

February 21, 2018 Reference No. 11135250-7

Mr. Dean Ericson ETC Field Services LLC 600 N. Marienfeld Suite 700 Midland, TX 79701

Dear Mr. Ericson:

Re: Remediation Summary Report

2A-20" (1 RP-4735) ETC Field Services LLC

Site Location: Unit J, Section 32, Township 23-South, Range 37-East

(Lat 32.25972N°, Long -103.18139W°)

Lea County, New Mexico

GHD Services, Inc. (GHD) is pleased to present this report for the above referenced site. The 2A-20" (hereafter referred to as the "Site") is located within Unit J, Section 32, Township 23 South, Range 37 East, in Lea County, New Mexico (see Figure 1). The property is owned by the New Mexico State Land Office (NMSLO).

A release of an unknown quantity of natural gas and oil was reported to the State of New Mexico Oil Conservation Division (NMOCD) on June 21, 2017 via Form C-141. Corrosion caused an approximate 2-inch by 8-inch hole to develop on a section of the pipeline. Twelve barrels of the fluids were recovered with a vacuum truck. Contaminated soils were excavated and stockpiled on site (see Figure 2). NMOCD release number 1RP-4735 was assigned.

1. Recommended Remediation Action Limit

Based on information available from the New Mexico Office of the State Engineer New Mexico Water Rights Reporting System website, the closest well with a recorded depth to water is approximately 0.5 mile from the Site. The depth to groundwater measured in this well was 103 feet below ground surface (ft bgs).

Based on information available from the United States Geologic Survey (USGS) National Water Information System, the depth to groundwater at the Site is approximately 111 ft bgs. This is based on a water well that is located approximately 2 miles east, southeast of the Site (see Appendix A, Water Well Reports for depth to water). In addition to the USGS identified well, GHD performs groundwater monitoring at a site that is located approximately 0.8 mile to the east. Depth to water at that site is approximately 112 ft bgs.





There are no well head protection areas or surface water bodies within 1000 feet of the Site. Therefore, the preliminary total ranking score is 0.

Based on this score, the applicable NMOCD Site specific Recommended Remediation Action Limits (RRALs) are 10 milligrams per kilogram (mg/kg) for benzene, 50 mg/kg for total benzene, toluene, ethylbenzene, and xylenes (BTEX), 5,000 mg/kg for total petroleum hydrocarbons (TPH), and 600 mg/kg for chlorides.

New Mexico Oil Conservation Division Site Assessment								
Ranking Criteria	Score							
Depth to Ground Water (>100 ft bgs)	0							
Wellhead Protection Area (>1000 ft from water source, > 200 ft from domestic source)	0							
Distance to Surface Body Water (>1000 ft)	0							
Ranking Criteria Total Score	0*							
*Because the ranking criteria total score is 0, NMOCD established RRALs are 10 mg/kg for benzene, 50 mg/kg for total BTEX, 5,000 mg/kg for total TPH and 600 ppm for chlorides ¹ .								

1. NMOCD Guidelines for Remediation of Leaks, Spills and Releases, August 13, 1993 and recent discussions with Mr. Jim Griswold with the NMOCD.

2. Assessment Activities

The impacted area had initially been excavated to a depth of approximately 6 ft bgs and the soils stockpiled on site. Following the release, GHD's Site assessment activities began with initial background soil sampling and analysis and limited excavation on July 27, 2017. Initial assessment activities were performed by excavating test pits and field screening the soil using the PetroFLAG Hydrocarbon Analysis System and a Hach chloride field kit. Soil samples were collected from the base of the excavation (TP-5) and four test pits (TP-1 through TP-4). Excavation activities were performed by Diamondback Disposal Services, Inc. of Hobbs, New Mexico (Diamondback).

The soil samples were collected by GHD and analyzed by Hall Environmental Analysis Laboratory (HEAL) of Albuquerque, New Mexico The soil samples were submitted for laboratory analysis of benzene, toluene, ethylbenzene, and xylenes (BTEX) by EPA Method 8021B, total petroleum hydrocarbons (TPH) by EPA Method 8015 full range and chloride by EPA Method 300.0 (Table 1).

BTEX was not detected above the laboratory reporting limit (LRL) in any of the samples, total TPH concentrations ranged from below the LRL to 450 mg/kg, and chloride concentrations ranged from below the LRL to 72 mg/kg. The highest detected concentrations were found in the sample collected from TP-5. Laboratory analytical data can be found summarized in Table 1 and Figure 2 and the laboratory report can be found in Appendix B.



None of the samples analyzed contained concentrations exceeding the RRALs for the constituents that were analyzed.

An additional assessment was performed by GHD on October 10, 2017 that included hand auguring at five points (HA-1 through HA-5) closer to the release area. Samples were collected from a depth of 6 inches bgs and submitted to HEAL for BTEX, TPH, and chloride analyses. TPH concentrations in two of the sample locations, HA-2 and HA-3, exceeded the RRAL with concentrations of 11,680 and 20,540 mg/kg, respectively. All other detected concentrations were below the RRALs.

Additional excavation was performed by Diamondback in the areas of HA-2 and HA-3. GHD collected two additional soil samples from these areas on December 21, 2018 following the removal of the impacted soil. One sample, BB-1, was collected near HA-2 at a depth of 2.5 ft. bgs and BB-2 was collected near HA-3 at a depth of 3.5 ft. bgs. The samples were submitted to HEAL for TPH and chloride analyses. Both total TPH and chloride concentrations were below the RRALs for both samples.

3. Summary and Recommendations

Based on the assessment and excavation activities, it appears that the horizontal and vertical extent of hydrocarbon and chloride impacted soil has been assessed and the impacted soils removed. The soil sample collected from the base of the excavation at a depth of 6 ft bgs (see Figure 2) was submitted for laboratory analysis. The laboratory analytical results are below the RRALs for the constituents that were analyzed. The two areas containing TPH concentrations above the RRAL were excavated and resampled. All detected concentrations were below the RRALs.

Based on the laboratory results, GHD recommends backfilling the excavation with clean fill material and wheel compacting to grade. Following completion of the backfilling, revegetation of the Site will be performed. Disturbed areas associated with the remediation efforts will be re-seeded. If, after one growing season, the vegetation has not taken hold, seeding may need to be repeated until revegetation is successful, as determined by the State Land Office. The seed will be planted utilizing a drill. The proposed seed mix will consist of Bureau of Land Management mix #2 with no love grass.

The Site will be visited on a quarterly basis to assess the establishment of vegetative growth. Staff personnel performing the site visit will also look for the presence of noxious weeds at the Site as indicated on the New Mexico Noxious Weeds List specified on the United States Department of Agriculture website. If a noxious weed is observed at the Site, the New Mexico State Land Office will be contacted to determine the most effective manner to eradicate it.



Following completion of the above activities, a request for no further action will be made for the Site. Should you have any questions, or require additional information regarding this submittal, please feel free to contact myself or Bernie Bockisch at (505) 884-0672.

Bernard Bockisch

New Mexico Operations Manager

Sincerely,

GHD

Alan Brandon

Senior Project Manager

AK Brand

AB/pd/01

Attachments: Figure 1

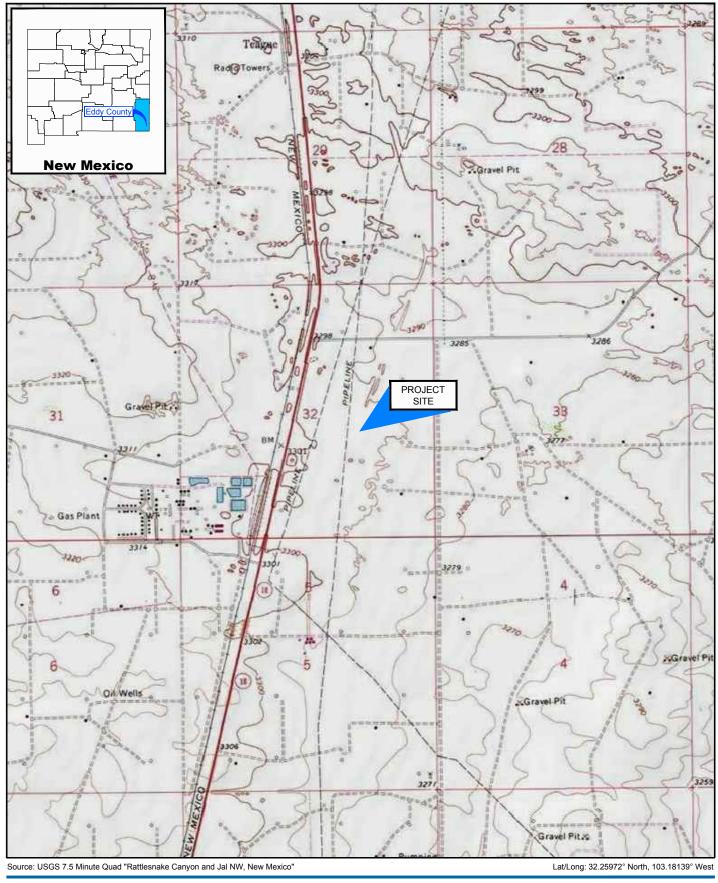
Figure 2

Table 1 – Soil Analytical Results Summary

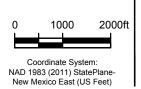
Appendix A - Water Well Reports

Appendix B - Certified Laboratory Report

Figures



1 .



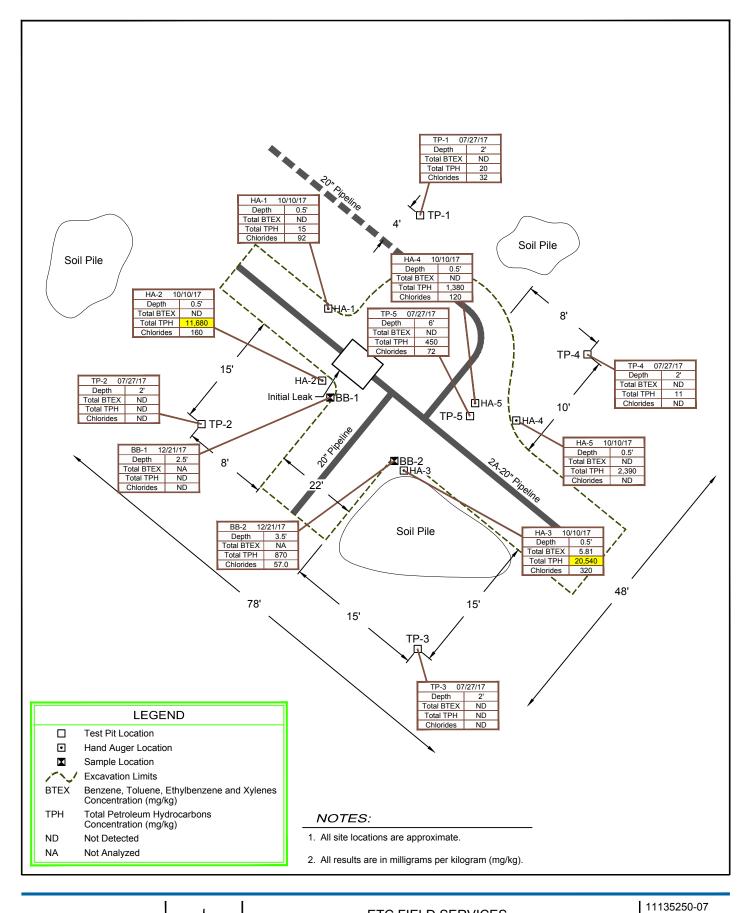


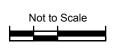


ETC FIELD SERVICES LEA COUNTY, NEW MEXICO 2A-20" 11135250-07 Aug 23, 2017

SITE LOCATION MAP

FIGURE 1









ETC FIELD SERVICES LEA COUNTY, NEW MEXICO 2A-20"

