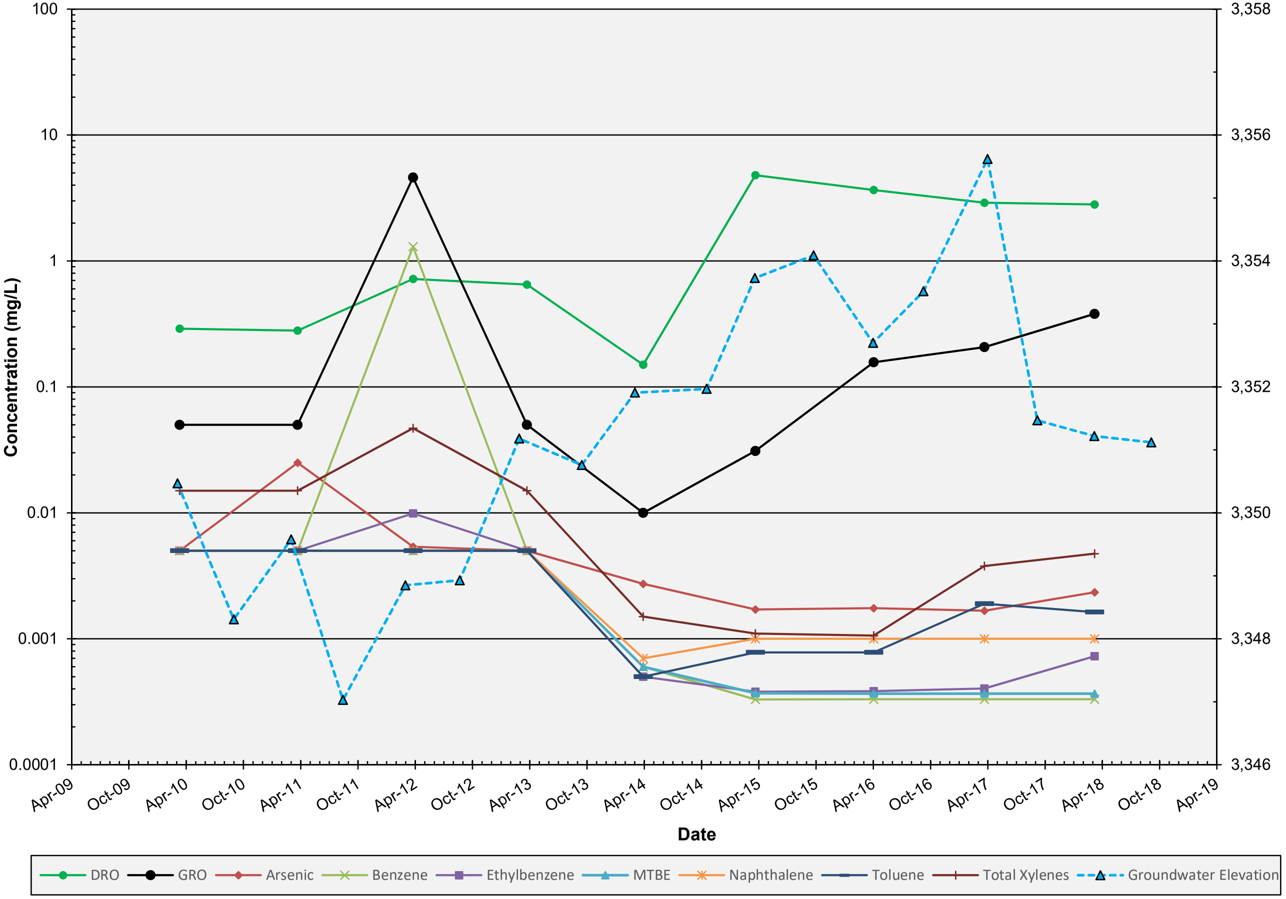
North Refinery Area



RW-10: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

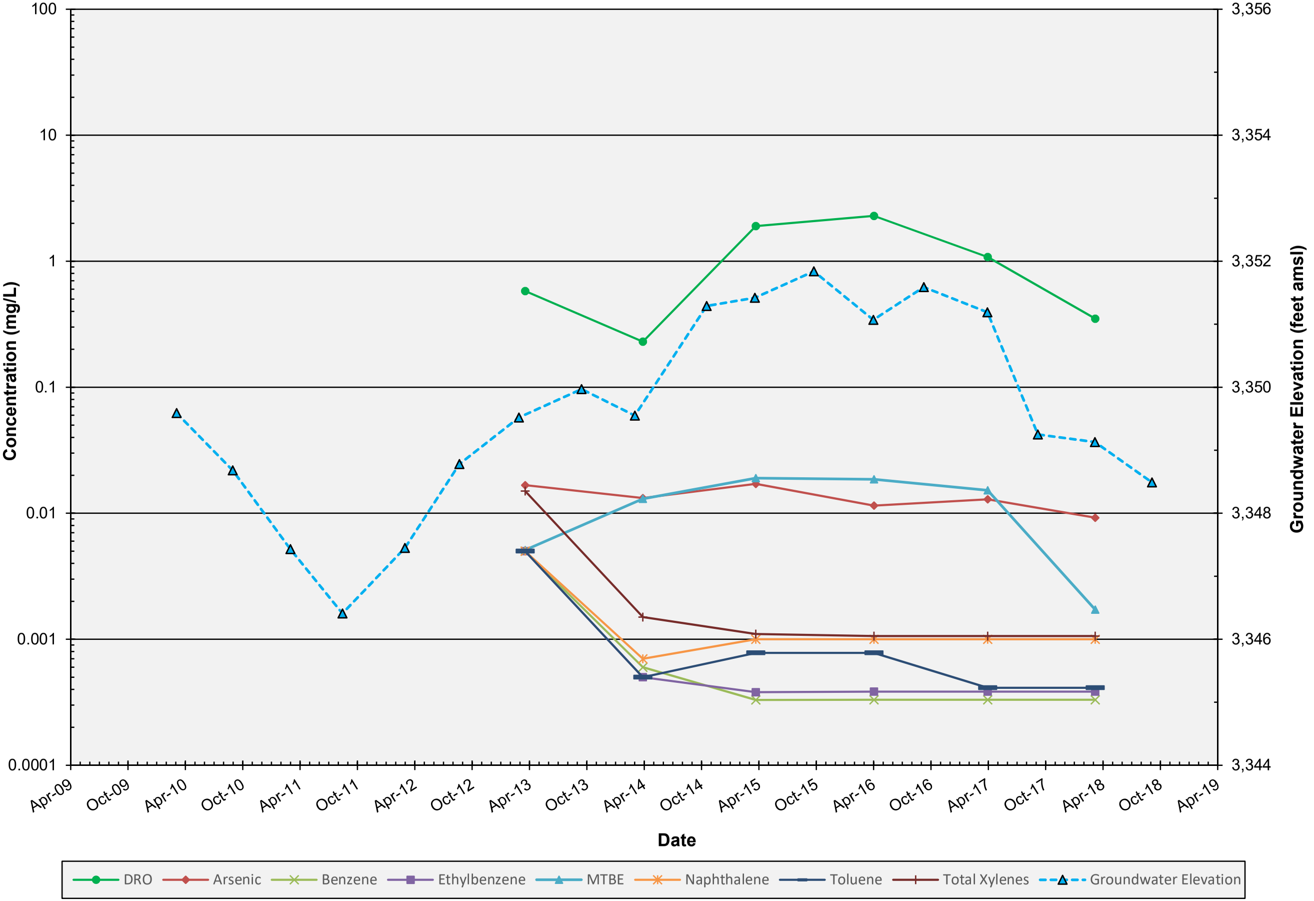
North Refinery Area



RW-16: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

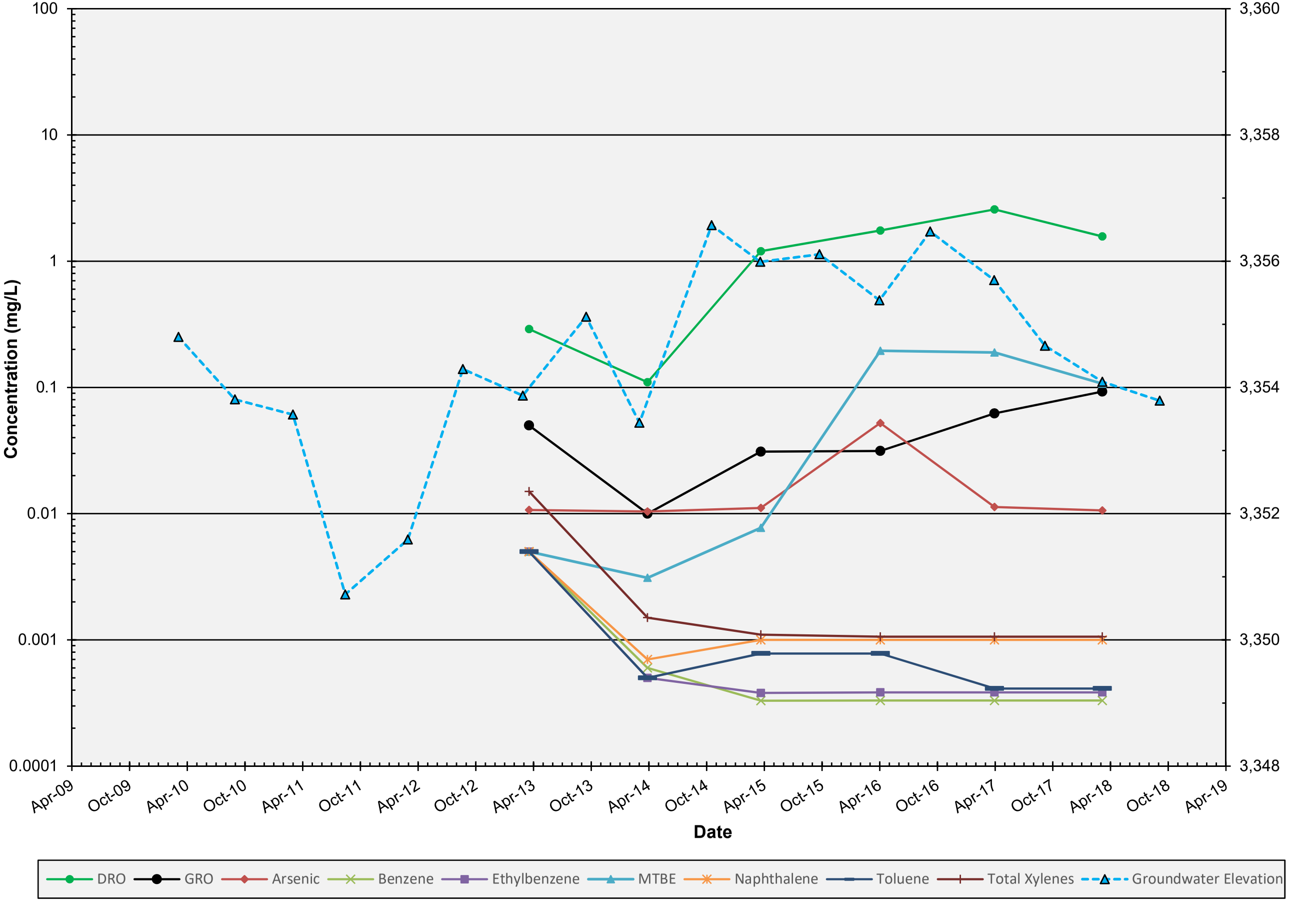
North Refinery Area



RW-17: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

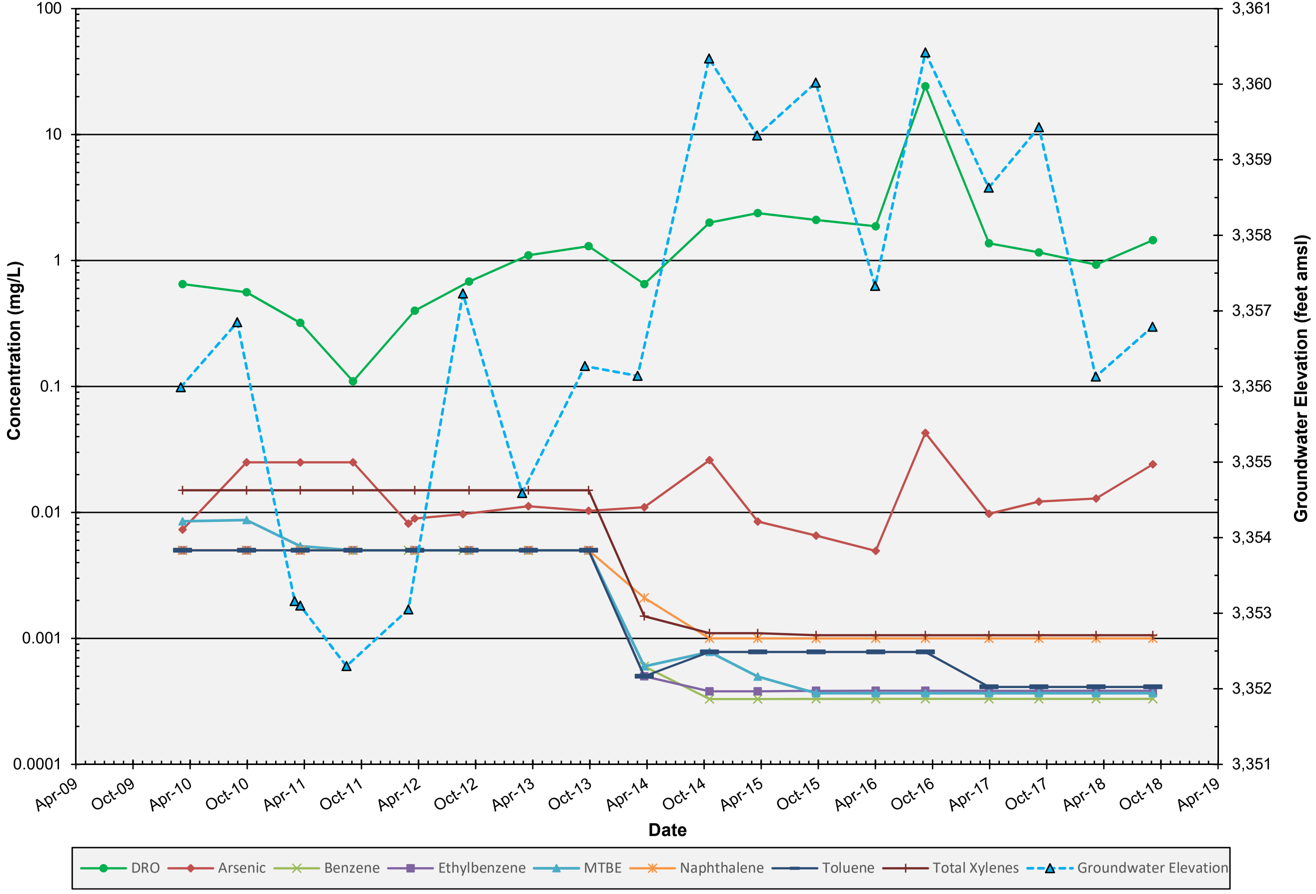
North Refinery Area



NCL-31: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

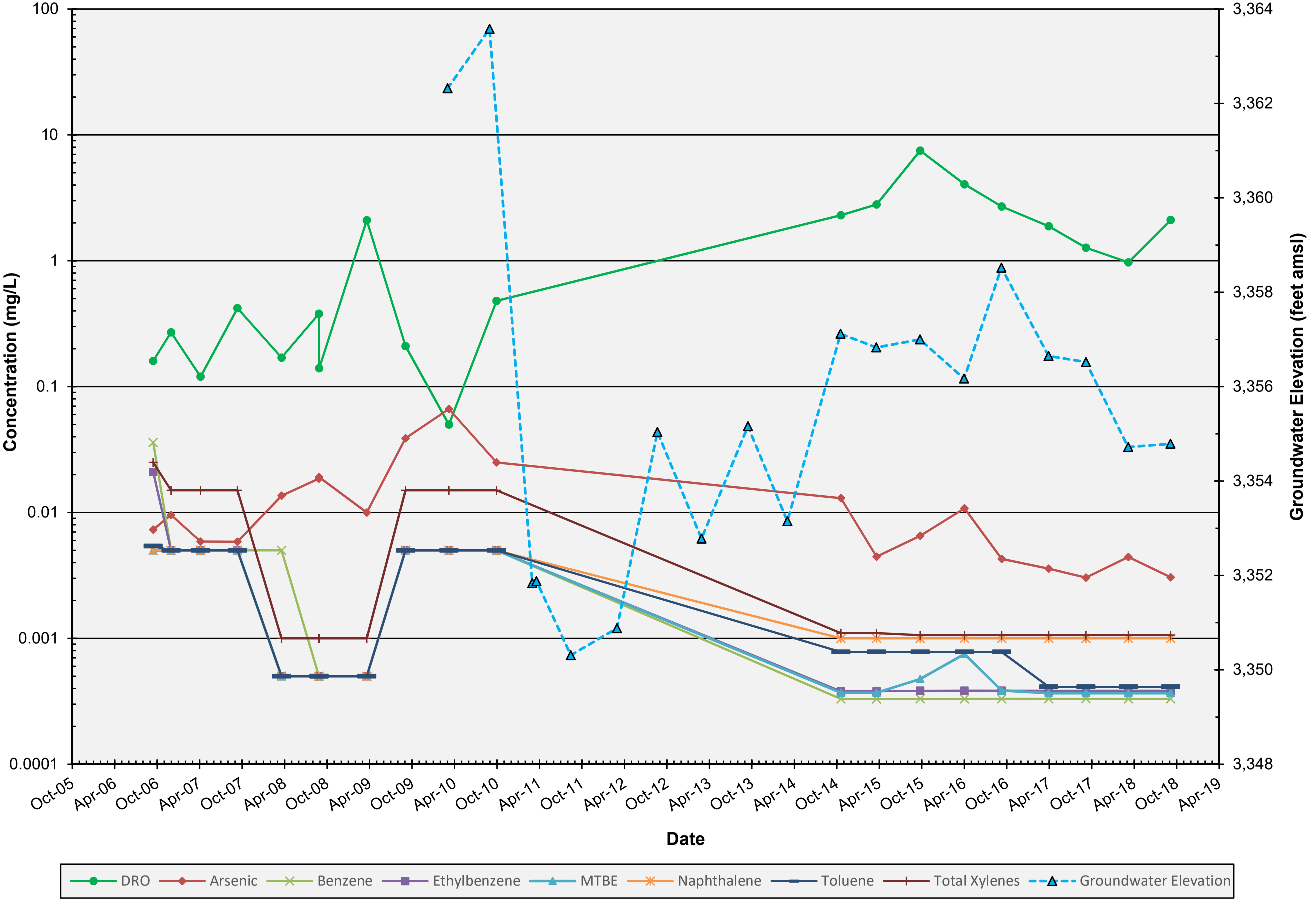
North Colony Landfarm



NCL-32: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

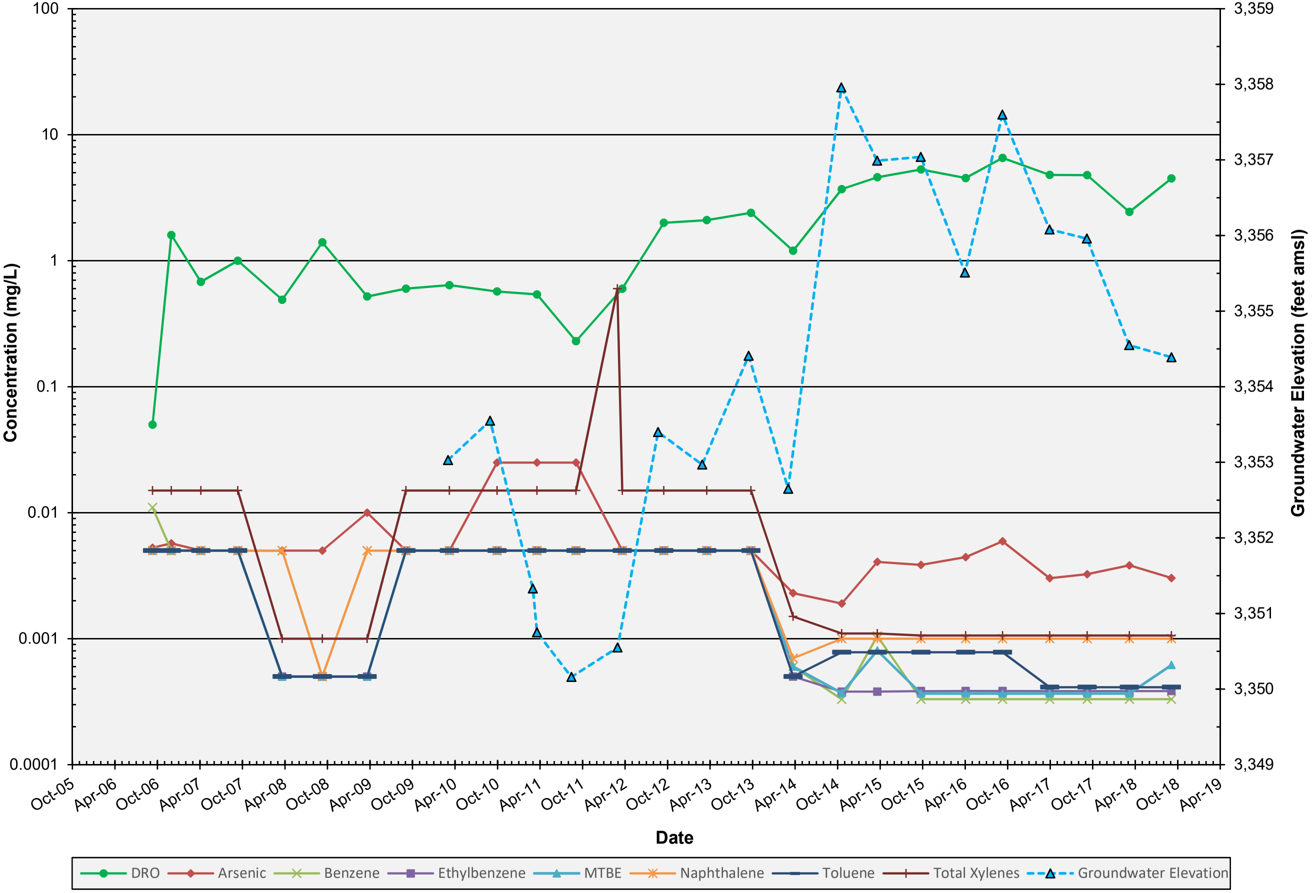
North Colony Landfarm



NCL-33: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

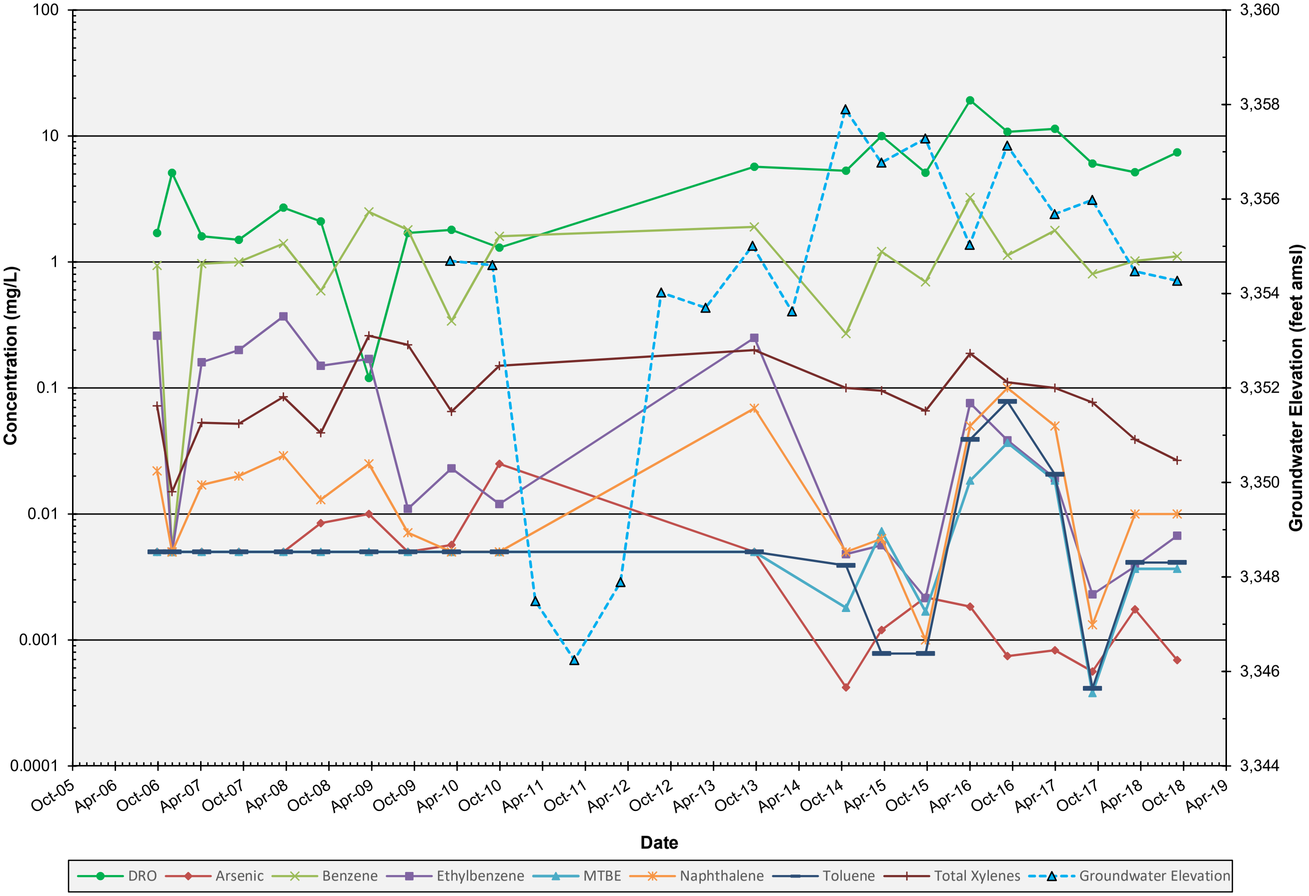
North Colony Landfarm



NCL-34A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

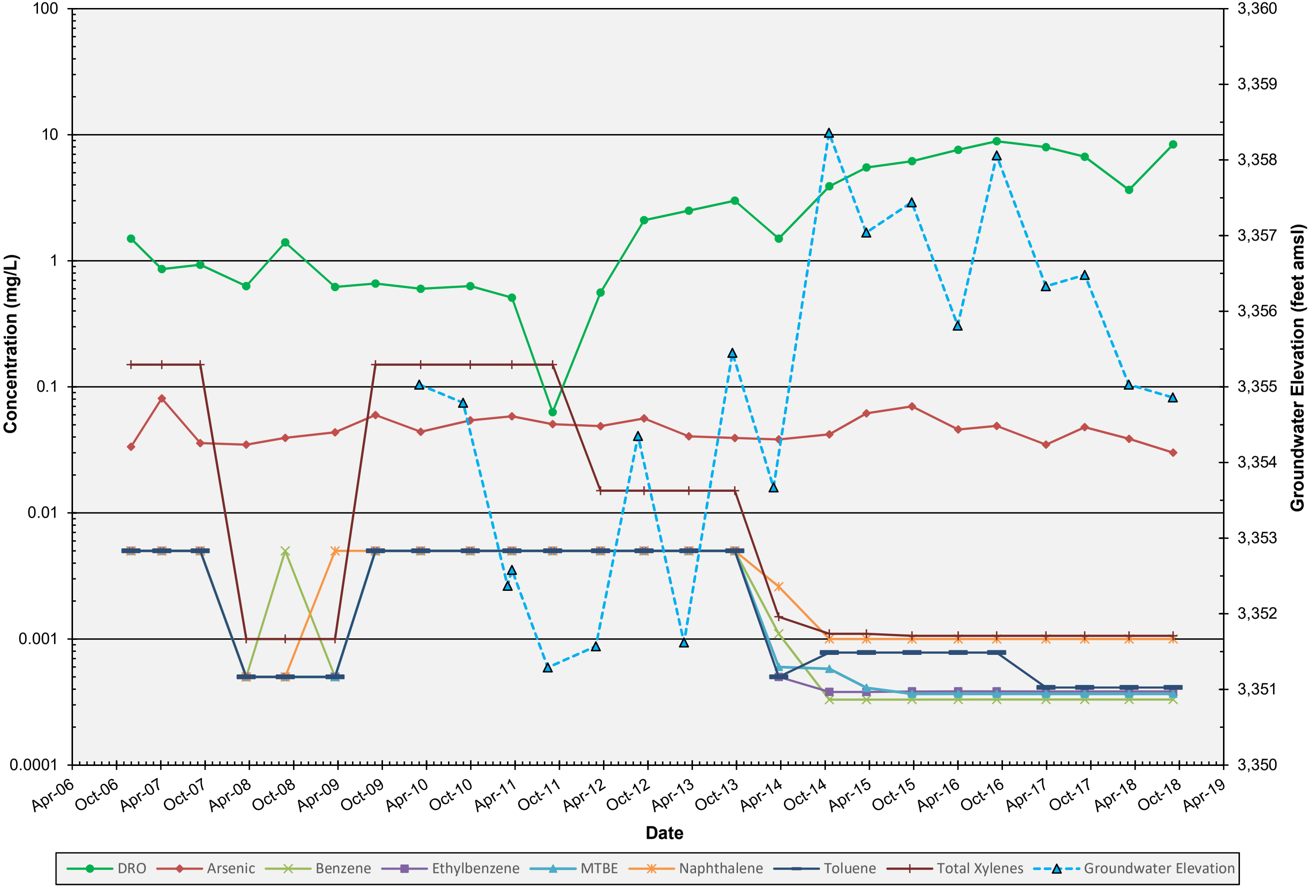
North Colony Landfarm



NCL-44: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

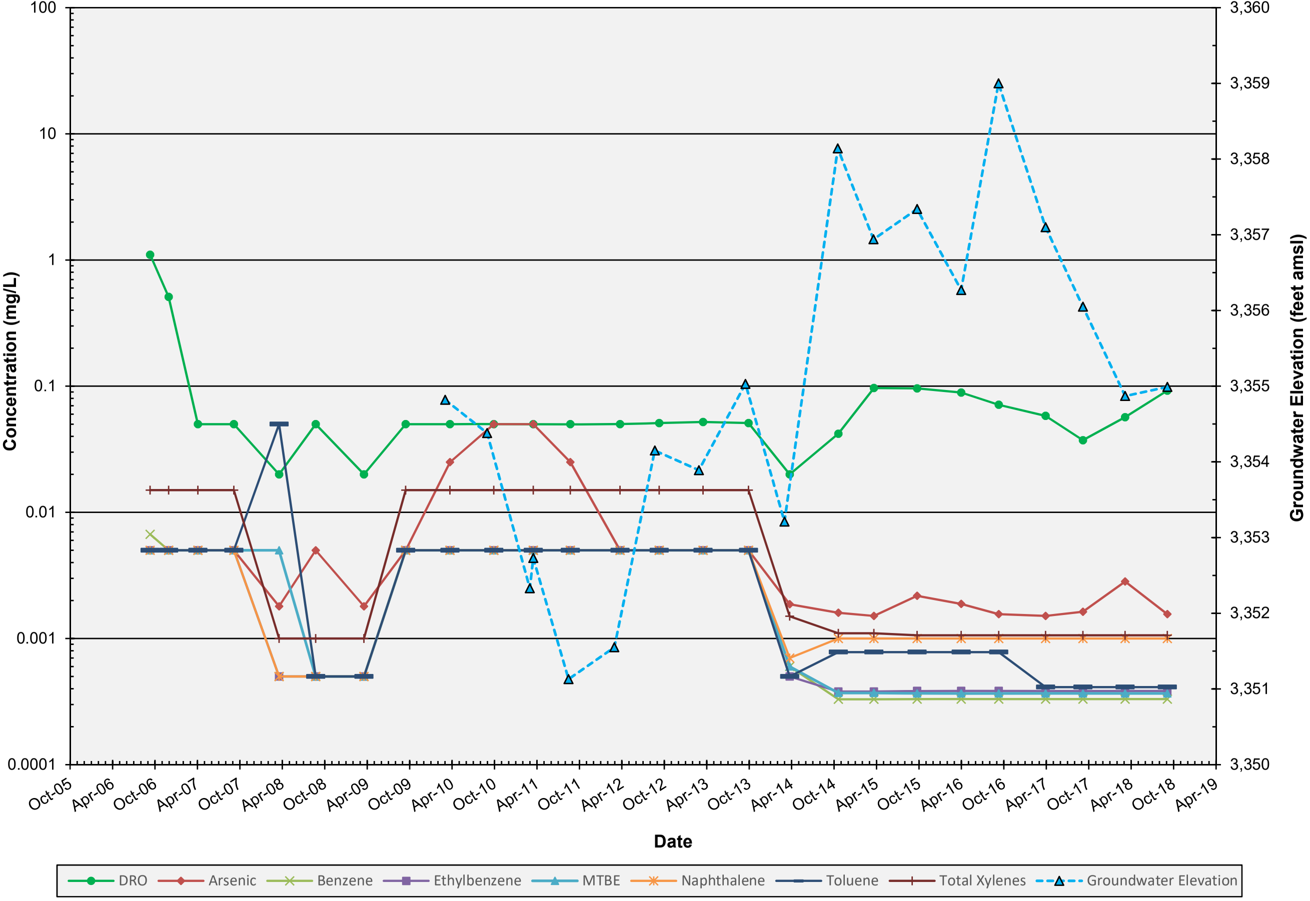
North Colony Landfarm



NCL-49: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

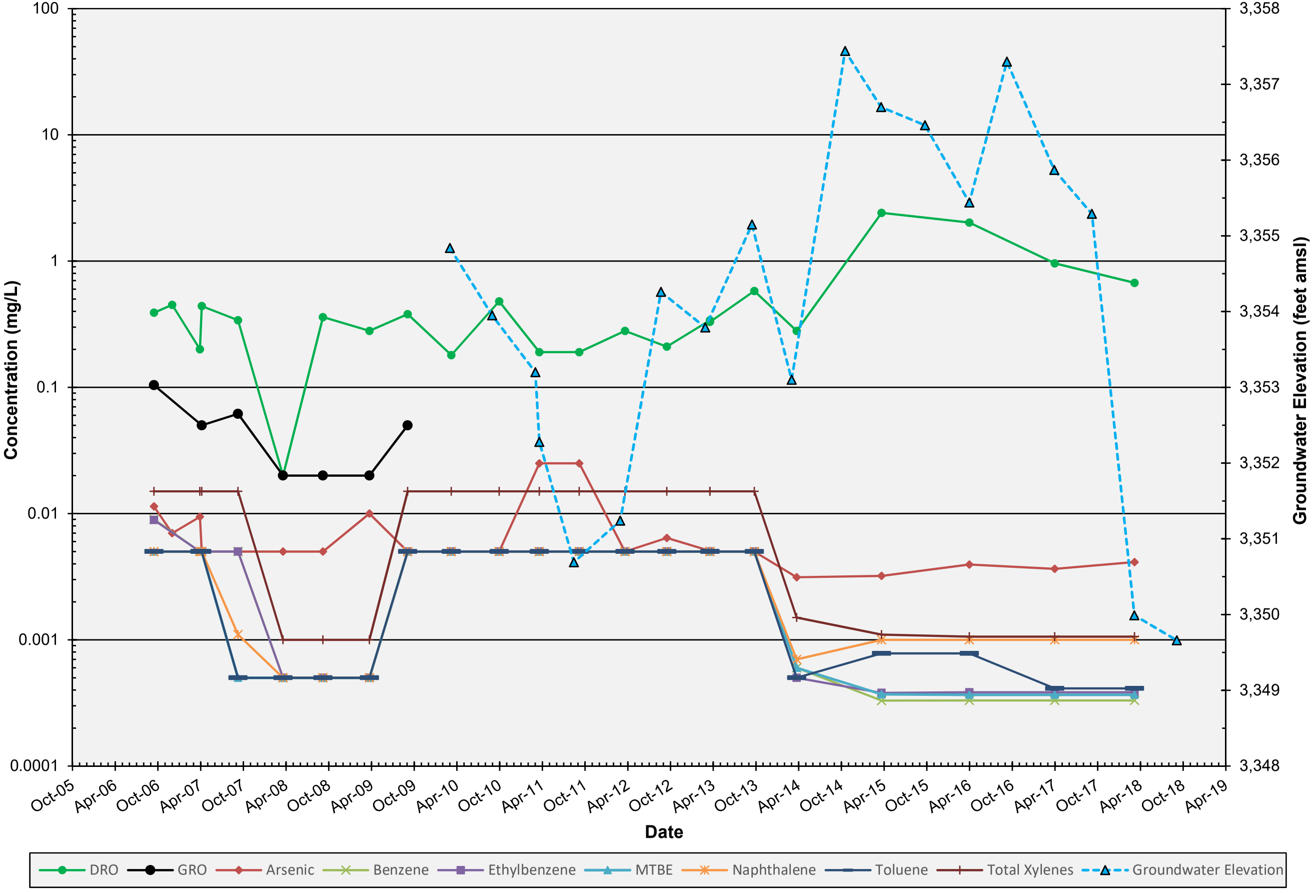
North Colony Landfarm



MW-18: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

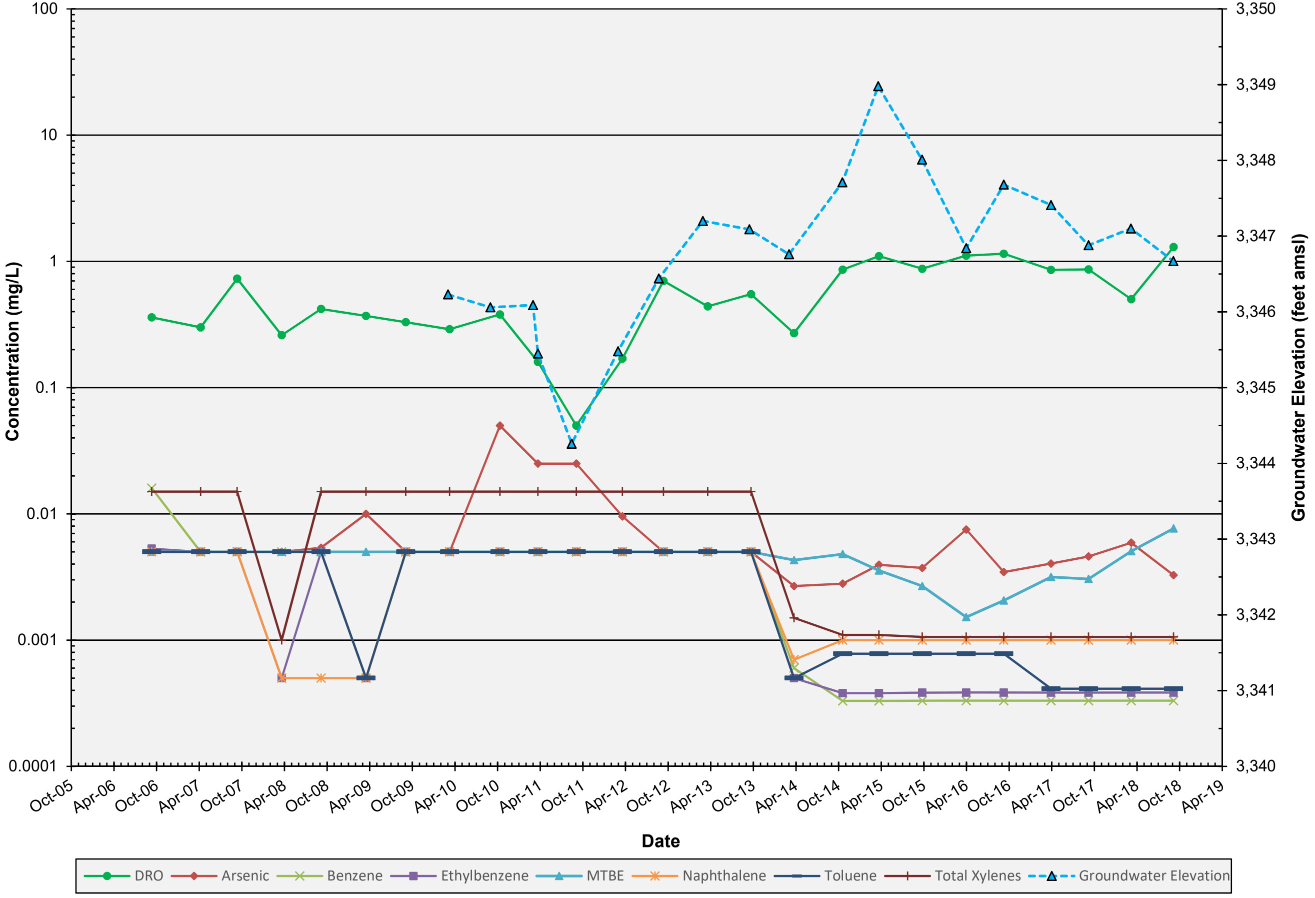
North Colony Landfarm



MW-45: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

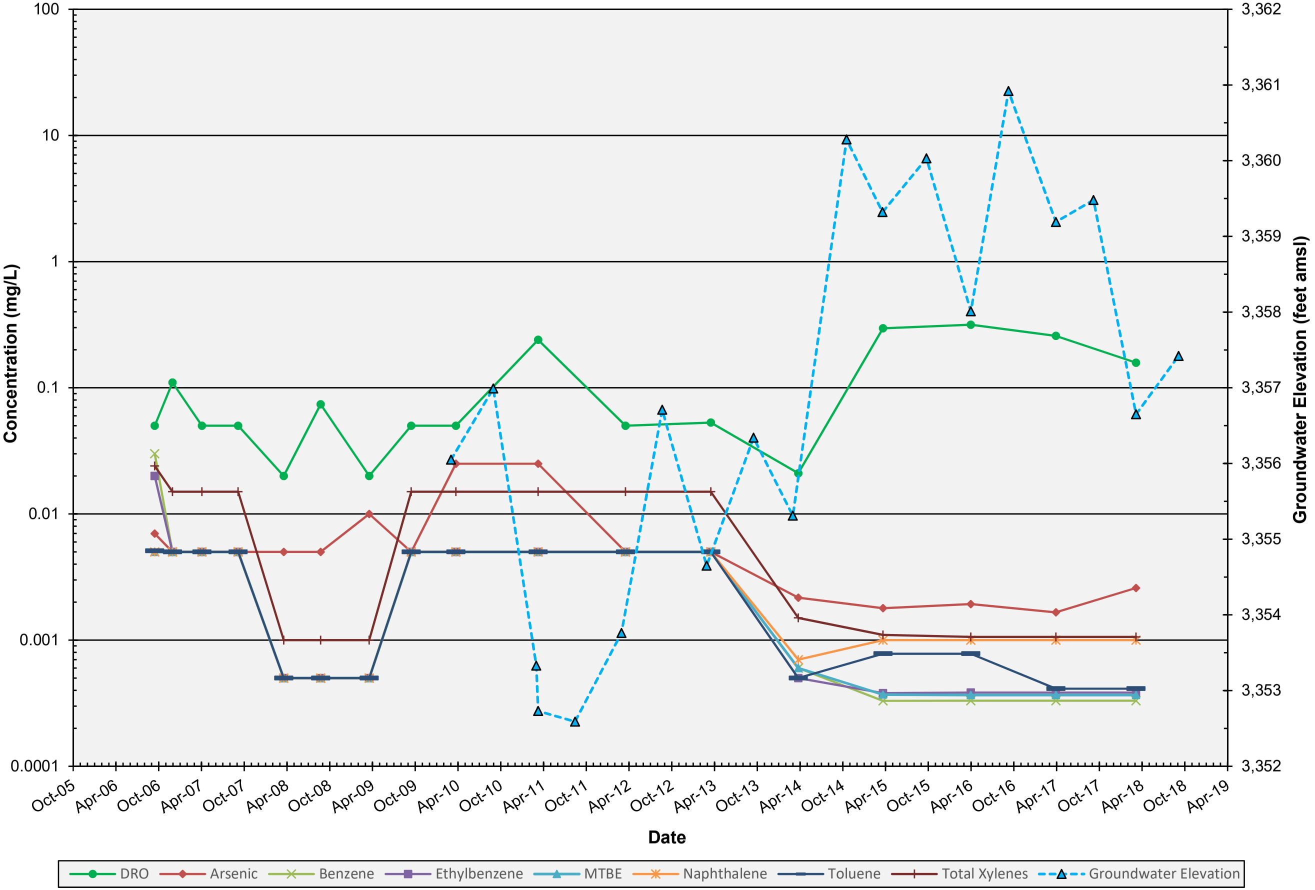
North Colony Landfarm



MW-53: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

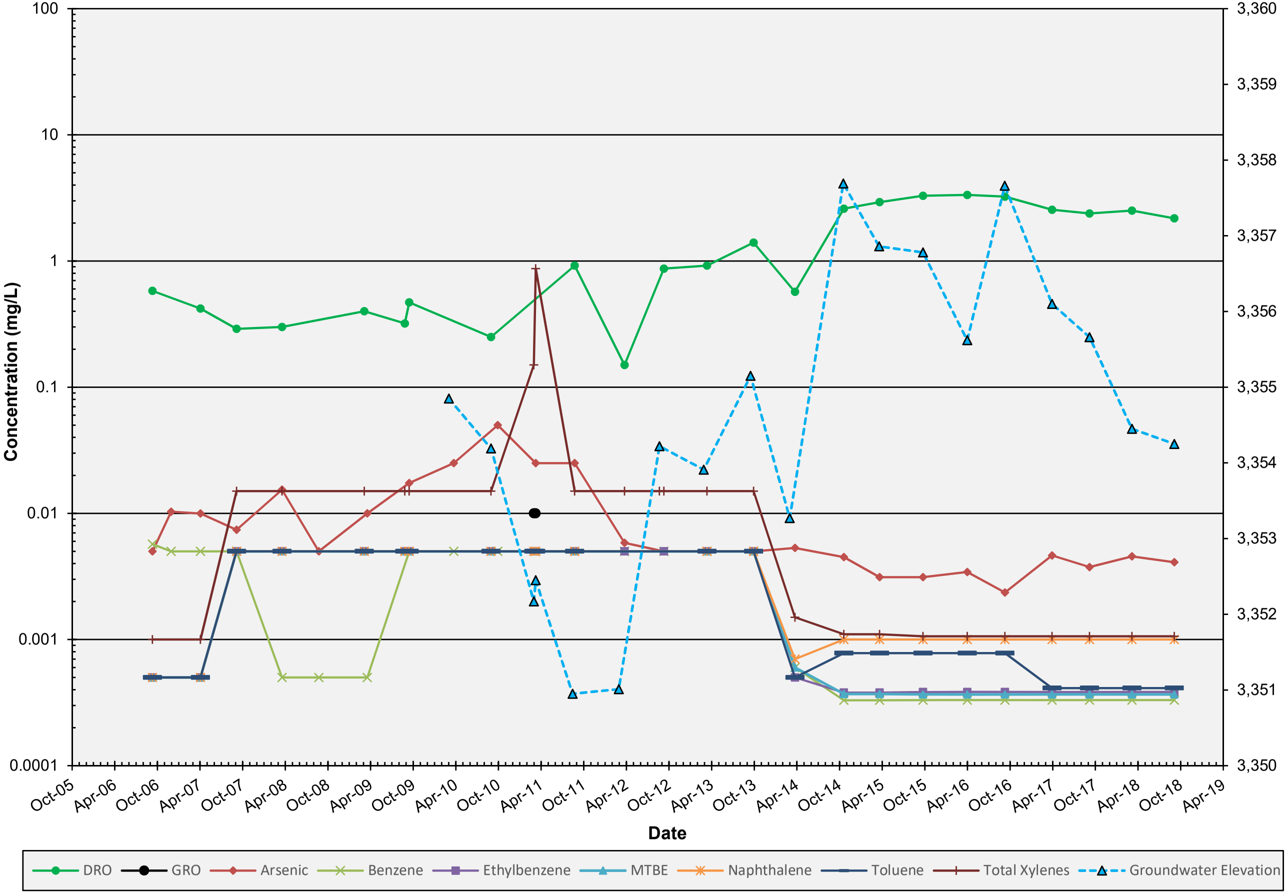
North Colony Landfarm



MW-54A: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

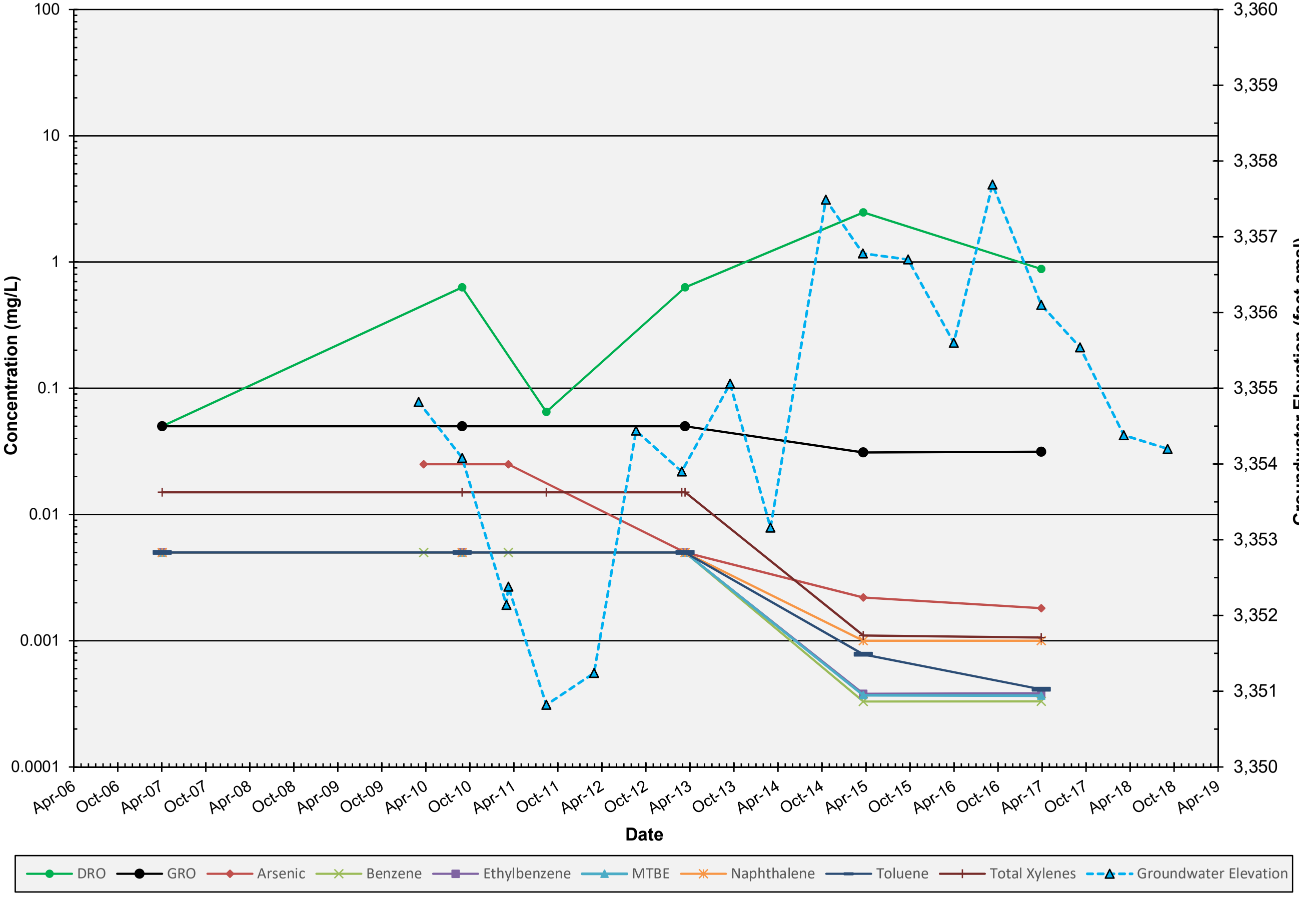
North Colony Landfarm



MW-54B: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

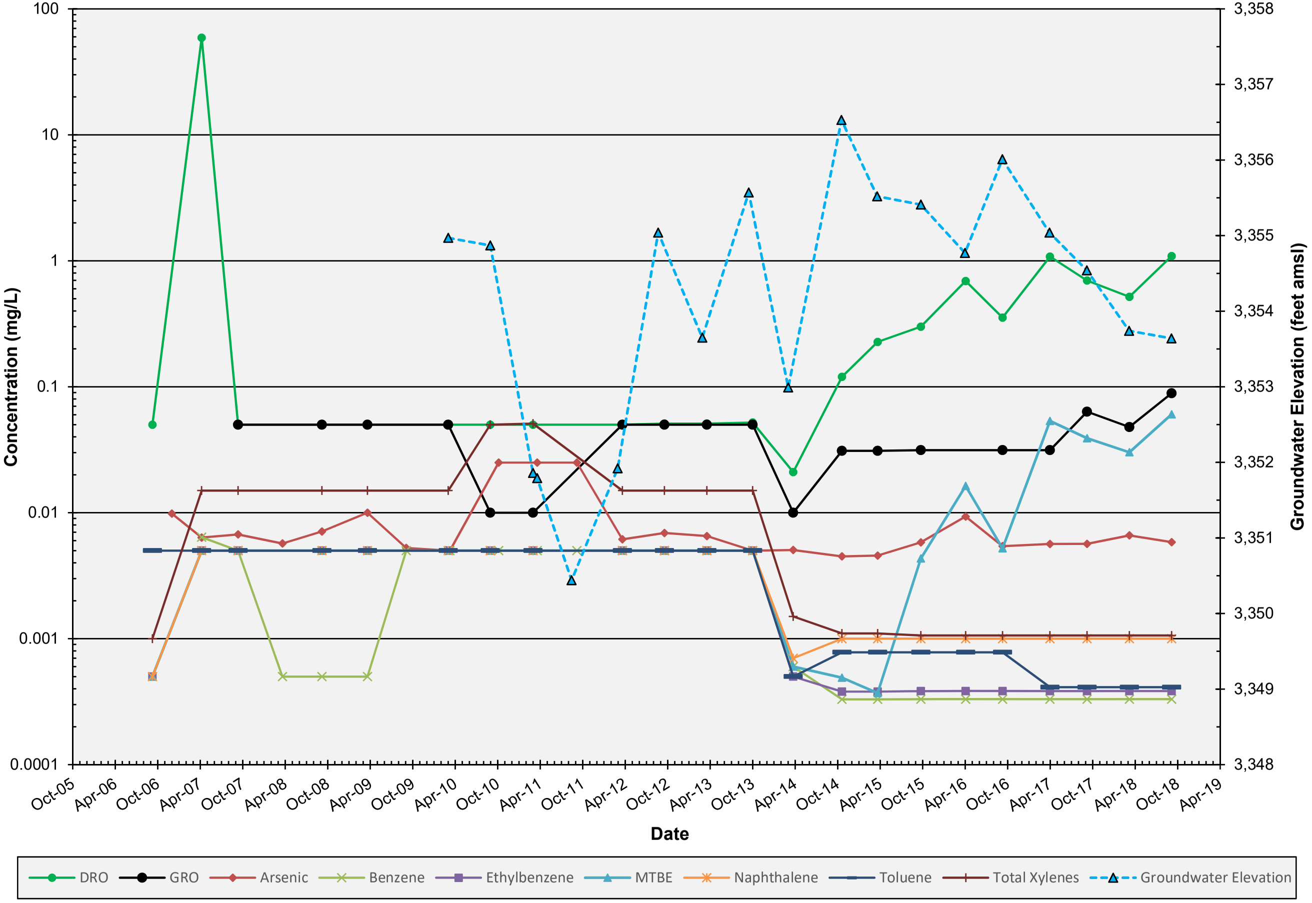
North Colony Landfarm



MW-55: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

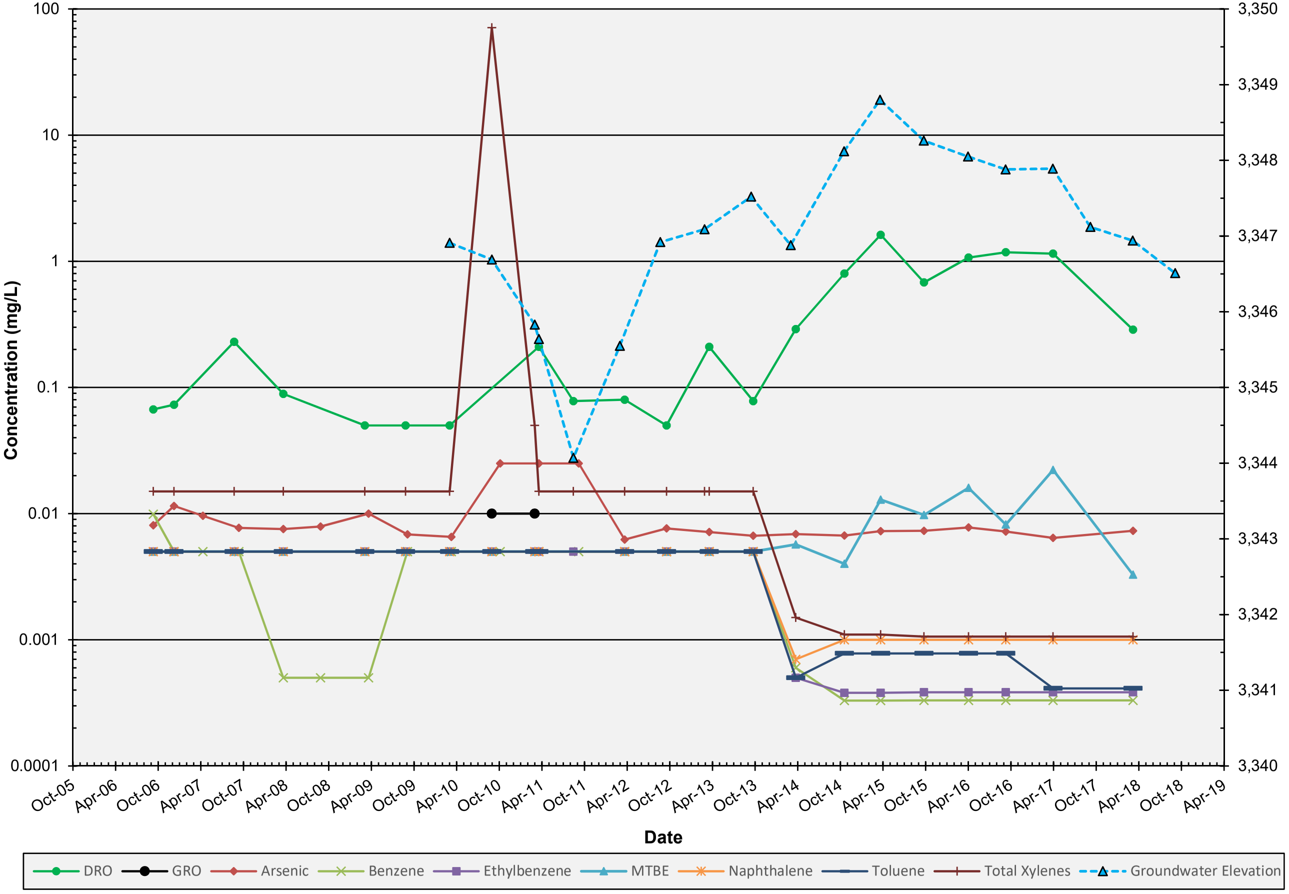
North Colony Landfarm



MW-56: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

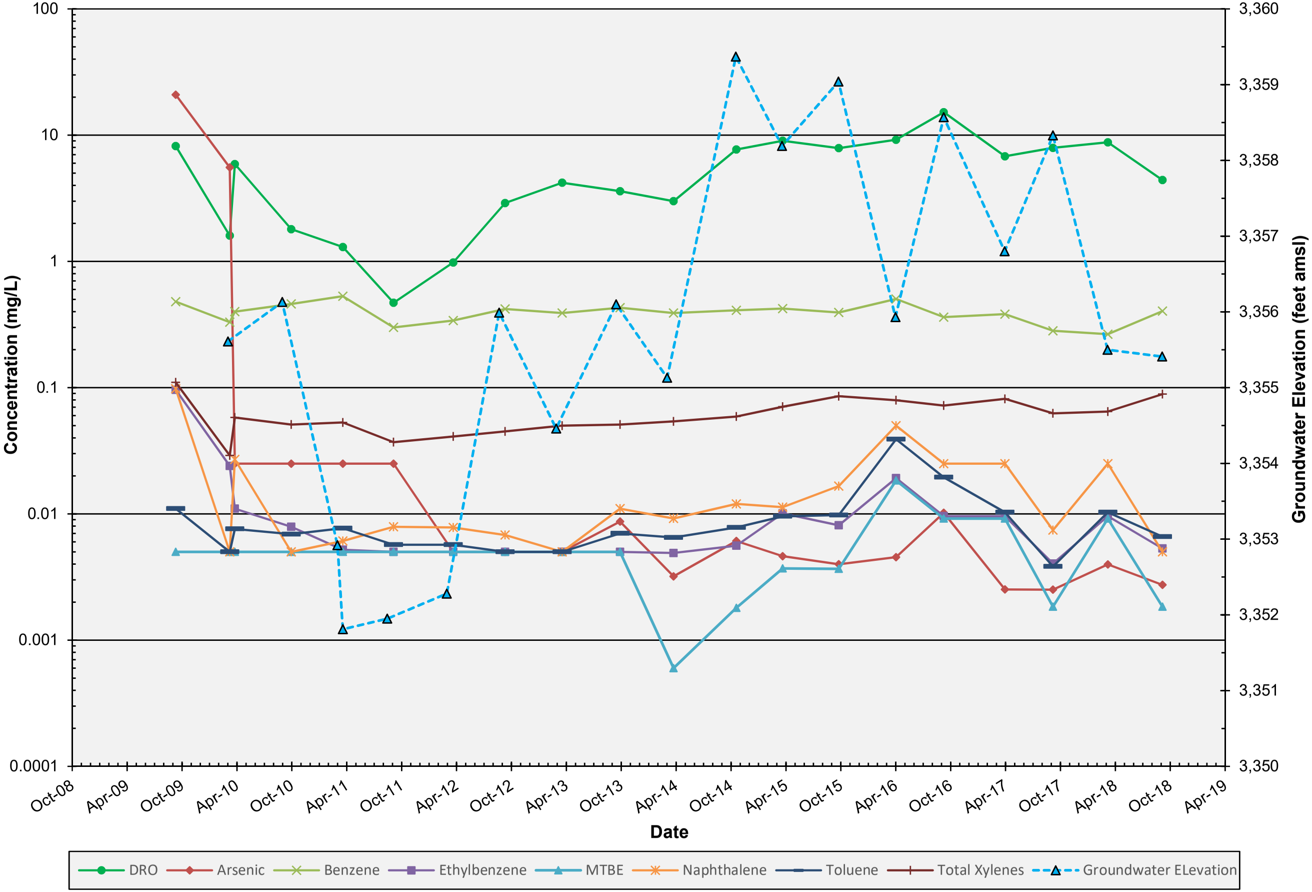
North Colony Landfarm



MW-108: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

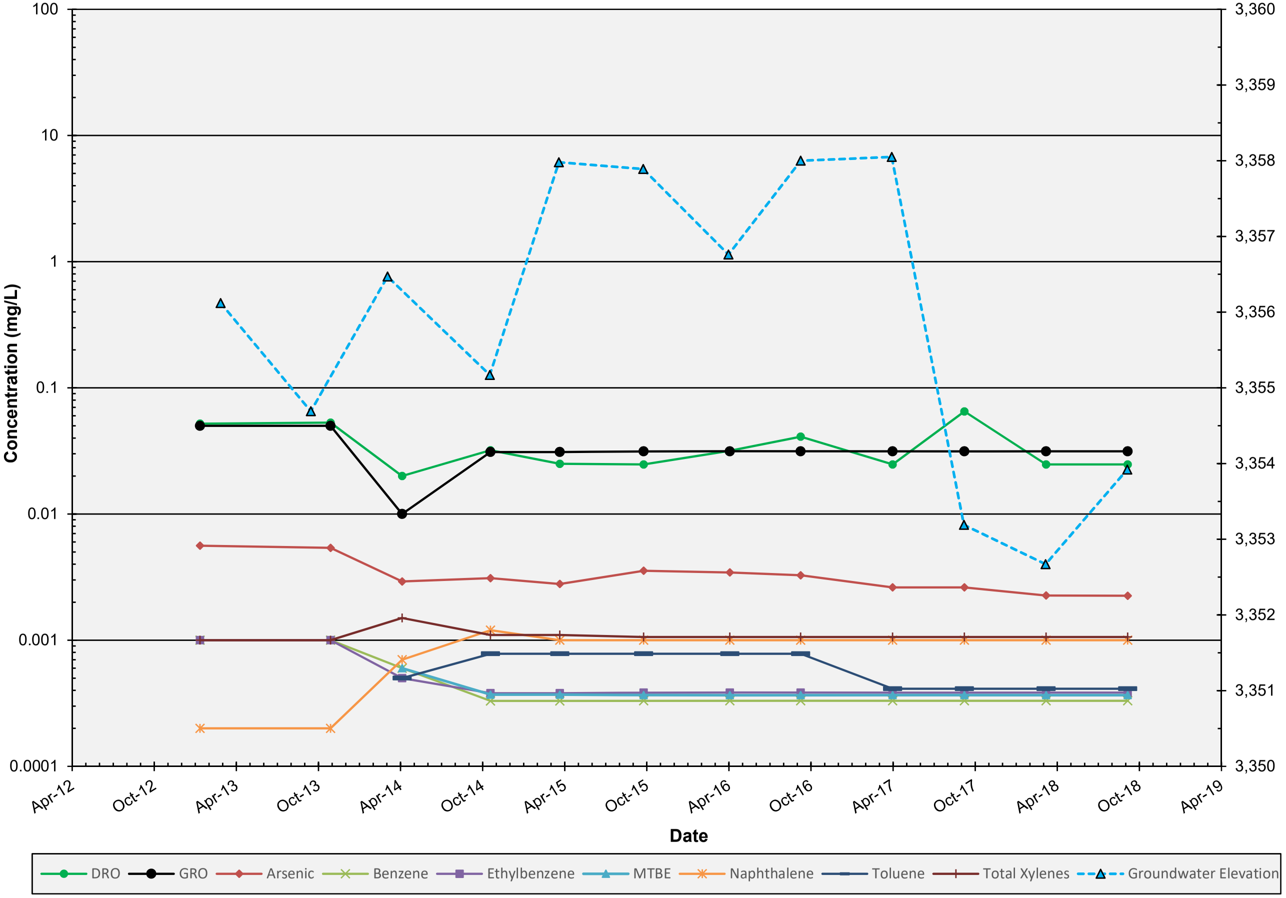
North Colony Landfarm



MW-114: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

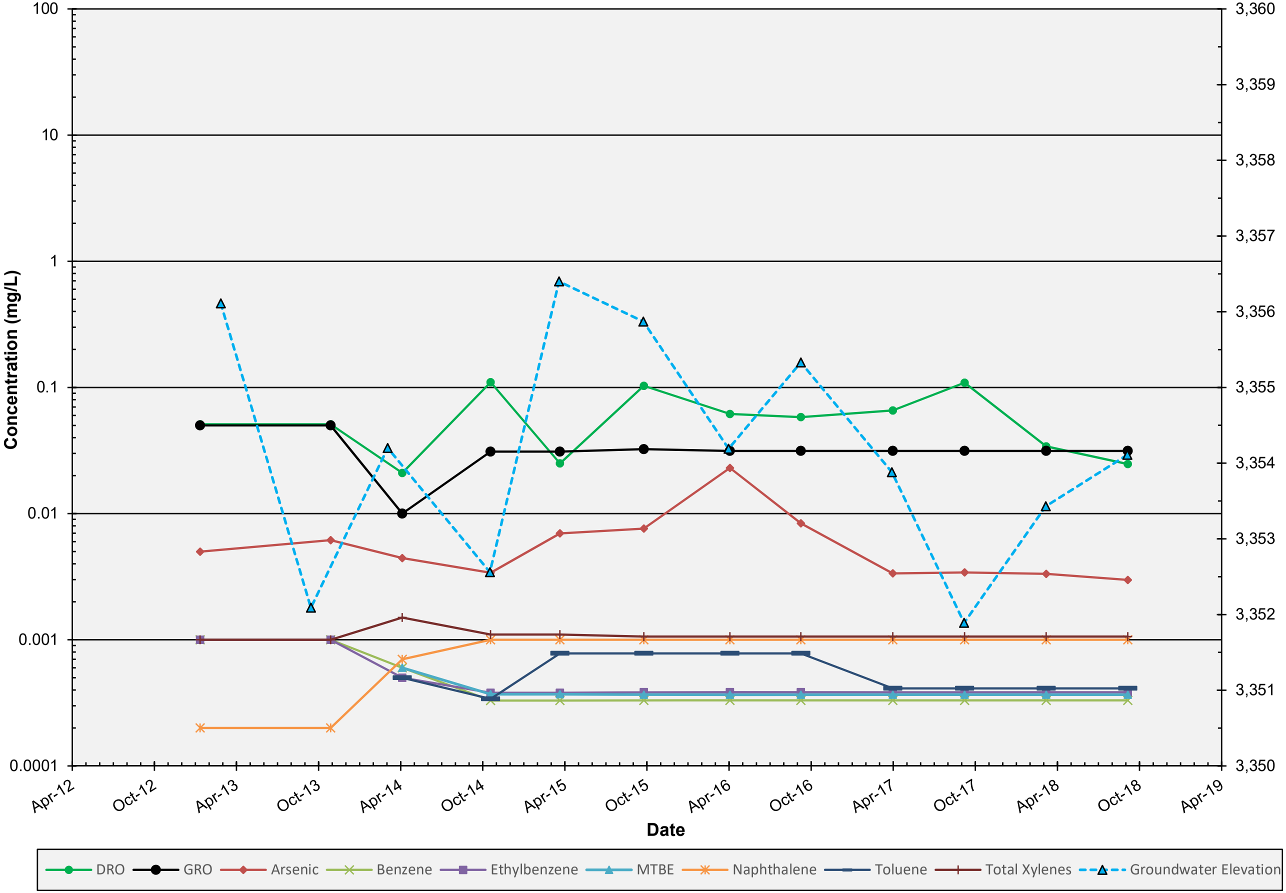
South Reverse Osmosis Reject Field



MW-115: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

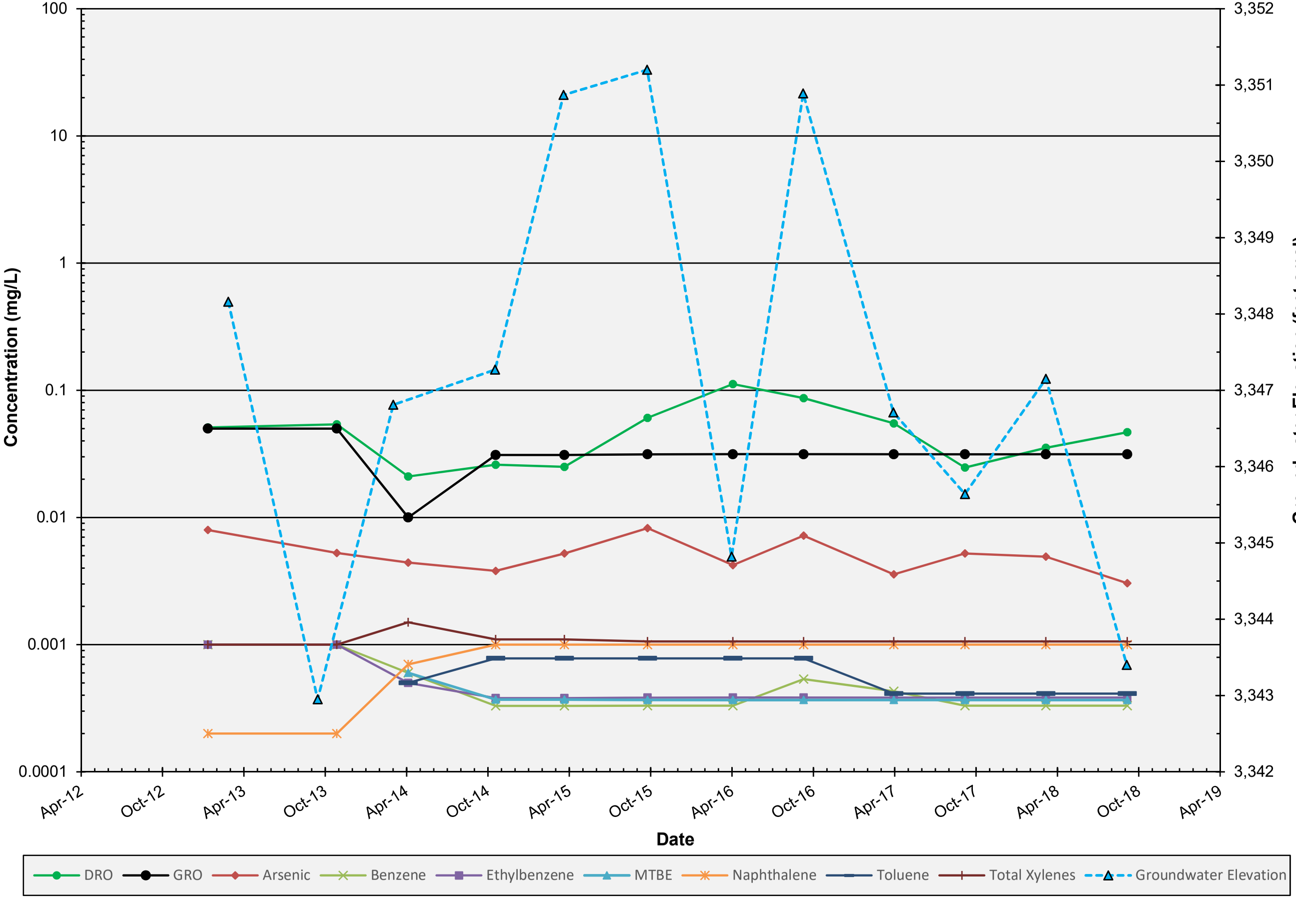
South Reverse Osmosis Reject Fields



MW-116: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

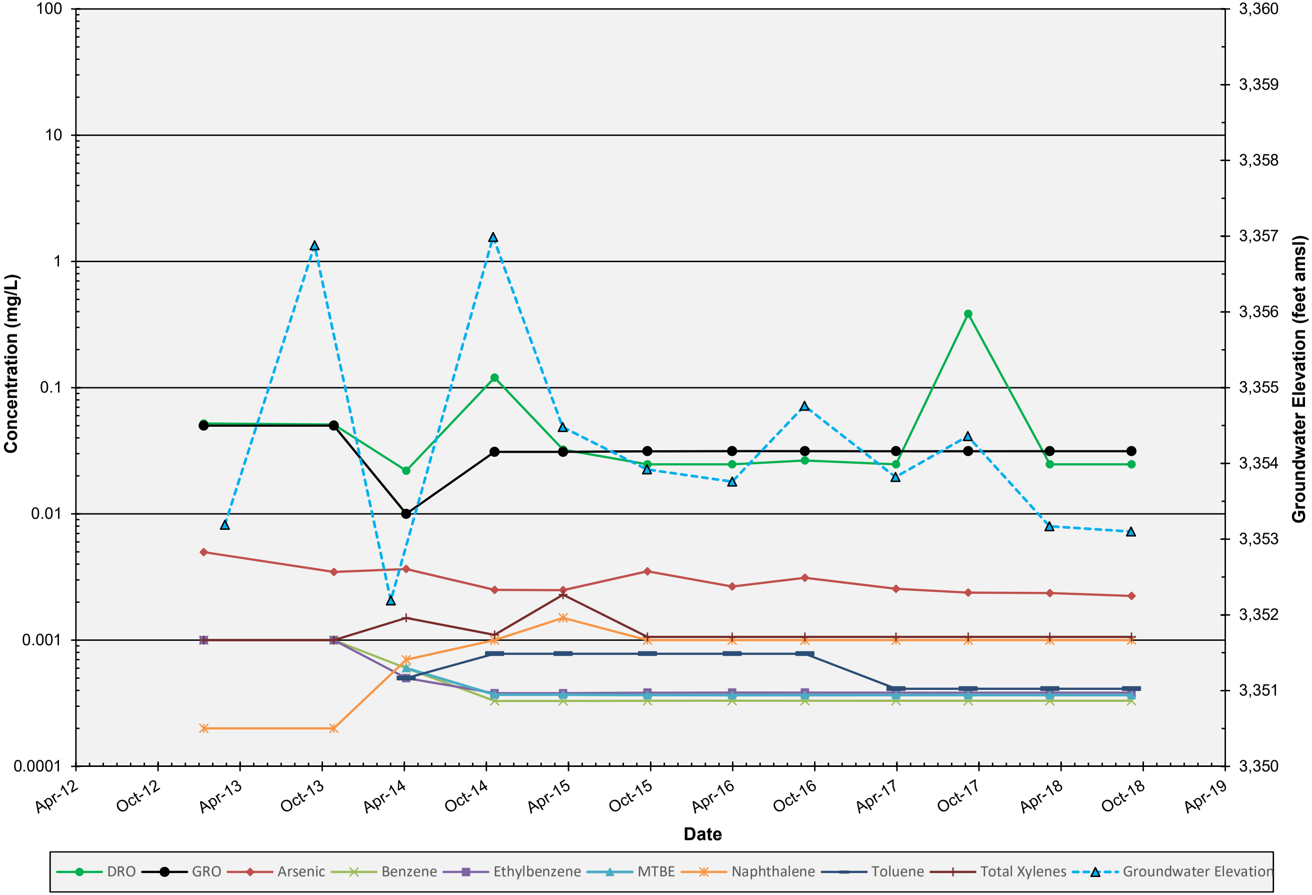
South Reverse Osmosis Reject Field



MW-117: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

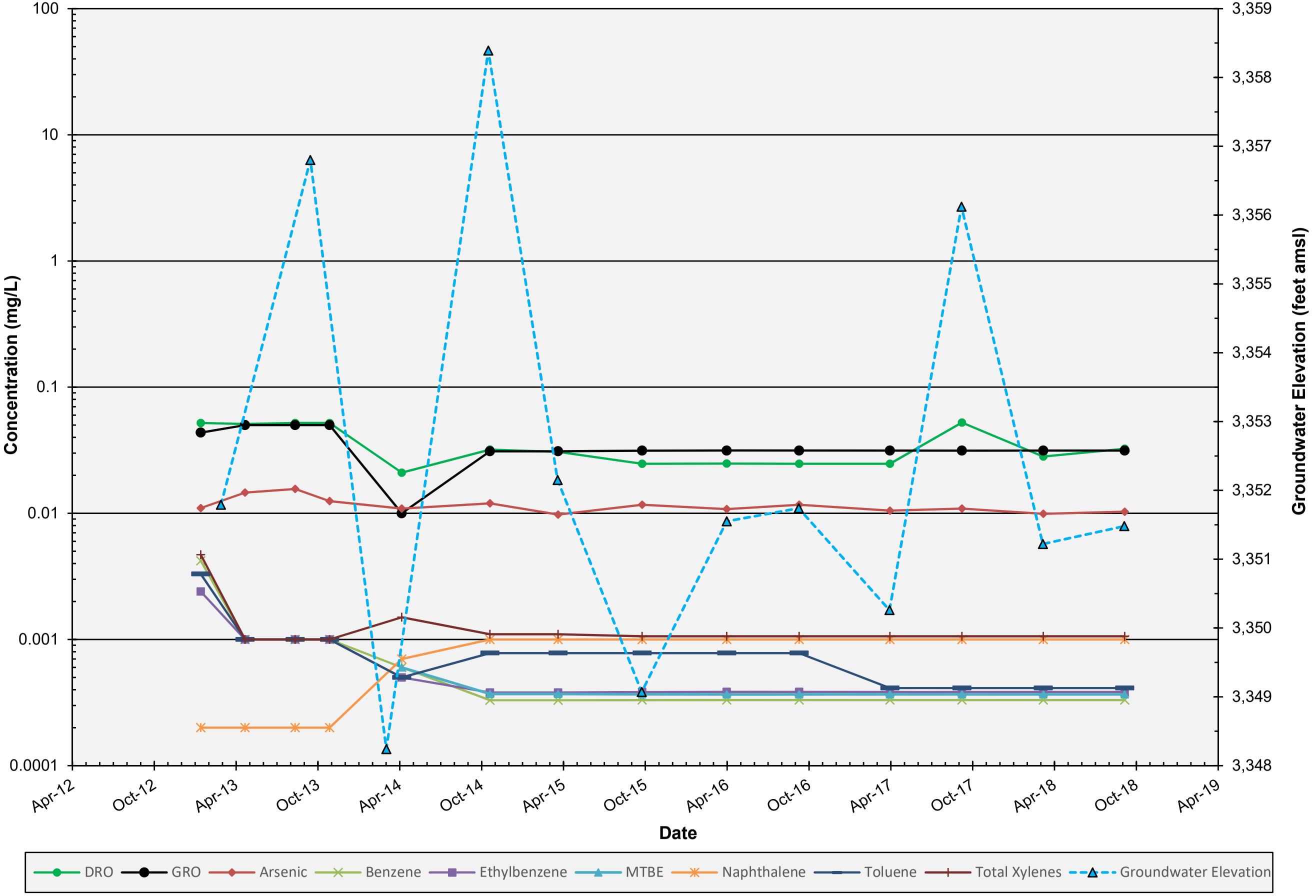
North Reverse Osmosis Reject Fields



MW-118: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

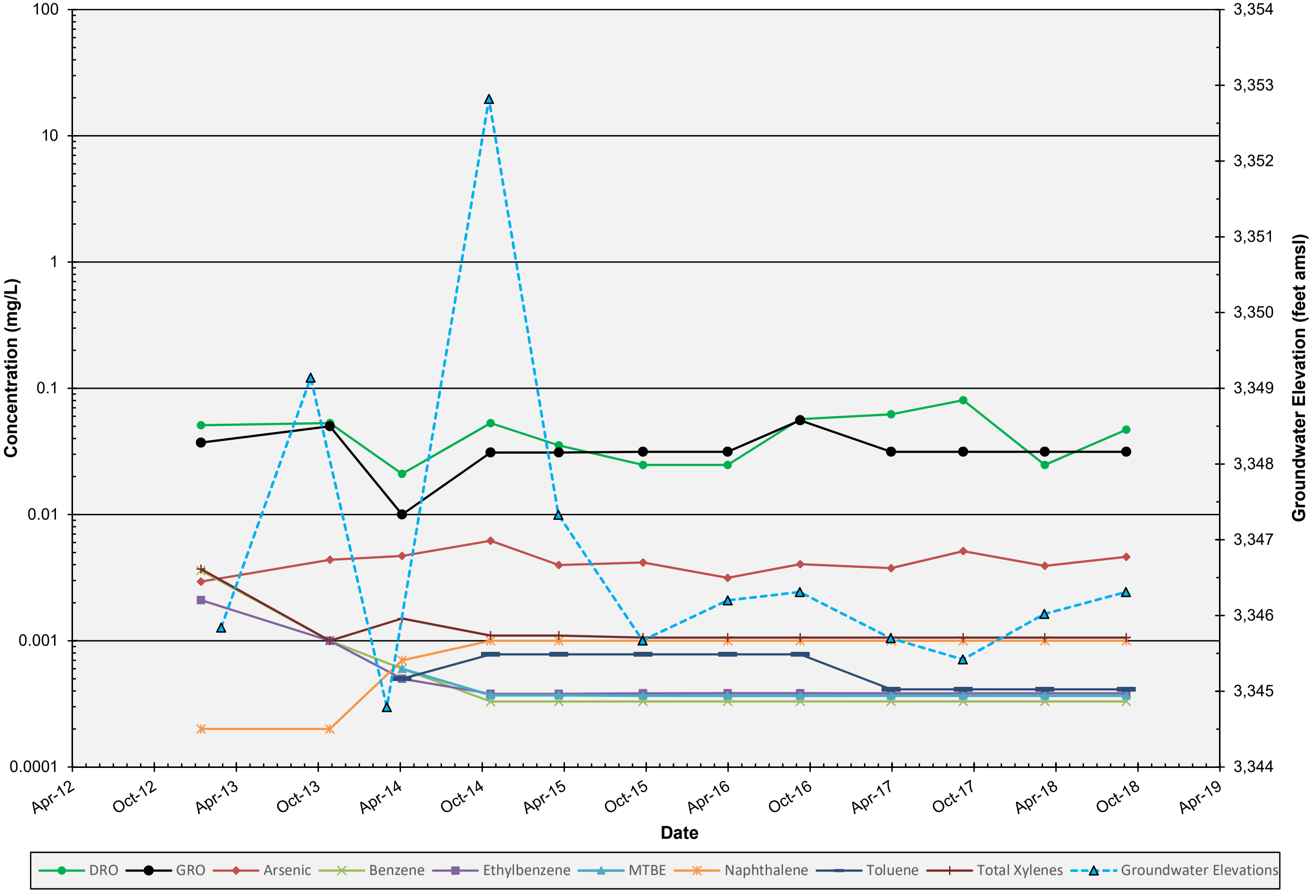
North Reverse Osmosis Reject Fields



MW-119: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

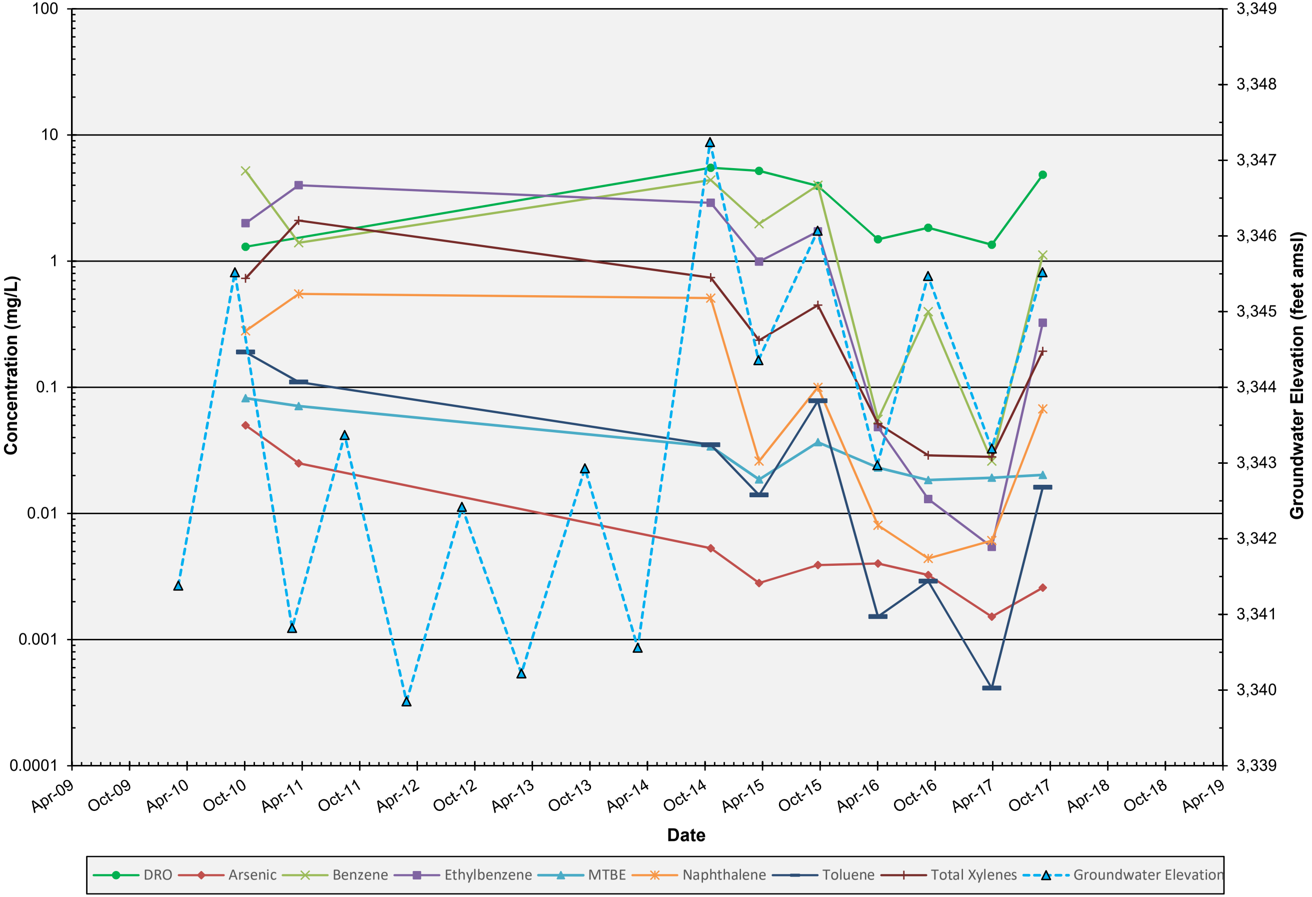
North Reverse Osmosis Reject Fields



KWB-2R: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

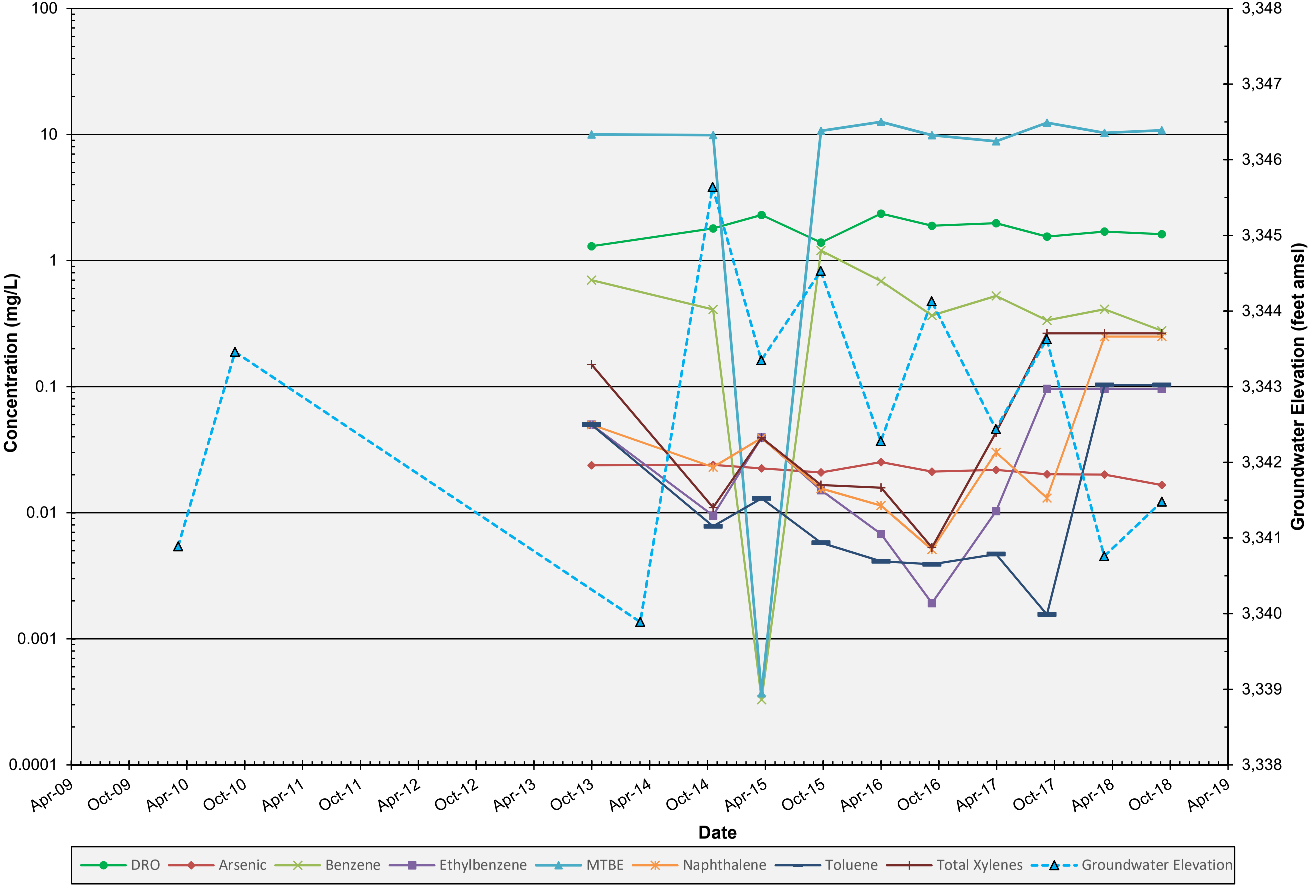
South Refinery Area



KWB-5: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

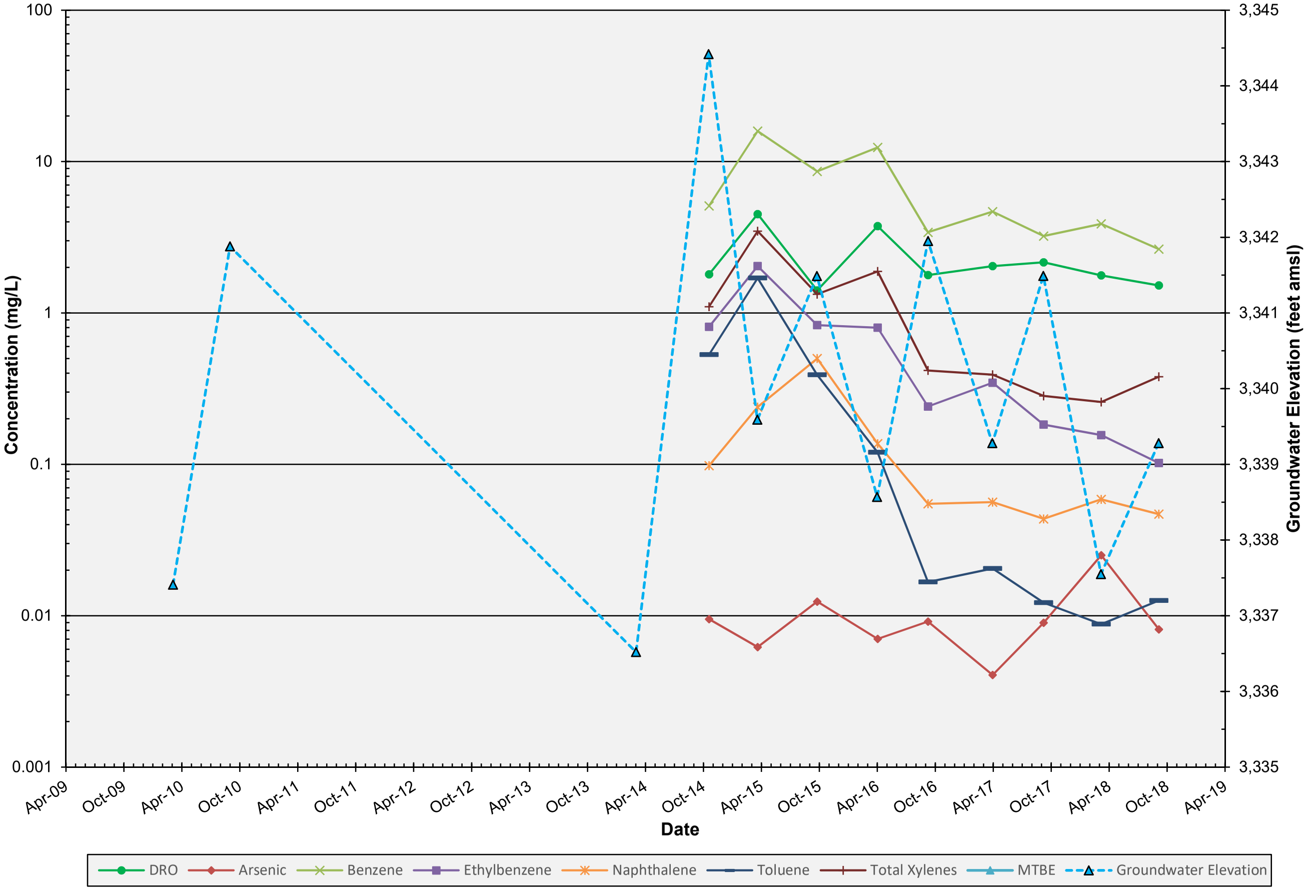
South Refinery Area



KWB-6: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

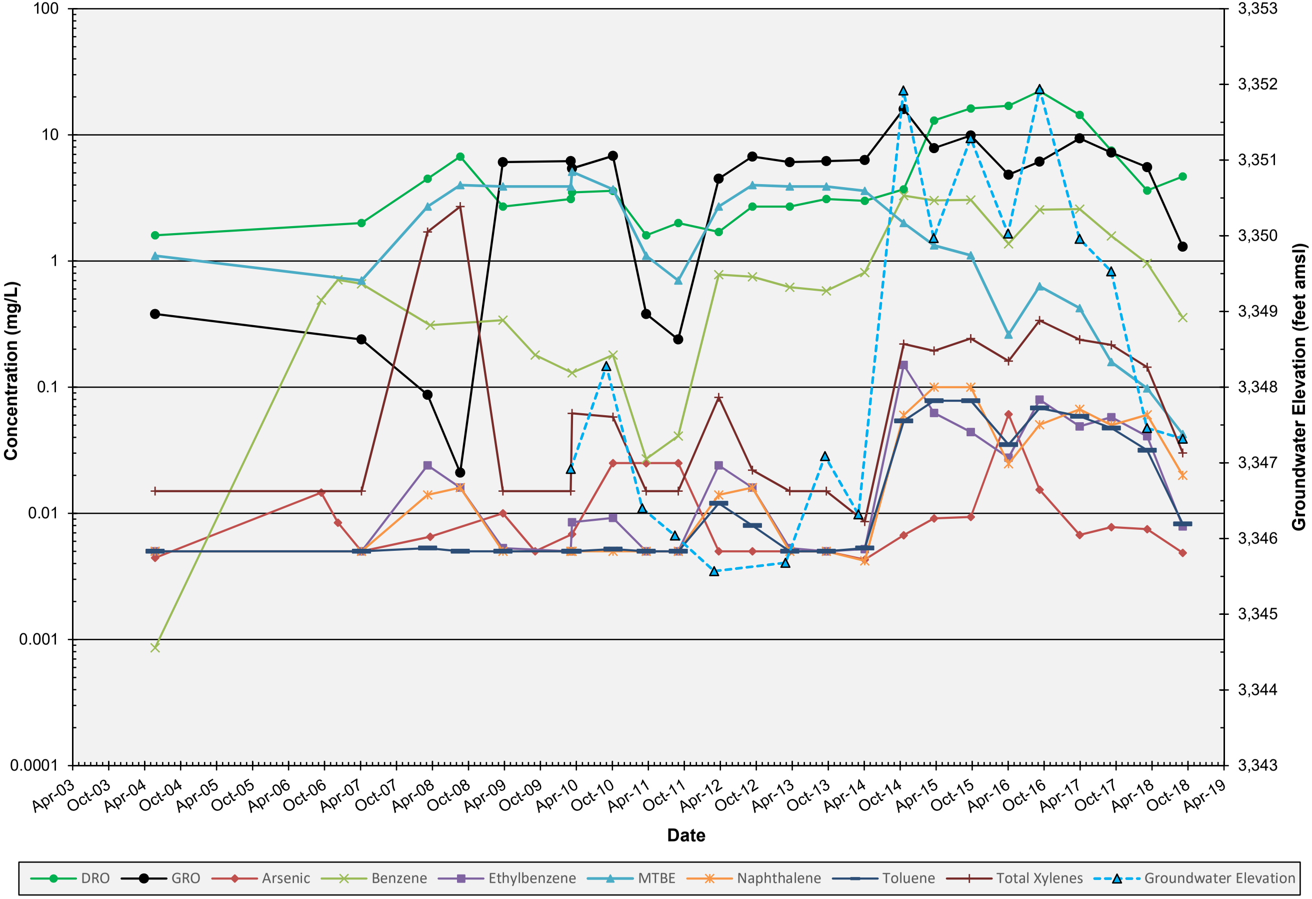
South Refinery Area



MW-28: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

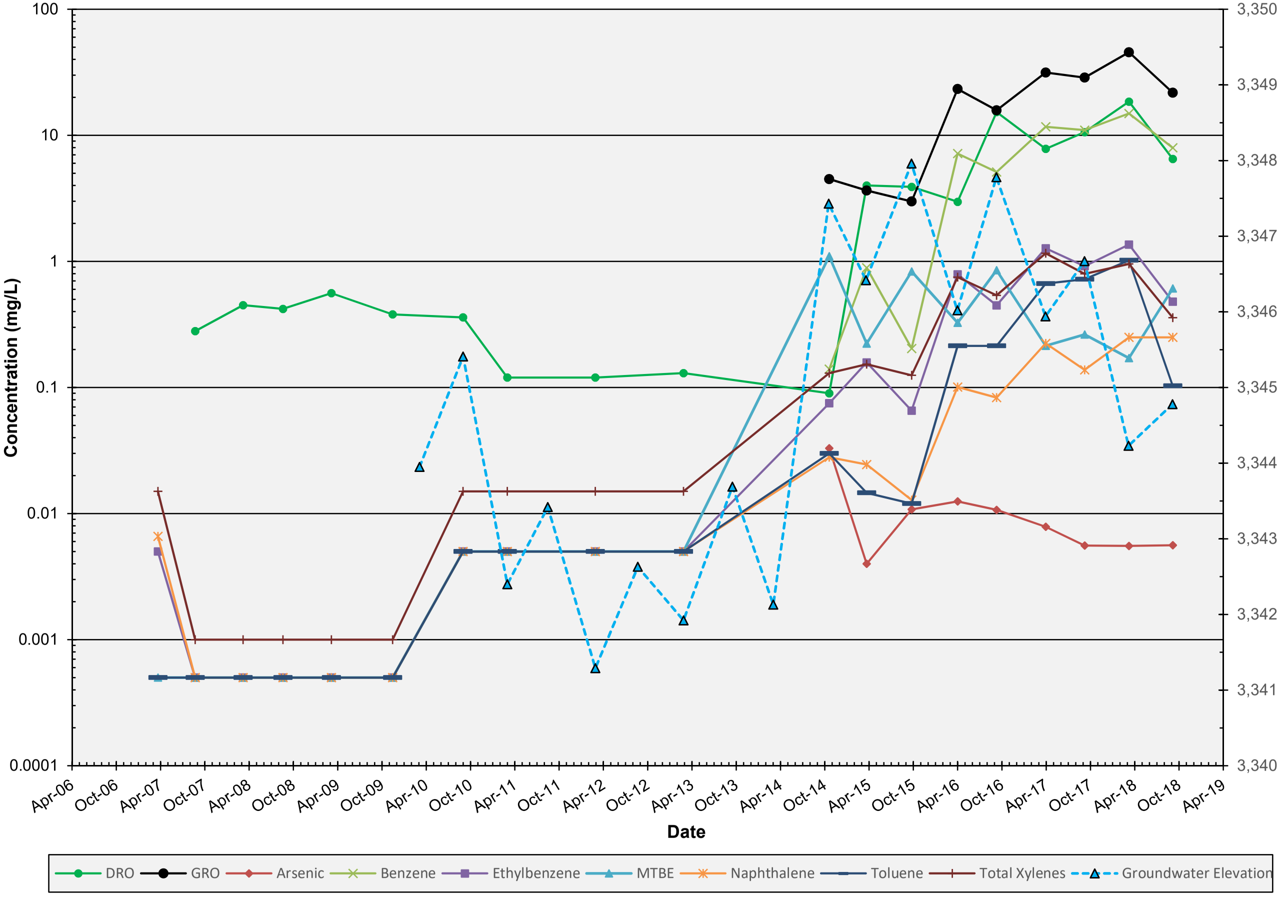
South Refinery Area



MW-48: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

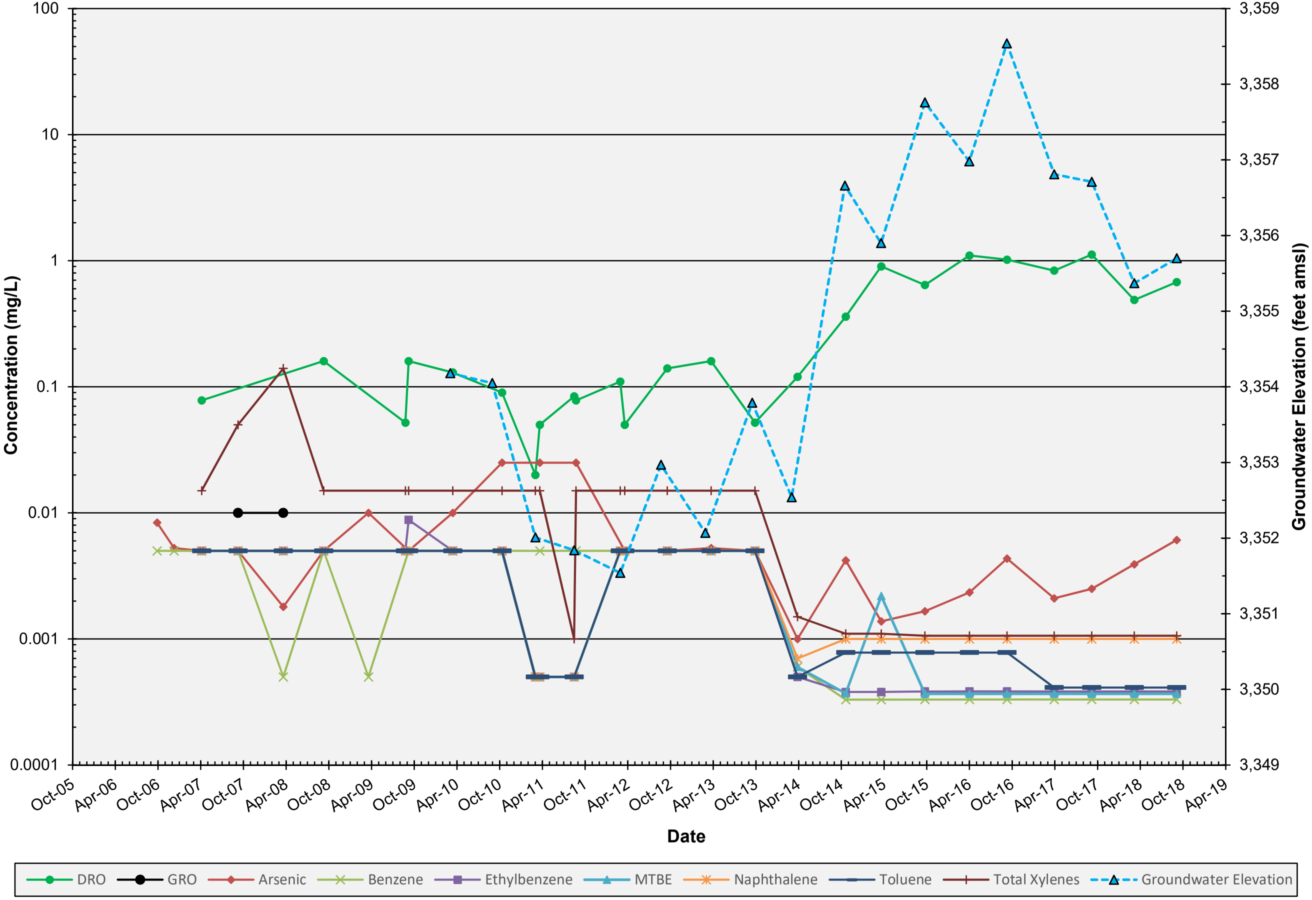
South Refinery Area



MW-50: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

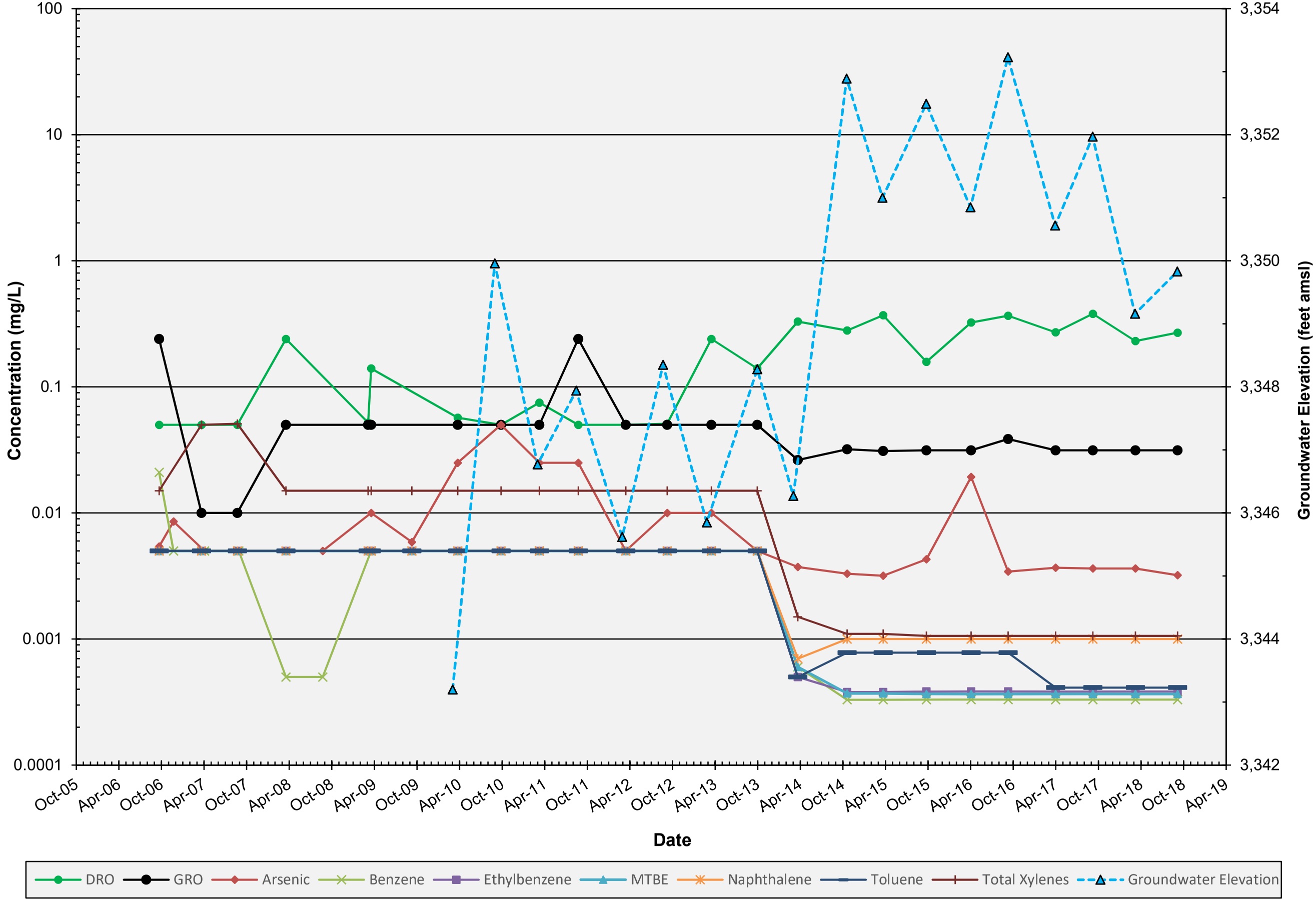
South Refinery Area



MW-52: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

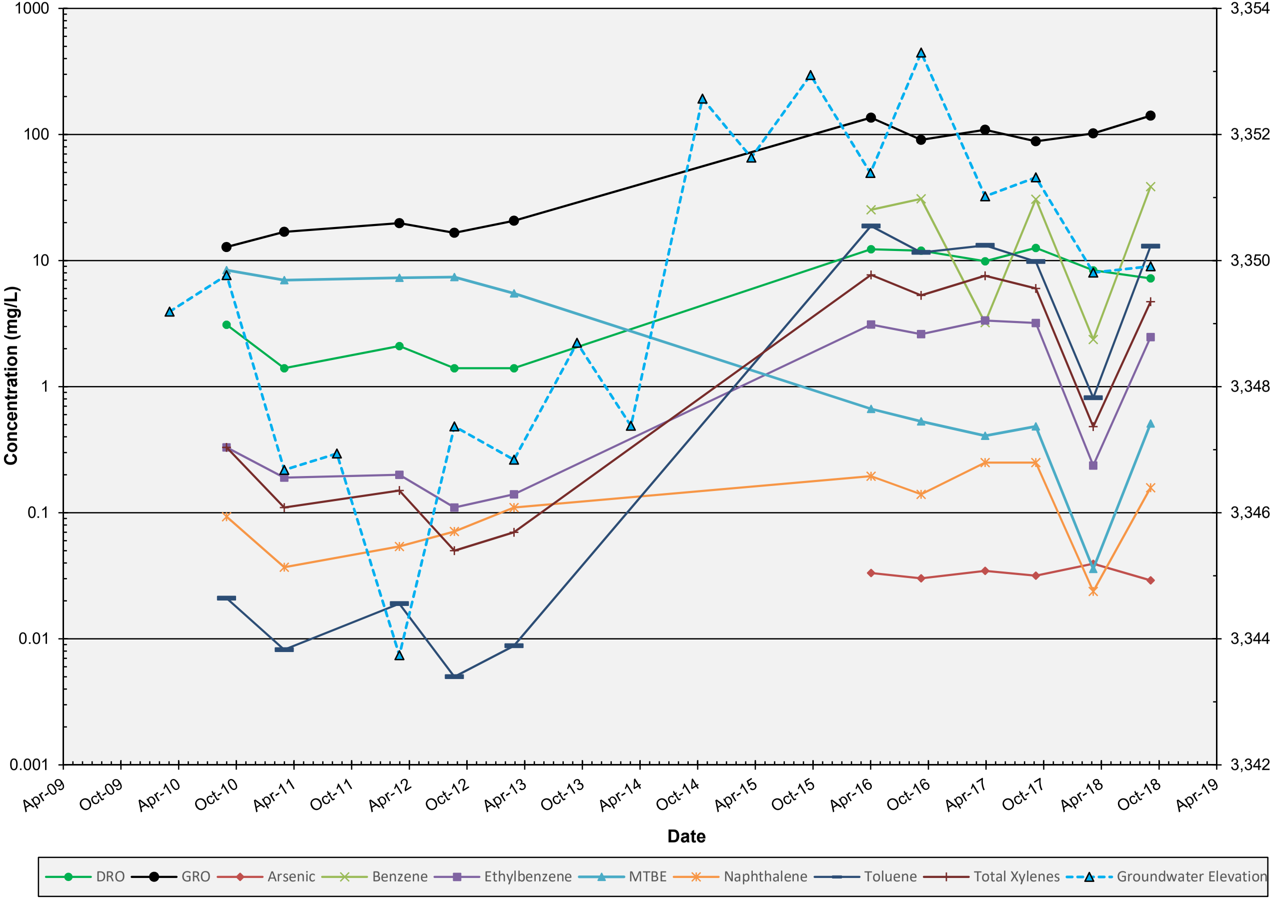
South Refinery Area



MW-64: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

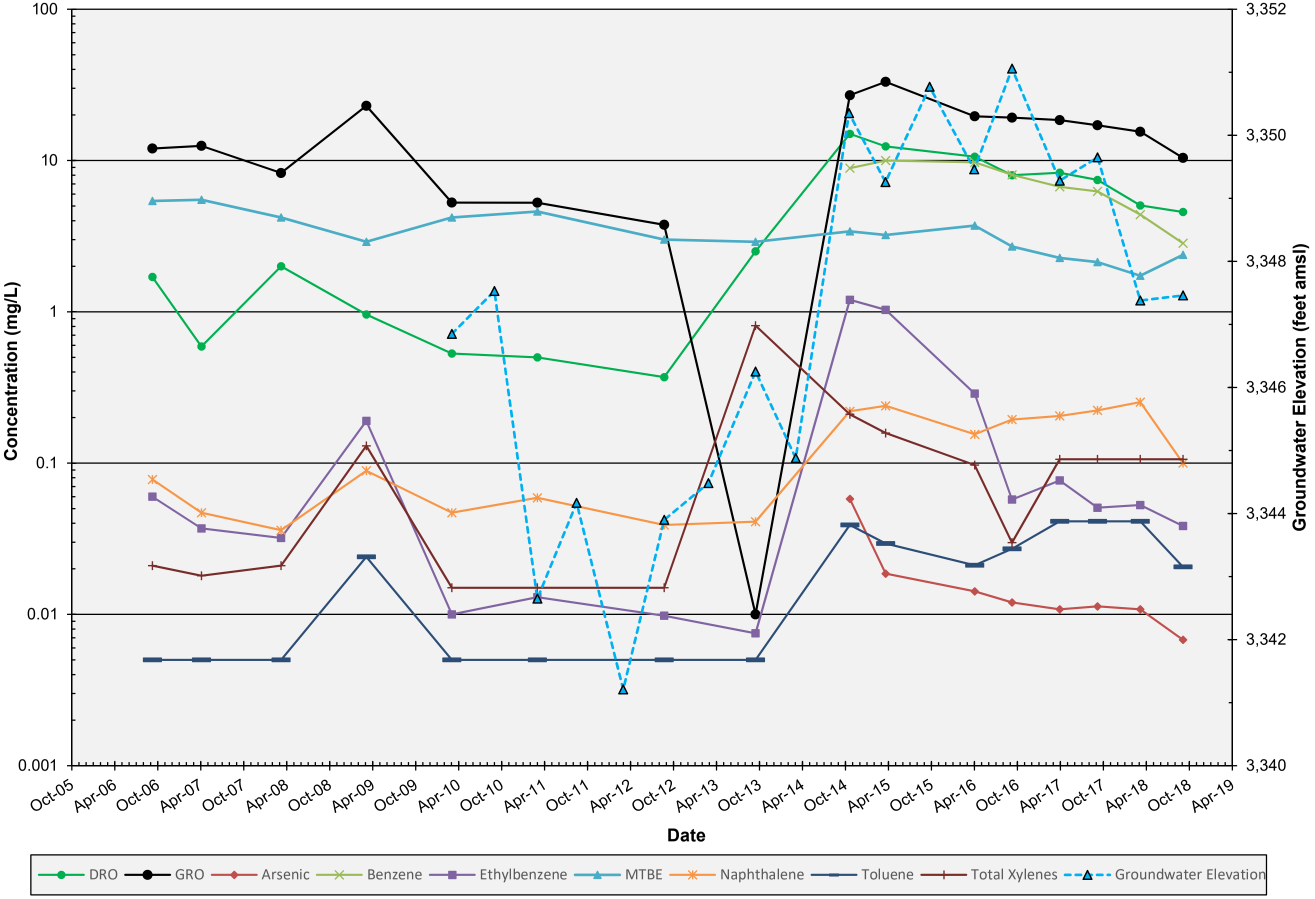
South Refinery Area



MW-65: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

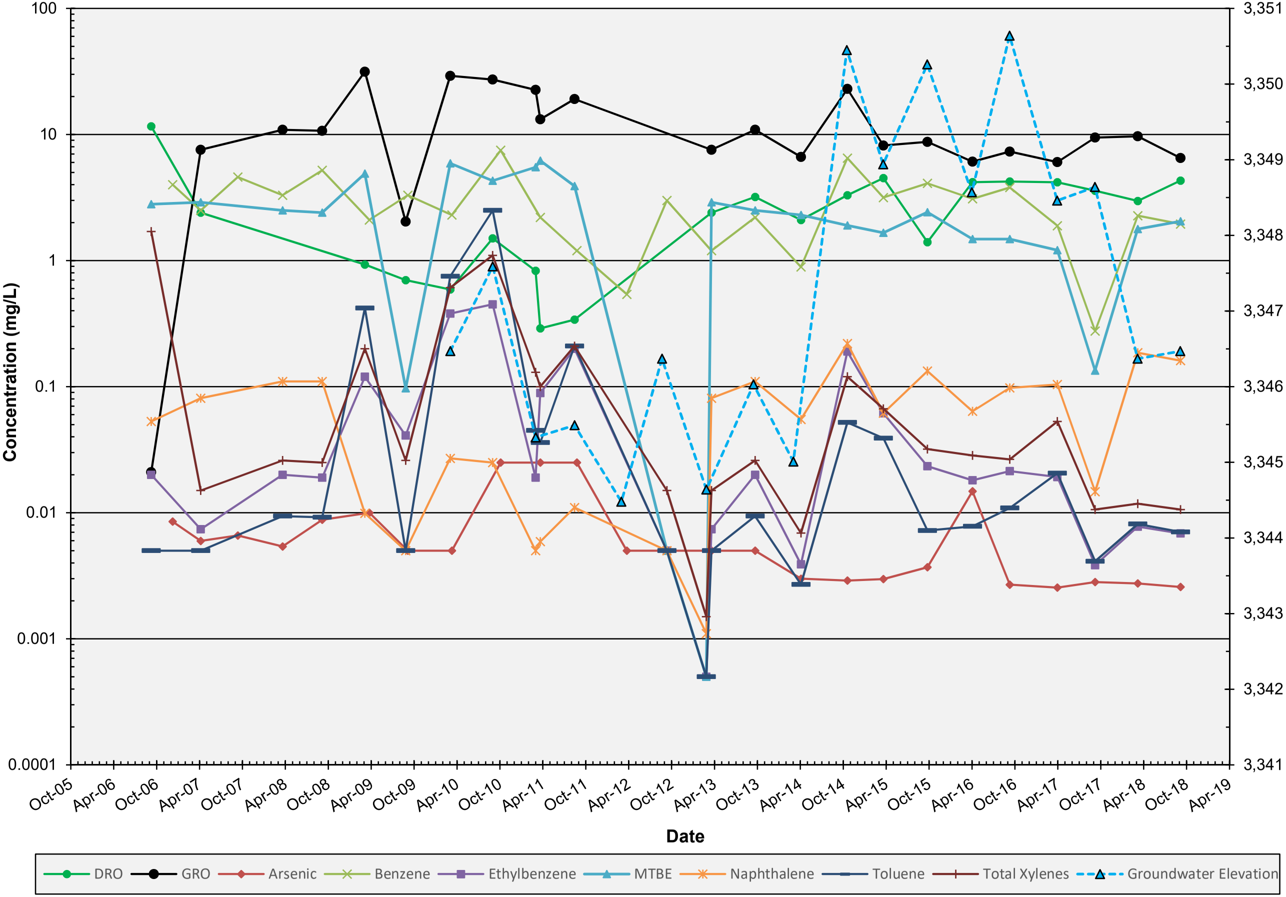
South Refinery Area



MW-66: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

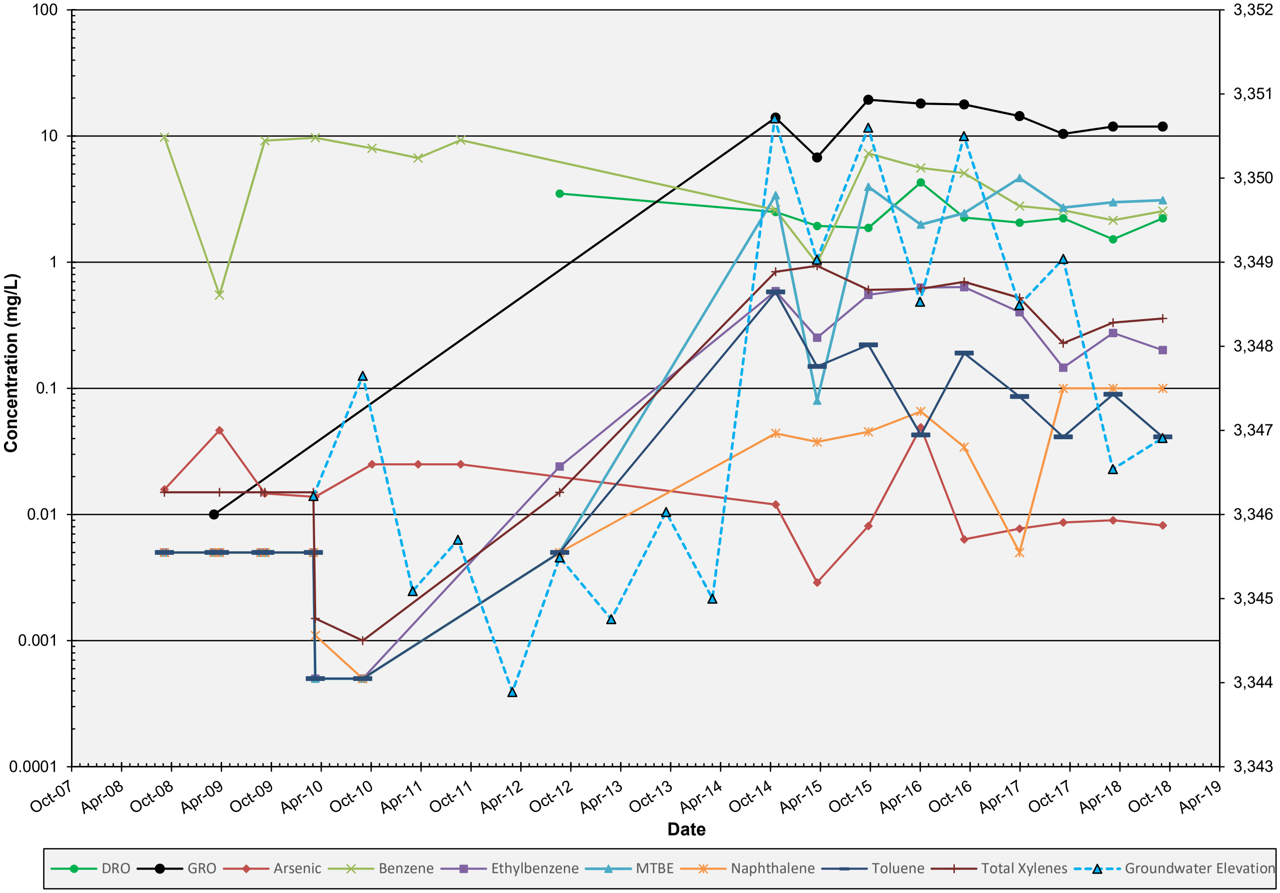
South Refinery Area



MW-99: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

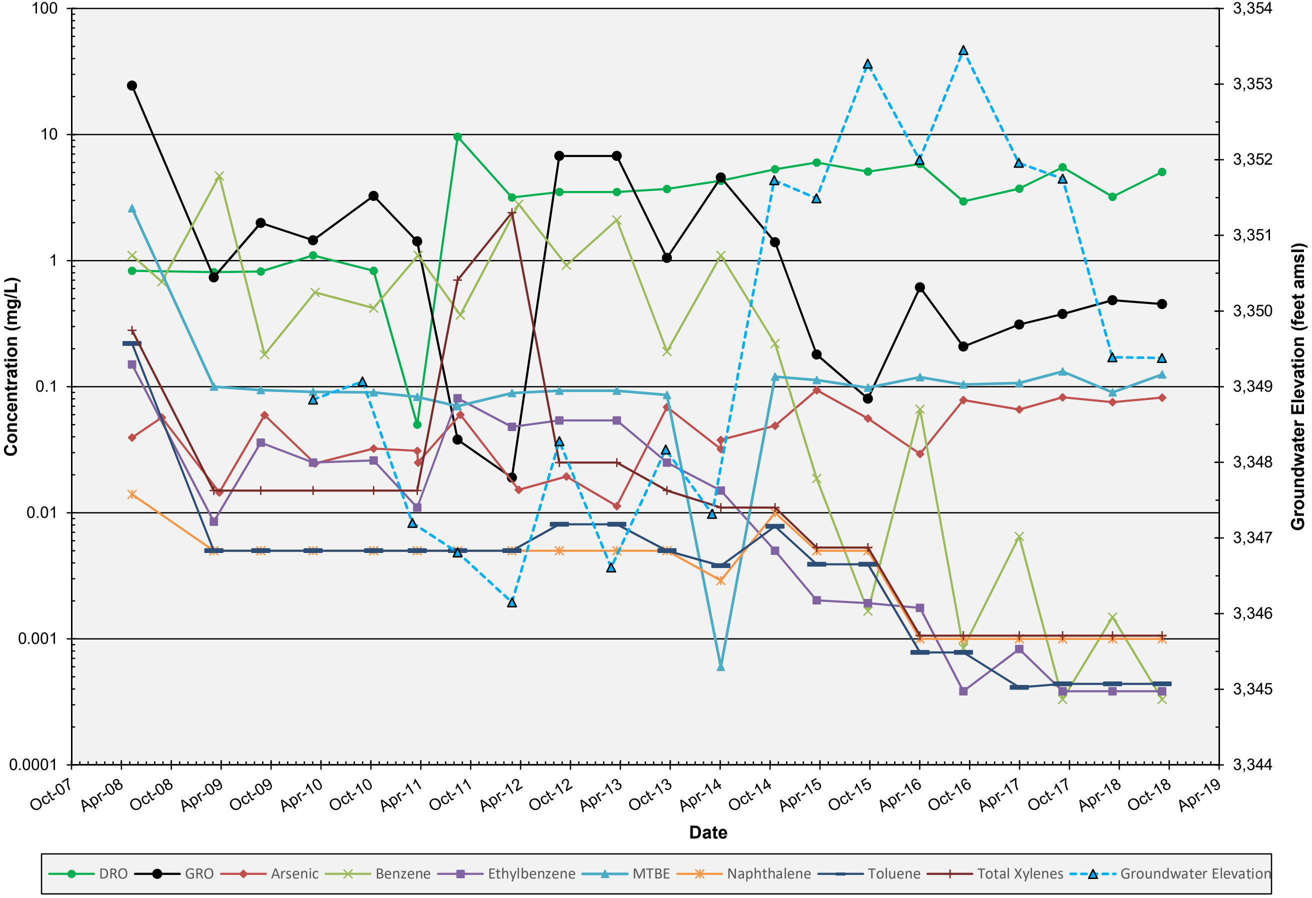
South Refinery Area



MW-101: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

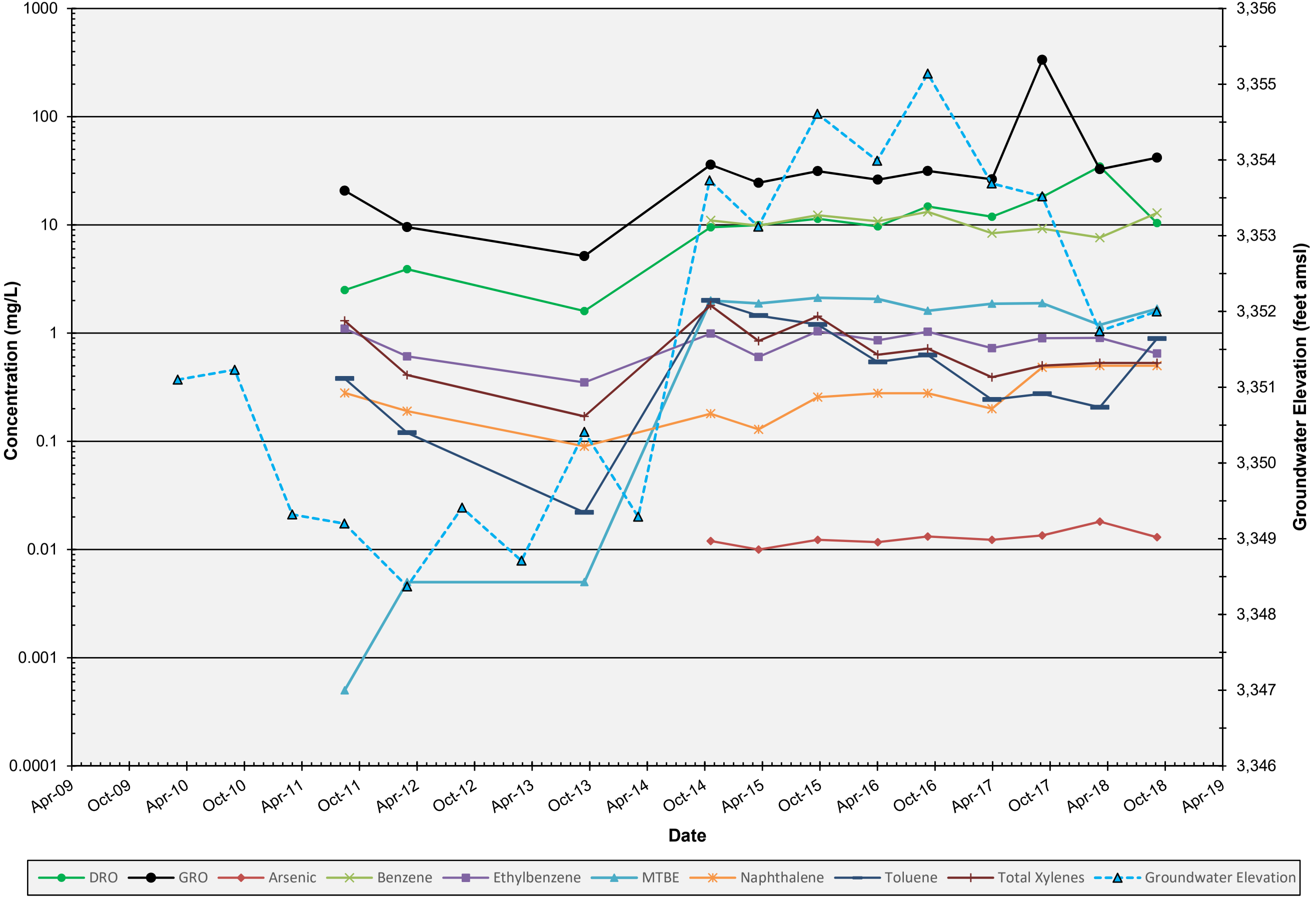
South Refinery Area



MW-102: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

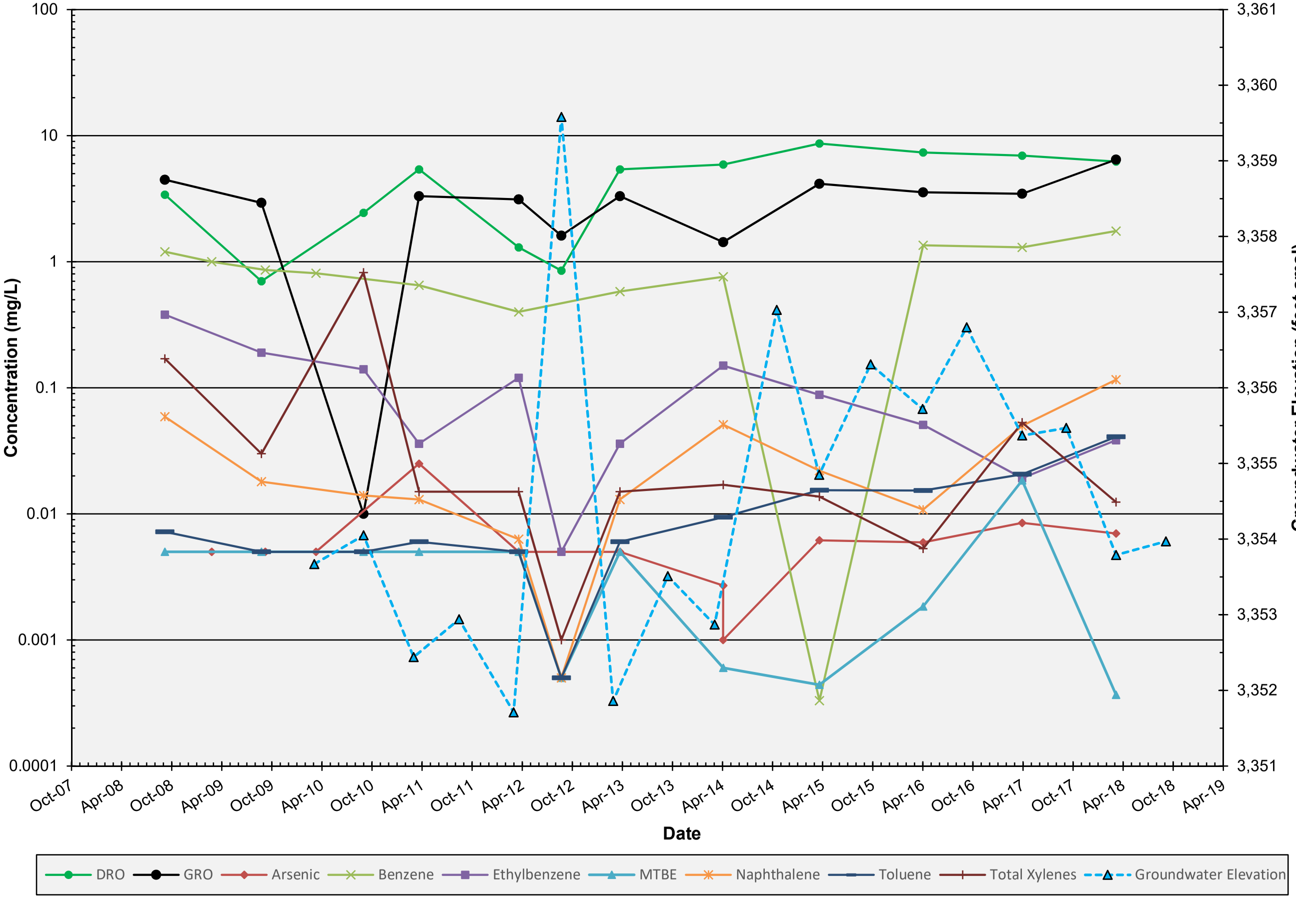
South Refinery Area



MW-103: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

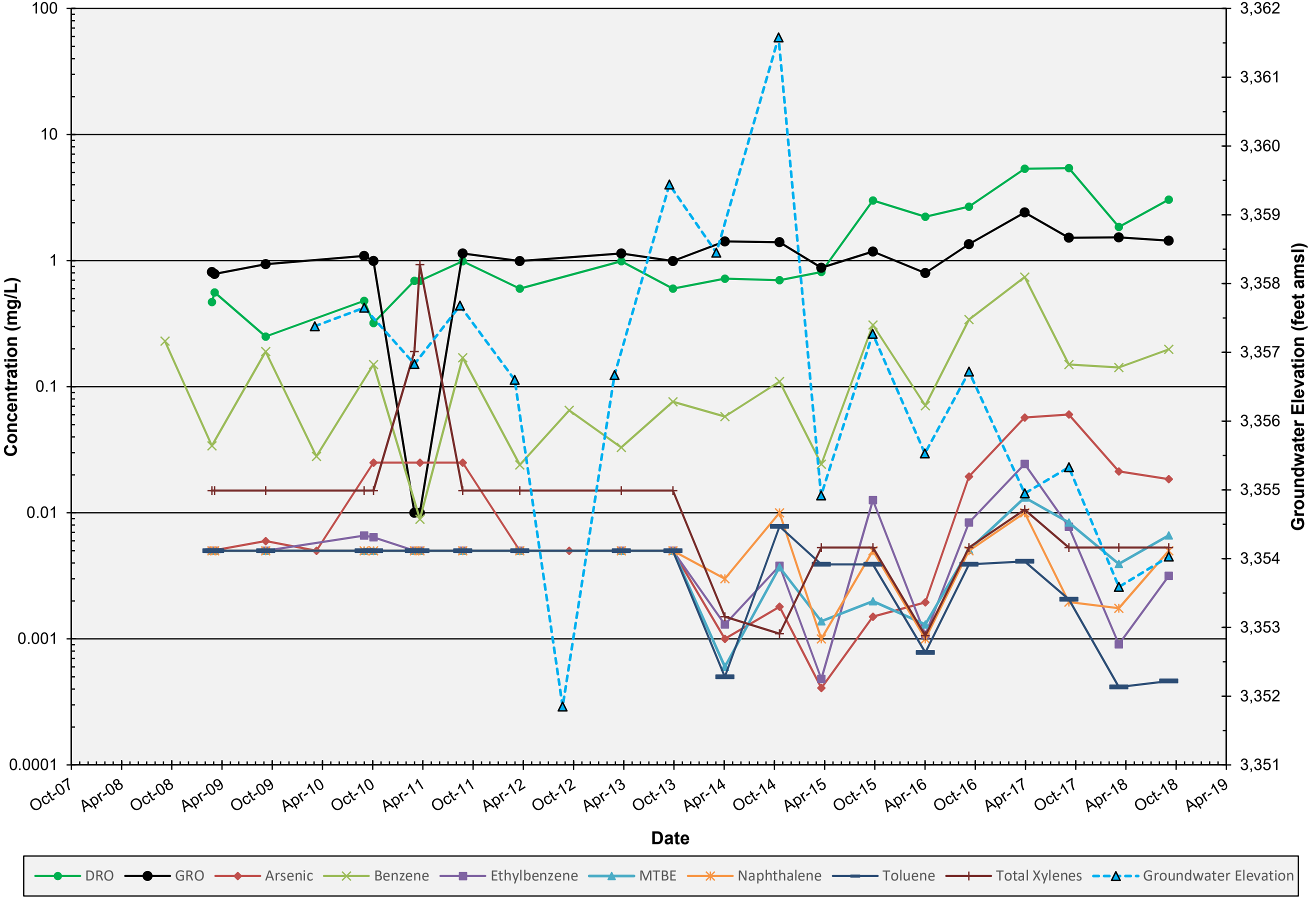
South Refinery Area



MW-104: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

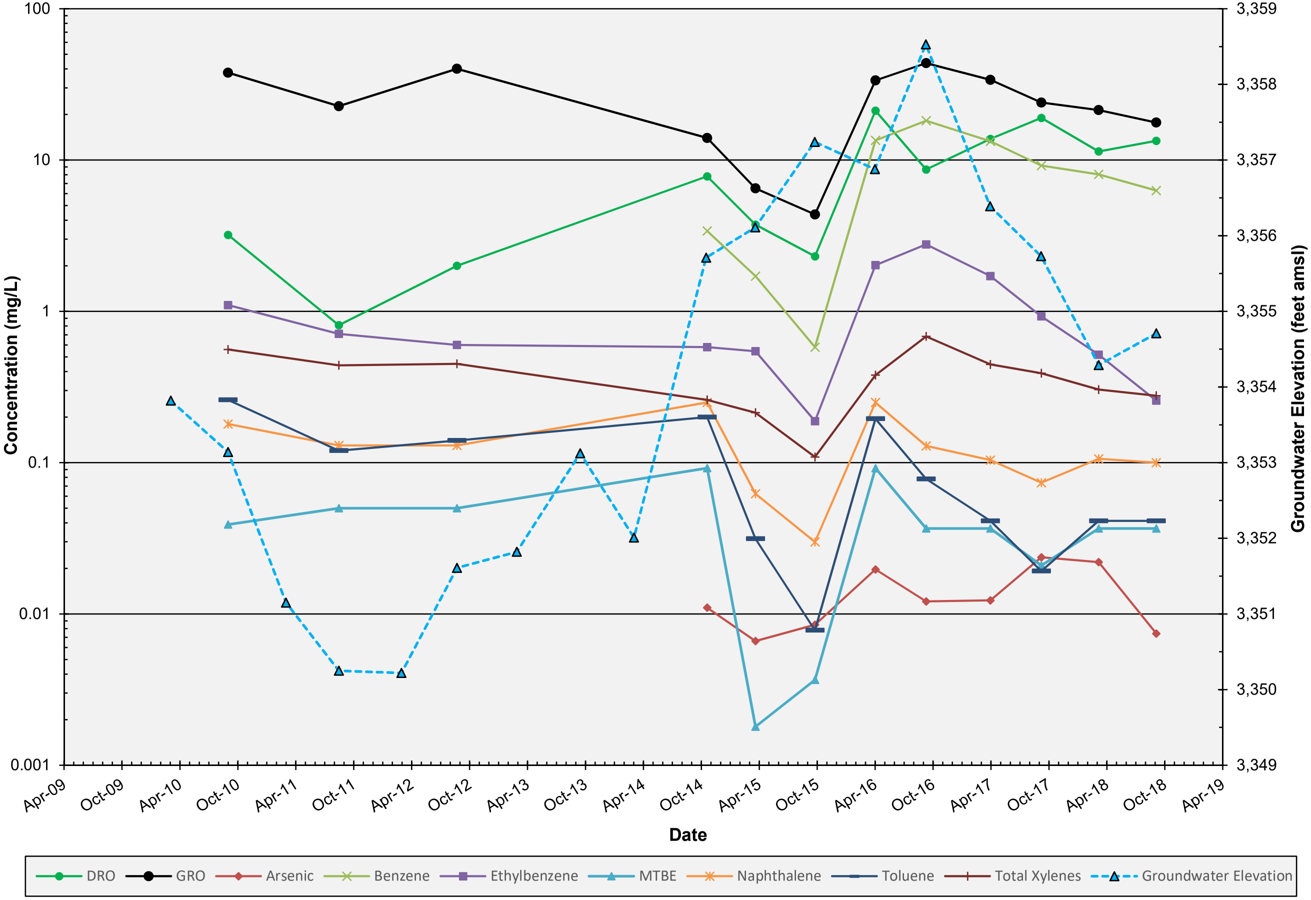
South Refinery Area



MW-105: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

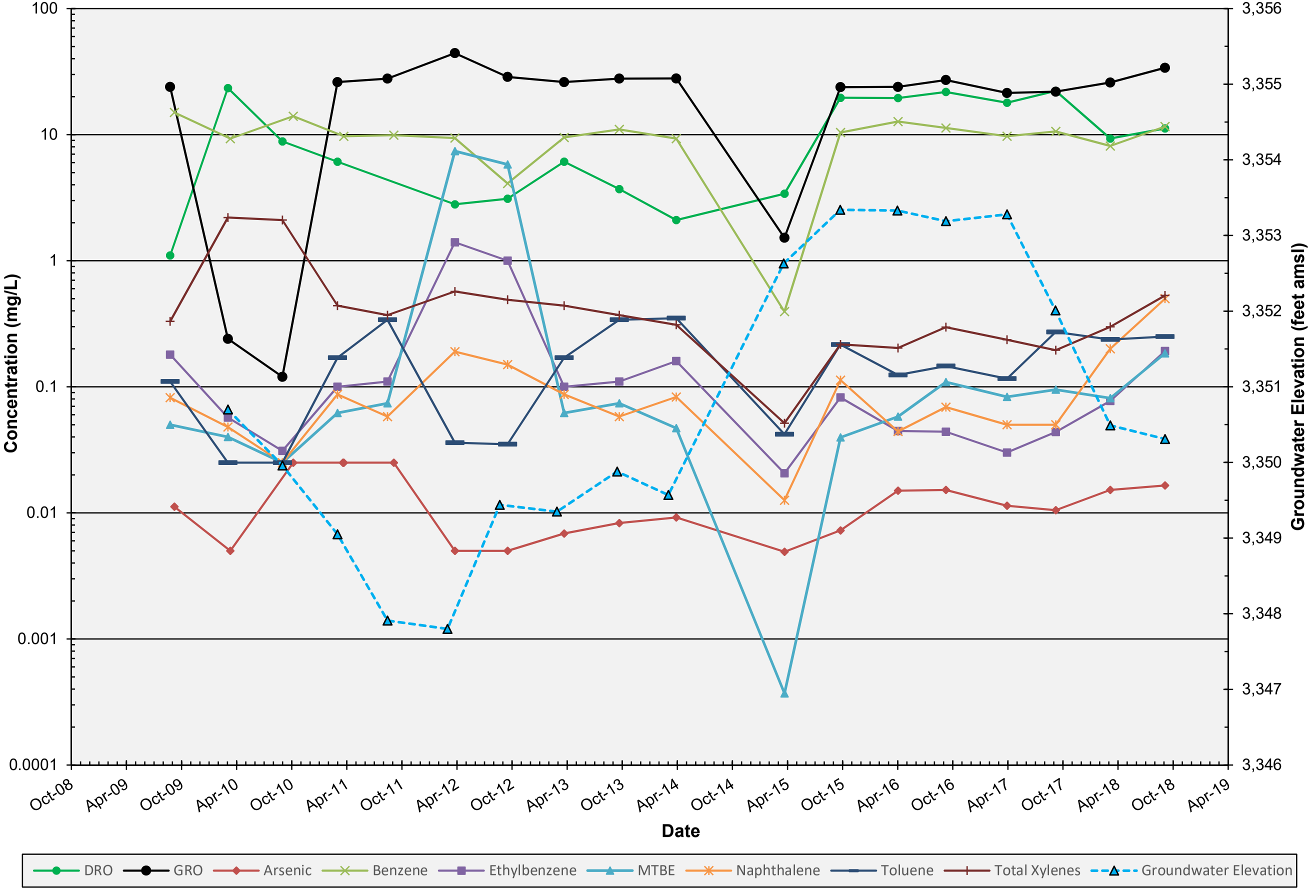
South Refinery Area



MW-106: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

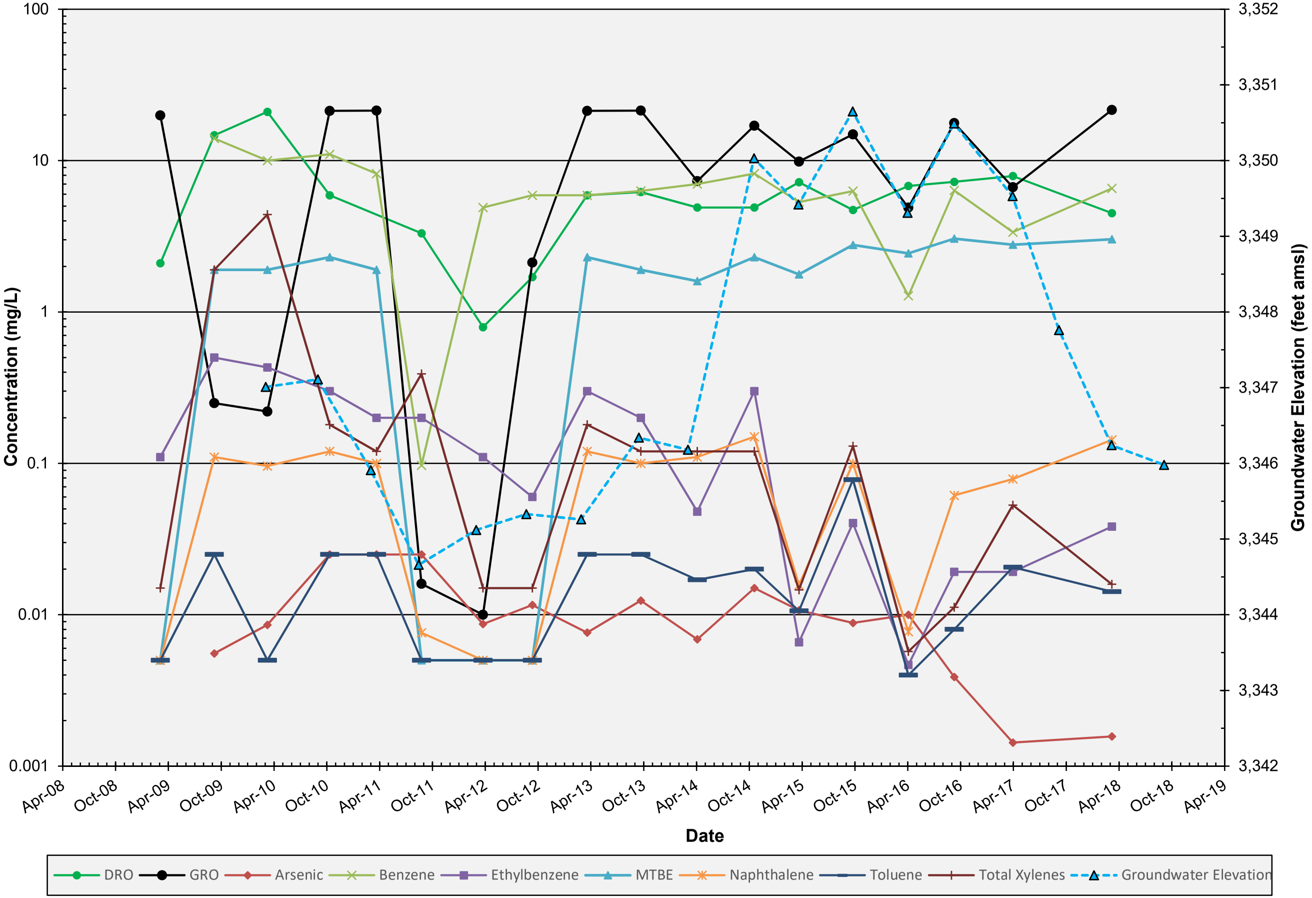
South Refinery Area



MW-107: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

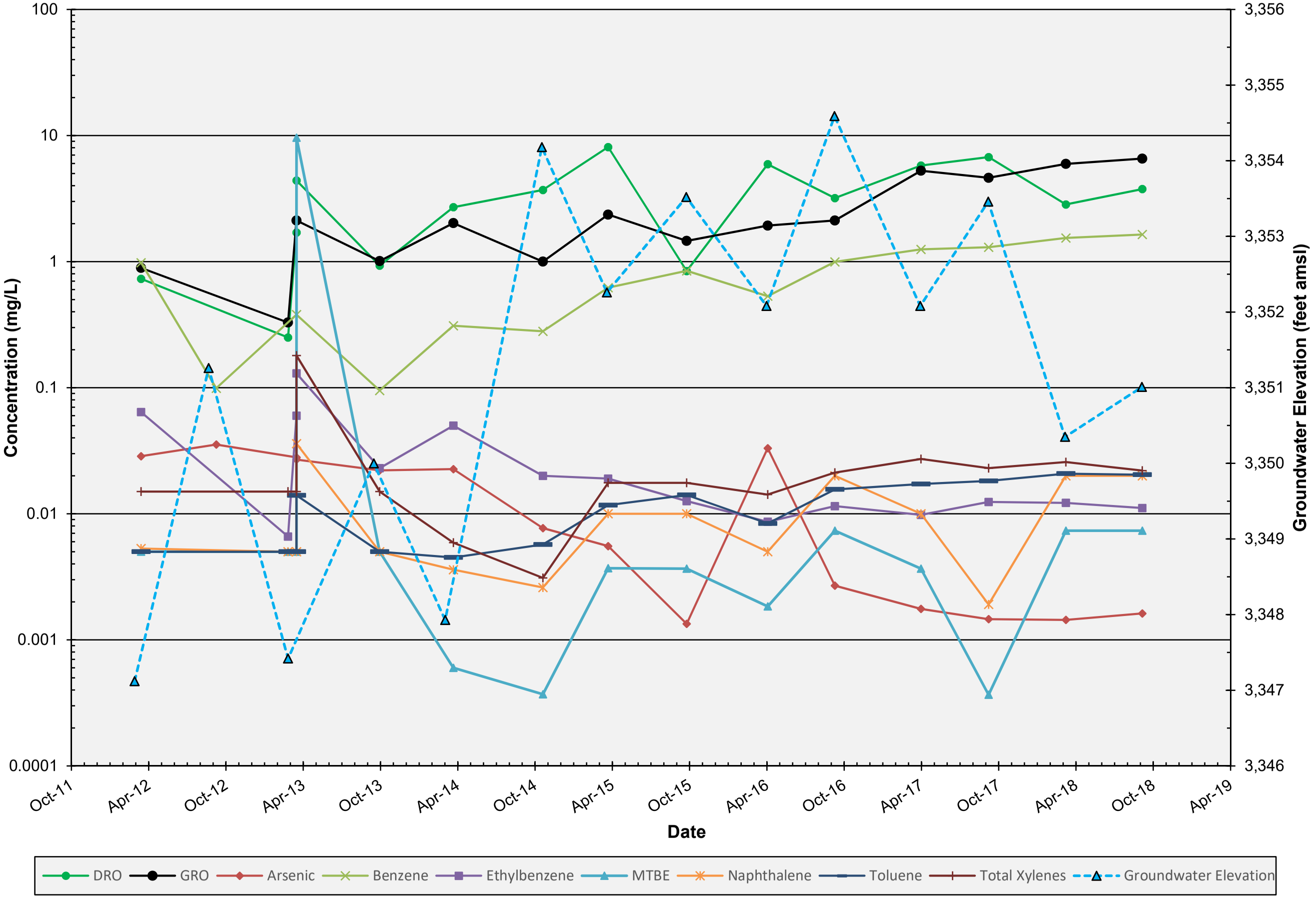
South Refinery Area



MW-109: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

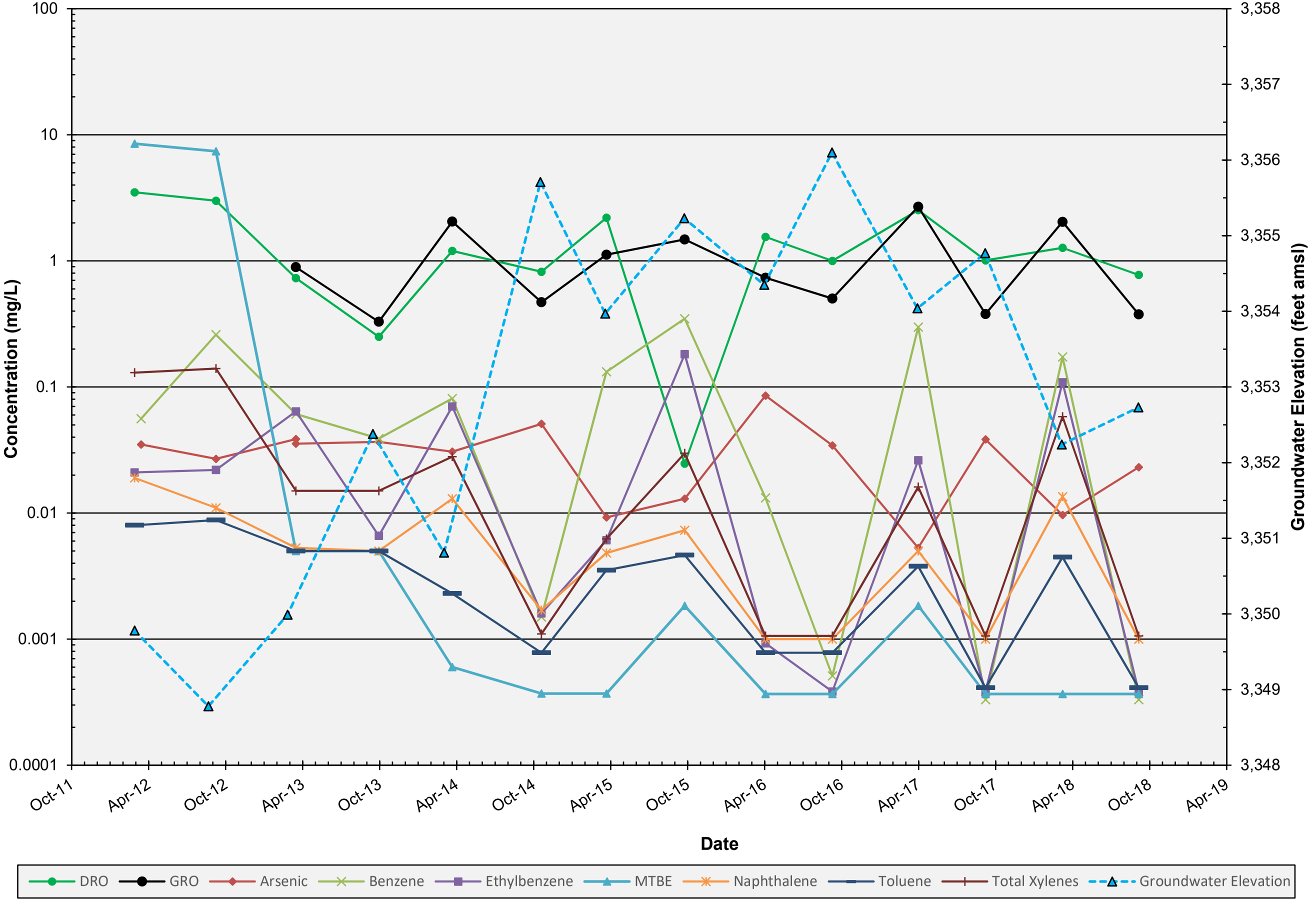
