

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	nAPP2128551283
District RP	
Facility ID	
Application ID	

Release Notification

Responsible Party

Responsible Party Plains Pipeline, L.P.	OGRID 713291
Contact Name Amber Groves	Contact Telephone 575-200-5517
Contact email algroves@paalp.com	Incident # (assigned by OCD)
Contact mailing address 3112 W. US Hwy 82, Lovington, NM 88260	

Location of Release Source

Latitude 32.06135

Longitude -103.737193

(NAD 83 in decimal degrees to 5 decimal places)

Site Name Plains Snapping Pump	Site Type Pipeline Pumping Station
Date Release Discovered 10/11/2021	API# (if applicable)

Unit Letter	Section	Township	Range	County
D	12	26S	31E	Eddy

Surface Owner: ☐ State ☒ Federal ☐ Tribal ☐ Private (Name: _____)

Nature and Volume of Release

Material(s) Released (Select all that apply and attach calculations or specific justification for the volumes provided below)

☒ Crude Oil	Volume Released (bbls) 22.5 bbls	Volume Recovered (bbls) 10 bbls
☐ Produced Water	Volume Released (bbls)	Volume Recovered (bbls)
	Is the concentration of dissolved chloride in the produced water >10,000 mg/l?	☐ Yes ☐ No
☐ Condensate	Volume Released (bbls)	Volume Recovered (bbls)
☐ Natural Gas	Volume Released (Mcf)	Volume Recovered (Mcf)
☐ Other (describe)	Volume/Weight Released (provide units)	Volume/Weight Recovered (provide units)

Cause of Release

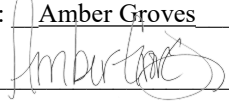
Discharge dampener bladder busted causing a retaining bolt failure.

Incident ID	nAPP2128551283
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Was this a major release as defined by 19.15.29.7(A) NMAC? ☐ Yes ☒ No	If YES, for what reason(s) does the responsible party consider this a major release?
If YES, was immediate notice given to the OCD? By whom? To whom? When and by what means (phone, email, etc)?	

Initial Response

The responsible party must undertake the following actions immediately unless they could create a safety hazard that would result in injury

☒ The source of the release has been stopped.	
☒ The impacted area has been secured to protect human health and the environment.	
☒ Released materials have been contained via the use of berms or dikes, absorbent pads, or other containment devices.	
☒ All free liquids and recoverable materials have been removed and managed appropriately.	
If all the actions described above have <u>not</u> been undertaken, explain why:	
Per 19.15.29.8 B. (4) NMAC the responsible party may commence remediation immediately after discovery of a release. If remediation has begun, please attach a narrative of actions to date. If remedial efforts have been successfully completed or if the release occurred within a lined containment area (see 19.15.29.11(A)(5)(a) NMAC), please attach all information needed for closure evaluation.	
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: <u>Amber Groves</u>	Title: <u>Remediation Coordinator</u>
Signature: 	Date: <u>10/22/2021</u>
email: <u>algroves@paalp.com</u>	Telephone: <u>(575)200-5517</u>
<u>OCD Only</u>	
Received by: _____	Date: _____

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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>Unknown</u> (ft bgs)
Did this release impact groundwater or surface water?	☐ Yes ☒ No
Are the lateral extents of the release within 300 feet of a continuously flowing watercourse or any other significant watercourse?	☐ Yes ☒ 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)?	☐ Yes ☒ No
Are the lateral extents of the release within 300 feet of an occupied permanent residence, school, hospital, institution, or church?	☐ Yes ☒ 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?	☐ Yes ☒ No
Are the lateral extents of the release within 1000 feet of any other fresh water well or spring?	☐ Yes ☒ No
Are the lateral extents of the release within incorporated municipal boundaries or within a defined municipal fresh water well field?	☐ Yes ☒ No
Are the lateral extents of the release within 300 feet of a wetland?	☐ Yes ☒ No
Are the lateral extents of the release overlying a subsurface mine?	☐ Yes ☒ No
Are the lateral extents of the release overlying an unstable area such as karst geology?	☒ Yes ☐ No
Are the lateral extents of the release within a 100-year floodplain?	☐ Yes ☒ No
Did the release impact areas not on an exploration, development, production, or storage site?	☒ Yes ☐ 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.

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 ½-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.

Form C-141

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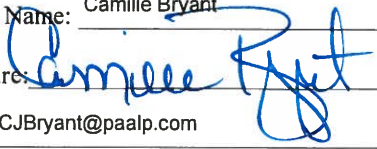
State of New Mexico
Oil Conservation Division

Incident ID	nAPP2128551283
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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: Camille Bryant

Title: HSE Remediation Supervisor

Signature: 

Date: 4/4/2022

email: CJBryant@paalp.com

Telephone: 432-221-7924

OCD Only

Received by: _____

Date: _____

State of New Mexico
Oil Conservation Division

Incident ID	nAPP2128551283
District RP	
Facility ID	
Application ID	

Remediation Plan

Remediation Plan Checklist: *Each of the following items must be included in the plan.*

- ☒ Detailed description of proposed remediation technique
- ☒ Scaled sitemap with GPS coordinates showing delineation points
- ☐ Estimated volume of material to be remediated
- ☒ Closure criteria is to Table 1 specifications subject to 19.15.29.12(C)(4) NMAC
- ☒ Proposed schedule for remediation (note if remediation plan timeline is more than 90 days OCD approval is required)

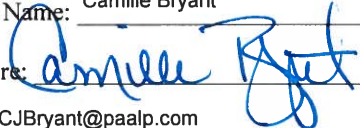
Deferral Requests Only: *Each of the following items must be confirmed as part of any request for deferral of remediation.*

- ☐ Contamination must be in areas immediately under or around production equipment where remediation could cause a major facility deconstruction.
- ☐ Extents of contamination must be fully delineated.
- ☐ Contamination does not cause an imminent risk to human health, the environment, or groundwater.

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: Camille Bryant

Title: HSE Remediation Supervisor

Signature: 

Date: 4/4/2022

email: CJBryant@paalp.com

Telephone: 432-221-7924

OCD Only

Received by: _____ Date: _____

☐ Approved ☒ Approved with Attached Conditions of Approval ☐ Denied ☐ Deferral Approved

Signature: 

Date: 04/20/2022

2135 S. Loop 250 W,
Midland, Texas 79703
United States
www.ghd.com

Our ref: 12565619

March 24, 2022

New Mexico Oil Conservation Division
District 2
811 S. First St.
Artesia, NM 88210

Re: **Site Characterization and Remediation Work Plan**
Snapping Pump Release Site
Plains Pipeline, L.P.
Incident ID: nAPP2128551283
D-12-26S-31E, Eddy County, New Mexico

To Whom It May Concern:

1. Introduction

GHD Services, Inc. (GHD), on behalf of Plains Pipeline, L.P. (Plains), submits this Site Characterization and Remediation Work Plan (Report) to the New Mexico Oil Conservation Division (NMOCD) District 2 Office. This Report provides documentation of excavation activities, confirmation sampling, and analyses in the affected area at the Plains Snapping Pump Release Site (Site). The Site is located in the Unit Letter D Section 12 of Township 26 South and Range 31 East in Eddy County, New Mexico. The GPS coordinates for this Site are 32.06135° N latitude and 103.737193 W longitude. The release occurred on October 11, 2021, on land managed by the Bureau of Land Management (BLM). Figure 1 depicts the Site location. Figure 2, Confirmation Sampling: Soil Analytical Results Map, depicts the excavated area and other site details.

2. Background Information

A C-141, Release Notification, for this release was submitted to the NMOCD on October 22, 2021. The C-141 stated the release was due to a discharge dampener bladder that failed, causing a retaining bolt failure. The release was reported as 22.5 barrels of crude oil with 10 barrels recovered. The release falls under the jurisdiction of the NMOCD District 2 Office in Artesia, New Mexico. The NMOCD assigned the release with Incident Number nAPP2128551283. The Release Notification, Site Assessment/Characterization and Remediation Plan portions of Form C-141 are attached to the front of this Report.

3. Groundwater and Site Characterization

GHD characterized the Site according to Table I, Closure Criteria for Soils Impacted by a Release, from New Mexico Administrative Code (NMAC) Title 19, Chapter 15, Part 29, Section 12 (NMAC 19.15.29.12).

According to the Site characterization evaluation and NMAC 19.15.29.12.C(4)(a)(i), the Site is located within an area of high Karst potential. No groundwater could be located within one-half mile of the Site. No other receptors (water wells, playas, wetlands, waterways, lakebeds, or ordinance boundaries) were located within each specific boundaries or distance from the Site. Since no groundwater information was available with one-half mile and the Site being located in a high karst area the site must be treated as it is located in an area where groundwater is less than fifty (50) feet below ground surface. The Site characterization documentation (Karst Potential, FEMA, Points of Diversion, Significant Watercourses, and Wetlands maps) are provided in Attachment A. The soil and closure criteria are listed below:

General Site Characterization and Groundwater:

Site Characterization	Average Groundwater Depth (ft.)
High Karst Potential	Unknown within a Half Mile

Table 3.1 Closure Criteria for Soils Impacted by a Release (NMAC 19.15.29.12)

Constituent	Limits
Chloride	600 mg/kg
TPH (GRO+DRO+MRO)	100 mg/kg
TPH (GRO+DRO)	Not Applicable
Benzene	10 mg/kg
BTEX	50 mg/kg

4. Initial Soil Delineation Assessment Summary and Findings

During initial response activities on October 14, 2021, four (4) hand auger borings were installed to assess depth of soil impact at the location. Hand auger borings AH1, AH2, and AH4 were installed to three (3) feet below ground surface, and AH3 was installed to five (5) feet below ground surface. Soil samples were collected at depths ranging from one (1) to five (5) feet below ground surface. All soil samples were analyzed for benzene, toluene, ethylbenzene, and xylenes (BTEX) by EPA Method 8021B, TPH by Method 8015B Modified, and chloride by EPA Method 300 by Eurofins Xenco Laboratory (Eurofins) in Midland, TX. Hand auger samples AH1-1', AH2-2', AH3-1', AH3-3', AH4-1', and AH4-3' exhibited Total TPH concentrations above Table I closure criteria. BTEX concentrations were above the Table I closure criteria in soil samples AH1-1' and AH3-1'. Excavation activities began with initial response activities and continued through January 27, 2022.

On December 13, 2021, thirteen (13) bottom hole composite confirmation samples (BH-1 to BH-13) and eight (8) sidewall composite confirmation samples (SW-1 to SW-8) were collected at depths ranging from three (3) to four (4) feet below ground surface from areas representing no greater than two hundred (200) square feet. All soil samples were analyzed for BTEX concentration by Method EPA Method 8021B, TPH concentration by Method 8015B Modified, and chloride concentrations by EPA Method 300 by Eurofins in Midland, TX. Sidewall confirmation samples SW-7 and SW-8 exhibited Total TPH concentrations above Table I closure criteria. Total TPH concentrations ranged from 118 mg/kg at SW-8 and 241 mg/kg at SW-7. All bottom hole samples and the

remaining sidewall samples exhibited concentration below Table I closure criteria for all constituents of concern.

On January 4 and 5, 2022, excavation activities continued with thirteen (13) bottom hole composite confirmation samples (BH-14 to BH-26) collected at depths ranging from approximately ten (10) to twelve (12) feet below ground surface. Additionally, eighteen (18) sidewall composite confirmation samples (SW-9 to SW-26), and six (6) ramp composite confirmation samples (Ramp-1 through Ramp-6) were collected. The confirmation samples were collected from areas representing no greater than two hundred (200) square feet. All soil samples were analyzed for BTEX by Method EPA 8021B, TPH by Method 8015B Modified, and chloride by EPA Method 300 by Eurofins in Midland, TX. Bottom hole confirmation samples BH-14 and BH-16 to BH-18 exhibited Total TPH concentrations above the Table I closure criteria. Total TPH concentrations ranged from 108 mg/kg at BH-14 to 1,140 mg/kg at BH-18. Ramp confirmation samples Ramp-1 to Ramp-5 exhibited Total TPH concentrations above the Table I closure criteria. Total TPH concentrations ranged from 129 mg/kg at Ramp-4 to 180 mg/kg at Ramp-1. All other confirmation samples exhibited concentration below Table I closure criteria for all constituents of concern.

On January 17, 2022, further excavation activities were conducted in the areas represented by confirmation samples SW-7, SW-8 and the ramp area was expanded to allow excavation activities to progress. During expansion of the ramp area soil sample locations Ramp-1 through Ramp-6 were excavated. Seven (7) bottom hole composite confirmation samples (BH-27 to BH-33) and four (4) sidewall composite confirmation samples (SW-7, SW-8, SW-26 and SW-27) were collected. The confirmation samples were collected from areas representing no greater than two hundred (200) square feet. All soil samples were analyzed for BTEX by EPA Method 8021B, TPH by Method 8015B Modified, and chloride by EPA Method 300 by Eurofins in Midland, TX. All bottom hole confirmation samples and sidewall confirmation samples exhibited benzene, BTEX, Total TPH, and chloride concentrations below the Table I closure criteria.

On January 27, 2022, further excavation activities were conducted in the areas represented by confirmation samples BH-14 through BH-19. These soil samples exhibited Total TPH concentrations above Table I closure criteria. Composite confirmation bottom holes sample BH-14A through BH-19A were collected from a depth of approximately nineteen feet below ground surface. Additionally, four (4) composite sidewall confirmation samples (SW-28 14'-19' to SW-31 14'-19') were collected from the newly excavated area from depths ranging from approximately, fourteen (14) to nineteen (19) feet below ground surface. The confirmation samples were collected from areas representing no greater than two hundred (200) square feet. All soil samples were analyzed for BTEX by EPA Method 8021B, TPH by Method 8015B Modified, and chloride by EPA Method 300 by Eurofins in Midland, TX. Bottom hole confirmation samples BH-15A, BH-16A, and BH-17A exhibited Total TPH concentrations above the Table I closure criteria. Bottom hole BH-17A also exhibited BTEX concentrations above Table I closure criteria. Total TPH concentrations ranged from 125 mg/kg at BH-15A to 8,180 mg/kg at BH-17A. BTEX concentration was 55.8 mg/kg at BH-17A. All other confirmation samples exhibited concentration below Table I closure criteria for all constituents of concern.

On February 9, 2022, a test pit was installed in an area represented by BH-17/BH-17A to determine vertical delineation. One (1) test pit sample (TP1-26) was collected at twenty-six (26) feet below ground surface. The test pit sample was analyzed for BTEX by EPA Method 8021B, TPH by Method 8015B Modified, and chloride by EPA Method 300 by Eurofins in Midland, TX. Test pit sample TP1-26 exhibited Total TPH concentrations above the Table I closure criteria, with a concentration of 3,830 mg/kg. Benzene and BTEX concentrations were below Table I closure criteria at twenty-six (26) feet below ground surface. No other samples were collected from the test pit due to unsafe excavation conditions.

Additionally, three (3) soil pile samples (SP-1 to SP-3) were collected from the excavation stockpile on February 9, 2022. All soil pile samples were analyzed for BTEX by EPA Method 8021B, TPH by Method 8015B Modified, and chloride by EPA Method 300 by Eurofins in Midland, TX. Soil pile samples SP-1 and SP-2

exhibited Total TPH concentrations above the Table I closure criteria. Total TPH concentrations ranged from 112 mg/kg at SP-2 to 1,707 mg/kg at SP-1.