Feb 7, 2018

SOIL SAMPLE LOCATION

FIGURE 2

Tables

Table 1

ETC Field Services LLC - 2A-20" Section 32, Township 23 South, Range 37 East Lea County, New Mexico Soil Analytical Results Summary

Sample ID	Date	Sample Depth	Chlorides	Benzene	Toluene	Ethylbenzene	Xylenes	Total BTEX	ТРН	ТРН	ТРН	Total TPH
		(ft.)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	GRO (C6-C-10)	DRO (C10-C28)	MRO (C28-C36)	GRO/DRO/MRO
									(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)
NMOCD Remediation	n Action Levels		600	10	NE	NE	NE	50	NE	NE	NE	5,000
SOIL SAMPLES												
S11135250-07-072717-MG-TP-1-2	7/27/2017	2	32	< 0.024	< 0.047	< 0.047	< 0.095	<0.213	<4.7	20	<49	20
S11135250-07-072717-MG-TP-2-2	7/27/2017	2	<30	< 0.023	< 0.047	< 0.047	< 0.093	< 0.210	<4.7	<9.8	<49	<63.5
S11135250-07-072717-MG-TP-3-2	7/27/2017	2	<30	< 0.024	<0.048	<0.048	< 0.097	< 0.217	<4.8	<9.5	<48	<62.3
S11135250-07-072717-MG-TP-4-2	7/27/2017	2	<30	< 0.024	<0.048	<0.048	< 0.095	< 0.215	<4.8	11	<51	11
S11135250-07-072717-MG-TP-5-6	7/27/2017	6	72	< 0.024	<0.048	<0.048	< 0.097	<0.217	<4.8	160	290	450
S-11135250-07-101017-MG-HA-1	10/10/2017	0.5	92	< 0.024	< 0.049	< 0.049	< 0.097	<0.219	<4.9	15	<50	15
S-11135250-07-101017-MG-HA-2	10/10/2017	0.5	160	< 0.023	< 0.046	< 0.046	< 0.093	<0.208	80.0	8,400	3,200	11,680
S-11135250-07-101017-MG-HA-3	10/10/2017	0.5	320	< 0.050	0.11	0.9	4.8	5.81	140.0	13,000	7,400	20,540
S-11135250-07-101017-MG-HA-4	10/10/2017	0.5	120	< 0.024	<0.048	<0.048	< 0.097	<0.217	<4.8	790	590	1,380
S-11135250-07-101017-MG-HA-5	10/10/2017	0.5	<30	< 0.024	<0.048	<0.048	< 0.097	< 0.217	<4.8	1,400	990	2,390
11135250-07-122117-BB-1	12/21/2017	2.5	<30	NA	NA	NA	NA	NA	<4.9	<10	<50	<64.9
11135250-07-122117-BB-2	12/21/2017	3.5	57.0	NA	NA	NA	NA	NA	<4.8	470	400	870

Note: Concentrations in yellow exceed the NMOCD Remediation Action Level

NE = Not Established mg/Kg = milligrams per Kilogram NA = Not Analyzed

Appendix A Water Well Reports



USGS Home Contact USGS Search USGS

National Water Information System: Web Interface

140 FIGHT AAUCE THOUSIGH F	Marcilli AACD TI	ice i ace	
<u>USGS Water Resources</u>	Data Category: Groundwater	Geographic Area: United States	∨ GO
Click to hideNews Bulletins	2A-20	11 N2 miles	5,52
Please see news on new form. • Full News	ats ~ . \	U ~ 0.8 mile	east, NE
Groundwater levels for the Nation Search Results 1 sites fo	<u> </u>	De ~ 115	

• 321345103111001

Minimum number of levels = 1

Save file of selected sites to local disk for future upload

site_no list =

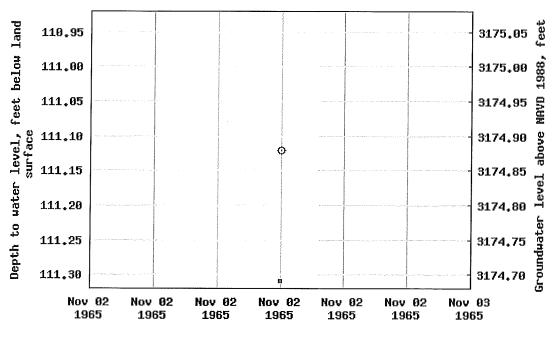
USGS 321345103111001 24S.37E.08.14232

Available data for this site	Groundwater: Field measurements	~	GO	
Lea County, New Mexico			ıJ	
Hydrologic Unit Code 1307	0007			
Latitude 32°13'45", Longit	tude 103°11'10" NAD27			
Land-surface elevation 3,2	86 feet above NAVD88			
The depth of the well is 18	5 feet below land surface.			
This well is completed in th	ne Alluvium, Bolson Deposits	and	Other	Surface

Deposits (110AVMB) local aquifer.

Output formuts								
<u>Table of data</u>								
Tab-separated data								
Graph of data								
Reselect period								

USGS 321345103111001 245,37E,08,14232



Period of approved data

Breaks in the plot represent a gap of at least one year between field measurements.

Download a presentation-quality graph

Questions about sites/data? Feedback on this web site Automated retrievals

<u>Help</u>

Data Tips

Explanation of terms

Subscribe for system changes

News

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FOIA

Privacy

Policies and Notices

U.S. Department of the Interior | U.S. Geological Survey

Title: Groundwater for USA: Water Levels

URL: https://nwis.waterdata.usgs.gov/nwis/gwlevels?

Page Contact Information: <u>USGS Water Data Support Team</u>

Page Last Modified: 2017-06-30 09:02:33 EDT

0.57 0.49 nadww01





New Mexico Office of the State Engineer Water Column/Average Depth to Water

(A CLW##### in the POD suffix indicates the POD has been replaced & no longer serves a water right file.)

(R=POD has been replaced, O=orphaned,

C=the file is closed)

(quarters are 1=NW 2=NE 3=SW 4=SE)

(quarters are smallest to largest)

(NAD83 UTM in meters)

(In feet)

		POD Sub-		Q	Q	Q									Water
POD Number	Code	basin (County	64	16	4 5	Sec	Tws	Rng	Х	Υ	Distance	DepthWellD	epthWater (Column
CP 00347 POD1		CP	LE	3	2	3	33	23S	37E	672276	3570517*	604	103		
CP 00350 POD1		CP	LE	3	2	2	32	238	37E	671458	3571309*	780	7		
CP 01431 POD10		CP	LE	3	3	4	32	238	37E	671011	3570036	842	189	103	86
CP 01431 POD9		CP	LE	2	4	3	32	238	37E	670866	3570255	861	189	111	78
CP 00354 POD1		CP	LE	3	1	2	32	238	37E	671056	3571302*	965	125		
CP 00037 POD3		CP	LE		4	3 :	32	238	37E	670775	3570189*	970	179	106	73
CP 00037 POD5		CP	LE		4	3 ;	32	238	37E	670775	3570189*	970	153		
CP 00037 POD5	R	CP	LE		4	3 :	32	238	37E	670775	3570189*	970	153		

Average Depth to Water:

106 feet

Minimum Depth:

103 feet

Maximum Depth:

111 feet

Record Count:8

Basin/County Search:

Basin: Capitan

County: Lea

UTMNAD83 Radius Search (in meters):

Easting (X): 671672.49

Northing (Y): 3570558,96

Radius: 1000

*UTM location was derived from PLSS - see Help

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, or suitability for any particular purpose of the data.

8/16/17 9:45 AM

WATER COLUMN/ AVERAGE DEPTH TO WATER

Appendix B Certified Laboratory Report



Hall Environmental Analysis Laboratory 4901 Hawkins NE Albuquerque, NM 87109 TEL: 505-345-3975 FAX: 505-345-4107 Website: www.hallenvironmental.com

August 05, 2017

Bernie Bockish GHD 6121 Indian School Road, NE #200 Albuquerque, NM 87110 TEL: (505) 884-0672

FAX

RE: 2A-20 OrderNo.: 1707E88

Dear Bernie Bockish:

Hall Environmental Analysis Laboratory received 5 sample(s) on 7/28/2017 for the analyses presented in the following report.

These were analyzed according to EPA procedures or equivalent. To access our accredited tests please go to www.hallenvironmental.com or the state specific web sites. In order to properly interpret your results, it is imperative that you review this report in its entirety. See the sample checklist and/or the Chain of Custody for information regarding the sample receipt temperature and preservation. Data qualifiers or a narrative will be provided if the sample analysis or analytical quality control parameters require a flag. When necessary, data qualifiers are provided on both the sample analysis report and the QC summary report, both sections should be reviewed. All samples are reported, as received, unless otherwise indicated. Lab measurement of analytes considered field parameters that require analysis within 15 minutes of sampling such as pH and residual chlorine are qualified as being analyzed outside of the recommended holding time.

Please don't hesitate to contact HEAL for any additional information or clarifications.

ADHS Cert #AZ0682 -- NMED-DWB Cert #NM9425 -- NMED-Micro Cert #NM0190

Sincerely,

Andy Freeman

Laboratory Manager

andyl

4901 Hawkins NE

Albuquerque, NM 87109

Lab Order: **1707E88**

Date Reported: 8/5/2017

Hall Environmental Analysis Laboratory, Inc.