South Refinery Area



MW-110: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

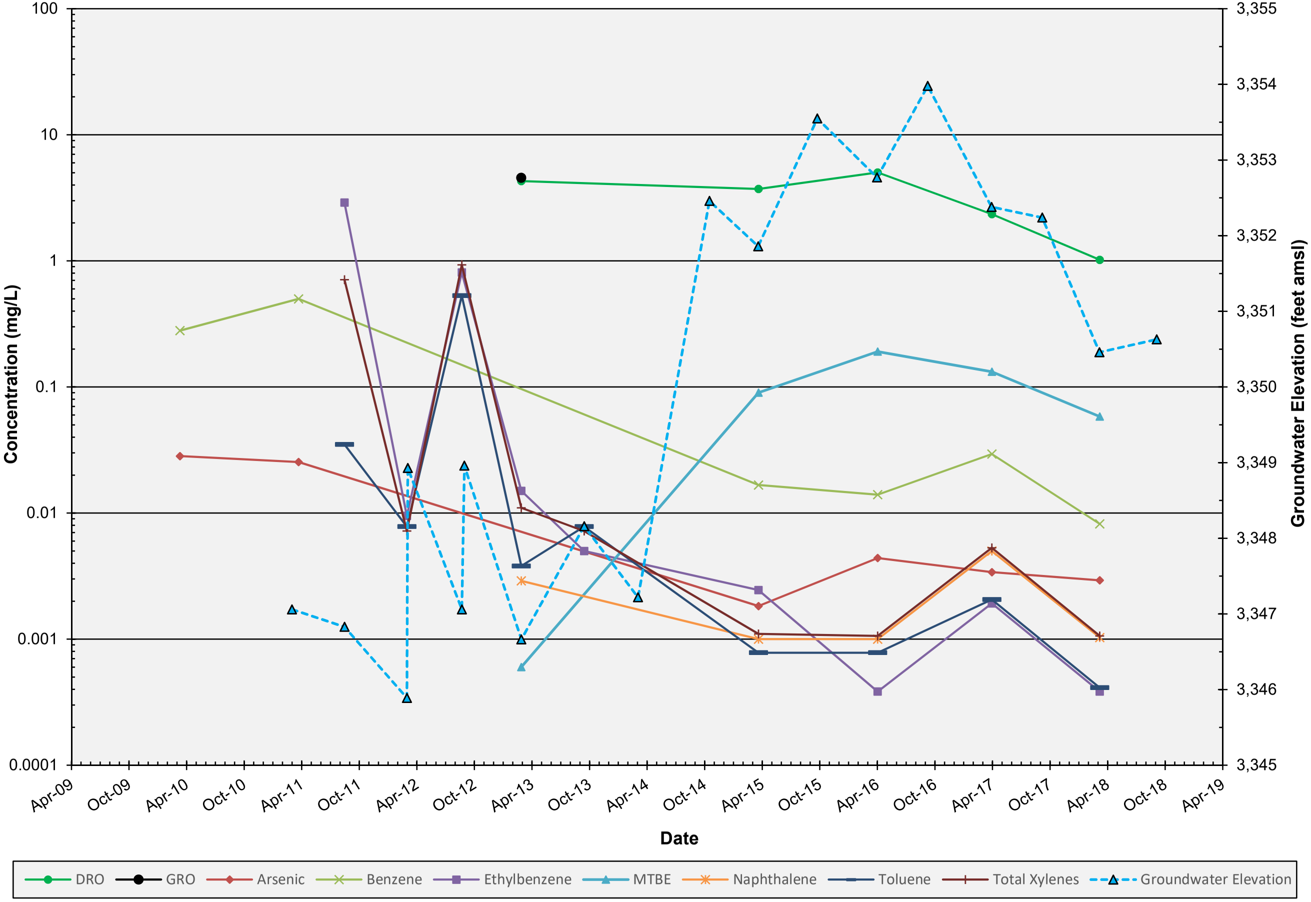
South Refinery Area



RW-4: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

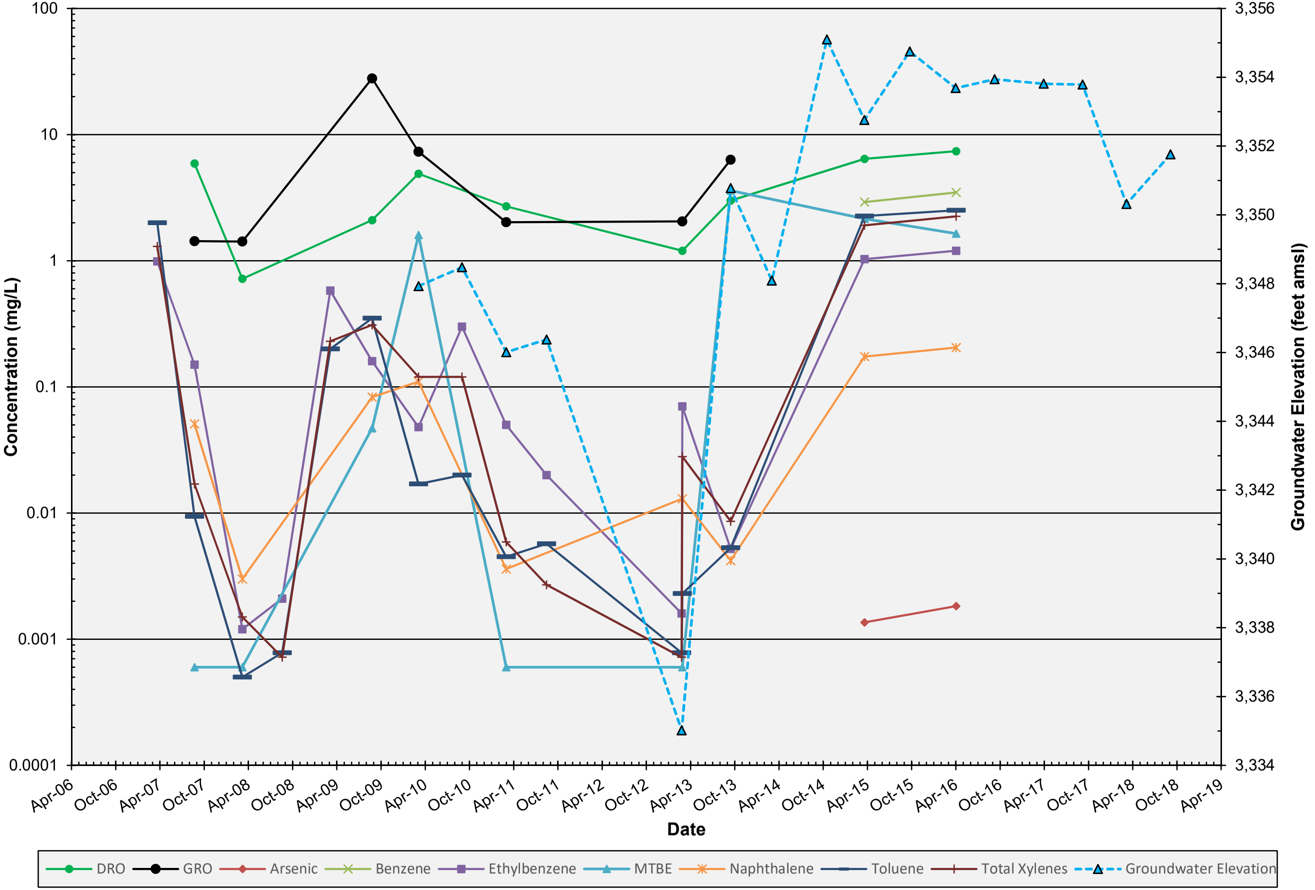
South Refinery Area



RW-5 and RW-5R: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

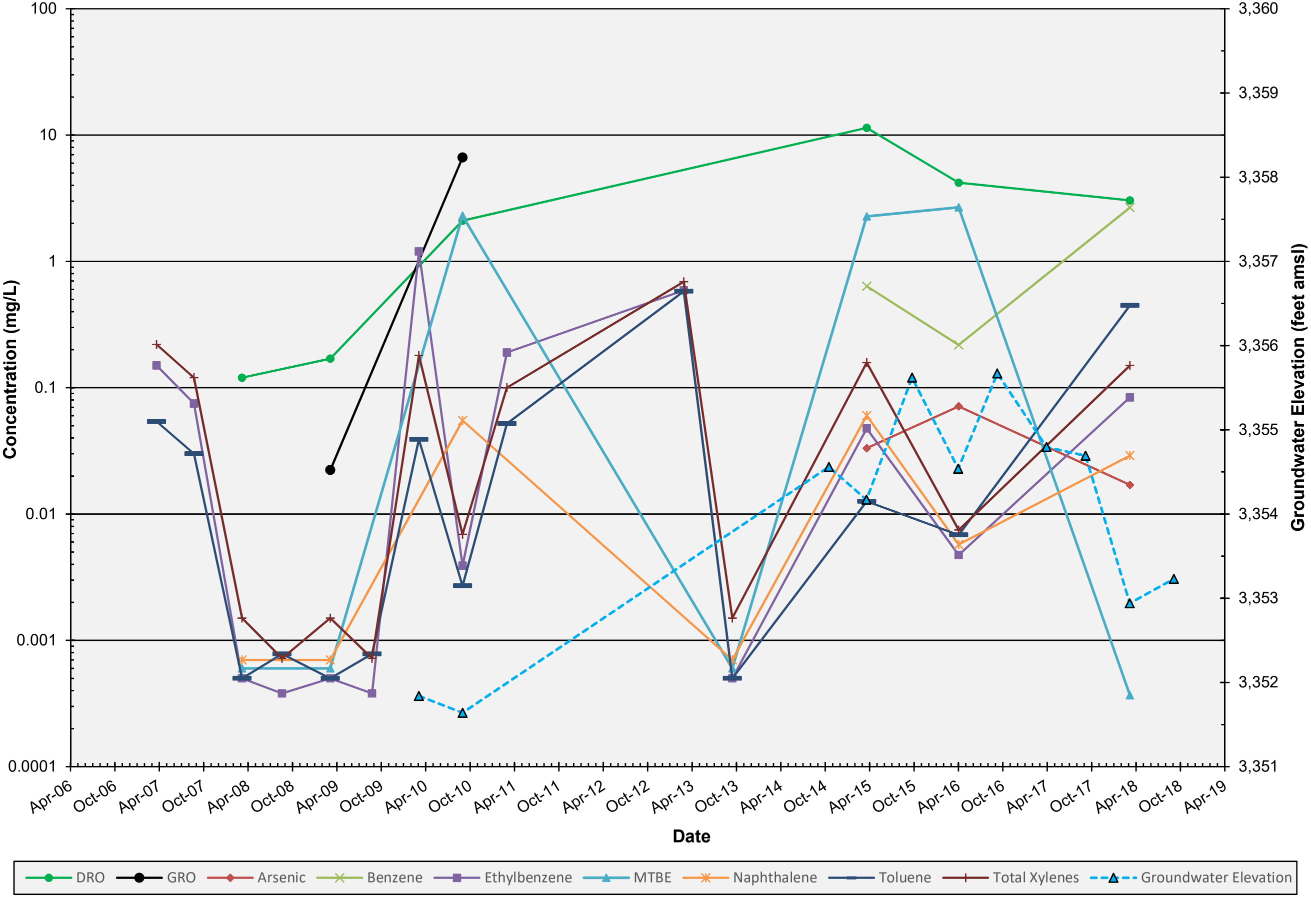
South Refinery Area



RW-6: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

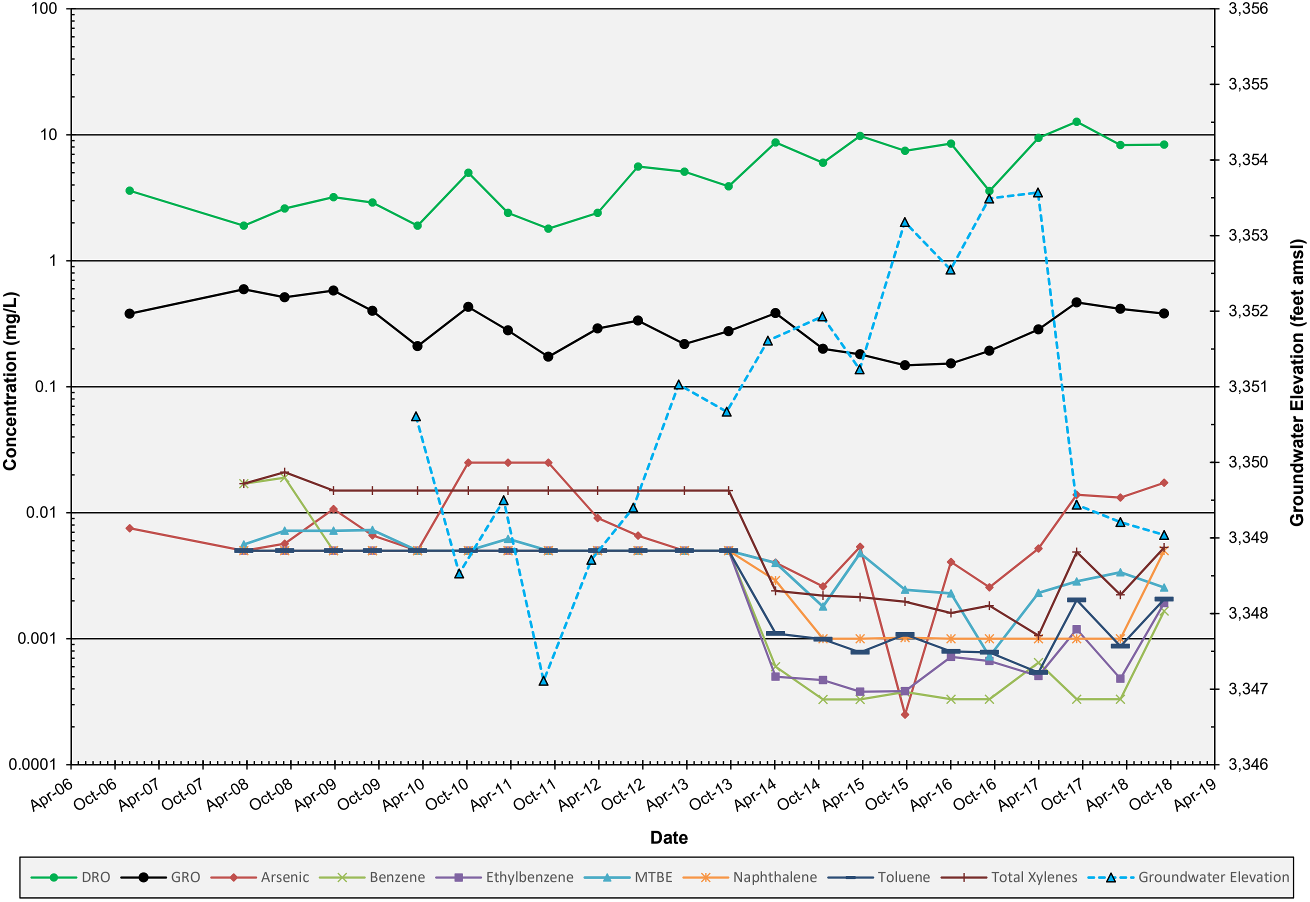
South Refinery Area



TEL-1: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

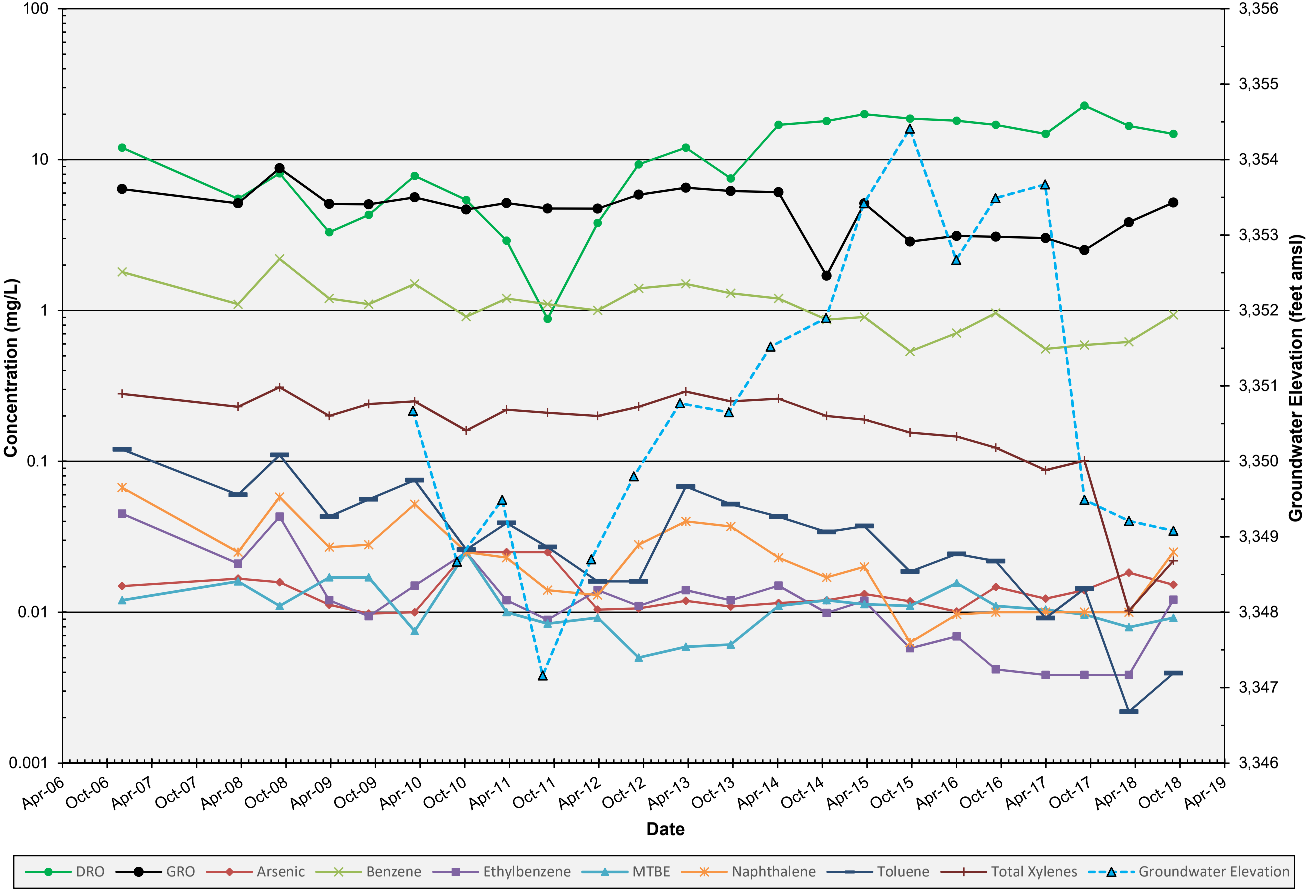
Tetra Ethyl Lead Impoundment



TEL-2: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

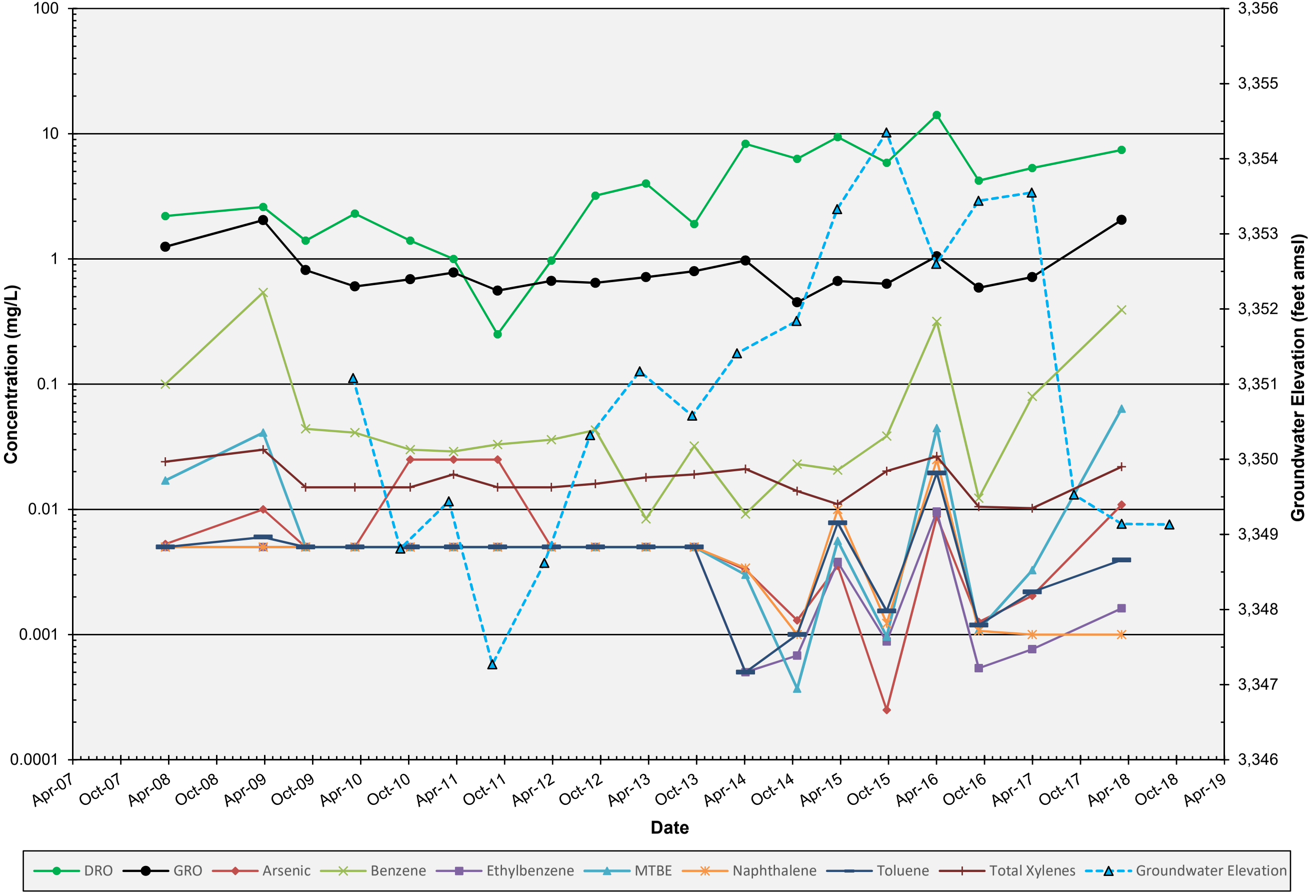
Tetra Ethyl Lead Impoundment



TEL-3: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

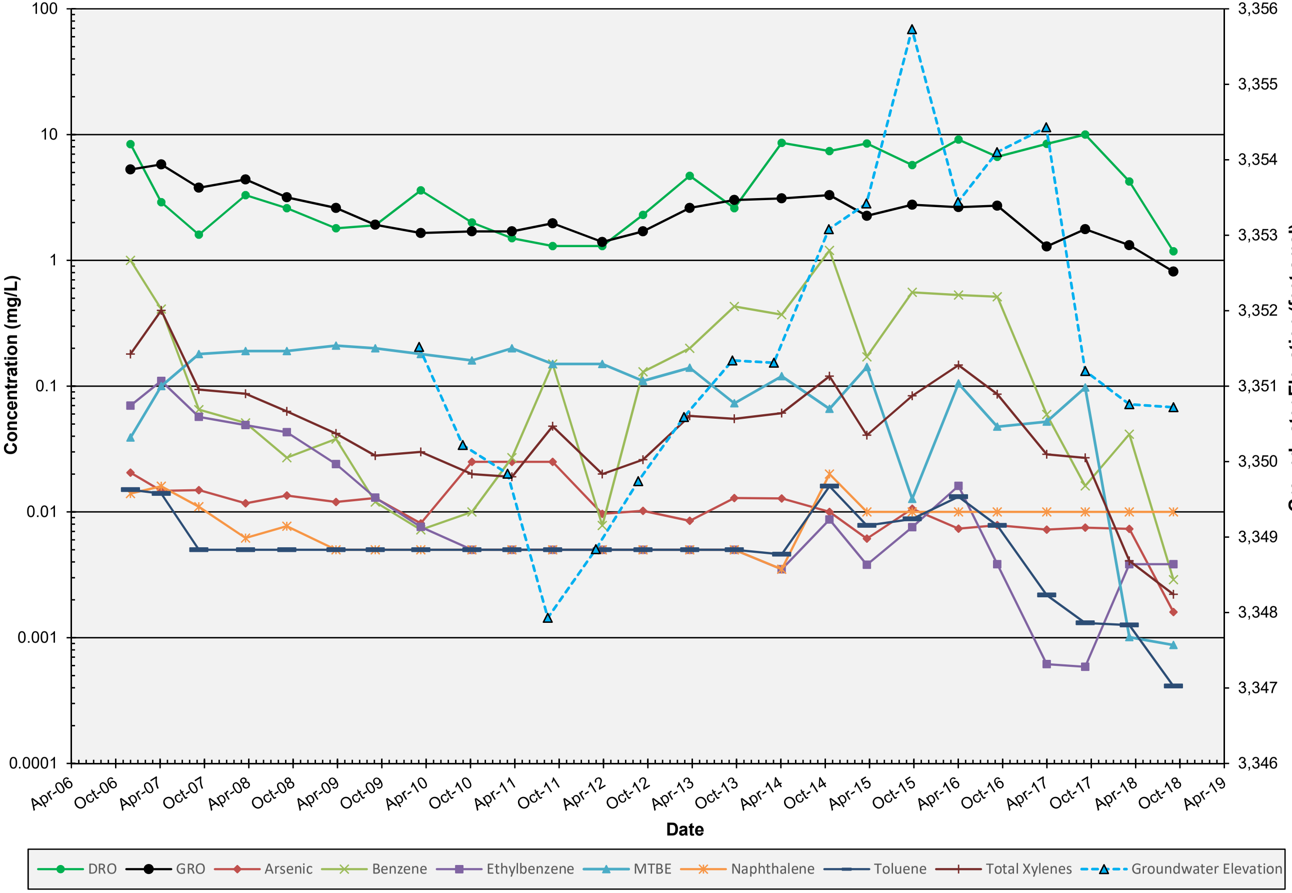
Tetra Ethyl Lead Impoundment



TEL-4: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

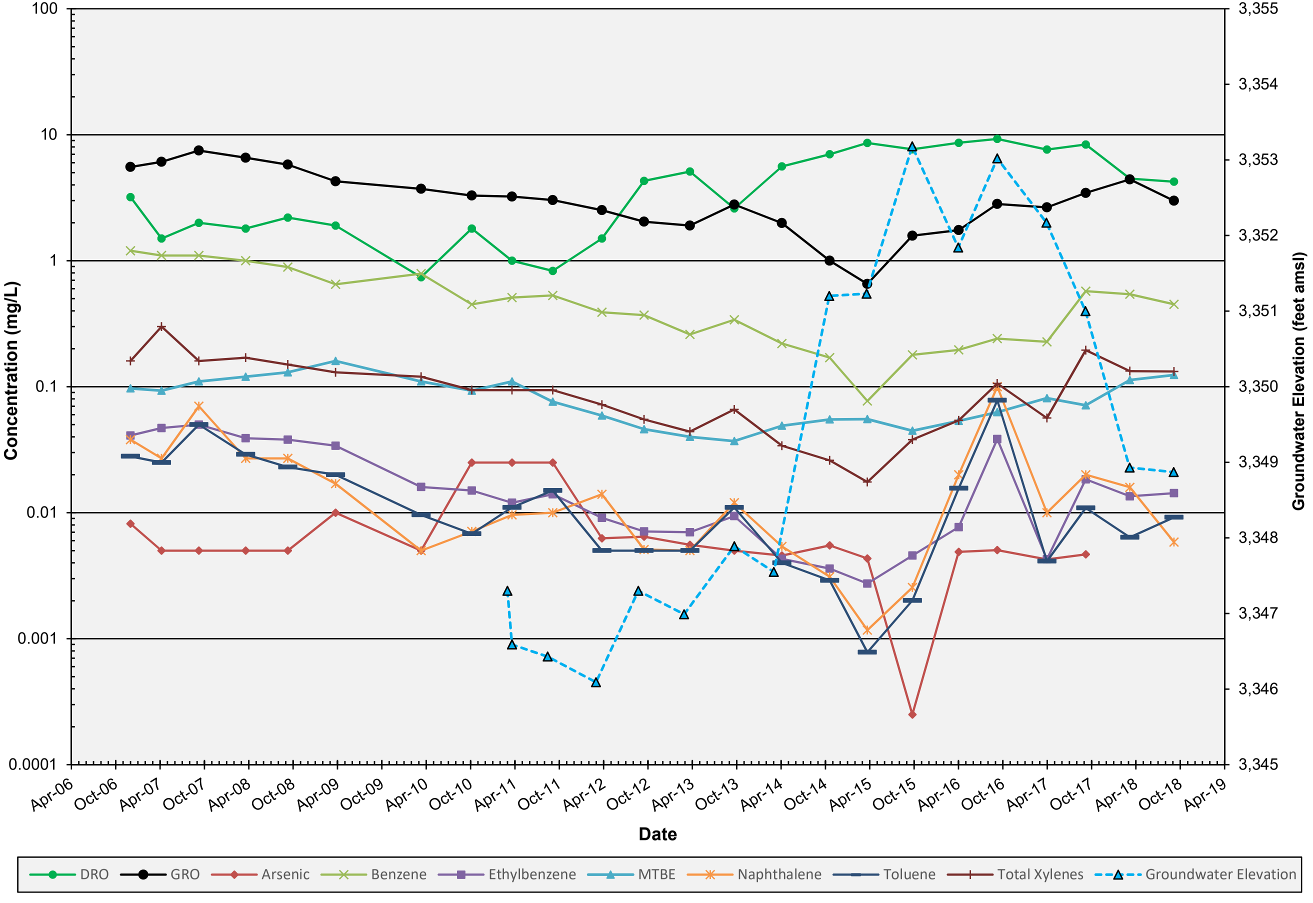
Tetra Ethyl Lead Impoundment



MW-49: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

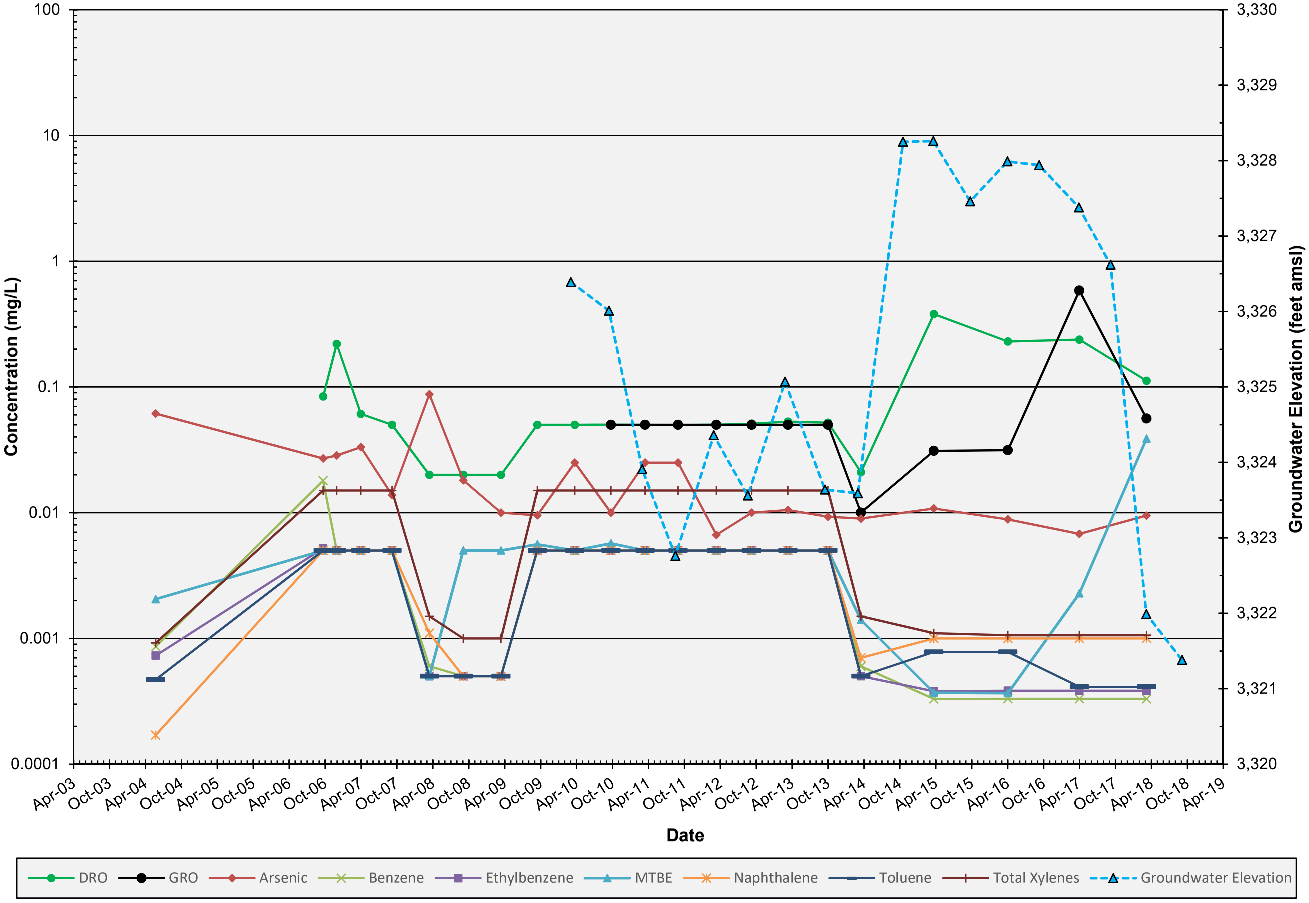
Tetra Ethyl Lead Impoundment



MW-8: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

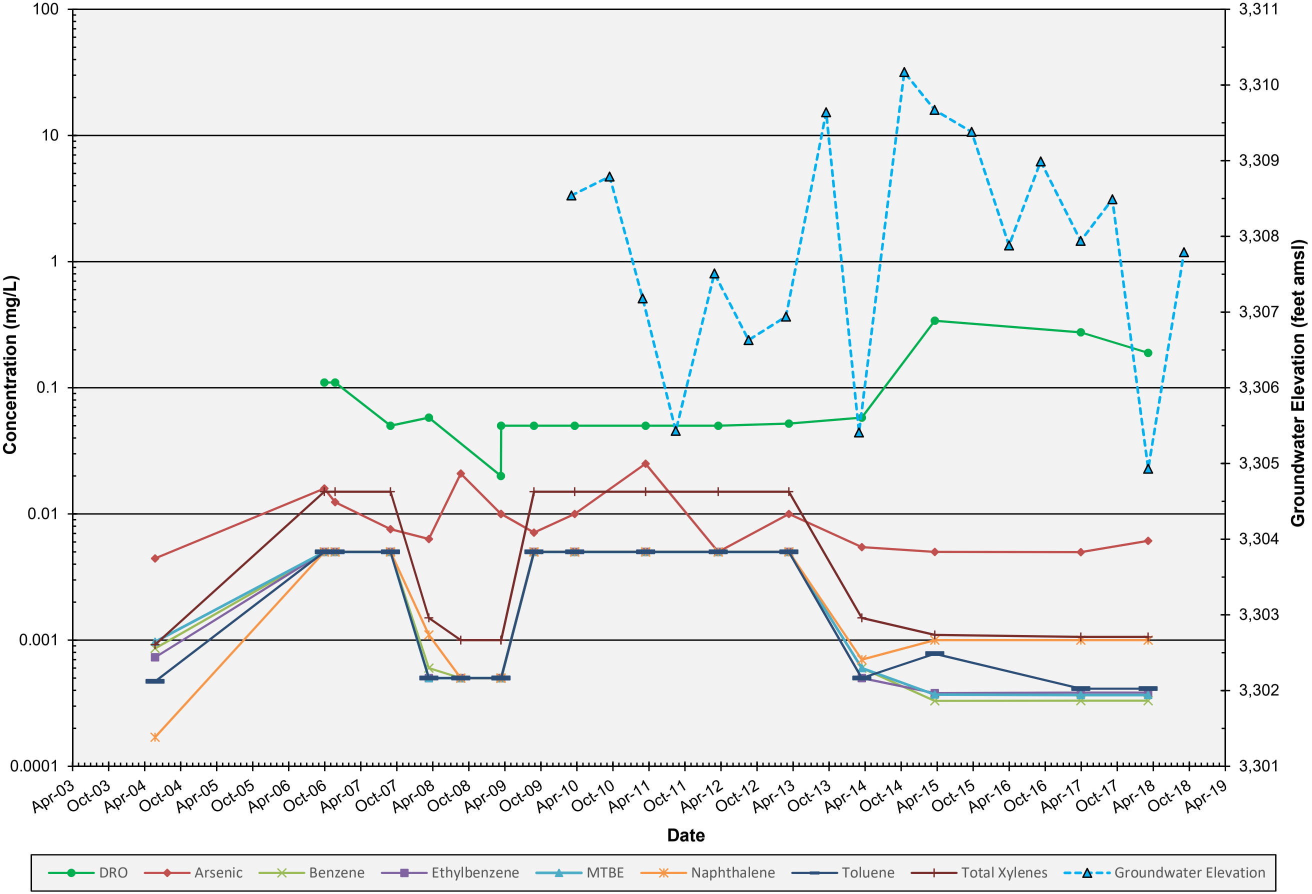
Three Mile Ditch



MW-16: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

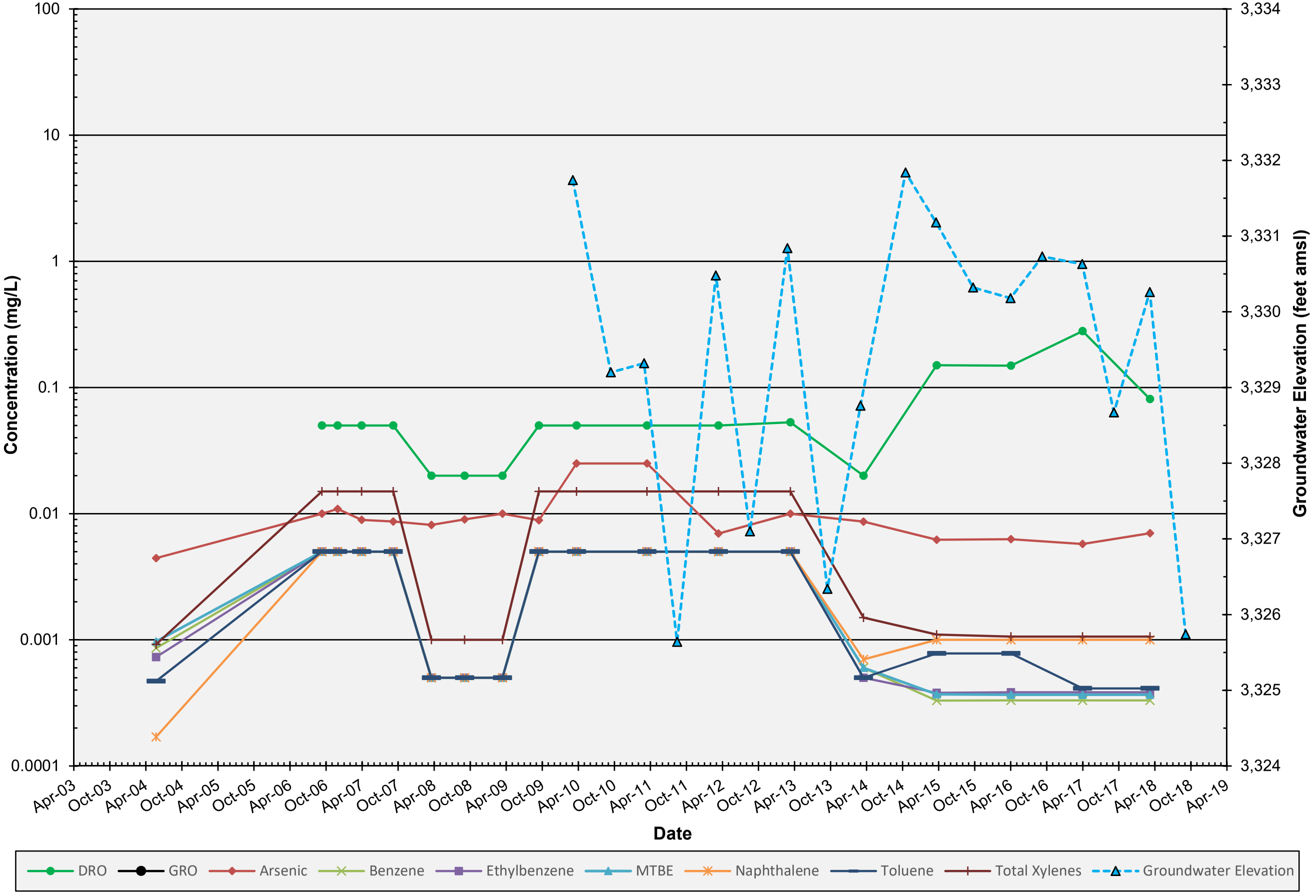
Three Mile Ditch



MW-20: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

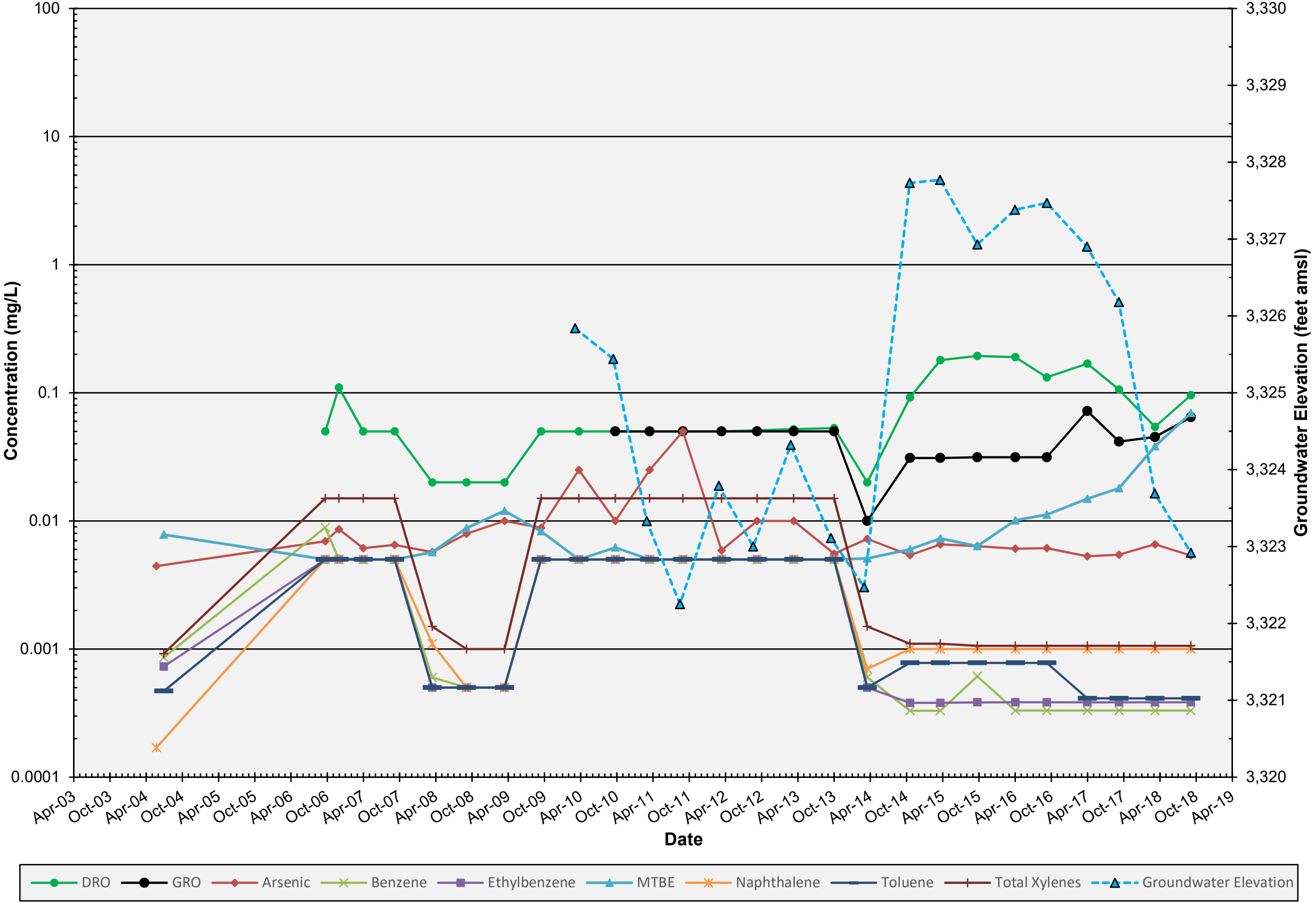
Three Mile Ditch



MW-21: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

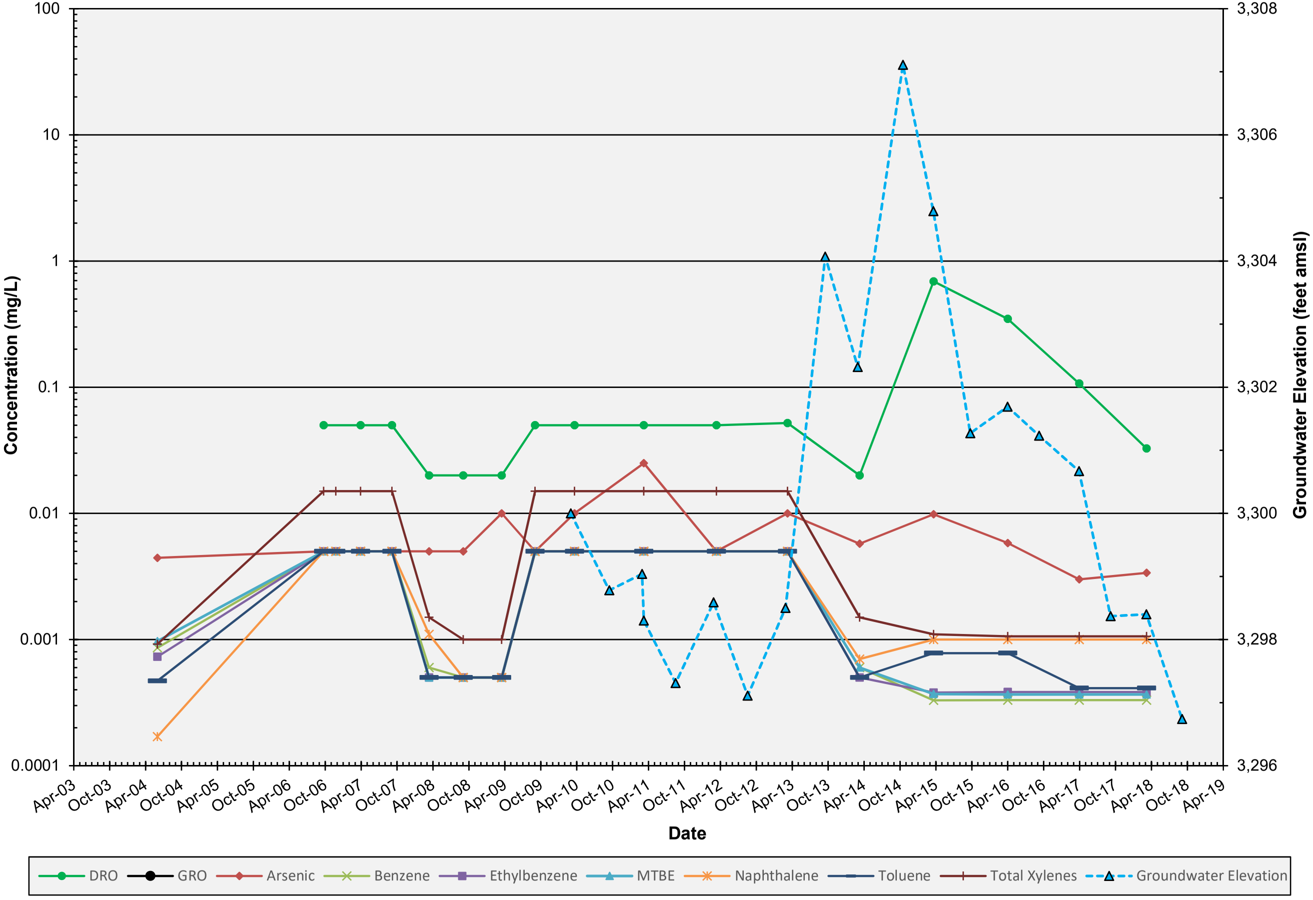
Three Mile Ditch



MW-25: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

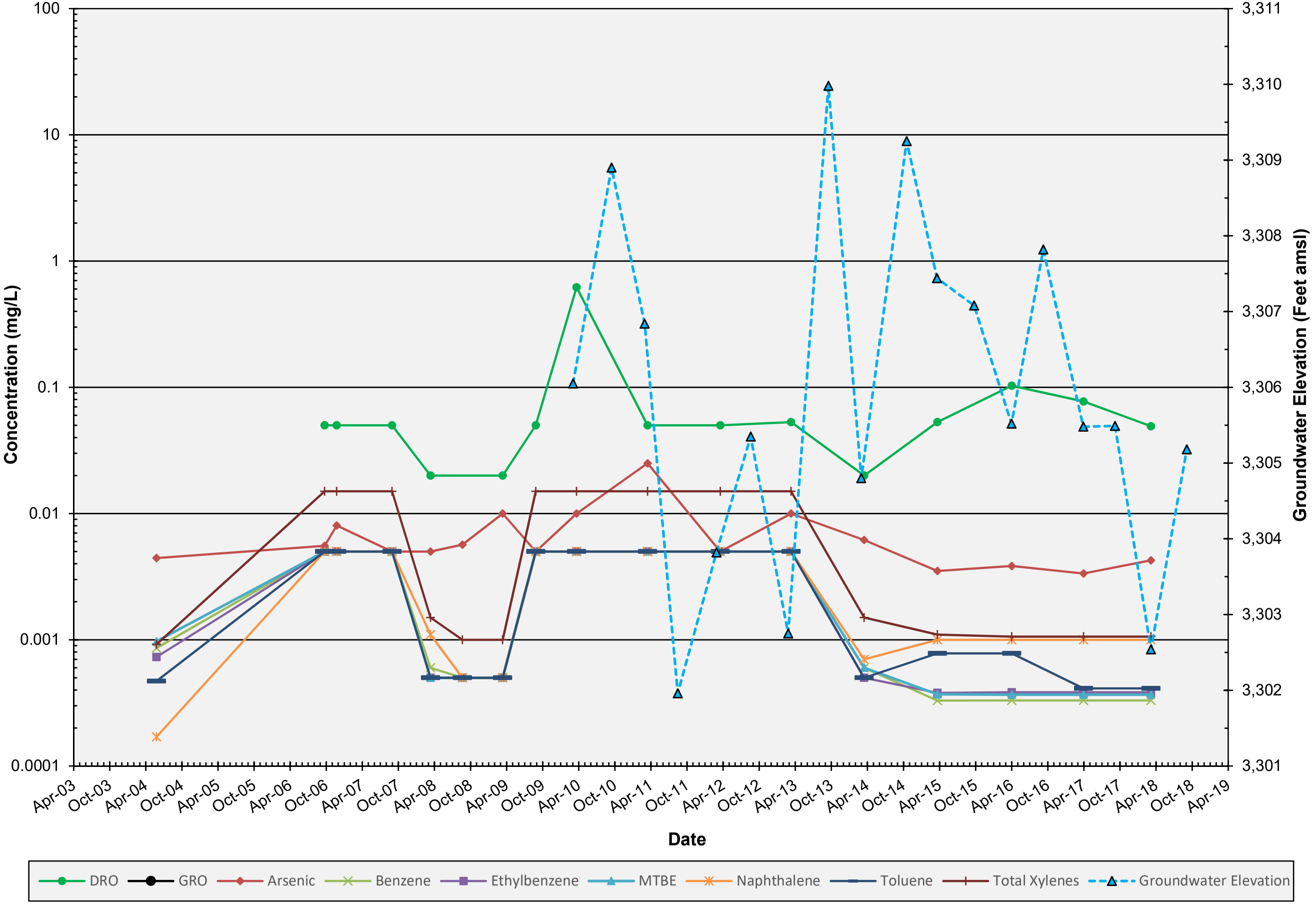
Three Mile Ditch



MW-26: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

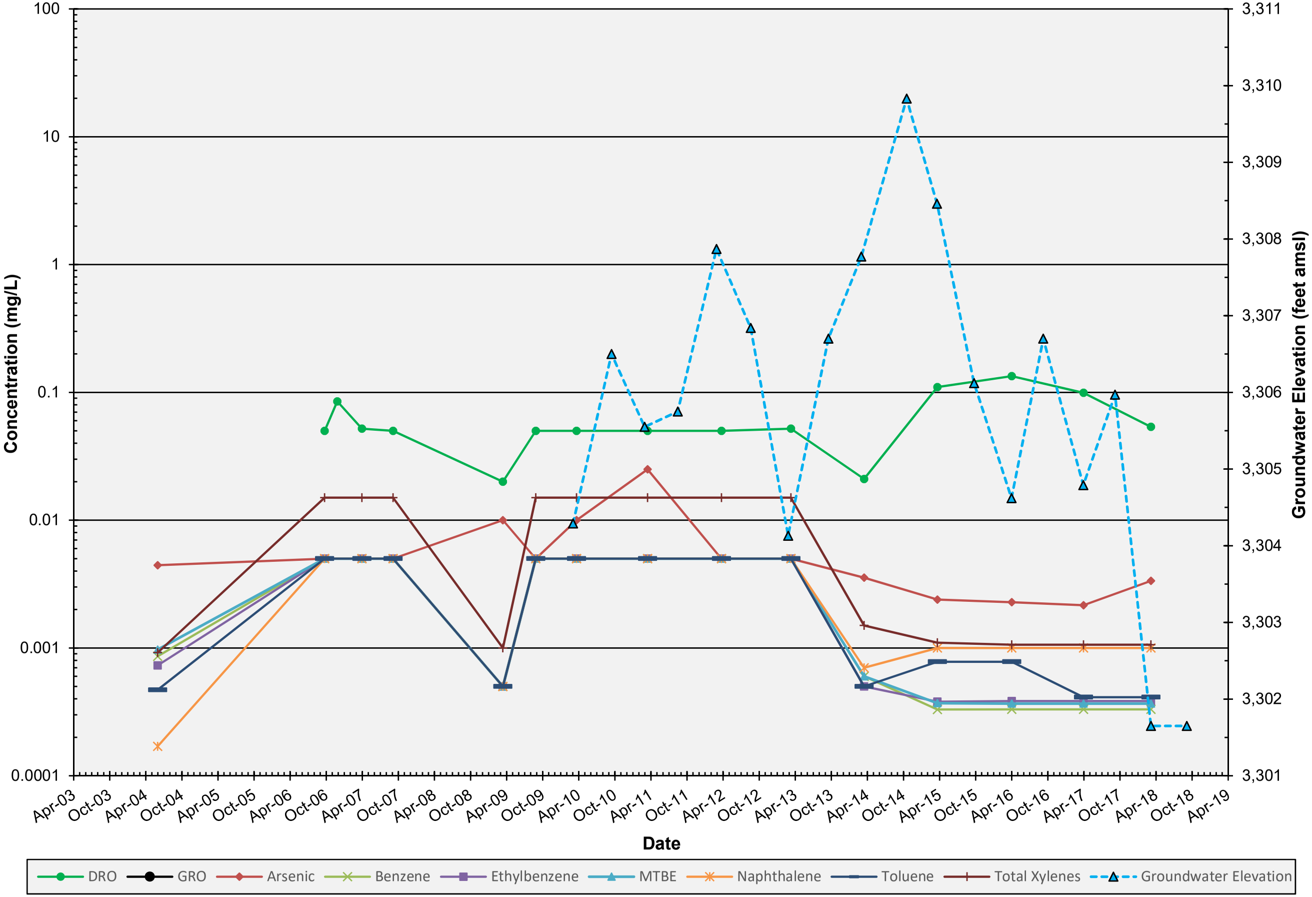
Three Mile Ditch



MW-27: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

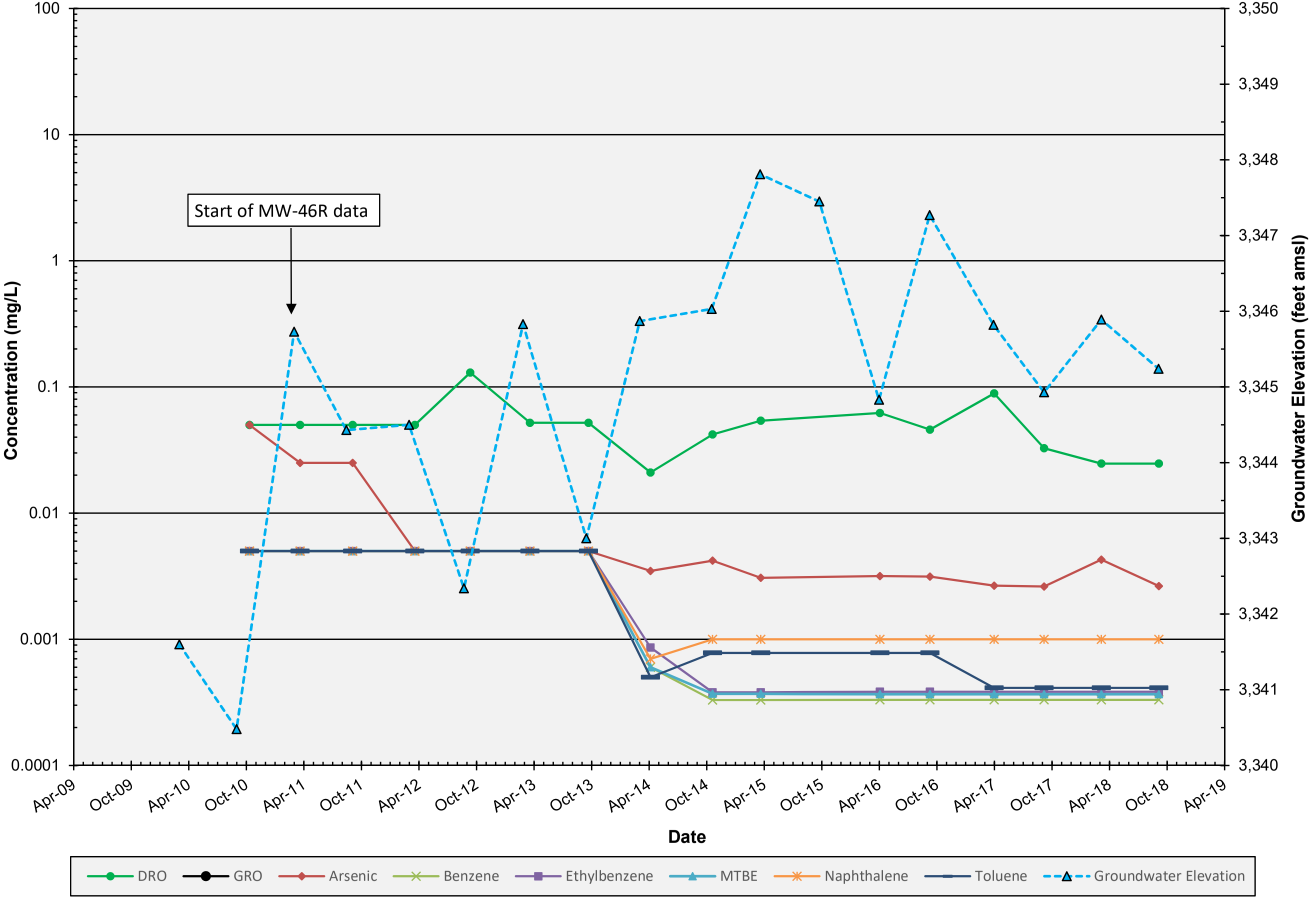
Three Mile Ditch



MW-46 & MW-46R: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

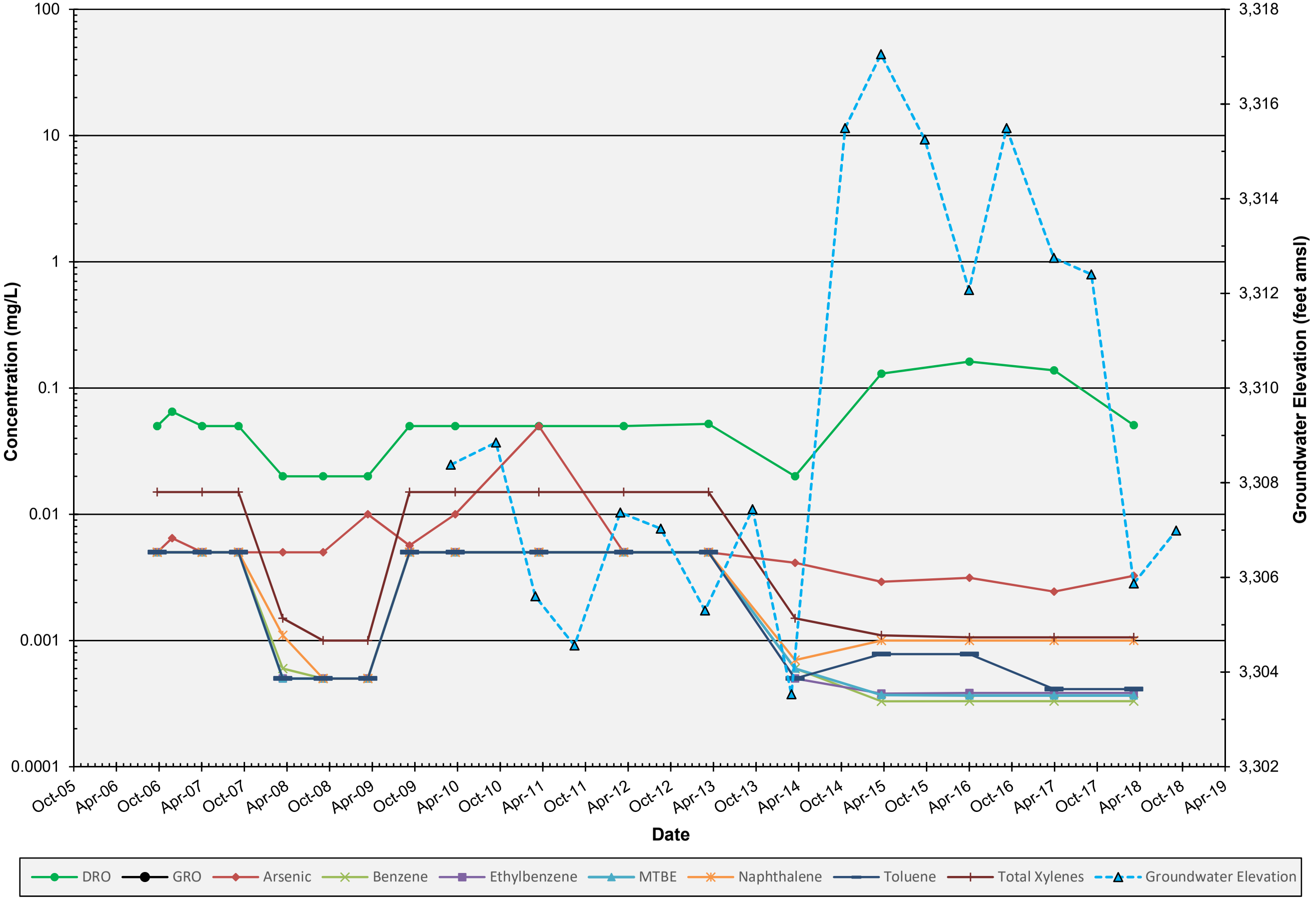
Three Mile Ditch



MW-68: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

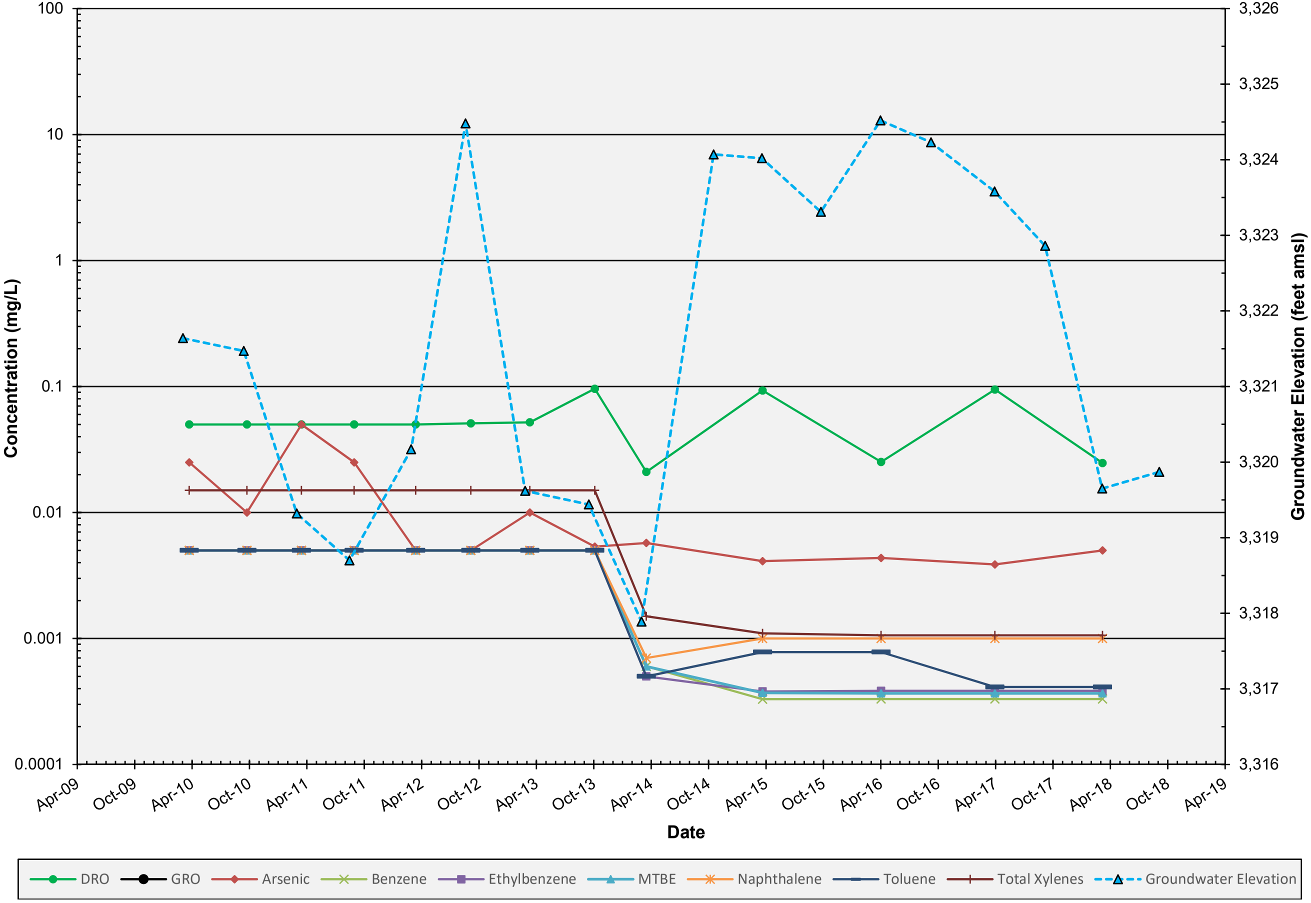
Three Mile Ditch



MW-71: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

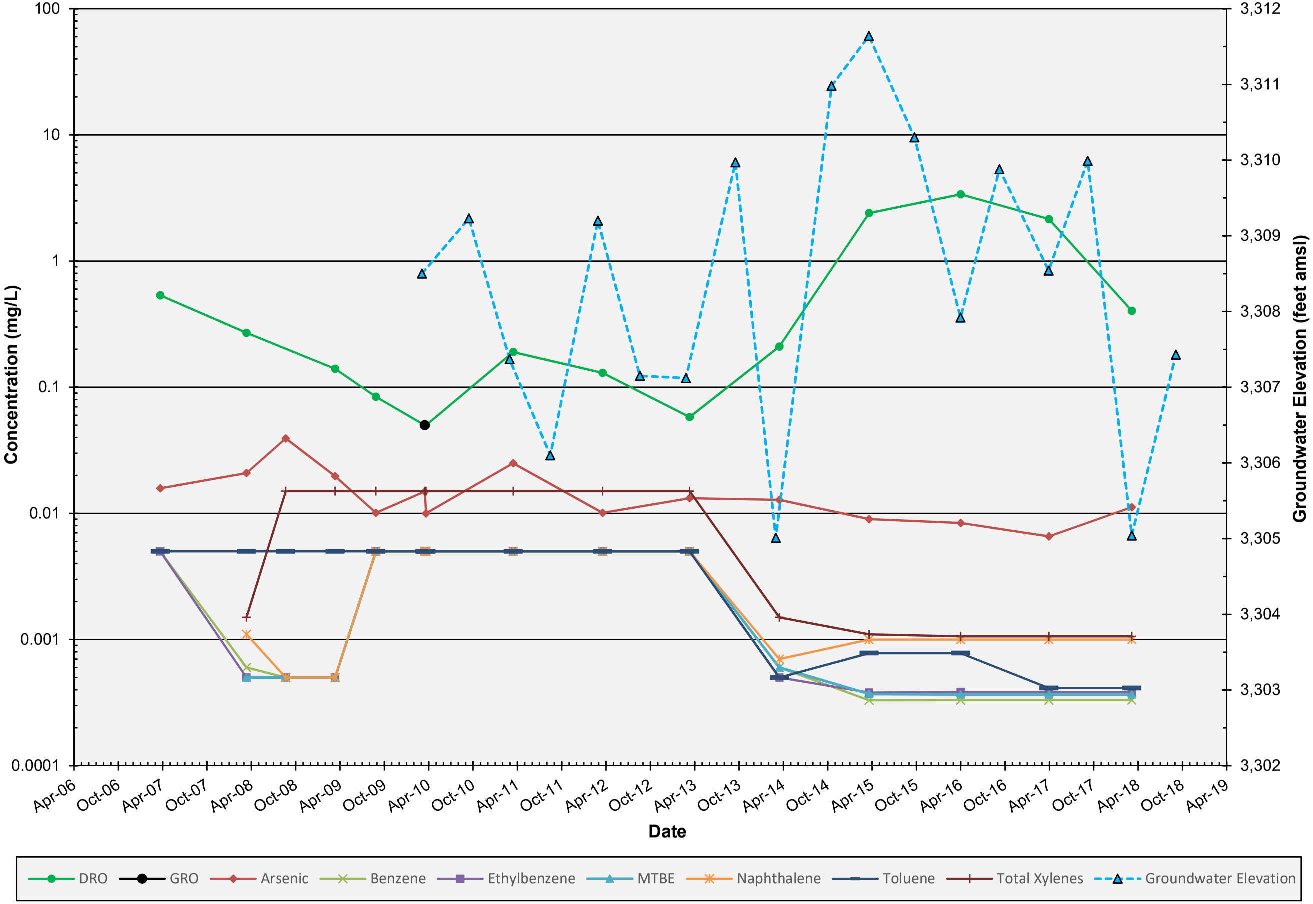
Three Mile Ditch



MW-89: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

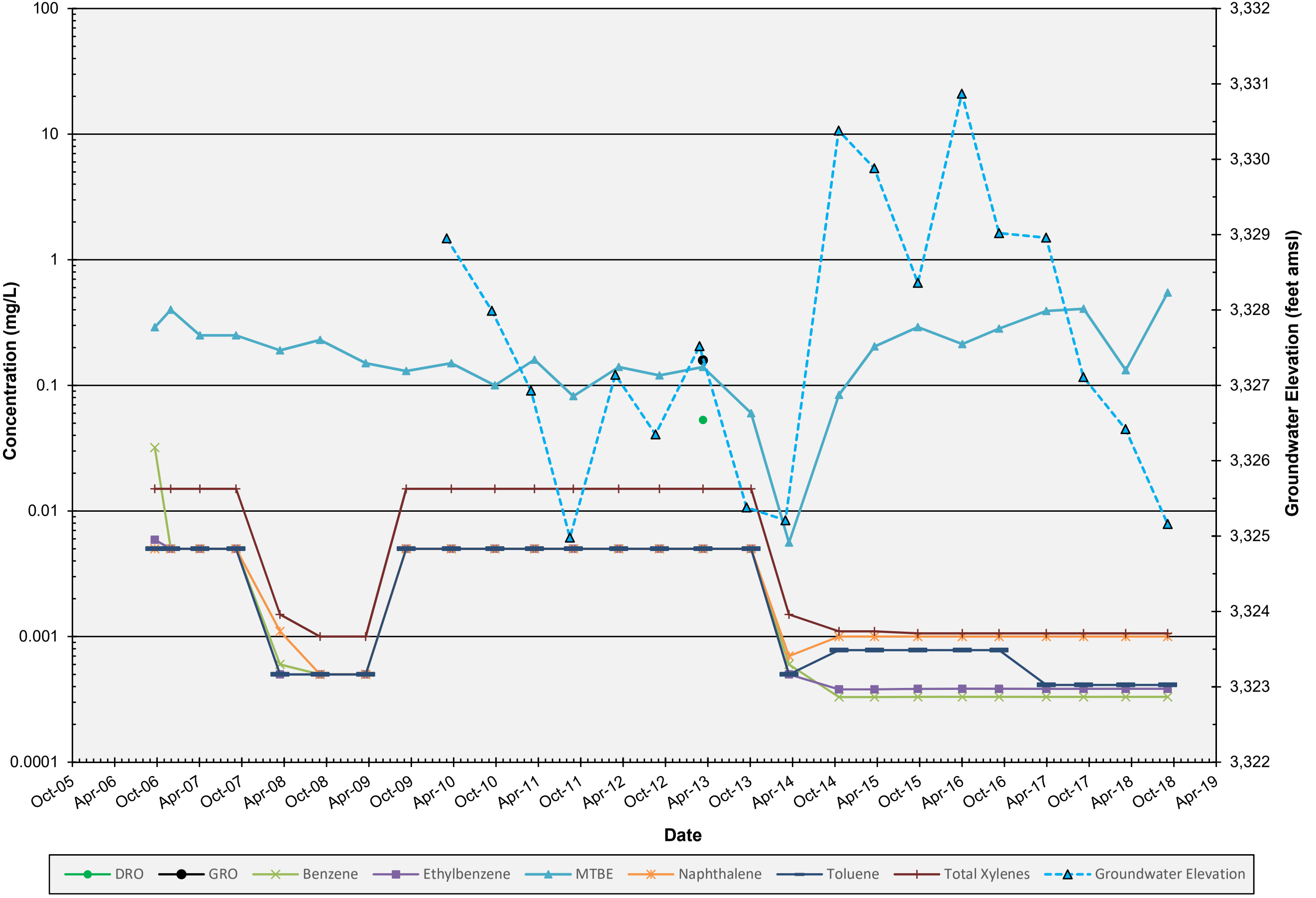
Three Mile Ditch



NP-1: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

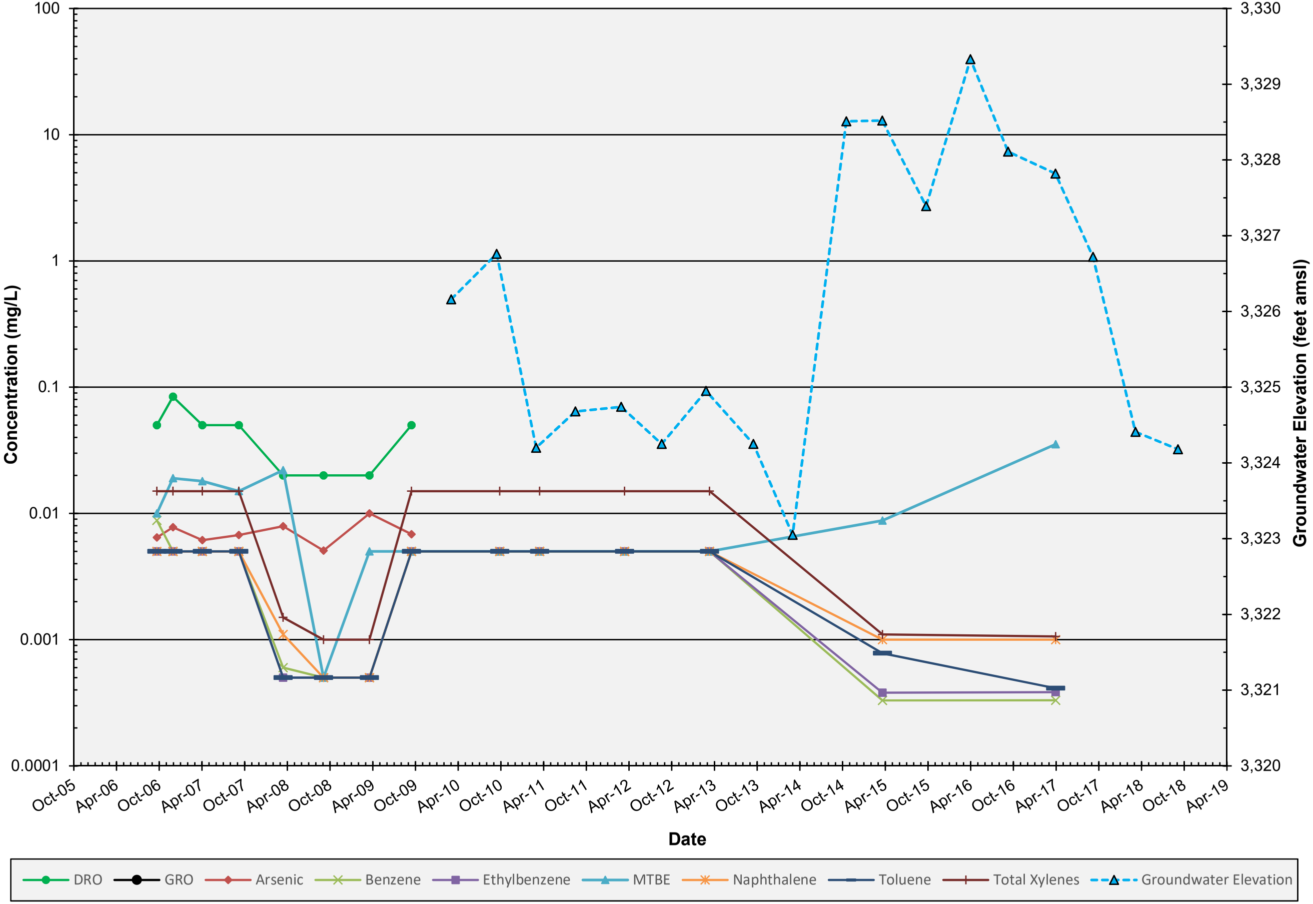
Three Mile Ditch



NP-6: COC Concentrations and Groundwater Elevations

HollyFrontier Navajo Refining LLC - Artesia Refinery

Three Mile Ditch



Appendix D: Data Validation

Data reported by ESC Lab Sciences in Mount Juliet, Tennessee for the groundwater samples collected in April 2018 and data reported by Pace Analytical (formerly known as ESC Lab Sciences) in Mount Juliet, Tennessee for the groundwater samples collected in October 2018 were reviewed to ensure that reporting analytical results met the data quality requirements contained in the United States Environmental Protection Agency (USEPA) *National Functional Guidelines for Organic Superfund Methods Data Review* (USEPA, January 2017), *National Functional Guidelines for Inorganic Superfund Methods Data Review* (USEPA, January 2017), and the individual methods, as applicable. Quality control (QC) data indicate that measurement data are sufficient to meet method quality objectives, reported data are defensible, and QC mechanisms were generally effective in ensuring measurement data reliability within the expected limits of sampling and analytical error with the following exceptions.

The nondetect results for nitrate-nitrite in samples MW-59, MW-60, MW-105, RW-2, MW-61, MW-62, MW-93, MW-43, MW-137, RW-10, MW-40, and RW-9, all collected in April 2018, should be rejected due to significantly low recoveries in the matrix spike and/or matrix spike duplicate analyses. These results are not usable for decision-making purposes.

The following sections discuss the QC issues identified during the data review for each of the data reports listed below.

April 2018 Data Packages	October 2018 Data Packages
L982870	L1031727
L982876	L1031728
L983352	L1031729
L983354	L1031730
L983360	L1031734
L983365	L1032119
L983397	L1032127
L983825	L1032139
L983842	L1032143
L983849	L1032152
L983855	
L983865	

Please note the following:

Due to limitations of the laboratory's software, QC batch information (i.e., method blanks and laboratory control samples [LCSs]) associated with volatile organic compound (VOC) analyses from select April 2018 data packages were only reported with the original analysis even if samples were reanalyzed on an additional date. Therefore, accuracy and precision for VOC results were only evaluated from the QC batch associated with the original date of analysis, where applicable. This issue was resolved for the October 2018 data packages.

Analytes that were detected in the both the associated blank and sample were evaluated as follows: Corresponding samples at concentrations within five times the maximum blank concentration for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes may include measurement contributions from the laboratory (for method blanks) and/or field (for equipment and trip blanks).