Figure 2, Confirmation Sampling: Soil Analytical Results Map, depicts the locations of the bottom hole and sidewalls confirmation samples and analytical concentrations. Analytical results are provided in Table 1, on Figure 2, and in the Laboratory Analytical Reports provided in Attachment C.

5. nAPP2128551283 Proposed Work Plan and Variance Request

The current depth of the excavation is approximately nineteen (19) feet below ground surface at the area represented by confirmation samples BH-14A through BH-19A. Vertical delineation is limited due to loose sand and high probability of cave-ins. The conditions of the excavation and further excavation pose a threat to the integrity of the pipelines and other equipment located adjacent to both the north and south sides of the excavation as indicated on the photographic log which is included as Attachment B. As such, further excavation cannot be conducted in a safe manner due to these limitations. Based on existing site conditions, Plains has determined that soil boring is a viable approach to vertically delineating soil impacts.

In order to install a soil boring, a PVC conduit will be installed in the bottom of the excavation at the area representing BH-17A, which is the sample point with the highest TPH and BTEX concentration. The PVC conduit will aid in drilling through backfill material. The PVC conduit will be extended up to above the ground surface during backfill activities. With NMOCD approval the excavation will be backfilled with imported non-impacted material.

After backfilling activities are complete, a licensed New Mexico driller will install a soil boring to delineate the extent of vertical impact at the site. Soil samples will be collected every five (5) feet from the soil boring starting at approximately thirty (30) feet below ground surface and will continue until field screens and observations indicate soil samples are below Table I closure criteria. Select soil samples will be submitted to a certified laboratory and analyzed for BTEX by EPA Method 8021B, TPH by Method 8015B Modified, and chloride by EPA Method 300. After vertical delineation is completed, the soil boring will be plugged by a licensed New Mexico driller.

GHD, on behalf of Plains, requests a variance per NMAC 19.15.29.14 to install a 20-mil liner at the bottom of the excavation at approximately nineteen (19) feet below ground surface prior to backfilling. The liner will act as a control measure to mitigate the deeper migration of hydrocarbons and provide a barrier to any upward migration of hydrocarbons.

Excavated soils will be transported to a NMOCD-approved disposal facility for disposal and the excavation will be backfilled with imported non-impacted material. Once the site has been delineated, another work plan will be prepared with additional information collected during soil boring installation. The work plan will be submitted to the NMOCD for consideration. The activities described here are anticipated to take approximately one hundred and eighty (180) days from work plan approval.

If you have any questions or comments concerning this Site Characterization and Remediation Work Plan, please do not hesitate to contact our Midland office at (432) 686-0086.

Sincerely,

GHD



Becky Haskell
Senior Project Manager



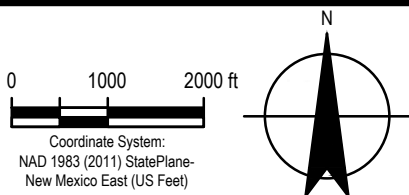
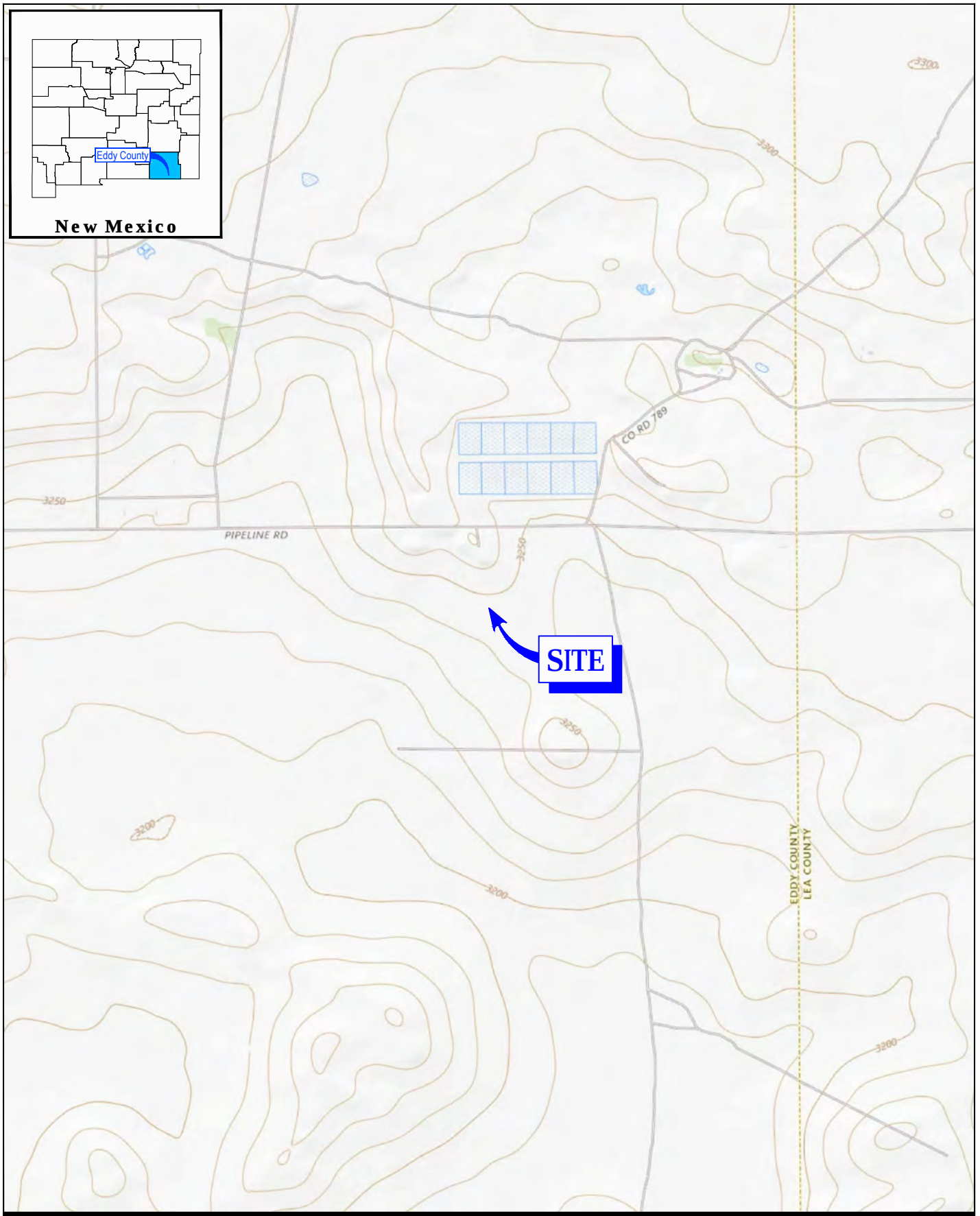
Tom Larson
Project Director

BH/ZC/1

Encl. Figure 1 – Site Location Map
 Figure 2 – Confirmation Sampling: Soil Analytical Results Map
 Table 1 – Summary of Soil Analytical Data
 Attachment A – Site Characterization Documentation
 Attachment B – Photographic Log
 Attachment C – Laboratory Analytical Reports and Chain-of-Custody Documentation

cc: Camille Bryant

Figures



PLAINS
EDDY COUNTY, NEW MEXICO
SNAPPING PUMP RELEASE

Project No. 12565619
Date February 2022

SITE LOCATION MAP

FIGURE 1

Filename: \\ghdnet\ghd\USMidland\Projects\562\12565619\Digital_Design\ACAD\Figures\RPT001\12565619-GHD-0000-RPT-EN-0101_DL-001.dwg

Data Source: USGS 7.5 Minute Quad "Paduca Breaks West and Phantom Banks, New Mexico"
Lat/Long: 32.061469° North, 103.738161° West

Sample ID	Sample Date	Depth (ft bgs)	Benzene	BTEX	TPH	Chloride	
			(mg/kg)	(mg/kg)	Total		(mg/kg)
					GRO/DRO/MRO		
					Table I Closure Criteria for Soils <50 feet Depth to		
10 mg/kg	50 mg/kg	100 mg/kg	600 mg/kg				
Bottom Hole Confirmation Samples							
BH-1	12/13/21	4	<0.000384	<0.00101	56.4	37	
BH-2	12/13/21	4	0.000981 J	0.00205 J	31.6 J	9.17	
BH-3	12/13/21	4	<0.000383	0.00180 J	33.7 J	226	
BH-4	12/13/21	4	0.000745 J	0.00253 J	32.4 J	9.22	
BH-5	12/13/21	4	<0.000386	0.00270 J	45.4 J	6.25	
BH-6	12/13/21	4	<0.000387	<0.00101	29.4 J	5.41	
BH-7	12/13/21	4	<0.000385	<0.00101	39.6 J	71.1	
BH-8	12/13/21	3	<0.000384	<0.00101	55.2	6.02	
BH-9	12/13/21	3	0.000399 J	0.00364 J	23.7 J	15.6	
BH-10	12/13/21	3	0.00110 J	0.00161 J	34.0 J	7.98	
BH-11	12/13/21	3	<0.000387	<0.00101	32.1 J	8.69	
BH-12	12/13/21	3	<0.000383	<0.00101	32.6 J	5.76	
BH-13	12/13/21	3	<0.000387	<0.00102	47.9 J	4.92 J	
BH-14	1/5/22	12	<0.000383	<0.00400	108	12.9	
BH-14A	1/27/22	19	<0.000384	0.000109 J	<15.0	44.1	
BH-15	1/5/22	12	0.000826 J	0.00217 J	32.3 J	7.38	
BH-15A	1/27/22	19	<0.000389	0.00186 J	125	9.2	
BH-16	1/5/22	12	0.00153 J	0.709	656	7.92	
BH-16A	1/27/22	19	<0.000385	0.534	543	17.4	
BH-17	1/5/22	12	0.00211	0.666	527	5.96	
BH-17A	1/27/22	19	2.10	55.8	8,180	15.8	
BH-18	1/5/22	12	0.00143 J	0.882	1,140	31.1	
BH-18A	1/27/22	19	<0.000389	0.00126 J	<15.0	42.7	
BH-19	1/5/22	12	<0.000381	0.0141	21.0 J	32.4	
BH-19A	1/27/22	19	<0.000383	<0.00101	<15.0	2.51 J	
BH-20	1/5/22	10	<0.000384	0.00337 J	<15.0	7.54 F1	
BH-21	1/5/22	10	<0.000389	0.00148 J	30.7 J	8.11	
BH-22	1/5/22	10	<0.000383	0.00291 J	15.4 J	9.22	
BH-23	1/5/22	10	0.000403 J	0.00157 J	<15.0	47.9	
BH-24	1/5/22	10	0.00359	0.00673	<15.0	13.5	
BH-25	1/5/22	10	<0.000381	<0.00100	<15.0	59.8	
BH-26	1/5/22	10	<0.000382	<0.00100	<15.0	23.2	
BH-27	1/17/22	3	<0.000383	<0.00101	21.3 J	5.88	
BH-28	1/17/22	3	0.00474	0.00885	23.7 J	3.37 J	
BH-29	1/17/22	14	<0.000383	<0.00100	16.1 J	6.71	
BH-30	1/17/22	14	<0.000386	<0.00101	22.1 J	25.2	
BH-31	1/17/22	14	<0.000386	<0.00101	23.2 J	19.6	
BH-32	1/17/22	14	0.000824 J	0.00271 J	15.9 J	9.66	
BH-33	1/17/22	14	<0.000384	0.00182 J	23.1 J	17.0	

Sample ID	Sample Date	Depth (ft bgs)	Benzene	BTEX	TPH	Chloride	
			(mg/kg)	(mg/kg)	Total		(mg/kg)
					GRO/DRO/MRO		
Table I Closure Criteria for Soils <50 feet Depth to							
10 mg/kg	50 mg/kg	100 mg/kg	600 mg/kg				
Side Wall Confirmation Samples							
SW-1	12/13/21	-	<0.000387	<0.00102	36.7 J	7.69	
SW-2	12/13/21	-	<0.000383	<0.00101	47.5 J	6.17	
SW-3	12/13/21	-	0.00112 J	0.00235 J	29.9 J	6.63	
SW-4	12/13/21	-	<0.000384	<0.00101	29.1 J	6.04	
SW-5	12/13/21	-	<0.000385	0.00137 J	34.7 J	<0.857	
SW-6	12/13/21	-	<0.000388	<0.00102	82.2	4.38 J	
SW-7	12/13/21	-	<0.000389	<0.00402	241	12.5	
SW-7	1/17/22	-	<0.000381	<0.00100	22.0 J	9.26 F1	
SW-8	12/13/21	-	<0.000381	0.00565	118	6.19	
SW-8	1/17/22	-	<0.000388	<0.00102	19.7 J	8.5	
SW-9	1/4/22	-	<0.000383	<0.00100	79.9	16.7 F1	
SW-10	1/4/22	-	<0.000385	<0.00101	<15.0	30.9	
SW-11	1/4/22	-	<0.000385	0.00275 J	<15.0	2.85 J	
SW-12	1/4/22	-	<0.000381	0.00288 J	<15.0	3.94 J	
SW-13	1/4/22	-	<0.000388	<0.00102	<15.0	3.91 J	
SW-14	1/4/22	-	0.00128 J	0.00329 J	<15.0	3.46 J	
SW-15	1/4/22	-	0.00112 J	0.00204 J	<15.0	18.9	
SW-16	1/4/22	-	<0.000386	0.00399 J	<15.0	27.5	
SW-17	1/4/22	-	<0.000387	<0.00101	<15.0	46.5	
SW-18	1/4/22	-	<0.000385	<0.00101	77.2	11.7	
SW-19	1/4/22	-	<0.000384	<0.00101	59.3	15.3	
SW-20	1/4/22	-	<0.000389	<0.00102	<15.0	6.46	
SW-21	1/4/22	-	0.00103 J	0.00379 J	<15.0	14.5	
SW-22	1/4/22	-	<0.000383	0.00104 J	66.1	9.93	
SW-23	1/4/22	-	<0.000387	0.00267	<15.0	19.7	
SW-24	1/4/22	-	0.00136 J	0.00291 J	<15.0	11.4	
SW-25	1/4/22	-	<0.000381	<0.00100	<15.0	6.81	
SW-26	1/4/22	-	0.00117 J	0.00295 J	<15.0	23.1	
SW-26	1/17/22	-	<0.000383 F1	<0.00101	23.3 J	7.69	
SW-27	1/17/22	-	<0.000381	<0.00100	18.7 J	7.99	
SW-28 14'-19'	1/27/22	-	<0.000381	<0.00100	30.0 J	13.1	
SW-29 14'-19'	1/27/22	-	<0.000388	0.0218	<15.0	53.2	
SW-30 14'-19'	1/27/22	-	<0.000383	0.00863	<15.0	13.4	
SW-31 14'-19'	1/27/22	-	<0.000385	0.00277 J	<15.0	13.6	
Ramp Confirmation Samples							
Ramp-1	1/4/22	-	<0.000383	0.00265 J	180	4.65 J	
Ramp-2	1/4/22	-	0.000513 J	0.00290 J	170	3.55 J	
Ramp-3	1/4/22	-	<0.000389	0.00131 J	166	11.1 F1	
Ramp-4	1/4/22	-	<0.000383	<0.00400	129	7.85	
Ramp-5	1/4/22	-	<0.000383	<0.00401	137	12.4	
Ramp-6	1/4/22	-	<0.000388	<0.00402	76.7	8.6	

