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June 29, 2020

New Mexico Oil Conservation Division – District I
1625 N. French Drive
Hobbs, New Mexico 88240

**Re: 2020 Soil Assessment Report and Closure Request – Warren Field Water Transfer Line
Case No. 1RP-2870
Lea County, New Mexico**

Dear New Mexico Oil Conservation Division:

Chevron Environmental Management Company (CEMC) submits herein the *2020 Soil Assessment Report* for 1RP-2870, Warren Field Water Transfer Line, which is located approximately 11.21 miles southeast of Hobbs, in Unit I, Section 25, Township 20 South, Range 38 East in Lea County, New Mexico. The Report was prepared by Arcadis U.S., Inc. (Arcadis), on behalf of CEMC. Based on the analytical results associated with the recent assessment activities, CEMC respectfully requests closure of 1RP-2870.

If you have any questions regarding this submittal, please contact Scott Foord of Arcadis at (713) 953-4853 or me at (832) 854-5620.

Respectfully,

Chevron Environmental Management Company
on behalf of
Chevron U.S.A. Inc.

A handwritten signature in blue ink, appearing to read "Adriane Gifford".

Adriane Gifford
Project Manager

Encl.



Chevron Environmental Management Company

2020 SOIL ASSESSMENT REPORT

Warren Field Water Transfer Line
Case No. 1RP-2870

July 29, 2020

2020 SOIL ASSESSMENT REPORT

**2020 SOIL
ASSESSMENT
REPORT**

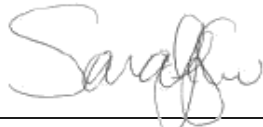
Warren Field Water Transfer Line



Sarah Johnson
Task Manager II

Prepared for:

Adriane Gifford
Project Manager
Chevron Environmental Management
Company
1500 Louisiana Street
Houston, Texas 77002



Scott Foord, PG
Certified Project Manager

Prepared by:

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Fax 432 687 5401

Our Ref:

30056694

Date:

July 29, 2020

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2020 SOIL ASSESSMENT REPORT

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2020 SOIL ASSESSMENT REPORT

1 INTRODUCTION

Arcadis U.S., Inc. (Arcadis) has prepared this Soil Assessment Report (Report), on behalf of Chevron Environmental Management Company (CEMC), summarizing the soil assessment activities for the Warren Field Water Transfer Line (Site).

2 PROJECT SUMMARY

The Site is located approximately 11.21 miles southeast of Hobbs, in Unit I, Section 25, Township 20 South, Range 38 East, Lea County, New Mexico. A site map is included as **Figure 1**.

On October 28, 2012, per the Initial C-141 Form, a corroded 2-inch diameter nipple near the transition released 40 barrels (bbls) of produced water at the Site. The release affected an approximate 1,400 square feet area. The New Mexico Oil Conservation Division (NMOCD) Initial C-141 Form states that visibly stained soil was removed by an emergency response team, soil samples were collected and submitted to Cardinal Laboratories for analysis. However, no additional associated documentation of these activities is currently available. The Initial C-141 Form was submitted to the NMOCD on November 16, 2012 and assigned remediation permit number 1RP-2870. The Initial C-141 Form is included as **Appendix A**. According to the New Mexico Office of the State Engineers (NMOSE) database, there is a water well approximately 0.79 miles to the southeast of the Site with a depth to groundwater of approximately 40 feet below ground surface (bgs).

3 SOIL ASSESSMENT

On May 18-19, 2020, Arcadis personnel collected soil samples at ten locations (HA-1 through HA-10) within the release area. The soil samples were collected with a hand auger at depths ranging from the surface (0"-6") to approximately 6 feet bgs. Boring logs are available in **Appendix B**. The sample locations were determined based on information available on the Initial C-141 Form associated with the release and from information attained from Chevron Operations staff familiar with the historical release and the previous site remediation activities. The soil samples were collected in two- and four-ounce jars provided by Eurofins TestAmerica Laboratory and shipped overnight via Fedex. Upon receipt by laboratory, the soil samples were analyzed for chloride, total petroleum hydrocarbons as gasoline (TPH-GRO), TPH as diesel (TPH-DRO), and TPH as oil (TPH-ORO), and benzene, toluene, ethylbenzene and total xylenes (BTEX) by United States Environmental Protection Agency (USEPA) Methods 300, 8015 and 8021B, respectively. Soil sample locations are presented in **Figure 2**.

4 SOIL ANALYTICAL RESULTS

The soil sample analytical results were compared to the New Mexico Administration Code (NMAC) screening levels for chloride, TPH, and BTEX for a site with a depth to groundwater less than 50 feet bgs. A summary of the soil sample analytical results is presented in **Table 1**. Copies of the certified analytical reports and chain-of-custody documentation from Eurofins TestAmerica are presented in **Appendix C**. The soil analytical map is presented in **Figure 3**.

2020 SOIL ASSESSMENT REPORT

4.1 Chloride

- Chloride concentrations were reported below the NMAC standard of 600 milligrams/Kilogram (mg/Kg) at all sample locations.

4.2 TPH

- Total TPH exceeded the NMAC Standard of 100 mg/Kg in three of the 41 soil samples collected, with the exceeding concentrations were
 - 140 mg/Kg at HA-2 (6 feet bgs);
 - 132 mg/Kg at HA-3 (0 – 6 inches bgs); and
 - 119 mg/Kg at HA-3 (6 feet bgs)

4.3 BTEX

- BTEX concentrations were reported below the NMAC standard of 50 mg/Kg at all sample locations.

5 SUMMARY

In summary, the 2020 soil investigation activities indicate the following:

- Total TPH was detected above the NMAC Standard of 100 mg/Kg within three shallow soil samples during the recent shallow soil investigation.

6 RECOMMENDATION

Analytical results associated with recent assessment activities conducted in 2020 indicate that concentrations of TPH slightly exceeding the NMAC Standard are present in boring HA-2 at a depth of 6 feet bgs and in boring HA-3 at the surface (0 – 6 inches bgs) and at 6 feet bgs. All additional soil samples collected during the recent soil assessment were below the TPH, BTEX and chloride standard of 100 mg/Kg, 50 mg/Kg and 600 mg/Kg, respectively. Arcadis believes these minor TPH exceedances do not pose a risk to groundwater or the environment based on shallow depths and limited lateral extent. A photograph log is presented in **Appendix D**. As such, Arcadis, on behalf of CEMC, respectfully requests closure of 1RP-2870. The Final C-141 Form is presented in **Appendix E**.

TABLES



Table 1
2020 Soil Analytical Results
Chevron Environmental Management Company
Warren Field Water Transfer Line
Lea County, New Mexico



Sample I.D. No.	Sample Depth (feet bgs)	Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Total BTEX	Gasoline Range Organics	Diesel Range Organics	Oil Range Organics	Total TPH	Chloride
			(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)
NMAC Standards			10	--	--	--	50	--	--	--	100	600
HA-1	0'-6"	05/18/2020	<0.000636	<0.00139	<0.00103	<0.00114	<0.004196	<0.611	<1.72	19	22	10 J
	2'	05/18/2020	<0.000787	<0.00172	<0.00127	<0.00141	<0.005187	<0.714	<2.16	<6.31	<9	12 J
	4'	05/18/2020	<0.000656	<0.00144	<0.00106	<0.00118	<0.004336	<0.603	<1.80	<5.25	<8	9 J
	6'	05/18/2020	<0.000689	<0.00151	<0.00111	<0.00123	<0.004539	<0.654	<1.91	<5.59	<8	13 J
HA-2	0'-6"	05/18/2020	<0.000679	<0.00149	<0.00110	<0.00122	<0.004489	<0.668	<1.85	<5.41	<8	11 J
	2'	05/18/2020	<0.000645	<0.00141	<0.00104	<0.00116	<0.004255	<0.616	<1.76	<5.14	<8	9 J
	4'	05/18/2020	<0.000787	<0.00172	<0.00127	<0.00141	<0.005187	<0.693	<1.76	<6.33	20	12 J
	6'	05/18/2020	<0.000758	<0.00166	<0.00123	<0.00136	<0.005008	<0.717	49	90	140	44
HA-3	0'-6"	05/18/2020	<0.000645	<0.00141	<0.00104	<0.00116	<0.004255	<0.598	58.7 J	<73.2	132 J	9 J
	2'	05/18/2020	<0.000754	<0.00165	<0.00122	<0.00135	<0.004974	<0.686	7.07 J	<5.93	14 J	11 J
	4'	05/18/2020	<0.000665	<0.00146	<0.00108	<0.00119	<0.004395	<0.674	<1.84	<5.37	<8	11 J
	6'	05/18/2020	<0.000761	<0.00167	<0.00123	<0.00136	<0.005021	<0.691	<30.3	<88.5	119	21 J
HA-4	0'-6"	05/18/2020	<0.000815	<0.00178	<0.00132	<0.00146	<0.005375	<0.726	3.43 J	<6.43	11 J	12 J
	2'	05/18/2020	<0.000649	<0.00142	<0.00105	<0.00116	<0.004279	<0.653	<1.77	<5.17	<8	12 J
	4'	05/18/2020	<0.000750	<0.00164	<0.00121	<0.00135	<0.004950	<0.708	5.29 J	<6.06	12 J	14 J
	6'	05/18/2020	<0.000747	<0.00164	<0.00121	<0.00134	<0.004937	<0.727	<2.01	<5.89	<9	22 J
HA-5	0'-6"	05/18/2020	<0.000813	<0.00178	<0.00132	<0.00146	<0.005373	<0.765	<2.25	<6.58	<10	28
	2'	05/18/2020	<0.000643	<0.00141	<0.00104	<0.00115	<0.004243	<0.654	<1.86	<5.72	19	13 J
	4'	05/18/2020	<0.000656	<0.00144	<0.00106	<0.00118	<0.004336	<0.696	<1.96	<5.72	<9	10 J
	6'	05/18/2020	<0.000774	<0.00170	<0.00125	<0.00139	<0.005114	<0.711	8.84 J	<5.91	15 J	12 J
HA-6	0'-6"	05/19/2020	<0.000836	<0.00183	<0.00135	<0.00150	<0.005516	<0.765	<2.25	<6.58	<10	12 J
	2'	05/19/2020	<0.000649	<0.00142	<0.00105	<0.00116	<0.004279	<0.654	<1.86	16	19	12 J
	4'	05/19/2020	<0.000694	<0.00152	<0.00112	<0.00124	<0.004574	<0.696	<1.96	<5.72	<8	11 J
	6'	05/19/2020	<0.000725	<0.00159	<0.00117	<0.00130	<0.004785	<0.711	8.84 J	<5.91	15 J	12 J
HA-7	0'-6"	05/19/2020	<0.000958	<0.00210	<0.00155	<0.00172	<0.006328	<0.967	7.46 J	<7.57	16 J	9
	2'	05/19/2020	<0.000775	<0.00170	<0.00125	<0.00139	<0.005115	<0.744	<2.15	<6.29	<9	3 J
	4'	05/19/2020	<0.000741	<0.00162	<0.00120	<0.00133	<0.004891	<0.731	<2.16	<6.31	<9	3 J
	6'	05/19/2020	<0.000799	<0.00175	<0.00129	<0.00143	<0.005269	<0.718	<2.16	19	22	3 J
HA-8	3'	05/19/2020	<0.000779	<0.00171	<0.00126	<0.00140	<0.005149	<0.687	<2.15	19	22	3 J
	2'	05/19/2020	<0.000647	<0.00142	<0.00105	<0.00116	<0.004277	<0.606	<1.75	17	19	2 J
	4'	05/19/2020	0.000856 J	<0.00168	<0.00124	<0.00138	0.005156 J	<0.808	5.44 J	<6.29	13 J	3 J
	6'	05/19/2020	<0.000788	<0.00173	<0.00128	<0.00141	<0.005208	<0.700	<2.14	<6.27	<9	4 J
HA-9	0'-6"	05/19/2020	<0.000638	<0.00140	<0.00103	<0.00114	<0.004208	<0.588	10	38	48	3 J
	2'	05/19/2020	<0.000657	<0.00144	<0.00106	<0.00118	<0.004337	<0.633	5.08 J	24	24 J	2 J
	4'	05/19/2020	<0.000672	<0.00147	<0.00109	<0.00121	<0.004442	<0.653	5.10 J	21	26 J	3 J
	6'	05/19/2020	<0.000713	<0.00156	<0.00115	<0.00128	<0.004703	<0.663	14	19	33	165
HA-10	0'-6"	05/19/2020	<0.000639	<0.00140	<0.00103	<0.00115	<0.004219	<0.633	5.53 J	27	33 J	3 J
	2'	05/19/2020	0.00101 J	<0.00172	<0.00127	<0.00141	0.005410 J	<0.707	<2.16	23	26	6
	4'	05/19/2020	<0.000678	<0.00148	<0.00110	<0.00122	<0.004478	<0.708	4.01 J	17	21 J	3 J
	6'	05/19/2020	<0.000731	<0.00160	<0.00118	<0.00131	<0.004821	<0.746	<2.11	26	29	4 J

Legend:
 Any flags reported are indicated in **bold**
 "<" indicates the analyte was not detected at or above the Method Detection Limit (MDL)
 NMAC : New Mexico Administration Code
 BTEX : Benzene, Toluene, Ethylbenzene, and Total Xylenes
 J: Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value
 H: Sample was prepped or analyzed beyond the specified holding time
Analytes exceeding NMAC Standards are indicated in yellow
 mg/kg: Milligram per Kilogram
 " " : Indicates one foot
 " : Indicated inches
 bgs: below ground surface
 HA: Hand Auger Sample Point Location

- Notes:
 1. Chloride analyzed by USEPA Method 300.0
 2. Gasoline Range Organics [C6-C10] analyzed by USEPA Method 8015D
 3. Diesel Range Organics [C10-C28] and Oil Range Organics [C28-36] analyzed by USEPA Method 8015D
 4. BTEX analyzed by EPA Method 8260C
 5. Closure Criteria New Mexico Administrative Code 19.15.29.12.E(2)

FIGURES



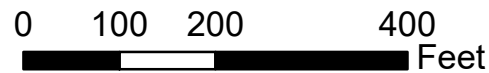


Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

Legend

— Site Boundary

Note:
 1. Datum: GCS_WGS_1984
 2. Site Location: 32.543549°, -103.094944°



Chevron Environmental Management Company
 Warren Field Water Transfer
 Lea County, New Mexico

SITE DETAILS MAP



FIGURE
1

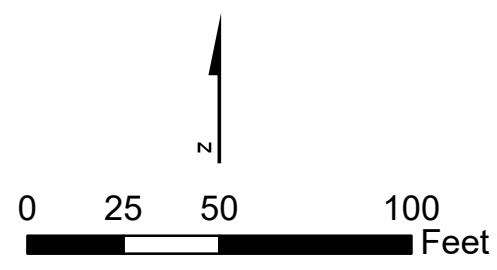


Legend

- Soil Sample Locations
- Site Boundary

Note:

1. Datum: GCS_WGS_1984
2. Site Location: 32.543549°, -103.094944°



Chevron Environmental Management Company
Warren Field Water Transfer
Lea County, New Mexico

SOIL SAMPLE LOCATIONS MAP

 **ARCADIS** | **FIGURE 2**

Document Path: \\arcadis-us\office\data\Houston-TX\EN\Chevron\Texaco TX8\HES Transfer\Warren Field Water Transfer 2020 SOW\GIS - Warren Field\Figure 1 - Site Details Map 03.17.2020

HA-10				
SAMPLE DATE	MAY 19, 2020			
DEPTH (ft)	0-"6"	2'	4'	5'
TOTAL BTEX	<0.004219	0.005410 J	<0.004478	<0.004821
TOTAL TPH	33 J	26	21 J	29
CHLORIDE	3 J	6	3 J	4 J

HA-9				
SAMPLE DATE	MAY 19, 2020			
DEPTH (ft)	0-"6"	2'	4'	5'
TOTAL BTEX	<0.004208	<0.004337	<0.004442	<0.004703
TOTAL TPH	48	30 J	26 J	33
CHLORIDE	3 J	2 J	3 J	165

HA-8				
SAMPLE DATE	MAY 19, 2020			
DEPTH (ft)	0-"6"	2'	4'	5'
TOTAL BTEX	<0.005149	<0.004277	0.005156 J	<0.005208
TOTAL TPH	22	19	13 J	<9
CHLORIDE	3 J	2 J	3 J	4 J

HA-6				
SAMPLE DATE	MAY 19, 2020			
DEPTH (ft)	0-"6"	2'	4'	6'
TOTAL BTEX	<0.005516	<0.004279	<0.004574	<0.004785
TOTAL TPH	<10	19	<8	15 J
CHLORIDE	12 J	12 J	11 J	12 J

HA-7				
SAMPLE DATE	MAY 19, 2020			
DEPTH (ft)	0-"6"	2'	4'	6'
TOTAL BTEX	<0.006328	<0.005115	<0.004891	<0.005269
TOTAL TPH	16 J	<9	<9	22
CHLORIDE	9	3 J	3 J	3 J

HA-4				
SAMPLE DATE	MAY 18, 2020			
DEPTH (ft)	0-"6"	2'	4'	6'
TOTAL BTEX	<0.005375	<0.004279	<0.004950	<0.004937
TOTAL TPH	11 J	<8	12 J	<9
CHLORIDE	12 J	12 J	14 J	22 J

HA-5				
SAMPLE DATE	MAY 18, 2020			
DEPTH (ft)	0-"6"	2'	4'	6'
TOTAL BTEX	<0.005373	<0.004243	<0.004336	<0.005114
TOTAL TPH	<10	19	<9	15 J
CHLORIDE	28	13 J	10 J	12 J

HA-1				
SAMPLE DATE	MAY 18, 2020			
DEPTH (ft)	0-"6"	2'	4'	6'
TOTAL BTEX	<0.004196	<0.005187	<0.004336	<0.004539
TOTAL TPH	22	<9	<8	<8
CHLORIDE	10 J	12 J	9 J	13 J

HA-2				
SAMPLE DATE	MAY 18, 2020			
DEPTH (ft)	0-"6"	2'	4'	6'
TOTAL BTEX	<0.004489	<0.004255	<0.005187	<0.005008
TOTAL TPH	<8	<8	20	140
CHLORIDE	11 J	9 J	12 J	44

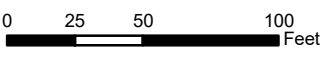
HA-3				
SAMPLE DATE	MAY 18, 2020			
DEPTH (ft)	0-"6"	2'	4'	6'
TOTAL BTEX	<0.004255	<0.004974	<0.004395	<0.005021
TOTAL TPH	132 J	14 J	<8	119
CHLORIDE	9 J	11 J	11 J	21 J



Legend

- Soil Sample Locations
- Site Boundary

1. Datum: GCS_WGS_1984
2. Site Location: 32.543549°, -103.094944°



- Notes:
- Any flags reported are indicated in **bold**.
 - < Indicates the analyte was not detected at or above the Method Detection Limit (MDL).
 - NMAC Indicates New Mexico Administration Code.
 - BTEX Indicates Benzene, Toluene, Ethylbenzene, and Total Xylenes.
 - J Indicates result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
 - H Indicates sample was prepped or analyzed beyond the specified holding time.
 - Analytes exceeding NMAC Standards are indicated in yellow.**
 - mg/kg = Milligram per Kilogram.
 - "'" Indicates one foot.
 - "" Indicates inches.
 - bgs = Below ground surface.
 - HA = Hand Auger Sample Point Location.
 - Chloride analyzed by USEPA Method 300.0.
 - Gasoline Range Organics [C6-C10] analyzed by USEPA Method 8015D.
 - Diesel Range Organics [C10-C28] and Oil Range Organics [C28-36] analyzed by USEPA Method 8015D.
 - Total TPH is sum of result value of Gasoline Range Organics [C6-C10], Diesel Range Organics [C10-C28] and Oil Range Organics [C28-36].
 - BTEX analyzed by EPA Method 8260C.
 - Closure Criteria New Mexico Administrative Code 19.15.29.12.E(2).

Chevron Environmental Management Company
Warren Field Water Transfer
Lea County, New Mexico

Soil Analytical Results Map

FIGURE **3**

APPENDIX A

Initial C-141 Form 1RP-2870



HOBBS OCD

NOV 19 2012

District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Avenue, Artesia, NM 88210
District III
1000 Rio Brazos Road, Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy Minerals and Natural Resources **RECEIVED**
Oil Conservation Division
1220 South St. Francis Dr.
Santa Fe, NM 87505

Form C-141
Revised October 10, 2003

Submit 2 Copies to appropriate
District Office in accordance
with Rule 116 on back
side of form

Release Notification and Corrective Action

OPERATOR Initial Report Final Report

Name of Company: Chevron USA	Contact: Bradley Blevins
Address: P.O. Box 190, Hobbs, NM 88240	Telephone No.: (575) 391-1462 ext. 86424
Facility Name: Warren Field Water Transfer Line	Facility Type: Water Transfer Line

Surface Owner:	Mineral Owner:	Lease No.:
-----------------------	-----------------------	-------------------

LOCATION OF RELEASE *NEAREST WELL PEP #24
API #30-025-34104*

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
I	25	20S	38E					Lea

Latitude: N32° 32' 37.12" Longitude: W103° 05' 41.80"

NATURE OF RELEASE *GW @ 70'*

Type of Release: Produced water	Volume of Release: 40 bbls	Volume Recovered: 0 bbls
Source of Release: Water Transfer Line	Date and Hour of Occurrence: 10/28/12	Date and Hour of Discovery: 10/28/12 @ 17:30
Was Immediate Notice Given? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Not Required	If YES, To Whom?	
By Whom? Bradley Blevins	Date and Hour:	
Was a Watercourse Reached? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If YES, Volume Impacting the Watercourse:	

Depth to water: ~60 ft
If a Watercourse was Impacted, Describe Fully:

Describe Cause of Problem and Remedial Action Taken.* Release was caused by corrosion of 2 inch nipple near the transition. Approximately 40 bbls of produced water was released with no recovery. An Emergency Response Team arrived at the release area and began continuous abatement of the impacted area.

Describe Area Affected and Cleanup Action Taken.* Approximately 1,400 square feet of area was affected by the release of produced water. Visibly stained soil was excavated and hauled away for disposal at a state approved facility. Soil samples were collected and submitted to Cardinal Laboratories for testing. Upon receiving acceptable results and NMOCD approval, the affected area will be backfilled, and returned to proper conditions.

I hereby certify that the information given above is true and complete to the best of my knowledge and understand that pursuant to NMOCD rules and regulations all operators are required to report and/or file certain release notifications and perform corrective actions for releases which may endanger public health or the environment. The acceptance of a C-141 report by the NMOCD marked as "Final Report" does not relieve the operator of liability should their operations have failed to adequately investigate and remediate contamination that pose a threat to ground water, surface water, human health or the environment. In addition, NMOCD acceptance of a C-141 report does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations.

Signature: <i>Bradley Blevins</i>	OIL CONSERVATION DIVISION <i>Bradley Blevins</i> Environmental Specialist	
Printed Name: Bradley Blevins	Approved by: District Superintendent	
Title: EH & S Field Specialist	Approval Date: 11/16/12	Expiration Date: 01/16/13
E-mail Address: bradley.blevins@chk.com	Conditions of Approval: SUBMIT FINAL C-141 BY 01/16/13	Attached <input type="checkbox"/>
Date: 11-16-12 Phone: (575) 391-1462 ext. 86424	IRP-11-12-2870	