CLIENT: GHD Lab Order: 1707E88

Project: 2A-20

Lab ID: 1707E88-001 **Collection Date:** 7/27/2017 10:40:00 AM

Client Sample ID: S1113525007-072717MGTP1-2' Matrix: SOIL

Result	PQL Qu	al Units	DF	Date Analyzed	Batch ID			
				Ana	lyst: MRA			
32	30	mg/Kg	20	8/3/2017 2:38:18 PM	M 33153			
ORGANICS	3			Ana	lyst: TOM			
20	9.8	mg/Kg	1	8/2/2017 2:07:40 PM	M 33114			
ND	49	mg/Kg	1	8/2/2017 2:07:40 PM	M 33114			
79.0	70-130	%Rec	1	8/2/2017 2:07:40 PM	M 33114			
E				Ana	lyst: NSB			
ND	4.7	mg/Kg	1	8/2/2017 4:58:02 PM	M 33109			
90.7	54-150	%Rec	1	8/2/2017 4:58:02 PM	M 33109			
				Ana	lyst: NSB			
ND	0.095	mg/Kg	1	8/2/2017 4:58:02 PM	M 33109			
ND	0.024	mg/Kg	1	8/2/2017 4:58:02 PM	M 33109			
ND	0.047	mg/Kg	1	8/2/2017 4:58:02 PM	M 33109			
ND	0.047	mg/Kg	1	8/2/2017 4:58:02 PM	M 33109			
ND	0.095	mg/Kg	1	8/2/2017 4:58:02 PM	M 33109			
111	66.6-132	%Rec	1	8/2/2017 4:58:02 PM	M 33109			
	32 20 ND 79.0 E ND 90.7 ND ND ND ND ND ND ND	32 30 30 9.8 A ORGANICS 20 9.8 ND 49 79.0 70-130 E ND 4.7 90.7 54-150 ND 0.095 ND 0.024 ND 0.047 ND 0.047 ND 0.095	32 30 mg/Kg ORGANICS 20 9.8 mg/Kg ND 49 mg/Kg 79.0 70-130 %Rec E ND 4.7 mg/Kg 90.7 54-150 %Rec ND 0.095 mg/Kg ND 0.024 mg/Kg ND 0.047 mg/Kg ND 0.047 mg/Kg ND 0.047 mg/Kg ND 0.047 mg/Kg	32 30 mg/Kg 20 CORGANICS 20 9.8 mg/Kg 1 ND 49 mg/Kg 1 79.0 70-130 %Rec 1 E ND 4.7 mg/Kg 1 90.7 54-150 %Rec 1 ND 0.095 mg/Kg 1 ND 0.024 mg/Kg 1 ND 0.047 mg/Kg 1	Ana 32 30 mg/Kg 20 8/3/2017 2:38:18 Pl CORGANICS Ana 20 9.8 mg/Kg 1 8/2/2017 2:07:40 Pl ND 49 mg/Kg 1 8/2/2017 2:07:40 Pl 79.0 70-130 %Rec 1 8/2/2017 2:07:40 Pl 79.0 70-130 %Rec 1 8/2/2017 2:07:40 Pl 79.0 70-130 %Rec 1 8/2/2017 4:58:02 Pl 90.7 54-150 %Rec 1 8/2/2017 4:58:02 Pl 90.7 54-150 mg/Kg 1 8/2/2017 4:58:02 Pl ND 0.095 mg/Kg 1 8/2/2017 4:58:02 Pl ND 0.047 mg/Kg 1 8/2/2017 4:58:02 Pl ND 0.095 mg/Kg 1 8/2/2017 4:58:02 Pl			

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
 - S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits Page 1 of 10
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Lab Order: **1707E88**Date Reported: **8/5/2017**

Hall Environmental Analysis Laboratory, Inc.

CLIENT: GHD Lab Order: 1707E88

Project: 2A-20

Lab ID: 1707E88-002 **Collection Date:** 7/27/2017 10:50:00 AM

Client Sample ID: S1113525007-072717MGTP2-2' Matrix: SOIL

Result	PQL Qu	al Units	DF	Date Analyzed	Batch ID			
				Ana	lyst: MRA			
ND	30	mg/Kg	20	8/3/2017 3:15:32 PM	M 33153			
ORGANICS	3			Ana	lyst: TOM			
ND	9.8	mg/Kg	1	8/2/2017 1:24:00 PM	M 33114			
ND	49	mg/Kg	1	8/2/2017 1:24:00 PM	M 33114			
70.1	70-130	%Rec	1	8/2/2017 1:24:00 PM	M 33114			
E				Ana	lyst: NSB			
ND	4.7	mg/Kg	1	8/2/2017 5:22:07 PM	M 33109			
89.0	54-150	%Rec	1	8/2/2017 5:22:07 PM	M 33109			
				Ana	lyst: NSB			
ND	0.093	mg/Kg	1	8/2/2017 5:22:07 PM	M 33109			
ND	0.023	mg/Kg	1	8/2/2017 5:22:07 PM	M 33109			
ND	0.047	mg/Kg	1	8/2/2017 5:22:07 PM	M 33109			
ND	0.047	mg/Kg	1	8/2/2017 5:22:07 PM	M 33109			
ND	0.093	mg/Kg	1	8/2/2017 5:22:07 PM	M 33109			
104	66.6-132	%Rec	1	8/2/2017 5:22:07 PM	M 33109			
	ND ORGANICS ND ND 70.1 E ND 89.0 ND	ND 30 ORGANICS ND 9.8 ND 49 70.1 70-130 E ND 4.7 89.0 54-150 ND 0.093 ND 0.023 ND 0.023 ND 0.047 ND 0.047 ND 0.093	ND 30 mg/Kg ORGANICS ND 9.8 mg/Kg ND 49 mg/Kg 70.1 70-130 %Rec E ND 4.7 mg/Kg 89.0 54-150 %Rec ND 0.093 mg/Kg ND 0.023 mg/Kg ND 0.047 mg/Kg ND 0.047 mg/Kg ND 0.047 mg/Kg ND 0.047 mg/Kg	ND 30 mg/Kg 20 ORGANICS ND 9.8 mg/Kg 1 ND 49 mg/Kg 1 70.1 70-130 %Rec 1 E ND 4.7 mg/Kg 1 89.0 54-150 %Rec 1 ND 0.093 mg/Kg 1 ND 0.023 mg/Kg 1 ND 0.047 mg/Kg 1 ND 0.047 mg/Kg 1 ND 0.047 mg/Kg 1 ND 0.047 mg/Kg 1	Ana ND 30 mg/Kg 20 8/3/2017 3:15:32 Pf ORGANICS ND 9.8 mg/Kg 1 8/2/2017 1:24:00 Pf ND 49 mg/Kg 1 8/2/2017 1:24:00 Pf 70.1 70-130 %Rec 1 8/2/2017 1:24:00 Pf 89.0 54-150 %Rec 1 8/2/2017 5:22:07 Pf 89.0 54-150 %Rec 1 8/2/2017 5:22:07 Pf ND 0.093 mg/Kg 1 8/2/2017 5:22:07 Pf ND 0.047 mg/Kg 1 8/2/2017 5:22:07 Pf ND 0.093 mg/Kg 1 8/2/2017 5:22:07 Pf ND 0.093 mg/Kg 1 8/2/2017 5:22:07 Pf			

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits Page 2 of 10
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Lab Order: **1707E88**

Hall Environmental Analysis Laboratory, Inc. Date Reported: 8/5/2017

CLIENT: GHD Lab Order: 1707E88

Project: 2A-20

Lab ID: 1707E88-003 **Collection Date:** 7/27/2017 11:30:00 AM

Client Sample ID: S1113525007-072717MGTP3-2' Matrix: SOIL

11101132	Translation BOIL								
Result	PQL Qu	al Units	DF	Date Analyzed	Batch ID				
				Ana	lyst: MRA				
ND	30	mg/Kg	20	8/3/2017 3:52:45 PI	M 33153				
ORGANICS	3			Ana	lyst: TOM				
ND	9.5	mg/Kg	1	8/2/2017 1:45:20 PI	M 33114				
ND	48	mg/Kg	1	8/2/2017 1:45:20 PI	M 33114				
97.4	70-130	%Rec	1	8/2/2017 1:45:20 PI	M 33114				
E				Ana	lyst: NSB				
ND	4.8	mg/Kg	1	8/2/2017 5:46:14 PI	M 33109				
90.6	54-150	%Rec	1	8/2/2017 5:46:14 PI	M 33109				
				Ana	lyst: NSB				
ND	0.097	mg/Kg	1	8/2/2017 5:46:14 PI	M 33109				
ND	0.024	mg/Kg	1	8/2/2017 5:46:14 PI	M 33109				
ND	0.048	mg/Kg	1	8/2/2017 5:46:14 PI	M 33109				
ND	0.048	mg/Kg	1	8/2/2017 5:46:14 PI	M 33109				
ND	0.097	mg/Kg	1	8/2/2017 5:46:14 PI	M 33109				
109	66.6-132	%Rec	1	8/2/2017 5:46:14 PI	M 33109				
	ND FORGANICS ND ND 97.4 E ND 90.6 ND	Result PQL Que ND 30 E ORGANICS ND 9.5 ND 48 97.4 70-130 E ND 4.8 90.6 54-150 ND 0.097 ND 0.024 ND 0.048 ND 0.048 ND 0.048 ND 0.097	Result PQL Qual Units ND 30 mg/Kg E ORGANICS mg/Kg mg/Kg ND 48 mg/Kg 97.4 70-130 %Rec E ND 4.8 mg/Kg 90.6 54-150 %Rec ND 0.097 mg/Kg ND 0.024 mg/Kg ND 0.048 mg/Kg ND 0.048 mg/Kg ND 0.048 mg/Kg ND 0.097 mg/Kg ND 0.097 mg/Kg	Result PQL Qual Units DF ND 30 mg/Kg 20 EORGANICS mg/Kg 1 ND 48 mg/Kg 1 97.4 70-130 %Rec 1 E ND 4.8 mg/Kg 1 90.6 54-150 %Rec 1 ND 0.097 mg/Kg 1 ND 0.024 mg/Kg 1 ND 0.048 mg/Kg 1 ND 0.097 mg/Kg 1 ND 0.097 mg/Kg 1	Result PQL Qual Units DF Date Analyzed ND 30 mg/Kg 20 8/3/2017 3:52:45 Pl E ORGANICS Ana ND 9.5 mg/Kg 1 8/2/2017 1:45:20 Pl ND 48 mg/Kg 1 8/2/2017 1:45:20 Pl 97.4 70-130 %Rec 1 8/2/2017 1:45:20 Pl E Ana ND 4.8 mg/Kg 1 8/2/2017 5:46:14 Pl 90.6 54-150 %Rec 1 8/2/2017 5:46:14 Pl ND 0.097 mg/Kg 1 8/2/2017 5:46:14 Pl ND 0.048 mg/Kg 1 8/2/2017 5:46:14 Pl				

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits Page 3 of 10
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Lab Order: **1707E88**Date Reported: **8/5/2017**

Hall Environmental Analysis Laboratory, Inc.

GHD Lab Order: 1707E88

Project: 2A-20

CLIENT:

Lab ID: 1707E88-004 **Collection Date:** 7/27/2017 12:10:00 PM

Client Sample ID: S1113525007-072717MGTP5-6' Matrix: SOIL

Chefit Bumple 1D: 51113323007 0727171	101150	THE SOIL								
Analyses	Result	PQL Qu	al Units	DF	Date Analyzed	Batch ID				
EPA METHOD 300.0: ANIONS					Ana	alyst: MRA				
Chloride	72	30	mg/Kg	20	8/3/2017 4:05:10 P	PM 33153				
EPA METHOD 8015M/D: DIESEL RANGE (ORGANICS	8			Ana	alyst: TOM				
Diesel Range Organics (DRO)	160	10	mg/Kg	1	8/2/2017 12:37:34	PM 33114				
Motor Oil Range Organics (MRO)	290	50	mg/Kg	1	8/2/2017 12:37:34	PM 33114				
Surr: DNOP	96.6	70-130	%Rec	1	8/2/2017 12:37:34	PM 33114				
EPA METHOD 8015D: GASOLINE RANGE					Ana	alyst: NSB				
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/2/2017 6:10:18 P	M 33109				
Surr: BFB	89.6	54-150	%Rec	1	8/2/2017 6:10:18 P	PM 33109				
EPA METHOD 8021B: VOLATILES					Ana	alyst: NSB				
Methyl tert-butyl ether (MTBE)	ND	0.097	mg/Kg	1	8/2/2017 6:10:18 P	PM 33109				
Benzene	ND	0.024	mg/Kg	1	8/2/2017 6:10:18 P	PM 33109				
Toluene	ND	0.048	mg/Kg	1	8/2/2017 6:10:18 P	PM 33109				
Ethylbenzene	ND	0.048	mg/Kg	1	8/2/2017 6:10:18 P	PM 33109				
Xylenes, Total	ND	0.097	mg/Kg	1	8/2/2017 6:10:18 P	PM 33109				
Surr: 4-Bromofluorobenzene	108	66.6-132	%Rec	1	8/2/2017 6:10:18 P	PM 33109				

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
 - S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits Page 4 of 10
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Lab Order: **1707E88**Date Reported: **8/5/2017**

Hall Environmental Analysis Laboratory, Inc.