The following criteria were used in evaluation of the field duplicates: When both results are ≥ five times the reporting limit (RL), relative percent differences (RPDs) must be <30%. When one or both results are < five times the RL, the absolute difference must be < the RL.

The following criteria were used in evaluation of laboratory duplicates: When both results are ≥ five times the RL, RPDs must be <20%.

Lab Report L982870

Sample identifiers cross-referenced to laboratory identifications are presented below.

Sample ID	Lab ID
L982870-01	MW-125
L982870-02	MW-116
L982870-03	UG-2
L982870-04	UG-3R
L982870-05	UG-1
L982870-06	UG-4

Data Review Checklist	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X*		
Any detection in trip blanks?			X
Any LCS or LCS duplicates (LCSD) percent recoveries (%R) out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any matrix spike (MS) or MS duplicate (MSD) %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Laboratory Method Blanks

The following analytes were detected in the method blanks: cyanide, chloride, total mercury, dissolved iron, total and dissolved vanadium, total arsenic, and total chromium. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Cyanide: UG-1
- Total mercury: UG-1, UG-2, and UG-4
- Dissolved iron: UG-3R

Equipment Blanks

*Although an equipment blank was not submitted in this laboratory report, the equipment blank submitted with laboratory report L983365 was evaluated with the samples in this laboratory report (L982870) since they were collected on 4/2/18 and 4/3/18 and were from a similar location at the site. The following analytes were detected in the equipment blank submitted with the data set in laboratory report L983365, EB-REST-02: TPH (GC/FID) high fraction, total barium, total and dissolved manganese, total and dissolved chromium, total potassium, total sodium, total calcium, chloride, and sulfate. The analytes listed below were detected in the corresponding samples at concentrations within five times the maximum equipment blank concentration for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes. Therefore, these samples may include measurement contributions from the field.

- TPH (GC/FID) high fraction: UG-1
- Dissolved chromium: UG-3R, UG-1
- Total manganese: UG-3R, UG-1, UG-4
- Dissolved manganese: UG-3R, UG-1

MS/MSDs

MS/MSD analyses were performed on the following samples:

- UG-2: Dissolved mercury
- UG-4: Dissolved boron, TPH low fraction
- MW-125: Dissolved chromium, total and dissolved metals

Recoveries were outside of the acceptance limits for total calcium and total sodium in the MS and MSD performed on sample MW-125. However, the concentrations of these analytes in the unspiked sample were greater than four times the spiked concentrations; thus, the recoveries of total calcium and total sodium were not used to evaluate potential matrix effects.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- UG-3R, MW-125: Dissolved solids

The RPD (7.4%) for dissolved solids in the duplicate analysis performed on sample MW-125 (QC batch WG1095025) exceeded the laboratory-defined control limit (5%). However, this RPD value was less than the acceptance criteria used in this evaluation (20%); thus precision was deemed acceptable and no data interpretation issues were noted.

Lab Report L982876

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L982876-01	MW-46R
L982876-02	TRIP BLANK-TMD-01

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?		X	
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?			X
Any detection in trip blanks?	X		
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?		X	
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?			X
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Standard Conditions

A collection date was not listed on the chain of custody (COC) for trip blank TRIP BLANK-TMD-01. The laboratory logged this sample in with a collection date of April 3, 2018.

Laboratory Method Blanks

The following analytes were detected in the method blanks: chloride, dissolved iron, total arsenic, and total chromium. The result for dissolved iron in sample MW-46R was less than five times the associated method blank concentration. Therefore, this result may include measurement contributions from laboratory sources.

Trip Blanks

The following analytes were detected in the trip blank sample, TRIP BLANK-TMD-01: toluene, o-xylene, m&p-xylene, and total xylenes. There were no data interpretation issues since these analytes were not detected in the associated samples.

MS/MSDs

MS/MSD analyses were performed on sample MW-46R dissolved chromium. No issues were noted.

Lab Report L983352

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983352-01	TEL-4
L983352-02	TEL-3
L983352-03	TEL-2
L983352-04	TEL-1
L983352-05	DUP-TEL-01*
L983352-06	EB-TEL-01
L983352-07	TRIP BLANK-TEL-01

*Duplicate of location TEL-4

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?		X	
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?	X		
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?		X	
Any field duplicate data additionally flagged as estimated?		X	
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the nitrate-nitrite analyses of samples TEL-2 and TEL-3 were diluted 5-fold due to sulfide interference. Therefore, the RLs for nitrate-nitrite in these samples were elevated accordingly.