* Attach Additional Sheets If Necessary

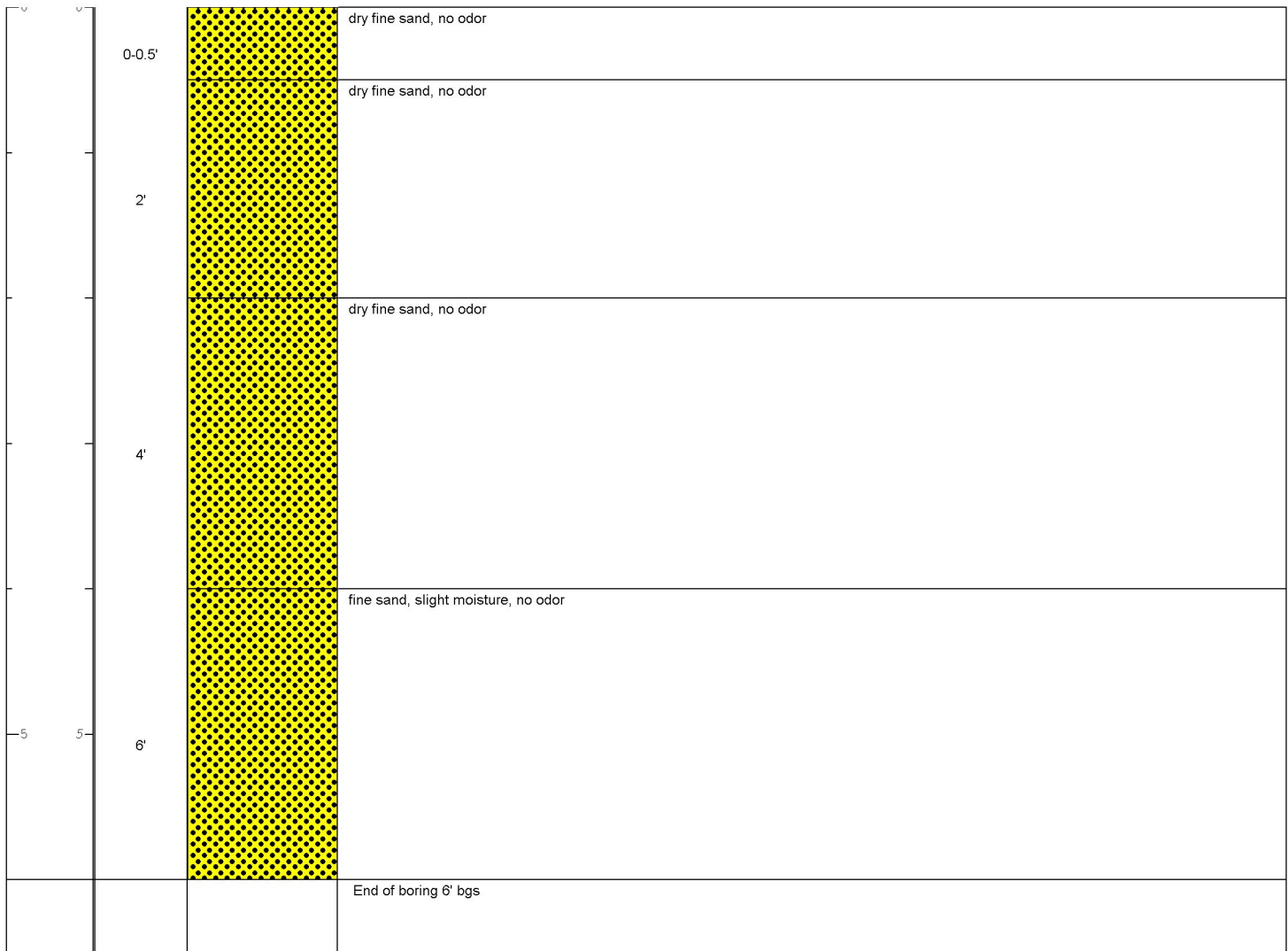
APPENDIX B


Boring Logs



Date Start/Finish: 5/18/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-1 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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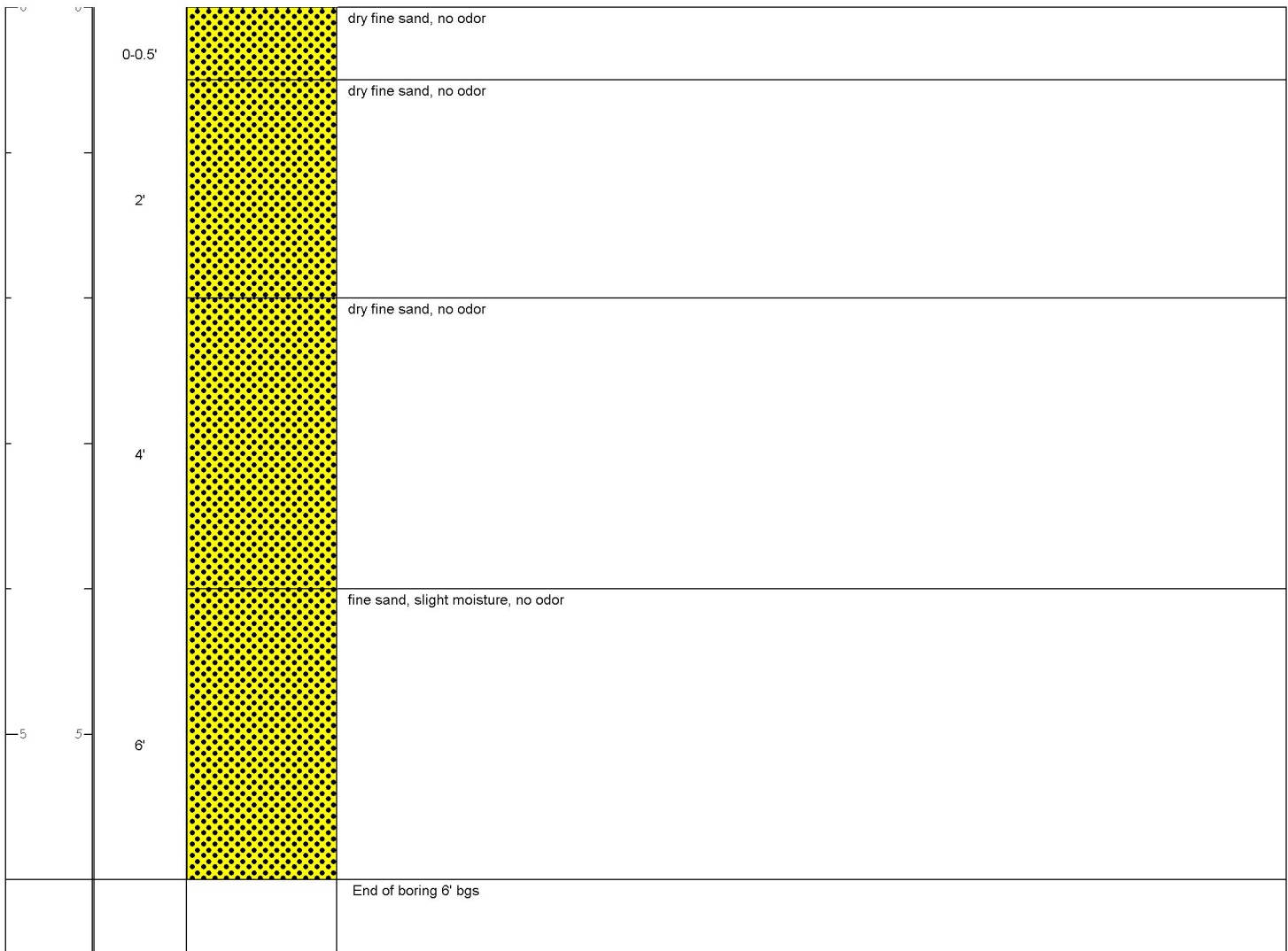
DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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Date Start/Finish: 5/18/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-2 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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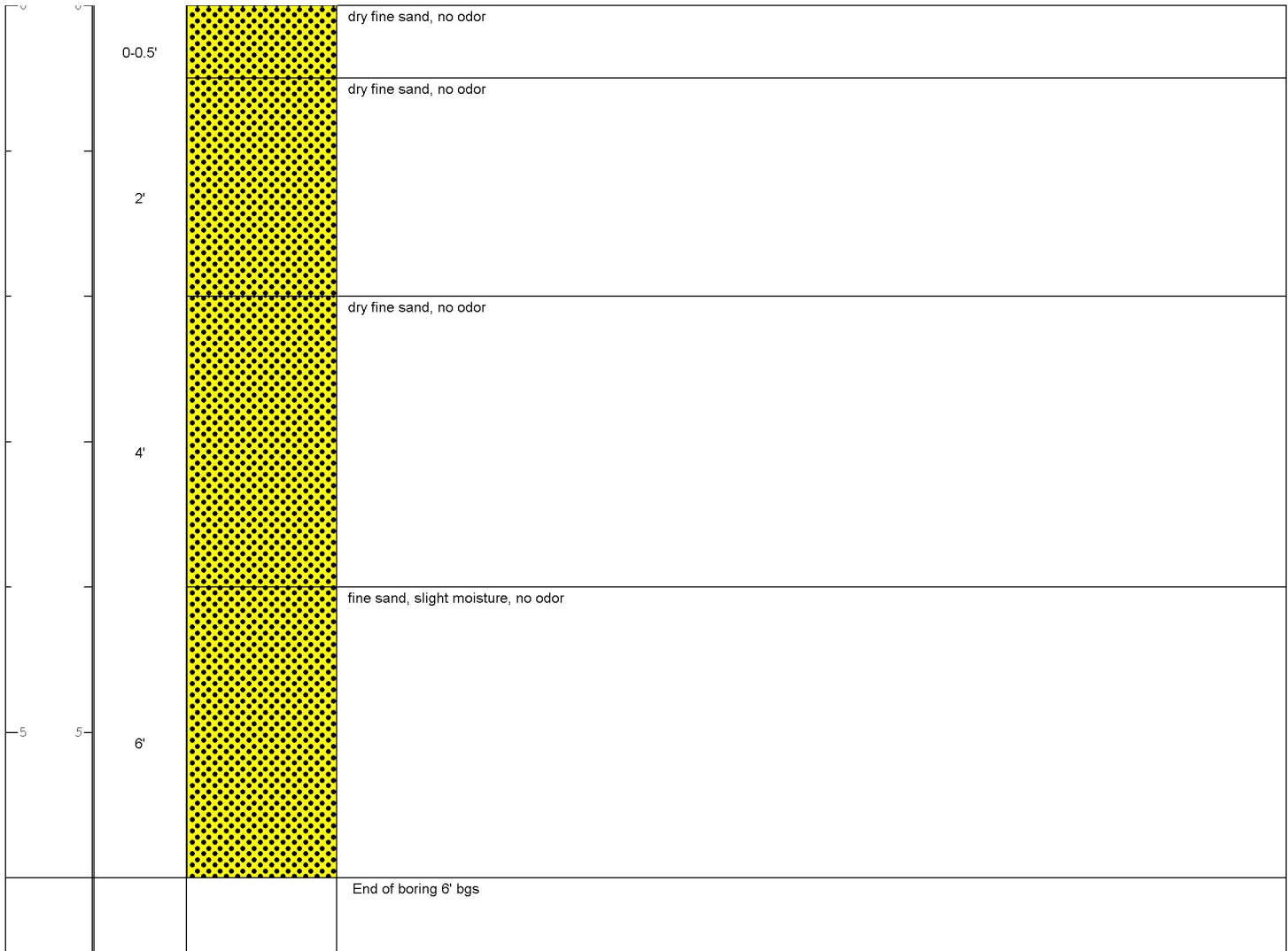
DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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Date Start/Finish: 5/18/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-3 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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Date Start/Finish: 5/18/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-4 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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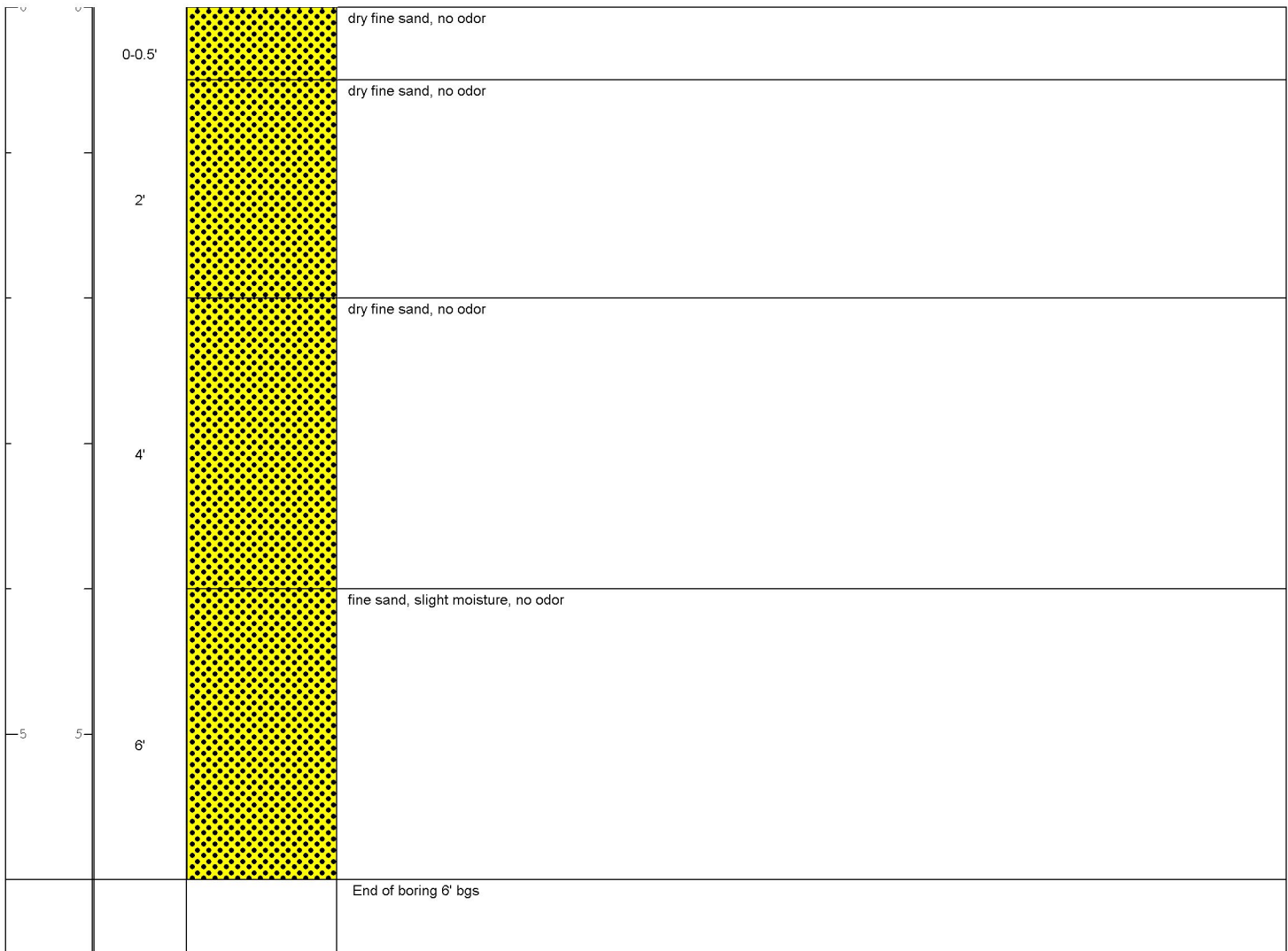
DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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Date Start/Finish: 5/18/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-5 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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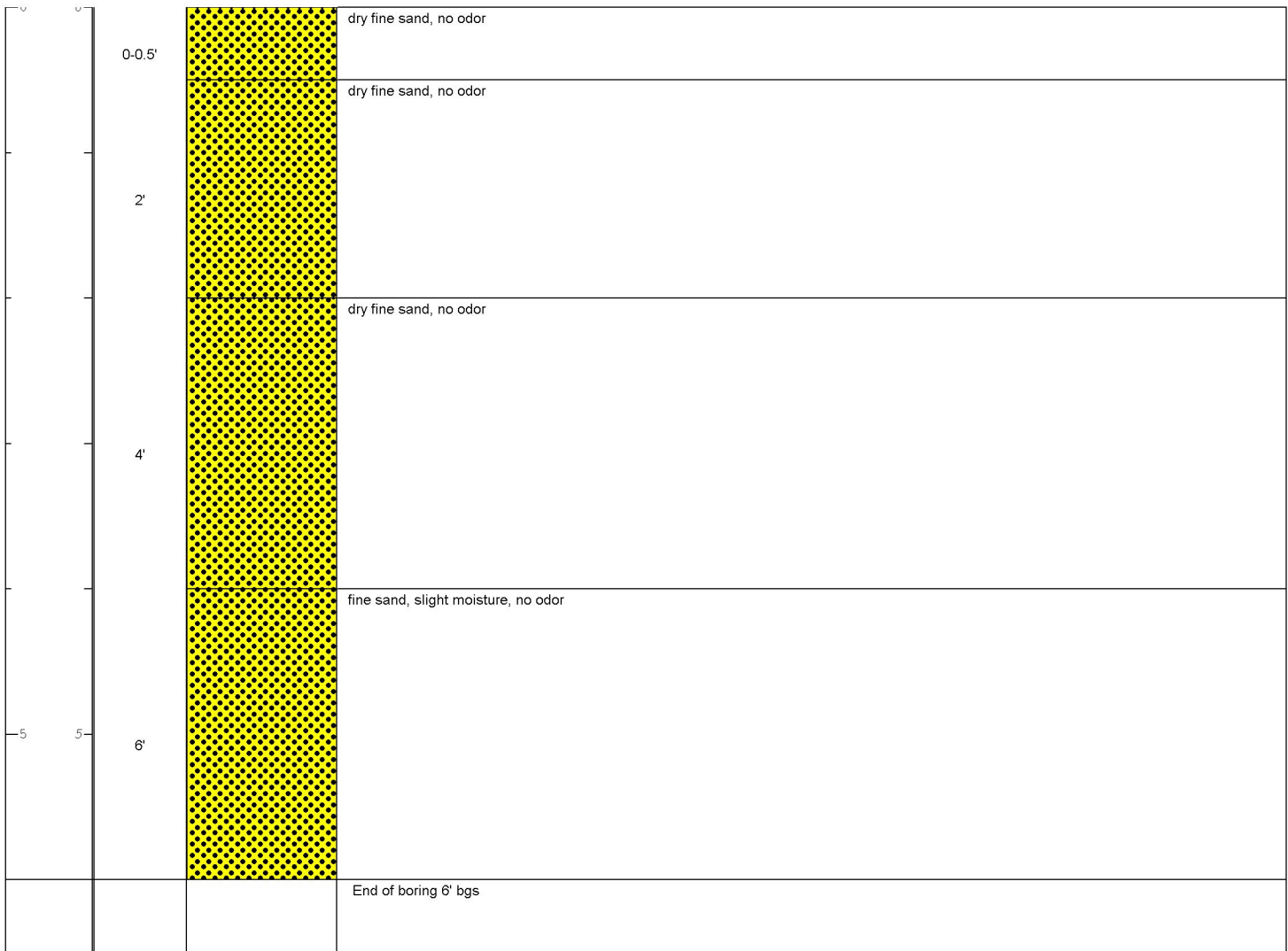
DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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Date Start/Finish: 5/19/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-6 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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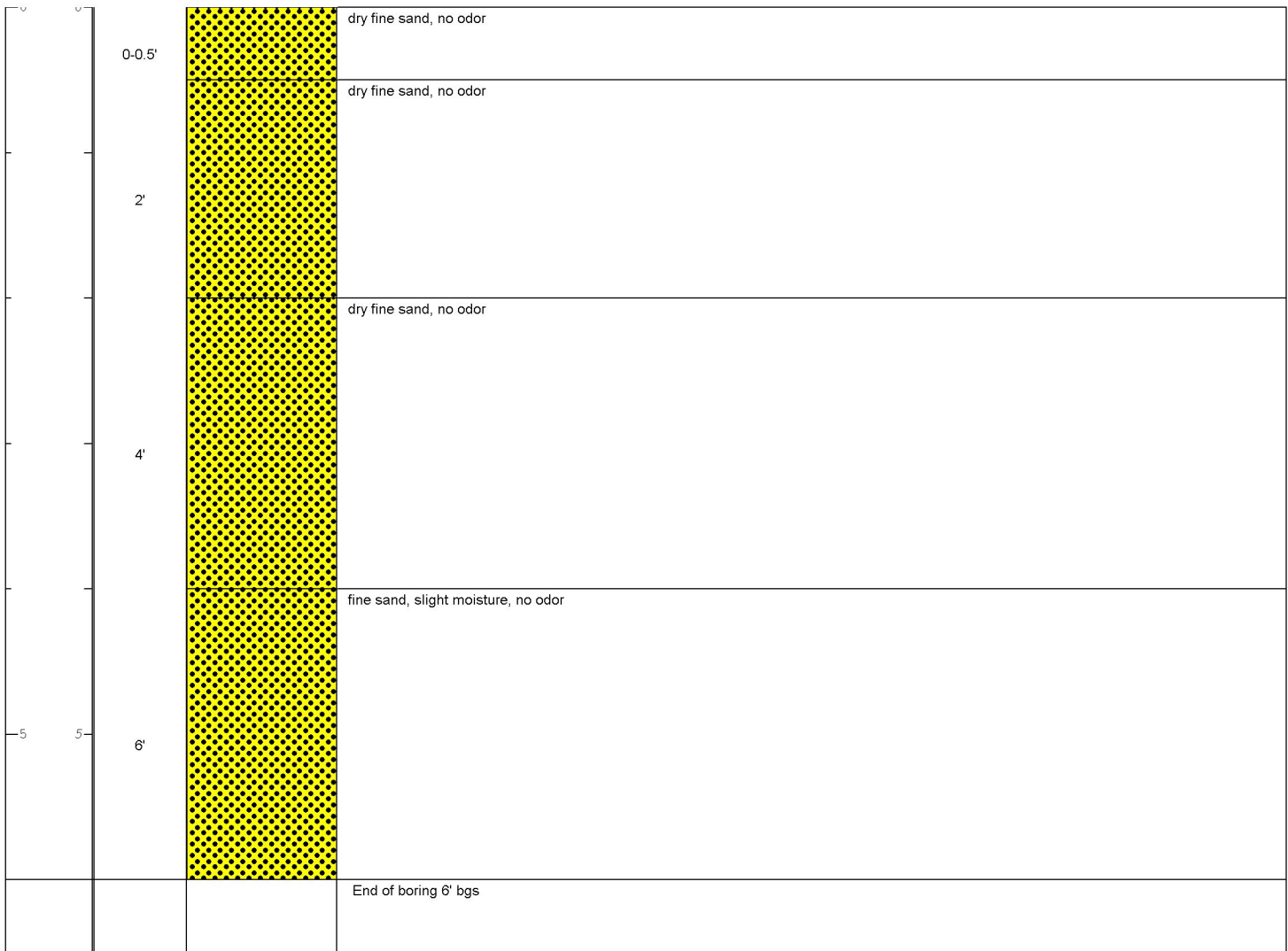
DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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Date Start/Finish: 5/19/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-7 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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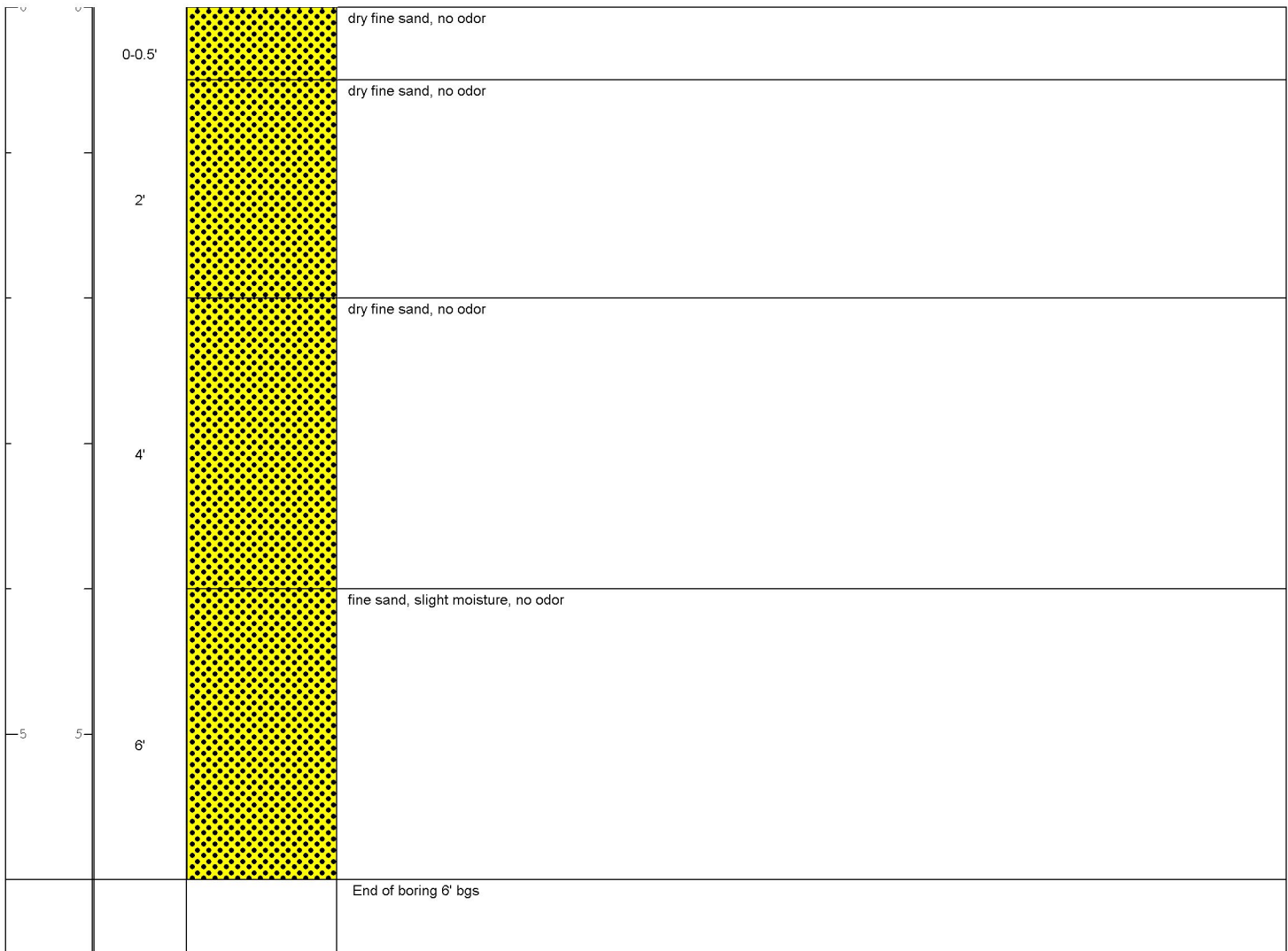
DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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Date Start/Finish: 5/19/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-8 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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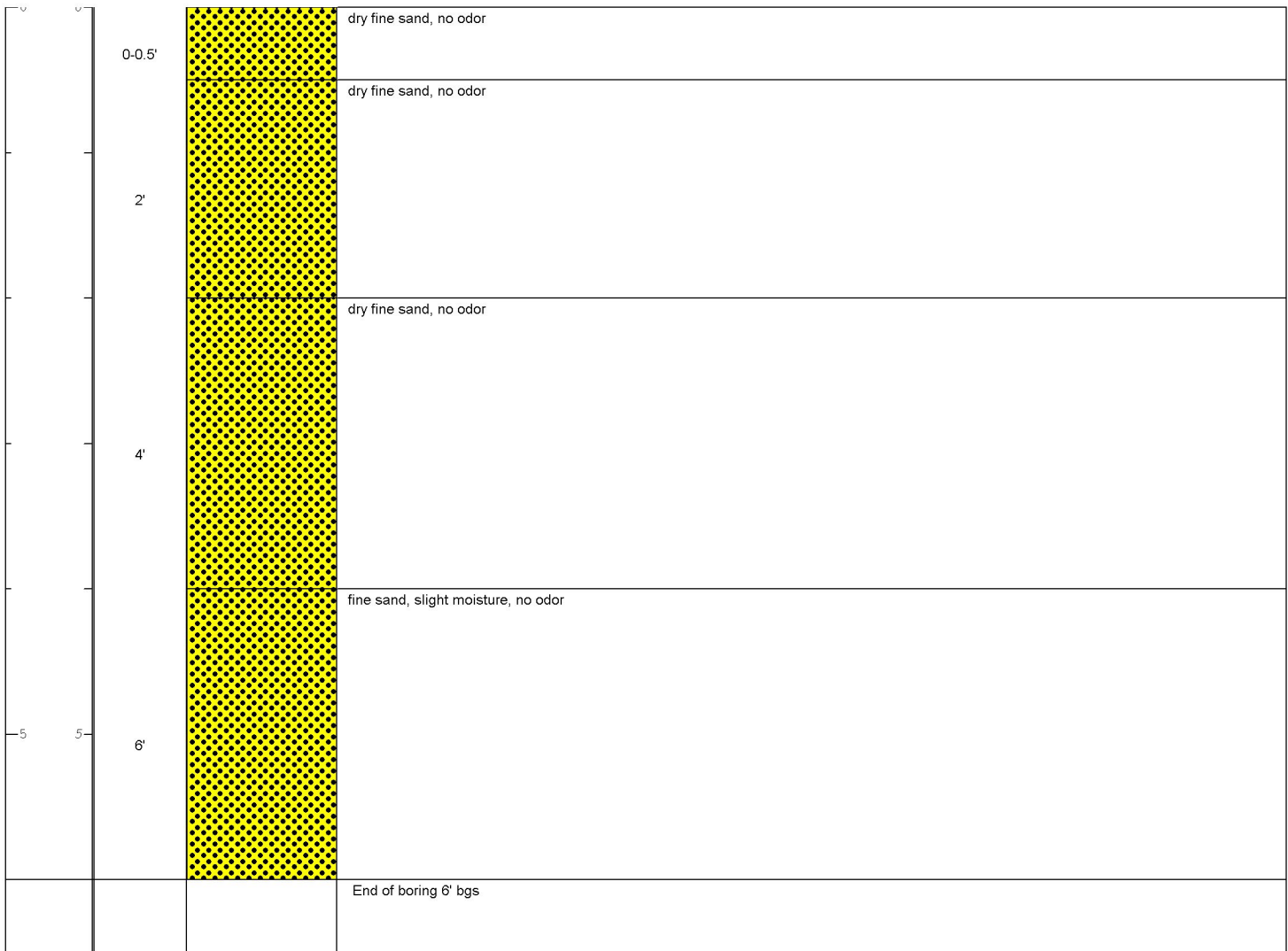
DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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Date Start/Finish: 5/19/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-9 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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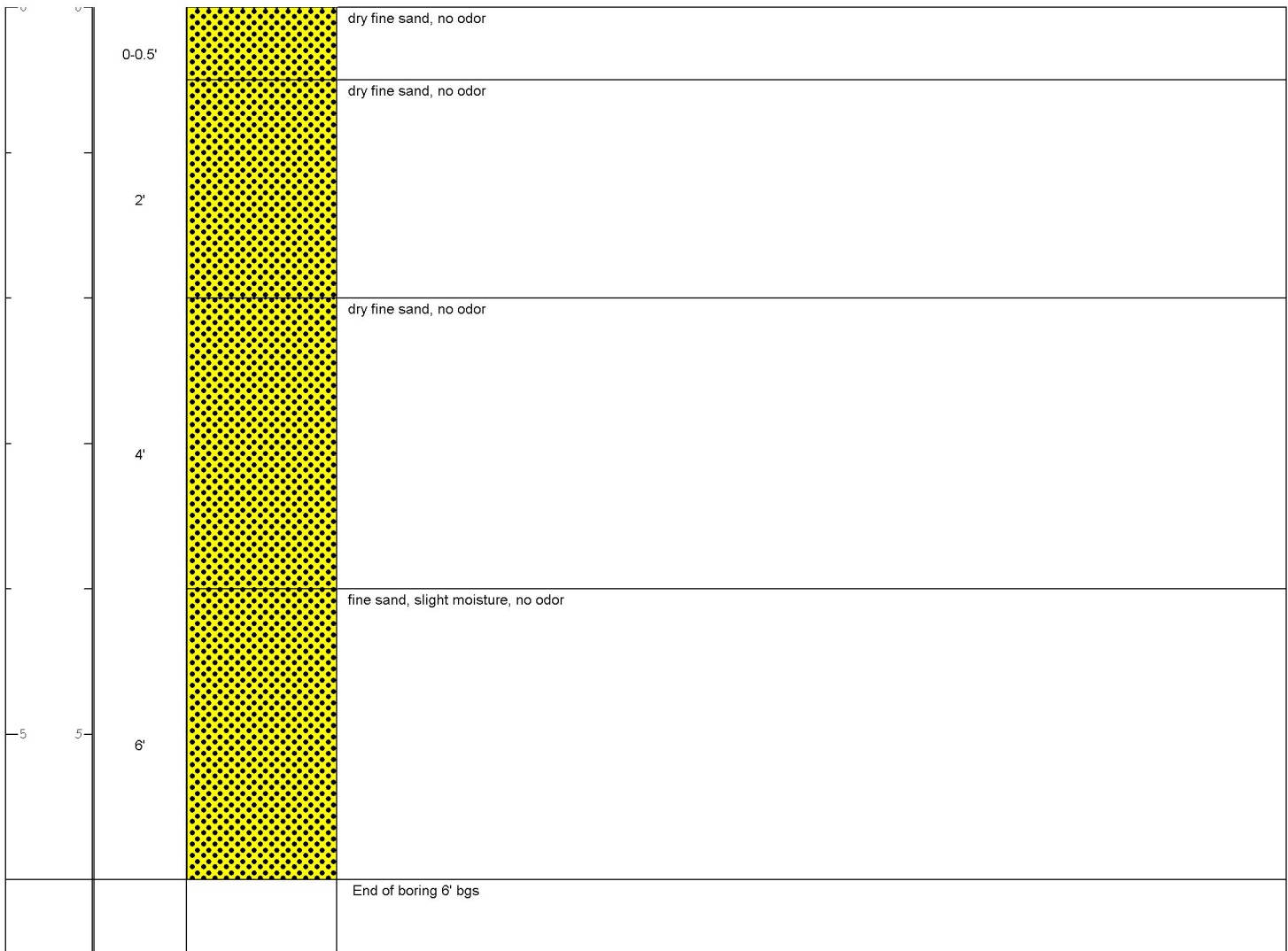
DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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Date Start/Finish: 5/19/2020 Drilling Company: Arcadis Drilling Method: Hand Auger Sampling Method: Hand Auger	Borehole Depth: 6' Surface Elevation: N/A Descriptions By: Justin Nixon	Well/Boring ID: HA-10 Client: CEMC Location: Warren Field Water Transfer Line Lea County, NM
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DEPTH	Sample Interval	Geologic Column	Stratigraphic Description
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	Remarks: Total Depth: 6' Below Ground Surface (bgs)
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APPENDIX C

Laboratory Report





Environment Testing
America

ANALYTICAL REPORT

Eurofins TestAmerica, Houston
6310 Rothway Street
Houston, TX 77040
Tel: (713)690-4444

Laboratory Job ID: 600-205421-1

Client Project/Site: Chevron-Warren Field Water Transfer Line
Revision: 1

For:
ARCADIS U.S., Inc.
1004 North Big Spring
Suite 121
Midland, Texas 79701

Attn: Sarah Johnson

Authorized for release by:
6/25/2020 9:09:00 AM

Sachin Kudchadkar, Senior Project Manager
(713)690-4444
sachin.kudchadkar@testamericainc.com



LINKS

Review your project
results through
TotalAccess

Have a Question?



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www.eurofinsus.com/Env

The test results in this report meet all 2003 NELAC, 2009 TNI, and 2016 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

- 1
- 2
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Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Laboratory Job ID: 600-205421-1

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Method Summary

Client: ARCADIS U.S., Inc.

Job ID: 600-205421-1

Project/Site: Chevron-Warren Field Water Transfer Line

Method	Method Description	Protocol	Laboratory
8260C	Volatile Organic Compounds by GC/MS	SW846	TAL HOU
8015D	Gasoline Range Organics (GRO) (GC)	SW846	TAL HOU
8015D	Diesel Range Organics (DRO) (GC)	SW846	TAL HOU
300.0	Anions, Ion Chromatography	MCAWW	TAL HOU
2540B	Percent Moisture	SM20	TAL HOU
3546	Microwave Extraction	SW846	TAL HOU
5030C	Purge and Trap for Solids	SW846	TAL HOU
5030C	Purge and Trap Methanol Dilution	SW846	TAL HOU
DI Leach	Deionized Water Leaching Procedure (Routine)	ASTM	TAL HOU

Protocol References:

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions.

SM20 = "Standard Methods For The Examination Of Water And Wastewater", 20th Edition."