CLIENT: GHD Lab Order: 1707E88

Project: 2A-20

Lab ID: 1707E88-005 **Collection Date:** 7/27/2017 12:35:00 PM

Client Sample ID: S1113525007-072717MGTP4-2' Matrix: SOIL

onen sumpre is a silicoso or or silicoso									
Analyses	Result	PQL Qu	al Units	DF	Date Analyzed	Batch ID			
EPA METHOD 300.0: ANIONS					Ana	lyst: MRA			
Chloride	ND	30	mg/Kg	20	8/3/2017 4:17:34 Pi	M 33153			
EPA METHOD 8015M/D: DIESEL RANGE	ORGANICS	3			Ana	lyst: TOM			
Diesel Range Organics (DRO)	11	10	mg/Kg	1	8/2/2017 1:23:16 PI	M 33114			
Motor Oil Range Organics (MRO)	ND	51	mg/Kg	1	8/2/2017 1:23:16 PI	M 33114			
Surr: DNOP	97.2	70-130	%Rec	1	8/2/2017 1:23:16 PI	M 33114			
EPA METHOD 8015D: GASOLINE RANG	E				Ana	lyst: NSB			
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/2/2017 6:34:24 PI	M 33109			
Surr: BFB	87.7	54-150	%Rec	1	8/2/2017 6:34:24 PI	M 33109			
EPA METHOD 8021B: VOLATILES					Ana	lyst: NSB			
Methyl tert-butyl ether (MTBE)	ND	0.095	mg/Kg	1	8/2/2017 6:34:24 PI	M 33109			
Benzene	ND	0.024	mg/Kg	1	8/2/2017 6:34:24 PI	M 33109			
Toluene	ND	0.048	mg/Kg	1	8/2/2017 6:34:24 PI	M 33109			
Ethylbenzene	ND	0.048	mg/Kg	1	8/2/2017 6:34:24 PI	M 33109			
Xylenes, Total	ND	0.095	mg/Kg	1	8/2/2017 6:34:24 PI	M 33109			
Surr: 4-Bromofluorobenzene	109	66.6-132	%Rec	1	8/2/2017 6:34:24 PI	M 33109			

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
 - S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits Page 5 of 10
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Hall Environmental Analysis Laboratory, Inc.

WO#: **1707E88**

07-Aug-17

Client: GHD Project: 2A-20

Sample ID MB-33153 SampType: MBLK TestCode: EPA Method 300.0: Anions

Client ID: **PBS** Batch ID: **33153** RunNo: **44718**

Prep Date: **8/3/2017** Analysis Date: **8/3/2017** SeqNo: **1414230** Units: **mg/Kg**

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

Chloride ND 1.5

Sample ID LCS-33153 SampType: LCS TestCode: EPA Method 300.0: Anions

Client ID: LCSS Batch ID: 33153 RunNo: 44718

Prep Date: 8/3/2017 Analysis Date: 8/3/2017 SeqNo: 1414231 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

Chloride 14 1.5 15.00 0 95.7 90 110

Qualifiers:

* Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Detection Limit

W Sample container temperature is out of limit as specified

Page 6 of 10

Hall Environmental Analysis Laboratory, Inc.

WO#: 1707E88

07-Aug-17

Client: GHD Project: 2A-20

Sample ID LCS-33114 SampType: LCS TestCode: EPA Method 8015M/D: Diesel Range Organics Client ID: LCSS Batch ID: 33114 RunNo: 44660 Prep Date: 8/1/2017 Analysis Date: 8/2/2017 SeqNo: 1411984 Units: mg/Kg Analyte Result **PQL** SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Diesel Range Organics (DRO) 10 43 50.00 0 86.8 73.2 114 Surr: DNOP 5.000 73.3 3.7 70 130

Sample ID MB-33114 SampType: MBLK TestCode: EPA Method 8015M/D: Diesel Range Organics Client ID: PBS Batch ID: 33114 RunNo: 44660 Prep Date: 8/1/2017 Analysis Date: 8/2/2017 SeqNo: 1411985 Units: mg/Kg Analyte Result **PQL** SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Diesel Range Organics (DRO) ND 10 Motor Oil Range Organics (MRO) ND 50 Surr: DNOP 8.3 10.00 82.7 70 130

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- Η Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- POL Practical Quanitative Limit
- % Recovery outside of range due to dilution or matrix
- В Analyte detected in the associated Method Blank
- Е Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Detection Limit
- Sample container temperature is out of limit as specified

Page 7 of 10

Hall Environmental Analysis Laboratory, Inc.

WO#: **1707E88**

07-Aug-17

Client: GHD Project: 2A-20

Sample ID MB-33109 SampType: MBLK TestCode: EPA Method 8015D: Gasoline Range

Client ID: PBS Batch ID: 33109 RunNo: 44673

Prep Date: 8/1/2017 Analysis Date: 8/2/2017 SeqNo: 1413152 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

Gasoline Range Organics (GRO) ND 5.0

Surr: BFB 920 1000 91.8 54 150

Sample ID LCS-33109 SampType: LCS TestCode: EPA Method 8015D: Gasoline Range

Client ID: LCSS Batch ID: 33109 RunNo: 44673

Prep Date: 8/1/2017 Analysis Date: 8/2/2017 SeqNo: 1413153 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

 Gasoline Range Organics (GRO)
 23
 5.0
 25.00
 0
 91.7
 76.4
 125

 Surr: BFB
 1000
 1000
 105
 54
 150

Sample ID 1707E88-002AMS SampType: MS TestCode: EPA Method 8015D: Gasoline Range

Client ID: \$1113525007-07271 Batch ID: 33109 RunNo: 44673

Prep Date: 8/1/2017 Analysis Date: 8/2/2017 SeqNo: 1413156 Units: mg/Kg

SPK value SPK Ref Val %REC %RPD **RPDLimit** Analyte Result **PQL** LowLimit HighLimit Qual Gasoline Range Organics (GRO) 27 24.41 110 77.8 128

 Gasoline Range Organics (GRO)
 27
 4.9
 24.41
 0
 110
 77.8
 128

 Surr: BFB
 1000
 976.6
 106
 54
 150

Sample ID 1707E88-002AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range

Client ID: S1113525007-07271 Batch ID: 33109 RunNo: 44673

Prep Date: 8/1/2017 Analysis Date: 8/2/2017 SeqNo: 1413157 Units: mg/Kg

Result **PQL** SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Gasoline Range Organics (GRO) 26 4.7 23.43 109 77.8 128 5.21 20 Λ Surr: BFB 1000 937.2 109 54 150 0 0

Qualifiers:

* Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Detection Limit

W Sample container temperature is out of limit as specified

Page 8 of 10

Hall Environmental Analysis Laboratory, Inc.

WO#: **1707E88**

07-Aug-17

Client: GHD Project: 2A-20

Sample ID MB-33109 SampType: MBLK TestCode: EPA Method 8021B: Volatiles Client ID: **PBS** Batch ID: 33109 RunNo: 44673 Prep Date: 8/1/2017 Analysis Date: 8/2/2017 SeqNo: 1413168 Units: mg/Kg Analyte Result **PQL** SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Methyl tert-butyl ether (MTBE) 0.10 ND Benzene ND 0.025 Toluene ND 0.050 Ethylbenzene ND 0.050 Xylenes, Total ND 0.10 Surr: 4-Bromofluorobenzene 1.000 113 66.6 132 1.1

Sample ID LCS-33109 SampType: LCS TestCode: EPA Method 8021B: Volatiles Client ID: LCSS Batch ID: 33109 RunNo: 44673 Prep Date: 8/1/2017 Analysis Date: 8/2/2017 SeqNo: 1413169 Units: mg/Kg **PQL** SPK value SPK Ref Val %REC %RPD **RPDLimit** Analyte Result LowLimit HighLimit Qual Methyl tert-butyl ether (MTBE) 0.97 0.10 1.000 97.4 66.5 120 0.025 1.000 0 103 80 120 Benzene 1.0 0 101 Toluene 1.0 0.050 1.000 80 120 0 102 80 Ethylbenzene 1.0 0.050 1.000 120 Xylenes, Total 3.1 0.10 3.000 0 103 80 120 Surr: 4-Bromofluorobenzene 1.1 1.000 112 66.6 132

Sample ID 1707E88-001AMS SampType: MS TestCode: EPA Method 8021B: Volatiles Batch ID: 33109 Client ID: S1113525007-07271 RunNo: 44673 Prep Date: 8/1/2017 Analysis Date: 8/2/2017 SeqNo: 1413171 Units: mg/Kg Result **PQL** SPK value SPK Ref Val %REC HighLimit %RPD **RPDLimit** Qual LowLimit Methyl tert-butyl ether (MTBE) 1.0 0.097 104 72.5 138 0.9737 0 80.9 Benzene 1.1 0.024 0.9737 0 110 132 Toluene 0.9737 0.01069 108 79.8 1.1 0.049 136 Ethylbenzene 1.1 0.049 0.9737 0 111 79.4 140 0.01514 78.5 Xylenes, Total 3.3 0.097 2.921 111 142 Surr: 4-Bromofluorobenzene 0.9737 110 66.6 132 1.1

Sample ID 1707E88-001AMSD SampType: MSD TestCode: EPA Method 8021B: Volatiles										
Client ID: \$1113525007-072	R	tunNo: 4	4673							
Prep Date: 8/1/2017	Date: 8/1/2017 Analysis Date: 8/2/2017 SeqN						Units: mg/K	g		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Methyl tert-butyl ether (MTBE)	0.99	0.093	0.9346	0	106	72.5	138	2.43	20	
Benzene	1.0	0.023	0.9346	0	110	80.9	132	3.52	20	
Toluene	1.0	0.047	0.9346	0.01069	109	79.8	136	3.59	20	
Ethylbenzene	1.0	0.047	0.9346	0	112	79.4	140	2.94	20	

Qualifiers:

* Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Detection Limit

W Sample container temperature is out of limit as specified

Page 9 of 10

Hall Environmental Analysis Laboratory, Inc.