Holding Times

The dissolved solids analysis for sample EB-TEL-01 was analyzed two days passed the seven day holding time; thus, the dissolved solids result in this sample may be biased low.

Laboratory Duplicates

Laboratory duplicate analysis was performed on sample TEL-4 for nitrate-nitrite. All criteria were met.

Laboratory Method Blanks

The following analytes were detected in the method blanks: chloride, sulfate, total sodium, total potassium, and dissolved lead. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Total potassium: TEL-4, TEL-1, DUP-TEL-1, EB-TEL-1
- Dissolved lead: TEL-2

Equipment Blanks

The following analytes were detected in the equipment blank sample, EB-TEL-01: dissolved solids, TPH (GC/FID) high fraction, nitrate-nitrite, total arsenic, total calcium, total sodium, total barium, dissolved barium, dissolved chromium, dissolved iron, total potassium, chloride, and sulfate. The analytes listed below were detected in the corresponding samples at concentrations within five times the equipment blank concentrations. Therefore, these samples may include measurement contributions from the field.

- Nitrate-Nitrite: TEL-4, DUP-TEL-1
- Dissolved chromium: TEL-1, TEL-2
- Dissolved iron: TEL-1, TEL-3

Note that the result for total potassium in this equipment blank was less than five times the concentration detected in the associated method blank; therefore, the result for total potassium in this equipment blank was probably the result of laboratory method blank contamination and did not affect any associated field samples.

Trip Blanks

Acetone was detected in the trip blank sample, TRIP BLANK-TEL-01. There were no data interpretation issues since acetone was not detected in the associated samples.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- TEL-1: Nitrate-nitrite
- EB-TEL-01: Select total and dissolved metals
- TEL-2: Select dissolved metals

The recovery (78.5%) of nitrate-nitrite in the MS performed on sample TEL-1 (QC batch WG1094862) was below the laboratory-defined recovery limits (90-110%); thus, the positive and nondetect results for nitrate-nitrite in all samples in this QC batch, TEL-4, TEL-2, TEL-3, TEL-4, EB-TEL-01, and DUP-TEL-01, may be biased low.

Lab Report L983354

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983354-01	MW-54A
L983354-02	NCL-49
L983354-03	MW-53
L983354-04	DUP-NCL-01
L983354-05	TRIP BLANK-NCL-01

*DUP-NCL-01 is a field duplicate of location NCL-49

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?			X
Any detection in trip blanks?	X		
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?	X		
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?		X	
Any field duplicate data additionally flagged as estimated?		X	
Any analyte analyzed by a nonequivalent method than planned?		X	

Trip Blanks

Acetone and toluene were detected in the trip blank, TRIP BLANK-NCL-01. There were no data interpretation issues since acetone and toluene were not detected in the associated samples.

Laboratory Method Blanks

The following analytes were detected in the method blanks: total sodium and total potassium. Total potassium was detected in sample MW-54A at a concentration less than five times the associated method blank concentration. Therefore, this result may include measurement contributions from laboratory sources.

LCS/LCSDs

The LCS/LCSD RPD and LCSD recovery were above the laboratory-defined limits for total chromium in QC batch WG1094256. The positive result for total chromium in samples NCL-49 and MW-53 may be considered estimated; however, these results were also qualified by the laboratory as estimated (J) since the results were between the method detection limit (MDL) and RL, therefore, no further interpretation was required.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- MW-53: Nitrate-nitrite
- MW-54A: Select total and dissolved metals

The recovery (79%) of nitrate-nitrite in the MS performed on sample MW-53 (QC batch WG1094866) was below the laboratory-defined recovery limits (90-110%); thus, the positive and nondetect results for nitrate-nitrite in all samples in this QC batch, MW-54A, NCL-49, MW-53, and DUP-NCL-01, may be biased low.

Recoveries were outside of the acceptance limits for total calcium in the MS and MSD performed on sample MW-54A. However, the concentration of total calcium in the unspiked sample was greater than four times the concentration spiked; thus, the recoveries of total calcium were not used to evaluate potential matrix effects.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples. No issues were noted.

- NCL-49: Dissolved solids
- MW-54A: Nitrate-nitrite

Lab Report L983360

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983360-01	MW-68
L983360-02	MW-27
L983360-03	MW-89
L983360-04	MW-16
L983360-05	MW-26

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?			X
Any detection in trip blanks?			X
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?	X		
Any MS/MSD %R outside of laboratory defined limits?		X	
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?		X	
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Laboratory Method Blanks

The following analytes were detected in the method blanks: total sodium, total and dissolved chromium, total potassium, and dissolved iron. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Dissolved iron: MW-68, MW-27, MW-89
- Dissolved chromium: MW-89
- Total chromium: MW-68, MW-27