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

Laboratory References:

TAL HOU = Eurofins TestAmerica, Houston, 6310 Rothway Street, Houston, TX 77040, TEL (713)690-4444

Eurofins TestAmerica, Houston

Sample Summary

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Asset ID
600-205421-1	HA-1-0"-6"	Solid	05/18/20 11:37	05/20/20 10:30	
600-205421-2	HA-1-2'	Solid	05/18/20 11:40	05/20/20 10:30	
600-205421-3	HA-1-4'	Solid	05/18/20 11:50	05/20/20 10:30	
600-205421-4	HA-1-6'	Solid	05/18/20 12:00	05/20/20 10:30	
600-205421-5	HA-2-0"-6"	Solid	05/18/20 12:20	05/20/20 10:30	
600-205421-6	HA-2-2'	Solid	05/18/20 12:25	05/20/20 10:30	
600-205421-7	HA-2-4'	Solid	05/18/20 12:30	05/20/20 10:30	
600-205421-8	HA-2-6'	Solid	05/18/20 12:35	05/20/20 10:30	
600-205421-9	HA-3-0"-6"	Solid	05/18/20 13:05	05/20/20 10:30	
600-205421-10	HA-3-2'	Solid	05/18/20 13:10	05/20/20 10:30	
600-205421-11	HA-3-4'	Solid	05/18/20 13:15	05/20/20 10:30	
600-205421-12	HA-3-6'	Solid	05/18/20 13:18	05/20/20 10:30	
600-205421-13	HA-4-0"-6"	Solid	05/18/20 13:25	05/20/20 10:30	
600-205421-14	HA-4-2'	Solid	05/18/20 13:30	05/20/20 10:30	
600-205421-15	HA-4-4'	Solid	05/18/20 13:35	05/20/20 10:30	
600-205421-16	HA-4-6'	Solid	05/18/20 13:40	05/20/20 10:30	
600-205421-17	HA-5-0"-6"	Solid	05/18/20 15:00	05/20/20 10:30	
600-205421-18	HA-5-2'	Solid	05/18/20 15:10	05/20/20 10:30	
600-205421-19	HA-5-4'	Solid	05/18/20 15:20	05/20/20 10:30	
600-205421-20	HA-5-6'	Solid	05/18/20 15:30	05/20/20 10:30	
600-205421-21	HA-6-0"-6"	Solid	05/19/20 09:15	05/20/20 10:30	
600-205421-22	HA-6-2'	Solid	05/19/20 09:30	05/20/20 10:30	
600-205421-23	HA-6-4'	Solid	05/19/20 09:45	05/20/20 10:30	
600-205421-24	HA-6-6'	Solid	05/19/20 10:00	05/20/20 10:30	
600-205421-25	HA-7-0"-6"	Solid	05/19/20 10:15	05/20/20 10:30	
600-205421-26	HA-7-2'	Solid	05/19/20 10:30	05/20/20 10:30	
600-205421-27	HA-7-4'	Solid	05/19/20 10:45	05/20/20 10:30	
600-205421-28	HA-7-6'	Solid	05/19/20 11:00	05/20/20 10:30	
600-205421-29	HA-8-0"-6"	Solid	05/19/20 11:15	05/20/20 10:30	
600-205421-30	HA-8-2'	Solid	05/19/20 11:30	05/20/20 10:30	
600-205421-31	HA-8-4'	Solid	05/19/20 11:45	05/20/20 10:30	
600-205421-32	HA-8-6'	Solid	05/19/20 12:00	05/20/20 10:30	
600-205421-33	HA-9-0"-6"	Solid	05/19/20 12:30	05/20/20 10:30	
600-205421-34	HA-9-2'	Solid	05/19/20 12:45	05/20/20 10:30	
600-205421-35	HA-9-4'	Solid	05/19/20 13:00	05/20/20 10:30	
600-205421-36	HA-9-6'	Solid	05/19/20 13:15	05/20/20 10:30	
600-205421-37	HA-10-0"-6"	Solid	05/19/20 13:45	05/20/20 10:30	
600-205421-38	HA-10-2'	Solid	05/19/20 14:00	05/20/20 10:30	
600-205421-39	HA-10-4'	Solid	05/19/20 14:15	05/20/20 10:30	
600-205421-40	HA-10-6'	Solid	05/19/20 14:30	05/20/20 10:30	

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-1-0"-6"

Lab Sample ID: 600-205421-1

Date Collected: 05/18/20 11:37

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 99.0

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.636	U	5.05	0.636	ug/Kg	☼	05/21/20 14:00	05/21/20 18:14	1
Ethylbenzene	1.03	U	5.05	1.03	ug/Kg	☼	05/21/20 14:00	05/21/20 18:14	1
Toluene	1.39	U	5.05	1.39	ug/Kg	☼	05/21/20 14:00	05/21/20 18:14	1
Xylenes, Total	1.14	U	5.05	1.14	ug/Kg	☼	05/21/20 14:00	05/21/20 18:14	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	97		61 - 130	05/21/20 14:00	05/21/20 18:14	1
4-Bromofluorobenzene	110		57 - 140	05/21/20 14:00	05/21/20 18:14	1
Dibromofluoromethane	90		68 - 140	05/21/20 14:00	05/21/20 18:14	1
Toluene-d8 (Surr)	107		50 - 130	05/21/20 14:00	05/21/20 18:14	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.611	U	1.04	0.611	mg/Kg	☼	05/21/20 08:23	05/21/20 11:31	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	96		70 - 130	05/21/20 08:23	05/21/20 11:31	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.72	U	8.36	1.72	mg/Kg	☼	05/28/20 10:47	06/01/20 11:59	1
Oil Range Organics (C28-C36)	19.4		8.36	5.03	mg/Kg	☼	05/28/20 10:47	06/01/20 11:59	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	112		60 - 140	05/28/20 10:47	06/01/20 11:59	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	10.4	J	20.2	2.70	mg/Kg	☼		05/29/20 16:48	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	1		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	99.0		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-1-2'

Lab Sample ID: 600-205421-2

Date Collected: 05/18/20 11:40

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 79.0

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.787	U	6.24	0.787	ug/Kg	☼	05/21/20 14:00	05/21/20 18:39	1
Ethylbenzene	1.27	U	6.24	1.27	ug/Kg	☼	05/21/20 14:00	05/21/20 18:39	1
Toluene	1.72	U	6.24	1.72	ug/Kg	☼	05/21/20 14:00	05/21/20 18:39	1
Xylenes, Total	1.41	U	6.24	1.41	ug/Kg	☼	05/21/20 14:00	05/21/20 18:39	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	93		61 - 130	05/21/20 14:00	05/21/20 18:39	1
4-Bromofluorobenzene	105		57 - 140	05/21/20 14:00	05/21/20 18:39	1
Dibromofluoromethane	90		68 - 140	05/21/20 14:00	05/21/20 18:39	1
Toluene-d8 (Surr)	102		50 - 130	05/21/20 14:00	05/21/20 18:39	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-1-2'

Date Collected: 05/18/20 11:40

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-2

Matrix: Solid

Percent Solids: 79.0

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.714	U	1.22	0.714	mg/Kg	☼	05/21/20 08:23	05/21/20 11:56	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	95		70 - 130	05/21/20 08:23	05/21/20 11:56	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.16	U	10.5	2.16	mg/Kg	☼	05/28/20 10:47	06/02/20 10:15	1
Oil Range Organics (C28-C36)	6.31	U	10.5	6.31	mg/Kg	☼	05/28/20 10:47	06/02/20 10:15	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	81		60 - 140	05/28/20 10:47	06/02/20 10:15	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.9	J	25.3	3.38	mg/Kg	☼		05/29/20 17:50	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	21.0		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	79.0		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-1-4'

Date Collected: 05/18/20 11:50

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-3

Matrix: Solid

Percent Solids: 95.0

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.656	U	5.21	0.656	ug/Kg	☼	05/26/20 17:13	05/26/20 19:58	1
Ethylbenzene	1.06	U	5.21	1.06	ug/Kg	☼	05/26/20 17:13	05/26/20 19:58	1
Toluene	1.44	U	5.21	1.44	ug/Kg	☼	05/26/20 17:13	05/26/20 19:58	1
Xylenes, Total	1.18	U	5.21	1.18	ug/Kg	☼	05/26/20 17:13	05/26/20 19:58	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	66		61 - 130	05/26/20 17:13	05/26/20 19:58	1
4-Bromofluorobenzene	81		57 - 140	05/26/20 17:13	05/26/20 19:58	1
Dibromofluoromethane	70		68 - 140	05/26/20 17:13	05/26/20 19:58	1
Toluene-d8 (Surr)	81		50 - 130	05/26/20 17:13	05/26/20 19:58	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.603	U	1.03	0.603	mg/Kg	☼	05/21/20 08:23	05/21/20 12:21	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	89		70 - 130	05/21/20 08:23	05/21/20 12:21	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.80	U	8.71	1.80	mg/Kg	☼	05/28/20 10:47	06/01/20 12:32	1
Oil Range Organics (C28-C36)	5.25	U	8.71	5.25	mg/Kg	☼	05/28/20 10:47	06/01/20 12:32	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-1-4'

Date Collected: 05/18/20 11:50

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-3

Matrix: Solid

Percent Solids: 95.0

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	105		60 - 140				05/28/20 10:47	06/01/20 12:32	1

Method: 300.0 - Anions, Ion Chromatography - Soluble										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Chloride	9.39	J	21.0	2.81	mg/Kg	☼		05/29/20 18:51	5	

General Chemistry										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Percent Moisture	4.9		1.0	1.0	%			05/21/20 15:17	1	
Percent Solids	95.1		1.0	1.0	%			05/21/20 15:17	1	

Client Sample ID: HA-1-6'

Date Collected: 05/18/20 12:00

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-4

Matrix: Solid

Percent Solids: 89.0

Method: 8260C - Volatile Organic Compounds by GC/MS										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Benzene	0.689	U	5.46	0.689	ug/Kg	☼	05/21/20 14:00	05/21/20 19:29	1	
Ethylbenzene	1.11	U	5.46	1.11	ug/Kg	☼	05/21/20 14:00	05/21/20 19:29	1	
Toluene	1.51	U	5.46	1.51	ug/Kg	☼	05/21/20 14:00	05/21/20 19:29	1	
Xylenes, Total	1.23	U	5.46	1.23	ug/Kg	☼	05/21/20 14:00	05/21/20 19:29	1	

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	95		61 - 130				05/21/20 14:00	05/21/20 19:29	1
4-Bromofluorobenzene	118		57 - 140				05/21/20 14:00	05/21/20 19:29	1
Dibromofluoromethane	92		68 - 140				05/21/20 14:00	05/21/20 19:29	1
Toluene-d8 (Surr)	110		50 - 130				05/21/20 14:00	05/21/20 19:29	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Gasoline Range Organics [C6 - C10]	0.654	U	1.12	0.654	mg/Kg	☼	05/21/20 08:23	05/21/20 12:45	1	

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	94		70 - 130				05/21/20 08:23	05/21/20 12:45	1

Method: 8015D - Diesel Range Organics (DRO) (GC)										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Diesel Range Organics [C10-C28]	1.91	U	9.29	1.91	mg/Kg	☼	05/28/20 10:47	06/01/20 13:05	1	
Oil Range Organics (C28-C36)	5.59	U	9.29	5.59	mg/Kg	☼	05/28/20 10:47	06/01/20 13:05	1	

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	103		60 - 140				05/28/20 10:47	06/01/20 13:05	1

Method: 300.0 - Anions, Ion Chromatography - Soluble										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Chloride	12.7	J	22.5	3.00	mg/Kg	☼		05/29/20 19:11	5	

General Chemistry										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Percent Moisture	11.0		1.0	1.0	%			05/21/20 15:17	1	
Percent Solids	89.0		1.0	1.0	%			05/21/20 15:17	1	

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-2-0"-6"

Lab Sample ID: 600-205421-5

Date Collected: 05/18/20 12:20

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 92.3

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.679	U	5.39	0.679	ug/Kg	☼	05/21/20 14:00	05/21/20 19:53	1
Ethylbenzene	1.10	U	5.39	1.10	ug/Kg	☼	05/21/20 14:00	05/21/20 19:53	1
Toluene	1.49	U	5.39	1.49	ug/Kg	☼	05/21/20 14:00	05/21/20 19:53	1
Xylenes, Total	1.22	U	5.39	1.22	ug/Kg	☼	05/21/20 14:00	05/21/20 19:53	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	92		61 - 130	05/21/20 14:00	05/21/20 19:53	1
4-Bromofluorobenzene	110		57 - 140	05/21/20 14:00	05/21/20 19:53	1
Dibromofluoromethane	91		68 - 140	05/21/20 14:00	05/21/20 19:53	1
Toluene-d8 (Surr)	104		50 - 130	05/21/20 14:00	05/21/20 19:53	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.668	U	1.14	0.668	mg/Kg	☼	05/21/20 08:23	05/21/20 13:10	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	87		70 - 130	05/21/20 08:23	05/21/20 13:10	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.85	U	8.98	1.85	mg/Kg	☼	05/28/20 10:47	06/01/20 13:38	1
Oil Range Organics (C28-C36)	5.41	U	8.98	5.41	mg/Kg	☼	05/28/20 10:47	06/01/20 13:38	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	98		60 - 140	05/28/20 10:47	06/01/20 13:38	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	10.5	J	21.7	2.89	mg/Kg	☼		05/29/20 19:32	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	7.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	92.3		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-2-2'

Lab Sample ID: 600-205421-6

Date Collected: 05/18/20 12:25

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 96.8

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.645	U	5.12	0.645	ug/Kg	☼	05/21/20 14:00	05/21/20 20:18	1
Ethylbenzene	1.04	U	5.12	1.04	ug/Kg	☼	05/21/20 14:00	05/21/20 20:18	1
Toluene	1.41	U	5.12	1.41	ug/Kg	☼	05/21/20 14:00	05/21/20 20:18	1
Xylenes, Total	1.16	U	5.12	1.16	ug/Kg	☼	05/21/20 14:00	05/21/20 20:18	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	97		61 - 130	05/21/20 14:00	05/21/20 20:18	1
4-Bromofluorobenzene	106		57 - 140	05/21/20 14:00	05/21/20 20:18	1
Dibromofluoromethane	92		68 - 140	05/21/20 14:00	05/21/20 20:18	1
Toluene-d8 (Surr)	104		50 - 130	05/21/20 14:00	05/21/20 20:18	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-2-2'

Date Collected: 05/18/20 12:25

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-6

Matrix: Solid

Percent Solids: 96.8

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.616	U	1.05	0.616	mg/Kg	☼	05/21/20 08:23	05/21/20 13:35	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	95		70 - 130				05/21/20 08:23	05/21/20 13:35	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.76	U	8.53	1.76	mg/Kg	☼	05/28/20 10:47	06/01/20 14:12	1
Oil Range Organics (C28-C36)	5.14	U	8.53	5.14	mg/Kg	☼	05/28/20 10:47	06/01/20 14:12	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	95		60 - 140				05/28/20 10:47	06/01/20 14:12	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.30	J	20.7	2.76	mg/Kg	☼		05/29/20 19:52	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	3.2		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	96.8		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-2-4'

Date Collected: 05/18/20 12:30

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-7

Matrix: Solid

Percent Solids: 78.9

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.787	U	6.25	0.787	ug/Kg	☼	05/21/20 14:00	05/21/20 20:42	1
Ethylbenzene	1.27	U	6.25	1.27	ug/Kg	☼	05/21/20 14:00	05/21/20 20:42	1
Toluene	1.72	U	6.25	1.72	ug/Kg	☼	05/21/20 14:00	05/21/20 20:42	1
Xylenes, Total	1.41	U	6.25	1.41	ug/Kg	☼	05/21/20 14:00	05/21/20 20:42	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>1,2</i> -Dichloroethane- <i>d</i> 4 (Surr)	96		61 - 130				05/21/20 14:00	05/21/20 20:42	1
<i>4</i> -Bromofluorobenzene	123		57 - 140				05/21/20 14:00	05/21/20 20:42	1
<i>Dibromofluoromethane</i>	95		68 - 140				05/21/20 14:00	05/21/20 20:42	1
<i>Toluene-d</i> 8 (Surr)	108		50 - 130				05/21/20 14:00	05/21/20 20:42	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.693	U	1.18	0.693	mg/Kg	☼	05/21/20 08:23	05/21/20 13:59	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	86		70 - 130				05/21/20 08:23	05/21/20 13:59	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	13.1		10.5	2.16	mg/Kg	☼	05/28/20 10:47	06/01/20 14:45	1
Oil Range Organics (C28-C36)	6.33	U	10.5	6.33	mg/Kg	☼	05/28/20 10:47	06/01/20 14:45	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-2-4'
 Date Collected: 05/18/20 12:30
 Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-7
 Matrix: Solid
 Percent Solids: 78.9

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	121		60 - 140	05/28/20 10:47	06/01/20 14:45	1

Method: 300.0 - Anions, Ion Chromatography - Soluble									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.0	J	25.3	3.38	mg/Kg	☼		05/29/20 20:12	5

General Chemistry									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	21.1		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	78.9		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-2-6'
 Date Collected: 05/18/20 12:35
 Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-8
 Matrix: Solid
 Percent Solids: 82.3

Method: 8260C - Volatile Organic Compounds by GC/MS									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.758	U	6.02	0.758	ug/Kg	☼	05/21/20 14:00	05/21/20 21:07	1
Ethylbenzene	1.23	U	6.02	1.23	ug/Kg	☼	05/21/20 14:00	05/21/20 21:07	1
Toluene	1.66	U	6.02	1.66	ug/Kg	☼	05/21/20 14:00	05/21/20 21:07	1
Xylenes, Total	1.36	U	6.02	1.36	ug/Kg	☼	05/21/20 14:00	05/21/20 21:07	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	98		61 - 130	05/21/20 14:00	05/21/20 21:07	1
4-Bromofluorobenzene	110		57 - 140	05/21/20 14:00	05/21/20 21:07	1
Dibromofluoromethane	93		68 - 140	05/21/20 14:00	05/21/20 21:07	1
Toluene-d8 (Surr)	99		50 - 130	05/21/20 14:00	05/21/20 21:07	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.717	U	1.22	0.717	mg/Kg	☼	05/21/20 08:23	05/21/20 14:24	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	85		70 - 130	05/21/20 08:23	05/21/20 14:24	1

Method: 8015D - Diesel Range Organics (DRO) (GC)									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	49.0		10.1	2.07	mg/Kg	☼	05/28/20 10:47	06/01/20 15:20	1
Oil Range Organics (C28-C36)	90.3		10.1	6.06	mg/Kg	☼	05/28/20 10:47	06/01/20 15:20	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	101		60 - 140	05/28/20 10:47	06/01/20 15:20	1

Method: 300.0 - Anions, Ion Chromatography - Soluble									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	44.2		24.3	3.25	mg/Kg	☼		05/29/20 20:33	5

General Chemistry									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	17.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	82.3		1.0	1.0	%			05/21/20 15:17	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-3-0"-6"

Lab Sample ID: 600-205421-9

Date Collected: 05/18/20 13:05

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 98.5

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.645	U	5.12	0.645	ug/Kg	☼	05/21/20 14:00	05/21/20 21:31	1
Ethylbenzene	1.04	U	5.12	1.04	ug/Kg	☼	05/21/20 14:00	05/21/20 21:31	1
Toluene	1.41	U	5.12	1.41	ug/Kg	☼	05/21/20 14:00	05/21/20 21:31	1
Xylenes, Total	1.16	U	5.12	1.16	ug/Kg	☼	05/21/20 14:00	05/21/20 21:31	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	93		61 - 130	05/21/20 14:00	05/21/20 21:31	1
4-Bromofluorobenzene	107	*3	57 - 140	05/21/20 14:00	05/21/20 21:31	1
Dibromofluoromethane	92		68 - 140	05/21/20 14:00	05/21/20 21:31	1
Toluene-d8 (Surr)	108		50 - 130	05/21/20 14:00	05/21/20 21:31	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.598	U	1.02	0.598	mg/Kg	☼	05/21/20 08:23	05/21/20 14:49	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	95		70 - 130	05/21/20 08:23	05/21/20 14:49	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	58.7	J	122	25.0	mg/Kg	☼	05/28/20 10:47	06/01/20 15:53	1
Oil Range Organics (C28-C36)	73.2	U	122	73.2	mg/Kg	☼	05/28/20 10:47	06/01/20 15:53	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	86		60 - 140	05/28/20 10:47	06/01/20 15:53	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.08	J	20.3	2.71	mg/Kg	☼		05/29/20 20:53	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	1.5		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	98.5		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-3-2'

Lab Sample ID: 600-205421-10

Date Collected: 05/18/20 13:10

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 83.9

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.754	U	5.98	0.754	ug/Kg	☼	05/21/20 14:00	05/21/20 21:55	1
Ethylbenzene	1.22	U	5.98	1.22	ug/Kg	☼	05/21/20 14:00	05/21/20 21:55	1
Toluene	1.65	U	5.98	1.65	ug/Kg	☼	05/21/20 14:00	05/21/20 21:55	1
Xylenes, Total	1.35	U	5.98	1.35	ug/Kg	☼	05/21/20 14:00	05/21/20 21:55	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	93		61 - 130	05/21/20 14:00	05/21/20 21:55	1
4-Bromofluorobenzene	115	*3	57 - 140	05/21/20 14:00	05/21/20 21:55	1
Dibromofluoromethane	89		68 - 140	05/21/20 14:00	05/21/20 21:55	1
Toluene-d8 (Surr)	105		50 - 130	05/21/20 14:00	05/21/20 21:55	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-3-2'

Lab Sample ID: 600-205421-10

Date Collected: 05/18/20 13:10

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 83.9

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.686	U	1.17	0.686	mg/Kg	☼	05/21/20 08:23	05/21/20 15:14	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	83		70 - 130				05/21/20 08:23	05/21/20 15:14	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	7.07	J	9.85	2.03	mg/Kg	☼	05/28/20 10:47	06/01/20 17:00	1
Oil Range Organics (C28-C36)	5.93	U	9.85	5.93	mg/Kg	☼	05/28/20 10:47	06/01/20 17:00	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
o-Terphenyl	109		60 - 140				05/28/20 10:47	06/01/20 17:00	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.2	J	23.8	3.18	mg/Kg	☼		05/29/20 21:14	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	16.1		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	83.9		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-3-4'

Lab Sample ID: 600-205421-11

Date Collected: 05/18/20 13:15

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 92.7

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.665	U	5.28	0.665	ug/Kg	☼	05/21/20 14:00	05/21/20 22:20	1
Ethylbenzene	1.08	U	5.28	1.08	ug/Kg	☼	05/21/20 14:00	05/21/20 22:20	1
Toluene	1.46	U	5.28	1.46	ug/Kg	☼	05/21/20 14:00	05/21/20 22:20	1
Xylenes, Total	1.19	U	5.28	1.19	ug/Kg	☼	05/21/20 14:00	05/21/20 22:20	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	91		61 - 130				05/21/20 14:00	05/21/20 22:20	1
4-Bromofluorobenzene	108		57 - 140				05/21/20 14:00	05/21/20 22:20	1
Dibromofluoromethane	86		68 - 140				05/21/20 14:00	05/21/20 22:20	1
Toluene-d8 (Surr)	99		50 - 130				05/21/20 14:00	05/21/20 22:20	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.674	U	1.15	0.674	mg/Kg	☼	05/21/20 08:23	05/21/20 16:03	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	85		70 - 130				05/21/20 08:23	05/21/20 16:03	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.84	U	8.92	1.84	mg/Kg	☼	05/28/20 10:47	06/01/20 17:34	1
Oil Range Organics (C28-C36)	5.37	U	8.92	5.37	mg/Kg	☼	05/28/20 10:47	06/01/20 17:34	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-3-4'

Date Collected: 05/18/20 13:15

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-11

Matrix: Solid

Percent Solids: 92.7

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	104		60 - 140	05/28/20 10:47	06/01/20 17:34	1

Method: 300.0 - Anions, Ion Chromatography - Soluble									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.0	J	21.6	2.88	mg/Kg	☼		05/29/20 21:34	5

General Chemistry									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	7.3		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	92.7		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-3-6'

Date Collected: 05/18/20 13:18

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-12

Matrix: Solid

Percent Solids: 82.3

Method: 8260C - Volatile Organic Compounds by GC/MS									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.761	U	6.04	0.761	ug/Kg	☼	05/21/20 14:00	05/21/20 22:44	1
Ethylbenzene	1.23	U	6.04	1.23	ug/Kg	☼	05/21/20 14:00	05/21/20 22:44	1
Toluene	1.67	U	6.04	1.67	ug/Kg	☼	05/21/20 14:00	05/21/20 22:44	1
Xylenes, Total	1.36	U	6.04	1.36	ug/Kg	☼	05/21/20 14:00	05/21/20 22:44	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	97		61 - 130	05/21/20 14:00	05/21/20 22:44	1
4-Bromofluorobenzene	112	*3	57 - 140	05/21/20 14:00	05/21/20 22:44	1
Dibromofluoromethane	87		68 - 140	05/21/20 14:00	05/21/20 22:44	1
Toluene-d8 (Surr)	91		50 - 130	05/21/20 14:00	05/21/20 22:44	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.691	U	1.18	0.691	mg/Kg	☼	05/21/20 10:23	05/21/20 16:28	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	91		70 - 130	05/21/20 10:23	05/21/20 16:28	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	30.3	U	147	30.3	mg/Kg	☼	05/28/20 10:47	06/02/20 10:48	1
Oil Range Organics (C28-C36)	88.5	U	147	88.5	mg/Kg	☼	05/28/20 10:47	06/02/20 10:48	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	68		60 - 140	05/28/20 10:47	06/02/20 10:48	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	21.2	J	24.3	3.24	mg/Kg	☼		05/29/20 23:16	5

General Chemistry									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	17.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	82.3		1.0	1.0	%			05/21/20 15:17	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-4-0"-6"

Lab Sample ID: 600-205421-13

Date Collected: 05/18/20 13:25

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 77.6

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.815	U	6.47	0.815	ug/Kg	☼	05/26/20 17:13	05/26/20 20:22	1
Ethylbenzene	1.32	U	6.47	1.32	ug/Kg	☼	05/26/20 17:13	05/26/20 20:22	1
Toluene	1.78	U	6.47	1.78	ug/Kg	☼	05/26/20 17:13	05/26/20 20:22	1
Xylenes, Total	1.46	U	6.47	1.46	ug/Kg	☼	05/26/20 17:13	05/26/20 20:22	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	68		61 - 130	05/26/20 17:13	05/26/20 20:22	1
4-Bromofluorobenzene	78		57 - 140	05/26/20 17:13	05/26/20 20:22	1
Dibromofluoromethane	68		68 - 140	05/26/20 17:13	05/26/20 20:22	1
Toluene-d8 (Surr)	74		50 - 130	05/26/20 17:13	05/26/20 20:22	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.726	U	1.24	0.726	mg/Kg	☼	05/21/20 10:23	05/21/20 16:53	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	95		70 - 130	05/21/20 10:23	05/21/20 16:53	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	3.43	J	10.7	2.20	mg/Kg	☼	05/28/20 10:47	06/01/20 18:07	1
Diesel Range Organics [C10-C28]	6.61	U H	32.1	6.61	mg/Kg	☼	06/08/20 12:04	06/09/20 15:51	1
Oil Range Organics (C28-C36)	6.43	U	10.7	6.43	mg/Kg	☼	05/28/20 10:47	06/01/20 18:07	1
Oil Range Organics (C28-C36)	19.3	U H	32.1	19.3	mg/Kg	☼	06/08/20 12:04	06/09/20 15:51	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	40	X	60 - 140	05/28/20 10:47	06/01/20 18:07	1
o-Terphenyl	99		60 - 140	06/08/20 12:04	06/09/20 15:51	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.0	J	25.8	3.44	mg/Kg	☼		05/29/20 23:37	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	22.4		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	77.6		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-4-2'

Lab Sample ID: 600-205421-14

Date Collected: 05/18/20 13:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 96.3

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.649	U	5.15	0.649	ug/Kg	☼	05/21/20 14:00	05/21/20 23:33	1
Ethylbenzene	1.05	U	5.15	1.05	ug/Kg	☼	05/21/20 14:00	05/21/20 23:33	1
Toluene	1.42	U	5.15	1.42	ug/Kg	☼	05/21/20 14:00	05/21/20 23:33	1
Xylenes, Total	1.16	U	5.15	1.16	ug/Kg	☼	05/21/20 14:00	05/21/20 23:33	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	94		61 - 130	05/21/20 14:00	05/21/20 23:33	1
4-Bromofluorobenzene	117	*3	57 - 140	05/21/20 14:00	05/21/20 23:33	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-4-2'

Lab Sample ID: 600-205421-14

Date Collected: 05/18/20 13:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 96.3

Method: 8260C - Volatile Organic Compounds by GC/MS (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Dibromofluoromethane	92		68 - 140	05/21/20 14:00	05/21/20 23:33	1
Toluene-d8 (Surr)	108		50 - 130	05/21/20 14:00	05/21/20 23:33	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.653	U	1.11	0.653	mg/Kg	☼	05/21/20 10:23	05/21/20 17:18	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	99		70 - 130	05/21/20 10:23	05/21/20 17:18	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.77	U	8.58	1.77	mg/Kg	☼	05/28/20 10:47	06/01/20 18:41	1
Oil Range Organics (C28-C36)	5.17	U	8.58	5.17	mg/Kg	☼	05/28/20 10:47	06/01/20 18:41	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	89		60 - 140	05/28/20 10:47	06/01/20 18:41	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.8	J	20.8	2.77	mg/Kg	☼		05/29/20 23:57	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	3.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	96.3		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-4-4'

Lab Sample ID: 600-205421-15

Date Collected: 05/18/20 13:35

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 82.3

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.750	U	5.95	0.750	ug/Kg	☼	05/27/20 12:00	05/27/20 14:00	1
Ethylbenzene	1.21	U	5.95	1.21	ug/Kg	☼	05/27/20 12:00	05/27/20 14:00	1
Toluene	1.64	U	5.95	1.64	ug/Kg	☼	05/27/20 12:00	05/27/20 14:00	1
Xylenes, Total	1.35	U	5.95	1.35	ug/Kg	☼	05/27/20 12:00	05/27/20 14:00	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	82		61 - 130	05/27/20 12:00	05/27/20 14:00	1
4-Bromofluorobenzene	97		57 - 140	05/27/20 12:00	05/27/20 14:00	1
Dibromofluoromethane	77		68 - 140	05/27/20 12:00	05/27/20 14:00	1
Toluene-d8 (Surr)	100		50 - 130	05/27/20 12:00	05/27/20 14:00	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.708	U	1.21	0.708	mg/Kg	☼	05/21/20 10:23	05/21/20 17:43	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	86		70 - 130	05/21/20 10:23	05/21/20 17:43	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-4-4'

Lab Sample ID: 600-205421-15

Date Collected: 05/18/20 13:35

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 82.3

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	5.29	J	10.1	2.07	mg/Kg	☼	05/28/20 10:47	06/01/20 19:14	1
Oil Range Organics (C28-C36)	6.06	U	10.1	6.06	mg/Kg	☼	05/28/20 10:47	06/01/20 19:14	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	105		60 - 140				05/28/20 10:47	06/01/20 19:14	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	14.3	J	24.3	3.24	mg/Kg	☼		05/30/20 00:17	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	17.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	82.3		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-4-6'

Lab Sample ID: 600-205421-16

Date Collected: 05/18/20 13:40

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 84.4

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.747	U	5.93	0.747	ug/Kg	☼	05/26/20 17:13	05/26/20 21:10	1
Ethylbenzene	1.21	U	5.93	1.21	ug/Kg	☼	05/26/20 17:13	05/26/20 21:10	1
Toluene	1.64	U	5.93	1.64	ug/Kg	☼	05/26/20 17:13	05/26/20 21:10	1
Xylenes, Total	1.34	U	5.93	1.34	ug/Kg	☼	05/26/20 17:13	05/26/20 21:10	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	73		61 - 130				05/26/20 17:13	05/26/20 21:10	1
4-Bromofluorobenzene	86		57 - 140				05/26/20 17:13	05/26/20 21:10	1
Dibromofluoromethane	73		68 - 140				05/26/20 17:13	05/26/20 21:10	1
Toluene-d8 (Surr)	83		50 - 130				05/26/20 17:13	05/26/20 21:10	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.727	U	1.24	0.727	mg/Kg	☼	05/21/20 10:23	05/21/20 18:07	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	82		70 - 130				05/21/20 10:23	05/21/20 18:07	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.01	U	9.77	2.01	mg/Kg	☼	05/28/20 10:47	06/01/20 19:48	1
Oil Range Organics (C28-C36)	5.89	U	9.77	5.89	mg/Kg	☼	05/28/20 10:47	06/01/20 19:48	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	95		60 - 140				05/28/20 10:47	06/01/20 19:48	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	21.5	J	23.7	3.16	mg/Kg	☼		05/30/20 00:38	5

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-4-6'

Lab Sample ID: 600-205421-16

Date Collected: 05/18/20 13:40

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 84.4

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	15.6		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	84.4		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-5-0"-6"

Lab Sample ID: 600-205421-17

Date Collected: 05/18/20 15:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 77.9

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.813	U	6.46	0.813	ug/Kg	☼	05/26/20 17:13	05/26/20 21:34	1
Ethylbenzene	1.32	U	6.46	1.32	ug/Kg	☼	05/26/20 17:13	05/26/20 21:34	1
Toluene	1.78	U	6.46	1.78	ug/Kg	☼	05/26/20 17:13	05/26/20 21:34	1
Xylenes, Total	1.46	U	6.46	1.46	ug/Kg	☼	05/26/20 17:13	05/26/20 21:34	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	74		61 - 130	05/26/20 17:13	05/26/20 21:34	1
4-Bromofluorobenzene	79		57 - 140	05/26/20 17:13	05/26/20 21:34	1
Dibromofluoromethane	71		68 - 140	05/26/20 17:13	05/26/20 21:34	1
Toluene-d8 (Surr)	81		50 - 130	05/26/20 17:13	05/26/20 21:34	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.807	U	1.38	0.807	mg/Kg	☼	05/21/20 10:23	05/21/20 18:32	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	88		70 - 130	05/21/20 10:23	05/21/20 18:32	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.18	U	10.6	2.18	mg/Kg	☼	05/28/20 10:47	06/01/20 20:21	1
Oil Range Organics (C28-C36)	24.9		10.6	6.39	mg/Kg	☼	05/28/20 10:47	06/01/20 20:21	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	94		60 - 140	05/28/20 10:47	06/01/20 20:21	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	27.7		25.7	3.43	mg/Kg	☼		05/30/20 00:58	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	22.1		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	77.9		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-5-2'