WO#: **1707E88**

07-Aug-17

Client: GHD Project: 2A-20

Sample ID 1707E88-001AMSD SampType: MSD TestCode: EPA Method 8021B: Volatiles

Client ID: \$1113525007-07271 Batch ID: 33109 RunNo: 44673

Prep Date: **8/1/2017** Analysis Date: **8/2/2017** SeqNo: **1413172** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Xylenes, Total	3.2	0.093	2.804	0.01514	114	78.5	142	1.63	20	
Surr: 4-Bromofluorobenzene	1.0		0.9346		112	66.6	132	0	0	

Qualifiers:

* Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

D C 1 HN I D

P Sample pH Not In Range

RL Reporting Detection Limit

W Sample container temperature is out of limit as specified

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Hall Environmental Analysis Laboratory 4901 Hawkins NE Albuquerque, NM 87109

Sample Log-In Check List

TEL: 505-345-3975 FAX: 505-345-4107 Website: www.hallenvironmental.com Client Name: GHD Work Order Number: 1707E88 RcptNo: 1 Received By: Isaiah Ortiz 7/28/2017 10:00:00 AM Completed By: Erin Melendrez 7/30/2017 2:48:48 PM Reviewed By: Chain of Custody Yes 🗍 No 🗌 Not Present V 1. Custody seals intact on sample bottles? Yes 🗹 No 🗌 Not Present 2. Is Chain of Custody complete? 3. How was the sample delivered? Client Log In Yes 🗸 No 🗌 NA 🗌 4. Was an attempt made to cool the samples? NA 🔲 5. Were all samples received at a temperature of >0° C to 6.0°C Yes 🗹 No 🗀 No 🗌 6. Sample(s) in proper container(s)? Yes 🗸 No 🗌 7. Sufficient sample volume for indicated test(s)? Yes 🗸 No 🗌 8. Are samples (except VOA and ONG) properly preserved? Yes No 🔽 NA 🗌 9. Was preservative added to bottles? No 🗌 No VOA Vials 🗸 Yes 🗌 10. VOA vials have zero headspace? Yes 🗌 No 🗸 11. Were any sample containers received broken? # of preserved bottles checked 12. Does paperwork match bottle labels? Yes 🗹 No 🗔 for pH: (Note discrepancies on chain of custody) (<2 or >12 unless noted) Adjusted? No 🗌 Yes 🗸 13. Are matrices correctly identified on Chain of Custody? No 🗆 Yes 🗸 14. Is it clear what analyses were requested? No 🗌 Yes 🗸 Checked by: 15. Were all holding times able to be met? (If no, notify customer for authorization.) Special Handling (if applicable) 16. Was client notified of all discrepancies with this order? Yes 🔲 No 🗀 NA 🗸 Person Notified: Date By Whom: Via: ☐ eMail ☐ Phone ☐ Fax ☐ In Person Regarding: Client Instructions: 17. Additional remarks: 18. Cooler Information Cooler No | Temp °C | Condition | Seal Intact | Seal No |

5.0

Good

Not Present

Mailing Address GATT Advan Rock Rock Rock Rock Rock Name: Www. hallenvironmental.com 4901 Hawkins NE - Albuquerque, NM 87109 Tel. 505-345-3975 Fax 506-345-4197 Project #: Tel. 505-345-31975 Fax 506-345-4197 Project #: Tel. 505-345-3975 Fax 506-345-4197 Project #: Tel. 505-345-31975 Fax 506-345-4197 Project #: Tel. 505-345-345-3975 Pax 506-345-4197 Project #: Tel. 505-345-35-3975 Pax 105-345-4197				ustody Record	Turn-Around	l ime:								<i>.</i>						
Mailing Address 6 21 Timbian Shank MSt200	Client:	GHD	Sec	vices, Inc-		roject Name:					ANALYSIS LABORATORY									
Tel. 505-345-3975 Fax 505-345-4107 Phone # SO5 8 & 4 C 6 72 Project #: 1135-25 0 - 07 Phone # SO5 8 & 4 C 6 72 Project Manager Capacidation Devel 4 (Full Validation) Received by Project Manager Sampler Date Time Matrix Sample Request ID Container Type Type Type Tel. 505-345-3975 Fax 505-345-4107 Tel. 505-345-345-3975 Fax 505-345-4107 Tel. 505-345-3975 Fax 505-345-4107 Tel. 505-345-345-3975 Fax 505-345-4107 Tel. 505-345-345-3975 Fax 505-345-4107 Tel. 505-345-345-3975 Fax 505-345-345-3975 Tel. 505-345-345-3975 Fax 505-345-345-345 Tel. 505-345-345-345 Tel. 505-345-345 Tel. 505-345-345-345 Tel. 505-345-345 Tel. 505-345-345-345 Tel. 505-345 Tel. 505-345-345-345 Tel. 505-345 Tel. 505-345	Mailing	Address	<u> </u>	Indian School Rd Steroo	2 A-	28			400	.1 ∐⊙								100		
Phone # 505 884 0672 Mailysis Request Project Manager: Project	N/t 1	11	10.50.110	1/11 87116	Project #:	0														
Email or Fax#19c Croack Bock and Accomp Project Manager:	Phone:	#: SOS	884	910/11 0 1 1 1 0 0 672	111352	450-07			lei	. 505	-345-3							, 		
Standard					Project Mana	ager:			<u>\S</u>	6										
NELAP	QA/QC	Package:		- 5	l		ochisch		Gas on	O / MR		IMS)		PO ₄ ,SC	PCB's			2		
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7/27 1CGO S SILISSO OT-072717-46-TP-3-5	Date	Time	Matrix	Sample Request ID		1	HEAL No.	+	+	TPH 8015I	IPH (Metr EDB (Metr	PAH's (83	RCRA 8 M	Anions (F,	8081 Pesti	8260B (VC		Chlori		Air Bubble
7/27 (050) S-11155250-07-072717-146TP3-3	7/27	loto	S	5-1105250-77-072717-116-TP-12	40cSoil	ICE		X	Ž	X								X		
7/27 12.10 S 5.1135250-07-0727.746 TPS-6	7/27	1050	2	i			- CO Z	X		X		<u>.</u>						X		
7/27 1235 S 54\\35250.07-0727\\42\\42\\42\\42\\42\\42\\42\\42\\42\	7/27	1130	S	5-11135250-07-072717-46TP-3-2			-003	X	/	3								\overline{X}		
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	7/27	1430	M	in aut		1 h	7/21/12 1436	Ren	narks:											
If necessary sample submitted to Hall Environmental may be subcontracted to other accredited laboratories. This serves as notice of this possibility. Any sub-contracted data will be clearly notated on the analytical report.	20/14	1900	Sp	1	I.O.		28/17 10:00												····	



Hall Environmental Analysis Laboratory 4901 Hawkins NE Albuquerque, NM 87109 TEL: 505-345-3975 FAX: 505-345-4107 Website: www.hallenvironmental.com

October 18, 2017

Bernie Bockisch GHD 6121 Indian School Road, NE #200 Albuquerque, NM 87110 TEL: (505) 884-0672

FAX

RE: 2A 20 OrderNo.: 1710678

Dear Bernie Bockisch:

Hall Environmental Analysis Laboratory received 5 sample(s) on 10/12/2017 for the analyses presented in the following report.

These were analyzed according to EPA procedures or equivalent. To access our accredited tests please go to www.hallenvironmental.com or the state specific web sites. In order to properly interpret your results, it is imperative that you review this report in its entirety. See the sample checklist and/or the Chain of Custody for information regarding the sample receipt temperature and preservation. Data qualifiers or a narrative will be provided if the sample analysis or analytical quality control parameters require a flag. When necessary, data qualifiers are provided on both the sample analysis report and the QC summary report, both sections should be reviewed. All samples are reported, as received, unless otherwise indicated. Lab measurement of analytes considered field parameters that require analysis within 15 minutes of sampling such as pH and residual chlorine are qualified as being analyzed outside of the recommended holding time.

Please don't hesitate to contact HEAL for any additional information or clarifications.

ADHS Cert #AZ0682 -- NMED-DWB Cert #NM9425 -- NMED-Micro Cert #NM0190

Sincerely,

Andy Freeman

Laboratory Manager

andyl

4901 Hawkins NE

Albuquerque, NM 87109

Lab Order: 1710678

Date Reported: 10/18/2017

Hall Environmental Analysis Laboratory, Inc.

CLIENT: GHD Lab Order: 1710678

Project: 2A 20

Lab ID: 1710678-001 **Collection Date:** 10/10/2017 11:30:00 AM

Client Sample ID: S-11135250-07-101017-MG-HA-1 Matrix: SOIL

Analyses	Result	PQL Qu	al Units	DF	Date Analyzed	Batch ID
EPA METHOD 300.0: ANIONS					Ana	alyst: MRA
Chloride	92	30	mg/Kg	20	10/13/2017 2:44:0	1 PM 34404
EPA METHOD 8015M/D: DIESEL RANG	GE ORGANICS	S			Ana	alyst: TOM
Diesel Range Organics (DRO)	15	10	mg/Kg	1	10/16/2017 6:43:0	3 PM 34401
Motor Oil Range Organics (MRO)	ND	50	mg/Kg	1	10/16/2017 6:43:0	3 PM 34401
Surr: DNOP	80.8	70-130	%Rec	1	10/16/2017 6:43:0	3 PM 34401
EPA METHOD 8015D: GASOLINE RAN	IGE				Ana	alyst: NSB
Gasoline Range Organics (GRO)	ND	4.9	mg/Kg	1	10/13/2017 5:53:2	4 PM 34383
Surr: BFB	94.3	54-150	%Rec	1	10/13/2017 5:53:2	4 PM 34383
EPA METHOD 8021B: VOLATILES					Ana	alyst: NSB
Benzene	ND	0.024	mg/Kg	1	10/13/2017 5:53:24	4 PM 34383
Toluene	ND	0.049	mg/Kg	1	10/13/2017 5:53:2	4 PM 34383
Ethylbenzene	ND	0.049	mg/Kg	1	10/13/2017 5:53:2	4 PM 34383
Xylenes, Total	ND	0.097	mg/Kg	1	10/13/2017 5:53:2	4 PM 34383
Surr: 4-Bromofluorobenzene	98.9	66.6-132	%Rec	1	10/13/2017 5:53:2	4 PM 34383

Lab ID: 1710678-002 **Collection Date:** 10/10/2017 11:32:00 AM

Client Sample ID: S-11135250-07-101017-MG-HA-2 Matrix: SOIL

Analyses	Result	PQL (Qual	Units	DF	Date Analyzed	Batch ID
EPA METHOD 300.0: ANIONS						Ana	alyst: MRA
Chloride	160	30		mg/Kg	20	10/13/2017 3:21:15	5 PM 34404
EPA METHOD 8015M/D: DIESEL RANGE	E ORGANICS	S				Ana	alyst: TOM
Diesel Range Organics (DRO)	8400	97		mg/Kg	10	10/16/2017 2:59:55	5 PM 34401
Motor Oil Range Organics (MRO)	3200	490		mg/Kg	10	10/16/2017 2:59:55	5 PM 34401
Surr: DNOP	0	70-130	S	%Rec	10	10/16/2017 2:59:55	5 PM 34401
EPA METHOD 8015D: GASOLINE RANG	iΕ					Ana	alyst: NSB
Gasoline Range Organics (GRO)	80	4.6		mg/Kg	1	10/13/2017 6:16:46	6 PM 34383
Surr: BFB	664	54-150	S	%Rec	1	10/13/2017 6:16:46	6 PM 34383
EPA METHOD 8021B: VOLATILES						Ana	alyst: NSB
Benzene	ND	0.023		mg/Kg	1	10/13/2017 6:16:46	6 PM 34383
Toluene	ND	0.046		mg/Kg	1	10/13/2017 6:16:46	6 PM 34383
Ethylbenzene	ND	0.046		mg/Kg	1	10/13/2017 6:16:46	6 PM 34383
Xylenes, Total	ND	0.093		mg/Kg	1	10/13/2017 6:16:46	6 PM 34383
Surr: 4-Bromofluorobenzene	131	66.6-132		%Rec	1	10/13/2017 6:16:46	6 PM 34383

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Unaimers: " value exceeds Maximum Contaminant Level	Oualifiers:	*	Value exceeds Maximum Contaminant Level.
--	--------------------	---	--

- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits Page 1 of 7
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Lab Order: 1710678

Hall Environmental Analysis Laboratory, Inc.