LEGEND

EXCAVATED AREA

DEPTH

DEPTH OF SAMPLE (FT)

BTEX

BENZENE, TOLUENE, ETHYLBENZENE & XYLENES CONCENTRATION (MG/KG)

TPH

TOTAL PETROLEUM HYDROCARBONS CONCENTRATION (MG/KG)

INDICATES SIDE WALL COMPOSITE SAMPLE

INDICATES SIDE WALL COMPOSITE SAMPLE

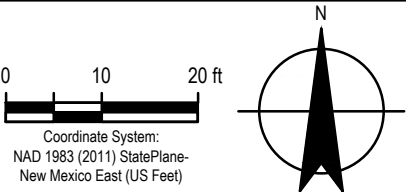
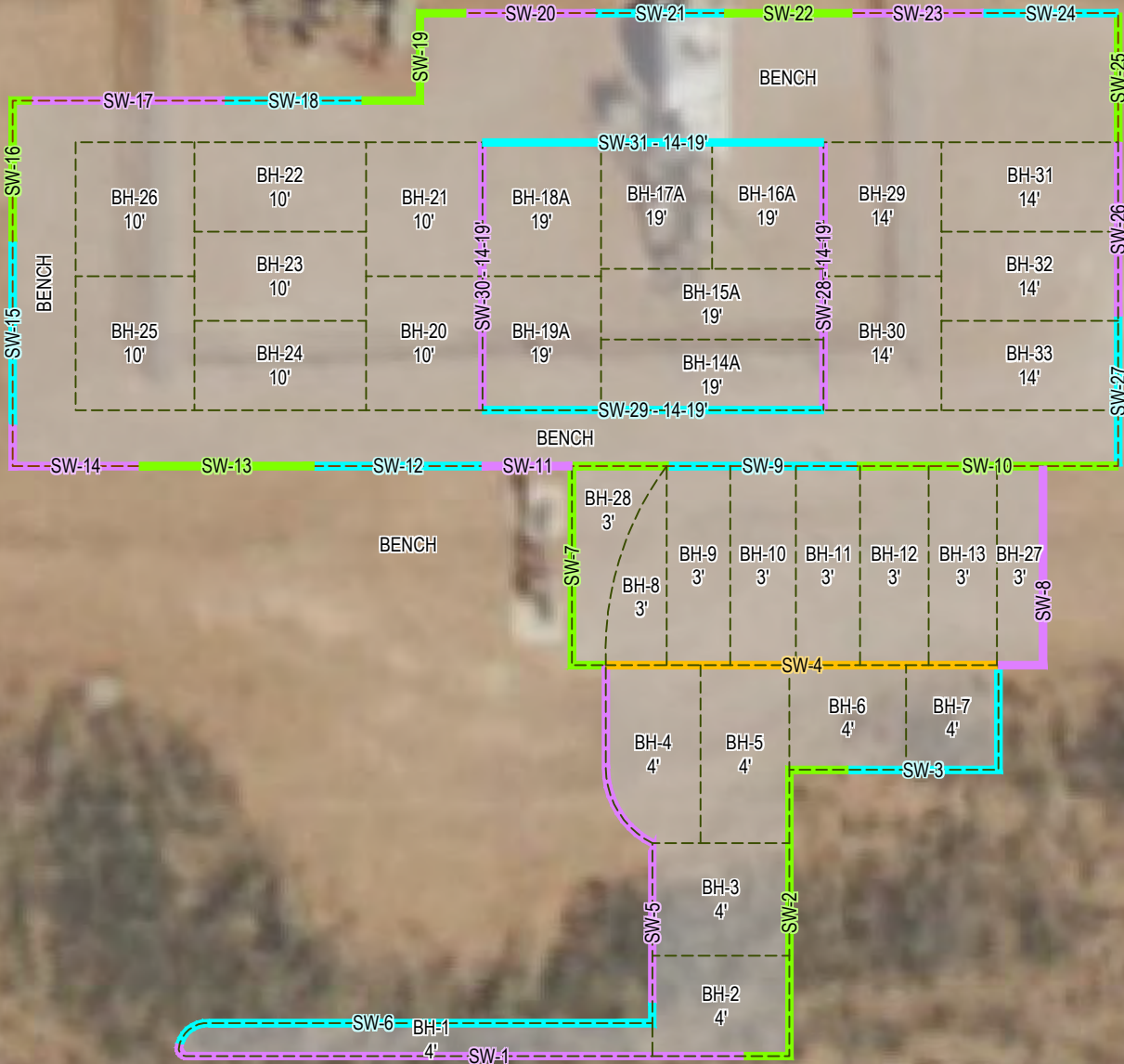
INDICATES SIDE WALL COMPOSITE SAMPLE

INDICATES SIDE WALL COMPOSITE SAMPLE

- NOTES:
1. RESULTS IN MILLIGRAMS PER KILOGRAM (MG/KG).

2. SEE TABLE 1 FOR FULL ANALYTICAL RESULTS/DETAILS.

3. YELLOW SHADED CELLS INDICATE EXCEEDANCE.



PLAINS
EDDY COUNTY, NEW MEXICO
SNAPPING PUMP RELEASE

CONFIRMATION SAMPLING:
SOIL ANALYTICAL RESULTS MAP

Project No. 12565619
Date February 2022

FIGURE 2

Tables

Table 1
Summary of Soil Analytical Data
Snapping Pumps
Planis Pipeline, LP
Eddy County, New Mexico

Sample ID	Sample Date	Depth (ft bgs)	Benzene	Toluene	Ethylbenzene	Xylenes	BTEX	TPH				Chloride	
			(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	GRO(C6-C10)	DRO(C10-C28)	MRO (C28-C35)	Total GRO/DRO/MRO		
			Table I Closure Criteria for Soils <50 feet Depth to Groundwater 19.15.29 NMAC										
			10 mg/kg	---	---	---	50 mg/kg	---	---	---	100 mg/kg		600 mg/kg
Initial Assessment Samples													
AH1 1'	10/14/2021	1	1.84	14.1	3.15	87.9	86.2	4,810 B	5,960 **	708 B	11,200	16.1	
AH1 3'	10/14/2021	3	<0.000389	<0.000461	<0.000571	<0.00102	<0.00102	18.4 J B	19.8 J	<15.0	38.2 J		
AH2 2'	10/14/2021	2	<0.000381	<0.000451	<0.000559	<0.00100	<0.00100	<15.0	242 **	32.7 J B	275	13	
AH2 3'	10/14/2021	3						15.6 J B	41.1 J	<14.9	56.7		
AH3 1'	10/14/2021	1	0.141	0.00402	0.137	82.0	68.6	3,550 B	6,060 **	683 B	10,300	13.4	
AH3 3'	10/14/2021	3	0.0153	0.0261	0.119	0.913	1.07	1,100 B	1,790	177	3,070		
AH3 5'	10/14/2021	5	0.000464 J	0.0183	0.00532	0.0813	0.1	21.6 J	73.6 B	<15.0	95.2		
AH4 1'	10/14/2021	1	0.243	0.0302	0.0161	25.4	25.7	1,480 B	3,560 **	358 B	5,400	11.4	
AH4 3'	10/14/2021	3	0.00273	0.0132	0.0237	0.128	0.167	18.6 J	849 B	<14.9	868		
Bottom Hole Confirmation Samples													
BH-1	12/13/21	4	<0.000384	<0.000455	<0.000564	<0.00101	<0.00101	37.6 J B	18.8 J	<15.0	56.4	37	
BH-2	12/13/21	4	0.000981 J	0.00107 J	<0.000570	<0.00102	0.00205 J	31.6 J B	<15.0	<15.0	31.6 J	9.17	
BH-3	12/13/21	4	<0.000383	0.000864 J	<0.000563	<0.00101	0.00180 J	33.7 J B	<15.0	<15.0	33.7 J	226	
BH-4	12/13/21	4	0.000745 J	<0.000454	<0.000563	0.00178 J	0.00253 J	32.4 J B	<15.0	<15.0	32.4 J	9.22	
BH-5	12/13/21	4	<0.000386	0.00200	<0.000566	<0.00101	0.00270 J	45.4 J B	<15.0	<15.0	45.4 J	6.25	
BH-6	12/13/21	4	<0.000387	<0.000458	<0.000567	<0.00101	<0.00101	29.4 J B	<15.0	<15.0	29.4 J	5.41	
BH-7	12/13/21	4	<0.000385	<0.000456	<0.000565	<0.00101	<0.00101	39.6 J B	<15.0	<15.0	39.6 J	71.1	
BH-8	12/13/21	3	<0.000384	<0.000455	<0.000564	<0.00101	<0.00101	36.5 J B	18.7 J	<15.0	55.2	6.02	
BH-9	12/13/21	3	0.000399 J	0.00107 J	<0.000570	0.00217 J	0.00364 J	23.7 J B	<15.0	<15.0	23.7 J	15.6	
BH-10	12/13/21	3	0.00110 J	<0.000453	<0.000562	<0.00100	0.00161 J	34.0 J B	<15.0	<15.0	34.0 J	7.98	
BH-11	12/13/21	3	<0.000387	<0.000458	<0.000567	<0.00101	<0.00101	32.1 J B	<15.0	<15.0	32.1 J	8.69	
BH-12	12/13/21	3	<0.000383	<0.000454	<0.000563	<0.00101	<0.00101	32.6 J B	<14.9	<14.9	32.6 J	5.76	
BH-13	12/13/21	3	<0.000387	<0.000459	<0.000568	<0.00102	<0.00102	47.9 J B	<15.0	<15.0	47.9 J	4.92 J	
BH-14	1/5/22	12	<0.000383	0.000469 J	<0.000562	<0.00100	<0.00100	22.3 J	85.9 *1	<15.0	168	12.9	
BH-14A	1/27/22	19	<0.000384	<0.000455	<0.000564	0.00109 J	0.000109 J	<15.0	<15.0	<15.0	<15.0	44.1	
BH-15	1/5/22	12	0.000625 J	0.000623 J	<0.000567	<0.00101	0.00217 J	<15.0	32.3 J *1	<15.0	32.3 J	7.38	
BH-15A	1/27/22	19	<0.000389	0.000520 J	.000641 J	<0.00102	0.00186 J	<15.0	125 B	<15.0	125	9.2	
BH-16	1/5/22	12	0.00153 J	0.0487	0.0889	0.57	0.789	36.2 J	570 *1	49.6 J	656	7.92	
BH-16A	1/27/22	19	<0.000385	0.0129	0.0135	0.508	0.534	74.6	432 B	36.8 J	543	17.4	
BH-17	1/5/22	12	0.00211	0.0357	0.0641	0.504	0.686	45.2 J	439 *1	42.7 J	527	5.96	
BH-17A	1/27/22	19	2.10	5.81	2.88	45.0	55.8	2,970	4,770 B	435	8,180	15.8	
BH-18	1/5/22	12	0.00143 J	0.0814	0.0862	0.713	0.882	59	1,000 *1	80	1,140	31.1	

Table 1
Summary of Soil Analytical Data
Snapping Pumps
Planis Pipeline, LP
Eddy County, New Mexico

Sample ID	Sample Date	Depth (ft bgs)	Benzene	Toluene	Ethylbenzene	Xylenes	BTEX	TPH				Chloride
			(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	GRO(C6-C10)	DRO(C10-C28)	MRO (C28-C35)	Total GRO/DRO/MRO	(mg/kg)
			Table I Closure Criteria for Soils <50 feet Depth to Groundwater 19.15.29 NMAC									
			10 mg/kg	---	---	---	50 mg/kg	---	---	---	100 mg/kg	600 mg/kg
BH-18A	1/27/22	19	<0.000389	<0.000461	<0.000571	0.00126 J	0.00126 J	<15.0	<15.0	<15.0	<15.0	42.7
BH-19	1/5/22	12	<0.000381	0.00342	0.00679	0.01	0.0141	21.0 J	<15.0	<15.0	21.0 J	32.4
BH-19A	1/27/22	19	<0.000383	<0.000454	<0.000536	<0.00101	<0.00101	<15.0	<15.0	<15.0	<15.0	2.51 J
BH-20	1/5/22	10	<0.000384	0.000575 J	<0.000564	0.00280 J	0.00337 J	<15.0	<15.0	<15.0	<15.0	7.54 F1
BH-21	1/5/22	10	<0.000389	0.000847 J	0.000629 J	<0.00102	0.00148 J	30.7 J	<15.0	<15.0	30.7 J	8.11
BH-22	1/5/22	10	<0.000383	0.00120 J	<0.000562	0.00171 J	0.00291 J	15.4 J	<15.0	<15.0	15.4 J	9.22
BH-23	1/5/22	10	0.000403 J	0.000580 J	0.000591 J	<0.00102	0.00157 J	<15.0	<15.0	<15.0	<15.0	47.9
BH-24	1/5/22	10	0.00359	0.00245	0.000691 J	<0.00101	0.00673	<15.0	<15.0	<15.0	<15.0	13.5
BH-25	1/5/22	10	<0.000381	<0.000451	<0.000559	<0.00100	<0.00100	<15.0	<15.0	<15.0	<15.0	59.8
BH-26	1/5/22	10	<0.000382	<0.000452	<0.000561	<0.00100	<0.00100	<15.0	<15.0	<15.0	<15.0	23.2
BH-27	1/17/22	3	<0.000383	<0.000454	<0.000563	<0.00101	<0.00101	21.3 J	<15.0 *1	<15.0	21.3 J	5.88
BH-28	1/17/22	3	0.00474	0.00346	0.000648 J	<0.00102	0.00885	23.7 J	<15.0 *1	<15.0	23.7 J	3.37 J
BH-29	1/17/22	14	<0.000383	<0.000453	<0.000562	<0.00100	<0.00100	16.1 J	<15.0 *1	<15.0	16.1 J	6.71
BH-30	1/17/22	14	<0.000386	<0.000457	<0.000566	<0.00101	<0.00101	22.1 J	<15.0 *1	<15.0	22.1 J	25.2
BH-31	1/17/22	14	<0.000386	<0.000457	<0.000566	<0.00101	<0.00101	23.2 J	<15.0 *1	<15.0	23.2 J	19.6
BH-32	1/17/22	14	0.000824 J	0.000935 J	<0.000561	<0.00100	0.00271 J	15.9 J	<15.0 *1	<15.0	15.9 J	9.66
BH-33	1/17/22	14	<0.000384	0.00182 J	<0.000564	<0.00101	0.00182 J	23.1 J	<15.0 *1	<15.0	23.1 J	17.0
Side Wall Confirmation Samples												
SW-1	12/13/21	-	<0.000387	<0.000459	<0.000568	<0.00102	<0.00102	36.7 J B	<15.0	<15.0	36.7 J	7.69
SW-2	12/13/21	-	<0.000383	<0.000454	<0.000563	<0.00101	<0.00101	29.6 J B	17.9 J	<15.0	47.5 J	6.17
SW-3	12/13/21	-	0.00112 J	<0.000455	<0.000564	0.00123 J	0.00235 J	29.9 J B	<15.0	<15.0	29.9 J	6.63
SW-4	12/13/21	-	<0.000384	<0.000455	<0.000564	<0.00101	<0.00101	29.1 J B	<15.0	<15.0	29.1 J	6.04
SW-5	12/13/21	-	<0.000385	0.00137 J	<0.000565	<0.00101	0.00137 J	34.7 J B	<15.0	<15.0	34.7 J	<0.857
SW-6	12/13/21	-	<0.000388	<0.000460	<0.000570	<0.00102	<0.00102	38.6 J B	43.6 J	<15.0	82.2	4.38 J
SW-7	12/13/21	-	<0.000389	<0.000461	<0.000571	<0.00102	<0.00102	39.1 J B	202	<15.0	241	12.5
SW-7	1/17/22	-	<0.000381	<0.000451	<0.000559	<0.00100	<0.00100	22.0 J F1	<15.0 F1 *1	<15.0	22.0 J	9.26 F1
SW-8	12/13/21	-	<0.000381	0.00135 J	0.000727 J	0.00357 J	0.00565	22.3 J	95.5	<15.0	118	6.19
SW-8	1/17/22	-	<0.000388	<0.000460	<0.000570	<0.00102	<0.00102	19.7 J	<15.0 *1	<15.0	19.7 J	8.5
SW-9	1/4/22	-	<0.000383	<0.000453	<0.000562	<0.00100	<0.00100	19.0 J*1	60.9 *1	<15.0	79.9	16.7 F1
SW-10	1/4/22	-	<0.000385	<0.000456	<0.000565	<0.00101	<0.00101	<15.0	<15.0	<15.0	<15.0	30.9
SW-11	1/4/22	-	<0.000385	<0.000456	<0.000565	0.00275 J	0.00275 J	<15.0	<15.0	<15.0	<15.0	2.85 J
SW-12	1/4/22	-	<0.000381	0.00121 J	<0.000559	0.00167 J	0.00288 J	<15.0	<15.0	<15.0	<15.0	3.94 J
SW-13	1/4/22	-	<0.000388	<0.000460	<0.000570	<0.00102	<0.00102	<15.0	<15.0	<15.0	<15.0	3.91 J