LCS/LCSDs

The LCS/LCSD RPD and LCSD recovery were above the laboratory-defined limits for total chromium in QC batch WG1094256. The positive result for total chromium in sample MW-89 may be considered estimated; however, this result was already qualified by the laboratory as estimated (J) since the result was between the MDL and RL, therefore, no further interpretation was required.

MS/MSDs

MS/MSD analyses were performed sample MW-68 for dissolved metals. No issues were noted.

Laboratory Duplicates

Laboratory duplicate analysis was performed on sample MW-68 for dissolved solids. No issues were noted.

Lab Report L983365

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983365-01	RA-4798
L983365-02	RA-4196
L983365-03	MW-135
L983365-04	KWB-11A
L983365-05	KWB-11B
L983365-06	MW-136
L983365-07	MW-126A
L983365-08	MW-126B
L983365-09	MW-127
L983365-10	MW-129
L983365-11	RW-#18A
L983365-12	KWB-1A
L983365-13	KWB-10R
L983365-14	MW-58
L983365-15	KWB-13
L983365-16	MW-103
L983365-17	MW-104
L983365-18	MW-64
L983365-19	MW-65
L983365-20	MW-102
L983365-21	MW-98
L983365-22	MW-106
L983365-23	MW-50
L983365-24	RW-1
L983365-25	MW-91
L983365-26	MW-90
L983365-27	MW-96
L983365-28	MW-67
L983365-29	RW-#17A
L983365-30	DUP-REST-02*
L983365-31	EB-REST-02

*Duplicate of location MW-104

Lab Report L983365 Continued

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?		X	
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?			X
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?	X		
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?	X		
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?		X	
Any analyte analyzed by a nonequivalent method than planned?		X	

Standard Conditions

The laboratory noted on the COC that the dissolved metals bottles for all samples in this laboratory report were preserved by the laboratory. Almost all dissolved metals preparations were performed more than 24 hours after the samples were preserved by the laboratory with a few exceptions. The dissolved mercury aliquots in the samples noted below were prepared less than 24 hours after preservation was completed by the laboratory. Therefore, the positive and nondetect results for dissolved mercury in the samples noted below may be biased low.

- KWB-11A, KWB-11B, MW-136, KWB-1A, MW-58, KWB-13, MW-67

Other

The laboratory noted that the nitrate-nitrite analyses of the following samples were diluted due to sulfide interference. Therefore, the RLs for nitrate-nitrite in these samples were elevated accordingly.

- RW-1, MW-91, MW-96, MW-106, and MW-98: diluted 100-fold
- MW-90 and MW-67: diluted 10-fold
- MW-102 and MW-64: diluted 50-fold
- MW-103 and MW-104: diluted 20-fold
- MW-127, DUP-REST-02, MW-58, and MW-65: diluted 5-fold

The laboratory noted that the cyanide analysis of the sample MW-67 was diluted 100-fold due to high sulfide content. Therefore, the RL for cyanide in this sample was elevated accordingly.

Lab Report L983365 Continued

Laboratory Method Blanks

The following analytes were detected in the method blanks: chloride, sulfate, total sodium, total and dissolved mercury, total chromium, total calcium, total potassium, and total and dissolved iron. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Chloride: EB-REST-02
- Sulfate: EB-REST-02
- Total sodium: EB-REST-02
- Total potassium: MW-98, MW-91, MW-67, EB-REST-02
- Total mercury: KWB-11B, MW-136, KWB-13
- Dissolved mercury: KWB-13
- Total iron: MW-136, MW-127, MW-103, MW-64
- Dissolved iron: MW-135, MW-127, KWB-1A, MW-104, MW-98, MW-106
- Total chromium: MW-104, DUP-REST-02

Equipment Blanks

The following analytes were detected in the equipment blank submitted with this data set, EB-REST-02: TPH (GC/FID) high fraction, total barium, total and dissolved manganese, total and dissolved chromium, total potassium, total sodium, total calcium, chloride, and sulfate. The analytes listed below were detected in the corresponding samples at concentrations within five times the maximum equipment blank concentration for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes. Therefore, these samples may include measurement contributions from the field.

- TPH (GC/FID) high fraction: MW-135, KWB-11B, MW-136, MW-126B, KWB-1A, KWB-13, MW-125, MW-116
- Total chromium: MW-135, MW-136, MW-127, KWB-13, MW-104, MW-102, MW-98, MW-106, RW-1, MW-96, MW-67, DUP-REST-02
- Dissolved chromium: MW-135, KWB-11A, MW-136, MW-126A, MW-126B, KWB-1A, KWB-10R, MW-103, MW-104, MW-65, MW-102, MW-106, RW-1, MW-91, MW-67, RW-#17A, DUP-REST-02
- Total manganese: KWB-11B, RW-#18A, MW-103, MW-91, MW-96
- Dissolved manganese: MW-135, MW-103, MW-91, MW-96, UG-3R

Note that the results for chloride, sulfate, total potassium, and total sodium in this equipment blank were less than five times the concentrations detected in the associated method blank and were probably the result of laboratory method blank contamination; therefore, these equipment blank results did not affect any associated field samples.

Lab Report L983365 Continued

LCS/LCSDs

The recovery (138%) of total chromium in the LCSD and the LCS/LCSD RPD were above the laboratory-defined limits (20-120%) in QC batch WG1094256. Total chromium was detected in samples MW-98, MW-106, RW-1, MW-96, MW-67, and EB-REST-02 in this QC batch; therefore, the positive results for chromium in these sample may be estimated. No data interpretation issues were noted with nondetect results.