Lab Sample ID: 600-205421-18

Date Collected: 05/18/20 15:10

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 97.3

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.643	U	5.10	0.643	ug/Kg	☼	05/21/20 14:00	05/22/20 14:39	1
Ethylbenzene	1.04	U	5.10	1.04	ug/Kg	☼	05/21/20 14:00	05/22/20 14:39	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-5-2'

Lab Sample ID: 600-205421-18

Date Collected: 05/18/20 15:10

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 97.3

Method: 8260C - Volatile Organic Compounds by GC/MS (Continued)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Toluene	1.41	U	5.10	1.41	ug/Kg	☼	05/21/20 14:00	05/22/20 14:39	1
Xylenes, Total	1.15	U	5.10	1.15	ug/Kg	☼	05/21/20 14:00	05/22/20 14:39	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	114		61 - 130				05/21/20 14:00	05/22/20 14:39	1
4-Bromofluorobenzene	146	X	57 - 140				05/21/20 14:00	05/22/20 14:39	1
Dibromofluoromethane	115		68 - 140				05/21/20 14:00	05/22/20 14:39	1
Toluene-d8 (Surr)	131	X	50 - 130				05/21/20 14:00	05/22/20 14:39	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.649	U	1.11	0.649	mg/Kg	☼	05/21/20 10:23	05/21/20 18:57	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	99		70 - 130				05/21/20 10:23	05/21/20 18:57	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.75	U	8.52	1.75	mg/Kg	☼	05/28/20 10:47	06/01/20 20:55	1
Oil Range Organics (C28-C36)	5.13	U	8.52	5.13	mg/Kg	☼	05/28/20 10:47	06/01/20 20:55	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
o-Terphenyl	102		60 - 140				05/28/20 10:47	06/01/20 20:55	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.9	J	20.6	2.75	mg/Kg	☼		05/30/20 01:19	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	2.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	97.3		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-5-4'

Lab Sample ID: 600-205421-19

Date Collected: 05/18/20 15:20

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 97.0

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.656	U	5.21	0.656	ug/Kg	☼	05/21/20 14:00	05/22/20 15:04	1
Ethylbenzene	1.06	U	5.21	1.06	ug/Kg	☼	05/21/20 14:00	05/22/20 15:04	1
Toluene	1.44	U	5.21	1.44	ug/Kg	☼	05/21/20 14:00	05/22/20 15:04	1
Xylenes, Total	1.18	U	5.21	1.18	ug/Kg	☼	05/21/20 14:00	05/22/20 15:04	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	112		61 - 130				05/21/20 14:00	05/22/20 15:04	1
4-Bromofluorobenzene	140		57 - 140				05/21/20 14:00	05/22/20 15:04	1
Dibromofluoromethane	116		68 - 140				05/21/20 14:00	05/22/20 15:04	1
Toluene-d8 (Surr)	138	X	50 - 130				05/21/20 14:00	05/22/20 15:04	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-5-4'

Lab Sample ID: 600-205421-19

Date Collected: 05/18/20 15:20

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 97.0

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.617	U	1.05	0.617	mg/Kg	☼	05/21/20 10:23	05/21/20 19:21	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	85		70 - 130	05/21/20 10:23	05/21/20 19:21	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.76	U	8.53	1.76	mg/Kg	☼	05/28/20 10:51	06/01/20 21:28	1
Oil Range Organics (C28-C36)	5.14	U	8.53	5.14	mg/Kg	☼	05/28/20 10:51	06/01/20 21:28	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	90		60 - 140	05/28/20 10:51	06/01/20 21:28	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.71	J	20.6	2.75	mg/Kg	☼		05/30/20 01:39	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	3.0		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	97.0		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-5-6'

Lab Sample ID: 600-205421-20

Date Collected: 05/18/20 15:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 82.2

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.774	U	6.14	0.774	ug/Kg	☼	05/21/20 14:00	05/22/20 15:30	1
Ethylbenzene	1.25	U	6.14	1.25	ug/Kg	☼	05/21/20 14:00	05/22/20 15:30	1
Toluene	1.70	U	6.14	1.70	ug/Kg	☼	05/21/20 14:00	05/22/20 15:30	1
Xylenes, Total	1.39	U	6.14	1.39	ug/Kg	☼	05/21/20 14:00	05/22/20 15:30	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	116		61 - 130	05/21/20 14:00	05/22/20 15:30	1
4-Bromofluorobenzene	137		57 - 140	05/21/20 14:00	05/22/20 15:30	1
Dibromofluoromethane	117		68 - 140	05/21/20 14:00	05/22/20 15:30	1
Toluene-d8 (Surr)	123		50 - 130	05/21/20 14:00	05/22/20 15:30	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.707	U	1.21	0.707	mg/Kg	☼	05/21/20 10:23	05/21/20 19:46	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	89		70 - 130	05/21/20 10:23	05/21/20 19:46	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	7.55	J	10.1	2.07	mg/Kg	☼	05/28/20 10:51	06/01/20 22:01	1
Oil Range Organics (C28-C36)	16.2		10.1	6.06	mg/Kg	☼	05/28/20 10:51	06/01/20 22:01	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-5-6'

Date Collected: 05/18/20 15:30

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-20

Matrix: Solid

Percent Solids: 82.2

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	100		60 - 140	05/28/20 10:51	06/01/20 22:01	1

Method: 300.0 - Anions, Ion Chromatography - Soluble									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.7	J	24.3	3.25	mg/Kg	☼		05/30/20 01:59	5

General Chemistry									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	17.8		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	82.2		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-6-0"-6"

Date Collected: 05/19/20 09:15

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-21

Matrix: Solid

Percent Solids: 75.7

Method: 8260C - Volatile Organic Compounds by GC/MS									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.836	U	6.64	0.836	ug/Kg	☼	05/21/20 15:00	05/22/20 15:55	1
Ethylbenzene	1.35	U	6.64	1.35	ug/Kg	☼	05/21/20 15:00	05/22/20 15:55	1
Toluene	1.83	U	6.64	1.83	ug/Kg	☼	05/21/20 15:00	05/22/20 15:55	1
Xylenes, Total	1.50	U	6.64	1.50	ug/Kg	☼	05/21/20 15:00	05/22/20 15:55	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	86		61 - 130	05/21/20 15:00	05/22/20 15:55	1
4-Bromofluorobenzene	105		57 - 140	05/21/20 15:00	05/22/20 15:55	1
Dibromofluoromethane	88		68 - 140	05/21/20 15:00	05/22/20 15:55	1
Toluene-d8 (Surr)	106		50 - 130	05/21/20 15:00	05/22/20 15:55	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.765	U	1.31	0.765	mg/Kg	☼	05/22/20 08:55	05/22/20 10:16	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	81		70 - 130	05/22/20 08:55	05/22/20 10:16	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.25	U	10.9	2.25	mg/Kg	☼	06/01/20 08:26	06/02/20 16:41	1
Oil Range Organics (C28-C36)	6.58	U	10.9	6.58	mg/Kg	☼	06/01/20 08:26	06/02/20 16:41	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	96		60 - 140	06/01/20 08:26	06/02/20 16:41	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.8	J	26.4	3.53	mg/Kg	☼		05/30/20 03:42	5

General Chemistry									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	24.3		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	75.7		1.0	1.0	%			05/21/20 15:17	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-6-2'

Date Collected: 05/19/20 09:30

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-22

Matrix: Solid

Percent Solids: 92.0

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.649	U	5.15	0.649	ug/Kg	☼	05/21/20 15:00	05/22/20 16:20	1
Ethylbenzene	1.05	U	5.15	1.05	ug/Kg	☼	05/21/20 15:00	05/22/20 16:20	1
Toluene	1.42	U	5.15	1.42	ug/Kg	☼	05/21/20 15:00	05/22/20 16:20	1
Xylenes, Total	1.16	U	5.15	1.16	ug/Kg	☼	05/21/20 15:00	05/22/20 16:20	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	88		61 - 130	05/21/20 15:00	05/22/20 16:20	1
4-Bromofluorobenzene	112		57 - 140	05/21/20 15:00	05/22/20 16:20	1
Dibromofluoromethane	88		68 - 140	05/21/20 15:00	05/22/20 16:20	1
Toluene-d8 (Surr)	116		50 - 130	05/21/20 15:00	05/22/20 16:20	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.654	U	1.12	0.654	mg/Kg	☼	05/22/20 08:55	05/22/20 10:40	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	85		70 - 130	05/22/20 08:55	05/22/20 10:40	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.86	U	9.01	1.86	mg/Kg	☼	06/01/20 08:26	06/02/20 17:14	1
Oil Range Organics (C28-C36)	16.3		9.01	5.43	mg/Kg	☼	06/01/20 08:26	06/02/20 17:14	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	97		60 - 140	06/01/20 08:26	06/02/20 17:14	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.2	J	21.7	2.90	mg/Kg	☼		05/30/20 04:43	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	8.0		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	92.0		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-6-4'

Date Collected: 05/19/20 09:45

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-23

Matrix: Solid

Percent Solids: 87.0

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.694	U	5.51	0.694	ug/Kg	☼	05/21/20 15:00	05/22/20 16:45	1
Ethylbenzene	1.12	U	5.51	1.12	ug/Kg	☼	05/21/20 15:00	05/22/20 16:45	1
Toluene	1.52	U	5.51	1.52	ug/Kg	☼	05/21/20 15:00	05/22/20 16:45	1
Xylenes, Total	1.24	U	5.51	1.24	ug/Kg	☼	05/21/20 15:00	05/22/20 16:45	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	84		61 - 130	05/21/20 15:00	05/22/20 16:45	1
4-Bromofluorobenzene	99		57 - 140	05/21/20 15:00	05/22/20 16:45	1
Dibromofluoromethane	86		68 - 140	05/21/20 15:00	05/22/20 16:45	1
Toluene-d8 (Surr)	105		50 - 130	05/21/20 15:00	05/22/20 16:45	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-6-4'

Lab Sample ID: 600-205421-23

Date Collected: 05/19/20 09:45

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 87.0

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.696	U	1.19	0.696	mg/Kg	☼	05/22/20 08:55	05/22/20 11:05	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	98		70 - 130	05/22/20 08:55	05/22/20 11:05	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.96	U	9.49	1.96	mg/Kg	☼	06/01/20 08:26	06/02/20 17:48	1
Oil Range Organics (C28-C36)	5.72	U	9.49	5.72	mg/Kg	☼	06/01/20 08:26	06/02/20 17:48	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	92		60 - 140	06/01/20 08:26	06/02/20 17:48	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.1	J	23.0	3.07	mg/Kg	☼		05/30/20 05:03	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	13.0		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	87.0		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-6-6'

Lab Sample ID: 600-205421-24

Date Collected: 05/19/20 10:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 84.4

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.725	U	5.75	0.725	ug/Kg	☼	05/21/20 15:00	05/22/20 17:11	1
Ethylbenzene	1.17	U	5.75	1.17	ug/Kg	☼	05/21/20 15:00	05/22/20 17:11	1
Toluene	1.59	U	5.75	1.59	ug/Kg	☼	05/21/20 15:00	05/22/20 17:11	1
Xylenes, Total	1.30	U	5.75	1.30	ug/Kg	☼	05/21/20 15:00	05/22/20 17:11	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	81		61 - 130	05/21/20 15:00	05/22/20 17:11	1
4-Bromofluorobenzene	106		57 - 140	05/21/20 15:00	05/22/20 17:11	1
Dibromofluoromethane	88		68 - 140	05/21/20 15:00	05/22/20 17:11	1
Toluene-d8 (Surr)	105		50 - 130	05/21/20 15:00	05/22/20 17:11	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.711	U	1.21	0.711	mg/Kg	☼	05/22/20 08:55	05/22/20 11:30	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	95		70 - 130	05/22/20 08:55	05/22/20 11:30	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	8.84	J	9.81	2.02	mg/Kg	☼	06/01/20 08:26	06/02/20 18:21	1
Oil Range Organics (C28-C36)	5.91	U	9.81	5.91	mg/Kg	☼	06/01/20 08:26	06/02/20 18:21	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-6-6'

Date Collected: 05/19/20 10:00

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-24

Matrix: Solid

Percent Solids: 84.4

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	77		60 - 140	06/01/20 08:26	06/02/20 18:21	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.8	J	23.7	3.16	mg/Kg	☼		05/30/20 05:24	5

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	15.6		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	84.4		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-7-0"-6"

Date Collected: 05/19/20 10:15

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-25

Matrix: Solid

Percent Solids: 66.0

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.958	U	7.61	0.958	ug/Kg	☼	05/21/20 15:00	05/22/20 17:36	1
Ethylbenzene	1.55	U	7.61	1.55	ug/Kg	☼	05/21/20 15:00	05/22/20 17:36	1
Toluene	2.10	U	7.61	2.10	ug/Kg	☼	05/21/20 15:00	05/22/20 17:36	1
Xylenes, Total	1.72	U	7.61	1.72	ug/Kg	☼	05/21/20 15:00	05/22/20 17:36	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	87		61 - 130	05/21/20 15:00	05/22/20 17:36	1
4-Bromofluorobenzene	101		57 - 140	05/21/20 15:00	05/22/20 17:36	1
Dibromofluoromethane	89		68 - 140	05/21/20 15:00	05/22/20 17:36	1
Toluene-d8 (Surr)	111		50 - 130	05/21/20 15:00	05/22/20 17:36	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.967	U	1.65	0.967	mg/Kg	☼	05/22/20 08:55	05/22/20 11:54	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	77		70 - 130	05/22/20 08:55	05/22/20 11:54	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	7.46	J	12.6	2.59	mg/Kg	☼	06/01/20 08:26	06/02/20 18:55	1
Oil Range Organics (C28-C36)	7.57	U	12.6	7.57	mg/Kg	☼	06/01/20 08:26	06/02/20 18:55	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	92		60 - 140	06/01/20 08:26	06/02/20 18:55	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	8.64		6.06	0.809	mg/Kg	☼		06/02/20 13:44	1

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	34.0		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	66.0		1.0	1.0	%			05/21/20 15:17	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-7-2'

Lab Sample ID: 600-205421-26

Date Collected: 05/19/20 10:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 79.3

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.775	U	6.15	0.775	ug/Kg	☼	05/21/20 15:00	05/22/20 18:01	1
Ethylbenzene	1.25	U	6.15	1.25	ug/Kg	☼	05/21/20 15:00	05/22/20 18:01	1
Toluene	1.70	U	6.15	1.70	ug/Kg	☼	05/21/20 15:00	05/22/20 18:01	1
Xylenes, Total	1.39	U	6.15	1.39	ug/Kg	☼	05/21/20 15:00	05/22/20 18:01	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	82		61 - 130				05/21/20 15:00	05/22/20 18:01	1
4-Bromofluorobenzene	106		57 - 140				05/21/20 15:00	05/22/20 18:01	1
Dibromofluoromethane	87		68 - 140				05/21/20 15:00	05/22/20 18:01	1
Toluene-d8 (Surr)	107		50 - 130				05/21/20 15:00	05/22/20 18:01	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.744	U	1.27	0.744	mg/Kg	☼	05/22/20 08:55	05/22/20 12:19	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	89		70 - 130				05/22/20 08:55	05/22/20 12:19	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.15	U	10.4	2.15	mg/Kg	☼	06/01/20 08:26	06/02/20 19:29	1
Oil Range Organics (C28-C36)	6.29	U	10.4	6.29	mg/Kg	☼	06/01/20 08:26	06/02/20 19:29	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
o-Terphenyl	96		60 - 140				06/01/20 08:26	06/02/20 19:29	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	2.83	J	5.05	0.674	mg/Kg	☼		06/02/20 14:45	1

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	20.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	79.3		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-7-4'

Lab Sample ID: 600-205421-27

Date Collected: 05/19/20 10:45

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 78.9

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.741	U	5.88	0.741	ug/Kg	☼	05/21/20 15:00	05/22/20 18:26	1
Ethylbenzene	1.20	U	5.88	1.20	ug/Kg	☼	05/21/20 15:00	05/22/20 18:26	1
Toluene	1.62	U	5.88	1.62	ug/Kg	☼	05/21/20 15:00	05/22/20 18:26	1
Xylenes, Total	1.33	U	5.88	1.33	ug/Kg	☼	05/21/20 15:00	05/22/20 18:26	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	95		61 - 130				05/21/20 15:00	05/22/20 18:26	1
4-Bromofluorobenzene	121		57 - 140				05/21/20 15:00	05/22/20 18:26	1
Dibromofluoromethane	97		68 - 140				05/21/20 15:00	05/22/20 18:26	1
Toluene-d8 (Surr)	115		50 - 130				05/21/20 15:00	05/22/20 18:26	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-7-4'

Date Collected: 05/19/20 10:45

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-27

Matrix: Solid

Percent Solids: 78.9

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.731	U	1.25	0.731	mg/Kg	☼	05/22/20 08:55	05/22/20 12:44	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	88		70 - 130	05/22/20 08:55	05/22/20 12:44	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.16	U	10.5	2.16	mg/Kg	☼	06/01/20 08:26	06/02/20 20:02	1
Oil Range Organics (C28-C36)	6.31	U	10.5	6.31	mg/Kg	☼	06/01/20 08:26	06/02/20 20:02	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	96		60 - 140	06/01/20 08:26	06/02/20 20:02	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	2.77	J	5.07	0.677	mg/Kg	☼		06/02/20 15:06	1

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	21.1		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	78.9		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-7-6'

Date Collected: 05/19/20 11:00

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-28

Matrix: Solid

Percent Solids: 78.8

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.799	U	6.34	0.799	ug/Kg	☼	05/21/20 15:00	05/22/20 18:51	1
Ethylbenzene	1.29	U	6.34	1.29	ug/Kg	☼	05/21/20 15:00	05/22/20 18:51	1
Toluene	1.75	U	6.34	1.75	ug/Kg	☼	05/21/20 15:00	05/22/20 18:51	1
Xylenes, Total	1.43	U	6.34	1.43	ug/Kg	☼	05/21/20 15:00	05/22/20 18:51	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	86		61 - 130	05/21/20 15:00	05/22/20 18:51	1
4-Bromofluorobenzene	103		57 - 140	05/21/20 15:00	05/22/20 18:51	1
Dibromofluoromethane	88		68 - 140	05/21/20 15:00	05/22/20 18:51	1
Toluene-d8 (Surr)	107		50 - 130	05/21/20 15:00	05/22/20 18:51	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.718	U	1.22	0.718	mg/Kg	☼	05/22/20 08:55	05/22/20 13:09	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	88		70 - 130	05/22/20 08:55	05/22/20 13:09	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.16	U	10.5	2.16	mg/Kg	☼	06/01/20 08:26	06/02/20 20:35	1
Oil Range Organics (C28-C36)	19.2		10.5	6.32	mg/Kg	☼	06/01/20 08:26	06/02/20 20:35	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-7-6'

Date Collected: 05/19/20 11:00

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-28

Matrix: Solid

Percent Solids: 78.8

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	89		60 - 140				06/01/20 08:26	06/02/20 20:35	1

Method: 300.0 - Anions, Ion Chromatography - Soluble										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Chloride	2.71	J	5.07	0.677	mg/Kg	☼		06/02/20 15:26	1	

General Chemistry										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Percent Moisture	21.2		1.0	1.0	%			05/21/20 15:17	1	
Percent Solids	78.8		1.0	1.0	%			05/21/20 15:17	1	

Client Sample ID: HA-8-0"-6"

Date Collected: 05/19/20 11:15

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-29

Matrix: Solid

Percent Solids: 79.3

Method: 8260C - Volatile Organic Compounds by GC/MS										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Benzene	0.779	U	6.18	0.779	ug/Kg	☼	05/21/20 15:00	05/22/20 19:16	1	
Ethylbenzene	1.26	U	6.18	1.26	ug/Kg	☼	05/21/20 15:00	05/22/20 19:16	1	
Toluene	1.71	U	6.18	1.71	ug/Kg	☼	05/21/20 15:00	05/22/20 19:16	1	
Xylenes, Total	1.40	U	6.18	1.40	ug/Kg	☼	05/21/20 15:00	05/22/20 19:16	1	

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	88		61 - 130				05/21/20 15:00	05/22/20 19:16	1
4-Bromofluorobenzene	109		57 - 140				05/21/20 15:00	05/22/20 19:16	1
Dibromofluoromethane	89		68 - 140				05/21/20 15:00	05/22/20 19:16	1
Toluene-d8 (Surr)	114		50 - 130				05/21/20 15:00	05/22/20 19:16	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.687	U	1.17	0.687	mg/Kg	☼	05/22/20 08:55	05/22/20 13:33	1

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	90		70 - 130				05/22/20 08:55	05/22/20 13:33	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.15	U	10.4	2.15	mg/Kg	☼	06/01/20 08:26	06/02/20 21:42	1
Oil Range Organics (C28-C36)	19.2		10.4	6.28	mg/Kg	☼	06/01/20 08:26	06/02/20 21:42	1

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	74		60 - 140				06/01/20 08:26	06/02/20 21:42	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	2.99	J	5.05	0.674	mg/Kg	☼		06/02/20 15:47	1

General Chemistry										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Percent Moisture	20.7		1.0	1.0	%			05/21/20 15:17	1	
Percent Solids	79.3		1.0	1.0	%			05/21/20 15:17	1	

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-8-2'

Date Collected: 05/19/20 11:30

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-30

Matrix: Solid

Percent Solids: 97.0

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.647	U	5.13	0.647	ug/Kg	☼	05/21/20 15:00	05/22/20 19:41	1
Ethylbenzene	1.05	U	5.13	1.05	ug/Kg	☼	05/21/20 15:00	05/22/20 19:41	1
Toluene	1.42	U	5.13	1.42	ug/Kg	☼	05/21/20 15:00	05/22/20 19:41	1
Xylenes, Total	1.16	U	5.13	1.16	ug/Kg	☼	05/21/20 15:00	05/22/20 19:41	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	97		61 - 130	05/21/20 15:00	05/22/20 19:41	1
4-Bromofluorobenzene	109		57 - 140	05/21/20 15:00	05/22/20 19:41	1
Dibromofluoromethane	94		68 - 140	05/21/20 15:00	05/22/20 19:41	1
Toluene-d8 (Surr)	109		50 - 130	05/21/20 15:00	05/22/20 19:41	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.606	U	1.03	0.606	mg/Kg	☼	05/22/20 08:55	05/22/20 13:58	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	106		70 - 130	05/22/20 08:55	05/22/20 13:58	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.75	U	8.51	1.75	mg/Kg	☼	06/01/20 08:26	06/02/20 22:15	1
Oil Range Organics (C28-C36)	16.5		8.51	5.13	mg/Kg	☼	06/01/20 08:26	06/02/20 22:15	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	87		60 - 140	06/01/20 08:26	06/02/20 22:15	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	1.99	J	4.12	0.550	mg/Kg	☼		06/02/20 16:07	1

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	3.0		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	97.0		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-8-4'

Date Collected: 05/19/20 11:45

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-31

Matrix: Solid

Percent Solids: 79.3

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.856	J	6.10	0.768	ug/Kg	☼	05/21/20 15:00	05/22/20 20:06	1
Ethylbenzene	1.24	U	6.10	1.24	ug/Kg	☼	05/21/20 15:00	05/22/20 20:06	1
Toluene	1.68	U	6.10	1.68	ug/Kg	☼	05/21/20 15:00	05/22/20 20:06	1
Xylenes, Total	1.38	U	6.10	1.38	ug/Kg	☼	05/21/20 15:00	05/22/20 20:06	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	98		61 - 130	05/21/20 15:00	05/22/20 20:06	1
4-Bromofluorobenzene	105		57 - 140	05/21/20 15:00	05/22/20 20:06	1
Dibromofluoromethane	94		68 - 140	05/21/20 15:00	05/22/20 20:06	1
Toluene-d8 (Surr)	108		50 - 130	05/21/20 15:00	05/22/20 20:06	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-8-4'
 Date Collected: 05/19/20 11:45
 Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-31
 Matrix: Solid
 Percent Solids: 79.3

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.808	U	1.38	0.808	mg/Kg	☼	05/22/20 08:55	05/22/20 14:48	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	85		70 - 130				05/22/20 08:55	05/22/20 14:48	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	5.44	J	10.4	2.15	mg/Kg	☼	06/01/20 08:26	06/02/20 22:48	1
Oil Range Organics (C28-C36)	6.29	U	10.4	6.29	mg/Kg	☼	06/01/20 08:26	06/02/20 22:48	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
o-Terphenyl	70		60 - 140				06/01/20 08:26	06/02/20 22:48	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	2.86	J	5.04	0.673	mg/Kg	☼		06/02/20 17:08	1

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	20.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	79.3		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-8-6'
 Date Collected: 05/19/20 12:00
 Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-32
 Matrix: Solid
 Percent Solids: 79.6

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.788	U	6.26	0.788	ug/Kg	☼	05/21/20 15:00	05/22/20 20:31	1
Ethylbenzene	1.28	U	6.26	1.28	ug/Kg	☼	05/21/20 15:00	05/22/20 20:31	1
Toluene	1.73	U	6.26	1.73	ug/Kg	☼	05/21/20 15:00	05/22/20 20:31	1
Xylenes, Total	1.41	U	6.26	1.41	ug/Kg	☼	05/21/20 15:00	05/22/20 20:31	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	92		61 - 130				05/21/20 15:00	05/22/20 20:31	1
4-Bromofluorobenzene	103		57 - 140				05/21/20 15:00	05/22/20 20:31	1
Dibromofluoromethane	90		68 - 140				05/21/20 15:00	05/22/20 20:31	1
Toluene-d8 (Surr)	96		50 - 130				05/21/20 15:00	05/22/20 20:31	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.700	U	1.19	0.700	mg/Kg	☼	05/22/20 08:55	05/22/20 15:13	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	93		70 - 130				05/22/20 08:55	05/22/20 15:13	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.14	U	10.4	2.14	mg/Kg	☼	06/01/20 08:26	06/02/20 23:21	1
Oil Range Organics (C28-C36)	6.27	U	10.4	6.27	mg/Kg	☼	06/01/20 08:26	06/02/20 23:21	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-8-6'

Date Collected: 05/19/20 12:00

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-32

Matrix: Solid

Percent Solids: 79.6

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	74		60 - 140				06/01/20 08:26	06/02/20 23:21	1

Method: 300.0 - Anions, Ion Chromatography - Soluble										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Chloride	4.24	J	5.02	0.671	mg/Kg	☼		06/02/20 17:29	1	

General Chemistry										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Percent Moisture	20.4		1.0	1.0	%			05/21/20 15:17	1	
Percent Solids	79.6		1.0	1.0	%			05/21/20 15:17	1	

Client Sample ID: HA-9-0"-6"

Date Collected: 05/19/20 12:30

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-33

Matrix: Solid

Percent Solids: 99.8

Method: 8260C - Volatile Organic Compounds by GC/MS										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Benzene	0.638	U	5.06	0.638	ug/Kg	☼	05/21/20 15:00	05/22/20 20:55	1	
Ethylbenzene	1.03	U	5.06	1.03	ug/Kg	☼	05/21/20 15:00	05/22/20 20:55	1	
Toluene	1.40	U	5.06	1.40	ug/Kg	☼	05/21/20 15:00	05/22/20 20:55	1	
Xylenes, Total	1.14	U	5.06	1.14	ug/Kg	☼	05/21/20 15:00	05/22/20 20:55	1	

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	85		61 - 130				05/21/20 15:00	05/22/20 20:55	1
4-Bromofluorobenzene	102		57 - 140				05/21/20 15:00	05/22/20 20:55	1
Dibromofluoromethane	87		68 - 140				05/21/20 15:00	05/22/20 20:55	1
Toluene-d8 (Surr)	96		50 - 130				05/21/20 15:00	05/22/20 20:55	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.588	U	1.00	0.588	mg/Kg	☼	05/22/20 08:55	05/22/20 15:38	1

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	101		70 - 130				05/22/20 08:55	05/22/20 15:38	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	9.64		8.30	1.71	mg/Kg	☼	06/01/20 15:32	06/03/20 05:25	1
Oil Range Organics (C28-C36)	37.7		8.30	5.00	mg/Kg	☼	06/01/20 15:32	06/03/20 05:25	1

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	91		60 - 140				06/01/20 15:32	06/03/20 05:25	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	2.63	J	4.01	0.535	mg/Kg	☼		06/02/20 17:49	1

General Chemistry										
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac	
Percent Moisture	0.2		1.0	1.0	%			05/21/20 15:17	1	
Percent Solids	99.8		1.0	1.0	%			05/21/20 15:17	1	

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-9-2'

Lab Sample ID: 600-205421-34

Date Collected: 05/19/20 12:45

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 96.3

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.657	U	5.21	0.657	ug/Kg	☼	05/21/20 15:00	05/22/20 21:20	1
Ethylbenzene	1.06	U	5.21	1.06	ug/Kg	☼	05/21/20 15:00	05/22/20 21:20	1
Toluene	1.44	U	5.21	1.44	ug/Kg	☼	05/21/20 15:00	05/22/20 21:20	1
Xylenes, Total	1.18	U	5.21	1.18	ug/Kg	☼	05/21/20 15:00	05/22/20 21:20	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	98		61 - 130				05/21/20 15:00	05/22/20 21:20	1
4-Bromofluorobenzene	113		57 - 140				05/21/20 15:00	05/22/20 21:20	1
Dibromofluoromethane	91		68 - 140				05/21/20 15:00	05/22/20 21:20	1
Toluene-d8 (Surr)	107		50 - 130				05/21/20 15:00	05/22/20 21:20	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.633	U	1.08	0.633	mg/Kg	☼	05/22/20 08:55	05/22/20 16:03	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	102		70 - 130				05/22/20 08:55	05/22/20 16:03	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	5.08	J	8.60	1.77	mg/Kg	☼	06/01/20 08:26	06/02/20 23:54	1
Oil Range Organics (C28-C36)	24.1		8.60	5.18	mg/Kg	☼	06/01/20 08:26	06/02/20 23:54	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
o-Terphenyl	104		60 - 140				06/01/20 08:26	06/02/20 23:54	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	2.30	J	4.15	0.555	mg/Kg	☼		06/02/20 18:09	1

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	3.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	96.3		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-9-4'

Lab Sample ID: 600-205421-35

Date Collected: 05/19/20 13:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 94.7

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.672	U	5.34	0.672	ug/Kg	☼	05/21/20 15:00	05/22/20 21:44	1
Ethylbenzene	1.09	U	5.34	1.09	ug/Kg	☼	05/21/20 15:00	05/22/20 21:44	1
Toluene	1.47	U	5.34	1.47	ug/Kg	☼	05/21/20 15:00	05/22/20 21:44	1
Xylenes, Total	1.21	U	5.34	1.21	ug/Kg	☼	05/21/20 15:00	05/22/20 21:44	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	97		61 - 130				05/21/20 15:00	05/22/20 21:44	1
4-Bromofluorobenzene	114		57 - 140				05/21/20 15:00	05/22/20 21:44	1
Dibromofluoromethane	96		68 - 140				05/21/20 15:00	05/22/20 21:44	1
Toluene-d8 (Surr)	108		50 - 130				05/21/20 15:00	05/22/20 21:44	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-9-4'

Lab Sample ID: 600-205421-35

Date Collected: 05/19/20 13:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 94.7

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.653	U	1.11	0.653	mg/Kg	☼	05/22/20 08:55	05/22/20 16:28	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	104		70 - 130				05/22/20 08:55	05/22/20 16:28	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	5.10	J	8.75	1.80	mg/Kg	☼	06/01/20 08:26	06/03/20 00:27	1
Oil Range Organics (C28-C36)	20.6		8.75	5.27	mg/Kg	☼	06/01/20 08:26	06/03/20 00:27	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
o-Terphenyl	79		60 - 140				06/01/20 08:26	06/03/20 00:27	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	2.82	J	4.23	0.564	mg/Kg	☼		06/02/20 18:30	1

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	5.3		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	94.7		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-9-6'