Date Reported: 10/18/2017

CLIENT: GHD Lab Order: 1710678

Project: 2A 20

Lab ID: 1710678-003 **Collection Date:** 10/10/2017 11:35:00 AM

Client Sample ID: S-11135250-07-101017-MG-HA-3 Matrix: SOIL

Analyses	Result	PQL (Qual	Units	DF	Date Analyzed	Batch ID
EPA METHOD 300.0: ANIONS						Ana	alyst: MRA
Chloride	320	30		mg/Kg	20	10/13/2017 3:33:4	0 PM 34404
EPA METHOD 8015M/D: DIESEL RAN	GE ORGANICS	3				Ana	alyst: TOM
Diesel Range Organics (DRO)	13000	960		mg/Kg	100	10/16/2017 11:18:	55 AM 34401
Motor Oil Range Organics (MRO)	7400	4800		mg/Kg	100	10/16/2017 11:18:	55 AM 34401
Surr: DNOP	0	70-130	S	%Rec	100	10/16/2017 11:18:	55 AM 34401
EPA METHOD 8015D: GASOLINE RAI	NGE					Ana	alyst: NSB
Gasoline Range Organics (GRO)	140	9.9		mg/Kg	2	10/13/2017 7:03:3	7 PM 34383
Surr: BFB	389	54-150	S	%Rec	2	10/13/2017 7:03:3	7 PM 34383
EPA METHOD 8021B: VOLATILES						Ana	alyst: NSB
Benzene	ND	0.050		mg/Kg	2	10/13/2017 7:03:3	7 PM 34383
Toluene	0.11	0.099		mg/Kg	2	10/13/2017 7:03:3	7 PM 34383
Ethylbenzene	0.90	0.099		mg/Kg	2	10/13/2017 7:03:3	7 PM 34383
Xylenes, Total	4.8	0.20		mg/Kg	2	10/13/2017 7:03:3	7 PM 34383
Surr: 4-Bromofluorobenzene	123	66.6-132		%Rec	2	10/13/2017 7:03:3	7 PM 34383

Lab ID: 1710678-004 **Collection Date:** 10/10/2017 11:40:00 AM

Client Sample ID: S-11135250-07-101017-MG-HA-4 Matrix: SOIL

Analyses	Result	PQL Qu	al Units	DF	Date Analyzed	Batch ID
EPA METHOD 300.0: ANIONS					Ana	alyst: MRA
Chloride	120	30	mg/Kg	20	10/13/2017 3:46:04	4 PM 34404
EPA METHOD 8015M/D: DIESEL RANGE	ORGANIC	S			Ana	alyst: TOM
Diesel Range Organics (DRO)	790	9.7	mg/Kg	1	10/16/2017 7:11:08	34401 B PM
Motor Oil Range Organics (MRO)	590	48	mg/Kg	1	10/16/2017 7:11:08	34401 BPM 34401
Surr: DNOP	108	70-130	%Rec	1	10/16/2017 7:11:08	34401 BPM 34401
EPA METHOD 8015D: GASOLINE RANGE	į				Ana	alyst: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	10/13/2017 7:50:29	9 PM 34383
Surr: BFB	88.7	54-150	%Rec	1	10/13/2017 7:50:29	9 PM 34383
EPA METHOD 8021B: VOLATILES					Ana	alyst: NSB
Benzene	ND	0.024	mg/Kg	1	10/13/2017 7:50:29	9 PM 34383
Toluene	ND	0.048	mg/Kg	1	10/13/2017 7:50:29	9 PM 34383
Ethylbenzene	ND	0.048	mg/Kg	1	10/13/2017 7:50:29	9 PM 34383
Xylenes, Total	ND	0.097	mg/Kg	1	10/13/2017 7:50:29	9 PM 34383
Surr: 4-Bromofluorobenzene	95.5	66.6-132	%Rec	1	10/13/2017 7:50:29	9 PM 34383

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Oualifiers: * Value exceeds Maximum Contaminant Level.
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- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits Page 2 of 7
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Lab Order: 1710678

Date Reported: 10/18/2017

Hall Environmental Analysis Laboratory, Inc.

CLIENT: GHD Lab Order: 1710678

Project: 2A 20

Lab ID: 1710678-005 **Collection Date:** 10/10/2017 11:45:00 AM

Client Sample ID: S-11135250-07-101017-MG-HA-5 Matrix: SOIL

Analyses	Result	PQL Q	ual Units	DF	Date Analyzed	Batch ID
EPA METHOD 300.0: ANIONS					Ana	alyst: MRA
Chloride	ND	30	mg/Kg	20	10/13/2017 3:58:28	34404 B PM
EPA METHOD 8015M/D: DIESEL RANGI	E ORGANICS	S			Ana	alyst: TOM
Diesel Range Organics (DRO)	1400	92	mg/Kg	10	10/17/2017 1:09:35	5 PM 34401
Motor Oil Range Organics (MRO)	990	460	mg/Kg	10	10/17/2017 1:09:35	5 PM 34401
Surr: DNOP	0	70-130	S %Rec	10	10/17/2017 1:09:35	5 PM 34401
EPA METHOD 8015D: GASOLINE RANG	SE .				Ana	alyst: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	10/13/2017 8:13:56	6 PM 34383
Surr: BFB	93.0	54-150	%Rec	1	10/13/2017 8:13:56	6 PM 34383
EPA METHOD 8021B: VOLATILES					Ana	alyst: NSB
Benzene	ND	0.024	mg/Kg	1	10/13/2017 8:13:56	6 PM 34383
Toluene	ND	0.048	mg/Kg	1	10/13/2017 8:13:56	6 PM 34383
Ethylbenzene	ND	0.048	mg/Kg	1	10/13/2017 8:13:56	6 PM 34383
Xylenes, Total	ND	0.097	mg/Kg	1	10/13/2017 8:13:56	6 PM 34383
Surr: 4-Bromofluorobenzene	96.4	66.6-132	%Rec	1	10/13/2017 8:13:56	6 PM 34383

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
 - S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits Page 3 of 7
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Hall Environmental Analysis Laboratory, Inc.

WO#: **1710678**

18-Oct-17

Client: GHD Project: 2A 20

Sample ID MB-34404 SampType: mblk TestCode: EPA Method 300.0: Anions

Client ID: PBS Batch ID: 34404 RunNo: 46328

Prep Date: 10/13/2017 Analysis Date: 10/13/2017 SeqNo: 1476892 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

Chloride ND 1.5

Sample ID LCS-34404 SampType: Ics TestCode: EPA Method 300.0: Anions

Client ID: LCSS Batch ID: 34404 RunNo: 46328

Prep Date: 10/13/2017 Analysis Date: 10/13/2017 SeqNo: 1476893 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

Chloride 14 1.5 15.00 0 94.8 90 110

Qualifiers:

* Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Detection Limit

W Sample container temperature is out of limit as specified

Page 4 of 7

Hall Environmental Analysis Laboratory, Inc.

WO#: **1710678**

18-Oct-17

Client: GHD Project: 2A 20

Sample ID LCS-34401 SampType: LCS TestCode: EPA Method 8015M/D: Diesel Range Organics LCSS Client ID: Batch ID: 34401 RunNo: 46361 Prep Date: 10/13/2017 Analysis Date: 10/16/2017 SeqNo: 1476752 Units: mg/Kg Analyte Result **PQL** SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Diesel Range Organics (DRO) 10 46 50.00 0 92.3 73.2 114 Surr: DNOP 5.000 92.8 4.6 70 130

Sample ID MB-34401 SampType: MBLK TestCode: EPA Method 8015M/D: Diesel Range Organics Batch ID: 34401 Client ID: PBS RunNo: 46361 Prep Date: 10/13/2017 Analysis Date: 10/16/2017 SeqNo: 1476753 Units: mg/Kg Analyte Result **PQL** SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Diesel Range Organics (DRO) ND 10 Motor Oil Range Organics (MRO) ND 50 Surr: DNOP 8.9 10.00 89.0 70 130

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Page 5 of 7

Hall Environmental Analysis Laboratory, Inc.

WO#: **1710678**

18-Oct-17

Client: GHD Project: 2A 20

Sample ID MB-34383 SampType: MBLK TestCode: EPA Method 8015D: Gasoline Range

Client ID: PBS Batch ID: 34383 RunNo: 46333

Prep Date: 10/12/2017 Analysis Date: 10/13/2017 SeqNo: 1476152 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

Gasoline Range Organics (GRO) ND 5.0

Surr: BFB 950 1000 94.7 54 150

Sample ID LCS-34383 SampType: LCS TestCode: EPA Method 8015D: Gasoline Range

Client ID: LCSS Batch ID: 34383 RunNo: 46333

Prep Date: 10/12/2017 Analysis Date: 10/13/2017 SeqNo: 1476153 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

 Gasoline Range Organics (GRO)
 30
 5.0
 25.00
 0
 119
 75.9
 131

 Surr: BFB
 1100
 1000
 109
 54
 150

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Page 6 of 7

Hall Environmental Analysis Laboratory, Inc.