Table 1
Summary of Soil Analytical Data
Snapping Pumps
Planis Pipeline, LP
Eddy County, New Mexico

Sample ID	Sample Date	Depth (ft bgs)	Benzene	Toluene	Ethylbenzene	Xylenes	BTEX	TPH				Chloride
			(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	GRO(C6-C10)	DRO(C10-C28)	MRO (C28-C35)	Total GRO/DRO/MRO	(mg/kg)
			Table I Closure Criteria for Soils <50 feet Depth to Groundwater 19.15.29 NMAC									
			10 mg/kg	---	---	---	50 mg/kg	---	---	---	100 mg/kg	600 mg/kg
SW-14	1/4/22	-	0.00128 J	<0.000455	0.000775 J	0.00123 J	0.00329 J	<15.0	<15.0	<15.0	<15.0	3.46 J
SW-15	1/4/22	-	0.00112 J	0.000924 J	<0.000567	<0.00101	0.00204 J	<15.0	<15.0	<15.0	<15.0	18.9
SW-16	1/4/22	-	<0.000386	0.00116 J	<0.000566	0.00283 J	0.00399 J	<15.0	<15.0	<15.0	<15.0	27.5
SW-17	1/4/22	-	<0.000387	<0.000458	<0.000567	<0.00101	<0.00101	<15.0	<15.0	<15.0	<15.0	46.5
SW-18	1/4/22	-	<0.000385	<0.000456	<0.000565	<0.00101	<0.00101	<15.0	77.2 *1	<15.0	77.2	11.7
SW-19	1/4/22	-	<0.000384	<0.000455	<0.000564	<0.00101	<0.00101	<15.0	59.3 *1	<15.0	59.3	15.3
SW-20	1/4/22	-	<0.000389	<0.000461	<0.000571	<0.00102	<0.00102	<15.0	<15.0	<15.0	<15.0	6.46
SW-21	1/4/22	-	0.00103 J	0.00178 J	<0.000562	<0.00100	0.00379 J	<15.0	<15.0	<15.0	<15.0	14.5
SW-22	1/4/22	-	<0.000383	<0.000453	<0.000562	0.00104 J	0.00104 J	<15.0	66.1 *1	<15.0	66.1	9.93
SW-23	1/4/22	-	<0.000387	0.00105 J	<0.000568	0.00162	0.00267	<15.0	<15.0	<15.0	<15.0	19.7
SW-24	1/4/22	-	0.00136 J	0.00103 J	<0.000566	<0.00101	0.00291 J	<15.0	<15.0	<15.0	<15.0	11.4
SW-25	1/4/22	-	<0.000381	<0.000451	<0.000559	<0.00100	<0.00100	<15.0	<15.0	<15.0	<15.0	6.81
SW-26	1/4/22	-	0.00117 J	<0.000452	<0.000561	0.00178 J	0.00295 J	<15.0	<15.0	<15.0	<15.0	23.1
SW-26	1/17/22	-	<0.000383 F1	<0.000454 F1	<0.000563 F2 F1	<0.00101 F1	<0.00101	23.3 J	<15.0 *1	<15.0	23.3 J	7.69
SW-27	1/17/22	-	<0.000381	<0.000451	<0.000559	<0.00100	<0.00100	18.7 J	<15.0 *1	<15.0	18.7 J	7.99
SW-28 14'-19'	1/27/22	-	<0.000381	<0.000451	<0.000559	<0.00100	<0.00100	<15.0	30.0 J	<15.0	30.0 J	13.1
SW-29 14'-19'	1/27/22	-	<0.000388	0.00657	0.00102 J	0.0142	0.0218	<15.0	<15.0	<15.0	<15.0	53.2
SW-30 14'-19'	1/27/22	-	<0.000383	0.00324	<0.000562	0.00539	0.00863	<15.0	<15.0	<15.0	<15.0	13.4
SW-31 14'-19'	1/27/22	-	<0.000385	<0.000456	<0.000565	0.00277 J	0.00277 J	<15.0	<15.0	<15.0	<15.0	13.6
Ramp Confirmation Samples												
Ramp 1	1/4/22	-	<0.000383	0.00119 J	<0.000563	0.00146 J	0.00265 J	<15.0	180 *1	<15.0	180	4.65 J
Ramp 2	1/4/22	-	0.000513 J	0.000989 J	<0.000568	0.00140 J	0.00290 J	<14.9	170 *1	<14.9	170	3.55 J
Ramp 3	1/4/22	-	<0.000389	0.00131 J	<0.000571	<0.00102	0.00131 J	<15.0	166	<15.0	166	11.1 F1
Ramp 4	1/4/22	-	<0.000383	0.000616 J	<0.000562	<0.00100	<0.00100	<15.0	129	<15.0	129	7.85
Ramp 5	1/4/22	-	<0.000383	0.000599 J	<0.000563	<0.00101	<0.00101	<15.0	137	<15.0	137	12.4
Ramp 6	1/4/22	-	<0.000388	<0.000460	<0.000570	<0.00102	<0.00102	<15.0	76.7	<15.0	76.7	8.6
Test Pit Samples												
TP1-26	2/9/22	26	0.0769 J	5.46	2.52	30.7	38.7569	1,480	2,350 B	<15.0 U	3,830	64.8
Soil Pile Samples												
SP-1	2/9/22	-	0.00578	0.125	0.0245	0.405	0.559	27.0 J	1,680 B	<15.0 U	1,707	12.7
SP-2	2/9/22	-	0.000476 J	0.0209	0.00195 J	0.0506	0.0736	29.4 J	82.2 B	<15.0 U	112	17.9
SP-3	2/9/22	-	<0.000381 U	0.00623	0.000995 J	0.0162	0.0233	17.6 J	<15.0 U	<15.0 U	17.6 J	28.9

Table 1
Summary of Soil Analytical Data
Snapping Pumps
Planis Pipeline, LP
Eddy County, New Mexico

Sample ID	Sample Date	Depth (ft bgs)	Benzene	Toluene	Ethylbenzene	Xylenes	BTEX	TPH				Chloride
								GRO(C6-C10)	DRO(C10-C28)	MRO (C28-C35)	Total GRO/DRO/MRO	
			(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)
			Table I Closure Criteria for Soils <50 feet Depth to Groundwater 19.15.29 NMAC									
			10 mg/kg	---	---	---	50 mg/kg	---	---	---	100 mg/kg	600 mg/kg

Notes:

- Values reported in mg/kg
- < = Value Less than Reporting Limit (RL)
- Bold Indicates Analyte Detected
- BTEX analyses by EPA Method SW 8021B
- TPH analyses by EPA Method SW 8015 Mod
- GRO/DRO/MRO = Gasoline/Diesel/Motor Oil
- Yellow shaded cells indicate analytical samples that exceed the NMOC 19.15.29.12 Table 1 Closure Criteria for the Site.
- J - the target analytes was positively identified below the quantitation limit and above the detection/reporting limit
- = not defined
- B - Compound was found in the blank and sample
- *+ indicates LCS and/or LCSD is outside acceptance limits, high biased
- *1 - LCS/LCSD RPD exceeds control limits.
- F1 - MS and/or MSD recovery exceeds control limits.

B-BH-2 Sample Point Excavated

Attachment A

Site Characterization Documentation

Plains Snapping Pump

KARST Potential

Legend

-  High
-  Low
-  Medium
-  Snapping Pump Release Site

 Snapping Pump Release Site



700 ft

OSE PUBLIC PRINT



10/22/2021, 9:33:32 AM

GIS WATERS PODs

Active

Pending

OSE District Boundary

Water Right Regulations

Closure Area

New Mexico State Trust Lands

Both Estates

SiteBoundaries

1:18,056

00.170.350.7 mi

00.30.61.2 km

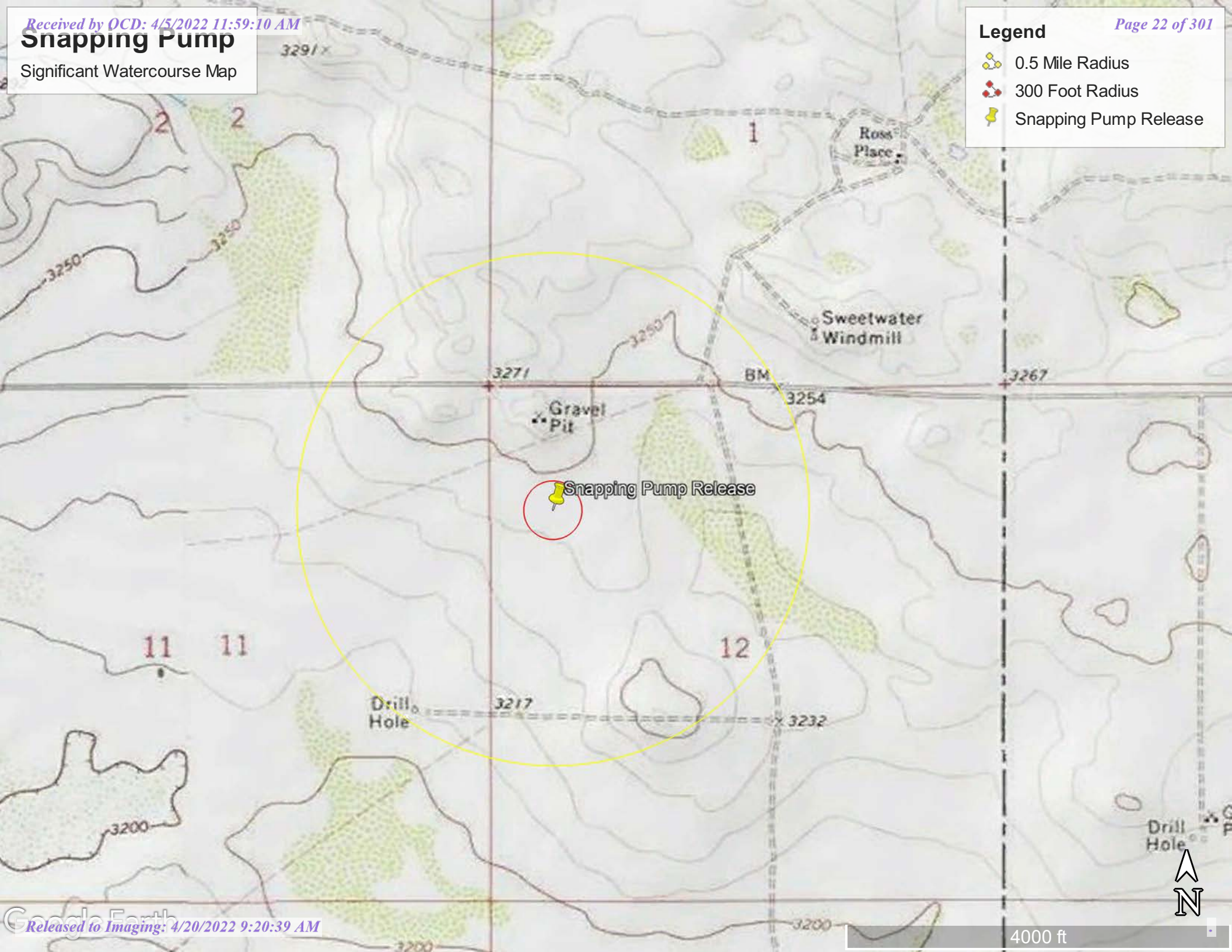
Esri, HERE, iPC, U.S. Department of Energy Office of Legacy Management, Esri, HERE, Garmin, iPC, Maxar

Snapping Pump

Significant Watercourse Map

Legend

- 0.5 Mile Radius
- 300 Foot Radius
- Snapping Pump Release





March 8, 2022

Wetlands

- | | | |
|--|---|--|
|  Estuarine and Marine Deepwater |  Freshwater Emergent Wetland |  Lake |
|  Estuarine and Marine Wetland |  Freshwater Forested/Shrub Wetland |  Other |
| |  Freshwater Pond |  Riverine |

This map is for general reference only. The US Fish and Wildlife Service is not responsible for the accuracy or currentness of the base data shown on this map. All wetlands related data should be used in accordance with the layer metadata found on the Wetlands Mapper web site.