Lab Sample ID: 600-205421-36

Date Collected: 05/19/20 13:15

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 88.3

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.713	U	5.66	0.713	ug/Kg	☼	05/21/20 15:00	05/22/20 22:09	1
Ethylbenzene	1.15	U	5.66	1.15	ug/Kg	☼	05/21/20 15:00	05/22/20 22:09	1
Toluene	1.56	U	5.66	1.56	ug/Kg	☼	05/21/20 15:00	05/22/20 22:09	1
Xylenes, Total	1.28	U	5.66	1.28	ug/Kg	☼	05/21/20 15:00	05/22/20 22:09	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	94		61 - 130				05/21/20 15:00	05/22/20 22:09	1
4-Bromofluorobenzene	109		57 - 140				05/21/20 15:00	05/22/20 22:09	1
Dibromofluoromethane	91		68 - 140				05/21/20 15:00	05/22/20 22:09	1
Toluene-d8 (Surr)	107		50 - 130				05/21/20 15:00	05/22/20 22:09	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.663	U	1.13	0.663	mg/Kg	☼	05/22/20 08:55	05/22/20 16:52	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	89		70 - 130				05/22/20 08:55	05/22/20 16:52	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	13.9		9.38	1.93	mg/Kg	☼	06/01/20 08:26	06/03/20 01:00	1
Oil Range Organics (C28-C36)	18.8		9.38	5.65	mg/Kg	☼	06/01/20 08:26	06/03/20 01:00	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-9-6'
 Date Collected: 05/19/20 13:15
 Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-36
 Matrix: Solid
 Percent Solids: 88.3

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	97		60 - 140	06/01/20 08:26	06/03/20 01:00	1

Method: 300.0 - Anions, Ion Chromatography - Soluble									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	165		4.53	0.604	mg/Kg	☼		06/02/20 19:31	1

General Chemistry									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	11.7		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	88.3		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-10-0"-6"
 Date Collected: 05/19/20 13:45
 Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-37
 Matrix: Solid
 Percent Solids: 98.4

Method: 8260C - Volatile Organic Compounds by GC/MS									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.639	U	5.07	0.639	ug/Kg	☼	05/27/20 14:00	05/27/20 14:49	1
Ethylbenzene	1.03	U	5.07	1.03	ug/Kg	☼	05/27/20 14:00	05/27/20 14:49	1
Toluene	1.40	U	5.07	1.40	ug/Kg	☼	05/27/20 14:00	05/27/20 14:49	1
Xylenes, Total	1.15	U	5.07	1.15	ug/Kg	☼	05/27/20 14:00	05/27/20 14:49	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	87		61 - 130	05/27/20 14:00	05/27/20 14:49	1
4-Bromofluorobenzene	115		57 - 140	05/27/20 14:00	05/27/20 14:49	1
Dibromofluoromethane	88		68 - 140	05/27/20 14:00	05/27/20 14:49	1
Toluene-d8 (Surr)	110		50 - 130	05/27/20 14:00	05/27/20 14:49	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.633	U	1.08	0.633	mg/Kg	☼	05/22/20 08:55	05/22/20 17:17	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>a,a,a</i> -Trifluorotoluene	104		70 - 130	05/22/20 08:55	05/22/20 17:17	1

Method: 8015D - Diesel Range Organics (DRO) (GC)									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	5.53	J	8.40	1.73	mg/Kg	☼	06/01/20 08:26	06/03/20 01:33	1
Oil Range Organics (C28-C36)	26.9		8.40	5.06	mg/Kg	☼	06/01/20 08:26	06/03/20 01:33	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	136		60 - 140	06/01/20 08:26	06/03/20 01:33	1

Method: 300.0 - Anions, Ion Chromatography - Soluble									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	3.06	J	4.06	0.543	mg/Kg	☼		06/02/20 21:13	1

General Chemistry									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	1.6		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	98.4		1.0	1.0	%			05/21/20 15:17	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-10-2'

Lab Sample ID: 600-205421-38

Date Collected: 05/19/20 14:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 79.2

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	1.01	J	6.25	0.787	ug/Kg	☼	05/21/20 15:00	05/26/20 18:45	1
Ethylbenzene	1.27	U	6.25	1.27	ug/Kg	☼	05/21/20 15:00	05/26/20 18:45	1
Toluene	1.72	U	6.25	1.72	ug/Kg	☼	05/21/20 15:00	05/26/20 18:45	1
Xylenes, Total	1.41	U	6.25	1.41	ug/Kg	☼	05/21/20 15:00	05/26/20 18:45	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	67		61 - 130				05/21/20 15:00	05/26/20 18:45	1
4-Bromofluorobenzene	74		57 - 140				05/21/20 15:00	05/26/20 18:45	1
Dibromofluoromethane	73		68 - 140				05/21/20 15:00	05/26/20 18:45	1
Toluene-d8 (Surr)	83		50 - 130				05/21/20 15:00	05/26/20 18:45	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.707	U	1.21	0.707	mg/Kg	☼	05/22/20 08:55	05/22/20 17:42	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	88		70 - 130				05/22/20 08:55	05/22/20 17:42	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.16	U	10.5	2.16	mg/Kg	☼	06/01/20 08:26	06/03/20 02:06	1
Oil Range Organics (C28-C36)	23.2		10.5	6.30	mg/Kg	☼	06/01/20 08:26	06/03/20 02:06	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
o-Terphenyl	100		60 - 140				06/01/20 08:26	06/03/20 02:06	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	5.67		5.05	0.674	mg/Kg	☼		06/02/20 21:34	1

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	20.8		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	79.2		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-10-4'

Lab Sample ID: 600-205421-39

Date Collected: 05/19/20 14:15

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 86.4

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.678	U	5.38	0.678	ug/Kg	☼	05/21/20 15:00	05/26/20 19:10	1
Ethylbenzene	1.10	U	5.38	1.10	ug/Kg	☼	05/21/20 15:00	05/26/20 19:10	1
Toluene	1.48	U	5.38	1.48	ug/Kg	☼	05/21/20 15:00	05/26/20 19:10	1
Xylenes, Total	1.22	U	5.38	1.22	ug/Kg	☼	05/21/20 15:00	05/26/20 19:10	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	66		61 - 130				05/21/20 15:00	05/26/20 19:10	1
4-Bromofluorobenzene	74		57 - 140				05/21/20 15:00	05/26/20 19:10	1
Dibromofluoromethane	68		68 - 140				05/21/20 15:00	05/26/20 19:10	1
Toluene-d8 (Surr)	77		50 - 130				05/21/20 15:00	05/26/20 19:10	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-10-4'

Lab Sample ID: 600-205421-39

Date Collected: 05/19/20 14:15

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 86.4

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.708	U	1.21	0.708	mg/Kg	☼	05/22/20 08:55	05/22/20 18:07	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	100		70 - 130				05/22/20 08:55	05/22/20 18:07	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	4.01	J	9.58	1.97	mg/Kg	☼	06/01/20 08:26	06/03/20 02:40	1
Oil Range Organics (C28-C36)	16.5		9.58	5.77	mg/Kg	☼	06/01/20 08:26	06/03/20 02:40	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
o-Terphenyl	68		60 - 140				06/01/20 08:26	06/03/20 02:40	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	3.15	J	4.63	0.618	mg/Kg	☼		06/02/20 21:54	1

General Chemistry

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	13.6		1.0	1.0	%			05/21/20 15:17	1
Percent Solids	86.4		1.0	1.0	%			05/21/20 15:17	1

Client Sample ID: HA-10-6'

Lab Sample ID: 600-205421-40

Date Collected: 05/19/20 14:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 80.7

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.731	U	5.80	0.731	ug/Kg	☼	05/27/20 14:00	05/27/20 15:14	1
Ethylbenzene	1.18	U	5.80	1.18	ug/Kg	☼	05/27/20 14:00	05/27/20 15:14	1
Toluene	1.60	U	5.80	1.60	ug/Kg	☼	05/27/20 14:00	05/27/20 15:14	1
Xylenes, Total	1.31	U	5.80	1.31	ug/Kg	☼	05/27/20 14:00	05/27/20 15:14	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	84		61 - 130				05/27/20 14:00	05/27/20 15:14	1
4-Bromofluorobenzene	109		57 - 140				05/27/20 14:00	05/27/20 15:14	1
Dibromofluoromethane	81		68 - 140				05/27/20 14:00	05/27/20 15:14	1
Toluene-d8 (Surr)	110		50 - 130				05/27/20 14:00	05/27/20 15:14	1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.746	U	1.27	0.746	mg/Kg	☼	05/22/20 08:55	05/22/20 18:32	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	97		70 - 130				05/22/20 08:55	05/22/20 18:32	1

Method: 8015D - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	2.11	U	10.3	2.11	mg/Kg	☼	06/01/20 08:30	06/03/20 03:46	1
Oil Range Organics (C28-C36)	26.0		10.3	6.18	mg/Kg	☼	06/01/20 08:30	06/03/20 03:46	1

Eurofins TestAmerica, Houston

Client Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-10-6'
 Date Collected: 05/19/20 14:30
 Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-40
 Matrix: Solid
 Percent Solids: 80.7

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	84		60 - 140				06/01/20 08:30	06/03/20 03:46	1

Method: 300.0 - Anions, Ion Chromatography - Soluble									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	3.51	J	4.96	0.662	mg/Kg	☒		06/02/20 22:14	1

General Chemistry									
Analyte	Result	Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Percent Moisture	19.3		1.0	1.0	%	-		05/21/20 15:17	1
Percent Solids	80.7		1.0	1.0	%	-		05/21/20 15:17	1

- 1
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- 4
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- 8
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- 10
- 11
- 12
- 13
- 14

Definitions/Glossary

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Qualifiers

GC/MS VOA

Qualifier	Qualifier Description
*3	ISTD response or retention time outside acceptable limits.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
U	Indicates the analyte was analyzed for but not detected.
X	Surrogate recovery exceeds control limits

GC VOA

Qualifier	Qualifier Description
U	Indicates the analyte was analyzed for but not detected.

GC Semi VOA

Qualifier	Qualifier Description
H	Sample was prepped or analyzed beyond the specified holding time
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
U	Indicates the analyte was analyzed for but not detected.
X	Surrogate recovery exceeds control limits

HPLC/IC

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
U	Indicates the analyte was analyzed for but not detected.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
α	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)

Eurofins TestAmerica, Houston

Definitions/Glossary

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Glossary (Continued)

Abbreviation	These commonly used abbreviations may or may not be present in this report.
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

Surrogate Summary

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 8260C - Volatile Organic Compounds by GC/MS

Matrix: Solid

Prep Type: Total/NA

Lab Sample ID	Client Sample ID	Percent Surrogate Recovery (Acceptance Limits)			
		DCA (61-130)	BFB (57-140)	DBFM (68-140)	TOL (50-130)
600-205421-1	HA-1-0"-6"	97	110	90	107
600-205421-2	HA-1-2'	93	105	90	102
600-205421-3	HA-1-4'	66	81	70	81
600-205421-4	HA-1-6'	95	118	92	110
600-205421-5	HA-2-0"-6"	92	110	91	104
600-205421-6	HA-2-2'	97	106	92	104
600-205421-7	HA-2-4'	96	123	95	108
600-205421-8	HA-2-6'	98	110	93	99
600-205421-9	HA-3-0"-6"	93	107 *3	92	108
600-205421-10	HA-3-2'	93	115 *3	89	105
600-205421-11	HA-3-4'	91	108	86	99
600-205421-12	HA-3-6'	97	112 *3	87	91
600-205421-13	HA-4-0"-6"	68	78	68	74
600-205421-14	HA-4-2'	94	117 *3	92	108
600-205421-15	HA-4-4'	82	97	77	100
600-205421-16	HA-4-6'	73	86	73	83
600-205421-17	HA-5-0"-6"	74	79	71	81
600-205421-18	HA-5-2'	114	146 X	115	131 X
600-205421-19	HA-5-4'	112	140	116	138 X
600-205421-20	HA-5-6'	116	137	117	123
600-205421-21	HA-6-0"-6"	86	105	88	106
600-205421-22	HA-6-2'	88	112	88	116
600-205421-23	HA-6-4'	84	99	86	105
600-205421-24	HA-6-6'	81	106	88	105
600-205421-25	HA-7-0"-6"	87	101	89	111
600-205421-26	HA-7-2'	82	106	87	107
600-205421-27	HA-7-4'	95	121	97	115
600-205421-28	HA-7-6'	86	103	88	107
600-205421-29	HA-8-0"-6"	88	109	89	114
600-205421-30	HA-8-2'	97	109	94	109
600-205421-31	HA-8-4'	98	105	94	108
600-205421-32	HA-8-6'	92	103	90	96
600-205421-33	HA-9-0"-6"	85	102	87	96
600-205421-34	HA-9-2'	98	113	91	107
600-205421-35	HA-9-4'	97	114	96	108
600-205421-36	HA-9-6'	94	109	91	107
600-205421-37	HA-10-0"-6"	87	115	88	110
600-205421-38	HA-10-2'	67	74	73	83
600-205421-39	HA-10-4'	66	74	68	77
600-205421-40	HA-10-6'	84	109	81	110
LCS 600-294958/4	Lab Control Sample	86	106	99	107
LCS 600-295041/4	Lab Control Sample	89	107	94	107
LCS 600-295179/4	Lab Control Sample	75	75	76	70
LCS 600-295244/4	Lab Control Sample	89	96	91	91
LCSD 600-294958/5	Lab Control Sample Dup	76	96	84	90
LCSD 600-295041/5	Lab Control Sample Dup	81	107	87	102
LCSD 600-295179/5	Lab Control Sample Dup	81	77	75	65
LCSD 600-295244/5	Lab Control Sample Dup	82	108	88	94
MB 600-294958/7	Method Blank	80	114	90	106

Eurofins TestAmerica, Houston

Surrogate Summary

Client: ARCADIS U.S., Inc.

Job ID: 600-205421-1

Project/Site: Chevron-Warren Field Water Transfer Line

Method: 8260C - Volatile Organic Compounds by GC/MS (Continued)

Matrix: Solid

Prep Type: Total/NA

Percent Surrogate Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	DCA (61-130)	BFB (57-140)	DBFM (68-140)	TOL (50-130)
MB 600-295041/7	Method Blank	88	106	89	110
MB 600-295179/7	Method Blank	78	80	70	71
MB 600-295244/7	Method Blank	93	109	93	117

Surrogate Legend

DCA = 1,2-Dichloroethane-d4 (Surr)

BFB = 4-Bromofluorobenzene

DBFM = Dibromofluoromethane

TOL = Toluene-d8 (Surr)

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Matrix: Solid

Prep Type: Total/NA

Percent Surrogate Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	TFT1 (70-130)
600-205421-1	HA-1-0"-6"	96
600-205421-2	HA-1-2'	95
600-205421-3	HA-1-4'	89
600-205421-4	HA-1-6'	94
600-205421-5	HA-2-0"-6"	87
600-205421-6	HA-2-2'	95
600-205421-7	HA-2-4'	86
600-205421-8	HA-2-6'	85
600-205421-9	HA-3-0"-6"	95
600-205421-10	HA-3-2'	83
600-205421-11	HA-3-4'	85
600-205421-12	HA-3-6'	91
600-205421-13	HA-4-0"-6"	95
600-205421-14	HA-4-2'	99
600-205421-15	HA-4-4'	86
600-205421-16	HA-4-6'	82
600-205421-17	HA-5-0"-6"	88
600-205421-18	HA-5-2'	99
600-205421-19	HA-5-4'	85
600-205421-20	HA-5-6'	89
600-205421-21	HA-6-0"-6"	81
600-205421-22	HA-6-2'	85
600-205421-23	HA-6-4'	98
600-205421-24	HA-6-6'	95
600-205421-25	HA-7-0"-6"	77
600-205421-26	HA-7-2'	89
600-205421-27	HA-7-4'	88
600-205421-28	HA-7-6'	88
600-205421-29	HA-8-0"-6"	90
600-205421-30	HA-8-2'	106
600-205421-31	HA-8-4'	85
600-205421-32	HA-8-6'	93
600-205421-33	HA-9-0"-6"	101
600-205421-34	HA-9-2'	102
600-205421-35	HA-9-4'	104

Eurofins TestAmerica, Houston

Surrogate Summary

Client: ARCADIS U.S., Inc.

Job ID: 600-205421-1

Project/Site: Chevron-Warren Field Water Transfer Line

Method: 8015D - Gasoline Range Organics (GRO) (GC) (Continued)**Matrix: Solid****Prep Type: Total/NA**

Percent Surrogate Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	TFT1 (70-130)
600-205421-36	HA-9-6'	89
600-205421-37	HA-10-0"-6"	104
600-205421-38	HA-10-2'	88
600-205421-39	HA-10-4'	100
600-205421-40	HA-10-6'	97
LCS 600-294947/1-A	Lab Control Sample	95
LCS 600-295026/1-A	Lab Control Sample	95
LCSD 600-294947/2-A	Lab Control Sample Dup	95
LCSD 600-295026/2-A	Lab Control Sample Dup	96
MB 600-294947/3-A	Method Blank	94
MB 600-295026/3-A	Method Blank	94

Surrogate Legend

TFT = a,a,a-Trifluorotoluene

Method: 8015D - Diesel Range Organics (DRO) (GC)**Matrix: Solid****Prep Type: Total/NA**

Percent Surrogate Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	OTPH (60-140)
600-205421-1	HA-1-0"-6"	112
600-205421-1 MS	HA-1-0"-6"	107
600-205421-1 MSD	HA-1-0"-6"	103
600-205421-2	HA-1-2'	81
600-205421-3	HA-1-4'	105
600-205421-4	HA-1-6'	103
600-205421-5	HA-2-0"-6"	98
600-205421-6	HA-2-2'	95
600-205421-7	HA-2-4'	121
600-205421-8	HA-2-6'	101
600-205421-9	HA-3-0"-6"	86
600-205421-10	HA-3-2'	109
600-205421-11	HA-3-4'	104
600-205421-12	HA-3-6'	68
600-205421-13	HA-4-0"-6"	40 X
600-205421-13	HA-4-0"-6"	99
600-205421-14	HA-4-2'	89
600-205421-15	HA-4-4'	105
600-205421-16	HA-4-6'	95
600-205421-17	HA-5-0"-6"	94
600-205421-18	HA-5-2'	102
600-205421-19	HA-5-4'	90
600-205421-20	HA-5-6'	100
600-205421-21	HA-6-0"-6"	96
600-205421-22	HA-6-2'	97
600-205421-23	HA-6-4'	92
600-205421-24	HA-6-6'	77
600-205421-25	HA-7-0"-6"	92
600-205421-26	HA-7-2'	96
600-205421-27	HA-7-4'	96

Eurofins TestAmerica, Houston

Surrogate Summary

Client: ARCADIS U.S., Inc.

Job ID: 600-205421-1

Project/Site: Chevron-Warren Field Water Transfer Line

Method: 8015D - Diesel Range Organics (DRO) (GC) (Continued)**Matrix: Solid****Prep Type: Total/NA**

Percent Surrogate Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	OTPH (60-140)
600-205421-28	HA-7-6'	89
600-205421-29	HA-8-0"-6"	74
600-205421-30	HA-8-2'	87
600-205421-31	HA-8-4'	70
600-205421-32	HA-8-6'	74
600-205421-33	HA-9-0"-6"	91
600-205421-34	HA-9-2'	104
600-205421-35	HA-9-4'	79
600-205421-36	HA-9-6'	97
600-205421-37	HA-10-0"-6"	136
600-205421-38	HA-10-2'	100
600-205421-39	HA-10-4'	68
600-205421-40	HA-10-6'	84
600-205421-40 MS	HA-10-6'	123
600-205421-40 MSD	HA-10-6'	162 X
LCS 600-295345/2-A	Lab Control Sample	117
LCS 600-295529/2-A	Lab Control Sample	134
LCS 600-296079/2-A	Lab Control Sample	103
LCSD 600-296079/3-A	Lab Control Sample Dup	103
MB 600-295345/1-A	Method Blank	100
MB 600-295529/1-A	Method Blank	98
MB 600-296079/1-A	Method Blank	101

Surrogate Legend

OTPH = o-Terphenyl

QC Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 8260C - Volatile Organic Compounds by GC/MS

Lab Sample ID: MB 600-294958/7
 Matrix: Solid
 Analysis Batch: 294958

Client Sample ID: Method Blank
 Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.630	U	5.00	0.630	ug/Kg			05/21/20 14:28	1
Ethylbenzene	1.02	U	5.00	1.02	ug/Kg			05/21/20 14:28	1
Toluene	1.38	U	5.00	1.38	ug/Kg			05/21/20 14:28	1
Xylenes, Total	1.13	U	5.00	1.13	ug/Kg			05/21/20 14:28	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	80		61 - 130		05/21/20 14:28	1
4-Bromofluorobenzene	114		57 - 140		05/21/20 14:28	1
Dibromofluoromethane	90		68 - 140		05/21/20 14:28	1
Toluene-d8 (Surr)	106		50 - 130		05/21/20 14:28	1

Lab Sample ID: LCS 600-294958/4
 Matrix: Solid
 Analysis Batch: 294958

Client Sample ID: Lab Control Sample
 Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	50.0	49.67		ug/Kg		99	70 - 131
Ethylbenzene	50.0	55.37		ug/Kg		111	66 - 130
m-Xylene & p-Xylene	50.0	55.40		ug/Kg		111	64 - 130
o-Xylene	50.0	55.20		ug/Kg		110	62 - 130
Toluene	50.0	53.58		ug/Kg		107	67 - 130
Xylenes, Total	100	110.6		ug/Kg		111	63 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	86		61 - 130
4-Bromofluorobenzene	106		57 - 140
Dibromofluoromethane	99		68 - 140
Toluene-d8 (Surr)	107		50 - 130

Lab Sample ID: LCSD 600-294958/5
 Matrix: Solid
 Analysis Batch: 294958

Client Sample ID: Lab Control Sample Dup
 Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	50.0	45.14		ug/Kg		90	70 - 131	10	30
Ethylbenzene	50.0	48.06		ug/Kg		96	66 - 130	14	30
m-Xylene & p-Xylene	50.0	47.84		ug/Kg		96	64 - 130	15	30
o-Xylene	50.0	46.33		ug/Kg		93	62 - 130	17	30
Toluene	50.0	45.67		ug/Kg		91	67 - 130	16	30
Xylenes, Total	100	94.17		ug/Kg		94	63 - 130	16	30

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	76		61 - 130
4-Bromofluorobenzene	96		57 - 140
Dibromofluoromethane	84		68 - 140
Toluene-d8 (Surr)	90		50 - 130

Eurofins TestAmerica, Houston

QC Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 8260C - Volatile Organic Compounds by GC/MS (Continued)

Lab Sample ID: MB 600-295041/7

Matrix: Solid

Analysis Batch: 295041

Client Sample ID: Method Blank

Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.630	U	5.00	0.630	ug/Kg			05/22/20 13:48	1
Ethylbenzene	1.02	U	5.00	1.02	ug/Kg			05/22/20 13:48	1
Toluene	1.38	U	5.00	1.38	ug/Kg			05/22/20 13:48	1
Xylenes, Total	1.13	U	5.00	1.13	ug/Kg			05/22/20 13:48	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	88		61 - 130		05/22/20 13:48	1
4-Bromofluorobenzene	106		57 - 140		05/22/20 13:48	1
Dibromofluoromethane	89		68 - 140		05/22/20 13:48	1
Toluene-d8 (Surr)	110		50 - 130		05/22/20 13:48	1

Lab Sample ID: LCS 600-295041/4

Matrix: Solid

Analysis Batch: 295041

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	50.0	39.17		ug/Kg		78	70 - 131
Ethylbenzene	50.0	41.95		ug/Kg		84	66 - 130
m-Xylene & p-Xylene	50.0	43.22		ug/Kg		86	64 - 130
o-Xylene	50.0	42.48		ug/Kg		85	62 - 130
Toluene	50.0	41.83		ug/Kg		84	67 - 130
Xylenes, Total	100	85.70		ug/Kg		86	63 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	89		61 - 130
4-Bromofluorobenzene	107		57 - 140
Dibromofluoromethane	94		68 - 140
Toluene-d8 (Surr)	107		50 - 130

Lab Sample ID: LCSD 600-295041/5

Matrix: Solid

Analysis Batch: 295041

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	50.0	40.60		ug/Kg		81	70 - 131	4	30
Ethylbenzene	50.0	44.09		ug/Kg		88	66 - 130	5	30
m-Xylene & p-Xylene	50.0	45.26		ug/Kg		91	64 - 130	5	30
o-Xylene	50.0	43.68		ug/Kg		87	62 - 130	3	30
Toluene	50.0	43.75		ug/Kg		87	67 - 130	4	30
Xylenes, Total	100	88.94		ug/Kg		89	63 - 130	4	30

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	81		61 - 130
4-Bromofluorobenzene	107		57 - 140
Dibromofluoromethane	87		68 - 140
Toluene-d8 (Surr)	102		50 - 130

Eurofins TestAmerica, Houston

QC Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 8260C - Volatile Organic Compounds by GC/MS (Continued)

Lab Sample ID: MB 600-295179/7
 Matrix: Solid
 Analysis Batch: 295179

Client Sample ID: Method Blank
 Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.630	U	5.00	0.630	ug/Kg			05/26/20 17:57	1
Ethylbenzene	1.02	U	5.00	1.02	ug/Kg			05/26/20 17:57	1
Toluene	1.38	U	5.00	1.38	ug/Kg			05/26/20 17:57	1
Xylenes, Total	1.13	U	5.00	1.13	ug/Kg			05/26/20 17:57	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	78		61 - 130		05/26/20 17:57	1
4-Bromofluorobenzene	80		57 - 140		05/26/20 17:57	1
Dibromofluoromethane	70		68 - 140		05/26/20 17:57	1
Toluene-d8 (Surr)	71		50 - 130		05/26/20 17:57	1

Lab Sample ID: LCS 600-295179/4
 Matrix: Solid
 Analysis Batch: 295179

Client Sample ID: Lab Control Sample
 Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	50.0	47.50		ug/Kg		95	70 - 131
Ethylbenzene	50.0	44.90		ug/Kg		90	66 - 130
m-Xylene & p-Xylene	50.0	45.29		ug/Kg		91	64 - 130
o-Xylene	50.0	46.78		ug/Kg		94	62 - 130
Toluene	50.0	45.51		ug/Kg		91	67 - 130
Xylenes, Total	100	92.07		ug/Kg		92	63 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	75		61 - 130
4-Bromofluorobenzene	75		57 - 140
Dibromofluoromethane	76		68 - 140
Toluene-d8 (Surr)	70		50 - 130

Lab Sample ID: LCSD 600-295179/5
 Matrix: Solid
 Analysis Batch: 295179

Client Sample ID: Lab Control Sample Dup
 Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	50.0	46.08		ug/Kg		92	70 - 131	3	30
Ethylbenzene	50.0	42.69		ug/Kg		85	66 - 130	5	30
m-Xylene & p-Xylene	50.0	42.48		ug/Kg		85	64 - 130	6	30
o-Xylene	50.0	41.96		ug/Kg		84	62 - 130	11	30
Toluene	50.0	42.19		ug/Kg		84	67 - 130	8	30
Xylenes, Total	100	84.44		ug/Kg		84	63 - 130	9	30

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	81		61 - 130
4-Bromofluorobenzene	77		57 - 140
Dibromofluoromethane	75		68 - 140
Toluene-d8 (Surr)	65		50 - 130

Eurofins TestAmerica, Houston

QC Sample Results

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 8260C - Volatile Organic Compounds by GC/MS (Continued)

Lab Sample ID: MB 600-295244/7

Matrix: Solid

Analysis Batch: 295244

Client Sample ID: Method Blank

Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.630	U	5.00	0.630	ug/Kg			05/27/20 13:36	1
Ethylbenzene	1.02	U	5.00	1.02	ug/Kg			05/27/20 13:36	1
Toluene	1.38	U	5.00	1.38	ug/Kg			05/27/20 13:36	1
Xylenes, Total	1.13	U	5.00	1.13	ug/Kg			05/27/20 13:36	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	93		61 - 130		05/27/20 13:36	1
4-Bromofluorobenzene	109		57 - 140		05/27/20 13:36	1
Dibromofluoromethane	93		68 - 140		05/27/20 13:36	1
Toluene-d8 (Surr)	117		50 - 130		05/27/20 13:36	1

Lab Sample ID: LCS 600-295244/4

Matrix: Solid

Analysis Batch: 295244

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	50.0	55.02		ug/Kg		110	70 - 131
Ethylbenzene	50.0	53.69		ug/Kg		107	66 - 130
m-Xylene & p-Xylene	50.0	53.05		ug/Kg		106	64 - 130
o-Xylene	50.0	52.47		ug/Kg		105	62 - 130
Toluene	50.0	51.47		ug/Kg		103	67 - 130
Xylenes, Total	100	105.5		ug/Kg		106	63 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	89		61 - 130
4-Bromofluorobenzene	96		57 - 140
Dibromofluoromethane	91		68 - 140
Toluene-d8 (Surr)	91		50 - 130

Lab Sample ID: LCSD 600-295244/5

Matrix: Solid

Analysis Batch: 295244

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	50.0	49.62		ug/Kg		99	70 - 131	10	30
Ethylbenzene	50.0	49.70		ug/Kg		99	66 - 130	8	30
m-Xylene & p-Xylene	50.0	50.17		ug/Kg		100	64 - 130	6	30
o-Xylene	50.0	48.15		ug/Kg		96	62 - 130	9	30
Toluene	50.0	48.89		ug/Kg		98	67 - 130	5	30
Xylenes, Total	100	98.32		ug/Kg		98	63 - 130	7	30

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	82		61 - 130
4-Bromofluorobenzene	108		57 - 140
Dibromofluoromethane	88		68 - 140
Toluene-d8 (Surr)	94		50 - 130

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QC Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 8015D - Gasoline Range Organics (GRO) (GC)

Lab Sample ID: MB 600-294947/3-A
Matrix: Solid
Analysis Batch: 294923

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 294947

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.586	U	1.00	0.586	mg/Kg		05/21/20 08:23	05/21/20 11:07	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	94		70 - 130				05/21/20 08:23	05/21/20 11:07	1

Lab Sample ID: LCS 600-294947/1-A
Matrix: Solid
Analysis Batch: 294923

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 294947

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	Limits
Gasoline Range Organics [C6 - C10]	5.04	5.060		mg/Kg		100	70 - 130
Surrogate	LCS %Recovery	LCS Qualifier	Limits				
a,a,a-Trifluorotoluene	95		70 - 130				

Lab Sample ID: LCSD 600-294947/2-A
Matrix: Solid
Analysis Batch: 294923

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 294947

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics [C6 - C10]	5.04	4.976		mg/Kg		99	70 - 130	2	30
Surrogate	LCSD %Recovery	LCSD Qualifier	Limits						
a,a,a-Trifluorotoluene	95		70 - 130						

Lab Sample ID: MB 600-295026/3-A
Matrix: Solid
Analysis Batch: 295009

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 295026

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics [C6 - C10]	0.586	U	1.00	0.586	mg/Kg		05/22/20 08:55	05/22/20 09:51	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
a,a,a-Trifluorotoluene	94		70 - 130				05/22/20 08:55	05/22/20 09:51	1

Lab Sample ID: LCS 600-295026/1-A
Matrix: Solid
Analysis Batch: 295009

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 295026

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	Limits
Gasoline Range Organics [C6 - C10]	5.04	5.720		mg/Kg		114	70 - 130
Surrogate	LCS %Recovery	LCS Qualifier	Limits				
a,a,a-Trifluorotoluene	95		70 - 130				

Eurofins TestAmerica, Houston

QC Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 8015D - Gasoline Range Organics (GRO) (GC) (Continued)

Lab Sample ID: LCSD 600-295026/2-A
 Matrix: Solid
 Analysis Batch: 295009

Client Sample ID: Lab Control Sample Dup
 Prep Type: Total/NA
 Prep Batch: 295026