Surrogates

One surrogate, 4-bromofluorobenzene, recovered y above the laboratory control limits (20-120%) in the VOC analyses of samples DUP-REST-02 (121%) and EB-REST-02 (122%). The positive results for the detected VOCs in sample DUP-REST-02 may be biased high. No data interpretation issues were noted in sample EB-REST-02 since all VOC results were nondetect.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- RA-4196, MW-102, EB-REST-02: Nitrate-nitrite
- MW-50: Fluoride
- EB-REST-02: Chloride, fluoride, sulfate, total chromium, total potassium
- KWB-11B: Dissolved mercury
- MW-135: Dissolved metals
- RA-4798: Total metals

The recoveries of nitrate-nitrite in the MS and MSD performed on sample MW-102 (QC batch WG1094863) were above the laboratory-defined recovery limits. However, the laboratory noted that the sample was diluted 50-fold due to sulfide interference. Since the result for nitrate-nitrite in the unspiked sample was nondetect, no data interpretation issues were noted.

The recoveries (84.9%/85%) of nitrate-nitrite in the MS and MSD performed on sample EB-REST-02 (QC batch WG1094866) were below the laboratory-defined recovery limits (90-110%); thus, the nondetect result for nitrate-nitrite sample EB-REST-02 may be biased low. Note that groundwater results were not impacted by equipment blank MS/MSD recoveries.

Recoveries were outside of the acceptance limits for total calcium in the MS and MSD performed on sample RA-4798. However, the concentration of total calcium in the unspiked sample was greater than four times the concentration spiked; thus, the recoveries of total calcium were not used to evaluate potential matrix effects.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- KWB-13, MW-91: Dissolved solids
- RA-4798, MW-65, DUP-REST-02: Nitrate-nitrite
- MW-58: Cyanide
- MW-98, MW-50: Chloride, fluoride
- EB-REST-02: Chloride, fluoride, sulfate

The RPD (8.6%) for dissolved solids in the duplicate analysis performed on sample MW-91 (QC batch WG1095031) exceeded the laboratory-defined control limit (5%). However, this RPD value was less than the acceptance criteria used in this evaluation (20%); thus precision was deemed acceptable and no data interpretation issues were noted.

The RPDs for chloride and sulfate in the duplicate analysis performed on sample EB-REST-02 (QC batch WG1094674) exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for these analytes since the sample and duplicate concentrations were less than five times the RL.

Lab Report L983397

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983397-01	MW-77
L983397-02	MW-75
L983397-03	MW-88
L983397-04	MW-22A
L983397-05	MW-10
L983397-06	MW-123
L983397-07	MW-4A
L983397-08	MW-5A
L983397-09	MW-7A
L983397-10	OCD-8A
L983397-11	DUP-EP-01*
L983397-12	DUP-EP-02**
L983397-13	EB-EP-03
L983397-14	TRIP BLANK-EP-02

*Duplicate of location MW-7A

**Duplicate of location MW-22A

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?		X	
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?	X		
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?	X		
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the VOC analysis of sample MW-77 was diluted 10-fold due to sample foaming. Therefore, the sample RLs for VOCs were elevated accordingly.

Lab Report L983397 Continued

Standard Conditions

The laboratory noted on the COC that the dissolved metals bottles for all samples in this laboratory report were preserved by the laboratory. Most dissolved metals preparations were performed less than 24 hours after the samples were preserved by the laboratory. Therefore, the positive and nondetect results for all dissolved metals in the samples in this laboratory report, with the exceptions noted below, may be biased low. The samples noted below were analyzed more than 24 hours after preservation was completed by the laboratory; therefore, no data interpretation issues were noted.

- MW-75: Dissolved chromium, lead, arsenic, barium, iron, manganese and selenium
- OCD-8A: Dissolved boron

Laboratory Method Blanks

The following analytes were detected in the method blanks: chloride, sulfate, dissolved mercury, total potassium, and dissolved lead. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Sulfate: EB-EP-03
- Chloride: EB-EP-03
- Dissolved lead: MW-75

Equipment Blanks

The following analytes were detected in the equipment blank, EB-EP-03: Dissolved solids, TPH (GC/FID) low and high fraction, nitrate-nitrite, chloride, sulfate, total arsenic, total calcium, total and dissolved chromium, total iron, total and dissolved manganese, and total sodium. The analytes listed below were detected in the corresponding samples at concentrations within five times the equipment blank concentrations for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes. Therefore, these samples may include measurement contributions from the field.

- TPH (GC/FID) low fraction: MW-88, MW-75, MW-77
- Nitrate-nitrite: MW-77, MW-75, MW-88, MW-22A, MW-10, MW-123, MW-4A, MW-5A, MW-7A, OCD-8A, DUP-EP-01, DUP-EP-02
- Total iron: MW-88, MW-123
- Total chromium: MW-77, MW-75, MW-88, MW-22A, MW-10, MW-4A, MW-7A, DUP-EP-01
- Dissolved chromium: MW-75, MW-10

Note that the results for chloride and sulfate in this equipment blank were less than five times the concentration detected in the associated method blank; therefore, the results for chloride and sulfate in this equipment blank were probably the result of laboratory method blank contamination and did not affect any associated field samples.

Lab Report L983397 Continued

Trip Blanks

Acetone and toluene were detected in the trip blank, TRIP BLANK-EP-02. There were no data interpretation issues since acetone and toluene were not detected in the associated samples.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- MW-75, EB-EP-03: Nitrate-nitrite
- OCD-8A: Cyanide
- EB-EB-03: Fluoride
- MW-88: Total metals

The recoveries of nitrate-nitrite in the MS (83.2%) performed on sample MW-75 and the MS and MSD (86%/87.2%) performed on sample EB-EP-03 (QC batch WG1095630) were below the laboratory-defined recovery limits (90-110%); thus, the positive and nondetect results for nitrate-nitrite in all samples in this lab report may be biased low.

Recoveries were outside of the acceptance limits for total calcium, total manganese, and total sodium in the MS and/or MSD performed on sample MW-88. Since the concentrations of these analytes in the unspiked sample were greater than four times the concentrations spiked, the recoveries of these analytes were not used to evaluate potential matrix effects.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-22A, DUP-EP-02: Dissolved solids
- MW-77, DUP-EP-02: Nitrate-nitrite
- EB-EB-03: Chloride, fluoride, sulfate

The RPDs (8.58%/5.41%) for dissolved solids in the duplicate analyses performed on sample MW-22A (QC batch WG1095810) and DUP-EP-02 (QC batch WG1095812) exceeded the laboratory-defined control limit (5%). However, these RPD values were less than the acceptance criteria used in this evaluation (20%); thus precision was deemed acceptable and no data interpretation issues were noted.

The RPDs for chloride and sulfate in the duplicate analysis performed on sample EB-EB-03 (QC batch WG1094675) exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for these analytes since the sample and duplicate concentrations were less than five times the RL.

Lab Report L983397 Continued

Field Duplicates

The calculated RPD for total chromium (98.1%) in the field duplicate pair, MW-7A and DUP-EP-01, did not meet control limits (<30%). Therefore, the positive results for total chromium in samples MW-7A and DUP-EP-01 may be considered estimated.

Lab Report L983825

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983825-01	MW-6A
L983825-02	MW-120
L983825-03	MW-121
L983825-04	MW-84
L983825-05	MW-122
L983825-06	MW-81
L983825-07	MW-80
L983825-08	MW-79
L983825-09	MW-82
L983825-10	MW-74
L983825-11	MW-73
L983825-12	MW-2A
L983825-13	MW-72
L983825-14	OCD-6
L983825-15	OCD-7AR
L983825-16	MW-76
L983825-17	MW-78
L983825-18	MW-83
L983825-19	MW-3
L983825-20	MW-1R
L983825-21	MW-15
L983825-22	OCD-1R
L983825-23	OCD-2A
L983825-24	OCD-3
L983825-25	OCD-4
L983825-26	MW-11A
L983825-27	OCD-5
L983825-28	MW-87
L983825-29	MW-18A
L983825-30	MW-70
L983825-31	MW-124
L983825-32	DUP-EP-03*
L983825-33	EB-EP-01
L983825-34	EB-EP-02
L983825-35	EB-EP-04
L983825-36	TRIP BLANK-EP-01
L983825-37	TRIP BLANK-EP-03

*DUP-EP-03 is a field duplicate of location MW-3

Lab Report L983825 Continued

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?	X		
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?	X		
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?		X	
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the TPH (GC/FID) low fraction analysis of sample MW-78 was performed at a 10-fold dilution due to sample foaming. Therefore, the RL for TPH (GC/FID) low fraction was elevated accordingly.

Laboratory Method Blanks

The following analytes were detected in the method blanks: chloride, sulfate, total boron, total and dissolved chromium, total and dissolved iron, total manganese, total sodium, total calcium, and total lead. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Total chromium: MW-6A, MW-84, MW-122, MW-81, MW-80, MW-79, MW-82, MW-74, MW-73, MW-2A, MW-72, OCD-7AR, MW-76, MW-83, MW-3
- Dissolved chromium: MW-11A, MW-87, MW-124, EB-EP-04
- Total iron: MW-80, MW-79, MW-82, MW-74, MW-78
- Dissolved iron: OCD-1R, MW-18A, EB-EP-01
- Total lead: MW-15, OCD-3, MW-11A, MW-87, MW-70, DUP-EP-03
- Total calcium: EB-EP-02, EB-EP-04
- Chloride: EB-EP-04
- Sulfate: EB-EP-04

Lab Report L983825 Continued

Equipment Blanks

The following analytes were detected in the equipment blanks submitted with this data set:

- EB-EP-01: TPH (GC/FID) high fraction, nitrate-nitrite, total and dissolved manganese, total and dissolved chromium, total potassium, total sodium, total calcium, dissolved iron, dissolved solids, and dissolved lead.
- EB-EP-02: Nitrate-nitrite, total and dissolved manganese, total sodium, total calcium, sulfate, and chloride.
- EB-EP-04: Dissolved solids, nitrate-nitrite, total and dissolved manganese, dissolved chromium, total sodium, total calcium, sulfate, and chloride.

The analytes listed below were detected in the corresponding samples at concentrations within five times the maximum equipment blank concentration for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes. Therefore, these samples may include measurement contributions from the field.

- TPH (GC/FID) high fraction: MW-122, MW-80, MW-2A, MW-1R, OCD-1R, OCD-2A, OCD-3, OCD-4, OCD-5, MW-87, MW-124
- Nitrate-nitrite: MW-6A, MW-120, MW-84, MW-122, MW-80, MW-73, MW-2A, OCD-7AR, MW-76, MW-83, MW-3, MW-1R, OCD-1R, OCD-2A, OCD-3, OCD-4, MW-11A, OCD-5, MW-87, MW-18A, MW-70, DUP-EP-03
- Dissolved lead: MW-6A, MW-120, MW-84, OCD-7AR, MW-78, MW-83, MW-3, MW-1R, MW-15, DUP-EP-03
- Total chromium: MW-6A, MW-84, MW-122, MW-80, MW-81, MW-79, MW-82, MW-74, MW-73, MW-72, MW-2A, OCD-7AR, MW-76, MW-3, OCD-1R, OCD-4, MW-11A, MW-18A, DUP-EP-03
- Dissolved chromium: MW-6A, MW-84, MW-81, MW-79, MW-82, MW-74, MW-73, MW-72, OCD-6, OCD-7AR, MW-76, MW-83, MW-11A, MW-87, MW-124

Note that the results for dissolved iron in EB-EP-01, total calcium in EB-EP-02, and chloride, sulfate, total calcium, and dissolved chromium in EB-EP-04 were less than five times the concentrations detected in the associated method blanks and were probably the result of laboratory method blank contamination; therefore, these equipment blank results did not affect any associated field samples.

Trip Blanks

Toluene was detected in TRIP BLANK-EP-01 and 2-butanone and toluene were detected in TRIP BLANK-EP-03. There were no data interpretation issues since 2-butanone and toluene were not detected in the associated samples.

LCS/LCSDs

The recoveries (155%/156%) of chloroethane in the LCS and/or LCSD in QC batches WG1095135 and WG1095144 were above the laboratory-defined recovery limits (47-152%). No data interpretation issues were noted since chloroethane was nondetect in the associated samples.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- MW-121, OCD-1R: Nitrate-nitrite
- MW-83, MW-15: Fluoride
- EB-EP-01: Chloride, fluoride, sulfate
- MW-18A: Dissolved mercury
- MW-1R: Total and dissolved metals
- MW-82: Total chromium

The recovery (88.2%) of nitrate-nitrite in the MS performed on sample MW-121 (QC batch WG1096180) was below the laboratory-defined recovery limits (90-110%); therefore, the positive and nondetect results for nitrate-nitrite in all samples in this QC batch, MW-120, MW-121, MW-84, MW-122, MW-81, MW-80, MW-79, MW-82, MW-74, MW-73, MW-2A, MW-72, OCD-6, OCD-7AR, MW-76, MW-78, MW-83, MW-3, and MW-1R, may be biased low.

The recovery (181%) of fluoride in the MS performed on sample MW-15 (QC batch WG1094924) was above the laboratory-defined recovery limits (80-120%); therefore, the positive results for fluoride in all samples in this QC batch, MW-120, MW-121, MW-84, MW-122, MW-81, MW-80, MW-79, MW-82, MW-74, MW-73, MW-2A, MW-72, OCD-6, OCD-7AR, MW-76, MW-78, MW-15, MW-3, and MW-1R, with the exception of MW-83 since the recoveries of fluoride were acceptable in the MS/MSD analyses performed on this sample, may be biased high.

The recoveries of dissolved manganese, total calcium, and total sodium were outside of the acceptance limits in the MS and MSD performed on sample MW-1R. However, the concentrations of dissolved manganese, total calcium, and total sodium in the unspiked sample were greater than four times the concentrations spiked; thus, the recoveries of these analytes were not used to evaluate potential matrix effects.

Surrogate Recoveries

One surrogate, 4-bromoflurobenzene, recovered (746%) above the laboratory control limits (80-120%) in the VOC analysis of sample MW-74. The positive results for the detected VOCs in sample MW-74 may be biased high. However, since the detected VOCs in this sample were also qualified by the laboratory as estimated since results were between the MDL and RL, no further data interpretation was required.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-80, MW-79, MW-3: Dissolved solids
- MW-120, MW-1R, MW-15, MW-6A: Nitrate-nitrite
- MW-83, MW-15, EB-EP-01: Fluoride, chloride, sulfate

The RPDs (7.2%/6.98%) for dissolved solids in the duplicate analyses performed on samples MW-88 (QC batch WG1096148) and MW-79 (QC batch WG1096149) exceeded the laboratory-defined control limit (5%). However, these RPD values were less than the acceptance criteria used in this evaluation (20%); thus precision was deemed acceptable and no data interpretation issues were noted.

The RPDs for chloride (21.1%) and sulfate (21.6%) in the duplicate analysis performed on sample MW-83 (QC batch WG1094924) exceeded the laboratory-defined control limits (15%). However, no data interpretation issues were noted for sulfate since the sample concentration was less than five times the RL. The results for chloride in the samples in this QC batch, MW-120, MW-121, MW-84, MW-122, MW-81, MW-80, MW-79, MW-82, MW-74, MW-73, MW-2A, MW-72, OCD-6, OCD-7AR, MW-76, MW-78, MW-83, MW-3, and MW-1R, with the exception of MW-15, may be considered estimated.

Lab Report L983842

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983842-01	MW-49

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?			X
Any detection in trip blanks?			X
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?			X
Any MS/MSD RPD above laboratory defined limits?			X
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?		X	
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the nitrate-nitrite analysis of sample MW-49 was diluted 50-fold due to sulfide intereference. Therefore, the RL for nitrate-nitrite in this sample was elevated accordingly.

Laboratory Method Blanks

The following analytes were detected in the method blanks: total boron, total calcium, total lead, dissolved chromium, and dissolved iron. The results for total lead, dissolved iron, and dissolved chromium were detected in sample MW-49 at concentrations less than five times the associated method blank concentrations. Therefore, these results may include measurement contributions from laboratory sources.

Laboratory Duplicates

Laboratory duplicate analysis was performed on sample MW-49 for nitrate-nitrite. No issues were noted.

Lab Report L983849

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983849-01	MW-25
L983849-02	MW-20
L983849-03	NP-1
L983849-04	MW-8
L983849-05	MW-21
L983849-06	MW-71
L983849-07	TRIP BLANK-TMD-01

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?			X
Any detection in trip blanks?		X	
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?	X		
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Laboratory Method Blanks

The following analytes were detected in the method blanks: chloride, sulfate, total boron, dissolved chromium, and dissolved iron. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Dissolved chromium: MW-8, MW-21
- Dissolved lead: MW-8

Lab Report L983849 Continued

MS/MSDs

MS/MSD analyses were performed on sample MW-25 for select total metals. Recoveries and/or RPDs were outside of the acceptance limits for total calcium, total manganese, and total sodium in the MS and/or MSD performed on sample MW-25. However, the concentrations of these analytes in the unspiked sample were greater than four times the concentrations spiked; thus, the recoveries of these analytes were not used to evaluate potential matrix effects.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-20, NP-1: Dissolved solids
- MW-25: Nitrate-nitrite

The RPD (7.97%) for dissolved solids in the duplicate analysis performed on sample MW-20 (QC batch WG1096152) exceeded the laboratory-defined control limit (5%). However, this RPD value was less than the acceptance criteria used in this evaluation (20%); thus precision was deemed acceptable and no data interpretation issues were noted.

Lab Report L983855

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983855-01	MW-56
L983855-02	MW-45
L983855-03	NCL-34A
L983855-04	NCL-33
L983855-05	NCL-44
L983855-06	NCL-32
L983855-07	MW-108
L983855-08	NCL-31
L983855-09	MW-55
L983855-10	MW-18
L983855-11	EB-NCL-01

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?			X
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?	X		
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the nitrate-nitrite analyses of samples NCL-34A and MW-108 were diluted 10-fold and 20-fold, respectively, due to sulfide intereference. Therefore, the RLs for nitrate-nitrite in these samples were elevated accordingly.

Laboratory Method Blanks

The following analytes were detected in the method blanks: dissolved solids, chloride, sulfate, dissolved iron, and dissolved chromium. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Chloride: EB-NCL-01
- Dissolved solids: EB-NCL-01
- Dissolved chromium: MW-56, NCL-32, NCL-31, EB-NCL-01
- Dissolved iron: NCL-32, MW-108, MW-18, EB-NCL-01

Equipment Blanks

The following analytes were detected in the equipment blank, EB-NCL-01: dissolved solids, chloride, sulfate, total arsenic, total calcium, total and dissolved chromium, dissolved iron, total and dissolved manganese, total potassium, and total sodium. The analytes listed below were detected in samples at concentrations less than five times the associated equipment blank concentration. Therefore, they may include measurement contributions from the field. Note that samples from laboratory report L983354 were also included in the evaluation of this equipment blank since they were collected from a similar area of the site.

- Total arsenic: MW-54A, NCL-34A, NCL-33, NCL-32, MW-108, MW-18
- Total chromium: NCL-44, NCL-32, MW-108, NCL-31, MW-55, MW-18

Note that the results for dissolved chromium, dissolved iron, dissolved solids, and chloride in this equipment blank were less than five times the concentrations detected in the associated method blank; therefore, the results for these analytes in this equipment blank were probably the result of laboratory method blank contamination and did not affect any associated field samples.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- NCL-44, NCL-32: Nitrate-nitrite
- EB-NCL-01: Fluoride, dissolved metals
- MW-45: Boron

The recovery (72.2%) of nitrate-nitrite in the MS performed on sample NCL-44 (QC batch WG1096182) was below the laboratory-defined recovery limits (90-110%) and the RPD (22.1%) for nitrate-nitrite was above the laboratory-defined control limit (20%) in the MS/MSD analyses of this sample. Therefore, the positive and nondetect results for nitrate-nitrite in the samples in this QC batch, MW-56, MW-45, NCL-34A, NCL-33, and NCL-44, may be considered estimated.

MS/MSDs, continued

The recovery (79.3%) of nitrate-nitrite in the MS performed on sample NCL-32 (QC batch WG1096185) was below the laboratory-defined recovery limits (90-110%). Therefore, the positive and nondetect results for nitrate-nitrite in the samples in this QC batch, NCL-32, MW-108, NCL-31, MW-55, MW-18, and EB-NCL-01, may be biased low.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-108: Dissolved solids
- NCL-33: Nitrate-nitrite
- EB-NCL-01: Chloride, fluoride, sulfate

The RPD (18.2%) for dissolved solids in the duplicate analysis performed on sample MW-108 (QC batch WG1096155) exceeded the laboratory-defined control limit (5%). However, this RPD value was less than the acceptance criteria used in this evaluation (20%); thus precision was deemed acceptable and no data interpretation issues were noted.

The RPDs for chloride and sulfate in the duplicate analysis performed on sample EB-NCL-01 (QC batch WG1095122) exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for these analytes since the sample and duplicate concentrations were less than five times the RL.

Lab Report L983865

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L983865-01	RW-#15C
L983865-02	MW-48
L983865-03	MW-130
L983865-04	MW-52
L983865-05	MW-109
L983865-06	MW-110
L983865-07	RW-12R
L983865-08	MW-113
L983865-09	RW-13R
L983865-10	MW-134
L983865-11	RA-3156
L983865-12	RA-313
L983865-13	MW-115
L983865-14	MW-114
L983865-15	MW-117
L983865-16	MW-118
L983865-17	MW-119
L983865-18	KWB-5
L983865-19	MW-111
L983865-20	KWB-6
L983865-21	MW-57
L983865-22	KWB-12B
L983865-23	RW-4
L983865-24	RW-6
L983865-25	MW-99
L983865-26	MW-66
L983865-27	MW-28
L983865-28	MW-59
L983865-29	MW-60
L983865-30	MW-107
L983865-31	MW-128
L983865-32	MW-101
L983865-33	MW-105
L983865-34	RW-2
L983865-35	MW-61
L983865-36	MW-62
L983865-37	MW-93
L983865-38	MW-43
L983865-39	MW-137
L983865-40	MW-138
L983865-41	MW-23

Lab Report L983865 Continued

Lab ID	Sample ID
L983865-42	MW-39
L983865-43	RW-10
L983865-44	MW-40
L983865-45	MW-41
L983865-46	RW-9
L983865-47	MW-42
L983865-48	MW-29
L983865-49	RW-#16B
L983865-50	MW-95
L983865-51	RW-7
L983865-52	DUP-REST-01*
L983865-53	DUP-REST-03**
L983865-54	DUP-REST-04***
L983865-55	DUP-REST-05****
L983865-56	EB-REST-01
L983865-57	EB-REST-03
L983865-58	EB-REST-04
L983865-59	EB-REST-05

* DUP-REST-01 is a field duplicate of location MW-113

** DUP-REST-03 is a field duplicate of location MW-134

*** DUP-REST-04 is a field duplicate of location MW-60

**** DUP-REST-05 is a field duplicate of location KWB-12B

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?		X	
All samples within holding times?			
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?		X	
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?	X		
Any surrogate %R outside of laboratory defined limits?	X		
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?	X		
Any analyte analyzed by a nonequivalent method than planned?		X	

Lab Report L983865 Continued

Standard Conditions

The laboratory noted that the pH for the TPH (GC/FID) low fraction analyses of the following samples was outside of the method requirement (pH<2): MW-48, MW-109, MW-115, MW-114, MW-60, MW-43, MW-137, and MW-39. However, the TPH (GC/FID) low fraction analyses for these samples were performed within 7 days of sample collection; therefore, no data interpretation issues were noted.

The laboratory noted that the pH for the VOC analyses of samples MW-39 and MW-43 was outside of the method requirement (pH<2). However, with the exception of benzene, the VOC analysis for sample MW-43 was performed within 7 days of sample collection; therefore, no data interpretation issues were noted. The VOC analysis of sample MW-39 and the benzene analysis of sample MW-43 were performed more than 7 days, but less than 14 days after sample collection; therefore, the positive and nondetect VOC results in sample MW-39 and the positive result for benzene in sample MW-43 may be biased low.

The laboratory noted that the cyanide analyses of samples MW-43 and MW-137 were performed from an unpreserved, insufficiently, or inadequately preserved sample. Therefore, the nondetect results for cyanide in these samples may be biased low.

Other

The laboratory noted that the TPH (GC/FID) high fraction analysis of sample MW-118 was diluted due to sample volume. Therefore, the sample RL for TPH (GC/FID) high fraction was elevated accordingly.

The laboratory noted that the VOC analysis of sample KWB-5 was diluted 250-fold due to high concentrations of non-target compounds. Therefore, the sample RLs for VOCs were elevated accordingly.

The laboratory noted that the VOC analysis of sample MW-111 was diluted 25-fold due to high concentrations target compounds. Therefore, the sample RLs for VOCs were elevated accordingly.

The laboratory noted that the nitrate-nitrite analyses of the following samples were diluted due to sulfide interference. Therefore, the nondetect RLs for nitrate-nitrite in these samples were elevated accordingly.

- MW-28, MW-105, RW-2, MW-61, MW-62: diluted 20-fold
- MW-93: diluted 10-fold
- MW-43, MW-137, RW-10, MW-40, RW-9, RW-7: diluted 50-fold

The laboratory noted that the cyanide analyses of samples MW-28 and MW-60 were diluted 10-fold due to high sulfide content. Therefore, the RLs for cyanide in these samples were elevated accordingly.

Laboratory Method Blanks

The following analytes were detected in the method blanks: TPH (GC/FID) high fraction, dissolved solids, chloride, total boron, total calcium, total and dissolved iron, total and dissolved lead, total and dissolved manganese, total potassium, total selenium, total sodium, and total and dissolved chromium. The analytes listed below were detected in the associated samples at concentrations within five times the equipment blank concentrations for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes. Therefore, these results may include measurement contributions from laboratory sources.

- Total iron: MW-57, KWB-12B, RW-4, MW-99, MW-28, MW-59, MW-60, RW-2, MW-61, MW-93, MW-43, MW-137,MW-138
- Dissolved iron: MW-28, MW-60, MW-105, MW-61
- Total lead: MW-57, KWB-12B, RW-4, RW-6, MW-99, MW-66, MW-60, MW-107, RW-2, MW-61, MW-62, MW-93, MW-43, KWB-5
- Dissolved lead: MW-57, KWB-12B, RW-4, RW-6, MW-99, MW-66, MW-59, MW-60, MW-107, MW-128, MW-105, RW-2, MW-62, MW-93, MW-43
- Total selenium: RW-4, MW-66, MW-28, MW-128, MW-101, MW-105, RW-2, MW-61, MW-43, MW-138
- Total chromium: MW-23, MW-39, MW-40, RW-#16B, EB-REST-05
- Dissolved chromium: MW-23, RW-9, MW-42, MW-29, RW-#16B, RW-7, DUP-REST-03, DUP-REST-04, DUP-REST-05, EB-REST-05
- Dissolved manganese: DUP-REST-05, EB-REST-03, EB-REST-04, EB-REST-05
- TPH (GC/FID) high fraction: MW-52, MW-113, MW-115, MW-57, KWB-12B

LCS/LCSDs

The recovery (162%) chloroethane in the LCS in QC batch WG1095249 was above the laboratory-defined limits (47-152%). No data interpretation issues were noted since all associated samples were nondetect for chloroethane.

Equipment Blanks

The following analytes were detected in the equipment blanks submitted with this data set:

- EB-REST-01: Total calcium, total sodium, 2-butanone, sulfate, chloride
- EB-REST-03: Dissolved solids, dissolved manganese, total sodium, 2-butanone, acetone, sulfate, chloride
- EB-REST-04: Dissolved solids, TPH (GC/FID) high fraction, total and dissolved boron, dissolved barium, dissolved manganese, total and dissolved nickel, total calcium, total vanadium, total sodium, sulfate, chloride
- EB-REST-05: Total and dissolved boron, total and dissolved chromium, dissolved manganese, total and dissolved nickel, total vanadium, total sodium

Equipment Blanks, continued

The analytes listed below were detected in the corresponding samples at concentrations within five times the maximum equipment blank concentration for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes. Therefore, these samples may include measurement contributions from the field.

- Acetone: MW-110, RW-12R, MW-113, RW-13R, MW-40, RW-9
- TPH (GC/FID) high fraction: RW-7, MW-137, MW-130, MW-52, MW-109, MW-110, RW-12R, MW-113, RW-13R, MW-134, MW-115, KWB-5, MW-111, KWB-6, MW-57, KWB-12B, RW-4, MW-99, MW-59, MW-60, MW-128, MW-61, RW-10, MW-40, RW-9, MW-29, RW-#16B, DUP-REST-01, DUP-REST-03, DUP-REST-04
- Total and dissolved nickel: KWB-12B, MW-60, DUP-REST-04, DUP-REST-05
- Sulfate: RW-#15C
- Total vanadium: MW-66, MW-60, DUP-REST-04

Note that the equipment blank results listed below were less than five times the concentrations detected in the associated method blanks and were probably the result of laboratory method blank contamination; therefore, these equipment blank results did not affect any associated field samples.

- Total and dissolved chromium in EB-REST-05
- Dissolved manganese in EB-REST-03, EB-REST-04, and EB-REST-05

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- MW-113, MW-59, RA-3156, MW-60, MW-42, RW-#16B: Nitrate-nitrite
- RA-313: Chloride, fluoride
- MW-101, MW-138, MW-95: Fluoride
- EB-REST-03: Chloride, fluoride, sulfate
- MW-107: Fluoride, sulfate
- MW-138: Sulfate
- MW-52: Total and dissolved mercury
- MW-43: Dissolved boron
- RW-#15C, MW-61, DUP-REST-03: Total metals
- RW-#15C, MW-57, EB-REST-05: Dissolved metals
- MW-95, EB-REST-01: TPH (GC/FID) low fraction

MS/MSDs, continued

MS and/or MSD analyses were performed on two samples (RA-3156 and MW-59) for nitrate-nitrite in QC batch WG1096186. The recovery (88.6%) of nitrate-nitrite in the MS performed on sample RA-3156 was below the laboratory-defined recovery limits (90-110%); thus, the positive and nondetect results for nitrate-nitrite in samples RA-3156, RW-13R, MW-134, RA-313, MW-115, MW-114, MW-117, MW-118, MW-119, KWB-5, KWB-6, MW-57, KWB-12B, RW-6, MW-99, MW-111, RW-4, MW-66, and MW-28 may be biased low.

The recoveries of nitrate-nitrite in the MS (29.5%) and MSD (27.6%) performed on sample MW-59 in the same QC batch, WG1096186, were significantly below (<30%) the laboratory-defined recovery limits (90-110%). The laboratory noted that the low spike recoveries in sample MW-59 were due to sulfide presence in the sample; thus, the MS/MSD results should only be applied to sample MW-59 which was the only sample in the batch which had sulfide interference. **The nondetect result for nitrate-nitrite in sample MW-59 should be rejected and is not usable for decision-making purposes.**

MS and/or MSD analyses were performed on two samples (MW-60 and MW-42) for nitrate-nitrite in QC batch WG1096783. The recoveries of nitrate-nitrite in the MS and/or MSD performed on samples MW-60 (6.16%) and MW-42 (4.04%/4.28%) were significantly below (<30%) the laboratory-defined recovery limits (90-110%). The laboratory noted that the low spike recoveries in both samples were due to sulfide presence in the samples. These MS/MSD results should be applied to only samples in the batch which also had sulfide intereference; thus, the positive results for nitrate-nitrite in samples MW-107 and MW-42 may be biased low. **The nondetect results for nitrate-nitrite in samples MW-60, MW-105, RW-2, MW-61, MW-62, MW-93, MW-43, MW-137, RW-10, MW-40, and RW-9 should be rejected and are not usable for decision-making purposes.**

The recovery (57.6%) of nitrate-nitrite in the MS performed on sample RW-#16B (QC batch WG1096784) was below the laboratory-defined recovery limits (90-110%). Therefore, the positive and nondetect results for nitrate-nitrite in the samples in this QC batch, MW-29, RW-#16B, MW-95, RW-7, DUP-REST-01, DUP-REST-03, DUP-REST-04, DUP-REST-05, EB-REST-01, EB-REST-03, EB-REST-04, and EB-REST-05, may be biased low.

Recoveries were outside of the acceptance limits for total calcium and total sodium in the MS and/or MSD performed on samples RW-#15C, MW-61, and DUP-REST-03. However, the concentrations of these analytes in the unspiked samples were greater than four times the concentrations spiked; thus, the recoveries of total calcium and total sodium were not used to evaluate potential matrix effects.

The recovery of dissolved barium was outside of the acceptance limits in the MSD performed on sample RW-#15C. However, the concentration of barium in the unspiked sample was greater than four times the concentration spiked; thus, the recovery of barium was not used to evaluate potential matrix effects.

MS/MSDs, continued

The recovery of total chromium in the MS (133%) and the RPD (39.4%) in the MS/MSD analyses performed on sample DUP-REST-03 (QC batch WG1095156) were above the acceptance limits (75-125%/20%). Therefore, the positive results for total chromium in the samples in this QC batch, MW-23, MW-39, MW-40, RW-#16B, RW-7, DUP-REST-01, DUP-REST-03, and EB-REST-05, may be considered estimated. No data interpretation issues were noted for nondetect results.

The recoveries of dissolved chromium (1120%), dissolved iron (144%), dissolved manganese (150%), and dissolved nickel (589%) in the MS and the RPDs (166%, 34.9%, 43.2%, and 139%, respectively) in the MS/MSD analyses performed on sample EB-REST-05 (QC batch WG1095184) were above the acceptance limits (75-125%/20%). Therefore, the positive results for dissolved chromium, dissolved manganese, and/or dissolved nickel in samples EB-REST-03, EB-REST-04, and EB-REST-05, may be considered estimated. No data interpretation issues were noted for nondetect results and groundwater samples were not impacted by equipment blank MS/MSD nonconformances.

Surrogate Recoveries

One surrogate recovered above the laboratory control limits in the undiluted VOC analysis of sample RW-#15C. Therefore, the positive results for the n-butylbenzene, sec-butylbenzene, carbon disulfide, isopropylbenzene, n-isopropyltoluene, n-propylbenzene, 1,3,5-trimethylbenzene, o-xylene, and toluene in sample RW-#15C may be biased high. However, the result for carbon disulfide was qualified by the laboratory as estimated since the result was between the MDL and RL; thus, no further data interpretation was required.

One surrogate recovered above the laboratory control limits in the undiluted VOC analysis of sample MW-107. Therefore, the positive results for all detected VOCs with the exception of benzene and methyl tert-butyl ether in sample MW-107 may be biased high. However, the results for carbon disulfide, p-isopropyltoluene, and 4-methyl-2-pentanone were qualified by the laboratory as estimated since the results were between the MDL and RL; thus, no further data interpretation was required.

The surrogate recovered above the laboratory control limits in the 5-fold diluted TPH (GC/FID) high fraction analysis of sample RW-7. Therefore, the positive result for TPH (GC/FID) high fraction in sample RW-7 may be biased high.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-57, MW-40, MW-41, MW-42, MW-29, MW-130, MW-52: Dissolved solids
- RW-12R, MW-28, RW-13R, MW-41, MW-29: Nitrate-nitrite
- KWB-12B: Cyanide
- RA-313, MW-101, MW-138: Chloride, fluoride

Lab Report L983865 Continued

Laboratory Duplicates, continued

Laboratory duplicate analyses were performed on the following samples:

- MW-95, EB-REST-03: Chloride, fluoride, sulfate
- MW-107: Fluoride, sulfate
- MW-138: Sulfate

The RPD (9.99%) for dissolved solids in the duplicate analysis performed on sample MW-57 (QC batch WG1096156) and the RPD (9.47%) for dissolved solids in the duplicate analysis performed on sample MW-42 (QC batch WG1096160) exceeded the laboratory-defined control limit (5%). However, these RPD values were less than the acceptance criteria used in this evaluation (20%); thus precision was deemed acceptable and no data interpretation issues were noted.

The RPD for nitrate-nitrite in the duplicate analyses performed on sample RW-13R (QC batch WG1096186) exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for nitrate-nitrite since the sample and duplicate concentrations were less than five times the RL.

The RPDs for chloride and sulfate in the duplicate analyses performed on sample EB-REST-03 (QC batch WG1095127) exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for these analytes since the sample and duplicate concentrations were less than five times the RL.

Field Duplicates

The calculated RPD for total chromium (110.2%) in the field duplicate pair, MW-113 and DUP-REST-01, did not meet the acceptance limits (<30%). Therefore, the positive results for total chromium in samples MW-113 and DUP-REST-01 may be considered estimated.

The result for total chromium in sample MW-134 was nondetect and the result was above the RL in the field duplicate pair, DUP-REST-03. The absolute difference was greater than the RL. Therefore, the positive results for total chromium in samples MW-134 and DUP-REST-03 may be considered estimated.

Other QC Issues

The laboratory noted that the positive result for carbon disulfide in sample RW-#15C was biased high due to poor internal standard recovery. However, since this result was also qualified as estimated by the laboratory since the result was between the MDL and RL, no further data interpretation was required.

Lab Report L1031727

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1031727-01	NP-1
L1031727-02	MW-21
L1031727-03	TRIP BLANK-TMD-01

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?			X
Any detection in trip blanks?		X	
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?			X
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Laboratory Method Blanks

The following analytes were detected in the method blanks: barium and fluoride. The concentrations of barium and fluoride in the associated samples were greater than five times the associated method blank concentrations. Therefore, no data interpretation issues were noted.

MS/MSDs

MS/MSD analyses were performed on sample MW-21 for metals. Recoveries were outside of the acceptance limits for calcium, manganese, and sodium in the MS and MSD performed on sample MW-21. However, the concentrations of calcium, manganese, and sodium in the unspiked sample were greater than four times the concentrations spiked; thus, the recoveries of these analytes were not used to evaluate potential matrix effects.

Lab Report L1031728

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1031728-01	NCL-34A
L1031728-02	NCL-33
L1031728-03	MW-54A
L1031728-04	NCL-49
L1031728-05	DUP-NCL-01*
L1031728-06	TRIP BLANK-NCL-01

* DUP-NCL-01 is a field duplicate of location NCL-49

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X*		
Any detection in trip blanks?		X	
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?			X
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?		X	
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the nitrate-nitrite analysis of sample NCL-34A was diluted 20-fold due to sulfide intereference. Therefore, the RL for nitrate-nitrite in this sample was elevated accordingly.

The laboratory noted that the VOC analysis of sample NCL-34A was reported from the lowest possible dilution, 10-fold, due to sample foaming. Therefore, the RLs for VOCs in this sample were elevated accordingly.

Laboratory Method Blanks

The following analytes were detected in the method blanks: fluoride, barium, and carbon disulfide. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration for inorganic analytes and within 10 times the method blank concentrations for organic analytes. Therefore, these results may include measurement contributions from laboratory sources.

Lab Report L1031728 Continued

Laboratory Method Blanks, continued

- Carbon disulfide: NCL-34A, NCL-33, MW-54A, NCL-49, DUP-NCL-01

Equipment Blanks

*Although an equipment blank was not submitted in this laboratory report, the equipment blank submitted with laboratory report L1032119 was evaluated with the samples in this laboratory report (L1031728) since they were collected on 10/3/18 and were from a similar location at the site. The following analytes were detected in the equipment blank submitted with the data set in laboratory report L1032119, EB-NCL-01: TPH (GC/FID) high fraction, dissolved solids, chloride, sulfate, total barium, total calcium, total manganese, total potassium, and total sodium. The analytes listed below were detected in samples at concentrations less than five times the associated equipment blank concentration for inorganic analytes and less than 10 times the equipment blank concentrations for organic analytes and therefore, may include measurement contributions from the field.

- Total manganese: NCL-49
- Total potassium: NCL-34A, MW-54A, NCL-49, DUP-NCL-01
- TPH (GC/FID) high fraction: NCL-49, DUP-NCL-01

Note that the results for total barium, sulfate, and chloride in this equipment blank were less than five times the concentrations detected in the associated method blank; therefore, the results for these analytes in this equipment blank were probably the result of laboratory method blank contamination and did not affect any associated field samples.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- NCL-33: Nitrate-nitrite
- NCL-34A: Chloride, fluoride, sulfate

The recovery of chloride was outside of the acceptance limits in the MS performed on sample NCL-34A. However, the concentration of chloride in the unspiked sample was greater than four times the concentration spiked; thus, the recovery of chloride was not used to evaluate potential matrix effects.

The recoveries of fluoride (142%) and sulfate (64.1%) in the MS performed on sample NCL-34A (QC batch WG1176331) were outside the laboratory-defined recovery limits (80-120%) in the MS analysis of this sample. Therefore, the positive results for fluoride may be biased high and the positive results for sulfate may be biased low in the associated samples, NCL-34A, NCL-33, MW-54A, NCL-49, and DUP-NCL-01.

Laboratory Duplicates

Laboratory duplicate analyses were performed on sample NCL-34A for chloride, fluoride, and sulfate. The RPD (34.3%) for fluoride in the duplicate analysis performed on sample NCL-34A exceeded the laboratory-defined control limit (15%). The results for fluoride in the associated samples, NCL-34A, NCL-33, MW-54A, NCL-49, and DUP-NCL-01, may be considered estimated.

Lab Report L1031729

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1031729-01	TEL-4
L1031729-02	TEL-2
L1031729-03	TEL-1
L1031729-04	DUP-TEL-01*
L1031729-05	EB-TEL-01
L1031729-06	TRIP BLANK-TEL-01

* DUP-TEL-01 is a field duplicate of location TEL-4

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?		X	
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?			X
Any MS/MSD RPD above laboratory defined limits?			X
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?		X	
Any field duplicate data additionally flagged as estimated?		X	
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the nitrate-nitrite analyses of samples TEL-2 and TEL-1 were diluted 20-fold due to sulfide intereference. Therefore, the RLs for nitrate-nitrite in these samples were elevated accordingly.

The laboratory noted that the VOC analysis of sample TEL-1 was diluted 5-fold due to sample matrix. Therefore, the RLs for VOCs in this sample were elevated accordingly.

The VOC analysis of sample TEL-2 was likely diluted 25-fold due to concentrations of target analytes which would have exceeded the calibration range if analyzed undiluted. Therefore, the RLs for VOCs in this sample were elevated accordingly.

Lab Report L1031729 Continued

Laboratory Method Blanks

The following analytes were detected in the method blanks: total barium and fluoride. Total barium was detected in sample EB-TEL-01 at a concentration less than five times the associated method blank concentration. Therefore, this result may include measurement contributions from laboratory sources.

Equipment Blanks

The following analytes were detected in the equipment blank, EB-TEL-01: chloride, total barium, total manganese, total sodium, and TPH (GC/FID) high fraction. However, no data interpretation issues were noted since these analytes were not detected in the corresponding samples at concentrations within five times the equipment blank concentration for inorganic analytes or within 10 times the equipment blank concentrations for organic analytes. Note that this equipment blank was also used to evaluate the sample in laboratory report L1032139 since it was collected from a similar area of the site.

Note that the result for total barium in this equipment blank was less than five times the concentration detected in the associated method blank; therefore, the result for total barium in this equipment blank was probably the result of laboratory method blank contamination and did not affect any associated field samples.

Laboratory Duplicates

Laboratory duplicate analysis was performed on sample TEL-4 for dissolved solids. No issues were noted.

Lab Report L1031730

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1031730-01	MW-76
L1031730-02	MW-83
L1031730-03	MW-3
L1031730-04	MW-88
L1031730-05	MW-22A
L1031730-06	MW-10
L1031730-07	MW-123
L1031730-08	MW-4A
L1031730-09	MW-5A
L1031730-10	MW-7A
L1031730-11	OCD-8A
L1031730-12	OCD-1R
L1031730-13	OCD-2A
L1031730-14	OCD-3
L1031730-15	OCD-4
L1031730-16	MW-11A
L1031730-17	OCD-5
L1031730-18	MW-87
L1031730-19	MW-18A
L1031730-20	MW-70
L1031730-21	MW-124
L1031730-22	DUP-EP-01*
L1031730-23	DUP-EP-02**
L1031730-24	DUP-EP-03***
L1031730-25	EB-EP-02
L1031730-26	EB-EP-03
L1031730-27	TRIP BLANK-EP-02
L1031730-28	TRIP BLANK-EP-03

* DUP-EP-01 is a field duplicate of location MW-7A

** DUP-EP-02 is a field duplicate of location MW-22A

*** DUP-EP-03 is a field duplicate of location MW-3

Lab Report L1031730 Continued

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?		X	
All samples within holding times?		X	
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?		X	
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?		X	
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the fluoride analysis of sample MW-111A was diluted 50-fold due to matrix intereference. However, there was no impact on data usability since fluoride was detected in this sample.

Several samples were analyzed at dilutions for metals and/or VOCs but the laboratory did not include a sample narrative explaining the dilutions. The laboratory was contacted and stated that the dilutions were either due to matrix intereference and/or the presence of target and/or non-target analytes which would have exceeded the calibration range if undiluted. Therefore, the nondetect RLs for select metals and/or VOCs in several samples were elevated accordingly.

Standard Conditions

The laboratory noted that the cyanide analysis of sample MW-18A was performed from an unpreserved, insufficiently, or inadequately preserved sample. Therefore, the nondetect result for cyanide in this sample may be biased low.

Holding Times

The dissolved solids analyses for samples DUP-EP-01, DUP-EP-02, DUP-EP-03, EB-EP-02, and EB-EP-03 were analyzed 14 days after collection (7 days past the 7-day holding time). Therefore, the positive and nondetect results for dissolved solids in these samples may be biased low.

Lab Report L1031730 Continued

Laboratory Method Blanks

The following analytes were detected in the method blanks: dissolved solids, chloride, sulfate, total manganese, and total lead. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Chloride: EB-EP-02, EB-EP-03
- Sulfate: EB-EP-02
- Total lead: MW-76, MW-3, MW-88, OCD-8A, OCD-2A, OCD-3, OCD-4, MW-70, MW-124, DUP-EP-01, DUP-EP-02, DUP-EP-03, EB-EP-02, EB-EP-03

Equipment Blanks

The following analytes were detected in the equipment blanks submitted with this data set:

- EB-EP-02: Dissolved solids, TPH (GC/FID) high fraction, total calcium, total manganese, total potassium, total sodium, total lead, sulfate, and chloride.
- EB-EP-03: TPH (GC/FID) high fraction, total barium, total calcium, total manganese, total sodium, total lead, sulfate, and chloride

The analytes listed below were detected in the corresponding samples at concentrations within five times the maximum equipment blank concentration for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes. Therefore, these samples may include measurement contributions from the field.

- TPH (GC/FID) high fraction: MW-88, OCD-1R, OCD-2A, OCD-3, OCD-5, MW-87, MW-18A, MW-70
- Total barium: MW-22A, MW-10, MW-123, MW-4A, MW-5A, MW-7A, OCD-8A, OCD-1R, OCD-5, MW-87, MW-18A, MW-88

Note that the results for lead in EB-EP-02 and EB-EP-03, sulfate and chloride in EB-EP-02, and chloride in EB-EP-03 were less than five times the concentrations detected in the associated method blank; therefore, the results for these analytes in this equipment blank were probably the result of laboratory method blank contamination and did not affect any associated field samples.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- MW-4A: Nitrate-nitrite
- EB-EP-02, EB-EP-03: Chloride, fluoride, sulfate
- MW-70, MW-124: Select total metals
- MW-10: TPH (GC/FID) low fraction

MS/MSDs, continued

The recoveries (68.4%/67.5%) of nitrate-nitrite in the MS/MSD analyses performed on sample MW-4A (QC batch WG1178144) were below the laboratory-defined recovery limits (90-110%). Therefore, the positive and nondetect results for nitrate-nitrite in the samples in this QC batch, MW-76, MW-83, MW-3, MW-22A, MW-10, MW-123, and MW-4A, may be biased low.

The recoveries of calcium and sodium were outside of the acceptance limits in the MS and MSD analyses performed on samples MW-70 and MW-124. However, the concentrations of these analytes in the unspiked samples were greater than four times the concentrations spiked; thus, the recoveries of calcium and sodium were not used to evaluate potential matrix effects.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-123, DUP-EP-01: Dissolved solids
- MW-123: Nitrate-nitrite
- EB-EP-02, EB-EP-03: Chloride, fluoride, sulfate

The RPDs for chloride and sulfate in the duplicate analyses performed on samples EB-EP-02 and EB-EP-03 exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for these analytes since the sample and duplicate concentrations were less than five times the RL.

Lab Report L1031734

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1031734-01	MW-113
L1031734-02	KWB-7
L1031734-03	MW-135
L1031734-04	KWB-11A
L1031734-05	KWB-11B
L1031734-06	MW-136
L1031734-07	MW-126A
L1031734-08	MW-126B
L1031734-09	MW-127
L1031734-10	KWB-1A
L1031734-11	KWB-10R
L1031734-12	KWB-5
L1031734-13	MW-111
L1031734-14	MW-104
L1031734-15	MW-64
L1031734-16	MW-65
L1031734-17	MW-102
L1031734-18	MW-28
L1031734-19	MW-61
L1031734-20	MW-62
L1031734-21	MW-98
L1031734-22	MW-50
L1031734-23	MW-91
L1031734-24	MW-90
L1031734-25	MW-96
L1031734-26	MW-67
L1031734-27	DUP-REST-01*
L1031734-28	DUP-REST-02**
L1031734-29	EB-REST-01
L1031734-30	EB-REST-02

* DUP-REST-01 is a field duplicate of location MW-113
** DUP-REST-02 is a field duplicate of location MW-104

Lab Report L1031734 Continued

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?		X[1]	
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?	X		
Any analyte analyzed by a nonequivalent method than planned?		X	

[1] Trip blanks included in L1032152

Other

The laboratory noted that the nitrate-nitrite analyses of samples MW-104, MW-64, MW-28, MW-61, MW-62, MW-98, MW-91, and MW-102 were diluted 50-fold, and samples MW-90 MW-96, and DUP-REST-02 were diluted 10-fold due to sulfide intereference. Therefore, the RLs for nitrate-nitrite in these samples were elevated accordingly.

Several samples were analyzed at dilutions for metals and/or VOCs but the laboratory did not include a sample narrative explaining the dilutions. The laboratory was contacted and stated that the dilutions were either due to matrix intereference and/or the presence of target and/or non-target analytes which would have exceeded the calibration range if undiluted. Therefore, the RLs for select metals and/or VOCs in several samples were elevated accordingly.

Laboratory Method Blanks

The following analytes were detected in the method blanks: TPH (GC/FID) low fraction, chloride, sulfate, total calcium, total manganese, total potassium, total sodium, total vanadium, total cadmium, and total lead. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration for inorganics and less than 10 times the associated method blank concentration for organics. Therefore, these results may include measurement contributions from laboratory sources.

- TPH (GC/FID) low fraction: MW-90
- Total potassium: MW-113, KWB-7, MW-135, MW-127, KWB-1A, KWB-10R, KWB-5, MW-111, MW-64, MW-65, MW-102, MW-28, MW-61, MW-62
- Total manganese: KWB-11B, MW-104, MW-62
- Total vanadium: KWB-7, MW-28
- Total cadmium: MW-67

Laboratory Method Blanks, continued

- Total lead: MW-98, MW-50, MW-90, MW-96, MW-67, DUP-REST-01, DUP-REST-02, EB-REST-01, EB-REST-02

Equipment Blanks

The following analytes were detected in the equipment blanks submitted with this data set:

- EB-REST-01: Dissolved solids, TPH (GC/FID) high fraction, total barium, total calcium, total lead, total manganese, total sodium, and chloride.
- EB-REST-02: Total barium, total calcium, total lead, total manganese, total sodium, and chloride

The analytes listed below were detected in the corresponding samples at concentrations within five times the maximum equipment blank concentration for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes. Therefore, these samples may include measurement contributions from the field.