National Flood Hazard Layer FIRMMette



103°44'33"W 32°3'56"N



0 250 500 1,000 1,500 2,000 Feet 1:6,000
Basemap: USGS National Map: Orthoimagery: Data refreshed October, 2020

Legend

SEE FIS REPORT FOR DETAILED LEGEND AND INDEX MAP FOR FIRM PANEL LAYOUT

SPECIAL FLOOD HAZARD AREAS		Without Base Flood Elevation (BFE) Zone A, V, A99
		With BFE or Depth Zone AE, AO, AH, VE, AR
OTHER AREAS OF FLOOD HAZARD		Regulatory Floodway
		0.2% Annual Chance Flood Hazard, Areas of 1% annual chance flood with average depth less than one foot or with drainage areas of less than one square mile
		Future Conditions 1% Annual Chance Flood Hazard Zone X
		Area with Reduced Flood Risk due to Levee. See Notes. Zone X
OTHER AREAS		Area with Flood Risk due to Levee Zone X
		NO SCREEN Area of Minimal Flood Hazard Zone X
GENERAL STRUCTURES		Effective LOMRs
		Area of Undetermined Flood Hazard Zone D
OTHER FEATURES		Channel, Culvert, or Storm Sewer
		Levee, Dike, or Floodwall
		20.2 Cross Sections with 1% Annual Chance
		17.5 Water Surface Elevation
		Coastal Transect
		Base Flood Elevation Line (BFE)
		Limit of Study
		Jurisdiction Boundary
		Coastal Transect Baseline
		Profile Baseline
MAP PANELS		Hydrographic Feature
		Digital Data Available
		No Digital Data Available
MAP PANELS		Unmapped
		The pin displayed on the map is an approximate point selected by the user and does not represent an authoritative property location.

This map complies with FEMA's standards for the use of digital flood maps if it is not void as described below. The basemap shown complies with FEMA's basemap accuracy standards

The flood hazard information is derived directly from the authoritative NFHL web services provided by FEMA. This map was exported on 3/8/2022 at 11:16 AM and does not reflect changes or amendments subsequent to this date and time. The NFHL and effective information may change or become superseded by new data over time.

This map image is void if the one or more of the following map elements do not appear: basemap imagery, flood zone labels, legend, scale bar, map creation date, community identifiers, FIRM panel number, and FIRM effective date. Map images for unmapped and unmodernized areas cannot be used for regulatory purposes.

Released to Imaging: 4/20/2022 9:20:39 AM

Received by OCD: 4/8/2022 11:59:10 AM

Page 24 of 301

Attachment B Photographic Log



Photo 1 Excavation



Photo 2 – Excavation



**Site Photograph
Plains Snapping Pump
Release Site.**

GHD | Report for Plains | 12566934



Photo 3 – Excavation



Photo 4 – Excavation



**Site Photograph
Plains Snapping Pump
Release Site.**

GHD | Report for Plains | 12566934

Attachment C

Laboratory Analytical Reports and Chain-of-Custody Documentation



Environment Testing
America

ANALYTICAL REPORT

Eurofins Midland
1211 W. Florida Ave
Midland, TX 79701
Tel: (432)704-5440

Laboratory Job ID: 880-7292-1

Laboratory Sample Delivery Group: Eddy County NM
Client Project/Site: Snapping Pump Site - 12565619
Revision: 1

For:

GHD Services Inc.
2135 South Loop 250 West
Midland, Texas 79703

Attn: Becky Haskell

Authorized for release by:
3/11/2022 5:40:51 PM

Debbie Simmons, Project Manager
(832)986-6768
debbie.simmons@eurofinset.com

LINKS

Review your project
results through
TotalAccess

Have a Question?



Visit us at:

www.eurofinsus.com/Env

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.

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Laboratory Job ID: 880-7292-1
SDG: Eddy County NM

Table of Contents

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Lab Chronicle	33
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Method Summary	37
Sample Summary	38
Chain of Custody	39
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Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Qualifiers

GC VOA

Qualifier	Qualifier Description
4	MS, MSD: The analyte present in the original sample is greater than 4 times the matrix spike concentration; therefore, control limits are not applicable.
F1	MS and/or MSD recovery exceeds control limits.
F2	MS/MSD RPD exceeds control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
S1-	Surrogate recovery exceeds control limits, low biased.
S1+	Surrogate recovery exceeds control limits, high biased.
U	Indicates the analyte was analyzed for but not detected.

GC Semi VOA

Qualifier	Qualifier Description
*+	LCS and/or LCSD is outside acceptance limits, high biased.
B	Compound was found in the blank and sample.
F2	MS/MSD RPD exceeds control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
S1+	Surrogate recovery exceeds control limits, high biased.
U	Indicates the analyte was analyzed for but not detected.

HPLC/IC

Qualifier	Qualifier Description
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

Eurofins Midland

Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Glossary (Continued)

Abbreviation **These commonly used abbreviations may or may not be present in this report.**

TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

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Case Narrative

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Job ID: 880-7292-1

Laboratory: Eurofins Midland

Narrative

**Job Narrative
880-7292-1**

Revision

The report being provided is a revision of the original report sent on 11/1/2021. The report (revision 1) is being revised due to: one sample (AH4-1') the total xylenes not calculating correctly. Sent back to the lab, report revised to remove Total Xylenes (reporting m,p and o-xylenes individually).

Receipt

The samples were received on 10/18/2021 9:45 AM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 2.2°C

GC VOA

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-10005 and analytical batch 880-10194 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8021B: Surrogate recovery for the following samples were outside control limits: (MB 880-10004/5-A) and (MB 880-10005/5-A). Evidence of matrix interferences is not obvious.

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-10011 and analytical batch 880-10332 were outside control limits. Sample matrix interference is suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8021B: Surrogate recovery for the following samples were outside control limits: AH1 - 1' (880-7292-1), AH3 - 1' (880-7292-5) and AH4 - 1' (880-7292-8). Evidence of matrix interference is present; therefore, re-extraction and/or re-analysis was not performed.

Method 8021B: Surrogate recovery for the following sample was outside control limits: (MB 880-10273/5-A). Evidence of matrix interferences is not obvious.

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-10593 and analytical batch 880-10594 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8021B: Surrogate recovery for the following samples were outside control limits: AH3 - 3' (880-7292-6) and AH4 - 3' (880-7292-9). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

GC Semi VOA

Method 8015MOD_NM: The method blank for preparation batch 880-10137 and analytical batch 880-10165 contained Gasoline Range Organics (GRO)-C6-C10 and Diesel Range Organics (Over C10-C28) above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method 8015MOD_NM: The method blank for preparation batch 880-10766 and analytical batch 880-10808 contained Gasoline Range Organics (GRO)-C6-C10 above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method 8015MOD_NM: The method blank for preparation batch 880-10910 and analytical batch 880-10885 contained Diesel Range Organics (Over C10-C28) above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Case Narrative

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Job ID: 880-7292-1 (Continued)

Laboratory: Eurofins Midland (Continued)

HPLC/IC

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

No analytical or quality issues were noted, other than those described in the Definitions/Glossary page.

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH1 - 1'

Lab Sample ID: 880-7292-1

Date Collected: 10/14/21 11:00

Matrix: Solid

Date Received: 10/18/21 09:45

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	1.04		0.199	0.0383	mg/Kg		10/22/21 16:35	10/25/21 14:15	100
Toluene	14.1		0.199	0.0453	mg/Kg		10/22/21 16:35	10/25/21 14:15	100
Ethylbenzene	3.15		0.199	0.0562	mg/Kg		10/22/21 16:35	10/25/21 14:15	100
m-Xylene & p-Xylene	55.7		0.398	0.100	mg/Kg		10/22/21 16:35	10/25/21 14:15	100
o-Xylene	12.2		0.199	0.0342	mg/Kg		10/22/21 16:35	10/25/21 14:15	100

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	253	S1+	70 - 130	10/22/21 16:35	10/25/21 14:15	100
1,4-Difluorobenzene (Surr)	89		70 - 130	10/22/21 16:35	10/25/21 14:15	100

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	86.2		0.398	0.100	mg/Kg			10/25/21 15:44	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	11200		50.0	15.0	mg/Kg			10/25/21 19:23	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	4610	B	50.0	15.0	mg/Kg		10/21/21 15:23	10/22/21 16:18	1
Diesel Range Organics (Over C10-C28)	5900	+	50.0	15.0	mg/Kg		10/21/21 15:23	10/22/21 16:18	1
Oil Range Organics (Over C28-C36)	708	B	50.0	15.0	mg/Kg		10/21/21 15:23	10/22/21 16:18	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane				10/21/21 15:23	10/22/21 16:18	1
o-Terphenyl				10/21/21 15:23	10/22/21 16:18	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	16.1		4.98	0.855	mg/Kg			10/23/21 12:21	1

Client Sample ID: AH1 - 3'

Lab Sample ID: 880-7292-2

Date Collected: 10/14/21 11:05

Matrix: Solid

Date Received: 10/18/21 09:45

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000389	U	0.00202	0.000389	mg/Kg		10/26/21 09:12	10/27/21 06:52	1
Toluene	<0.000461	U	0.00202	0.000461	mg/Kg		10/26/21 09:12	10/27/21 06:52	1
Ethylbenzene	<0.000571	U	0.00202	0.000571	mg/Kg		10/26/21 09:12	10/27/21 06:52	1
m-Xylene & p-Xylene	<0.00102	U	0.00404	0.00102	mg/Kg		10/26/21 09:12	10/27/21 06:52	1
o-Xylene	0.000372	J	0.00202	0.000347	mg/Kg		10/26/21 09:12	10/27/21 06:52	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	121		70 - 130	10/26/21 09:12	10/27/21 06:52	1
1,4-Difluorobenzene (Surr)	88		70 - 130	10/26/21 09:12	10/27/21 06:52	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH1 - 3'

Date Collected: 10/14/21 11:05

Date Received: 10/18/21 09:45

Lab Sample ID: 880-7292-2

Matrix: Solid

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00404	0.00102	mg/Kg			11/01/21 13:47	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	38.2	J	50.0	15.0	mg/Kg			10/29/21 13:53	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	18.4	J B	50.0	15.0	mg/Kg		10/27/21 16:03	10/28/21 13:32	1
Diesel Range Organics (Over C10-C28)	19.8	J	50.0	15.0	mg/Kg		10/27/21 16:03	10/28/21 13:32	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		10/27/21 16:03	10/28/21 13:32	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	119		70 - 130				10/27/21 16:03	10/28/21 13:32	1
o-Terphenyl	116		70 - 130				10/27/21 16:03	10/28/21 13:32	1

Client Sample ID: AH2 - 2'

Date Collected: 10/14/21 11:20

Date Received: 10/18/21 09:45

Lab Sample ID: 880-7292-3

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg		10/20/21 14:16	10/24/21 16:03	1
Toluene	<0.000451	U	0.00198	0.000451	mg/Kg		10/20/21 14:16	10/24/21 16:03	1
Ethylbenzene	<0.000559	U	0.00198	0.000559	mg/Kg		10/20/21 14:16	10/24/21 16:03	1
m-Xylene & p-Xylene	<0.00100	U	0.00396	0.00100	mg/Kg		10/20/21 14:16	10/24/21 16:03	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		10/20/21 14:16	10/24/21 16:03	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	102		70 - 130				10/20/21 14:16	10/24/21 16:03	1
1,4-Difluorobenzene (Surr)	113		70 - 130				10/20/21 14:16	10/24/21 16:03	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00396	0.00100	mg/Kg			10/25/21 15:44	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	275		49.9	15.0	mg/Kg			10/25/21 19:23	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	49.9	15.0	mg/Kg		10/21/21 15:23	10/22/21 16:39	1
Diesel Range Organics (Over C10-C28)	242	*+	49.9	15.0	mg/Kg		10/21/21 15:23	10/22/21 16:39	1
Oil Range Organics (Over C28-C36)	32.7	J B	49.9	15.0	mg/Kg		10/21/21 15:23	10/22/21 16:39	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane							10/21/21 15:23	10/22/21 16:39	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH2 - 2'

Date Collected: 10/14/21 11:20

Date Received: 10/18/21 09:45

Lab Sample ID: 880-7292-3

Matrix: Solid

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

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl				10/21/21 15:23	10/22/21 16:39	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.7		4.95	0.850	mg/Kg			10/23/21 12:28	1

Client Sample ID: AH2 - 3'

Date Collected: 10/14/21 11:25

Date Received: 10/18/21 09:45

Lab Sample ID: 880-7292-4

Matrix: Solid

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	56.7		49.8	14.9	mg/Kg			10/29/21 13:53	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	15.6	J B	49.8	14.9	mg/Kg		10/27/21 16:03	10/28/21 13:54	1
Diesel Range Organics (Over C10-C28)	41.1	J	49.8	14.9	mg/Kg		10/27/21 16:03	10/28/21 13:54	1
OII Range Organics (Over C28-C36)	<14.9	U	49.8	14.9	mg/Kg		10/27/21 16:03	10/28/21 13:54	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	106		70 - 130				10/27/21 16:03	10/28/21 13:54	1
o-Terphenyl	106		70 - 130				10/27/21 16:03	10/28/21 13:54	1

Client Sample ID: AH3 - 1'

Date Collected: 10/14/21 11:55

Date Received: 10/18/21 09:45

Lab Sample ID: 880-7292-5

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.141		0.00198	0.000381	mg/Kg		10/20/21 14:16	10/24/21 16:24	1
Toluene	0.00402		0.00198	0.000451	mg/Kg		10/20/21 14:16	10/24/21 16:24	1
Ethylbenzene	0.137		0.00198	0.000559	mg/Kg		10/20/21 14:16	10/24/21 16:24	1
m-Xylene & p-Xylene	68.1		0.403	0.102	mg/Kg		10/22/21 16:35	10/25/21 14:43	100
o-Xylene	0.201		0.00198	0.000341	mg/Kg		10/20/21 14:16	10/24/21 16:24	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	76		70 - 130				10/20/21 14:16	10/24/21 16:24	1
1,4-Difluorobenzene (Surr)	51	S1-	70 - 130				10/20/21 14:16	10/24/21 16:24	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	68.6		0.403	0.102	mg/Kg			10/25/21 15:44	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	10300		49.9	15.0	mg/Kg			10/25/21 19:23	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH3 - 1'

Lab Sample ID: 880-7292-5

Date Collected: 10/14/21 11:55

Matrix: Solid

Date Received: 10/18/21 09:45

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	3550	B	49.9	15.0	mg/Kg	-	10/21/21 15:23	10/22/21 17:00	1
Diesel Range Organics (Over C10-C28)	6060	*+	49.9	15.0	mg/Kg	-	10/21/21 15:23	10/22/21 17:00	1
Oil Range Organics (Over C28-C36)	683	B	49.9	15.0	mg/Kg	-	10/21/21 15:23	10/22/21 17:00	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane							10/21/21 15:23	10/22/21 17:00	1
o-Terphenyl							10/21/21 15:23	10/22/21 17:00	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	13.4		5.04	0.865	mg/Kg	-		10/23/21 12:35	1

Client Sample ID: AH3 - 3'

Lab Sample ID: 880-7292-6

Date Collected: 10/14/21 12:00

Matrix: Solid

Date Received: 10/18/21 09:45

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.0153		0.00200	0.000386	mg/Kg	-	10/26/21 09:12	10/27/21 07:12	1
Toluene	0.0261		0.00200	0.000457	mg/Kg	-	10/26/21 09:12	10/27/21 07:12	1
Ethylbenzene	0.119		0.00200	0.000566	mg/Kg	-	10/26/21 09:12	10/27/21 07:12	1
m-Xylene & p-Xylene	0.735		0.00401	0.00101	mg/Kg	-	10/26/21 09:12	10/27/21 07:12	1
o-Xylene	0.178		0.00200	0.000345	mg/Kg	-	10/26/21 09:12	10/27/21 07:12	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	122		70 - 130				10/26/21 09:12	10/27/21 07:12	1
1,4-Difluorobenzene (Surr)	66	S1-	70 - 130				10/26/21 09:12	10/27/21 07:12	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	1.07		0.00401	0.00101	mg/Kg	-		11/01/21 13:47	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	3070		50.0	15.0	mg/Kg	-		10/29/21 13:53	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	1100	B	50.0	15.0	mg/Kg	-	10/27/21 16:03	10/28/21 14:21	1
Diesel Range Organics (Over C10-C28)	1790		50.0	15.0	mg/Kg	-	10/27/21 16:03	10/28/21 14:21	1
Oil Range Organics (Over C28-C36)	177		50.0	15.0	mg/Kg	-	10/27/21 16:03	10/28/21 14:21	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	118		70 - 130				10/27/21 16:03	10/28/21 14:21	1
o-Terphenyl	82		70 - 130				10/27/21 16:03	10/28/21 14:21	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH3 - 5'