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics [C6 - C10]	5.04	6.048		mg/Kg		120	70 - 130	6	30

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
a,a,a-Trifluorotoluene	96		70 - 130

Method: 8015D - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 600-295345/1-A
 Matrix: Solid
 Analysis Batch: 295528

Client Sample ID: Method Blank
 Prep Type: Total/NA
 Prep Batch: 295345

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.70	U	8.25	1.70	mg/Kg		05/28/20 10:47	06/01/20 10:50	1
Oil Range Organics (C28-C36)	4.97	U	8.25	4.97	mg/Kg		05/28/20 10:47	06/01/20 10:50	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	100		60 - 140	05/28/20 10:47	06/01/20 10:50	1

Lab Sample ID: LCS 600-295345/2-A
 Matrix: Solid
 Analysis Batch: 295528

Client Sample ID: Lab Control Sample
 Prep Type: Total/NA
 Prep Batch: 295345

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	Limits
Diesel Range Organics [C10-C28]	66.6	47.52		mg/Kg		71	66 - 134

Surrogate	LCS %Recovery	LCS Qualifier	Limits
o-Terphenyl	117		60 - 140

Lab Sample ID: 600-205421-1 MS
 Matrix: Solid
 Analysis Batch: 295528

Client Sample ID: HA-1-0"-6"
 Prep Type: Total/NA
 Prep Batch: 295345

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	Limits
Diesel Range Organics [C10-C28]	1.72	U	67.2	48.51		mg/Kg	☼	72	66 - 134

Surrogate	MS %Recovery	MS Qualifier	Limits
o-Terphenyl	107		60 - 140

Lab Sample ID: 600-205421-1 MSD
 Matrix: Solid
 Analysis Batch: 295528

Client Sample ID: HA-1-0"-6"
 Prep Type: Total/NA
 Prep Batch: 295345

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Diesel Range Organics [C10-C28]	1.72	U	67.3	47.22		mg/Kg	☼	70	66 - 134	3	30

Eurofins TestAmerica, Houston

QC Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 8015D - Diesel Range Organics (DRO) (GC) (Continued)

Lab Sample ID: 600-205421-1 MSD
 Matrix: Solid
 Analysis Batch: 295528

Client Sample ID: HA-1-0"-6"
 Prep Type: Total/NA
 Prep Batch: 295345

Surrogate	%Recovery	MSD Qualifier	MSD Limits
<i>o</i> -Terphenyl	103		60 - 140

Lab Sample ID: MB 600-295529/1-A
 Matrix: Solid
 Analysis Batch: 295671

Client Sample ID: Method Blank
 Prep Type: Total/NA
 Prep Batch: 295529

Analyte	Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics [C10-C28]	1.70	U	8.26	1.70	mg/Kg		06/01/20 08:26	06/02/20 15:34	1
Oil Range Organics (C28-C36)	4.97	U	8.26	4.97	mg/Kg		06/01/20 08:26	06/02/20 15:34	1

Surrogate	%Recovery	MB Qualifier	MB Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	98		60 - 140	06/01/20 08:26	06/02/20 15:34	1

Lab Sample ID: LCS 600-295529/2-A
 Matrix: Solid
 Analysis Batch: 295671

Client Sample ID: Lab Control Sample
 Prep Type: Total/NA
 Prep Batch: 295529

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Diesel Range Organics [C10-C28]	66.6	61.37		mg/Kg		92	66 - 134

Surrogate	%Recovery	LCS Qualifier	LCS Limits
<i>o</i> -Terphenyl	134		60 - 140

Lab Sample ID: 600-205421-40 MS
 Matrix: Solid
 Analysis Batch: 295671

Client Sample ID: HA-10-6'
 Prep Type: Total/NA
 Prep Batch: 295529

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Diesel Range Organics [C10-C28]	2.11	U	82.6	59.52		mg/Kg	☼	72	66 - 134

Surrogate	%Recovery	MS Qualifier	MS Limits
<i>o</i> -Terphenyl	123		60 - 140

Lab Sample ID: 600-205421-40 MSD
 Matrix: Solid
 Analysis Batch: 295671

Client Sample ID: HA-10-6'
 Prep Type: Total/NA
 Prep Batch: 295529

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Diesel Range Organics [C10-C28]	2.11	U	82.5	68.94		mg/Kg	☼	84	66 - 134	15	30

Surrogate	%Recovery	MSD Qualifier	MSD Limits
<i>o</i> -Terphenyl	162	X	60 - 140

Eurofins TestAmerica, Houston

QC Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 8015D - Diesel Range Organics (DRO) (GC) (Continued)

Lab Sample ID: MB 600-296079/1-A
Matrix: Solid
Analysis Batch: 296177

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 296079

Analyte	MB	MB	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Diesel Range Organics [C10-C28]	1.71	U	8.30	1.71	mg/Kg	-	06/08/20 12:04	06/09/20 14:05	1
Oil Range Organics (C28-C36)	5.00	U	8.30	5.00	mg/Kg	-	06/08/20 12:04	06/09/20 14:05	1

Surrogate	MB	MB	Limits	Prepared	Analyzed	Dil Fac
	%Recovery	Qualifier				
o-Terphenyl	101		60 - 140	06/08/20 12:04	06/09/20 14:05	1

Lab Sample ID: LCS 600-296079/2-A
Matrix: Solid
Analysis Batch: 296177

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 296079

Analyte	Spike Added	LCS	LCS	Unit	D	%Rec	Limits
		Result	Qualifier				
Diesel Range Organics [C10-C28]	66.8	48.17		mg/Kg	-	72	66 - 134

Surrogate	LCS	LCS	Limits
	%Recovery	Qualifier	
o-Terphenyl	103		60 - 140

Lab Sample ID: LCSD 600-296079/3-A
Matrix: Solid
Analysis Batch: 296177

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 296079

Analyte	Spike Added	LCSD	LCSD	Unit	D	%Rec	Limits	RPD	Limit
		Result	Qualifier						
Diesel Range Organics [C10-C28]	66.7	48.00		mg/Kg	-	72	66 - 134	0	30

Surrogate	LCSD	LCSD	Limits
	%Recovery	Qualifier	
o-Terphenyl	103		60 - 140

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 600-295445/40
Matrix: Solid
Analysis Batch: 295445

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB	MB	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Chloride	0.0534	U	0.400	0.0534	mg/Kg	-		05/30/20 03:01	1

Lab Sample ID: LCS 600-295445/41
Matrix: Solid
Analysis Batch: 295445

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS	LCS	Unit	D	%Rec	Limits
		Result	Qualifier				
Chloride	20.0	18.88		mg/Kg	-	94	90 - 110

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QC Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: MB 600-295324/1-A
 Matrix: Solid
 Analysis Batch: 295445

Client Sample ID: Method Blank
 Prep Type: Soluble

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	0.534	U	4.00	0.534	mg/Kg			05/29/20 16:08	1

Lab Sample ID: LCS 600-295324/2-A
 Matrix: Solid
 Analysis Batch: 295445

Client Sample ID: Lab Control Sample
 Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	200	184.7		mg/Kg		92	90 - 110

Lab Sample ID: 600-205421-1 MS
 Matrix: Solid
 Analysis Batch: 295445

Client Sample ID: HA-1-0"-6"
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	10.4	J	505	503.9		mg/Kg	☼	98	80 - 120

Lab Sample ID: 600-205421-1 MSD
 Matrix: Solid
 Analysis Batch: 295445

Client Sample ID: HA-1-0"-6"
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	10.4	J	505	455.5		mg/Kg	☼	88	80 - 120	10	20

Lab Sample ID: 600-205421-11 MS
 Matrix: Solid
 Analysis Batch: 295445

Client Sample ID: HA-3-4'
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	11.0	J	539	559.8		mg/Kg	☼	102	80 - 120

Lab Sample ID: 600-205421-11 MSD
 Matrix: Solid
 Analysis Batch: 295445

Client Sample ID: HA-3-4'
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	11.0	J	539	503.5		mg/Kg	☼	91	80 - 120	11	20

Lab Sample ID: 600-205421-21 MS
 Matrix: Solid
 Analysis Batch: 295445

Client Sample ID: HA-6-0"-6"
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	11.8	J	661	564.3		mg/Kg	☼	84	80 - 120

Lab Sample ID: 600-205421-21 MSD
 Matrix: Solid
 Analysis Batch: 295445

Client Sample ID: HA-6-0"-6"
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	11.8	J	661	593.6		mg/Kg	☼	88	80 - 120	5	20

Eurofins TestAmerica, Houston

QC Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 600-295363/1-A
 Matrix: Solid
 Analysis Batch: 295616

Client Sample ID: Method Blank
 Prep Type: Soluble

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	5.34	U	40.0	5.34	mg/Kg			06/02/20 11:33	10

Lab Sample ID: MB 600-295364/1-A
 Matrix: Solid
 Analysis Batch: 295616

Client Sample ID: Method Blank
 Prep Type: Soluble

Analyte	MB Result	MB Qualifier	MQL (Adj)	SDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	0.534	U	4.00	0.534	mg/Kg			06/02/20 19:52	1

Lab Sample ID: LCS 600-295363/2-A
 Matrix: Solid
 Analysis Batch: 295616

Client Sample ID: Lab Control Sample
 Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	2000	1820		mg/Kg		91	90 - 110

Lab Sample ID: LCS 600-295364/2-A
 Matrix: Solid
 Analysis Batch: 295616

Client Sample ID: Lab Control Sample
 Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	200	189.8		mg/Kg		95	90 - 110

Lab Sample ID: 600-205421-25 MS
 Matrix: Solid
 Analysis Batch: 295616

Client Sample ID: HA-7-0"-6"
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	8.64		152	166.9		mg/Kg	☼	104	80 - 120

Lab Sample ID: 600-205421-25 MSD
 Matrix: Solid
 Analysis Batch: 295616

Client Sample ID: HA-7-0"-6"
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	8.64		152	160.7		mg/Kg	☼	100	80 - 120	4	20

Lab Sample ID: 600-205421-35 MS
 Matrix: Solid
 Analysis Batch: 295616

Client Sample ID: HA-9-4'
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	2.82	J	106	110.8		mg/Kg	☼	102	80 - 120

Lab Sample ID: 600-205421-35 MSD
 Matrix: Solid
 Analysis Batch: 295616

Client Sample ID: HA-9-4'
 Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	2.82	J	106	102.7		mg/Kg	☼	95	80 - 120	8	20

Eurofins TestAmerica, Houston

QC Sample Results

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Method: 2540B - Percent Moisture

Lab Sample ID: 600-205421-33 DU
Matrix: Solid
Analysis Batch: 294990

Client Sample ID: HA-9-0"-6"
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Percent Moisture	0.2		0.2		%		NC	20
Percent Solids	99.8		99.8		%		0	20

Lab Sample ID: 600-205421-37 DU
Matrix: Solid
Analysis Batch: 294990

Client Sample ID: HA-10-0"-6"
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Percent Moisture	1.6		1.4		%		11	20
Percent Solids	98.4		98.6		%		0.2	20

Lab Sample ID: 600-205421-38 DU
Matrix: Solid
Analysis Batch: 294990

Client Sample ID: HA-10-2'
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Percent Moisture	20.8		22.6		%		8	20
Percent Solids	79.2		77.4		%		2	20

Unadjusted Detection Limits

Client: ARCADIS U.S., Inc.

Job ID: 600-205421-1

Project/Site: Chevron-Warren Field Water Transfer Line

Method: 8260C - Volatile Organic Compounds by GC/MS**Prep: 5030C**

Analyte	MQL	MDL	Units
Benzene	5.00	0.630	ug/Kg
Ethylbenzene	5.00	1.02	ug/Kg
Toluene	5.00	1.38	ug/Kg
Xylenes, Total	5.00	1.13	ug/Kg

Method: 8015D - Gasoline Range Organics (GRO) (GC)**Prep: 5030C**

Analyte	MQL	MDL	Units
Gasoline Range Organics [C6 - C10]	1.00	0.586	mg/Kg

Method: 8015D - Diesel Range Organics (DRO) (GC)**Prep: 3546**

Analyte	MQL	MDL	Units
Diesel Range Organics [C10-C28]	8.30	1.71	mg/Kg
Oil Range Organics (C28-C36)	8.30	5.00	mg/Kg

Method: 300.0 - Anions, Ion Chromatography - Soluble**Leach: DI Leach**

Analyte	MQL	MDL	Units
Chloride	4.00	0.534	mg/Kg

General Chemistry

Analyte	MQL	MDL	Units
Percent Moisture	1.0	1.0	%
Percent Solids	1.0	1.0	%

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QC Association Summary

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

GC/MS VOA

Analysis Batch: 294958

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-1	HA-1-0"-6"	Total/NA	Solid	8260C	294982
600-205421-2	HA-1-2'	Total/NA	Solid	8260C	294982
600-205421-4	HA-1-6'	Total/NA	Solid	8260C	294982
600-205421-5	HA-2-0"-6"	Total/NA	Solid	8260C	294982
600-205421-6	HA-2-2'	Total/NA	Solid	8260C	294982
600-205421-7	HA-2-4'	Total/NA	Solid	8260C	294982
600-205421-8	HA-2-6'	Total/NA	Solid	8260C	294982
600-205421-9	HA-3-0"-6"	Total/NA	Solid	8260C	294982
600-205421-10	HA-3-2'	Total/NA	Solid	8260C	294982
600-205421-11	HA-3-4'	Total/NA	Solid	8260C	294982
600-205421-12	HA-3-6'	Total/NA	Solid	8260C	294982
600-205421-14	HA-4-2'	Total/NA	Solid	8260C	294982
MB 600-294958/7	Method Blank	Total/NA	Solid	8260C	
LCS 600-294958/4	Lab Control Sample	Total/NA	Solid	8260C	
LCSD 600-294958/5	Lab Control Sample Dup	Total/NA	Solid	8260C	

Prep Batch: 294982

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-1	HA-1-0"-6"	Total/NA	Solid	5030C	
600-205421-2	HA-1-2'	Total/NA	Solid	5030C	
600-205421-4	HA-1-6'	Total/NA	Solid	5030C	
600-205421-5	HA-2-0"-6"	Total/NA	Solid	5030C	
600-205421-6	HA-2-2'	Total/NA	Solid	5030C	
600-205421-7	HA-2-4'	Total/NA	Solid	5030C	
600-205421-8	HA-2-6'	Total/NA	Solid	5030C	
600-205421-9	HA-3-0"-6"	Total/NA	Solid	5030C	
600-205421-10	HA-3-2'	Total/NA	Solid	5030C	
600-205421-11	HA-3-4'	Total/NA	Solid	5030C	
600-205421-12	HA-3-6'	Total/NA	Solid	5030C	
600-205421-14	HA-4-2'	Total/NA	Solid	5030C	
600-205421-18	HA-5-2'	Total/NA	Solid	5030C	
600-205421-19	HA-5-4'	Total/NA	Solid	5030C	
600-205421-20	HA-5-6'	Total/NA	Solid	5030C	

Prep Batch: 294984

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-21	HA-6-0"-6"	Total/NA	Solid	5030C	
600-205421-22	HA-6-2'	Total/NA	Solid	5030C	
600-205421-23	HA-6-4'	Total/NA	Solid	5030C	
600-205421-24	HA-6-6'	Total/NA	Solid	5030C	
600-205421-25	HA-7-0"-6"	Total/NA	Solid	5030C	
600-205421-26	HA-7-2'	Total/NA	Solid	5030C	
600-205421-27	HA-7-4'	Total/NA	Solid	5030C	
600-205421-28	HA-7-6'	Total/NA	Solid	5030C	
600-205421-29	HA-8-0"-6"	Total/NA	Solid	5030C	
600-205421-30	HA-8-2'	Total/NA	Solid	5030C	
600-205421-31	HA-8-4'	Total/NA	Solid	5030C	
600-205421-32	HA-8-6'	Total/NA	Solid	5030C	
600-205421-33	HA-9-0"-6"	Total/NA	Solid	5030C	
600-205421-34	HA-9-2'	Total/NA	Solid	5030C	
600-205421-35	HA-9-4'	Total/NA	Solid	5030C	

Eurofins TestAmerica, Houston

QC Association Summary

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

GC/MS VOA (Continued)

Prep Batch: 294984 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-36	HA-9-6'	Total/NA	Solid	5030C	
600-205421-38	HA-10-2'	Total/NA	Solid	5030C	
600-205421-39	HA-10-4'	Total/NA	Solid	5030C	

Analysis Batch: 295041

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-18	HA-5-2'	Total/NA	Solid	8260C	294982
600-205421-19	HA-5-4'	Total/NA	Solid	8260C	294982
600-205421-20	HA-5-6'	Total/NA	Solid	8260C	294982
600-205421-21	HA-6-0"-6"	Total/NA	Solid	8260C	294984
600-205421-22	HA-6-2'	Total/NA	Solid	8260C	294984
600-205421-23	HA-6-4'	Total/NA	Solid	8260C	294984
600-205421-24	HA-6-6'	Total/NA	Solid	8260C	294984
600-205421-25	HA-7-0"-6"	Total/NA	Solid	8260C	294984
600-205421-26	HA-7-2'	Total/NA	Solid	8260C	294984
600-205421-27	HA-7-4'	Total/NA	Solid	8260C	294984
600-205421-28	HA-7-6'	Total/NA	Solid	8260C	294984
600-205421-29	HA-8-0"-6"	Total/NA	Solid	8260C	294984
600-205421-30	HA-8-2'	Total/NA	Solid	8260C	294984
600-205421-31	HA-8-4'	Total/NA	Solid	8260C	294984
600-205421-32	HA-8-6'	Total/NA	Solid	8260C	294984
600-205421-33	HA-9-0"-6"	Total/NA	Solid	8260C	294984
600-205421-34	HA-9-2'	Total/NA	Solid	8260C	294984
600-205421-35	HA-9-4'	Total/NA	Solid	8260C	294984
600-205421-36	HA-9-6'	Total/NA	Solid	8260C	294984
MB 600-295041/7	Method Blank	Total/NA	Solid	8260C	
LCS 600-295041/4	Lab Control Sample	Total/NA	Solid	8260C	
LCSD 600-295041/5	Lab Control Sample Dup	Total/NA	Solid	8260C	

Analysis Batch: 295179

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-3	HA-1-4'	Total/NA	Solid	8260C	295188
600-205421-13	HA-4-0"-6"	Total/NA	Solid	8260C	295188
600-205421-16	HA-4-6'	Total/NA	Solid	8260C	295188
600-205421-17	HA-5-0"-6"	Total/NA	Solid	8260C	295188
600-205421-38	HA-10-2'	Total/NA	Solid	8260C	294984
600-205421-39	HA-10-4'	Total/NA	Solid	8260C	294984
MB 600-295179/7	Method Blank	Total/NA	Solid	8260C	
LCS 600-295179/4	Lab Control Sample	Total/NA	Solid	8260C	
LCSD 600-295179/5	Lab Control Sample Dup	Total/NA	Solid	8260C	

Prep Batch: 295188

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-3	HA-1-4'	Total/NA	Solid	5030C	
600-205421-13	HA-4-0"-6"	Total/NA	Solid	5030C	
600-205421-16	HA-4-6'	Total/NA	Solid	5030C	
600-205421-17	HA-5-0"-6"	Total/NA	Solid	5030C	

Analysis Batch: 295244

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-15	HA-4-4'	Total/NA	Solid	8260C	295261

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QC Association Summary

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

GC/MS VOA (Continued)

Analysis Batch: 295244 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-37	HA-10-0"-6"	Total/NA	Solid	8260C	295279
600-205421-40	HA-10-6'	Total/NA	Solid	8260C	295279
MB 600-295244/7	Method Blank	Total/NA	Solid	8260C	
LCS 600-295244/4	Lab Control Sample	Total/NA	Solid	8260C	
LCSD 600-295244/5	Lab Control Sample Dup	Total/NA	Solid	8260C	

Prep Batch: 295261

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-15	HA-4-4'	Total/NA	Solid	5030C	

Prep Batch: 295279

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-37	HA-10-0"-6"	Total/NA	Solid	5030C	
600-205421-40	HA-10-6'	Total/NA	Solid	5030C	

GC VOA

Analysis Batch: 294923

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-1	HA-1-0"-6"	Total/NA	Solid	8015D	294947
600-205421-2	HA-1-2'	Total/NA	Solid	8015D	294947
600-205421-3	HA-1-4'	Total/NA	Solid	8015D	294947
600-205421-4	HA-1-6'	Total/NA	Solid	8015D	294947
600-205421-5	HA-2-0"-6"	Total/NA	Solid	8015D	294947
600-205421-6	HA-2-2'	Total/NA	Solid	8015D	294947
600-205421-7	HA-2-4'	Total/NA	Solid	8015D	294947
600-205421-8	HA-2-6'	Total/NA	Solid	8015D	294947
600-205421-9	HA-3-0"-6"	Total/NA	Solid	8015D	294947
600-205421-10	HA-3-2'	Total/NA	Solid	8015D	294947
600-205421-11	HA-3-4'	Total/NA	Solid	8015D	294947
600-205421-12	HA-3-6'	Total/NA	Solid	8015D	294947
600-205421-13	HA-4-0"-6"	Total/NA	Solid	8015D	294947
600-205421-14	HA-4-2'	Total/NA	Solid	8015D	294947
600-205421-15	HA-4-4'	Total/NA	Solid	8015D	294947
600-205421-16	HA-4-6'	Total/NA	Solid	8015D	294947
600-205421-17	HA-5-0"-6"	Total/NA	Solid	8015D	294947
600-205421-18	HA-5-2'	Total/NA	Solid	8015D	294947
600-205421-19	HA-5-4'	Total/NA	Solid	8015D	294947
600-205421-20	HA-5-6'	Total/NA	Solid	8015D	294947
MB 600-294947/3-A	Method Blank	Total/NA	Solid	8015D	294947
LCS 600-294947/1-A	Lab Control Sample	Total/NA	Solid	8015D	294947
LCSD 600-294947/2-A	Lab Control Sample Dup	Total/NA	Solid	8015D	294947

Prep Batch: 294947

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-1	HA-1-0"-6"	Total/NA	Solid	5030C	
600-205421-2	HA-1-2'	Total/NA	Solid	5030C	
600-205421-3	HA-1-4'	Total/NA	Solid	5030C	
600-205421-4	HA-1-6'	Total/NA	Solid	5030C	
600-205421-5	HA-2-0"-6"	Total/NA	Solid	5030C	
600-205421-6	HA-2-2'	Total/NA	Solid	5030C	

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QC Association Summary

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

GC VOA (Continued)

Prep Batch: 294947 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-7	HA-2-4'	Total/NA	Solid	5030C	
600-205421-8	HA-2-6'	Total/NA	Solid	5030C	
600-205421-9	HA-3-0"-6"	Total/NA	Solid	5030C	
600-205421-10	HA-3-2'	Total/NA	Solid	5030C	
600-205421-11	HA-3-4'	Total/NA	Solid	5030C	
600-205421-12	HA-3-6'	Total/NA	Solid	5030C	
600-205421-13	HA-4-0"-6"	Total/NA	Solid	5030C	
600-205421-14	HA-4-2'	Total/NA	Solid	5030C	
600-205421-15	HA-4-4'	Total/NA	Solid	5030C	
600-205421-16	HA-4-6'	Total/NA	Solid	5030C	
600-205421-17	HA-5-0"-6"	Total/NA	Solid	5030C	
600-205421-18	HA-5-2'	Total/NA	Solid	5030C	
600-205421-19	HA-5-4'	Total/NA	Solid	5030C	
600-205421-20	HA-5-6'	Total/NA	Solid	5030C	
MB 600-294947/3-A	Method Blank	Total/NA	Solid	5030C	
LCS 600-294947/1-A	Lab Control Sample	Total/NA	Solid	5030C	
LCSD 600-294947/2-A	Lab Control Sample Dup	Total/NA	Solid	5030C	

Analysis Batch: 295009

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-21	HA-6-0"-6"	Total/NA	Solid	8015D	295026
600-205421-22	HA-6-2'	Total/NA	Solid	8015D	295026
600-205421-23	HA-6-4'	Total/NA	Solid	8015D	295026
600-205421-24	HA-6-6'	Total/NA	Solid	8015D	295026
600-205421-25	HA-7-0"-6"	Total/NA	Solid	8015D	295026
600-205421-26	HA-7-2'	Total/NA	Solid	8015D	295026
600-205421-27	HA-7-4'	Total/NA	Solid	8015D	295026
600-205421-28	HA-7-6'	Total/NA	Solid	8015D	295026
600-205421-29	HA-8-0"-6"	Total/NA	Solid	8015D	295026
600-205421-30	HA-8-2'	Total/NA	Solid	8015D	295026
600-205421-31	HA-8-4'	Total/NA	Solid	8015D	295026
600-205421-32	HA-8-6'	Total/NA	Solid	8015D	295026
600-205421-33	HA-9-0"-6"	Total/NA	Solid	8015D	295026
600-205421-34	HA-9-2'	Total/NA	Solid	8015D	295026
600-205421-35	HA-9-4'	Total/NA	Solid	8015D	295026
600-205421-36	HA-9-6'	Total/NA	Solid	8015D	295026
600-205421-37	HA-10-0"-6"	Total/NA	Solid	8015D	295026
600-205421-38	HA-10-2'	Total/NA	Solid	8015D	295026
600-205421-39	HA-10-4'	Total/NA	Solid	8015D	295026
600-205421-40	HA-10-6'	Total/NA	Solid	8015D	295026
MB 600-295026/3-A	Method Blank	Total/NA	Solid	8015D	295026
LCS 600-295026/1-A	Lab Control Sample	Total/NA	Solid	8015D	295026
LCSD 600-295026/2-A	Lab Control Sample Dup	Total/NA	Solid	8015D	295026

Prep Batch: 295026

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-21	HA-6-0"-6"	Total/NA	Solid	5030C	
600-205421-22	HA-6-2'	Total/NA	Solid	5030C	
600-205421-23	HA-6-4'	Total/NA	Solid	5030C	
600-205421-24	HA-6-6'	Total/NA	Solid	5030C	
600-205421-25	HA-7-0"-6"	Total/NA	Solid	5030C	

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QC Association Summary

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

GC VOA (Continued)

Prep Batch: 295026 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-26	HA-7-2'	Total/NA	Solid	5030C	
600-205421-27	HA-7-4'	Total/NA	Solid	5030C	
600-205421-28	HA-7-6'	Total/NA	Solid	5030C	
600-205421-29	HA-8-0"-6"	Total/NA	Solid	5030C	
600-205421-30	HA-8-2'	Total/NA	Solid	5030C	
600-205421-31	HA-8-4'	Total/NA	Solid	5030C	
600-205421-32	HA-8-6'	Total/NA	Solid	5030C	
600-205421-33	HA-9-0"-6"	Total/NA	Solid	5030C	
600-205421-34	HA-9-2'	Total/NA	Solid	5030C	
600-205421-35	HA-9-4'	Total/NA	Solid	5030C	
600-205421-36	HA-9-6'	Total/NA	Solid	5030C	
600-205421-37	HA-10-0"-6"	Total/NA	Solid	5030C	
600-205421-38	HA-10-2'	Total/NA	Solid	5030C	
600-205421-39	HA-10-4'	Total/NA	Solid	5030C	
600-205421-40	HA-10-6'	Total/NA	Solid	5030C	
MB 600-295026/3-A	Method Blank	Total/NA	Solid	5030C	
LCS 600-295026/1-A	Lab Control Sample	Total/NA	Solid	5030C	
LCSD 600-295026/2-A	Lab Control Sample Dup	Total/NA	Solid	5030C	

GC Semi VOA

Prep Batch: 295345

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-1	HA-1-0"-6"	Total/NA	Solid	3546	
600-205421-2	HA-1-2'	Total/NA	Solid	3546	
600-205421-3	HA-1-4'	Total/NA	Solid	3546	
600-205421-4	HA-1-6'	Total/NA	Solid	3546	
600-205421-5	HA-2-0"-6"	Total/NA	Solid	3546	
600-205421-6	HA-2-2'	Total/NA	Solid	3546	
600-205421-7	HA-2-4'	Total/NA	Solid	3546	
600-205421-8	HA-2-6'	Total/NA	Solid	3546	
600-205421-9	HA-3-0"-6"	Total/NA	Solid	3546	
600-205421-10	HA-3-2'	Total/NA	Solid	3546	
600-205421-11	HA-3-4'	Total/NA	Solid	3546	
600-205421-12	HA-3-6'	Total/NA	Solid	3546	
600-205421-13	HA-4-0"-6"	Total/NA	Solid	3546	
600-205421-14	HA-4-2'	Total/NA	Solid	3546	
600-205421-15	HA-4-4'	Total/NA	Solid	3546	
600-205421-16	HA-4-6'	Total/NA	Solid	3546	
600-205421-17	HA-5-0"-6"	Total/NA	Solid	3546	
600-205421-18	HA-5-2'	Total/NA	Solid	3546	
600-205421-19	HA-5-4'	Total/NA	Solid	3546	
600-205421-20	HA-5-6'	Total/NA	Solid	3546	
MB 600-295345/1-A	Method Blank	Total/NA	Solid	3546	
LCS 600-295345/2-A	Lab Control Sample	Total/NA	Solid	3546	
600-205421-1 MS	HA-1-0"-6"	Total/NA	Solid	3546	
600-205421-1 MSD	HA-1-0"-6"	Total/NA	Solid	3546	

Analysis Batch: 295528

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-1	HA-1-0"-6"	Total/NA	Solid	8015D	295345

Eurofins TestAmerica, Houston

QC Association Summary

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

GC Semi VOA (Continued)

Analysis Batch: 295528 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-2	HA-1-2'	Total/NA	Solid	8015D	295345
600-205421-3	HA-1-4'	Total/NA	Solid	8015D	295345
600-205421-4	HA-1-6'	Total/NA	Solid	8015D	295345
600-205421-5	HA-2-0"-6"	Total/NA	Solid	8015D	295345
600-205421-6	HA-2-2'	Total/NA	Solid	8015D	295345
600-205421-7	HA-2-4'	Total/NA	Solid	8015D	295345
600-205421-8	HA-2-6'	Total/NA	Solid	8015D	295345
600-205421-9	HA-3-0"-6"	Total/NA	Solid	8015D	295345
600-205421-10	HA-3-2'	Total/NA	Solid	8015D	295345
600-205421-11	HA-3-4'	Total/NA	Solid	8015D	295345
600-205421-12	HA-3-6'	Total/NA	Solid	8015D	295345
600-205421-13	HA-4-0"-6"	Total/NA	Solid	8015D	295345
600-205421-14	HA-4-2'	Total/NA	Solid	8015D	295345
600-205421-15	HA-4-4'	Total/NA	Solid	8015D	295345
600-205421-16	HA-4-6'	Total/NA	Solid	8015D	295345
600-205421-17	HA-5-0"-6"	Total/NA	Solid	8015D	295345
600-205421-18	HA-5-2'	Total/NA	Solid	8015D	295345
600-205421-19	HA-5-4'	Total/NA	Solid	8015D	295345
600-205421-20	HA-5-6'	Total/NA	Solid	8015D	295345
MB 600-295345/1-A	Method Blank	Total/NA	Solid	8015D	295345
LCS 600-295345/2-A	Lab Control Sample	Total/NA	Solid	8015D	295345
600-205421-1 MS	HA-1-0"-6"	Total/NA	Solid	8015D	295345
600-205421-1 MSD	HA-1-0"-6"	Total/NA	Solid	8015D	295345