- TPH (GC/FID) high fraction: MW-135, KWB-11B, MW-136, KWB-1A, MW-113, DUP-REST-01, MW-126B
- Total manganese: MW-96, KWB-11B, MW-104, MW-62

Note that the results for lead in EB-REST-01 and EB-REST-02 were less than five times the concentration detected in the associated method blank; therefore, the results for these analytes in this equipment blank were probably the result of laboratory method blank contamination and did not affect any associated field samples.

LCS/LCSDs

The recoveries (179%/181%) of chloroethane in the LCS and LCSD in QC batch WG1176275 were above the laboratory-defined recovery limits (47-150%). However, the results for chloroethane were nondetect in the associated samples; therefore, no data interpretation issues were identified.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- KWB-7, MW-65: Nitrate-nitrite
- MW-104, MW-28: Fluoride
- EB-REST-01: Chloride. fluoride, sulfate
- MW-113: Select total metals
- MW-135: Total barium, total sodium

MS/MSDs, continued

The recovery (47.3%) of nitrate-nitrite in the MS performed on sample KWB-7 and the recoveries of nitrate-nitrite (80.5%/83.0%) in the MS/MSD performed on sample MW-65 (both in QC batch WG1178387) were below the laboratory-defined recovery limits (90-110%). Therefore, the positive and nondetect results for nitrate-nitrite in all samples in this data set may be biased low.

The recovery (79.3%) of fluoride in the MS performed on sample EB-REST-01 (QC batch WG1176351) was below the laboratory-defined recovery limits (80-120%). Therefore, the nondetect results for fluoride in samples EB-REST-01 and EB-REST-02, may be biased low. Note that groundwater results were not impacted by equipment blank MS results.

The recoveries of total calcium, total manganese, and total sodium were outside of the acceptance limits in the MS and MSD performed on sample MW-113 and the recoveries of total sodium were outside of the acceptance limits in the MS and MSD performed on sample MW-135. However, the concentrations of these analytes in the unspiked sample were greater than four times the concentrations spiked; thus, the recoveries of total calcium, total manganese, and total sodium were not used to evaluate potential matrix effects.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-113, KWB-10R, MW-98: Dissolved solids
- MW-113, MW-111: Nitrate-nitrite
- KWB-7, MW-28: Cyanide
- MW-104, MW-28: Chloride, fluoride
- EB-REST-01: Chloride. fluoride, sulfate

The RPD (22.6%) for dissolved solids in the duplicate analysis performed on sample MW-98 (QC batch WG1177175) exceeded the laboratory-defined control limit (5%) and the criteria used in this evaluation (20%); Therefore, the positive results for dissolved solids in the samples in this QC batch, MW-98, MW-50, MW-91, MW-90, MW-96, MW-67, DUP-REST-01, DUP-REST-02, and EB-REST-01, may be considered estimated. No data interpretation issues were noted with the nondetect result for dissolved solids in the samples in this QC batch, EB-REST-02.

The RPDs for cyanide in the duplicate analysis performed on samples KWB-7 (QC batch WG1176533) and MW-28 (QC batch WG1177361), and chloride in the duplicate analysis performed on sample EB-REST-01 (QC batch WG1176351) exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for these analytes since the sample and duplicate concentrations were less than five times the RL or nondetect.

Lab Report L1031734 Continued

Laboratory Duplicates, continued

The RPD (19.6%) for fluoride in the duplicate analysis performed on sample MW-28 (QC batch WG1176348) exceeded the laboratory-defined control limit (15%). However, this RPD value was less than the acceptance criteria used in this evaluation (20%); thus precision was deemed acceptable and no data interpretation issues were noted.

Field Duplicates

The results for TPH (GC/FID) high fraction were < 5x the RL in samples MW-113/DUP-REST-01. The absolute difference was greater than the RL. Therefore, the positive result for TPH (GC/FID) high fraction in samples MW-113 and DUP-REST-01 may be considered estimated.

Lab Report L1032119

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1032119-01	MW-45
L1032119-02	NCL-44
L1032119-03	NCL-32
L1032119-04	MW-108
L1032119-05	NCL-31
L1032119-06	MW-55
L1032119-07	EB-NCL-01

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?			X
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the nitrate-nitrite analysis of sample MW-108 was diluted 50-fold due to sulfide intereference. Therefore, the RL for nitrate-nitrite in this sample was elevated accordingly.

The VOC analysis of sample MW-108 was likely diluted 5-fold due to high concentrations of target analytes. Therefore, the RLs for VOCs in this sample were elevated accordingly.

Laboratory Method Blanks

The following analytes were detected in the method blanks: dissolved solids, chloride, sulfate, total barium, total cadmium, and total lead. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Chloride: EB-NCL-01
- Sulfate: EB-NCL-01

Lab Report L1032119 Continued

Laboratory Method Blanks, continued

- Total barium: EB-NCL-01, MW-55
- Total cadmium: MW-45, MW-55
- Total lead: MW-45, NCL-44, NCL-32, MW-108, NCL-31, MW-55

Equipment Blanks

The following analytes were detected in the equipment blank, EB-NCL-01: TPH (GC/FID) high fraction, dissolved solids, chloride, sulfate, total barium, total calcium, total manganese, total potassium, and total sodium. The analytes listed below were detected in samples at concentrations less than five times the associated equipment blank concentration for inorganic analytes and less than 10 times the associated equipment blank concentration for organic analytes. Therefore, they may include measurement contributions from the field. Note that this equipment blank was also used to evaluate samples in laboratory report L1031728 since these samples were collected from a similar area of the site; the affected samples from laboratory report L1031728 were previously discussed on page 42 of this memo.

- Total potassium: MW-108, NCL-31, MW-55

Note that the results for total barium, sulfate, and chloride in this equipment blank were less than five times the concentrations detected in the associated method blank; therefore, the results for these analytes in this equipment blank were probably the result of laboratory method blank contamination and did not affect any associated field samples.

LCS/LCSDs

The recoveries (48.2%/47.6%) of naphthalene in the LCS and LCSD in QC batch WG1179679 were below the laboratory-defined recovery limits (54-135%). Therefore, the nondetect result for naphthalene in the sample in this QC batch, MW-108, may be biased low.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- NCL-44: Nitrate-nitrite
- EB-NCL-01: Chloride, fluoride, sulfate
- MW-45: Mercury
- MW-55: TPH low fraction

The recovery (70.4%) of nitrate-nitrite in the MS performed on sample NCL-44 (QC batch WG1178866) was below the laboratory-defined recovery limits (90-110%). Therefore, the positive and nondetect results for nitrate-nitrite in the samples in this QC batch, MW-45, NCL-44, NCL-32, MW-108, NCL-31, MW-55, and EB-NCL-01, may be biased low.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-45: Nitrate-nitrite
- EB-NCL-01: Chloride, fluoride, sulfate

The RPD (61.2%) for sulfate in the duplicate analysis performed on sample EB-NCL-01 (QC batch WG1176730) exceeded the laboratory-defined control limit (15%). However, no data interpretation issues were noted for sulfate since the sample and duplicate concentrations were less than five times the RL.

Lab Report L1032127

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1032127-01	MW-46R

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?			X
Any detection in trip blanks?			X
Any LCS/LCSD %R out of laboratory defined limits?		X	
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?			X
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Laboratory Method Blanks

The following analytes were detected in the method blanks: dissolved solids, chloride, sulfate, total calcium, and total lead. The concentrations of these analytes in the associated sample were either nondetect or greater than five times the associated method blank concentrations. Therefore, no data interpretation issues were noted.

MS/MSDs

MS/MSD analyses were performed on the sample MW-46R for metals. Recoveries were outside of the acceptance limits for total calcium and total sodium in the MS and/or MSD performed on sample MW-46R. However, the concentrations of calcium and sodium in the unspiked sample were greater than four times the concentrations spiked; thus, the recoveries of calcium and sodium were not used to evaluate potential matrix effects.

Lab Report L1032139

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1032139-01	MW-49

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X*		
Any detection in trip blanks?			X
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?			X
Any MS/MSD RPD above laboratory defined limits?			X
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?			X
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the nitrate-nitrite and cyanide analyses of sample MW-49 were diluted 50-fold and 100-fold, respectively, due to sulfide intereference. Therefore, the RLs for nitrate-nitrite and cyanide in this sample were elevated accordingly.

The laboratory Sample Handling and Receiving narrative regarding 2-chloroethyl vinyl ether preservation in sample MW-49 was not applicable since this compound was not reported in this sample.

Laboratory Method Blanks

The following analytes were detected in the method blanks: dissolved solids, chloride, sulfate, and TPH (GC/FID) low fraction. No issues were noted since these analytes were not detected in sample MW-49 at concentrations more than five times the associated method blank concentration for inorganics or more than 10 times the associated method blank concentration for organics.

Lab Report L1032139 Continued

Equipment Blanks

*Although an equipment blank was not submitted in this laboratory report, the equipment blank submitted with laboratory report L1031729 was evaluated with the sample in this laboratory report (L1032139) since it was collected on 10/3/18 and was from a similar location at the site. The following analytes were detected in the equipment blank submitted with the data set in laboratory report L1031729, EB-TEL-01: chloride, total barium, total manganese, total sodium, and TPH (GC/FID) high fraction. However, no data interpretation issues were noted since these analytes were not detected in the corresponding sample at concentrations within five times the equipment blank concentration for inorganic analytes or within 10 times the equipment blank concentrations for organic analytes.

Note that the result for total barium in this equipment blank was less than five times the concentration detected in the associated method blank; therefore, the result for total barium in this equipment blank was probably the result of laboratory method blank contamination and did not affect any associated field samples.

LCS/LCSDs

The recoveries (48.2%/47.6%) of naphthalene in the LCS and LCSD in QC batch WG1179679 were below the laboratory-defined recovery limits (54-135%). Therefore, the positive result for naphthalene in the sample in this QC batch, MW-49, may be biased low.

Lab Report L1032143

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1032143-01	MW-120
L1032143-02	MW-121
L1032143-03	MW-84
L1032143-04	MW-122
L1032143-05	MW-79
L1032143-06	MW-74
L1032143-07	MW-2A
L1032143-08	OCD-6
L1032143-09	OCD-7AR
L1032143-10	MW-75
L1032143-11	EB-EP-01
L1032143-12	EB-EP-04
L1032143-13	TRIP BLANK-EP-01

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?	X		
All samples within holding times?	X		
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?		X	
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?		X	
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?		X	
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?			X
Any analyte analyzed by a nonequivalent method than planned?		X	

Laboratory Method Blanks

The following analytes were detected in the method blanks: dissolved solids, chloride, and sulfate. The analytes listed below were detected in samples at concentrations less than five times the associated method blank concentration. Therefore, these results may include measurement contributions from laboratory sources.

- Chloride: EB-EP-01, EB-EP-04
- Sulfate: EB-EP-01

Equipment Blanks

The following analytes were detected in the equipment blanks submitted with this data set:

- EB-EP-01: Dissolved solids, TPH (GC/FID) high fraction, total barium, total calcium, total manganese, total potassium, total sodium, sulfate, and chloride.
- EB-EP-04: Dissolved solids, TPH (GC/FID) high fraction, total barium, total calcium, total manganese, total potassium, total sodium, fluoride, and chloride.

The concentrations for the inorganic analytes listed above were greater than five times the maximum equipment blank concentration in the associated samples. Therefore, no data interpretation issues were noted with the inorganic analytes. The results for TPH (GC/FID) high fraction were detected in samples MW-120, MW-121, MW-122, MW-79, MW-2A, and OCD-6 at concentrations within 10 times the equipment blank concentrations for organic analytes. Therefore, these samples may include measurement contributions from the field.

Note that the results for chloride in EB-EP-01 and EB-EP-04 and sulfate in EB-EP-01 were less than five times the concentrations detected in the associated method blank; therefore, the results for these analytes in this equipment blank were probably the result of laboratory method blank contamination and did not affect any associated field samples.

LCS/LCSDs

The LCS/LCSD recoveries (142%/144%) were above the laboratory-defined limits (85-115%) of dissolved solids in QC batch WG1178370. The positive results for dissolved solids in samples MW-2A, OCD-6, OCD-7AR, MW-75, EB-EP-01, and EB-EP-04 may be biased high. However, the positive result for dissolved solids in sample EB-EP-04 was already qualified by the laboratory as estimated (J) since the result was between the MDL and RL; therefore, no further data interpretation issues were noted for this sample.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- EB-EP-04: Nitrate-nitrite
- EB-EP-01, EB-EP-04: Chloride, fluoride, sulfate
- MW-120: Select metals

Recoveries were outside of the acceptance limits for calcium, manganese, and sodium in the MS and/or MSD performed on sample MW-120. However, the concentrations of these analytes in the unspiked sample were greater than four times the concentrations spiked; thus, the recoveries of calcium, manganese, and sodium were not used to evaluate potential matrix effects.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-74: Dissolved solids
- EB-EP-01: Nitrate-nitrite
- EB-EP-01, EB-EP-04: Chloride, fluoride, sulfate

The RPDs for chloride and sulfate in the duplicate analysis performed on sample EB-EP-01 (QC batch WG1176730) and chloride in the duplicate analysis performed on sample EB-EP-04 (QC batch WG1176732) exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for these analytes since the sample and duplicate concentrations were less than five times the RL.

Lab Report L1032152

Sample identifiers cross-referenced to laboratory identifications are presented below.

Lab ID	Sample ID
L1032152-01	MW-48
L1032152-02	MW-130
L1032152-03	MW-52
L1032152-04	MW-109
L1032152-05	MW-110
L1032152-06	MW-134
L1032152-07	RA-4798
L1032152-08	RA-4196
L1032152-09	MW-115
L1032152-10	MW-114
L1032152-11	MW-117
L1032152-12	MW-118
L1032152-13	MW-119
L1032152-14	KWB-6
L1032152-15	MW-57
L1032152-16	KWB-12A
L1032152-17	KWB-12B
L1032152-18	MW-58
L1032152-19	MW-99
L1032152-20	MW-66
L1032152-21	MW-60
L1032152-22	MW-128
L1032152-23	MW-125
L1032152-24	MW-116
L1032152-25	MW-101
L1032152-26	MW-105
L1032152-27	MW-137
L1032152-28	MW-138
L1032152-29	MW-23
L1032152-30	MW-39
L1032152-31	MW-29
L1032152-32	MW-106
L1032152-33	DUP-REST-03*
L1032152-34	DUP-REST-04**
L1032152-35	DUP-REST-05***
L1032152-36	EB-REST-03
L1032152-37	EB-REST-04
L1032152-38	EB-REST-05
L1032152-39	TRIP BLANK-REST-01
L1032152-40	TRIP BLANK-REST-02
L1032152-41	TRIP BLANK-REST-03

Lab Report L1032152 Continued

Lab ID	Sample ID
L1032152-42	TRIP BLANK-REST-04
L1032152-43	MW-43

* DUP-REST-03 is a field duplicate of location MW-134
** DUP-REST-04 is a field duplicate of location MW-60
*** DUP-REST-05 is a field duplicate of location KWB-12B

Items	Yes	No	Not applicable
Did all samples meet the laboratory's standard conditions of sample acceptability upon receipt?		X	
All samples within holding times?		X	
Any detection in method blanks?	X		
Any detection in equipment blanks?	X		
Any detection in trip blanks?		X	
Any LCS/LCSD %R out of laboratory defined limits?	X		
Any LCS/LCSD RPD above laboratory defined limits?	X		
Any MS/MSD %R outside of laboratory defined limits?	X		
Any MS/MSD RPD above laboratory defined limits?		X	
Any surrogate %R outside of laboratory defined limits?	X		
Any laboratory duplicate RPD above laboratory defined limits?	X		
Any field duplicate data additionally flagged as estimated?	X		
Any analyte analyzed by a nonequivalent method than planned?		X	

Other

The laboratory noted that the nitrate-nitrite analyses of samples MW-58, MW-99, and MW-105 were diluted 20-fold, samples MW-106 and MW-43 were diluted 50-fold, and sample MW-137 was diluted 100-fold due to sulfide intereference. The laboratory did not narrate why the nitrate-nitrite analysis of sample MW-48 was diluted 20-fold. The laboratory was contacted and stated that the nitrate-nitrite analysis of this sample was diluted due to sulfide interference. Therefore, the RLs for nitrate-nitrite in these samples were elevated accordingly.

The laboratory noted that the cyanide analyses of samples MW-137 and MW-43 were diluted 100-fold, and sample DUP-REST-04 was diluted 10-fold due to sulfide intereference. Therefore, the RLs for cyanide in these samples were elevated accordingly.

Several samples were analyzed at various dilutions for VOCs but the laboratory did not include a sample narrative explaining the dilutions. The laboratory was contacted and stated that the dilutions were due to the presence of target and/or non-target analytes which would have exceeded the calibration range if undiluted. Therefore, the RLs for select VOCs in several samples were elevated accordingly.

Lab Report L1032152 Continued

Standard Conditions

The laboratory noted that the cyanide analysis of sample MW-43 was performed from an unpreserved, insufficiently, or inadequately preserved sample. Therefore, the nondetect result for cyanide in this sample may be biased low.

Holding Times

The dissolved solids analysis for sample MW-109 was performed 13 days after collection (6 days past the 7-day holding time). Therefore, the positive result for dissolved solids in this sample may be biased low.

Laboratory Method Blanks

The following analytes were detected in the method blanks: chloride and sulfate. However, there were no data interpretation issues identified since the results for chloride and sulfate were detected in samples at concentrations greater than five times the associated method blank concentration.

Equipment Blanks

The following analytes were detected in the equipment blanks submitted with this data set:

- EB-REST-03: Chloride, fluoride, sulfate, total barium, total calcium, total manganese, total sodium, and TPH (GC/FID) high fraction.
- EB-REST-04: Dissolved solids, chloride, total boron, total barium, total calcium, total manganese, total sodium, and TPH (GC/FID) high fraction.
- EB-REST-05: Chloride, fluoride, total boron, total barium, total manganese, total sodium, and TPH (GC/FID) high fraction.

The analytes listed below were detected in the corresponding samples at concentrations within five times the maximum equipment blank concentration for inorganic analytes and within 10 times the equipment blank concentrations for organic analytes. Therefore, these samples may include measurement contributions from the field.

- TPH (GC/FID) high fraction: MW-118, MW-57, KWB-12B, MW-116, MW-119, MW-134, DUP-REST-05, DUP-REST-03, KWB-12A, MW-125, MW-52, MW-110
- Fluoride: RA-4798, RA-4196, KWB-12A, KWB-12B, DUP-REST-05
- Sulfate: MW-66
- Total manganese: MW-118, KWB-12B, DUP-REST-05, MW-117, KWB-12A

LCS/LCSDs

The recoveries (142%/144%) of dissolved solids in the LCS and LCSD in QC batch WG1178370 were above the laboratory-defined recovery limits (85-115%). Therefore, the positive results for dissolved solids in the samples in this QC batch, MW-48, MW-130, and MW-52, may be biased high.

LCS/LCSDs, continued

The RPDs for acetone (40.2%), 2-butanone (24.9%), and vinyl chloride (37.2%) in the LCS and LCSD in QC batch WG1177306 were above the laboratory-defined limits (27%, 20%, and 20%, respectively). Further, the recovery (162%) of 2-butanone in the LCS in the same QC batch was above the laboratory-defined limits (44-160%). However, since these compounds were not detected in the samples in this QC batch, no data interpretation issues were noted.

MS/MSDs

MS and/or MSD analyses were performed on the following samples:

- MW-109, MW-66, MW-128: Nitrate-nitrite
- MW-58: Cyanide
- KWB-6, EB-REST-04: Chloride. fluoride, sulfate
- MW-66: Sulfate, fluoride
- MW-52: Mercury
- MW-48, MW-128: Select total metals
- MW-119: TPH (GC/FID) low fraction

The recoveries of nitrate-nitrite in the MS (4.48%) performed on sample MW-109 and the recoveries of nitrate-nitrite in the MS/MSDs (88.8%/89.8%) performed on sample MW-66 (both in QC batch WG1178871) were below the laboratory-defined recovery limits (90-110%). The significantly low (<30%) MS recovery of the MS performed on sample MW-109 should only be applied to sample MW-109 since the MS/MSD recoveries for sample MW-66 in this QC batch were >30%. Therefore, the positive and nondetect results for nitrate-nitrite in the samples in this QC batch, MW-48, MW-130, MW-52, MW-109, MW-110, MW-134, RA-4798, RA-4196, MW-115, MW-114, MW-117, MW-118, MW-119, KWB-6, MW-57, KWB-12A, KWB-12B, MW-58, MW-99, and MW-66, may be biased low.

The recovery of nitrate-nitrite in the MS (89.9%) performed on sample MW-128 (QC batch WG1178873) was below the laboratory-defined recovery limits (90-110%). Therefore, the positive and nondetect results for nitrate-nitrite in the samples in this QC batch, MW-60, MW-128, MW-125, MW-116, MW-101, MW-105, MW-137, MW-138, MW-23, MW-39, MW-29, MW-106, DUP-REST-03, DUP-REST-04, DUP-REST-05, EB-REST-03, EB-REST-04, EB-REST-05, and MW-43, may be biased low.

The recovery of cyanide in the MS (47.7%) and the RPD (50.4%) for cyanide in the MS/MSD performed on sample MW-58 (QC batch WG1179442) were outside the laboratory-defined recovery and RPD limits (75-125% and 20%, respectively). Therefore, the positive result for cyanide in sample MW-60 may be considered estimated and nondetect results for cyanide in the remaining samples in this laboratory report, MW-52, KWB-12A, KWB-12B, MW-58, MW-66, MW-137, MW-138, DUP-REST-04, DUP-REST-05, EB-REST-04, EB-REST-05, and MW-43, may be biased low.

MS/MSDs, continued

The recoveries of chloride and sulfate were outside of the acceptance limits in the MS performed on sample KWB-6. However, the concentrations of these analytes in the unspiked sample were greater than four times the concentrations spiked; thus, the recoveries of chloride and sulfate were not used to evaluate potential matrix effects.

The recoveries of total barium, total calcium, and total sodium in the MS and/or MSD performed on sample MW-48 and the recoveries of total calcium, total manganese, and total sodium in the MS and/or MSD performed on sample MW-128 were outside of the acceptance limits. However, the concentrations of these analytes in the unspiked samples were greater than four times the concentrations spiked; thus, the recoveries of these analytes were not used to evaluate potential matrix effects.

Surrogates

One surrogate, toluene-d8, recovered above the laboratory control limits (80-120%) in the VOC analysis of sample MW-138 (122%). Therefore, the positive results for the detected VOCs in sample MW-138 may be biased high.

Laboratory Duplicates

Laboratory duplicate analyses were performed on the following samples:

- MW-109, KWB-6, MW-116, MW-101, DUP-REST-05: Dissolved solids
- MW-130, KWB-6, MW-60, EB-REST-05: Nitrate-nitrite
- KWB-6, EB-REST-04: Chloride. fluoride, sulfate
- MW-66: Chloride, fluoride

The RPDs for dissolved solids in the duplicate analyses performed on samples KWB-16 (6.76%) (QC batch WG1178371), MW-101 (5.28%) (QC batch WG1178373), and DUP-REST-05 (8.49%) (QC batch WG1178376) exceeded the laboratory-defined control limit (5%). However, these RPD values were less than the acceptance criteria used in this evaluation (20%); thus precision was deemed acceptable and no data interpretation issues were noted.

The RPD for nitrate-nitrite in the duplicate analysis performed on sample MW-60 (QC batch WG1178873) exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for nitrate-nitrite since the sample and duplicate concentrations were less than five times the RL or nondetect.

The RPD for chloride in the duplicate analysis performed on sample EB-REST-04 (QC batch WG1176733) exceeded the laboratory-defined control limits. However, no data interpretation issues were noted for chloride since the sample and duplicate concentrations were less than five times the RL.

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Field Duplicates

The calculated RPD for nitrate-nitrite (86.4%) in the field duplicate pair, MW-134 and DUP-REST-03, did not meet the acceptance limits (<30%). Therefore, the positive results for nitrate-nitrite in samples MW-134 and DUP-REST-03 may be considered estimated.

The calculated RPD for dissolved solids (30.3%) in the field duplicate pair, MW-60 and DUP-REST-04, did not meet the acceptance limits (<30%). Therefore, the positive results for dissolved solids in samples MW-60 and DUP-REST-04 may be considered estimated.

Appendix E1 - Summary of Production from Recovery Trenches and Wells

2018 Annual Groundwater Monitoring Report

HollyFrontier Navajo Refining LLC, Artesia Refinery, Artesia, New Mexico

Recovery Well	Recovery Method	Volume of Water Recovered(1) (gallons)					Volume of PSH Recovered(1) (gallons)				
		1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	Total 2018	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	Total 2018
RW-1R	Automated Pump	0	3,031	0	0	3,031	0	0	0	0	0
RW-2R	Automated Pump	1	8,443	625	4,652	13,721	0	0	0	0	0
RW-4R	Automated Pump	13	28	722	11,514	12,277	0	0	0	0	0
RW-5R	Automated Pump	635	1,570	0	1	2,206	8	23	0	1	32
RW-6R	Automated Pump	38,032	73,861	3,877	0	115,770	0	0	0	0	0
RW-7R	Automated Pump	0	43,015	577,152	42,393	662,560	0	0	0	0	0
RW-8R	Automated Pump	44,090	50,274	205,636	120,406	420,406	1,484	2,210	2,089	225	6,008
RW-12R	Automated Pump	0	0	0	0	0	0	0	0	0	0
RW-13R	Automated Pump	0	1,965	0	0	1,965	0	0	1,718	1,077	2,795
RW-14R	Automated Pump	0	143,243	0	0	143,243	591	480	879	639	2,589
RW-15	Automated Pump	0	0	0	0	0	0	0	0	0	0
RW-19	Automated Pump	2	671	0	3,818	4,491	1	4	0	0	5
RW-20	Automated Pump	62,681	214,542	116,408	140,393	534,024	0	61	8,677	0	8,738
RW-22	Automated Pump	80	41,856	0	0	41,936	93	1,037	728	1,176	3,034
TOTAL VOLUME RECOVERED:		145,534	582,499	904,420	323,177	**1,955,630**	2,177	3,815	14,091	3,118	**23,201**

.(1) Volumes of recovered water and PSH are based on automated system readings, rounded to the nearest gallon

Automated Fluid Readings - Skid Area T-9012

	Total Fluids Readings				PSH Readings				Tank Reading
Date	**RW-1R**	**RW-2R**	**RW-7R**	**RW-8R**	**RW-1R**	**RW-2R**	**RW-7R**	**RW-8R**	**T-9012**
12/18/2017	437,512	1,066,220	4,759,469	2,364,541	3	21,076	4	41,949	71,549
1/1/2018	0	0	0	0	0	0	0	0	0
1/8/2018	0	0	0	0	0	0	0	0	0
1/15/2018	437,512	1,066,220	4,759,469	2,408,631	3	21,076	4	41,949	71,549
1/22/2018	437,512	1,066,220	4,759,469	2,408,631	3	21,076	4	42,161	71,577
1/29/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	42,161	71,606
2/5/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	42,163	71,619
2/12/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	42,464	71,688
2/19/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	42,625	71,896
2/26/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	42,163	72,383
3/5/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	42,879	72,432
3/12/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	42,955	72,580
3/19/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	43,196	72,920
3/26/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	43,433	73,323
1Q Totals:	**0**	**1**	**0**	**44,090**	**0**	**0**	**0**	**1,484**	**1,774**
4/2/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	43,513	73,630
4/9/2018	437,512	1,066,221	4,759,469	2,408,631	3	21,076	4	43,673	74,137
4/16/2018	437,512	1,066,221	4,759,491	2,408,636	3	21,076	4	43,865	74,456
4/23/2018	437,512	1,066,221	4,759,491	2,408,636	3	21,076	4	44,151	74,882
4/30/2018	437,512	1,066,221	4,759,491	2,408,636	3	21,076	4	0	0
5/7/2018	437,512	1,066,221	4,759,491	2,408,636	3	21,076	4	44,584	75,974
5/14/2018	437,512	1,066,221	4,759,491	2,408,636	3	21,076	4	0	0
5/21/2018	437,512	1,066,221	4,759,491	2,408,636	3	21,076	4	44,893	76,643
5/28/2018	437,521	1,066,221	4,759,504	2,408,653	3	21,076	4	44,892	76,643
6/4/2018	437,521	1,066,221	4,759,504	2,413,746	3	21,076	4	44,893	76,643
6/11/2018	437,521	1,066,221	4,759,504	2,424,432	3	21,076	4	45,222	77,309
6/18/2018	438,706	1,068,126	4,759,552	2,429,371	3	21,076	4	45,641	78,033
6/25/2018	440,543	1,074,664	4,802,484	2,458,905	3	21,076	4	45,643	78,033
2Q Totals:	**3,031**	**8,443**	**43,015**	**50,274**	**0**	**0**	**0**	**2,210**	**4,403**
7/2/2018	440,543	1,074,701	4,877,194	2,495,524	3	21,076	4	45,646	78,033
7/9/2018	440,543	1,074,701	4,953,245	2,527,060	3	21,076	4	45,668	78,033
7/16/2018	440,543	1,074,701	4,962,792	2,530,576	3	21,076	4	45,668	78,033
7/23/2018	0	0	0	0	0	0	0	0	0
7/30/2018	440,543	1,075,289	5,179,423	2,603,067	3	21,076	4	45,691	78,753
8/6/2018	440,543	1,075,289	5,243,080	2,626,184	3	21,076	4	45,814	78,755
8/13/2018	440,543	1,075,289	5,244,474	2,664,541	3	21,076	4	45,956	78,945
8/20/2018	440,543	1,075,289	5,244,474	2,664,541	3	21,076	4	46,407	79,460
8/27/2018	440,543	1,075,289	5,244,474	2,664,541	3	21,076	4	47,011	80,483
9/3/2018	440,543	1,075,289	37,853	2,664,541	3	21,076	1	47,507	81,252
9/10/2018	440,543	1,075,289	66,082	2,664,541	3	21,076	1	47,731	81,725
9/17/2018	440,543	1,075,289	99,348	2,664,541	3	21,076	1	47,732	81,738
9/24/2018	440,543	1,075,289	135,162	2,664,541	3	21,076	1	47,732	82,135
3Q Totals:	**0**	**625**	**577,152**	**205,636**	**0**	**0**	**0**	**2,089**	**4,102**
10/1/2018	440,543	1,075,289	165,052	2,664,541	3	21,076	1	47,733	82,282
10/8/2018	440,543	1,075,289	177,555	2,664,541	3	21,076	1	47,733	82,292
10/15/2018	440,543	1,075,299	177,555	2,664,541	3	21,076	1	47,734	82,293
10/22/2018	440,543	1,075,289	177,555	2,664,541	3	21,076	1	47,734	82,295
10/29/2018	440,543	1,076,097	177,555	2,664,541	3	21,076	1	47,734	82,296
11/5/2018	440,543	1,077,689	177,555	2,702,874	3	21,076	1	47,734	82,297
11/12/2018	440,543	1,078,407	177,555	2,764,463	3	21,076	1	47,734	82,297
11/19/2018	440,543	1,078,893	177,555	2,765,405	3	21,076	1	47,735	82,297
11/26/2018	440,543	1,079,941	177,555	2,765,405	3	21,076	1	47,735	82,297
12/3/2018	440,543	1,079,941	177,555	2,765,405	3	21,076	1	47,764	82,500
12/10/2018	440,543	1,079,941	177,555	2,765,405	3	21,076	1	47,771	82,500
12/17/2018	440,543	1,079,941	177,555	2,765,405	3	21,076	1	47,773	82,500
12/24/2018	440,543	1,079,941	177,555	2,784,947	3	21,076	1	47,957	82,775
12/27/2018	440,543	1,079,941	177,555	2,784,947	3	21,076	1	47,957	82,775
4Q Totals:	**0**	**4,652**	**42,393**	**120,406**	**0**	**0**	**0**	**225**	**493**

Automated Fluid Readings - Skid Area T-9003

Date	Total Fluids Readings		PSH Readings		Tank Reading
	RW-4R	**RW-6R**	**RW-4R**	**RW-6R**	**T-9003**
12/18/2017	4,743	470,059	1	8,850	15,448
1/1/2018	0	0	0	0	0
1/8/2018	0	0	0	0	0
1/15/2018	4,743	470,059	1	8,850	15,512
1/22/2018	4,743	470,059	1	8,850	15,527
1/29/2018	4,743	470,059	1	8,850	15,538
2/5/2018	4,743	470,059	1	8,850	15,551
2/12/2018	4,743	470,059	1	8,850	15,555
2/19/2018	4,743	470,059	1	8,850	15,559
2/26/2018	4,743	470,059	1	8,850	15,569
3/5/2018	4,743	470,059	1	8,850	15,569
3/12/2018	4,752	470,059	1	8,850	15,569
3/19/2018	4,752	470,059	1	8,850	15,569
3/26/2018	4,756	508,091	1	8,850	15,569
1Q Totals:	**13**	**38,032**	**0**	**0**	**121**
4/2/2018	4,756	525,774	1	8,850	15,569
4/9/2018	4,756	525,774	1	8,850	15,569
4/16/2018	4,784	525,774	1	8,850	15,569
4/23/2018	4,784	525,774	1	8,850	15,569
4/30/2018	4,784	525,774	1	8,850	15,569
5/7/2018	4,784	525,774	1	8,850	15,569
5/14/2018	4,784	0	1	8,850	15,569
5/21/2018	4,784	581,948	1	8,850	15,569
5/28/2018	4,784	581,948	1	8,850	15,569
6/4/2018	4,784	581,948	1	8,850	15,569
6/11/2018	4,784	581,948	1	8,850	15,569
6/18/2018	4,784	581,948	1	8,850	15,569
6/25/2018	4,784	581,952	1	8,850	15,569
2Q Totals:	**28**	**56,178**	**0**	**0**	**0**
7/2/2018	4,784	581,952	1	8,850	15,569
7/9/2018	4,784	581,952	1	8,850	15,569
7/16/2018	4,784	581,952	1	8,850	15,569
7/23/2018	0	0	0	0	0
7/30/2018	4,784	582,127	1	8,850	15,569
8/6/2018	4,784	582,974	1	8,850	15,569
8/13/2018	4,784	582,829	1	8,850	15,569
8/20/2018	4,784	585,829	1	8,850	15,569
8/27/2018	4,784	585,829	1	8,850	15,569
9/3/2018	5,506	585,829	1	8,850	15,569
9/10/2018	5,506	585,829	1	8,850	15,569
9/17/2018	5,506	585,829	1	8,850	15,569
9/24/2018	5,506	585,829	1	8,850	15,569
3Q Totals:	**722**	**3,877**	**0**	**0**	**0**
10/1/2018	5,506	585,829	1	8,850	15,569
10/8/2018	5,506	585,829	1	8,850	15,569
10/15/2018	5,506	585,829	1	8,850	15,569
10/22/2018	5,506	585,829	1	8,850	15,569
10/29/2018	5,506	585,829	1	8,850	15,569
11/5/2018	5,506	585,829	1	8,850	15,569
11/12/2018	5,534	585,829	1	8,850	15,569
11/19/2018	14,671	585,829	1	8,850	15,569
11/26/2018	17,020	585,829	1	8,850	15,569
12/3/2018	17,020	585,829	1	8,850	15,569
12/10/2018	17,020	585,829	1	8,850	15,570
12/17/2018	17,020	585,829	1	8,850	15,570
12/24/2018	17,020	585,829	1	8,850	15,570
12/27/2018	17,020	585,829	1	8,850	15,570
4Q Totals:	**11,514**	**0**	**0**	**0**	**1**

Automated Fluid Readings - Skid Area T-9021

	Total Fluids Readings			**PSH Readings**			**Tank Reading**
Date	**RW-5R**	**RW-15**	**RW-19**	**RW-5R**	**RW-15**	**RW-19**	**T-9021**
12/18/2017	75,725	2,559	159,168	13,201	13,070	6,515	276,807
1/1/2018	0	0	0	0	0	0	0
1/8/2018	0	0	0	0	0	0	0
1/15/2018	75,726	2,559	159,168	13,201	13,070	6,515	277,442
1/22/2018	75,726	2,559	159,168	13,201	13,070	6,515	277,445
1/29/2018	75,726	2,559	159,168	13,201	13,070	6,515	277,448
2/5/2018	75,726	2,559	159,170	13,201	13,070	6,515	277,453
2/12/2018	75,726	2,559	159,170	13,206	13,070	6,516	277,463
2/19/2018	75,726	2,559	159,170	13,206	13,070	6,516	277,939
2/26/2018	75,726	2,559	159,170	13,201	13,070	6,516	277,964
3/5/2018	75,726	2,559	159,170	13,206	13,070	6,516	278,012
3/12/2018	75,726	2,559	159,170	13,206	13,070	6,516	278,017
3/19/2018	75,726	2,559	159,170	13,209	13,070	6,516	278,075
3/26/2018	76,360	2,559	159,170	13,209	13,070	6,516	278,075
1Q Totals:	**635**	**0**	**2**	**8**	**0**	**1**	**1,268**
4/2/2018	76,360	2,559	159,170	13,209	13,070	6,516	278,075
4/9/2018	77,924	2,559	159,170	13,209	13,070	6,516	278,666
4/16/2018	77,924	2,559	159,170	13,209	13,070	6,516	279,249
4/23/2018	77,924	2,559	159,170	13,209	13,070	6,516	279,249
4/30/2018	77,924	2,559	159,170	0	13,070	6,516	279,249
5/7/2018	77,924	2,559	159,170	13,213	13,070	6,516	279,249
5/14/2018	77,924	2,559	159,170	0	13,070	6,516	279,249
5/21/2018	77,924	2,559	159,170	13,228	13,070	6,516	279,249
5/28/2018	77,924	2,559	159,780	13,228	13,070	6,516	279,249
6/4/2018	77,924	2,559	159,780	13,229	13,070	6,516	279,835
6/11/2018	77,924	2,559	159,780	13,229	13,070	6,516	279,835
6/18/2018	77,924	2,559	159,829	13,232	13,070	6,518	280,464
6/25/2018	77,930	2,559	159,841	13,232	13,070	6,520	281,019
2Q Totals:	**1,570**	**0**	**671**	**23**	**0**	**4**	**2,944**
7/2/2018	77,930	2,559	159,841	13,232	13,070	6,520	281,019
7/9/2018	77,930	2,559	159,841	13,232	13,070	6,520	281,621
7/16/2018	77,930	2,559	159,841	13,232	13,070	6,520	281,621
7/23/2018	0	0	0	0	0	0	0
7/30/2018	77,930	2,559	159,841	13,232	13,070	6,520	302,924
8/6/2018	77,930	2,559	159,841	13,232	13,070	6,520	317,130
8/13/2018	77,930	2,559	159,841	13,232	13,070	6,520	317,130
8/20/2018	77,930	2,559	159,841	13,232	13,070	6,520	317,130
8/27/2018	77,930	2,559	159,841	13,232	13,070	6,520	317,130
9/3/2018	77,930	2,559	159,841	13,232	13,070	6,520	317,130
9/10/2018	77,930	2,559	159,841	13,232	13,070	6,520	317,130
9/17/2018	77,930	2,559	159,841	13,232	13,070	6,520	317,130
9/24/2018	77,930	2,559	159,841	13,232	13,070	6,520	317,130
3Q Totals:	**0**	**0**	**0**	**0**	**0**	**0**	**36,111**
10/1/2018	77,930	2,559	159,841	13,232	13,070	6,520	320,774
10/8/2018	77,931	2,559	159,841	13,232	13,070	6,520	321,343
10/15/2018	77,931	2,559	159,841	13,232	13,070	6,520	321,343
10/22/2018	77,931	2,559	159,841	13,232	13,070	6,520	321,343
10/29/2018	77,931	2,559	159,841	13,232	13,070	6,520	321,343
11/5/2018	77,931	2,559	159,841	13,233	13,070	6,520	321,343
11/12/2018	77,931	2,559	159,841	13,233	13,070	6,520	321,343
11/19/2018	77,931	2,559	159,841	13,233	13,070	6,520	321,343
11/26/2018	77,931	2,559	159,841	13,233	13,070	6,520	321,343
12/3/2018	77,931	2,559	159,841	13,233	13,070	6,520	321,942
12/10/2018	77,931	2,559	159,841	13,233	13,070	6,520	321,942
12/17/2018	77,931	2,559	159,841	13,233	13,070	6,520	321,942
12/24/2018	77,931	2,559	163,659	13,233	13,070	6,520	322,541
12/27/2018	77,931	2,559	163,659	13,233	13,070	6,520	322,541
4Q Totals:	**1**	**0**	**3,818**	**1**	**0**	**0**	**5,411**

Automated Fluid Readings - Skid Area T-9020

	Total Fluids Readings					PSH Readings					Tank Reading
Date	**RW-12R**	**RW-13R**	**RW-14R**	**RW-20**	**RW-22**	**RW-12R**	**RW-13R**	**RW-14R**	**RW-20**	**RW-22**	**T-9020**
12/18/2017	234	804,460	719,831	742,392	1,951,158	4,755	23,993	43,198	40,075	37,789	166,166
1/1/2018	0	0	0	0	0	0	0	0	0	0	0
1/8/2018	0	0	0	0	0	0	0	0	0	0	0
1/15/2018	234	804,460	719,831	799,961	1,951,238	4,755	23,993	43,489	40,075	37,789	166,538
1/22/2018	234	804,460	719,831	804,453	1,951,238	4,755	23,993	43,506	40,075	37,789	166,540
1/29/2018	234	804,460	719,831	805,072	1,951,238	4,755	23,993	43,522	40,075	37,789	166,542
2/5/2018	234	804,460	719,831	805,073	1,951,238	4,755	23,993	43,528	40,075	37,789	166,544
2/12/2018	234	804,460	719,831	805,073	1,951,238	4,755	23,993	43,558	40,075	37,789	166,550
2/19/2018	234	804,460	719,831	805,073	1,951,238	4,755	23,993	43,580	40,075	37,789	166,551
2/26/2018	234	804,460	719,831	805,073	1,951,238	4,755	23,993	43,595	40,075	37,789	166,563
3/5/2018	234	804,460	719,831	805,073	1,951,238	4,755	23,993	43,623	40,075	37,790	166,563
3/12/2018	234	804,460	719,831	805,073	1,951,238	4,755	23,993	43,682	40,075	37,791	166,574
3/19/2018	234	804,460	719,831	805,073	1,951,238	4,755	23,993	43,779	40,075	37,835	166,574
3/26/2018	234	804,460	719,831	805,073	1,951,238	4,755	23,993	43,789	40,075	37,882	166,574
1Q Totals:	**0**	**0**	**0**	**62,681**	**80**	**0**	**0**	**591**	**0**	**93**	**408**
4/2/2018	234	804,460	719,831	805,073	1,951,238	4,755	23,993	43,872	40,075	37,969	166,574
4/9/2018	234	804,465	719,831	805,073	1,959,302	4,755	23,993	43,897	40,075	38,179	166,650
4/16/2018	234	804,468	719,831	805,104	1,968,486	4,755	23,993	43,917	40,075	38,305	166,744
4/23/2018	234	804,468	719,831	816,163	1,987,975	4,755	23,993	43,952	40,075	38,507	166,801
4/30/2018	234	0	0	0	0	4,755	23,993	0	40,075	0	0
5/7/2018	234	806,327	784,646	830,837	1,991,602	4,755	23,993	44,055	40,075	38,514	166,807
5/14/2018	234	806,327	0	0	0	4,755	23,993	0	40,075	38,514	166,807
5/21/2018	234	806,327	806,071	917,524	1,992,395	4,755	23,993	44,093	40,075	38,514	166,807
5/28/2018	234	806,327	862,895	949,922	1,992,503	4,755	23,993	44,098	40,075	38,514	166,808
6/4/2018	234	806,327	862,895	987,859	1,992,503	4,755	23,993	44,226	40,075	38,537	166,977
6/11/2018	234	806,327	862,895	1,028,152	1,992,503	4,755	23,993	44,253	40,075	38,714	167,128
6/18/2018	234	806,367	863,013	1,029,009	1,992,527	4,755	23,993	44,261	40,136	38,826	167,172
6/25/2018	234	806,425	863,074	1,030,705	1,993,094	4,755	23,993	44,269	40,136	38,919	167,262
2Q Totals:	**0**	**1,965**	**143,243**	**225,632**	**41,856**	**0**	**0**	**480**	**61**	**1,037**	**688**
7/2/2018	234	806,425	863,074	1,030,917	1,993,094	4,755	23,993	44,310	40,254	38,933	167,263
7/9/2018	234	806,425	863,074	1,031,181	1,993,094	4,755	23,993	44,322	40,305	38,933	167,286
7/16/2018	234	806,425	863,074	1,031,413	1,993,094	4,755	23,993	44,322	40,305	38,933	167,286
7/23/2018	0	0	0	0	0	0	0	0	0	0	0
7/30/2018	234	806,425	863,074	1,031,958	1,993,094	4,755	23,999	44,449	45,504	38,933	167,958
8/6/2018	234	806,425	863,074	1,031,958	1,993,094	4,755	24,012	44,512	48,813	38,936	168,126
8/13/2018	234	806,425	863,074	1,032,899	1,993,094	4,755	24,016	44,602	48,813	38,965	168,126
8/20/2018	234	806,425	863,074	1,032,899	1,993,094	4,755	24,017	44,723	48,813	38,992	168,126
8/27/2018	234	806,425	863,074	1,033,322	1,993,094	4,755	24,018	44,761	48,813	39,010	168,126
9/3/2018	234	806,425	863,074	1,054,942	1,993,094	4,755	24,018	44,878	48,813	39,030	168,126
9/10/2018	234	806,425	863,074	1,083,935	1,993,094	4,755	24,060	44,927	48,813	39,030	168,126
9/17/2018	234	806,425	863,074	1,115,955	1,993,094	4,755	24,061	45,037	48,813	39,044	168,126
9/24/2018	234	806,425	863,074	1,147,113	1,993,094	4,755	25,711	45,148	48,813	39,647	168,164
3Q Totals:	**0**	**0**	**0**	**116,408**	**0**	**0**	**1,718**	**879**	**8,677**	**728**	**902**
10/1/2018	234	806,425	863,074	1,186,002	1,993,094	4,755	25,946	45,286	48,813	40,796	168,275
10/8/2018	234	806,425	863,074	1,223,020	1,993,094	4,755	26,777	45,444	48,813	40,806	168,275
10/15/2018	234	806,425	863,074	1,243,309	1,993,094	4,755	26,777	45,486	48,813	40,812	168,275
10/22/2018	234	806,425	863,074	1,260,157	1,993,094	4,755	26,778	45,531	48,813	40,819	168,272
10/29/2018	234	806,425	863,074	1,273,364	1,993,094	4,755	26,782	45,597	48,813	40,822	168,275
11/5/2018	234	806,425	863,074	1,280,794	1,993,094	4,755	26,782	45,611	48,813	40,822	168,275
11/12/2018	234	806,425	863,074	1,286,433	1,993,094	4,755	26,787	45,651	48,813	40,822	168,275
11/19/2018	234	806,425	863,074	1,287,224	1,993,094	4,755	26,787	45,682	48,813	40,822	168,277
11/26/2018	234	806,425	863,074	1,287,503	1,993,094	4,755	26,788	45,706	48,813	40,822	168,277
12/3/2018	234	806,425	863,074	1,287,503	1,993,094	4,755	26,788	45,764	48,813	40,822	168,277
12/10/2018	234	806,425	863,074	1,287,506	1,993,094	4,755	26,788	45,767	48,813	40,822	168,277
12/17/2018	234	806,425	863,074	1,287,506	1,993,094	4,755	26,788	45,768	48,813	40,822	168,277
12/24/2018	234	806,425	863,074	1,287,506	1,993,094	4,755	26,788	45,787	48,813	40,823	168,277
12/27/2018	234	806,425	863,074	1,287,506	1,993,094	4,755	26,788	45,787	48,813	40,823	168,277
4Q Totals:	**0**	**0**	**0**	**140,393**	**0**	**0**	**1,077**	**639**	**0**	**1,176**	**113**