Lab Sample ID: 880-7292-7

Date Collected: 10/14/21 12:05

Matrix: Solid

Date Received: 10/18/21 09:45

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000464	J	0.00198	0.000381	mg/Kg		10/20/21 14:16	10/24/21 16:45	1
Toluene	0.0183		0.00198	0.000451	mg/Kg		10/20/21 14:16	10/24/21 16:45	1
Ethylbenzene	0.00532		0.00198	0.000559	mg/Kg		10/20/21 14:16	10/24/21 16:45	1
m-Xylene & p-Xylene	0.0640		0.00396	0.00100	mg/Kg		10/20/21 14:16	10/24/21 16:45	1
o-Xylene	0.0173		0.00198	0.000341	mg/Kg		10/20/21 14:16	10/24/21 16:45	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	111		70 - 130	10/20/21 14:16	10/24/21 16:45	1
1,4-Difluorobenzene (Surr)	94		70 - 130	10/20/21 14:16	10/24/21 16:45	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.105		0.00396	0.00100	mg/Kg			11/01/21 13:47	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	95.2		50.0	15.0	mg/Kg			11/01/21 12:32	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	21.6	J	50.0	15.0	mg/Kg		10/28/21 09:34	10/30/21 02:41	1
Diesel Range Organics (Over C10-C28)	73.6	B	50.0	15.0	mg/Kg		10/28/21 09:34	10/30/21 02:41	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		10/28/21 09:34	10/30/21 02:41	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	98		70 - 130				10/28/21 09:34	10/30/21 02:41	1
o-Terphenyl	108		70 - 130				10/28/21 09:34	10/30/21 02:41	1

Client Sample ID: AH4 - 1'

Lab Sample ID: 880-7292-8

Date Collected: 10/14/21 12:40

Matrix: Solid

Date Received: 10/18/21 09:45

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.243		0.00198	0.000381	mg/Kg		10/20/21 14:01	10/25/21 00:19	1
Toluene	0.0302		0.00198	0.000451	mg/Kg		10/20/21 14:01	10/25/21 00:19	1
Ethylbenzene	0.0161		0.00198	0.000559	mg/Kg		10/20/21 14:01	10/25/21 00:19	1
m-Xylene & p-Xylene	25.3		0.402	0.102	mg/Kg		10/22/21 16:35	10/25/21 15:10	100
o-Xylene	0.0628		0.00198	0.000341	mg/Kg		10/20/21 14:01	10/25/21 00:19	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	75		70 - 130	10/20/21 14:01	10/25/21 00:19	1
1,4-Difluorobenzene (Surr)	114		70 - 130	10/20/21 14:01	10/25/21 00:19	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	25.7		0.402	0.102	mg/Kg			10/25/21 15:44	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH4 - 1'

Lab Sample ID: 880-7292-8

Date Collected: 10/14/21 12:40

Matrix: Solid

Date Received: 10/18/21 09:45

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	5400		49.9	15.0	mg/Kg			10/25/21 19:23	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	1480	B	49.9	15.0	mg/Kg		10/21/21 15:23	10/22/21 17:21	1
Diesel Range Organics (Over C10-C28)	3560	+	49.9	15.0	mg/Kg		10/21/21 15:23	10/22/21 17:21	1
Oil Range Organics (Over C28-C36)	358	B	49.9	15.0	mg/Kg		10/21/21 15:23	10/22/21 17:21	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane							10/21/21 15:23	10/22/21 17:21	1
o-Terphenyl							10/21/21 15:23	10/22/21 17:21	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.4		4.97	0.853	mg/Kg			10/23/21 12:43	1

Client Sample ID: AH4 - 3'

Lab Sample ID: 880-7292-9

Date Collected: 10/14/21 12:45

Matrix: Solid

Date Received: 10/18/21 09:45

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00273		0.00200	0.000386	mg/Kg		10/26/21 09:12	10/27/21 07:33	1
Toluene	0.0132		0.00200	0.000457	mg/Kg		10/26/21 09:12	10/27/21 07:33	1
Ethylbenzene	0.0237		0.00200	0.000566	mg/Kg		10/26/21 09:12	10/27/21 07:33	1
m-Xylene & p-Xylene	0.105		0.00401	0.00101	mg/Kg		10/26/21 09:12	10/27/21 07:33	1
o-Xylene	0.0225		0.00200	0.000345	mg/Kg		10/26/21 09:12	10/27/21 07:33	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	175	S1+	70 - 130				10/26/21 09:12	10/27/21 07:33	1
1,4-Difluorobenzene (Surr)	107		70 - 130				10/26/21 09:12	10/27/21 07:33	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.167		0.00401	0.00101	mg/Kg			11/01/21 13:47	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	868		49.8	14.9	mg/Kg			11/01/21 12:32	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	18.6	J	49.8	14.9	mg/Kg		10/28/21 09:34	10/30/21 03:02	1
Diesel Range Organics (Over C10-C28)	849	B	49.8	14.9	mg/Kg		10/28/21 09:34	10/30/21 03:02	1
Oil Range Organics (Over C28-C36)	<14.9	U	49.8	14.9	mg/Kg		10/28/21 09:34	10/30/21 03:02	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	102		70 - 130				10/28/21 09:34	10/30/21 03:02	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH4 - 3'
Date Collected: 10/14/21 12:45
Date Received: 10/18/21 09:45

Lab Sample ID: 880-7292-9
Matrix: Solid

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

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
o-Terphenyl	97		70 - 130	10/28/21 09:34	10/30/21 03:02	1

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

Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	BFB1 (70-130)	DFBZ1 (70-130)
880-7292-1	AH1 - 1'	253 S1+	89
880-7292-2	AH1 - 3'	121	88
880-7292-3	AH2 - 2'	102	113
880-7292-5	AH3 - 1'	76	51 S1-
880-7292-6	AH3 - 3'	122	66 S1-
880-7292-7	AH3 - 5'	111	94
880-7292-8	AH4 - 1'	75	114
880-7292-9	AH4 - 3'	175 S1+	107
880-7292-A-1-B MS	880-7292-A-1-B MS	8 S1-	127
880-7292-A-1-C MSD	880-7292-A-1-C MSD	21 S1-	0.006 S1-
880-7474-A-1-D MS	Matrix Spike	357 S1+	115
880-7474-A-1-E MSD	Matrix Spike Duplicate	335 S1+	125
880-7548-A-1-B MS	Matrix Spike	106	104
880-7548-A-1-C MSD	Matrix Spike Duplicate	115	109
890-1445-A-41-B MS	Matrix Spike	82	100
890-1445-A-41-C MSD	Matrix Spike Duplicate	83	112
LCS 880-10005/1-A	Lab Control Sample	92	111
LCS 880-10011/1-A	Lab Control Sample	90	105
LCS 880-10273/1-A	Lab Control Sample	116	105
LCS 880-10593/1-A	Lab Control Sample	107	107
LCSD 880-10005/2-A	Lab Control Sample Dup	98	115
LCSD 880-10011/2-A	Lab Control Sample Dup	93	101
LCSD 880-10273/2-A	Lab Control Sample Dup	111	111
LCSD 880-10593/2-A	Lab Control Sample Dup	104	107
MB 880-10004/5-A	Method Blank	66 S1-	96
MB 880-10005/5-A	Method Blank	66 S1-	98
MB 880-10009/5-A	Method Blank	119	99
MB 880-10011/5-A	Method Blank	107	107
MB 880-10200/5-A	Method Blank	116	101
MB 880-10273/5-A	Method Blank	69 S1-	99
MB 880-10593/5-A	Method Blank	110	95

Surrogate Legend

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO1 (70-130)	OTPH1 (70-130)
880-7252-A-1-H MS	Matrix Spike	121	121
880-7252-A-1-I MSD	Matrix Spike Duplicate	149 S1+	139 S1+
880-7292-2	AH1 - 3'	119	116
880-7292-4	AH2 - 3'	106	106
880-7292-6	AH3 - 3'	118	82
880-7292-7	AH3 - 5'	98	108
880-7292-9	AH4 - 3'	102	97
880-7523-A-1-G MS	Matrix Spike	97	83

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Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

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

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO1 (70-130)	OTPH1 (70-130)
880-7523-A-1-H MSD	Matrix Spike Duplicate	100	89
890-1485-A-1-F MS	Matrix Spike	104	97
890-1485-A-1-G MSD	Matrix Spike Duplicate	107	92
LCS 880-10137/2-A	Lab Control Sample	117	112
LCS 880-10766/2-A	Lab Control Sample	94	90
LCS 880-10910/2-A	Lab Control Sample	116	116
LCSD 880-10137/3-A	Lab Control Sample Dup	103	95
LCSD 880-10766/3-A	Lab Control Sample Dup	83	77
LCSD 880-10910/3-A	Lab Control Sample Dup	138 S1+	111
MB 880-10137/1-A	Method Blank	126	135 S1+
MB 880-10766/1-A	Method Blank	115	115
MB 880-10910/1-A	Method Blank	116	126

Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO1	OTPH1
880-7292-1	AH1 - 1'		
880-7292-3	AH2 - 2'		
880-7292-5	AH3 - 1'		
880-7292-8	AH4 - 1'		

Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-10004/5-A

Matrix: Solid

Analysis Batch: 10194

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10004

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		10/20/21 13:59	10/24/21 00:03	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		10/20/21 13:59	10/24/21 00:03	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		10/20/21 13:59	10/24/21 00:03	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		10/20/21 13:59	10/24/21 00:03	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		10/20/21 13:59	10/24/21 00:03	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	66	S1-	70 - 130	10/20/21 13:59	10/24/21 00:03	1
1,4-Difluorobenzene (Surr)	96		70 - 130	10/20/21 13:59	10/24/21 00:03	1

Lab Sample ID: MB 880-10005/5-A

Matrix: Solid

Analysis Batch: 10194

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10005

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		10/20/21 14:01	10/24/21 13:49	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		10/20/21 14:01	10/24/21 13:49	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		10/20/21 14:01	10/24/21 13:49	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		10/20/21 14:01	10/24/21 13:49	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		10/20/21 14:01	10/24/21 13:49	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	66	S1-	70 - 130	10/20/21 14:01	10/24/21 13:49	1
1,4-Difluorobenzene (Surr)	98		70 - 130	10/20/21 14:01	10/24/21 13:49	1

Lab Sample ID: LCS 880-10005/1-A

Matrix: Solid

Analysis Batch: 10194

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 10005

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.09032		mg/Kg		90	70 - 130
Toluene	0.100	0.08388		mg/Kg		84	70 - 130
Ethylbenzene	0.100	0.07931		mg/Kg		79	70 - 130
m-Xylene & p-Xylene	0.200	0.1550		mg/Kg		78	70 - 130
o-Xylene	0.100	0.08064		mg/Kg		81	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	92		70 - 130
1,4-Difluorobenzene (Surr)	111		70 - 130

Lab Sample ID: LCSD 880-10005/2-A

Matrix: Solid

Analysis Batch: 10194

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 10005

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.09394		mg/Kg		94	70 - 130	4	35
Toluene	0.100	0.08810		mg/Kg		88	70 - 130	5	35
Ethylbenzene	0.100	0.08474		mg/Kg		85	70 - 130	7	35

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCSD 880-10005/2-A

Matrix: Solid

Analysis Batch: 10194

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 10005

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
m-Xylene & p-Xylene	0.200	0.1668		mg/Kg		83	70 - 130	7	35
o-Xylene	0.100	0.08643		mg/Kg		86	70 - 130	7	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	98		70 - 130
1,4-Difluorobenzene (Surr)	115		70 - 130

Lab Sample ID: 890-1445-A-41-B MS

Matrix: Solid

Analysis Batch: 10194

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 10005

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.000383	U F1	0.0996	0.03375	F1	mg/Kg		34	70 - 130		
Toluene	<0.000453	U F1	0.0996	0.03988	F1	mg/Kg		40	70 - 130		
Ethylbenzene	<0.000562	U F1	0.0996	0.04409	F1	mg/Kg		44	70 - 130		
m-Xylene & p-Xylene	<0.00100	U F1	0.199	0.08668	F1	mg/Kg		44	70 - 130		
o-Xylene	<0.000342	U F1	0.0996	0.04511	F1	mg/Kg		45	70 - 130		

Surrogate	MS %Recovery	MS Qualifier	Limits
4-Bromofluorobenzene (Surr)	82		70 - 130
1,4-Difluorobenzene (Surr)	100		70 - 130

Lab Sample ID: 890-1445-A-41-C MSD

Matrix: Solid

Analysis Batch: 10194

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 10005

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.000383	U F1	0.0996	0.03853	F1	mg/Kg		39	70 - 130	13	35
Toluene	<0.000453	U F1	0.0996	0.03861	F1	mg/Kg		39	70 - 130	3	35
Ethylbenzene	<0.000562	U F1	0.0996	0.04023	F1	mg/Kg		40	70 - 130	9	35
m-Xylene & p-Xylene	<0.00100	U F1	0.199	0.08036	F1	mg/Kg		40	70 - 130	8	35
o-Xylene	<0.000342	U F1	0.0996	0.04260	F1	mg/Kg		43	70 - 130	6	35

Surrogate	MSD %Recovery	MSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	83		70 - 130
1,4-Difluorobenzene (Surr)	112		70 - 130

Lab Sample ID: MB 880-10009/5-A

Matrix: Solid

Analysis Batch: 10332

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10009

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		10/20/21 14:10	10/24/21 04:18	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		10/20/21 14:10	10/24/21 04:18	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		10/20/21 14:10	10/24/21 04:18	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		10/20/21 14:10	10/24/21 04:18	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		10/20/21 14:10	10/24/21 04:18	1

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: MB 880-10009/5-A

Matrix: Solid

Analysis Batch: 10332

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10009

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	119		70 - 130	10/20/21 14:10	10/24/21 04:18	1
1,4-Difluorobenzene (Surr)	99		70 - 130	10/20/21 14:10	10/24/21 04:18	1

Lab Sample ID: MB 880-10011/5-A

Matrix: Solid

Analysis Batch: 10332

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10011

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		10/20/21 14:16	10/24/21 15:20	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		10/20/21 14:16	10/24/21 15:20	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		10/20/21 14:16	10/24/21 15:20	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		10/20/21 14:16	10/24/21 15:20	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		10/20/21 14:16	10/24/21 15:20	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	107		70 - 130	10/20/21 14:16	10/24/21 15:20	1
1,4-Difluorobenzene (Surr)	107		70 - 130	10/20/21 14:16	10/24/21 15:20	1