Prep Batch: 295529

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-21	HA-6-0"-6"	Total/NA	Solid	3546	
600-205421-22	HA-6-2'	Total/NA	Solid	3546	
600-205421-23	HA-6-4'	Total/NA	Solid	3546	
600-205421-24	HA-6-6'	Total/NA	Solid	3546	
600-205421-25	HA-7-0"-6"	Total/NA	Solid	3546	
600-205421-26	HA-7-2'	Total/NA	Solid	3546	
600-205421-27	HA-7-4'	Total/NA	Solid	3546	
600-205421-28	HA-7-6'	Total/NA	Solid	3546	
600-205421-29	HA-8-0"-6"	Total/NA	Solid	3546	
600-205421-30	HA-8-2'	Total/NA	Solid	3546	
600-205421-31	HA-8-4'	Total/NA	Solid	3546	
600-205421-32	HA-8-6'	Total/NA	Solid	3546	
600-205421-33	HA-9-0"-6"	Total/NA	Solid	3546	
600-205421-34	HA-9-2'	Total/NA	Solid	3546	
600-205421-35	HA-9-4'	Total/NA	Solid	3546	
600-205421-36	HA-9-6'	Total/NA	Solid	3546	
600-205421-37	HA-10-0"-6"	Total/NA	Solid	3546	
600-205421-38	HA-10-2'	Total/NA	Solid	3546	
600-205421-39	HA-10-4'	Total/NA	Solid	3546	
600-205421-40	HA-10-6'	Total/NA	Solid	3546	
MB 600-295529/1-A	Method Blank	Total/NA	Solid	3546	
LCS 600-295529/2-A	Lab Control Sample	Total/NA	Solid	3546	
600-205421-40 MS	HA-10-6'	Total/NA	Solid	3546	
600-205421-40 MSD	HA-10-6'	Total/NA	Solid	3546	

Eurofins TestAmerica, Houston

QC Association Summary

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

GC Semi VOA

Analysis Batch: 295671

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-21	HA-6-0"-6"	Total/NA	Solid	8015D	295529
600-205421-22	HA-6-2'	Total/NA	Solid	8015D	295529
600-205421-23	HA-6-4'	Total/NA	Solid	8015D	295529
600-205421-24	HA-6-6'	Total/NA	Solid	8015D	295529
600-205421-25	HA-7-0"-6"	Total/NA	Solid	8015D	295529
600-205421-26	HA-7-2'	Total/NA	Solid	8015D	295529
600-205421-27	HA-7-4'	Total/NA	Solid	8015D	295529
600-205421-28	HA-7-6'	Total/NA	Solid	8015D	295529
600-205421-29	HA-8-0"-6"	Total/NA	Solid	8015D	295529
600-205421-30	HA-8-2'	Total/NA	Solid	8015D	295529
600-205421-31	HA-8-4'	Total/NA	Solid	8015D	295529
600-205421-32	HA-8-6'	Total/NA	Solid	8015D	295529
600-205421-33	HA-9-0"-6"	Total/NA	Solid	8015D	295529
600-205421-34	HA-9-2'	Total/NA	Solid	8015D	295529
600-205421-35	HA-9-4'	Total/NA	Solid	8015D	295529
600-205421-36	HA-9-6'	Total/NA	Solid	8015D	295529
600-205421-37	HA-10-0"-6"	Total/NA	Solid	8015D	295529
600-205421-38	HA-10-2'	Total/NA	Solid	8015D	295529
600-205421-39	HA-10-4'	Total/NA	Solid	8015D	295529
600-205421-40	HA-10-6'	Total/NA	Solid	8015D	295529
MB 600-295529/1-A	Method Blank	Total/NA	Solid	8015D	295529
LCS 600-295529/2-A	Lab Control Sample	Total/NA	Solid	8015D	295529
600-205421-40 MS	HA-10-6'	Total/NA	Solid	8015D	295529
600-205421-40 MSD	HA-10-6'	Total/NA	Solid	8015D	295529

Prep Batch: 296079

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-13	HA-4-0"-6"	Total/NA	Solid	3546	
MB 600-296079/1-A	Method Blank	Total/NA	Solid	3546	
LCS 600-296079/2-A	Lab Control Sample	Total/NA	Solid	3546	
LCSD 600-296079/3-A	Lab Control Sample Dup	Total/NA	Solid	3546	

Analysis Batch: 296177

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-13	HA-4-0"-6"	Total/NA	Solid	8015D	296079
MB 600-296079/1-A	Method Blank	Total/NA	Solid	8015D	296079
LCS 600-296079/2-A	Lab Control Sample	Total/NA	Solid	8015D	296079
LCSD 600-296079/3-A	Lab Control Sample Dup	Total/NA	Solid	8015D	296079

HPLC/IC

Leach Batch: 295324

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-1	HA-1-0"-6"	Soluble	Solid	DI Leach	
600-205421-2	HA-1-2'	Soluble	Solid	DI Leach	
600-205421-3	HA-1-4'	Soluble	Solid	DI Leach	
600-205421-4	HA-1-6'	Soluble	Solid	DI Leach	
600-205421-5	HA-2-0"-6"	Soluble	Solid	DI Leach	
600-205421-6	HA-2-2'	Soluble	Solid	DI Leach	
600-205421-7	HA-2-4'	Soluble	Solid	DI Leach	
600-205421-8	HA-2-6'	Soluble	Solid	DI Leach	

Eurofins TestAmerica, Houston

QC Association Summary

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

HPLC/IC (Continued)

Leach Batch: 295324 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-9	HA-3-0"-6"	Soluble	Solid	DI Leach	
600-205421-10	HA-3-2'	Soluble	Solid	DI Leach	
600-205421-11	HA-3-4'	Soluble	Solid	DI Leach	
600-205421-12	HA-3-6'	Soluble	Solid	DI Leach	
600-205421-13	HA-4-0"-6"	Soluble	Solid	DI Leach	
600-205421-14	HA-4-2'	Soluble	Solid	DI Leach	
600-205421-15	HA-4-4'	Soluble	Solid	DI Leach	
600-205421-16	HA-4-6'	Soluble	Solid	DI Leach	
MB 600-295324/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 600-295324/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
600-205421-1 MS	HA-1-0"-6"	Soluble	Solid	DI Leach	
600-205421-1 MSD	HA-1-0"-6"	Soluble	Solid	DI Leach	
600-205421-11 MS	HA-3-4'	Soluble	Solid	DI Leach	
600-205421-11 MSD	HA-3-4'	Soluble	Solid	DI Leach	

Leach Batch: 295363

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-17	HA-5-0"-6"	Soluble	Solid	DI Leach	
600-205421-18	HA-5-2'	Soluble	Solid	DI Leach	
600-205421-19	HA-5-4'	Soluble	Solid	DI Leach	
600-205421-20	HA-5-6'	Soluble	Solid	DI Leach	
600-205421-21	HA-6-0"-6"	Soluble	Solid	DI Leach	
600-205421-22	HA-6-2'	Soluble	Solid	DI Leach	
600-205421-23	HA-6-4'	Soluble	Solid	DI Leach	
600-205421-24	HA-6-6'	Soluble	Solid	DI Leach	
600-205421-25	HA-7-0"-6"	Soluble	Solid	DI Leach	
600-205421-26	HA-7-2'	Soluble	Solid	DI Leach	
600-205421-27	HA-7-4'	Soluble	Solid	DI Leach	
600-205421-28	HA-7-6'	Soluble	Solid	DI Leach	
600-205421-29	HA-8-0"-6"	Soluble	Solid	DI Leach	
600-205421-30	HA-8-2'	Soluble	Solid	DI Leach	
600-205421-31	HA-8-4'	Soluble	Solid	DI Leach	
600-205421-32	HA-8-6'	Soluble	Solid	DI Leach	
600-205421-33	HA-9-0"-6"	Soluble	Solid	DI Leach	
600-205421-34	HA-9-2'	Soluble	Solid	DI Leach	
600-205421-35	HA-9-4'	Soluble	Solid	DI Leach	
600-205421-36	HA-9-6'	Soluble	Solid	DI Leach	
MB 600-295363/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 600-295363/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
600-205421-21 MS	HA-6-0"-6"	Soluble	Solid	DI Leach	
600-205421-21 MSD	HA-6-0"-6"	Soluble	Solid	DI Leach	
600-205421-25 MS	HA-7-0"-6"	Soluble	Solid	DI Leach	
600-205421-25 MSD	HA-7-0"-6"	Soluble	Solid	DI Leach	
600-205421-35 MS	HA-9-4'	Soluble	Solid	DI Leach	
600-205421-35 MSD	HA-9-4'	Soluble	Solid	DI Leach	

Leach Batch: 295364

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-37	HA-10-0"-6"	Soluble	Solid	DI Leach	
600-205421-38	HA-10-2'	Soluble	Solid	DI Leach	
600-205421-39	HA-10-4'	Soluble	Solid	DI Leach	

Eurofins TestAmerica, Houston

QC Association Summary

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

HPLC/IC (Continued)

Leach Batch: 295364 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-40	HA-10-6'	Soluble	Solid	DI Leach	
MB 600-295364/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 600-295364/2-A	Lab Control Sample	Soluble	Solid	DI Leach	

Analysis Batch: 295445

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-1	HA-1-0"-6"	Soluble	Solid	300.0	295324
600-205421-2	HA-1-2'	Soluble	Solid	300.0	295324
600-205421-3	HA-1-4'	Soluble	Solid	300.0	295324
600-205421-4	HA-1-6'	Soluble	Solid	300.0	295324
600-205421-5	HA-2-0"-6"	Soluble	Solid	300.0	295324
600-205421-6	HA-2-2'	Soluble	Solid	300.0	295324
600-205421-7	HA-2-4'	Soluble	Solid	300.0	295324
600-205421-8	HA-2-6'	Soluble	Solid	300.0	295324
600-205421-9	HA-3-0"-6"	Soluble	Solid	300.0	295324
600-205421-10	HA-3-2'	Soluble	Solid	300.0	295324
600-205421-11	HA-3-4'	Soluble	Solid	300.0	295324
600-205421-12	HA-3-6'	Soluble	Solid	300.0	295324
600-205421-13	HA-4-0"-6"	Soluble	Solid	300.0	295324
600-205421-14	HA-4-2'	Soluble	Solid	300.0	295324
600-205421-15	HA-4-4'	Soluble	Solid	300.0	295324
600-205421-16	HA-4-6'	Soluble	Solid	300.0	295324
600-205421-17	HA-5-0"-6"	Soluble	Solid	300.0	295363
600-205421-18	HA-5-2'	Soluble	Solid	300.0	295363
600-205421-19	HA-5-4'	Soluble	Solid	300.0	295363
600-205421-20	HA-5-6'	Soluble	Solid	300.0	295363
600-205421-21	HA-6-0"-6"	Soluble	Solid	300.0	295363
600-205421-22	HA-6-2'	Soluble	Solid	300.0	295363
600-205421-23	HA-6-4'	Soluble	Solid	300.0	295363
600-205421-24	HA-6-6'	Soluble	Solid	300.0	295363
MB 600-295324/1-A	Method Blank	Soluble	Solid	300.0	295324
MB 600-295445/40	Method Blank	Total/NA	Solid	300.0	
LCS 600-295324/2-A	Lab Control Sample	Soluble	Solid	300.0	295324
LCS 600-295445/41	Lab Control Sample	Total/NA	Solid	300.0	
600-205421-1 MS	HA-1-0"-6"	Soluble	Solid	300.0	295324
600-205421-1 MSD	HA-1-0"-6"	Soluble	Solid	300.0	295324
600-205421-11 MS	HA-3-4'	Soluble	Solid	300.0	295324
600-205421-11 MSD	HA-3-4'	Soluble	Solid	300.0	295324
600-205421-21 MS	HA-6-0"-6"	Soluble	Solid	300.0	295363
600-205421-21 MSD	HA-6-0"-6"	Soluble	Solid	300.0	295363

Analysis Batch: 295616

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-25	HA-7-0"-6"	Soluble	Solid	300.0	295363
600-205421-26	HA-7-2'	Soluble	Solid	300.0	295363
600-205421-27	HA-7-4'	Soluble	Solid	300.0	295363
600-205421-28	HA-7-6'	Soluble	Solid	300.0	295363
600-205421-29	HA-8-0"-6"	Soluble	Solid	300.0	295363
600-205421-30	HA-8-2'	Soluble	Solid	300.0	295363
600-205421-31	HA-8-4'	Soluble	Solid	300.0	295363
600-205421-32	HA-8-6'	Soluble	Solid	300.0	295363

Eurofins TestAmerica, Houston

QC Association Summary

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

HPLC/IC (Continued)

Analysis Batch: 295616 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-33	HA-9-0"-6"	Soluble	Solid	300.0	295363
600-205421-34	HA-9-2'	Soluble	Solid	300.0	295363
600-205421-35	HA-9-4'	Soluble	Solid	300.0	295363
600-205421-36	HA-9-6'	Soluble	Solid	300.0	295363
600-205421-37	HA-10-0"-6"	Soluble	Solid	300.0	295364
600-205421-38	HA-10-2'	Soluble	Solid	300.0	295364
600-205421-39	HA-10-4'	Soluble	Solid	300.0	295364
600-205421-40	HA-10-6'	Soluble	Solid	300.0	295364
MB 600-295363/1-A	Method Blank	Soluble	Solid	300.0	295363
MB 600-295364/1-A	Method Blank	Soluble	Solid	300.0	295364
LCS 600-295363/2-A	Lab Control Sample	Soluble	Solid	300.0	295363
LCS 600-295364/2-A	Lab Control Sample	Soluble	Solid	300.0	295364
600-205421-25 MS	HA-7-0"-6"	Soluble	Solid	300.0	295363
600-205421-25 MSD	HA-7-0"-6"	Soluble	Solid	300.0	295363
600-205421-35 MS	HA-9-4'	Soluble	Solid	300.0	295363
600-205421-35 MSD	HA-9-4'	Soluble	Solid	300.0	295363

General Chemistry

Analysis Batch: 294990

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-1	HA-1-0"-6"	Total/NA	Solid	2540B	
600-205421-2	HA-1-2'	Total/NA	Solid	2540B	
600-205421-3	HA-1-4'	Total/NA	Solid	2540B	
600-205421-4	HA-1-6'	Total/NA	Solid	2540B	
600-205421-5	HA-2-0"-6"	Total/NA	Solid	2540B	
600-205421-6	HA-2-2'	Total/NA	Solid	2540B	
600-205421-7	HA-2-4'	Total/NA	Solid	2540B	
600-205421-8	HA-2-6'	Total/NA	Solid	2540B	
600-205421-9	HA-3-0"-6"	Total/NA	Solid	2540B	
600-205421-10	HA-3-2'	Total/NA	Solid	2540B	
600-205421-11	HA-3-4'	Total/NA	Solid	2540B	
600-205421-12	HA-3-6'	Total/NA	Solid	2540B	
600-205421-13	HA-4-0"-6"	Total/NA	Solid	2540B	
600-205421-14	HA-4-2'	Total/NA	Solid	2540B	
600-205421-15	HA-4-4'	Total/NA	Solid	2540B	
600-205421-16	HA-4-6'	Total/NA	Solid	2540B	
600-205421-17	HA-5-0"-6"	Total/NA	Solid	2540B	
600-205421-18	HA-5-2'	Total/NA	Solid	2540B	
600-205421-19	HA-5-4'	Total/NA	Solid	2540B	
600-205421-20	HA-5-6'	Total/NA	Solid	2540B	
600-205421-21	HA-6-0"-6"	Total/NA	Solid	2540B	
600-205421-22	HA-6-2'	Total/NA	Solid	2540B	
600-205421-23	HA-6-4'	Total/NA	Solid	2540B	
600-205421-24	HA-6-6'	Total/NA	Solid	2540B	
600-205421-25	HA-7-0"-6"	Total/NA	Solid	2540B	
600-205421-26	HA-7-2'	Total/NA	Solid	2540B	
600-205421-27	HA-7-4'	Total/NA	Solid	2540B	
600-205421-28	HA-7-6'	Total/NA	Solid	2540B	
600-205421-29	HA-8-0"-6"	Total/NA	Solid	2540B	
600-205421-30	HA-8-2'	Total/NA	Solid	2540B	

Eurofins TestAmerica, Houston

QC Association Summary

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

General Chemistry (Continued)

Analysis Batch: 294990 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
600-205421-31	HA-8-4'	Total/NA	Solid	2540B	
600-205421-32	HA-8-6'	Total/NA	Solid	2540B	
600-205421-33	HA-9-0"-6"	Total/NA	Solid	2540B	
600-205421-34	HA-9-2'	Total/NA	Solid	2540B	
600-205421-35	HA-9-4'	Total/NA	Solid	2540B	
600-205421-36	HA-9-6'	Total/NA	Solid	2540B	
600-205421-37	HA-10-0"-6"	Total/NA	Solid	2540B	
600-205421-38	HA-10-2'	Total/NA	Solid	2540B	
600-205421-39	HA-10-4'	Total/NA	Solid	2540B	
600-205421-40	HA-10-6'	Total/NA	Solid	2540B	
600-205421-33 DU	HA-9-0"-6"	Total/NA	Solid	2540B	
600-205421-37 DU	HA-10-0"-6"	Total/NA	Solid	2540B	
600-205421-38 DU	HA-10-2'	Total/NA	Solid	2540B	

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Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-1-0"-6"

Lab Sample ID: 600-205421-1

Date Collected: 05/18/20 11:37

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-1-0"-6"

Lab Sample ID: 600-205421-1

Date Collected: 05/18/20 11:37

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 99.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 18:14	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 11:31	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 11:59	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 16:48	W1N	TAL HOU

Client Sample ID: HA-1-2'

Lab Sample ID: 600-205421-2

Date Collected: 05/18/20 11:40

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-1-2'

Lab Sample ID: 600-205421-2

Date Collected: 05/18/20 11:40

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 79.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 18:39	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 11:56	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/02/20 10:15	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 17:50	W1N	TAL HOU

Client Sample ID: HA-1-4'

Lab Sample ID: 600-205421-3

Date Collected: 05/18/20 11:50

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-1-4'

Date Collected: 05/18/20 11:50

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-3

Matrix: Solid

Percent Solids: 95.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			295188	05/26/20 17:13	DT1	TAL HOU
Total/NA	Analysis	8260C		1	295179	05/26/20 19:58	PXS	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 12:21	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 12:32	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 18:51	W1N	TAL HOU

Client Sample ID: HA-1-6'

Date Collected: 05/18/20 12:00

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-4

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-1-6'

Date Collected: 05/18/20 12:00

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-4

Matrix: Solid

Percent Solids: 89.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 19:29	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 12:45	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 13:05	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 19:11	W1N	TAL HOU

Client Sample ID: HA-2-0"-6"

Date Collected: 05/18/20 12:20

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-5

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-2-0"-6"

Date Collected: 05/18/20 12:20

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-5

Matrix: Solid

Percent Solids: 92.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 19:53	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 13:10	WS1	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-2-0"-6"

Lab Sample ID: 600-205421-5

Date Collected: 05/18/20 12:20

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 92.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 13:38	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 19:32	W1N	TAL HOU

Client Sample ID: HA-2-2'

Lab Sample ID: 600-205421-6

Date Collected: 05/18/20 12:25

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-2-2'

Lab Sample ID: 600-205421-6

Date Collected: 05/18/20 12:25

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 96.8

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 20:18	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 13:35	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 14:12	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 19:52	W1N	TAL HOU

Client Sample ID: HA-2-4'

Lab Sample ID: 600-205421-7

Date Collected: 05/18/20 12:30

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-2-4'

Lab Sample ID: 600-205421-7

Date Collected: 05/18/20 12:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 78.9

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 20:42	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 13:59	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 14:45	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 20:12	W1N	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-2-6'

Date Collected: 05/18/20 12:35

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-8

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-2-6'

Date Collected: 05/18/20 12:35

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-8

Matrix: Solid

Percent Solids: 82.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 21:07	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 14:24	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 15:20	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 20:33	W1N	TAL HOU

Client Sample ID: HA-3-0"-6"

Date Collected: 05/18/20 13:05

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-9

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-3-0"-6"

Date Collected: 05/18/20 13:05

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-9

Matrix: Solid

Percent Solids: 98.5

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 21:31	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 14:49	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 15:53	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 20:53	W1N	TAL HOU

Client Sample ID: HA-3-2'

Date Collected: 05/18/20 13:10

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-10

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-3-2'

Date Collected: 05/18/20 13:10

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-10

Matrix: Solid

Percent Solids: 83.9

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 21:55	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 15:14	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 17:00	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 21:14	W1N	TAL HOU

Client Sample ID: HA-3-4'

Date Collected: 05/18/20 13:15

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-11

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-3-4'

Date Collected: 05/18/20 13:15

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-11

Matrix: Solid

Percent Solids: 92.7

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 22:20	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 08:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 16:03	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 17:34	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 21:34	W1N	TAL HOU

Client Sample ID: HA-3-6'

Date Collected: 05/18/20 13:18

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-12

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-3-6'

Date Collected: 05/18/20 13:18

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-12

Matrix: Solid

Percent Solids: 82.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 22:44	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 10:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 16:28	WS1	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-3-6'**Date Collected: 05/18/20 13:18****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-12****Matrix: Solid****Percent Solids: 82.3**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/02/20 10:48	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 23:16	W1N	TAL HOU

Client Sample ID: HA-4-0"-6"**Date Collected: 05/18/20 13:25****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-13****Matrix: Solid**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-4-0"-6"**Date Collected: 05/18/20 13:25****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-13****Matrix: Solid****Percent Solids: 77.6**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			295188	05/26/20 17:13	DT1	TAL HOU
Total/NA	Analysis	8260C		1	295179	05/26/20 20:22	PXS	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 10:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 16:53	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 18:07	RJV	TAL HOU
Total/NA	Prep	3546			296079	06/08/20 12:04	EAT	TAL HOU
Total/NA	Analysis	8015D		1	296177	06/09/20 15:51	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 23:37	W1N	TAL HOU

Client Sample ID: HA-4-2'**Date Collected: 05/18/20 13:30****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-14****Matrix: Solid**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-4-2'**Date Collected: 05/18/20 13:30****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-14****Matrix: Solid****Percent Solids: 96.3**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	294958	05/21/20 23:33	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 10:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 17:18	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 18:41	RJV	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-4-2'**Date Collected: 05/18/20 13:30****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-14****Matrix: Solid****Percent Solids: 96.3**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/29/20 23:57	W1N	TAL HOU

Client Sample ID: HA-4-4'**Date Collected: 05/18/20 13:35****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-15****Matrix: Solid**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-4-4'**Date Collected: 05/18/20 13:35****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-15****Matrix: Solid****Percent Solids: 82.3**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			295261	05/27/20 12:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295244	05/27/20 14:00	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 10:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 17:43	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 19:14	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 00:17	W1N	TAL HOU

Client Sample ID: HA-4-6'**Date Collected: 05/18/20 13:40****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-16****Matrix: Solid**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-4-6'**Date Collected: 05/18/20 13:40****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-16****Matrix: Solid****Percent Solids: 84.4**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			295188	05/26/20 17:13	DT1	TAL HOU
Total/NA	Analysis	8260C		1	295179	05/26/20 21:10	PXS	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 10:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 18:07	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 19:48	RJV	TAL HOU
Soluble	Leach	DI Leach			295324	05/28/20 09:56	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 00:38	W1N	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-5-0"-6"

Lab Sample ID: 600-205421-17

Date Collected: 05/18/20 15:00

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-5-0"-6"

Lab Sample ID: 600-205421-17

Date Collected: 05/18/20 15:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 77.9

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			295188	05/26/20 17:13	DT1	TAL HOU
Total/NA	Analysis	8260C		1	295179	05/26/20 21:34	PXS	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 10:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 18:32	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 20:21	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 00:58	W1N	TAL HOU

Client Sample ID: HA-5-2'

Lab Sample ID: 600-205421-18

Date Collected: 05/18/20 15:10

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-5-2'

Lab Sample ID: 600-205421-18

Date Collected: 05/18/20 15:10

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 97.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 14:39	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 10:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 18:57	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:47	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 20:55	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 01:19	W1N	TAL HOU

Client Sample ID: HA-5-4'

Lab Sample ID: 600-205421-19

Date Collected: 05/18/20 15:20

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-5-4'**Date Collected: 05/18/20 15:20****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-19****Matrix: Solid****Percent Solids: 97.0**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 15:04	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 10:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 19:21	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:51	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 21:28	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 01:39	W1N	TAL HOU

Client Sample ID: HA-5-6'**Date Collected: 05/18/20 15:30****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-20****Matrix: Solid**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-5-6'**Date Collected: 05/18/20 15:30****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-20****Matrix: Solid****Percent Solids: 82.2**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294982	05/21/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 15:30	KLV	TAL HOU
Total/NA	Prep	5030C			294947	05/21/20 10:23	WS1	TAL HOU
Total/NA	Analysis	8015D		1	294923	05/21/20 19:46	WS1	TAL HOU
Total/NA	Prep	3546			295345	05/28/20 10:51	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295528	06/01/20 22:01	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 01:59	W1N	TAL HOU

Client Sample ID: HA-6-0"-6"**Date Collected: 05/19/20 09:15****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-21****Matrix: Solid**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-6-0"-6"**Date Collected: 05/19/20 09:15****Date Received: 05/20/20 10:30****Lab Sample ID: 600-205421-21****Matrix: Solid****Percent Solids: 75.7**

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 15:55	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 10:16	WS1	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-6-0"-6"

Lab Sample ID: 600-205421-21

Date Collected: 05/19/20 09:15

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 75.7

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 16:41	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 03:42	W1N	TAL HOU

Client Sample ID: HA-6-2'

Lab Sample ID: 600-205421-22

Date Collected: 05/19/20 09:30

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-6-2'

Lab Sample ID: 600-205421-22

Date Collected: 05/19/20 09:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 92.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 16:20	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 10:40	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 17:14	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 04:43	W1N	TAL HOU

Client Sample ID: HA-6-4'

Lab Sample ID: 600-205421-23

Date Collected: 05/19/20 09:45

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-6-4'

Lab Sample ID: 600-205421-23

Date Collected: 05/19/20 09:45

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 87.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 16:45	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 11:05	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 17:48	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 05:03	W1N	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-6-6'

Date Collected: 05/19/20 10:00

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-24

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-6-6'

Date Collected: 05/19/20 10:00

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-24

Matrix: Solid

Percent Solids: 84.4

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 17:11	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 11:30	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 18:21	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		5	295445	05/30/20 05:24	W1N	TAL HOU

Client Sample ID: HA-7-0"-6"

Date Collected: 05/19/20 10:15

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-25

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-7-0"-6"

Date Collected: 05/19/20 10:15

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-25

Matrix: Solid

Percent Solids: 66.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 17:36	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 11:54	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 18:55	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 13:44	W1N	TAL HOU

Client Sample ID: HA-7-2'

Date Collected: 05/19/20 10:30

Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-26

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-7-2'

Lab Sample ID: 600-205421-26

Date Collected: 05/19/20 10:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 79.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 18:01	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 12:19	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 19:29	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 14:45	W1N	TAL HOU

Client Sample ID: HA-7-4'

Lab Sample ID: 600-205421-27

Date Collected: 05/19/20 10:45

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-7-4'

Lab Sample ID: 600-205421-27

Date Collected: 05/19/20 10:45

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 78.9

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 18:26	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 12:44	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 20:02	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 15:06	W1N	TAL HOU

Client Sample ID: HA-7-6'

Lab Sample ID: 600-205421-28

Date Collected: 05/19/20 11:00

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-7-6'

Lab Sample ID: 600-205421-28

Date Collected: 05/19/20 11:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 78.8

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 18:51	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 13:09	WS1	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-7-6'

Lab Sample ID: 600-205421-28

Date Collected: 05/19/20 11:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 78.8

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 20:35	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 15:26	W1N	TAL HOU

Client Sample ID: HA-8-0"-6"

Lab Sample ID: 600-205421-29

Date Collected: 05/19/20 11:15

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-8-0"-6"

Lab Sample ID: 600-205421-29

Date Collected: 05/19/20 11:15

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 79.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 19:16	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 13:33	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 21:42	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 15:47	W1N	TAL HOU

Client Sample ID: HA-8-2'

Lab Sample ID: 600-205421-30

Date Collected: 05/19/20 11:30

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-8-2'

Lab Sample ID: 600-205421-30

Date Collected: 05/19/20 11:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 97.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 19:41	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 13:58	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 22:15	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 16:07	W1N	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-8-4'
Date Collected: 05/19/20 11:45
Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-31
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-8-4'
Date Collected: 05/19/20 11:45
Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-31
Matrix: Solid
Percent Solids: 79.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 20:06	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 14:48	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 22:48	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 17:08	W1N	TAL HOU

Client Sample ID: HA-8-6'
Date Collected: 05/19/20 12:00
Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-32
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-8-6'
Date Collected: 05/19/20 12:00
Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-32
Matrix: Solid
Percent Solids: 79.6

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 20:31	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 15:13	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 23:21	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 17:29	W1N	TAL HOU

Client Sample ID: HA-9-0"-6"
Date Collected: 05/19/20 12:30
Date Received: 05/20/20 10:30

Lab Sample ID: 600-205421-33
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-9-0"-6"

Lab Sample ID: 600-205421-33

Date Collected: 05/19/20 12:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 99.8

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 20:55	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 15:38	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 15:32	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/03/20 05:25	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 17:49	W1N	TAL HOU

Client Sample ID: HA-9-2'

Lab Sample ID: 600-205421-34

Date Collected: 05/19/20 12:45

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-9-2'

Lab Sample ID: 600-205421-34

Date Collected: 05/19/20 12:45

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 96.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 21:20	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 16:03	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/02/20 23:54	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 18:09	W1N	TAL HOU

Client Sample ID: HA-9-4'

Lab Sample ID: 600-205421-35

Date Collected: 05/19/20 13:00

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-9-4'

Lab Sample ID: 600-205421-35

Date Collected: 05/19/20 13:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 94.7

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 21:44	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 16:28	WS1	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-9-4'

Lab Sample ID: 600-205421-35

Date Collected: 05/19/20 13:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 94.7

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/03/20 00:27	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 18:30	W1N	TAL HOU

Client Sample ID: HA-9-6'

Lab Sample ID: 600-205421-36

Date Collected: 05/19/20 13:15

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-9-6'

Lab Sample ID: 600-205421-36

Date Collected: 05/19/20 13:15

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 88.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295041	05/22/20 22:09	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 16:52	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/03/20 01:00	RJV	TAL HOU
Soluble	Leach	DI Leach			295363	05/28/20 11:52	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 19:31	W1N	TAL HOU

Client Sample ID: HA-10-0"-6"

Lab Sample ID: 600-205421-37

Date Collected: 05/19/20 13:45

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-10-0"-6"

Lab Sample ID: 600-205421-37

Date Collected: 05/19/20 13:45

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 98.4

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			295279	05/27/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295244	05/27/20 14:49	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 17:17	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/03/20 01:33	RJV	TAL HOU
Soluble	Leach	DI Leach			295364	05/28/20 11:55	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 21:13	W1N	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-10-2'

Lab Sample ID: 600-205421-38

Date Collected: 05/19/20 14:00

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-10-2'

Lab Sample ID: 600-205421-38

Date Collected: 05/19/20 14:00

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 79.2

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295179	05/26/20 18:45	PXS	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 17:42	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/03/20 02:06	RJV	TAL HOU
Soluble	Leach	DI Leach			295364	05/28/20 11:55	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 21:34	W1N	TAL HOU

Client Sample ID: HA-10-4'

Lab Sample ID: 600-205421-39

Date Collected: 05/19/20 14:15

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Client Sample ID: HA-10-4'

Lab Sample ID: 600-205421-39

Date Collected: 05/19/20 14:15

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 86.4

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			294984	05/21/20 15:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295179	05/26/20 19:10	PXS	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 18:07	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:26	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/03/20 02:40	RJV	TAL HOU
Soluble	Leach	DI Leach			295364	05/28/20 11:55	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 21:54	W1N	TAL HOU

Client Sample ID: HA-10-6'

Lab Sample ID: 600-205421-40

Date Collected: 05/19/20 14:30

Matrix: Solid

Date Received: 05/20/20 10:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	2540B		1	294990	05/21/20 15:17	AAZ	TAL HOU

Eurofins TestAmerica, Houston

Lab Chronicle

Client: ARCADIS U.S., Inc.
 Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Client Sample ID: HA-10-6'

Lab Sample ID: 600-205421-40

Date Collected: 05/19/20 14:30

Matrix: Solid

Date Received: 05/20/20 10:30

Percent Solids: 80.7

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5030C			295279	05/27/20 14:00	KLV	TAL HOU
Total/NA	Analysis	8260C		1	295244	05/27/20 15:14	KLV	TAL HOU
Total/NA	Prep	5030C			295026	05/22/20 08:55	WS1	TAL HOU
Total/NA	Analysis	8015D		1	295009	05/22/20 18:32	WS1	TAL HOU
Total/NA	Prep	3546			295529	06/01/20 08:30	SMB	TAL HOU
Total/NA	Analysis	8015D		1	295671	06/03/20 03:46	RJV	TAL HOU
Soluble	Leach	DI Leach			295364	05/28/20 11:55	AAZ	TAL HOU
Soluble	Analysis	300.0		1	295616	06/02/20 22:14	W1N	TAL HOU

Laboratory References:

TAL HOU = Eurofins TestAmerica, Houston, 6310 Rothway Street, Houston, TX 77040, TEL (713)690-4444



Accreditation/Certification Summary

Client: ARCADIS U.S., Inc.
Project/Site: Chevron-Warren Field Water Transfer Line

Job ID: 600-205421-1

Laboratory: Eurofins TestAmerica, Houston

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Program	Identification Number	Expiration Date
Texas	NELAP	T104704223-19-25	10-31-20

The following analytes are included in this report, but the laboratory is not certified by the governing authority. This list may include analytes for which the agency does not offer certification.