1.0

WO#: **1710678**

18-Oct-17

Client: GHD Project: 2A 20

Surr: 4-Bromofluorobenzene

Sample ID MB-34383 SampType: MBLK TestCode: EPA Method 8021B: Volatiles

Client ID: PBS Batch ID: 34383 RunNo: 46333

Prep Date: 10/12/2017 Analysis Date: 10/13/2017 SeqNo: 1476175 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

Benzene ND 0.025

Tolluene ND 0.050

 Toluene
 ND
 0.050

 Ethylbenzene
 ND
 0.050

 Xylenes, Total
 ND
 0.10

Surr: 4-Bromofluorobenzene 1.0 1.000 102 66.6 132

1.000

Sample ID LCS-34383 SampType: LCS TestCode: EPA Method 8021B: Volatiles Client ID: LCSS Batch ID: 34383 RunNo: 46333 Prep Date: Analysis Date: 10/13/2017 SeqNo: 1476176 10/12/2017 Units: mg/Kg Analyte Result **PQL** SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual 0.97 0.025 1.000 0 97.1 80 120 Benzene Toluene 0.97 0.050 1.000 0 97.0 80 120 Ethylbenzene 0.050 1.000 0 99.6 80 120 1.0 99.4 Xylenes, Total 3.0 0.10 3.000 0 80 120

102

66.6

132

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Page 7 of 7



Hall Environmental Analysis Laboratory 4901 Hawkins NE Albuquerque, NM 87109

TEL: 505-345-3975 FAX: 505-345-4107 Website: www.hallenvironmental.com

Sample Log-In Check List

Client Name:	GHD	Work Order Numb	er: 17106	78		RcptNo:	1
Received By:	Isaiah Ortiz	10/12/2017 9:15:00	АМ		IO	-	
Completed By:	Sophia Campuzano	10/12/2017 10:05:00	MA C		Signal Sugar		
Reviewed By:	0 DS	10/12/17					
Chain of Cus	tody						
1. Custody sea	als intact on sample bot	tles?	Yes		No 🗆	Not Present 🗹	
2. Is Chain of C	Custody complete?		Yes	~	No 🗆	Not Present	
3. How was the	e sample delivered?		Cour	ier			
Log In							
4. Was an atte	empt made to cool the s	samples?	Yes	~	No 🗆	na 🗆	
5. Were all sar	mples received at a ten	perature of >0° C to 6.0°C	Yes	V	No 🗆	NA 🗆	
6. Sample(s) i	in proper container(s)?		Yes	V	No 🗌		
7. Sufficient sa	ample volume for indica	ted test(s)?	Yes	V	No 🗆		
8, Are samples	s (except VOA and ON	G) properly preserved?	Yes	~	No 🗆		
9. Was presen	vative added to bottles?	7	Yes		No 🗸	NA 🗆	
10.VOA vials h	ave zero headspace?		Yes		No 🗆	No VOA Vials 🗹	
11, Were any s	ample containers recei	ved broken?	Yes		No 🗸	# of preserved	
12.Does paper	work match bottle label	s?	Yes	~	No 🗆	bottles checked for pH:	
	pancies on chain of cu						r >12 unless noted)
13. Are matrices	s correctly identified on	Chain of Custody?	Yes		No 🗆	Adjusted?	
[] [[] [] [] [] [] [] [] [] [hat analyses were requ		Yes	~	No 🗆	Charled by	
	lding times able to be n customer for authoriza		Yes	•	No	Checked by:	
Special Hand	dling (if applicable	e)					
A CONTRACTOR OF THE PARTY OF TH	notified of all discrepand	Contract of the contract of th	Yes		No 🗆	NA 🗹	
By WI Regar	rding:	Date Via:	: ☐ eMa	ail 🗌	Phone _ Fax	In Person	
17. Additional r	Instructions:						
18. Cooler Info	The state of the s	ition Seal Intact Seal No	Seal D	ate	Signed By		
1	0.3 Good	Yes					

C	hain	-of-Cι	ustody Record	Turn-Around	Time:		١,	69	15	-		20 50						1201/00m-100V	2020
Client:	SHD	Servi	ces, Inc.	Standard														NT/	
Mailing	Address	*P131 +	1 21 [0]	- 10			100	- 10	_	٧	/ww	halle	nviro	nmer	ntal.c	om			
N= 11	, riddiosc	.6171 T	Mian School Rd Ste200	75-2803			4	49	01 H	awkir	s NI	- /	Albuq	uerqu	ie, N	M 87	7109		
NEA	buque	rque,1	/M 87110	Project #:	250-07			Te	el. 50	5-345	-39	75	Fax	505	-345	-410	7		1
Phone :	#: 50 <u>S</u>	884	0672									An	alysis	Rec	ques	t			
			. Backisch@ghd.com	A		-	=	TPH (Gas only)	8				00						
/	Package:			Berna	sd Bock	tisch	(8021)	asc	Σ			2	S.S	PCB's					
Stan			☐ Level 4 (Full Validation)	1			1	9)+	/ DRO / MRO)			SIMS)	J.	2 P			0		
□ NEL		□ Othe	er	Sampler: No.		ant	- #		5	5.	£	82/0	2	808			36		î
□ EDD				Sample Tem		0.3	- 1	+	GR	418	20	5 -	2 0	es/		OA	0.00		Į,
Date	Time	Matrix	Sample Request ID	Container Type and #	Preservative Type	HEAL No.	BTEX ******	BTEX + MTBE	TPH 8015B (GRO	TPH (Method 418.1)	=	PAH'S (8310	Anions (F.CI,NO3,NO3,PO2,SO3)	8081 Pesticides / 8082	8260B (VOA)	8270 (Semi-VOA)	Chloride		Air Bubbles (Y or N)
10/10/17	The Control of the Control	5	S-11136260-67-101017-M6-HA-1	452 Salton	TCE	-001	X		X					1	-		X		
10/10/17	A CONTRACTOR OF	S	5-11/35250-07-101017-46-HA-2	1		-002	X		X		1						×	1	
10/10/17	1135	S	5-1135250-07-101017-M6-HA-3			-003	X		X	1	8						X		
10/10/17	1140	5	5-11135258-07-101017-MG-HA-4			-004	X		X		T						X		
10/0/17	1145	S	5-11135250-07-101017-MG-HA-5	.	1	-005	X		X	7	1	-	-				X		
									1	1	1								
										1	+	1							
					,						+								
Date:	Time: S30 Time: 1900 necessary.	Relinquishe Relinquishe	ed by: and by: mitted to Hall Environmental may be suboo	Received by:	~ > "	Date Time		narks											



Hall Environmental Analysis Laboratory 4901 Hawkins NE Albuquerque, NM 87109 TEL: 505-345-3975 FAX: 505-345-4107 Website: www.hallenvironmental.com

January 11, 2018

Bernie Bockisch GHD 6121 Indian School Road, NE #200 Albuquerque, NM 87110

TEL: (505) 884-0672

FAX

RE: 2A 20 OrderNo.: 1712D88

Dear Bernie Bockisch:

Hall Environmental Analysis Laboratory received 2 sample(s) on 12/22/2017 for the analyses presented in the following report.

These were analyzed according to EPA procedures or equivalent. To access our accredited tests please go to www.hallenvironmental.com or the state specific web sites. In order to properly interpret your results, it is imperative that you review this report in its entirety. See the sample checklist and/or the Chain of Custody for information regarding the sample receipt temperature and preservation. Data qualifiers or a narrative will be provided if the sample analysis or analytical quality control parameters require a flag. When necessary, data qualifiers are provided on both the sample analysis report and the QC summary report, both sections should be reviewed. All samples are reported, as received, unless otherwise indicated. Lab measurement of analytes considered field parameters that require analysis within 15 minutes of sampling such as pH and residual chlorine are qualified as being analyzed outside of the recommended holding time.

Please don't hesitate to contact HEAL for any additional information or clarifications.

ADHS Cert #AZ0682 -- NMED-DWB Cert #NM9425 -- NMED-Micro Cert #NM0190

Sincerely,

Andy Freeman

Laboratory Manager

andyl

4901 Hawkins NE

Albuquerque, NM 87109

Lab Order: **1712D88**

Hall Environmental Analysis Laboratory, Inc.

Date Reported: 1/11/2018

CLIENT: GHD Lab Order: 1712D88

Project: 2A 20

Lab ID: 1712D88-001 **Collection Date:** 12/21/2017 9:26:00 AM

Client Sample ID: 11135250-7-122117-BB1 Matrix: SOIL

Analyses	Result	PQL Qu	al Units	DF	Date Analyzed	Batch ID
EPA METHOD 300.0: ANIONS					Ana	alyst: MRA
Chloride	ND	30	mg/Kg	20	1/9/2018 2:21:23 P	M 35887
EPA METHOD 8015M/D: DIESEL RANG	GE ORGANICS	;			Ana	alyst: TOM
Diesel Range Organics (DRO)	ND	10	mg/Kg	1	12/29/2017 1:57:55	5 PM 35722
Motor Oil Range Organics (MRO)	ND	50	mg/Kg	1	12/29/2017 1:57:55	5 PM 35722
Surr: DNOP	115	70-130	%Rec	1	12/29/2017 1:57:55	5 PM 35722
EPA METHOD 8015D: GASOLINE RAN	IGE				Ana	alyst: NSB
Gasoline Range Organics (GRO)	ND	4.9	mg/Kg	1	12/27/2017 10:59:	16 AM 35701
Surr: BFB	104	15-316	%Rec	1	12/27/2017 10:59:1	16 AM 35701

Lab ID: 1712D88-002 **Collection Date:** 12/21/2017 9:30:00 AM

Client Sample ID: 11135250-7-122117-BB2 Matrix: SOIL

Analyses	Result	PQL Qu	al Units	DF	Date Analyzed	Batch ID
EPA METHOD 300.0: ANIONS					Ana	alyst: MRA
Chloride	57	30	mg/Kg	20	1/9/2018 2:33:48 P	M 35887
EPA METHOD 8015M/D: DIESEL RANGE ORGANIC					Ana	alyst: TOM
Diesel Range Organics (DRO)	470	9.8	mg/Kg	1	12/29/2017 2:22:21	I PM 35722
Motor Oil Range Organics (MRO)	400	49	mg/Kg	1	12/29/2017 2:22:21	I PM 35722
Surr: DNOP	118	70-130	%Rec	1	12/29/2017 2:22:21	I PM 35722
EPA METHOD 8015D: GASOLINE RANG	E				Ana	alyst: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	12/27/2017 2:58:40	PM 35701
Surr: BFB	141	15-316	%Rec	1	12/27/2017 2:58:40	PM 35701

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers: * Value exceeds Maximum Contaminant Level.

- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
 - S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits Page 1 of 4
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

Hall Environmental Analysis Laboratory, Inc.

WO#: **1712D88**

11-Jan-18

Client: GHD Project: 2A 20

Sample ID MB-35887 SampType: mblk TestCode: EPA Method 300.0: Anions

Client ID: PBS Batch ID: 35887 RunNo: 48295

Prep Date: 1/6/2018 Analysis Date: 1/7/2018 SeqNo: 1551034 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

Chloride ND 1.5

Sample ID LCS-35887 SampType: Ics TestCode: EPA Method 300.0: Anions

Client ID: LCSS Batch ID: 35887 RunNo: 48295

Prep Date: 1/6/2018 Analysis Date: 1/7/2018 SeqNo: 1551035 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual

Chloride 15 1.5 15.00 0 96.7 90 110

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

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Hall Environmental Analysis Laboratory, Inc.

WO#: **1712D88**

11-Jan-18

Client: GHD Project: 2A 20

Sample ID LCS-35722 SampType: LCS TestCode: EPA Method 8015M/D: Diesel Range Organics LCSS Client ID: Batch ID: 35722 RunNo: 48059 Prep Date: 12/27/2017 Analysis Date: 12/28/2017 SeqNo: 1540466 Units: mg/Kg Analyte Result **PQL** SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Diesel Range Organics (DRO) 10 45 50.00 0 90.4 73.2 114 Surr: DNOP 5.000 90.1 4.5 70 130

Sample ID MB-35722 SampType: MBLK TestCode: EPA Method 8015M/D: Diesel Range Organics Batch ID: 35722 Client ID: PBS RunNo: 48059 Prep Date: Analysis Date: 12/28/2017 SeqNo: 1540467 12/27/2017 Units: mg/Kg Analyte Result **PQL** SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Diesel Range Organics (DRO) ND 10 Motor Oil Range Organics (MRO) ND 50 Surr: DNOP 9.9 10.00 99.4 70 130

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Detection Limit
- W Sample container temperature is out of limit as specified

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GHD

Client:

Hall Environmental Analysis Laboratory, Inc.