Lab Sample ID: LCS 880-10011/1-A

Matrix: Solid

Analysis Batch: 10332

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 10011

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.1028		mg/Kg		103	70 - 130
Toluene	0.100	0.07866		mg/Kg		79	70 - 130
Ethylbenzene	0.100	0.07910		mg/Kg		79	70 - 130
m-Xylene & p-Xylene	0.200	0.1485		mg/Kg		74	70 - 130
o-Xylene	0.100	0.07658		mg/Kg		77	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	90		70 - 130
1,4-Difluorobenzene (Surr)	105		70 - 130

Lab Sample ID: LCSD 880-10011/2-A

Matrix: Solid

Analysis Batch: 10332

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 10011

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.08414		mg/Kg		84	70 - 130	20	35
Toluene	0.100	0.07026		mg/Kg		70	70 - 130	11	35
Ethylbenzene	0.100	0.07046		mg/Kg		70	70 - 130	12	35
m-Xylene & p-Xylene	0.200	0.1400		mg/Kg		70	70 - 130	6	35
o-Xylene	0.100	0.07068		mg/Kg		71	70 - 130	8	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	93		70 - 130
1,4-Difluorobenzene (Surr)	101		70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 880-7292-A-1-B MS

Matrix: Solid

Analysis Batch: 10332

Client Sample ID: 880-7292-A-1-B MS

Prep Type: Total/NA

Prep Batch: 10011

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.0580	F1	0.101	<0.000389	U F1	mg/Kg		0	70 - 130
Toluene	0.195	B F1	0.101	0.02703	F1	mg/Kg		-166	70 - 130
Ethylbenzene	0.714	E	0.101	0.006642	4	mg/Kg		-700	70 - 130
m-Xylene & p-Xylene	0.138	B F1	0.202	0.001238	J F1	mg/Kg		-68	70 - 130
o-Xylene	2.20	E	0.101	0.06402	4	mg/Kg		-2117	70 - 130

Surrogate	MS %Recovery	MS Qualifier	Limits
4-Bromofluorobenzene (Surr)	8	S1-	70 - 130
1,4-Difluorobenzene (Surr)	127		70 - 130

Lab Sample ID: 880-7292-A-1-C MSD

Matrix: Solid

Analysis Batch: 10332

Client Sample ID: 880-7292-A-1-C MSD

Prep Type: Total/NA

Prep Batch: 10011

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.0580	F1	0.0998	0.0004738	J F1	mg/Kg		-58	70 - 130	NC	35
Toluene	0.195	B F1	0.0998	0.001393	J F1 F2	mg/Kg		-194	70 - 130	180	35
Ethylbenzene	0.714	E	0.0998	0.05093	4 F2	mg/Kg		-664	70 - 130	154	35
m-Xylene & p-Xylene	0.138	B F1	0.200	0.02850	F1 F2	mg/Kg		-55	70 - 130	183	35
o-Xylene	2.20	E	0.0998	0.1697	4 F2	mg/Kg		-2037	70 - 130	90	35

Surrogate	MSD %Recovery	MSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	21	S1-	70 - 130
1,4-Difluorobenzene (Surr)	0.006	S1-	70 - 130

Lab Sample ID: MB 880-10200/5-A

Matrix: Solid

Analysis Batch: 10594

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10200

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		10/26/21 08:30	10/26/21 12:48	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		10/26/21 08:30	10/26/21 12:48	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		10/26/21 08:30	10/26/21 12:48	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		10/26/21 08:30	10/26/21 12:48	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		10/26/21 08:30	10/26/21 12:48	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	116		70 - 130	10/26/21 08:30	10/26/21 12:48	1
1,4-Difluorobenzene (Surr)	101		70 - 130	10/26/21 08:30	10/26/21 12:48	1

Lab Sample ID: MB 880-10273/5-A

Matrix: Solid

Analysis Batch: 10341

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10273

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		10/22/21 16:35	10/25/21 03:44	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		10/22/21 16:35	10/25/21 03:44	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		10/22/21 16:35	10/25/21 03:44	1

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: MB 880-10273/5-A

Matrix: Solid

Analysis Batch: 10341

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10273

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		10/22/21 16:35	10/25/21 03:44	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		10/22/21 16:35	10/25/21 03:44	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	69	S1-	70 - 130				10/22/21 16:35	10/25/21 03:44	1
1,4-Difluorobenzene (Surr)	99		70 - 130				10/22/21 16:35	10/25/21 03:44	1

Lab Sample ID: LCS 880-10273/1-A

Matrix: Solid

Analysis Batch: 10341

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 10273

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.1024		mg/Kg		102	70 - 130
Toluene	0.100	0.09417		mg/Kg		94	70 - 130
Ethylbenzene	0.100	0.1024		mg/Kg		102	70 - 130
m-Xylene & p-Xylene	0.200	0.2149		mg/Kg		107	70 - 130
o-Xylene	0.100	0.1087		mg/Kg		109	70 - 130
Surrogate	LCS %Recovery	LCS Qualifier	Limits				
4-Bromofluorobenzene (Surr)	116		70 - 130				
1,4-Difluorobenzene (Surr)	105		70 - 130				

Lab Sample ID: LCSD 880-10273/2-A

Matrix: Solid

Analysis Batch: 10341

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 10273

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	Limit
Benzene	0.100	0.09688		mg/Kg		97	70 - 130	6	35
Toluene	0.100	0.1035		mg/Kg		103	70 - 130	9	35
Ethylbenzene	0.100	0.09873		mg/Kg		99	70 - 130	4	35
m-Xylene & p-Xylene	0.200	0.1998		mg/Kg		100	70 - 130	7	35
o-Xylene	0.100	0.1007		mg/Kg		101	70 - 130	8	35
Surrogate	LCSD %Recovery	LCSD Qualifier	Limits						
4-Bromofluorobenzene (Surr)	111		70 - 130						
1,4-Difluorobenzene (Surr)	111		70 - 130						

Lab Sample ID: 880-7474-A-1-D MS

Matrix: Solid

Analysis Batch: 10341

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 10273

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	<0.000388	U	0.0998	0.07035		mg/Kg		70	70 - 130
Toluene	<0.000460	U	0.0998	0.08238		mg/Kg		83	70 - 130
Ethylbenzene	<0.000570	U	0.0998	0.08177		mg/Kg		82	70 - 130
m-Xylene & p-Xylene	0.00118	J F1	0.200	0.2741	F1	mg/Kg		137	70 - 130
o-Xylene	<0.000347	U	0.0998	0.1134		mg/Kg		114	70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 880-7474-A-1-D MS

Matrix: Solid

Analysis Batch: 10341

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 10273

	MS	MS	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	357	S1+	70 - 130
1,4-Difluorobenzene (Surr)	115		70 - 130

Lab Sample ID: 880-7474-A-1-E MSD

Matrix: Solid

Analysis Batch: 10341

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 10273

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.000388	U	0.0994	0.06914		mg/Kg		70	70 - 130	2	35
Toluene	<0.000460	U	0.0994	0.09018		mg/Kg		91	70 - 130	9	35
Ethylbenzene	<0.000570	U	0.0994	0.08445		mg/Kg		85	70 - 130	3	35
m-Xylene & p-Xylene	0.00118	J F1	0.199	0.2184		mg/Kg		109	70 - 130	23	35
o-Xylene	<0.000347	U	0.0994	0.1063		mg/Kg		107	70 - 130	6	35

	MSD	MSD	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	335	S1+	70 - 130
1,4-Difluorobenzene (Surr)	125		70 - 130

Lab Sample ID: MB 880-10593/5-A

Matrix: Solid

Analysis Batch: 10594

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10593

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		10/26/21 09:12	10/26/21 23:41	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		10/26/21 09:12	10/26/21 23:41	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		10/26/21 09:12	10/26/21 23:41	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		10/26/21 09:12	10/26/21 23:41	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		10/26/21 09:12	10/26/21 23:41	1

	MB	MB							
Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac			
4-Bromofluorobenzene (Surr)	110		70 - 130	10/26/21 09:12	10/26/21 23:41	1			
1,4-Difluorobenzene (Surr)	95		70 - 130	10/26/21 09:12	10/26/21 23:41	1			

Lab Sample ID: LCS 880-10593/1-A

Matrix: Solid

Analysis Batch: 10594

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 10593

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.1006		mg/Kg		101	70 - 130
Toluene	0.100	0.09131		mg/Kg		91	70 - 130
Ethylbenzene	0.100	0.08984		mg/Kg		90	70 - 130
m-Xylene & p-Xylene	0.200	0.1840		mg/Kg		92	70 - 130
o-Xylene	0.100	0.09319		mg/Kg		93	70 - 130

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	107		70 - 130
1,4-Difluorobenzene (Surr)	107		70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCSD 880-10593/2-A

Matrix: Solid

Analysis Batch: 10594

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 10593

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.09287		mg/Kg		93	70 - 130	8	35
Toluene	0.100	0.08177		mg/Kg		82	70 - 130	11	35
Ethylbenzene	0.100	0.08158		mg/Kg		82	70 - 130	10	35
m-Xylene & p-Xylene	0.200	0.1675		mg/Kg		84	70 - 130	9	35
o-Xylene	0.100	0.08487		mg/Kg		85	70 - 130	9	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	104		70 - 130
1,4-Difluorobenzene (Surr)	107		70 - 130

Lab Sample ID: 880-7548-A-1-B MS

Matrix: Solid

Analysis Batch: 10594

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 10593

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.000616	J	0.101	0.07091		mg/Kg		70	70 - 130		
Toluene	<0.000454	U F1	0.101	0.06471	F1	mg/Kg		64	70 - 130		
Ethylbenzene	<0.000563	U F1	0.101	0.06192	F1	mg/Kg		61	70 - 130		
m-Xylene & p-Xylene	<0.00101	U F1	0.202	0.1307	F1	mg/Kg		65	70 - 130		
o-Xylene	<0.000343	U F1	0.101	0.06601	F1	mg/Kg		65	70 - 130		

Surrogate	MS %Recovery	MS Qualifier	Limits
4-Bromofluorobenzene (Surr)	106		70 - 130
1,4-Difluorobenzene (Surr)	104		70 - 130

Lab Sample ID: 880-7548-A-1-C MSD

Matrix: Solid

Analysis Batch: 10594

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 10593

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.000616	J	0.101	0.08348		mg/Kg		82	70 - 130	16	35
Toluene	<0.000454	U F1	0.101	0.07281		mg/Kg		72	70 - 130	12	35
Ethylbenzene	<0.000563	U F1	0.101	0.07175		mg/Kg		71	70 - 130	15	35
m-Xylene & p-Xylene	<0.00101	U F1	0.202	0.1509		mg/Kg		75	70 - 130	14	35
o-Xylene	<0.000343	U F1	0.101	0.07588		mg/Kg		75	70 - 130	14	35

Surrogate	MSD %Recovery	MSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	115		70 - 130
1,4-Difluorobenzene (Surr)	109		70 - 130

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 880-10137/1-A

Matrix: Solid

Analysis Batch: 10165

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10137

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	15.37	J	50.0	15.0	mg/Kg		10/21/21 15:22	10/22/21 09:08	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		10/21/21 15:22	10/22/21 09:08	1
Oil Range Organics (Over C28-C36)	18.26	J	50.0	15.0	mg/Kg		10/21/21 15:22	10/22/21 09:08	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	126		70 - 130				10/21/21 15:22	10/22/21 09:08	1
o-Terphenyl	135	S1+	70 - 130				10/21/21 15:22	10/22/21 09:08	1

Lab Sample ID: LCS 880-10137/2-A

Matrix: Solid

Analysis Batch: 10165

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 10137

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	1063		mg/Kg		106	70 - 130
Diesel Range Organics (Over C10-C28)	1000	1333	*+	mg/Kg		133	70 - 130
Surrogate	LCS %Recovery	LCS Qualifier	Limits				
1-Chlorooctane	117		70 - 130				
o-Terphenyl	112		70 - 130				

Lab Sample ID: LCSD 880-10137/3-A

Matrix: Solid

Analysis Batch: 10165

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 10137

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	896.8		mg/Kg		90	70 - 130	17	20
Diesel Range Organics (Over C10-C28)	1000	1093		mg/Kg		109	70 - 130	20	20
Surrogate	LCSD %Recovery	LCSD Qualifier	Limits						
1-Chlorooctane	103		70 - 130						
o-Terphenyl	95		70 - 130						

Lab Sample ID: 880-7252-A-1-H MS

Matrix: Solid

Analysis Batch: 10165

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 10137

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	35.9	J B F2	999	874.9		mg/Kg		84	70 - 130
Diesel Range Organics (Over C10-C28)	<15.0	U *+	999	990.0		mg/Kg		99	70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

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

Lab Sample ID: 880-7252-A-1-H MS

Matrix: Solid

Analysis Batch: 10165

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 10137

	MS	MS	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	121		70 - 130
o-Terphenyl	121		70 - 130

Lab Sample ID: 880-7252-A-1-I MSD

Matrix: Solid

Analysis Batch: 10165

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 10137

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	35.9	J B F2	1000	1132	F2	mg/Kg		110	70 - 130	26	20
Diesel Range Organics (Over C10-C28)	<15.0	U *+	1000	1183		mg/Kg		118	70 - 130	18	20

	MSD	MSD	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	149	S1+	70 - 130
o-Terphenyl	139	S1+	70 - 130

Lab Sample ID: MB 880-10766/1-A

Matrix: Solid

Analysis Batch: 10808

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10766

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	15.41	J	50.0	15.0	mg/Kg		10/27/21 16:03	10/28/21 10:00	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		10/27/21 16:03	10/28/21 10:00	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		10/27/21 16:03	10/28/21 10:00	1

	MB	MB							
Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac			
1-Chlorooctane	115		70 - 130	10/27/21 16:03	10/28/21 10:00	1			
o-Terphenyl	115		70 - 130	10/27/21 16:03	10/28/21 10:00	1			

Lab Sample ID: LCS 880-10766/2-A

Matrix: Solid

Analysis Batch: 10808

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 10766

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	774.2		mg/Kg		77	70 - 130
Diesel Range Organics (Over C10-C28)	1000	997.5		mg/Kg		100	70 - 130

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	94		70 - 130
o-Terphenyl	90		70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

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

Lab Sample ID: LCSD 880-10766/3-A

Matrix: Solid

Analysis Batch: 10808

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 10766

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	802.4		mg/Kg		80	70 - 130	4	20
Diesel Range Organics (Over C10-C28)	1000	954.5		mg/Kg		95	70 - 130	4	20
Surrogate	LCSD %Recovery	LCSD Qualifier	Limits						
1-Chlorooctane	83		70 - 130						
o-Terphenyl	77		70 - 130						

Lab Sample ID: 890-1485-A-1-F MS

Matrix: Solid

Analysis Batch: 10808

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 10766

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	997	961.6		mg/Kg		96	70 - 130		
Diesel Range Organics (Over C10-C28)	35.8	J	997	997.5		mg/Kg		96	70 - 130		
Surrogate	MS %Recovery	MS Qualifier	Limits								
1-Chlorooctane	104		70 - 130								
o-Terphenyl	97		70 - 130								