Analysis Method	Prep Method	Matrix	Analyte
2540B		Solid	Percent Moisture
2540B		Solid	Percent Solids
8015D	3546	Solid	Oil Range Organics (C28-C36)

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

Client Information		Sampler: <i>Lsh/Mkn</i>		Lab PM: Kudchadkar, Sachin G		Carrier Tracking No(s):		COC No: 600-76877-20665.1	
Client Contact: Sarah Johnson		Phone: <i>432-227-9547</i>		E-Mail: sachin.kudchadkar@testamericainc.com				Page: <i>1 of 4</i>	
Company: ARCADIS U.S., Inc.				Analysis Requested				Job #:	
Address: 1004 North Big Spring Suite 121		Due Date Requested:		Field Filtered Sample (Yes or No)		801SD_DRO - (MOD) Diesel Range Organics 801SD_GRO, 9999C		Total Number of Analyses	
City: Midland		TAT Requested (days):							
State, Zip: TX, 79701									
Phone: 432-227-0266(Tel)		PO #: 30052243/ 20200505							
Email: sarah.johnson@arcadis.com		WO #:							
Project Name: Chevron-Warren Field Water Transfer Line		Project #: 60012315						Preservation Codes:	
Site		SSOW#:						A - HCL M - Hexane B - NaOH N - None C - Zn Acetate O - AsNaO2 D - Nitric Acid P - Na2O4S E - NaHSO4 Q - Na2SO3 F - MeOH R - Na2S2O3 G - Amchlor S - H2SO4 H - Ascorbic Acid T - TSP Dodecahydrate I - Ice U - Acetone J - DI Water V - MCAA K - EDTA W - pH 4-5 L - EDA Z - other (specify)	
Sample Identification		Sample Date		Sample Time		Sample Type (W=water, S=solid, G=grab)		Matrix (W=water, S=solid, O=waste/oi, BT=Tissue, A=Air)	
						Preservation Code		Special Instructions/Note:	
<i>HA-1-0"-6"</i>		<i>5-18-20</i>		<i>1137</i>		<i>6</i>		<i>Solid</i>	
<i>HA-1-2"</i>				<i>1146</i>				<i>Solid</i>	
<i>HA-1-4"</i>				<i>1150</i>				<i>Solid</i>	
<i>HA-1-6"</i>				<i>1200</i>				<i>Solid</i>	
<i>HA-2-0"-6"</i>				<i>1220</i>				<i>Solid</i>	
<i>HA-2-2"</i>				<i>1225</i>				<i>Solid</i>	
<i>HA-2-4"</i>				<i>1230</i>				<i>Solid</i>	
<i>HA-2-6"</i>				<i>1235</i>				<i>Solid</i>	
<i>HA-2-0"-6"</i>				<i>1305</i>				<i>Solid</i>	
<i>HA-3-2"</i>				<i>1340</i>				<i>Solid</i>	
<i>HA-3-4"</i>				<i>135</i>				<i>Solid</i>	
Possible Hazard Identification					Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)				
<input type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological					<input type="checkbox"/> Return To Client <input type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months				
Deliverable Requested: I, II, III, IV, Other (specify)					Special Instructions/QC Requirements:				
Empty Kit Relinquished by:		Date:		Time:		Method of Shipment:			
Relinquished by: <i>[Signature]</i>		Date/Time: <i>5-19-20 1625</i>		Company: <i>Arcadis</i>		Received by: <i>[Signature]</i>		Date/Time: <i>5-19-20 1629</i>	
Relinquished by: <i>[Signature]</i>		Date/Time: <i>5-19-20 1629</i>		Company:		Received by: <i>[Signature]</i>		Date/Time: <i>5/20/20 1030</i>	
Relinquished by: <i>[Signature]</i>		Date/Time:		Company:		Received by: <i>[Signature]</i>		Date/Time:	
Custody Seals Intact <input type="checkbox"/> Yes <input type="checkbox"/> No		Custody Seal No		Cooler Temperature, °C and Other Remarks					



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Received by OCD: 7/30/2020 7:00:18 AM

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EUROFINS TestAmerica, Houston
6310 Rothway Street
Houston, TX 77040
Phone (713) 690-4444 Fax (713) 690-5646

Midland #264

Chain of Custody Record

Midland #264

eurolfins
Environmental Testing
America

Client Information		Sampler: <i>Sachin G</i>		Lab PM: Kudchadkar, Sachin G		Carrier Tracking No(s):		COC No: 600-76877-20665.1	
Client Contact: Sarah Johnson		Phone: 432-227-0266		E-Mail: sachin.kudchadkar@testamericainc.com				Page: 1 of 4	
Company: ARCADIS U.S., Inc.		Address: 1004 North Big Spring Suite 121		City: Midland		State, Zip: TX, 79701		Due Date Requested:	
Phone: 432-227-0266(Tel)		PO #: 30052243/ 20200505		WO #:		Project #: 60012315		SSOW#:	
Email: sarah.johnson@arcadis.com		Project Name: Chevron-Warren Field Water Transfer Line		Site:					
								Analysis Requested	
								Preservation Codes:	
								A - HCL B - NaOH C - Zn Acetate D - Nitric Acid E - NaHSO4 F - MeOH G - Amchlor H - Ascorbic Acid I - Ice J - DI Water K - EDTA L - EDA	
								M - Hexane N - None O - AsNaO2 P - Na2O4S Q - Na2SO3 R - Na2S2O3 S - H2SO4 T - TSP Dodecahydrate U - Acetone V - MCAA W - pH 4-5 Z - other (specify)	
								Other:	
								Special Instructions/Note:	
Sample Identification		Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	801SD_DRO - (MOD) Diesel Range Organics	801SD_GRO, 8000C	Total Number of Containers
				Preservation Code					
HA-1-0"-6"		5-18-20	1137	6	Solid		X	X	X
HA-1-2"			1140		Solid				
HA-1-4"			1150		Solid				
HA-1-6"			1200		Solid				
HA-2-0"-6"			1220		Solid				
HA-2-2"			1225		Solid				
HA-2-4"			1230		Solid				
HA-2-6"			1235		Solid				
HA-3-0"-6"			1305		Solid				
HA-3-2"			1340		Solid				
HA-3-4"			1345		Solid				
Possible Hazard Identification		<input type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological		Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)					
Deliverable Requested: I, II, III, IV, Other (specify)				<input type="checkbox"/> Return To Client <input type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months					
Empty Kit Relinquished by:		Date:		Time:		Method of Shipment:			
Relinquished by: <i>[Signature]</i>		Date/Time: 5/19/20 1625		Company: Arcadis		Received by: <i>[Signature]</i>		Date/Time: 5-19-20 1629	
Relinquished by: <i>[Signature]</i>		Date/Time: 5-19-20 1629		Company:		Received by: <i>[Signature]</i>		Date/Time: 5/20/20 1030	
Relinquished by: <i>[Signature]</i>		Date/Time:		Company:		Received by:		Date/Time:	
Custody Seals Intact <input type="checkbox"/> Yes <input type="checkbox"/> No		Custody Seal No		Cooler Temperature, °C and Other Remarks					



Eurolins TestAmerica, Houston
6310 Rothway Street
Houston, TX 77040
Phone (713) 690-4444 Fax (713) 690-5646

Midland #264 Chain of Custody Record

Midland #264



Contractual Testing
America

Client Information		Sampler: <i>Justin Nixon</i>		Lab PM: Kudchadkar, Sachin G		Carrier Tracking No(s):		COC No: 600-76877-20665.1																																																												
Client Contact: Sarah Johnson		Phone:		E-Mail: sachin.kudchadkar@testamericainc.com				Page: <i>2 of 4</i>																																																												
Company: ARCADIS U.S., Inc.					Analysis Requested					Job #:																																																										
Address: 1004 North Big Spring Suite 121			Due Date Requested:		<table border="1"> <tr><td colspan="5">Field Site Rec. Sample (Res. or. Ho)</td></tr> <tr><td colspan="5">801SD_DRO - (MOD) Diesel Range Organics</td></tr> <tr><td colspan="5">801SD_GRO_6990C</td></tr> <tr><td colspan="5">C⁻ 3000</td></tr> <tr><td colspan="5">BTEX 80218</td></tr> </table>					Field Site Rec. Sample (Res. or. Ho)					801SD_DRO - (MOD) Diesel Range Organics					801SD_GRO_6990C					C ⁻ 3000					BTEX 80218					<table border="0"> <tr><td>A - HCL</td><td>M - Hexane</td></tr> <tr><td>B - NaOH</td><td>N - None</td></tr> <tr><td>C - Zn Acetate</td><td>O - AsNaO2</td></tr> <tr><td>D - Nitric Acid</td><td>P - Na2O4S</td></tr> <tr><td>E - NaHSO4</td><td>Q - Na2SO3</td></tr> <tr><td>F - MeOH</td><td>R - Na2S2O3</td></tr> <tr><td>G - Amchlor</td><td>S - H2SO4</td></tr> <tr><td>H - Ascorbic Acid</td><td>T - TSP Dodecahydrate</td></tr> <tr><td>I - Ice</td><td>U - Acetone</td></tr> <tr><td>J - DI Water</td><td>V - MCAA</td></tr> <tr><td>K - EDTA</td><td>W - pH 4-5</td></tr> <tr><td>L - EDA</td><td>Z - other (specify)</td></tr> </table>					A - HCL	M - Hexane	B - NaOH	N - None	C - Zn Acetate	O - AsNaO2	D - Nitric Acid	P - Na2O4S	E - NaHSO4	Q - Na2SO3	F - MeOH	R - Na2S2O3	G - Amchlor	S - H2SO4	H - Ascorbic Acid	T - TSP Dodecahydrate	I - Ice	U - Acetone	J - DI Water	V - MCAA	K - EDTA	W - pH 4-5	L - EDA	Z - other (specify)	Preservation Codes: Other:				
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City: Midland			TAT Requested (days):																																																																	
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Phone: 432-227-0266(Tel)			PO #: 30052243/ 20200505																																																																	
Email: sarah.johnson@arcadis.com			WO #:																																																																	
Project Name: Chevron-Warren Field Water Transfer Line			Project #: 60012315																																																																	
Site:			SSOW#:																																																																	
Sample Identification		Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)					Special Instructions/Note:																																																										
				Preservation Code		X	X	X																																																												
<i>HA-3-6^c</i>		<i>5-18-20</i>	<i>1318</i>	<i>G</i>	<i>Solid</i>																																																															
<i>HA-4-0^c-b^c</i>			<i>1325</i>		<i>Solid</i>																																																															
<i>HA-4-2^c</i>			<i>1330</i>		<i>Solid</i>																																																															
<i>HA-4-4^c</i>			<i>1335</i>		<i>Solid</i>																																																															
<i>HA-4-6^c</i>			<i>1340</i>		<i>Solid</i>																																																															
<i>HA-5-0^c-b^c</i>			<i>1500</i>		<i>Solid</i>																																																															
<i>HA-5-2^c</i>			<i>1510</i>		<i>Solid</i>																																																															
<i>HA-5-4^c</i>			<i>1520</i>		<i>Solid</i>																																																															
<i>HA-5-6^c</i>		<i>5-18-20</i>	<i>1530</i>		<i>Solid</i>																																																															
<i>HA-6-0^c-b^c</i>		<i>5-19-20</i>	<i>915</i>		<i>Solid</i>																																																															
<i>HA-6-2^c</i>		<i>5-19-20</i>	<i>930</i>		<i>Solid</i>																																																															
Possible Hazard Identification						Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)																																																														
<input type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological						<input type="checkbox"/> Return To Client <input type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months																																																														
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Empty Kit Relinquished by:		Date:		Time:		Method of Shipment																																																														
Relinquished by: <i>[Signature]</i>		Date/Time: <i>5-19-20 1625</i>		Company: <i>Arcadis</i>		Received by: <i>[Signature]</i>		Date/Time: <i>5-19-20 1621</i>		Company:																																																										
Relinquished by: <i>[Signature]</i>		Date/Time: <i>5-19-20 1620</i>		Company:		Received by: <i>[Signature]</i>		Date/Time: <i>5/20/20 1030</i>		Company: <i>ETA</i>																																																										
Relinquished by: <i>[Signature]</i>		Date/Time:		Company:		Received by:		Date/Time:		Company:																																																										
Custody Seals Intact		Custody Seal No		Cooler Temperature(s) °C and Other Remarks																																																																
<input type="checkbox"/> Yes <input type="checkbox"/> No																																																																				



Client Information		Sampler: <i>Justin Nixon</i>	Lab PM: Kudchadkar, Sachin G	Carrier Tracking No(s):	COC No: 600-76877-20665.1							
Client Contact: Sarah Johnson		Phone: 432-227-9517	E-Mail: sachin.kudchadkar@testamericainc.com		Page: 3 of 4							
Company: ARCADIS U.S., Inc.		Analysis Requested			Job #:							
Address: 1004 North Big Spring Suite 121		Due Date Requested:			Preservation Codes: A - HCL M - Hexane B - NaOH N - None C - Zn Acetate O - AsNaO2 D - Nitric Acid P - Na2O4S E - NaHSO4 Q - Na2SO3 F - MeOH R - Na2S2O3 G - Amchlor S - H2SO4 H - Ascorbic Acid T - TSP Dodecahydrate I - Ice U - Acetone J - DI Water V - MCAA K - EDTA W - pH 4-5 L - EDA Z - other (specify)							
City: Midland		TAT Requested (days):										
State, Zip: TX, 79701		PO #: 30052243/ 20200505										
Phone: 432-227-0266(Tel)		WO #:										
Email: sarah.johnson@arcadis.com		Project #: 60012315										
Project Name: Chevron-Warren Field Water Transfer Line		SSOW#:			Other:							
Site:												
Sample Identification		Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	8015D_DRO - (MOD) Diesel Range Organics	8015D_GRO, 80000	CI-3000	BTEX 8021B	Total Number of Containers	Special Instructions/Note:
				Preservation Code			X	X	X	Y	2	
<i>HA-6-4'</i>		<i>5-19-20</i>	<i>0945</i>	<i>G</i>	<i>Solid</i>							
<i>HA-6-6'</i>			<i>1000</i>		<i>Solid</i>							
<i>HA-7-0"-6"</i>			<i>1015</i>		<i>Solid</i>							
<i>HA-7-2'</i>			<i>1030</i>		<i>Solid</i>							
<i>HA-7-4'</i>			<i>1045</i>		<i>Solid</i>							
<i>HA-7-6'</i>			<i>1100</i>		<i>Solid</i>							
<i>HA-8-0"-6"</i>			<i>1115</i>		<i>Solid</i>							
<i>HA-8-2'</i>			<i>1130</i>		<i>Solid</i>							
<i>HA-8-4'</i>			<i>1145</i>		<i>Solid</i>							
<i>HA-8-6'</i>			<i>1200</i>		<i>Solid</i>							
<i>HA-9-0"-6"</i>			<i>1230</i>		<i>Solid</i>							
Possible Hazard Identification						Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)						
<input type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological						<input type="checkbox"/> Return To Client <input type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months						
Deliverable Requested: I, II, III, IV, Other (specify)						Special Instructions/QC Requirements:						
Empty Kit Relinquished by:		Date:		Time:		Method of Shipment:						
<i>[Signature]</i>		<i>5-19-20 1625</i>		<i>ARCADIS</i>		<i>[Signature]</i>		<i>5-19-20 1629</i>		<i>[Signature]</i>		
<i>[Signature]</i>		<i>5-19-20 1627</i>		Company:		<i>[Signature]</i>		<i>5/20/20 1030</i>		<i>ETA</i>		
<i>[Signature]</i>		Date/Time:		Company:		<i>[Signature]</i>		Date/Time:		Company:		
Custody Seals Intact		Custody Seal No		Cooler Temperature(s), °C and Other Remarks								
<input type="checkbox"/> Yes <input type="checkbox"/> No												

EUROFINS TestAmerica, Houston
6310 Rothway Street
Houston, TX 77040
Phone (713) 690-4444 Fax (713) 690-5646

Midland Chain of Custody Record #264

INITIAL ID #264



Client Information		Sampler: <i>Kudchadkar</i>		Lab PM: Kudchadkar, Sachin G		Carrier Tracking No(s):		COC No: 600-76877-20665.1			
Client Contact: Sarah Johnson		Phone: 432-226-9544		E-Mail: sachin.kudchadkar@testamericainc.com				Page: 4 of 4			
Company: ARCADIS U.S., Inc.				Analysis Requested				Job #:			
Address: 1004 North Big Spring Suite 121		Due Date Requested:		Field Identified Sample (Yes or No) 8015D_DRO - (MOD) Diesel Range Organics 8015D_GRO, 8299C CI-3200 BTEX 8021B				Preservation Codes:			
City: Midland		TAT Requested (days):						A - HCL		M - Hexane	
State, Zip: TX, 79701		PO #: 30052243/ 20200505						B - NaOH		N - None	
Phone: 432-227-0266(Tel)		WO #:						C - Zn Acetate		O - AsNaO2	
Email: sarah.johnson@arcadis.com		Project #: 60012315						D - Nitric Acid		P - Na2O4S	
Project Name: Chevron-Warren Field Water Transfer Line		SSOW#:						E - NaHSO4		Q - Na2SO3	
Site:				F - MeOH		R - Na2S2O3					
				G - Amchlor		S - H2SO4					
				H - Ascorbic Acid		T - TSP Dodecahydrate					
				I - Ice		U - Acetone					
				J - DI Water		V - MCAA					
				K - EDTA		W - pH 4-5					
				L - EDA		Z - other (specify)					
						Other:					
Sample Identification								Special Instructions/Note:			
		Sample Date		Sample Time		Sample Type (C=Comp, G=grab)		Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)			
								Preservation Code			
								N H			
HA-9-2'		5-19-20		1245		G		Solid			
HA-9-4'		↓		1300		↓		Solid			
HA-9-6'		↓		1345		↓		Solid			
HA-10-0' b'		↓		1345		↓		Solid			
HA-10-2'		↓		1400		↓		Solid			
HA-10-4'		↓		1415		↓		Solid			
HA-10-6'		↓		1428		↓		Solid			
								Solid			
								Solid			
								Solid			
								Solid			
Possible Hazard Identification				Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)							
<input type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological				<input type="checkbox"/> Return To Client <input type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months							
Deliverable Requested: I, II, III, IV, Other (specify)				Special Instructions/QC Requirements:							
Empty Kit Relinquished by:		Date:		Time:		Method of Shipment:					
Relinquished by: <i>[Signature]</i>		Date/Time: 5-19-20 1625		Company: Arcadis		Received by: <i>[Signature]</i>		Date/Time: 5-19-20 1629			
Relinquished by: <i>[Signature]</i>		Date/Time: 5-19-20 1629		Company:		Received by: <i>[Signature]</i>		Date/Time: 5/20/20 1030			
Relinquished by: <i>[Signature]</i>		Date/Time:		Company:		Received by:		Date/Time:			
Custody Seals Intact		Custody Seal No		Cooler Temperature, °C and Other Remarks							
△ Yes △ No											

Loc: 600
205421



Environment Testing
TestAmerica

Eurofins TestAmerica Houston

Sample Receipt Checklist

20 MAY 20 10:50

Date/Time Received: _____
 JOB NUMBER: _____ CLIENT: Arcadis
 UNPACKED BY: ff CARRIER/DRIVER: Fedex

Custody Seal Present: YES NO Number of Coolers Received: 2

Cooler ID	Temp Blank	Trip Blank	Observed Temp (°C)	Therm ID	Therm CF	Corrected Temp (°C)
<u>2575</u>	<u>Y / N</u>	<u>Y / N</u>	<u>4.8</u>	<u>678</u>	<u>-0.1</u>	<u>4.7</u>
<u>2472</u>	<u>Y / N</u>	<u>Y / N</u>	<u>3.9</u>			<u>3.8</u>
	<u>Y / N</u>	<u>Y / N</u>				
	<u>Y / N</u>	<u>Y / N</u>				
	<u>Y / N</u>	<u>Y / N</u>				
	<u>Y / N</u>	<u>Y / N</u>				

CF = correction factor

Samples received on ice? YES NO

LABORATORY PRESERVATION OF SAMPLES REQUIRED: NO YES

Base samples are >pH 12: YES NO Acid preserved are <pH 2: YES NO

TX1005 samples frozen upon receipt: YES DATE & TIME PUT IN FREEZER: _____

pH paper Lot # _____ VOA headspace acceptable (5-6mm): YES NO NA

Did samples meet the laboratory's standard conditions of sample acceptability upon receipt? YES NO

COMMENTS:

Login Sample Receipt Checklist

Client: ARCADIS U.S., Inc.

Job Number: 600-205421-1

Login Number: 205421**List Source: Eurofins TestAmerica, Houston****List Number: 1****Creator: Rubio, Yuri**

Question	Answer	Comment
Radioactivity wasn't checked or is \leq background as measured by a survey meter.	N/A	Lab does not accept radioactive samples.
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	4.7,3.8
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	Check done at department level as required.

APPENDIX D

Photograph Log



Warren Field Water Transfer Line – 1RP-2870



Photo 1. Release area facing north.



Photo 2. Release area facing northwest.

Warren Field Water Transfer Line – 1RP-2870



Photo 3. Release area facing transfer line.



Photo 4. Release area facing west.

APPENDIX E

Final C-141



District I
1625 N. French Dr., Hobbs, NM 88240
District II
811 S. First St., Artesia, NM 88210
District III
1000 Rio Brazos Road, Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy Minerals and Natural
Resources Department

Oil Conservation Division
1220 South St. Francis Dr.
Santa Fe, NM 87505

Form C-141
Revised August 24, 2018
Submit to appropriate OCD District office

Incident ID	
District RP	1RP-2870
Facility ID	30-025-34104
Application ID	pGRL1232157231

Release Notification

Responsible Party

Responsible Party: Chevron USA Inc.	OGRID
Contact Name: Adriane Gifford	Contact Telephone: 832-854-5620
Contact email: agifford@chevron.com	Incident # nJXK1534428787
Contact mailing address: 1500 Louisiana Street Houston, Texas 77002	

Location of Release Source

Latitude 32°32'37.12" N Longitude 103°05'41.80" W
(NAD 83 in decimal degrees to 5 decimal places)

Site Name: Warren Field Water Transfer Line	Site Type: Water Transfer Line
Date Release Discovered: 10/28/2012	API# 30-025-34104

Unit Letter	Section	Township	Range	County
I	25	20S	38E	Lea

Surface Owner: State Federal Tribal Private (Name: MC CASLAND LTD PARTNERSHIP)

Nature and Volume of Release

Material(s) Released (Select all that apply and attach calculations or specific justification for the volumes provided below)

<input type="checkbox"/> Crude Oil	Volume Released (bbls)	Volume Recovered (bbls)
<input checked="" type="checkbox"/> Produced Water	Volume Released (bbls): 40	Volume Recovered (bbls): 0
	Is the concentration of dissolved chloride in the produced water >10,000 mg/l?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
<input type="checkbox"/> Condensate	Volume Released (bbls)	Volume Recovered (bbls)
<input type="checkbox"/> Natural Gas	Volume Released (Mcf)	Volume Recovered (Mcf)
<input type="checkbox"/> Other (describe)	Volume/Weight Released (provide units)	Volume/Weight Recovered (provide units)

Cause of Release: **Release was caused by corrosion of 2-inch nipple near the transition. Approximately 40 bbls of produced water was released with no recovery. An emergency response team arrived at the release area and began abatement of the impacted area.**

State of New Mexico
Oil Conservation Division

Page 2

Incident ID	
District RP	1RP-2870
Facility ID	30-025-34104
Application ID	pGRL1232157231

Was this a major release as defined by 19.15.29.7(A) NMAC? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	If YES, for what reason(s) does the responsible party consider this a major release? Release was greater than 25 barrels.
If YES, was immediate notice given to the OCD? By whom? To whom? When and by what means (phone, email, etc)? See Initial C-141 Form submitted 11/16/2012.	

Site Assessment/Characterization

This information must be provided to the appropriate district office no later than 90 days after the release discovery date.

What is the shallowest depth to groundwater beneath the area affected by the release?	<u>40</u> (ft bgs)
Did this release impact groundwater or surface water?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 300 feet of a continuously flowing watercourse or any other significant watercourse?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark)?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 300 feet of an occupied permanent residence, school, hospital, institution, or church?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 500 horizontal feet of a spring or a private domestic fresh water well used by less than five households for domestic or stock watering purposes?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 1000 feet of any other fresh water well or spring?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within incorporated municipal boundaries or within a defined municipal fresh water well field?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 300 feet of a wetland?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release overlying a subsurface mine?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release overlying an unstable area such as karst geology?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within a 100-year floodplain?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Did the release impact areas not on an exploration, development, production, or storage site?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

Attach a comprehensive report (electronic submittals in .pdf format are preferred) demonstrating the lateral and vertical extents of soil contamination associated with the release have been determined. Refer to 19.15.29.11 NMAC for specifics.

State of New Mexico
Oil Conservation Division

Incident ID	
District RP	1RP-2870
Facility ID	30-025-34104
Application ID	pGRL1232157231


Characterization Report Checklist: *Each of the following items must be included in the report.*

- Scaled site map showing impacted area, surface features, subsurface features, delineation points, and monitoring wells.
- Field data
- Data table of soil contaminant concentration data
- Depth to water determination
- Determination of water sources and significant watercourses within 1/2-mile of the lateral extents of the release
- Boring or excavation logs
- Photographs including date and GIS information
- Topographic/Aerial maps
- Laboratory data including chain of custody

If the site characterization report does not include completed efforts at remediation of the release, the report must include a proposed remediation plan. That plan must include the estimated volume of material to be remediated, the proposed remediation technique, proposed sampling plan and methods, anticipated timelines for beginning and completing the remediation. The closure criteria for a release are contained in Table 1 of 19.15.29.12 NMAC, however, use of the table is modified by site- and release-specific parameters.

I hereby certify that the information given above is true and complete to the best of my knowledge and understand that pursuant to OCD rules and regulations all operators are required to report and/or file certain release notifications and perform corrective actions for releases which may endanger public health or the environment. The acceptance of a C-141 report by the OCD does not relieve the operator of liability should their operations have failed to adequately investigate and remediate contamination that pose a threat to groundwater, surface water, human health or the environment. In addition, OCD acceptance of a C-141 report does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations.

Printed Name: Adriane Gifford Title: Environmental Project Manger

Signature:  Date: 07/29/2020

email: agifford@chevron.com Telephone: 832-854-5620

OCD Only

Received by: _____ Date: _____

State of New Mexico
Oil Conservation Division

Page 4

Incident ID	
District RP	1RP-2870
Facility ID	30-025-34104
Application ID	pGRL1232157231

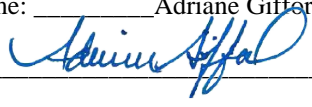
Closure

The responsible party must attach information demonstrating they have complied with all applicable closure requirements and any conditions or directives of the OCD. This demonstration should be in the form of a comprehensive report (electronic submittals in .pdf format are preferred) including a scaled site map, sampling diagrams, relevant field notes, photographs of any excavation prior to backfilling, laboratory data including chain of custody documents of final sampling, and a narrative of the remedial activities. Refer to 19.15.29.12 NMAC.

Closure Report Attachment Checklist: *Each of the following items must be included in the closure report.*

- A scaled site and sampling diagram as described in 19.15.29.11 NMAC
- Photographs of the remediated site prior to backfill or photos of the liner integrity if applicable (Note: appropriate OCD District office must be notified 2 days prior to liner inspection) – **Release area was excavated following the discovery of the release. Photolog documenting current site conditions is attached.**
- Laboratory analyses of final sampling (Note: appropriate ODC District office must be notified 2 days prior to final sampling)
- Description of remediation activities – **The impacted area was excavated by Chevron Operations immediately following discovery of the release.**

I hereby certify that the information given above is true and complete to the best of my knowledge and understand that pursuant to OCD rules and regulations all operators are required to report and/or file certain release notifications and perform corrective actions for releases which may endanger public health or the environment. The acceptance of a C-141 report by the OCD does not relieve the operator of liability should their operations have failed to adequately investigate and remediate contamination that pose a threat to groundwater, surface water, human health or the environment. In addition, OCD acceptance of a C-141 report does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations. The responsible party acknowledges they must substantially restore, reclaim, and re-vegetate the impacted surface area to the conditions that existed prior to the release or their final land use in accordance with 19.15.29.13 NMAC including notification to the OCD when reclamation and re-vegetation are complete.

Printed Name: _____ Adriane Gifford _____ Title: _____ Environmental Project Manager _____
 Signature:  _____ Date: 07/29/2020 _____
 email: _____ agifford@chevron.com _____ Telephone: _____ 832-854-5620 _____

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Closure approval by the OCD does not relieve the responsible party of liability should their operations have failed to adequately investigate and remediate contamination that poses a threat to groundwater, surface water, human health, or the environment nor does not relieve the responsible party of compliance with any other federal, state, or local laws and/or regulations.

Closure Approved by: Bradford Billings _____ Date: 07/28/2022 _____

Printed Name: _____ Title: _____



Arcadis U.S., Inc.

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www.arcadis.com

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District II
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 Phone:(575) 748-1283 Fax:(575) 748-9720
District III
 1000 Rio Brazos Rd., Aztec, NM 87410
 Phone:(505) 334-6178 Fax:(505) 334-6170
District IV
 1220 S. St Francis Dr., Santa Fe, NM 87505
 Phone:(505) 476-3470 Fax:(505) 476-3462

State of New Mexico
Energy, Minerals and Natural Resources
Oil Conservation Division
1220 S. St Francis Dr.
Santa Fe, NM 87505

COMMENTS
 Action 9451

COMMENTS

Operator: Arcadis U.S., Inc 630 Plaza Drive Highlands Ranch, CO 80129	OGRID: 329073
	Action Number: 9451
	Action Type: [C-141] Release Corrective Action (C-141)

COMMENTS

Created By	Comment	Comment Date
jharimon	Closure approved on 01/29/2021 by Bradford Billings.	7/28/2022

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CONDITIONS

Created By	Condition	Condition Date
jharimon	None	7/28/2022