WO#: 1712D88

11-Jan-18

Sample D MB-35701 SampType: MBLK TestCode: EPA Method 8015D: Gasoline Range Client D: PBS Batch D: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539809 Units: mg/Kg Analysis Client D: PGS PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Analysis PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual PQL PQL																	
Prep Date: 12/26/2017	Sample ID	MB-35701	SampType: MBLK			TestCode: EPA Method 8015D: Gasoline Range											
Analyte	Client ID:	PBS	Batch ID: 35701			R	tunNo: 4	8032		ů,							
Sample ID LCS-35701 SampType: LCS TestCode: EPA Method 8015D: Gasoline Range	Prep Date:	12/26/2017	Analysis Dat	e: 1 2	2/27/2017	S	SeqNo: 1	539809	Units: mg/K	g							
Sample ID LCS-35701 SampType: LCS TestCode: EPA Method 8015D: Gasoline Range	Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual					
Sample D LCS-35701 SampType: LCS TestCode: EPA Method 8015D: Gasoline Range	Gasoline Ran	ge Organics (GRO)	ND	5.0					-								
Client ID:	Surr: BFB		1100		1000		114	15	316								
Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539810 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GR0) 27 5.0 25.00 0 109 75.9 131 Surr: BFB 1200 1000 124 15 316 Sample ID 1712D88-001AMS SampType: MS TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539812 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Sample ID 1712D88-001AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range	Sample ID LCS-35701 SampType: LCS				TestCode: EPA Method 8015D: Gasoline Range												
Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 27 5.0 25.00 0 109 75.9 131 Surr: BFB 1200 1000 124 15 316 Sample ID 1712D88-001AMS SampType: MS TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539812 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 30 4.9 24.30 0 125 77.8 128 Surr: BFB 1200 971.8 121 15 316 Sample ID 1712D88-001AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539813 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20 S	Client ID: LCSS Batch ID: 35701			R													
Sample ID 1712D88-001AMS SampType: MS TestCode: EPA Method 8015D: Gasoline Range	Prep Date:	p Date: 12/26/2017 Analysis Date: 12/27/2017			S	SeqNo: 1	539810	Units: mg/Kg									
Surr: BFB 1200 1000 124 15 316 Sample ID 1712D88-001AMS SampType: MS TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 30 4.9 24.30 0 125 77.8 128 Surr: BFB 1200 971.8 TestCode: EPA Method 8015D: Gasoline Range Sample ID 1712D88-001AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539813 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline	Analyte	Analyte Res			SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual					
Sample ID 1712D88-001AMS SampType: MS TestCode: EPA Method 8015D: Gasoline Range		ge Organics (GRO)		5.0		0											
Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032	Surr: BFB		1200		1000		124	15	316								
Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539812 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 30 4.9 24.30 0 125 77.8 128 Surr: BFB 1200 971.8 121 15 316 Sample ID 1712D88-001AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539813 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20	Sample ID 1712D88-001AMS SampType: MS					TestCode: EPA Method 8015D: Gasoline Range											
Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 30 4.9 24.30 0 125 77.8 128 Surr: BFB 1200 971.8 121 15 316 Sample ID 1712D88-001AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539813 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20 S	Client ID: 11135250-7-122117- Batch ID: 35701				R	tunNo: 4											
Gasoline Range Organics (GRO) 30 4.9 24.30 0 125 77.8 128 Surr: BFB 1200 971.8 121 15 316 Sample ID 1712D88-001AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539813 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20 S	Prep Date:	ep Date: 12/26/2017 Analysis Date: 12/27/2017			S	SeqNo: 1	539812	Units: mg/K									
Surr: BFB 1200 971.8 121 15 316 Sample ID 1712D88-001AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539813 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20 S	Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual					
Sample ID 1712D88-001AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539813 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20 S	Gasoline Ran	ge Organics (GRO)		4.9		0											
Client ID: 11135250-7-122117- Batch ID: 35701 RunNo: 48032 Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539813 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20 S	Surr: BFB		1200		971.8		121	15	316								
Prep Date: 12/26/2017 Analysis Date: 12/27/2017 SeqNo: 1539813 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20 S	Sample ID	1712D88-001AMS	TestCode: EPA Method 8015D: Gasoline Range														
Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20 S	Client ID: 11135250-7-122117- Batch ID: 35701					RunNo: 48032											
Gasoline Range Organics (GRO) 32 4.9 24.63 0 128 77.8 128 3.74 20 S	Prep Date:	Prep Date: 12/26/2017 Analysis Date: 12/27/2017			S	SeqNo: 1	539813	Units: mg/Kg									
	Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual					
Surr: BFB 1200 985.2 123 15 316 0 0		ge Organics (GRO)		4.9		0						S					
	Surr: BFB		1200		985.2		123	15	316	0	0						
Sample ID MB-35757 SampType: MBLK TestCode: EPA Method 8015D: Gasoline Range	Sample ID MB-35757 SampType: MBLK				TestCode: EPA Method 8015D: Gasoline Range												
Client ID: PBS Batch ID: 35757 RunNo: 48111	Client ID: PBS Batch ID: 35757			R	tunNo: 4	8111											
Prep Date: 12/28/2017 Analysis Date: 12/29/2017 SeqNo: 1542681 Units: %Rec	Prep Date:	12/28/2017	Analysis Dat	e: 1 2	2/29/2017	SeqNo: 1542681			Units: %Red	;							
Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual	Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual					
Surr: BFB 830 1000 83.3 15 316	Surr: BFB		830		1000		83.3	15	316								
Sample ID LCS-35757 SampType: LCS TestCode: EPA Method 8015D: Gasoline Range	Sample ID	LCS-35757	SampTyp	e: LC	es	Test	tCode: E	PA Method	8015D: Gaso	line Rang	e						
Client ID: LCSS Batch ID: 35757 RunNo: 48111	Client ID:	LCSS	Batch II	D: 35	757	R	tunNo: 4	8111									
Prep Date: 12/28/2017 Analysis Date: 12/29/2017 SeqNo: 1542682 Units: %Rec	Prep Date:	12/28/2017	Analysis Dat	e: 1 :	2/29/2017	S	eqNo: 1	542682	Units: %Red	;							
		•															
Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual	Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual					

Qualifiers:

Value exceeds Maximum Contaminant Level.

Sample Diluted Due to Matrix D

Η Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

Practical Quanitative Limit

% Recovery outside of range due to dilution or matrix

- В Analyte detected in the associated Method Blank
- Е Value above quantitation range

J

Analyte detected below quantitation limits

Sample pH Not In Range P

Page 4 of 4

RLReporting Detection Limit

Sample container temperature is out of limit as specified



Hall Environmental Analysis Laboratory 4901 Hawkins NE Albuquerque, NM 87109

TEL: 505-345-3975 FAX: 505-345-4107 Website: www.hallenvironmental.com

Sample Log-In Check List

Client Name: GHD Work Order Number: 1712D88 RcptNo: 1 una. Received By: Erin Melendrez 12/22/2017 9:40:00 AM Completed By: Sophia Campuzano 12/22/2017 1:50:53 PM DDS 12/26/17 Reviewed By: Chain of Custody 1. Custody seals intact on sample bottles? Yes No 🗌 Not Present ✓ 2. Is Chain of Custody complete? Yes 🗸 No 🗌 Not Present 3. How was the sample delivered? Courier Log In 4. Was an attempt made to cool the samples? Yes V No 🗌 NA Were all samples received at a temperature of >0° C to 6.0°C Yes V No | NA 🗌 Sample(s) in proper container(s)? Yes V No 7. Sufficient sample volume for indicated test(s)? No T 8. Are samples (except VOA and ONG) properly preserved? Yes ~ No [9. Was preservative added to bottles? No V Yes NA 🗌 10.VOA vials have zero headspace? Yes No 🗌 No VOA Vials 11. Were any sample containers received broken? Yes No V # of preserved bottles checked 12. Does paperwork match bottle labels? V No 🗌 for pH: (Note discrepancies on chain of custody) (<2 or >12 unless noted) 13. Are matrices correctly identified on Chain of Custody? Adjusted? Yes V No 🗌 14. Is it clear what analyses were requested? ~ No 🗌 15. Were all holding times able to be met? Yes 🗸 No 🗌 Checked by: (If no, notify customer for authorization.) Special Handling (if applicable) 16. Was client notified of all discrepancies with this order? Yes No L NA V Person Notified Date: By Whom: Via: eMail Phone Fax In Person Regarding: Client Instructions: 17. Additional remarks: 18. Cooler Information Cooler No | Temp °C | Condition | Seal Intact | Seal No Seal Date Signed By 4.6 Good Yes

			ustody Record	Turn-Around				н	111	F	N	/TE	20	NI	VIE	NT	ΑI			
Client:	GH) SE(2	WICES, INC.	Standard □ Rush_				1000											RY	
Mailing	Address	6011	SCIR, CP JOHN WITCH	21 24				www.hallenvironmental.com												
AZE	SENSE		M 8710	Project #: 1135360/7				4901 Hawkins NE - Albuquerque, NM 87109 Tel. 505-345-3975 Fax 505-345-4107 Analysis Request												
			0.780CKTSCH@GHDCan	The same of the sa	22 12 20 20 20			(À	0			Anal		Req	ues					
	Package:		☐ Level 4 (Full Validation)	BERNA	AD BOO	CHISCH	TMB's (8021)	+ TPH (Gas only)	30 / MR		SIMS)		PO4,SO	PCB's						
Accred	AP	□ Othe	er	On Ice:	onavl ØYes	□ No	+	+ TPH	RO / DF	18.1)			O3,NO2,	Pesticides / 8082		(A)	(38)			
□ EDD	(Type)			Sample Tem	perature:5.	1-0-5(cF)=	표	TBE	B (G	4 por	10 or	8 Metals	C,N	icide	(AC	ni-VC	73			
Date	Time	Matrix	Sample Request ID	Container Type and #	Preservative Type	4.6 HEAL No.	BTEX + MTBE	BTEX + MTBE	TPH 8015B (GRO / DRO / MRO)	TPH (Method 418.1) FDB (Method 504.1)	PAH's (8310 or	RCRA 8 N	Anions (F,CI,NO ₃ ,NO ₂ ,PO ₄ ,SO ₄)	8081 Pest	8260B (VOA)	8270 (Semi-VOA)	CHIGHDE			
DAI	9:26	SOIL	1135366-7-12217-881	402	ICE	-001			/	1	1			-	~	~	V.			
רוולם	9:30	4000	11135260-7-122117-882	402	I4E	-002			/	+							V			
										#								\pm		
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Date:	Time:	Relinquish	ed by:	Received by:	1	Date 7 Pene 0940														
11-0	necessary,	samples ub	mitted to Hall Environmental may be subco	ontracted to other a	ccredited laboratorie	es. This serves as notice of this	s possit	ility. A		contract					ted on	the ar	nalytica	report.		