Appendix E.2 - Recovery System Gauging Data

2018 Annual Groundwater Monitoring Report

HollyFrontier Navajo Refining LLC, Artesia Refinery, Artesia, NM

Well	**RW-1R**							**RW-2R**							**RW-4R**						
Date	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev
12/20/17		10.76	Out	0.00	3,370.03		3,359.27		12.05	Out	0.00	3,371.17		3,359.12		13.38	Out	0.00	3,367.86		3,354.48
1/5/18		10.80	Out	0.00	3,370.03		3,359.23		12.10	Out	0.00	3,371.17		3,359.07		13.61	Out	0.00	3,367.86		3,354.25
1/9/18		10.85	Out	0.00	3,370.03		3,359.18		12.25	Out	0.00	3,371.17		3,358.92		13.55	Out	0.00	3,367.86		3,354.31
1/19/18		10.85	Out	0.00	3,370.03		3,359.18		12.10	Out	0.00	3,371.17		3,359.07		13.65	Out	0.00	3,367.86		3,354.21
1/25/18		10.95	Out	0.00	3,370.03		3,359.08		12.22	Out	0.00	3,371.17		3,358.95		13.83	Out	0.00	3,367.86		3,354.03
2/1/18		11.00	Out	0.00	3,370.03		3,359.03		12.20	Out	0.00	3,371.17		3,358.97		13.87	Out	0.00	3,367.86		3,353.99
2/6/18		10.90	Out	0.00	3,370.03		3,359.13		12.20	Out	0.00	3,371.17		3,358.97		13.73	Out	0.00	3,367.86		3,354.13
2/14/18		10.99	Out	0.00	3,370.03		3,359.04		12.24	Out	0.00	3,371.17		3,358.93		13.88	Out	0.00	3,367.86		3,353.98
2/20/18		10.80	Out	0.00	3,370.03		3,359.23		12.02	Out	0.00	3,371.17		3,359.15		14.00	Out	0.00	3,367.86		3,353.86
3/1/18		11.15	Out	0.00	3,370.03		3,358.88		12.27	Out	0.00	3,371.17		3,358.90		14.20	Out	0.00	3,367.86		3,353.66
3/8/18		10.95	Out	0.00	3,370.03		3,359.08		12.20	Out	0.00	3,371.17		3,358.97		14.15	Out	0.00	3,367.86		3,353.71
3/15/18		10.95	Out	0.00	3,370.03		3,359.08		12.20	Out	0.00	3,371.17		3,358.97		14.15	Out	0.00	3,367.86		3,353.71
3/22/18		11.15	Out	0.00	3,370.03		3,358.88		12.34	Out	0.00	3,371.17		3,358.83		14.30	Out	0.00	3,367.86		3,353.56
3/28/18		11.13	Out	0.00	3,370.03		3,358.90		12.37	Out	0.00	3,371.17		3,358.80		14.35	Out	0.00	3,367.86		3,353.51
4/3/18		11.15	Out	0.00	3,370.03		3,358.88		12.49	Out	0.00	3,371.17		3,358.68		14.40	Out	0.00	3,367.86		3,353.46
4/11/18		11.23	Out	0.00	3,370.03		3,358.80		12.52	Out	0.00	3,371.17		3,358.65		14.49	Out	0.00	3,367.86		3,353.37
4/18/18		11.50	Out	0.00	3,370.03		3,358.53		12.69	Out	0.00	3,371.17		3,358.48		14.60	Out	0.00	3,367.86		3,353.26
4/24/18		11.50	Out	0.00	3,370.03		3,358.53		12.70	Out	0.00	3,371.17		3,358.47		14.50	Out	0.00	3,367.86		3,353.36
5/2/18		11.43	Out	0.00	3,370.03		3,358.60		12.75	Out	0.00	3,371.17		3,358.42		14.50	Out	0.00	3,367.86		3,353.36
5/8/18		11.50	Out	0.00	3,370.03		3,358.53		12.73	Out	0.00	3,371.17		3,358.44		14.50	Out	0.00	3,367.86		3,353.36
5/23/18		11.25	Out	0.00	3,370.03		3,358.78		12.69	Out	0.00	3,371.17		3,358.48		15.00	Out	0.00	3,367.86		3,352.86
5/30/18		15.30	Out	0.00	3,370.03		3,354.73		12.65	Out	0.00	3,371.17		3,358.52		14.65	Out	0.00	3,367.86		3,353.21
6/5/18		11.09	Out	0.00	3,370.03		3,358.94		12.40	Out	0.00	3,371.17		3,358.77		14.60	Out	0.00	3,367.86		3,353.26
6/12/18		11.25	Out	0.00	3,370.03		3,358.78		12.53	Out	0.00	3,371.17		3,358.64		14.65	Out	0.00	3,367.86		3,353.21
6/20/18		13.04	Out	0.00	3,370.03		3,356.99		14.55	Out	0.00	3,371.17		3,356.62		14.55	Out	0.00	3,367.86		3,353.31
6/26/18		11.15	Out	0.00	3,370.03		3,358.88		12.47	Out	0.00	3,371.17		3,358.70		14.55	Out	0.00	3,367.86		3,353.31
7/3/18		11.30	Out	0.00	3,370.03		3,358.73		12.55	Out	0.00	3,371.17		3,358.62		14.45	Out	0.00	3,367.86		3,353.41
7/10/18		11.55	Out	0.00	3,370.03		3,358.48		12.80	Out	0.00	3,371.17		3,358.37		14.50	Out	0.00	3,367.86		3,353.36
7/17/18		11.70	Out	0.00	3,370.03		3,358.33		12.93	Out	0.00	3,371.17		3,358.24		14.49	Out	0.00	3,367.86		3,353.37
7/24/18		11.80	Out	0.00	3,370.03		3,358.23		13.05	Out	0.00	3,371.17		3,358.12		14.45	Out	0.00	3,367.86		3,353.41
8/1/18		11.20	Out	0.00	3,370.03		3,358.83		12.73	Out	0.00	3,371.17		3,358.44		14.40	Out	0.00	3,367.86		3,353.46
8/7/18		11.20	Out	0.00	3,370.03		3,358.83		12.50	Out	0.00	3,371.17		3,358.67		14.30	Out	0.00	3,367.86		3,353.56
8/15/18		10.85	Out	0.00	3,370.03		3,359.18		12.20	Out	0.00	3,371.17		3,358.97		14.09	Out	0.00	3,367.86		3,353.77
8/23/18		11.05	Out	0.00	3,370.03		3,358.98		12.35	Out	0.00	3,371.17		3,358.82		14.05	Out	0.00	3,367.86		3,353.81
8/29/18		11.15	Out	0.00	3,370.03		3,358.88		12.45	Out	0.00	3,371.17		3,358.72		14.09	Out	0.00	3,367.86		3,353.77
9/6/18		11.29	Out	0.00	3,370.03		3,358.74		12.60	Out	0.00	3,371.17		3,358.57		14.15	Out	0.00	3,367.86		3,353.71
9/11/18		11.30	Out	0.00	3,370.03		3,358.73		12.58	Out	0.00	3,371.17		3,358.59		14.10	Out	0.00	3,367.86		3,353.76
9/18/18		11.40	Out	0.00	3,370.03		3,358.63		12.70	Out	0.00	3,371.17		3,358.47		14.25	Out	0.00	3,367.86		3,353.61
9/25/18		13.35	Out	0.00	3,370.03		3,356.68		12.69	Out	0.00	3,371.17		3,358.48		14.15	Out	0.00	3,367.86		3,353.71
10/2/18		11.50	Out	0.00	3,370.03		3,358.53		12.80	Out	0.00	3,371.17		3,358.37		14.25	Out	0.00	3,367.86		3,353.61
10/10/18		12.50	Out	0.00	3,370.03		3,357.53		12.85	Out	0.00	3,371.17		3,358.32		14.40	Out	0.00	3,367.86		3,353.46
10/16/18		11.65	Out	0.00	3,370.03		3,358.38		12.95	Out	0.00	3,371.17		3,358.22		14.43	Out	0.00	3,367.86		3,353.43
10/23/18		11.45	Out	0.00	3,370.03		3,358.58		12.70	Out	0.00	3,371.17		3,358.47		14.30	Out	0.00	3,367.86		3,353.56
10/30/18		10.65	Out	0.00	3,370.03		3,359.38		12.18	Out	0.00	3,371.17		3,358.99		14.05	Out	0.00	3,367.86		3,353.81
11/5/18		10.73	Out	0.00	3,370.03		3,359.30		12.12	Out	0.00	3,371.17		3,359.05		14.00	Out	0.00	3,367.86		3,353.86
11/14/18		10.95	Out	0.00	3,371.03		3,360.08		12.29	Out	0.00	3,372.17		3,359.88		14.05	Out	0.00	3,368.86		3,354.81
11/19/18		10.80	Out	0.00	3,372.03		3,361.23		12.15	Out	0.00	3,373.17		3,361.02		14.50	Out	0.00	3,369.86		3,355.36
11/28/18		10.84	Out	0.00	3,373.03		3,362.19		12.14	Out	0.00	3,374.17		3,362.03		13.94	Out	0.00	3,370.86		3,356.92
12/4/18		11.10	Out	0.00	3,374.03		3,362.93		12.33	Out	0.00	3,375.17		3,362.84		14.10	Out	0.00	3,371.86		3,357.76
12/14/18		10.98	Out	0.00	3,375.03		3,364.05		12.25	Out	0.00	3,376.17		3,363.92		14.15	Out	0.00	3,372.86		3,358.71
12/18/18		10.77	Out	0.00	3,376.03		3,365.26		12.03	Out	0.00	3,377.17		3,365.14		13.99	Out	0.00	3,373.86		3,359.87
12/27/18		10.83	Out	0.00	3,377.03		3,366.20		12.04	Out	0.00	3,378.17		3,366.13		14.05	Out	0.00	3,374.86		3,360.81

Appendix E.2 - Recovery System Gauging Data

2018 Annual Groundwater Monitoring Report

HollyFrontier Navajo Refining LLC, Artesia Refinery, Artesia, NM

Well	RW-5R							RW-6R							RW-7R						
Date	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev
12/20/17	15.65	15.89	Out	0.24	3,371.56	3,355.91	3,355.67	14.18	14.31	Out	0.13	3,371.36	3,357.18	3,357.05		11.54	Out	0.00	3,370.09		3,358.55
1/5/18	15.85	16.10	Out	0.25	3,371.56	3,355.71	3,355.46	14.60	14.61	Out	0.01	3,371.36	3,356.76	3,356.75		11.79	Out	0.00	3,370.09		3,358.30
1/9/18	15.80	15.99	15.98	0.19	3,371.56	3,355.76	3,355.57	14.25	14.55	15.53	0.30	3,371.36	3,357.11	3,356.81		11.70	Out	0.00	3,370.09		3,358.39
1/19/18	15.89	16.10	Out	0.21	3,371.56	3,355.67	3,355.46			Out	0.00	3,371.36		3,371.36		11.51	Out	0.00	3,370.09		3,358.58
1/25/18	16.04	16.55	Out	0.51	3,371.56	3,355.52	3,355.01	14.60	14.84	Out	0.24	3,371.36	3,356.76	3,356.52		11.80	Out	0.00	3,370.09		3,358.29
2/1/18	16.25	16.70	Out	0.45	3,371.56	3,355.31	3,354.86	14.72	15.05	Out	0.33	3,371.36	3,356.64	3,356.31		11.75	Out	0.00	3,370.09		3,358.34
2/6/18	16.28	16.57	Out	0.29	3,371.56	3,355.28	3,354.99	14.58	14.79	Out	0.21	3,371.36	3,356.78	3,356.57		11.60	Out	0.00	3,370.09		3,358.49
2/14/18	15.58	15.69	Out	0.11	3,371.56	3,355.98	3,355.87	14.75	14.95	14.94	0.20	3,371.36	3,356.61	3,356.41		11.80	Out	0.00	3,370.09		3,358.29
2/20/18	15.62	15.79	Out	0.17	3,371.56	3,355.94	3,355.77	14.85	15.00	Out	0.15	3,371.36	3,356.51	3,356.36		11.55	Out	0.00	3,370.09		3,358.54
3/1/18	15.89	16.49	Out	0.60	3,371.56	3,355.67	3,355.07	15.05	15.35	Out	0.30	3,371.36	3,356.31	3,356.01		11.50	Out	0.00	3,370.09		3,358.59
3/8/18	15.79	15.90	Out	0.11	3,371.56	3,355.77	3,355.66	15.00	15.10	Out	0.10	3,371.36	3,356.36	3,356.26		11.35	Out	0.00	3,370.09		3,358.74
3/15/18	15.85	16.05	16.04	0.20	3,371.56	3,355.71	3,355.51	14.98	15.19	15.18	0.21	3,371.36	3,356.38	3,356.17		11.45	Out	0.00	3,370.09		3,358.64
3/22/18		18.45	16.04	0.00	3,371.56		3,353.11		28.80	Out	0.00	3,371.36		3,342.56		11.78	Out	0.00	3,370.09		3,358.31
3/28/18	16.89	16.98	16.04	0.09	3,371.56	3,354.67	3,354.58		28.00	Out	0.00	3,371.36		3,343.36		11.80	Out	0.00	3,370.09		3,358.29
4/3/18	18.28	19.00	18.95	0.72	3,371.56	3,353.28	3,352.56		15.38	Out	0.00	3,371.36		3,355.98		11.85	Out	0.00	3,370.09		3,358.24
4/11/18	16.56	17.05	17.02	0.49	3,371.56	3,355.00	3,354.51		15.37	Out	0.00	3,371.36		3,355.99		11.99	Out	0.00	3,370.09		3,358.10
4/18/18	17.29	17.34	Out	0.05	3,371.56	3,354.27	3,354.22		15.50	Out	0.00	3,371.36		3,355.86		12.15	Out	0.00	3,370.09		3,357.94
4/24/18	15.10	15.20	Out	0.10	3,371.56	3,356.46	3,356.36		15.45	Out	0.00	3,371.36		3,355.91		12.10	Out	0.00	3,370.09		3,357.99
5/2/18	17.15	17.30	17.29	0.15	3,371.56	3,354.41	3,354.26		15.43	Out	0.00	3,371.36		3,355.93		11.99	Out	0.00	3,370.09		3,358.10
5/8/18	17.12	17.25	22.14	0.13	3,371.56	3,354.44	3,354.31		15.45	Out	0.00	3,371.36		3,355.91		12.05	Out	0.00	3,370.09		3,358.04
5/23/18	17.45	18.10	Out	0.65	3,371.56	3,354.11	3,353.46		15.95	Out	0.00	3,371.36		3,355.41		11.70	Out	0.00	3,370.09		3,358.39
5/30/18	17.27	17.42	17.41	0.15	3,371.56	3,354.29	3,354.14		15.64	Out	0.00	3,371.36		3,355.72		12.00	Out	0.00	3,370.09		3,358.09
6/5/18	17.19	17.35	17.34	0.16	3,371.56	3,354.37	3,354.21		15.58	Out	0.00	3,371.36		3,355.78		11.49	Out	0.00	3,370.09		3,358.60
6/12/18	17.30	17.60	17.58	0.30	3,371.56	3,354.26	3,353.96		15.75	Out	0.00	3,371.36		3,355.61		11.70	Out	0.00	3,370.09		3,358.39
6/20/18	17.18	17.35	16.55	0.17	3,371.56	3,354.38	3,354.21		15.55	Out	0.00	3,371.36		3,355.81		11.20	Out	0.00	3,370.09		3,358.89
6/26/18	17.09	17.25	16.55	0.16	3,371.56	3,354.47	3,354.31		15.50	Out	0.00	3,371.36		3,355.86		15.81	Out	0.00	3,370.09		3,354.28
7/3/18	17.08	17.20	16.55	0.12	3,371.56	3,354.48	3,354.36		15.45	Out	0.00	3,371.36		3,355.91		14.65	Out	0.00	3,370.09		3,355.44
7/10/18	17.06	17.15	16.55	0.09	3,371.56	3,354.50	3,354.41		15.40	Out	0.00	3,371.36		3,355.96		16.50	Out	0.00	3,370.09		3,353.59
7/17/18	17.01	17.20	16.55	0.19	3,371.56	3,354.55	3,354.36		15.39	Out	0.00	3,371.36		3,355.97		16.45	Out	0.00	3,370.09		3,353.64
7/24/18	17.05	17.15	16.55	0.10	3,371.56	3,354.51	3,354.41		15.35	Out	0.00	3,371.36		3,356.01		16.60	Out	0.00	3,370.09		3,353.49
8/1/18	16.94	17.07	16.55	0.13	3,371.56	3,354.62	3,354.49		15.30	Out	0.00	3,371.36		3,356.06		15.93	Out	0.00	3,370.09		3,354.16
8/7/18	16.85	17.15	16.55	0.30	3,371.56	3,354.71	3,354.41		15.28	Out	0.00	3,371.36		3,356.08		15.54	Out	0.00	3,370.09		3,354.55
8/15/18	16.60	16.90	16.55	0.30	3,371.56	3,354.96	3,354.66		17.00	Out	0.00	3,371.36		3,354.36		14.45	Out	0.00	3,370.09		3,355.64
8/23/18	16.60	16.84	16.55	0.24	3,371.56	3,354.96	3,354.72		15.10	Out	0.00	3,371.36		3,356.26		11.63	Out	0.00	3,370.09		3,358.46
8/29/18	16.65	16.90	16.55	0.25	3,371.56	3,354.91	3,354.66		15.10	Out	0.00	3,371.36		3,356.26		11.60	Out	0.00	3,370.09		3,358.49
9/6/18	16.70	19.95	16.55	3.25	3,371.56	3,354.86	3,351.61		15.10	Out	0.00	3,371.36		3,356.26		13.09	Out	0.00	3,370.09		3,357.00
9/11/18	16.60	16.86	16.55	0.26	3,371.56	3,354.96	3,354.70		15.03	Out	0.00	3,371.36		3,356.33		13.10	Out	0.00	3,370.09		3,356.99
9/18/18	16.72	16.92	16.55	0.20	3,371.56	3,354.84	3,354.64		15.10	Out	0.00	3,371.36		3,356.26		13.50	Out	0.00	3,370.09		3,356.59
9/25/18	16.69	16.98	16.55	0.29	3,371.56	3,354.87	3,354.58		15.06	Out	0.00	3,371.36		3,356.30		13.63	Out	0.00	3,370.09		3,356.46
10/2/18	16.80	17.03	16.55	0.23	3,371.56	3,354.76	3,354.53		15.17	Out	0.00	3,371.36		3,356.19		13.05	Out	0.00	3,370.09		3,357.04
10/10/18	16.93	17.15	16.55	0.22	3,371.56	3,354.63	3,354.41		15.30	Out	0.00	3,371.36		3,356.06		11.80	Out	0.00	3,370.09		3,358.29
10/16/18	16.92	17.17	16.55	0.25	3,371.56	3,354.64	3,354.39		15.34	Out	0.00	3,371.36		3,356.02		12.02	Out	0.00	3,370.09		3,358.07
10/23/18	16.85	17.15	16.55	0.30	3,371.56	3,354.71	3,354.41		15.24	Out	0.00	3,371.36		3,356.12		12.10	Out	0.00	3,370.09		3,357.99
10/30/18	16.48	16.77	16.55	0.29	3,371.56	3,355.08	3,354.79		15.02	Out	0.00	3,371.36		3,356.34		11.15	Out	0.00	3,370.09		3,358.94
11/5/18	16.79	17.13	16.55	0.34	3,371.56	3,354.77	3,354.43		15.00	Out	0.00	3,371.36		3,356.36		11.22	Out	0.00	3,370.09		3,358.87
11/14/18	16.86	17.03	16.55	0.17	3,372.56	3,355.70	3,355.53		15.00	Out	0.00	3,372.36		3,357.36		11.70	Out	0.00	3,371.09		3,359.39
11/19/18	16.80	16.98	16.55	0.18	3,373.56	3,356.76	3,356.58		15.00	Out	0.00	3,373.36		3,358.36		11.70	Out	0.00	3,372.09		3,360.39
11/28/18	16.77	17.20	16.55	0.43	3,374.56	3,357.79	3,357.36		14.98	Out	0.00	3,374.36		3,359.38		11.78	Out	0.00	3,373.09		3,361.31
12/4/18	16.93	17.23	16.55	0.30	3,375.56	3,358.63	3,358.33		15.10	Out	0.00	3,375.36		3,360.26		12.10	Out	0.00	3,374.09		3,361.99
12/14/18	17.09	17.30	16.55	0.21	3,376.56	3,359.47	3,359.26		15.25	Out	0.00	3,376.36		3,361.11		11.85	Out	0.00	3,375.09		3,363.24
12/18/18	16.85	17.19	16.55	0.34	3,377.56	3,360.71	3,360.37		15.00	Out	0.00	3,377.36		3,362.36		11.70	Out	0.00	3,376.09		3,364.39
12/27/18	17.09	17.23	16.55	0.14	3,378.56	3,361.47	3,361.33		15.14	Out	0.00	3,378.36		3,363.22		11.80	Out	0.00	3,377.09		3,365.29

Appendix E.2 - Recovery System Gauging Data

2018 Annual Groundwater Monitoring Report

HollyFrontier Navajo Refining LLC, Artesia Refinery, Artesia, NM

Well	RW-8R							RW-12R							RW-13R						
Date	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev
12/20/17	12.65	13.15	13.36	0.50	3,371.10	3,358.45	3,357.95		23.65	Out	0.00	3,354.54		3,330.89	21.35	21.45	Out	0.10	3,354.54	3,333.19	3,333.09
1/5/18	12.74	13.39	13.32	0.65	3,371.10	3,358.36	3,357.71		23.90	Out	0.00	3,354.54		3,330.64		21.65	Out	0.00	3,354.54		3,332.89
1/9/18	11.40	12.34	12.27	0.94	3,371.10	3,359.70	3,358.76		24.00	Out	0.00	3,354.54		3,330.54		21.70	Out	0.00	3,354.54		3,332.84
1/19/18	11.35	12.30	Out	0.95	3,371.10	3,359.75	3,358.80		24.65	Out	0.00	3,354.54		3,329.89		21.94	Out	0.00	3,354.54		3,332.60
1/25/18	11.30	12.43	Out	1.13	3,371.10	3,359.80	3,358.67		24.57	Out	0.00	3,354.54		3,329.97		22.10	Out	0.00	3,354.54		3,332.44
2/1/18	11.50	12.45	12.38	0.95	3,371.10	3,359.60	3,358.65		24.69	Out	0.00	3,354.54		3,329.85		22.23	Out	0.00	3,354.54		3,332.31
2/6/18	11.13	12.30	Out	1.17	3,371.10	3,359.97	3,358.80		24.75	Out	0.00	3,354.54		3,329.79		22.43	Out	0.00	3,354.54		3,332.11
2/14/18	11.30	12.43	12.34	1.13	3,371.10	3,359.80	3,358.67		24.87	Out	0.00	3,354.54		3,329.67		21.35	Out	0.00	3,354.54		3,333.19
2/20/18	11.30	12.33	12.25	1.03	3,371.10	3,359.80	3,358.77		25.15	Out	0.00	3,354.54		3,329.39		22.32	Out	0.00	3,354.54		3,332.22
3/1/18	11.37	12.50	12.41	1.13	3,371.10	3,359.73	3,358.60		25.01	Out	0.00	3,354.54		3,329.53		22.62	Out	0.00	3,354.54		3,331.92
3/8/18	11.23	12.51	12.41	1.28	3,371.10	3,359.87	3,358.59		25.06	Out	0.00	3,354.54		3,329.48		22.75	Out	0.00	3,354.54		3,331.79
3/15/18	11.37	12.45	12.37	1.08	3,371.10	3,359.73	3,358.65		25.20	Out	0.00	3,354.54		3,329.34		22.85	Out	0.00	3,354.54		3,331.69
3/22/18	11.65	12.60	12.53	0.95	3,371.10	3,359.45	3,358.50		25.23	Out	0.00	3,354.54		3,329.31		22.99	Out	0.00	3,354.54		3,331.55
3/28/18	11.85	12.53	12.48	0.68	3,371.10	3,359.25	3,358.57		25.20	Out	0.00	3,354.54		3,329.34		23.00	Out	0.00	3,354.54		3,331.54
4/3/18	11.60	12.60	12.48	1.00	3,371.10	3,359.50	3,358.50		25.27	Out	0.00	3,354.54		3,329.27		23.17	Out	0.00	3,354.54		3,331.37
4/11/18	11.65	12.54	12.47	0.89	3,371.10	3,359.45	3,358.56		25.20	Out	0.00	3,354.54		3,329.34		23.90	Out	0.00	3,354.54		3,330.64
4/18/18	11.90	12.80	12.47	0.90	3,371.10	3,359.20	3,358.30		24.28	Out	0.00	3,354.54		3,330.26		21.39	Out	0.00	3,354.54		3,333.15
4/24/18	11.82	12.80	12.73	0.98	3,371.10	3,359.28	3,358.30		24.25	Out	0.00	3,354.54		3,330.29		21.37	Out	0.00	3,354.54		3,333.17
5/2/18	11.87	12.83	12.75	0.96	3,371.10	3,359.23	3,358.27		24.25	Out	0.00	3,354.54		3,330.29	21.65	21.75	Out	0.10	3,354.54	3,332.89	3,332.79
5/8/18	12.05	12.45	12.42	0.40	3,371.10	3,359.05	3,358.65		24.64	Out	0.00	3,354.54		3,329.90		21.78	Out	0.00	3,354.54		3,332.76
5/23/18	11.90	12.50	12.46	0.60	3,371.10	3,359.20	3,358.60		21.82	Out	0.00	3,354.54		3,332.72	19.83	19.93	Out	0.10	3,354.54	3,334.71	3,334.61
5/30/18	13.25	13.25	Out	0.00	3,371.10	3,357.85	3,357.85		22.49	Out	0.00	3,354.54		3,332.05	20.30	20.42	Out	0.12	3,354.54	3,334.24	3,334.12
6/5/18	15.90	16.83	16.76	0.93	3,371.10	3,355.20	3,354.27		20.96	Out	0.00	3,354.54		3,333.58	19.12	19.25	19.24	0.13	3,354.54	3,335.42	3,335.29
6/12/18	15.85	17.00	16.91	1.15	3,371.10	3,355.25	3,354.10		21.02	Out	0.00	3,354.54		3,333.52	19.19	19.30	Out	0.11	3,354.54	3,335.35	3,335.24
6/20/18	13.85	14.06	13.23	0.21	3,371.10	3,357.25	3,357.04		19.83	Out	0.00	3,354.54		3,334.71	18.00	18.36	17.41	0.36	3,354.54	3,336.54	3,336.18
6/26/18	15.50	15.70	13.23	0.20	3,371.10	3,355.60	3,355.40		20.82	Out	0.00	3,354.54		3,333.72	19.75	19.86	17.41	0.11	3,354.54	3,334.79	3,334.68
7/3/18	14.80	19.60	13.23	4.80	3,371.10	3,356.30	3,351.50		20.52	Out	0.00	3,354.54		3,334.02	19.49	19.53	17.41	0.04	3,354.54	3,335.05	3,335.01
7/10/18	15.69	17.45	15.23	1.76	3,371.10	3,355.41	3,353.65		20.94	Out	0.00	3,354.54		3,333.60	20.00	20.01	17.41	0.01	3,354.54	3,334.54	3,334.53
7/17/18	14.70	16.65	15.23	1.95	3,371.10	3,356.40	3,354.45		20.29	Out	0.00	3,354.54		3,334.25	19.30	19.40	17.41	0.10	3,354.54	3,335.24	3,335.14
7/24/18	13.65	17.00	15.23	3.35	3,371.10	3,357.45	3,354.10		20.57	Out	0.00	3,354.54		3,333.97	19.68	19.78	17.41	0.10	3,354.54	3,334.86	3,334.76
8/1/18	14.75	16.74	15.23	1.99	3,371.10	3,356.35	3,354.36		20.03	Out	0.00	3,354.54		3,334.51	19.15	19.25	17.41	0.10	3,354.54	3,335.39	3,335.29
8/7/18	15.55	15.80	15.23	0.25	3,371.10	3,355.55	3,355.30		20.08	Out	0.00	3,354.54		3,334.46	19.22	19.36	17.41	0.14	3,354.54	3,335.32	3,335.18
8/15/18	12.05	12.95	15.23	0.90	3,371.10	3,359.05	3,358.15		20.74	Out	0.00	3,354.54		3,333.80	19.89	19.95	17.41	0.06	3,354.54	3,334.65	3,334.59
8/23/18	11.59	12.85	15.23	1.26	3,371.10	3,359.51	3,358.25		20.34	Out	0.00	3,354.54		3,334.20	19.45	19.59	17.41	0.14	3,354.54	3,335.09	3,334.95
8/29/18	11.80	13.00	15.23	1.20	3,371.10	3,359.30	3,358.10		21.72	Out	0.00	3,354.54		3,332.82	19.85	19.91	17.41	0.06	3,354.54	3,334.69	3,334.63
9/6/18	12.05	13.64	15.23	1.59	3,371.10	3,359.05	3,357.46		19.70	Out	0.00	3,354.54		3,334.84	18.72	18.97	17.41	0.25	3,354.54	3,335.82	3,335.57
9/11/18	11.95	13.30	11.73	1.35	3,371.10	3,359.15	3,357.80		20.25	Out	0.00	3,354.54		3,334.29	19.05	19.19	18.41	0.14	3,354.54	3,335.49	3,335.35
9/18/18	11.90	13.00	11.73	1.10	3,371.10	3,359.20	3,358.10		20.84	Out	0.00	3,354.54		3,333.70	19.90	19.97	18.41	0.07	3,354.54	3,334.64	3,334.57
9/25/18	11.85	13.28	11.73	1.43	3,371.10	3,359.25	3,357.82		19.94	Out	0.00	3,354.54		3,334.60	19.00	19.07	18.41	0.07	3,354.54	3,335.54	3,335.47
10/2/18	12.02	13.15	11.73	1.13	3,371.10	3,359.08	3,357.95		20.28	Out	0.00	3,354.54		3,334.26	19.42	19.48	18.41	0.06	3,354.54	3,335.12	3,335.06
10/10/18	12.00	13.30	11.73	1.30	3,371.10	3,359.10	3,357.80		21.40	Out	0.00	3,354.54		3,333.14	20.45	20.48	18.41	0.03	3,354.54	3,334.09	3,334.06
10/16/18	12.02	13.52	11.73	1.50	3,371.10	3,359.08	3,357.58		22.26	Out	0.00	3,354.54		3,332.28	21.00	21.04	18.41	0.04	3,354.54	3,333.54	3,333.50
10/23/18	11.80	12.85	11.73	1.05	3,371.10	3,359.30	3,358.25		22.74	Out	0.00	3,354.54		3,331.80	21.30	21.36	18.41	0.06	3,354.54	3,333.24	3,333.18
10/30/18	11.12	12.28	11.73	1.16	3,371.10	3,359.98	3,358.82		23.09	Out	0.00	3,354.54		3,331.45	21.65	21.68	18.41	0.03	3,354.54	3,332.89	3,332.86
11/5/18	15.30	15.65	11.73	0.35	3,371.10	3,355.80	3,355.45		23.49	Out	0.00	3,354.54		3,331.05	21.92	21.97	18.41	0.05	3,354.54	3,332.62	3,332.57
11/14/18	14.65	16.40	13.73	1.75	3,372.10	3,357.45	3,355.70		23.98	Out	0.00	3,355.54		3,331.56	22.24	22.29	18.41	0.05	3,355.54	3,333.30	3,333.25
11/19/18	12.65	14.70	13.73	2.05	3,373.10	3,360.45	3,358.40		23.95	Out	0.00	3,356.54		3,332.59	22.32	22.36	18.41	0.04	3,356.54	3,334.22	3,334.18
11/28/18	12.55	14.70	13.73	2.15	3,374.10	3,361.55	3,359.40		24.42	Out	0.00	3,357.54		3,333.12	22.56	22.60	18.41	0.04	3,357.54	3,334.98	3,334.94
12/4/18	13.06	13.60	12.32	0.54	3,375.10	3,362.04	3,361.50		24.58	Out	0.00	3,358.54		3,333.96	22.79	22.90	18.41	0.11	3,358.54	3,335.75	3,335.64
12/14/18	12.77	13.75	12.32	0.98	3,376.10	3,363.33	3,362.35		24.74	Out	0.00	3,359.54		3,334.80	23.00	23.05	18.41	0.05	3,359.54	3,336.54	3,336.49
12/18/18	12.45	13.00	12.32	0.55	3,377.10	3,364.65	3,364.10		24.78	Out	0.00	3,360.54		3,335.76	23.02	23.07	18.41	0.05	3,360.54	3,337.52	3,337.47
12/27/18	12.62	13.38	12.32	0.76	3,378.10	3,365.48	3,364.72		24.90	Out	0.00	3,361.54		3,336.64	23.20	23.25	18.41	0.05	3,361.54	3,338.34	3,338.29

Appendix E.2 - Recovery System Gauging Data

2018 Annual Groundwater Monitoring Report

HollyFrontier Navajo Refining LLC, Artesia Refinery, Artesia, NM

Well	RW-14R							RW-15							RW-19						
Date	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev
12/20/17	19.10	19.97	19.82	0.87	3,352.37	3,333.27	3,332.40		15.09	Out	0.00	3,368.30		3,353.21	23.23	23.55	Out	0.32	3,372.11	3,348.88	3,348.56
1/5/18	19.45	20.10	20.05	0.65	3,352.37	3,332.92	3,332.27		15.30	Out	0.00	3,368.30		3,353.00	23.52	23.60	Out	0.08	3,372.11	3,348.59	3,348.51
1/9/18	19.52	20.00	19.97	0.48	3,352.37	3,332.85	3,332.37		15.31	Out	0.00	3,368.30		3,352.99	23.56	23.78	Out	0.22	3,372.11	3,348.55	3,348.33
1/19/18	19.85	20.00	Out	0.15	3,352.37	3,332.52	3,332.37		15.49	Out	0.00	3,368.30		3,352.81	23.70	23.86	Out	0.16	3,372.11	3,348.41	3,348.25
1/25/18	19.85	20.15	Out	0.30	3,352.37	3,332.52	3,332.22		15.50	Out	0.00	3,368.30		3,352.80	23.90	24.05	Out	0.15	3,372.11	3,348.21	3,348.06
2/1/18	18.70	20.26	20.14	1.56	3,352.37	3,333.67	3,332.11		14.70	Out	0.00	3,368.30		3,353.60	24.12	24.35	Out	0.23	3,372.11	3,347.99	3,347.76
2/6/18	19.95	20.34	Out	0.39	3,352.37	3,332.42	3,332.03		14.69	Out	0.00	3,368.30		3,353.61	24.09	24.22	Out	0.13	3,372.11	3,348.02	3,347.89
2/14/18	20.12	21.35	21.26	1.23	3,352.37	3,332.25	3,331.02		15.00	Out	0.00	3,368.30		3,353.30	24.29	24.49	24.48	0.20	3,372.11	3,347.82	3,347.62
2/20/18	20.05	20.90	20.84	0.85	3,352.37	3,332.32	3,331.47		14.99	Out	0.00	3,368.30		3,353.31	24.29	24.60	24.51	0.31	3,372.11	3,347.82	3,347.51
3/1/18	20.14	21.40	21.3	1.26	3,352.37	3,332.23	3,330.97		16.20	Out	0.00	3,368.30		3,352.10	24.39	24.60	24.6	0.21	3,372.11	3,347.72	3,347.51
3/8/18	20.20	21.32	21.24	1.12	3,352.37	3,332.17	3,331.05		16.35	Out	0.00	3,368.30		3,351.95	24.57	24.75	24.74	0.18	3,372.11	3,347.54	3,347.36
3/15/18	20.23	21.45	21.36	1.22	3,352.37	3,332.14	3,330.92		16.40	Out	0.00	3,368.30		3,351.90	24.61	24.86	24.59	0.25	3,372.11	3,347.50	3,347.25
3/22/18	20.29	21.62	21.52	1.33	3,352.37	3,332.08	3,330.75		16.55	Out	0.00	3,368.30		3,351.75	24.79	25.02	25	0.23	3,372.11	3,347.32	3,347.09
3/28/18	20.39	21.75	21.65	1.36	3,352.37	3,331.98	3,330.62		16.41	Out	0.00	3,368.30		3,351.89	24.79	25.00	24.98	0.21	3,372.11	3,347.32	3,347.11
4/3/18	20.30	22.13	21.99	1.83	3,352.37	3,332.07	3,330.24		16.60	Out	0.00	3,368.30		3,351.70	24.85	25.13	25.11	0.28	3,372.11	3,347.26	3,346.98
4/11/18	20.03	21.34	21.24	1.31	3,352.37	3,332.34	3,331.03		16.75	Out	0.00	3,368.30		3,351.55	24.90	25.09	25.07	0.19	3,372.11	3,347.21	3,347.02
4/18/18	18.90	19.59	19.54	0.69	3,352.37	3,333.47	3,332.78		16.80	Out	0.00	3,368.30		3,351.50	25.15	25.40	25.38	0.25	3,372.11	3,346.96	3,346.71
4/24/18	18.95	19.70	19.64	0.75	3,352.37	3,333.42	3,332.67		20.75	Out	0.00	3,368.30		3,347.55	25.12	25.23	Out	0.11	3,372.11	3,346.99	3,346.88
5/2/18	19.60	19.95	19.93	0.35	3,352.37	3,332.77	3,332.42		16.90	Out	0.00	3,368.30		3,351.40	25.02	25.30	25.28	0.28	3,372.11	3,347.09	3,346.81
5/8/18	20.57	21.39	21.33	0.82	3,352.37	3,331.80	3,330.98		16.90	Out	0.00	3,368.30		3,351.40	25.04	25.29	25.27	0.25	3,372.11	3,347.07	3,346.82
5/23/18	19.85	20.64	20.58	0.79	3,352.37	3,332.52	3,331.73		17.00	Out	0.00	3,368.30		3,351.30	25.20	25.46	25.44	0.26	3,372.11	3,346.91	3,346.65
5/30/18	18.00	19.54	19.42	1.54	3,352.37	3,334.37	3,332.83		17.00	Out	0.00	3,368.30		3,351.30	25.20	25.42	25.41	0.22	3,372.11	3,346.91	3,346.69
6/5/18	17.27	18.83	18.71	1.56	3,352.37	3,335.10	3,333.54		17.25	Out	0.00	3,368.30		3,351.05	25.10	25.35	25.33	0.25	3,372.11	3,347.01	3,346.76
6/12/18	17.33	19.05	18.95	1.72	3,352.37	3,335.04	3,333.32		17.10	Out	0.00	3,368.30		3,351.20	25.15	25.42	25.1	0.27	3,372.11	3,346.96	3,346.69
6/20/18	16.65	18.31	16.33	1.66	3,352.37	3,335.72	3,334.06		17.05	Out	0.00	3,368.30		3,351.25	25.15	25.46	24.55	0.31	3,372.11	3,346.96	3,346.65
6/26/18	17.25	18.94	16.33	1.69	3,352.37	3,335.12	3,333.43		17.05	Out	0.00	3,368.30		3,351.25	25.43	25.80	24.55	0.37	3,372.11	3,346.68	3,346.31
7/3/18	17.28	19.00	16.33	1.72	3,352.37	3,335.09	3,333.37		17.00	Out	0.00	3,368.30		3,351.30	25.00	25.30	24.55	0.30	3,372.11	3,347.11	3,346.81
7/10/18	17.72	19.38	16.33	1.66	3,352.37	3,334.65	3,332.99		16.99	Out	0.00	3,368.30		3,351.31	24.93	25.27	24.55	0.34	3,372.11	3,347.18	3,346.84
7/17/18	17.55	19.35	16.33	1.80	3,352.37	3,334.82	3,333.02		16.87	Out	0.00	3,368.30		3,351.43	24.85	25.20	24.55	0.35	3,372.11	3,347.26	3,346.91
7/24/18	17.79	19.60	16.33	1.81	3,352.37	3,334.58	3,332.77		16.85	Out	0.00	3,368.30		3,351.45	24.77	25.06	24.55	0.29	3,372.11	3,347.34	3,347.05
8/1/18	17.38	19.27	16.33	1.89	3,352.37	3,334.99	3,333.10		16.79	Out	0.00	3,368.30		3,351.51	24.64	24.95	24.55	0.31	3,372.11	3,347.47	3,347.16
8/7/18	17.71	19.45	17.33	1.74	3,352.37	3,334.66	3,332.92		16.70	Out	0.00	3,368.30		3,351.60	24.64	24.86	24.55	0.22	3,372.11	3,347.47	3,347.25
8/15/18	18.10	19.84	17.33	1.74	3,352.37	3,334.27	3,332.53		16.65	Out	0.00	3,368.30		3,351.65	24.49	24.80	24.55	0.31	3,372.11	3,347.62	3,347.31
8/23/18	18.05	19.54	17.33	1.49	3,352.37	3,334.32	3,332.83		16.49	Out	0.00	3,368.30		3,351.81	24.33	24.61	24.55	0.28	3,372.11	3,347.78	3,347.50
8/29/18	18.23	19.69	17.33	1.46	3,352.37	3,334.14	3,332.68	16.42	16.43	Out	0.01	3,368.30	3,351.88	3,351.87	24.35	24.64	24.55	0.29	3,372.11	3,347.76	3,347.47
9/6/18	18.50	18.81	17.33	0.31	3,352.37	3,333.87	3,333.56		16.40	Out	0.00	3,368.30		3,351.90	24.36	24.68	24.55	0.32	3,372.11	3,347.75	3,347.43
9/11/18	17.80	19.05	17.33	1.25	3,352.37	3,334.57	3,333.32		16.40	Out	0.00	3,368.30		3,351.90	24.30	24.51	23.55	0.21	3,372.11	3,347.81	3,347.60
9/18/18	18.16	19.43	17.33	1.27	3,352.37	3,334.21	3,332.94		16.40	Out	0.00	3,368.30		3,351.90	24.25	24.58	23.55	0.33	3,372.11	3,347.86	3,347.53
9/25/18	17.92	19.26	17.33	1.34	3,352.37	3,334.45	3,333.11		16.39	Out	0.00	3,368.30		3,351.91	24.21	24.50	23.55	0.29	3,372.11	3,347.90	3,347.61
10/2/18	17.91	19.17	17.33	1.26	3,352.37	3,334.46	3,333.20	16.40	16.41	Out	0.01	3,368.30	3,351.90	3,351.89	24.25	25.59	23.55	1.34	3,372.11	3,347.86	3,346.52
10/10/18	18.42	20.15	17.33	1.73	3,352.37	3,333.95	3,332.22		16.54	Out	0.00	3,368.30		3,351.76	24.36	24.68	23.55	0.32	3,372.11	3,347.75	3,347.43
10/16/18	18.85	19.94	18.83	1.09	3,352.37	3,333.52	3,332.43		16.45	Out	0.00	3,368.30		3,351.85	24.40	24.73	23.55	0.33	3,372.11	3,347.71	3,347.38
10/23/18	19.04	19.79	18.83	0.75	3,352.37	3,333.33	3,332.58		16.50	Out	0.00	3,368.30		3,351.80	24.28	24.55	23.55	0.27	3,372.11	3,347.83	3,347.56
10/30/18	19.30	19.69	18.83	0.39	3,352.37	3,333.07	3,332.68		15.40	Out	0.00	3,368.30		3,352.90	24.45	24.65	23.55	0.20	3,372.11	3,347.66	3,347.46
11/5/18	19.44	19.75	18.83	0.31	3,352.37	3,332.93	3,332.62	16.35	16.38	Out	0.03	3,368.30	3,351.95	3,351.92	24.38	24.63	23.55	0.25	3,372.11	3,347.73	3,347.48
11/14/18	19.65	20.20	18.83	0.55	3,353.37	3,333.72	3,333.17	16.50	16.55	Out	0.05	3,369.30	3,352.80	3,352.75	24.55	24.80	23.55	0.25	3,373.11	3,348.56	3,348.31
11/19/18	19.75	20.16	18.83	0.41	3,354.37	3,334.62	3,334.21	16.40	16.43	Out	0.03	3,370.30	3,353.90	3,353.87	24.40	24.70	23.55	0.30	3,374.11	3,349.71	3,349.41
11/28/18	19.75	20.60	18.83	0.85	3,355.37	3,335.62	3,334.77	16.47	16.52	Out	0.05	3,371.30	3,354.83	3,354.78	24.50	24.90	23.55	0.40	3,375.11	3,350.61	3,350.21
12/4/18	19.87	21.00	18.83	1.13	3,356.37	3,336.50	3,335.37	16.55	16.64	Out	0.09	3,372.30	3,355.75	3,355.66	24.82	25.00	23.55	0.18	3,376.11	3,351.29	3,351.11
12/14/18	19.92	20.20	18.83	0.28	3,357.37	3,337.45	3,337.17	16.63	16.73	Out	0.10	3,373.30	3,356.67	3,356.57	24.86	25.20	23.55	0.34	3,377.11	3,352.25	3,351.91
12/18/18	19.92	21.40	18.83	1.48	3,358.37	3,338.45	3,336.97	16.63	16.65	Out	0.02	3,374.30	3,357.67	3,357.65	24.65	24.98	24.55	0.33	3,378.11	3,353.46	3,353.13
12/27/18	20.00	21.76	19.83	1.76	3,359.37	3,339.37	3,337.61	16.65	16.75	Out	0.10	3,375.30	3,358.65	3,358.55	25.23	25.57	24.55	0.34	3,379.11	3,353.88	3,353.54

Appendix E.2 - Recovery System Gauging Data

2018 Annual Groundwater Monitoring Report

HollyFrontier Navajo Refining LLC, Artesia Refinery, Artesia, NM

Well	RW-20							RW-22						
Date	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev	Depth to PSH	Depth to Water	Product Pump	PSH Thickness	TOC Elev	PSH Elev	Water Elev
12/20/17	20.3	20.3	16	0.05	3,351.44	3,331.19	3,331.14	21.99	22.46	21.99	0.47	3,352.21	3,330.22	3,329.75
1/5/18	20.0	20.1	16	0.05	3,351.44	3,331.44	3,331.39	22.85	23.20	23.18	0.35	3,352.21	3,329.36	3,329.01
1/9/18	20.0	20.0	16	0.04	3,351.44	3,331.44	3,331.40	23	23.39	23.36	0.39	3,352.21	3,329.21	3,328.82
1/19/18	20.0	20.1	16	0.05	3,351.44	3,331.44	3,331.39	23.36	23.94	Out	0.58	3,352.21	3,328.85	3,328.27
1/25/18	20.0	20.0	16	0.00	3,351.44	3,331.44	3,331.44	23.6	24.04	Out	0.44	3,352.21	3,328.61	3,328.17
2/1/18	20.0	20.0	16	0.00	3,351.44	3,331.44	3,331.44	23.85	24.33	24.3	0.48	3,352.21	3,328.36	3,327.88
2/6/18		0.0	16	0.00	3,351.44		3,351.44	24	24.45	Out	0.45	3,352.21	3,328.21	3,327.76
2/14/18		0.0	16	0.00	3,351.44		3,351.44	24.15	24.81	24.76	0.66	3,352.21	3,328.06	3,327.40
2/20/18		20.2	16	0.00	3,351.44		3,331.24	24.29	25.45	25.36	1.16	3,352.21	3,327.92	3,326.76
3/1/18		20.3	16	0.00	3,351.44		3,331.14	24.50	25.79	25.69	1.29	3,352.21	3,327.71	3,326.42
3/8/18		20.3	16	0.00	3,351.44		3,331.14	24.47	26.00	25.88	1.53	3,352.21	3,327.74	3,326.21
3/15/18		20.4	16	0.00	3,351.44		3,331.09	24.52	26.39	26.25	1.87	3,352.21	3,327.69	3,325.82
3/22/18		20.2	16	0.00	3,351.44		3,331.25	25.15	25.27	25.26	0.12	3,352.21	3,327.06	3,326.94
3/28/18		20.2	16	0.00	3,351.44		3,331.24	25.11	25.34	25.32	0.23	3,352.21	3,327.10	3,326.87
4/3/18		20.3	16	0.00	3,351.44		3,331.19	25.24	25.30	25.32	0.06	3,352.21	3,326.97	3,326.91
4/11/18		20.4	16	0.00	3,351.44		3,331.04	24.35	24.36	Out	0.01	3,352.21	3,327.86	3,327.85
4/18/18	18.8	19.0	16	0.15	3,351.44	3,332.64	3,332.49	26.40	26.79	26.76	0.39	3,352.21	3,325.81	3,325.42
4/24/18		20.8	16	0.00	3,351.44		3,330.69	26.20	26.21	Out	0.01	3,352.21	3,326.01	3,326.00
5/2/18		20.7	16	0.00	3,351.44		3,330.71	22.38	22.39	Out	0.01	3,352.21	3,329.83	3,329.82
5/8/18		19.7	16	0.00	3,351.44		3,331.74	22.05	22.16	Out	0.11	3,352.21	3,330.16	3,330.05
5/23/18		20.5	16	0.00	3,351.44		3,330.91	18.90	19.07	19.06	0.17	3,352.21	3,333.31	3,333.14
5/30/18	19.6	19.7	16	0.08	3,351.44	3,331.87	3,331.79	19.55	19.79	19.78	0.24	3,352.21	3,332.66	3,332.42
6/5/18	21.0	21.0	16	0.04	3,351.44	3,330.49	3,330.45	17.60	17.73	17.72	0.13	3,352.21	3,334.61	3,334.48
6/12/18		20.4	16	0.00	3,351.44		3,331.04	17.66	17.82	17.81	0.16	3,352.21	3,334.55	3,334.39
6/20/18	14.2	14.4	16	0.20	3,351.44	3,337.29	3,337.09	16.63	16.78	16	0.15	3,352.21	3,335.58	3,335.43
6/26/18		17.4	16	0.00	3,351.44		3,334.04	18.07	18.23	16	0.16	3,352.21	3,334.14	3,333.98
7/3/18	15.1	15.2	16	0.08	3,351.44	3,336.34	3,336.26	17.39	17.43	16	0.04	3,352.21	3,334.82	3,334.78
7/10/18	15.8	18.9	16	3.07	3,351.44	3,335.64	3,332.57	18.51	18.57	16	0.06	3,352.21	3,333.70	3,333.64
7/17/18	16.8	16.8	16	0.08	3,351.44	3,334.68	3,334.60	17.30	17.35	16	0.05	3,352.21	3,334.91	3,334.86
7/24/18	19.1	19.2	16	0.06	3,351.44	3,332.30	3,332.24	18.33	18.38	16	0.05	3,352.21	3,333.88	3,333.83
8/1/18	14.8	14.9	16	0.05	3,351.44	3,336.64	3,336.59	16.87	16.90	16	0.03	3,352.21	3,335.34	3,335.31
8/7/18	15.2	15.3	16	0.10	3,351.44	3,336.21	3,336.11	17.81	17.85	16	0.04	3,352.21	3,334.40	3,334.36
8/15/18	16.0	16.1	16	0.10	3,351.44	3,335.44	3,335.34	18.76	18.82	16	0.06	3,352.21	3,333.45	3,333.39
8/23/18	15.5	15.6	16	0.10	3,351.44	3,335.99	3,335.89	17.79	17.80	16	0.01	3,352.21	3,334.42	3,334.41
8/29/18	17.4	17.4	16	0.05	3,351.44	3,334.09	3,334.04	18.61	18.65	16	0.04	3,352.21	3,333.60	3,333.56
9/6/18	19.6	19.8	16	0.17	3,351.44	3,331.81	3,331.64	17.00	17.02	16	0.02	3,352.21	3,335.21	3,335.19
9/11/18	19.6	19.7	16	0.09	3,351.44	3,331.84	3,331.75	17.74	17.75	16	0.01	3,352.21	3,334.47	3,334.46
9/18/18	19.6	19.7	16	0.05	3,351.44	3,331.84	3,331.79	18.80	18.84	16	0.04	3,352.21	3,333.41	3,333.37
9/25/18	19.7	19.8	16	0.04	3,351.44	3,331.73	3,331.69		17.30	16	0.00	3,352.21		3,334.91
10/2/18	19.8	19.8	16	0.05	3,351.44	3,331.69	3,331.64		18.05	16	0.00	3,352.21		3,334.16
10/10/18	19.9	20.0	16	0.15	3,351.44	3,331.59	3,331.44	19.40	19.41	16	0.01	3,352.21	3,332.81	3,332.80
10/16/18	20.0	20.0	16	0.04	3,351.44	3,331.45	3,331.41	20.15	20.20	16	0.05	3,352.21	3,332.06	3,332.01
10/23/18	20.0	20.0	16	0.05	3,351.44	3,331.49	3,331.44	20.64	20.75	16	0.11	3,352.21	3,331.57	3,331.46
10/30/18	20.0	20.0	16	0.08	3,351.44	3,331.49	3,331.41	21.17	21.24	16	0.07	3,352.21	3,331.04	3,330.97
11/5/18	20.0	20.0	16	0.07	3,351.44	3,331.49	3,331.42	21.69	21.77	16	0.08	3,352.21	3,330.52	3,330.44
11/14/18	20.0	20.1	16	0.15	3,352.44	3,332.49	3,332.34	22.43	22.50	16	0.07	3,353.21	3,330.78	3,330.71
11/19/18	20.1	20.1	16	0.05	3,353.44	3,333.39	3,333.34	22.65	22.75	16	0.10	3,354.21	3,331.56	3,331.46
11/28/18	19.9	20.0	16	0.09	3,354.44	3,334.53	3,334.44	23.11	23.20	16	0.09	3,355.21	3,332.10	3,332.01
12/4/18	21.2	21.3	16	0.10	3,355.44	3,334.26	3,334.16	23.53	23.60	16	0.07	3,356.21	3,332.68	3,332.61
12/14/18	20.6	20.7	16	0.10	3,356.44	3,335.83	3,335.73	23.81	24.00	16	0.19	3,357.21	3,333.40	3,333.21
12/18/18	20.7	20.8	16	0.05	3,357.44	3,336.74	3,336.69	23.97	24.17	16	0.20	3,358.21	3,334.24	3,334.04
12/27/18	20.7	20.8	16	0.05	3,358.44	3,337.74	3,337.69	24.35	24.50	23.5	0.15	3,359.21	3,334.86	3,334.71