Lab Sample ID: 890-1485-A-1-G MSD

Matrix: Solid

Analysis Batch: 10808

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 10766

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	1000	991.3		mg/Kg		99	70 - 130	3	20
Diesel Range Organics (Over C10-C28)	35.8	J	1000	966.9		mg/Kg		93	70 - 130	3	20
Surrogate	MSD %Recovery	MSD Qualifier	Limits								
1-Chlorooctane	107		70 - 130								
o-Terphenyl	92		70 - 130								

Lab Sample ID: MB 880-10910/1-A

Matrix: Solid

Analysis Batch: 10885

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10910

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		10/29/21 09:34	10/29/21 19:59	1
Diesel Range Organics (Over C10-C28)	23.79	J	50.0	15.0	mg/Kg		10/29/21 09:34	10/29/21 19:59	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		10/29/21 09:34	10/29/21 19:59	1

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

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

Lab Sample ID: MB 880-10910/1-A

Matrix: Solid

Analysis Batch: 10885

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 10910

	MB	MB								
Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac				
1-Chlorooctane	116		70 - 130	10/29/21 09:34	10/29/21 19:59	1				
o-Terphenyl	126		70 - 130	10/29/21 09:34	10/29/21 19:59	1				

Lab Sample ID: LCS 880-10910/2-A

Matrix: Solid

Analysis Batch: 10885

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 10910

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Gasoline Range Organics (GRO)-C6-C10			1000	1098		mg/Kg		110	70 - 130		
Diesel Range Organics (Over C10-C28)			1000	992.5		mg/Kg		99	70 - 130		
Surrogate	LCS	LCS									
	%Recovery	Qualifier	Limits								
1-Chlorooctane	116		70 - 130								
o-Terphenyl	116		70 - 130								

Lab Sample ID: LCSD 880-10910/3-A

Matrix: Solid

Analysis Batch: 10885

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 10910

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10			1000	1115		mg/Kg		112	70 - 130	2	20
Diesel Range Organics (Over C10-C28)			1000	996.5		mg/Kg		100	70 - 130	0	20
Surrogate	LCSD	LCSD									
	%Recovery	Qualifier	Limits								
1-Chlorooctane	138	S1+	70 - 130								
o-Terphenyl	111		70 - 130								

Lab Sample ID: 880-7523-A-1-G MS

Matrix: Solid

Analysis Batch: 10885

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 10910

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	997	973.1		mg/Kg		98	70 - 130		
Diesel Range Organics (Over C10-C28)	35.3	J B	997	819.5		mg/Kg		79	70 - 130		
Surrogate	MS	MS									
	%Recovery	Qualifier	Limits								
1-Chlorooctane	97		70 - 130								
o-Terphenyl	83		70 - 130								

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

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

Lab Sample ID: 880-7523-A-1-H MSD

Matrix: Solid

Analysis Batch: 10885

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 10910

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	1000	990.1		mg/Kg		99	70 - 130	2	20
Diesel Range Organics (Over C10-C28)	35.3	J B	1000	892.6		mg/Kg		86	70 - 130	9	20
Surrogate	MSD %Recovery	MSD Qualifier	Limits								
1-Chlorooctane	100		70 - 130								
o-Terphenyl	89		70 - 130								

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-9975/1-A

Matrix: Solid

Analysis Batch: 10221

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			10/23/21 10:34	1

Lab Sample ID: LCS 880-9975/2-A

Matrix: Solid

Analysis Batch: 10221

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	266.6		mg/Kg		107	90 - 110

Lab Sample ID: LCSD 880-9975/3-A

Matrix: Solid

Analysis Batch: 10221

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	250	261.0		mg/Kg		104	90 - 110	2	20

Lab Sample ID: 880-7038-A-21-B MS

Matrix: Solid

Analysis Batch: 10221

Client Sample ID: Matrix Spike

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	272		253	508.8		mg/Kg		94	90 - 110

Lab Sample ID: 880-7038-A-21-C MSD

Matrix: Solid

Analysis Batch: 10221

Client Sample ID: Matrix Spike Duplicate

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	272		253	508.0		mg/Kg		94	90 - 110	0	20

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

GC VOA

Prep Batch: 10004

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-10004/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 10005

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-8	AH4 - 1'	Total/NA	Solid	5035	
MB 880-10005/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-10005/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-10005/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
890-1445-A-41-B MS	Matrix Spike	Total/NA	Solid	5035	
890-1445-A-41-C MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	

Prep Batch: 10009

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-10009/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 10011

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-3	AH2 - 2'	Total/NA	Solid	5035	
880-7292-5	AH3 - 1'	Total/NA	Solid	5035	
880-7292-7	AH3 - 5'	Total/NA	Solid	5035	
MB 880-10011/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-10011/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-10011/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-7292-A-1-B MS	880-7292-A-1-B MS	Total/NA	Solid	5035	
880-7292-A-1-C MSD	880-7292-A-1-C MSD	Total/NA	Solid	5035	

Analysis Batch: 10194

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-8	AH4 - 1'	Total/NA	Solid	8021B	10005
MB 880-10004/5-A	Method Blank	Total/NA	Solid	8021B	10004
MB 880-10005/5-A	Method Blank	Total/NA	Solid	8021B	10005
LCS 880-10005/1-A	Lab Control Sample	Total/NA	Solid	8021B	10005
LCSD 880-10005/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	10005
890-1445-A-41-B MS	Matrix Spike	Total/NA	Solid	8021B	10005
890-1445-A-41-C MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	10005

Prep Batch: 10200

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-10200/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 10273

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-1	AH1 - 1'	Total/NA	Solid	5035	
880-7292-5	AH3 - 1'	Total/NA	Solid	5035	
880-7292-8	AH4 - 1'	Total/NA	Solid	5035	
MB 880-10273/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-10273/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-10273/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-7474-A-1-D MS	Matrix Spike	Total/NA	Solid	5035	
880-7474-A-1-E MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

GC VOA

Analysis Batch: 10332

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-3	AH2 - 2'	Total/NA	Solid	8021B	10011
880-7292-5	AH3 - 1'	Total/NA	Solid	8021B	10011
880-7292-7	AH3 - 5'	Total/NA	Solid	8021B	10011
MB 880-10009/5-A	Method Blank	Total/NA	Solid	8021B	10009
MB 880-10011/5-A	Method Blank	Total/NA	Solid	8021B	10011
LCS 880-10011/1-A	Lab Control Sample	Total/NA	Solid	8021B	10011
LCSD 880-10011/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	10011
880-7292-A-1-B MS	880-7292-A-1-B MS	Total/NA	Solid	8021B	10011
880-7292-A-1-C MSD	880-7292-A-1-C MSD	Total/NA	Solid	8021B	10011

Analysis Batch: 10341

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-1	AH1 - 1'	Total/NA	Solid	8021B	10273
880-7292-5	AH3 - 1'	Total/NA	Solid	8021B	10273
880-7292-8	AH4 - 1'	Total/NA	Solid	8021B	10273
MB 880-10273/5-A	Method Blank	Total/NA	Solid	8021B	10273
LCS 880-10273/1-A	Lab Control Sample	Total/NA	Solid	8021B	10273
LCSD 880-10273/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	10273
880-7474-A-1-D MS	Matrix Spike	Total/NA	Solid	8021B	10273
880-7474-A-1-E MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	10273

Analysis Batch: 10497

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-1	AH1 - 1'	Total/NA	Solid	Total BTEX	
880-7292-3	AH2 - 2'	Total/NA	Solid	Total BTEX	
880-7292-5	AH3 - 1'	Total/NA	Solid	Total BTEX	
880-7292-8	AH4 - 1'	Total/NA	Solid	Total BTEX	

Prep Batch: 10593

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-2	AH1 - 3'	Total/NA	Solid	5035	
880-7292-6	AH3 - 3'	Total/NA	Solid	5035	
880-7292-9	AH4 - 3'	Total/NA	Solid	5035	
MB 880-10593/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-10593/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-10593/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-7548-A-1-B MS	Matrix Spike	Total/NA	Solid	5035	
880-7548-A-1-C MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	

Analysis Batch: 10594

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-2	AH1 - 3'	Total/NA	Solid	8021B	10593
880-7292-6	AH3 - 3'	Total/NA	Solid	8021B	10593
880-7292-9	AH4 - 3'	Total/NA	Solid	8021B	10593
MB 880-10200/5-A	Method Blank	Total/NA	Solid	8021B	10200
MB 880-10593/5-A	Method Blank	Total/NA	Solid	8021B	10593
LCS 880-10593/1-A	Lab Control Sample	Total/NA	Solid	8021B	10593
LCSD 880-10593/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	10593
880-7548-A-1-B MS	Matrix Spike	Total/NA	Solid	8021B	10593
880-7548-A-1-C MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	10593

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

GC VOA

Analysis Batch: 11149

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-2	AH1 - 3'	Total/NA	Solid	Total BTEX	
880-7292-6	AH3 - 3'	Total/NA	Solid	Total BTEX	
880-7292-7	AH3 - 5'	Total/NA	Solid	Total BTEX	
880-7292-9	AH4 - 3'	Total/NA	Solid	Total BTEX	

GC Semi VOA

Prep Batch: 10137

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-1	AH1 - 1'	Total/NA	Solid	8015NM Prep	
880-7292-3	AH2 - 2'	Total/NA	Solid	8015NM Prep	
880-7292-5	AH3 - 1'	Total/NA	Solid	8015NM Prep	
880-7292-8	AH4 - 1'	Total/NA	Solid	8015NM Prep	
MB 880-10137/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-10137/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-10137/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-7252-A-1-H MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
880-7252-A-1-I MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

Analysis Batch: 10165

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-1	AH1 - 1'	Total/NA	Solid	8015B NM	10137
880-7292-3	AH2 - 2'	Total/NA	Solid	8015B NM	10137
880-7292-5	AH3 - 1'	Total/NA	Solid	8015B NM	10137
880-7292-8	AH4 - 1'	Total/NA	Solid	8015B NM	10137
MB 880-10137/1-A	Method Blank	Total/NA	Solid	8015B NM	10137
LCS 880-10137/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	10137
LCSD 880-10137/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	10137
880-7252-A-1-H MS	Matrix Spike	Total/NA	Solid	8015B NM	10137
880-7252-A-1-I MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	10137

Analysis Batch: 10533

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-1	AH1 - 1'	Total/NA	Solid	8015 NM	
880-7292-3	AH2 - 2'	Total/NA	Solid	8015 NM	
880-7292-5	AH3 - 1'	Total/NA	Solid	8015 NM	
880-7292-8	AH4 - 1'	Total/NA	Solid	8015 NM	

Prep Batch: 10766

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-2	AH1 - 3'	Total/NA	Solid	8015NM Prep	
880-7292-4	AH2 - 3'	Total/NA	Solid	8015NM Prep	
880-7292-6	AH3 - 3'	Total/NA	Solid	8015NM Prep	
MB 880-10766/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-10766/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-10766/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1485-A-1-F MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
890-1485-A-1-G MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

GC Semi VOA

Analysis Batch: 10808

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-2	AH1 - 3'	Total/NA	Solid	8015B NM	10766
880-7292-4	AH2 - 3'	Total/NA	Solid	8015B NM	10766
880-7292-6	AH3 - 3'	Total/NA	Solid	8015B NM	10766
MB 880-10766/1-A	Method Blank	Total/NA	Solid	8015B NM	10766
LCS 880-10766/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	10766
LCSD 880-10766/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	10766
890-1485-A-1-F MS	Matrix Spike	Total/NA	Solid	8015B NM	10766
890-1485-A-1-G MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	10766

Analysis Batch: 10885

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-7	AH3 - 5'	Total/NA	Solid	8015B NM	10910
880-7292-9	AH4 - 3'	Total/NA	Solid	8015B NM	10910
MB 880-10910/1-A	Method Blank	Total/NA	Solid	8015B NM	10910
LCS 880-10910/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	10910
LCSD 880-10910/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	10910
880-7523-A-1-G MS	Matrix Spike	Total/NA	Solid	8015B NM	10910
880-7523-A-1-H MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	10910

Prep Batch: 10910

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-7	AH3 - 5'	Total/NA	Solid	8015NM Prep	
880-7292-9	AH4 - 3'	Total/NA	Solid	8015NM Prep	
MB 880-10910/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-10910/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-10910/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-7523-A-1-G MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
880-7523-A-1-H MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

Analysis Batch: 10946

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-2	AH1 - 3'	Total/NA	Solid	8015 NM	
880-7292-4	AH2 - 3'	Total/NA	Solid	8015 NM	
880-7292-6	AH3 - 3'	Total/NA	Solid	8015 NM	

Analysis Batch: 11118

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-7	AH3 - 5'	Total/NA	Solid	8015 NM	
880-7292-9	AH4 - 3'	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 9975

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-1	AH1 - 1'	Soluble	Solid	DI Leach	
880-7292-3	AH2 - 2'	Soluble	Solid	DI Leach	
880-7292-5	AH3 - 1'	Soluble	Solid	DI Leach	
880-7292-8	AH4 - 1'	Soluble	Solid	DI Leach	
MB 880-9975/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9975/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9975/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

HPLC/IC (Continued)

Leach Batch: 9975 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7038-A-21-B MS	Matrix Spike	Soluble	Solid	DI Leach	
880-7038-A-21-C MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	

Analysis Batch: 10221

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7292-1	AH1 - 1'	Soluble	Solid	300.0	9975
880-7292-3	AH2 - 2'	Soluble	Solid	300.0	9975
880-7292-5	AH3 - 1'	Soluble	Solid	300.0	9975
880-7292-8	AH4 - 1'	Soluble	Solid	300.0	9975
MB 880-9975/1-A	Method Blank	Soluble	Solid	300.0	9975
LCS 880-9975/2-A	Lab Control Sample	Soluble	Solid	300.0	9975
LCSD 880-9975/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9975
880-7038-A-21-B MS	Matrix Spike	Soluble	Solid	300.0	9975
880-7038-A-21-C MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9975

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH1 - 1'

Lab Sample ID: 880-7292-1

Date Collected: 10/14/21 11:00

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	10273	10/22/21 16:35	MR	XEN MID
Total/NA	Analysis	8021B		100	5 mL	5 mL	10341	10/25/21 14:15	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			10497	10/25/21 15:44	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10533	10/25/21 19:23	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	10137	10/21/21 15:23	AM	XEN MID
Total/NA	Analysis	8015B NM		1			10165	10/22/21 16:18	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	9975	10/20/21 12:21	CH	XEN MID
Soluble	Analysis	300.0		1			10221	10/23/21 12:21	CH	XEN MID

Client Sample ID: AH1 - 3'

Lab Sample ID: 880-7292-2

Date Collected: 10/14/21 11:05

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.95 g	5 mL	10593	10/26/21 09:12	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	10594	10/27/21 06:52	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			11149	11/01/21 13:47	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10946	10/29/21 13:53	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	10766	10/27/21 16:03	DM	XEN MID
Total/NA	Analysis	8015B NM		1			10808	10/28/21 13:32	AJ	XEN MID

Client Sample ID: AH2 - 2'

Lab Sample ID: 880-7292-3

Date Collected: 10/14/21 11:20

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	10011	10/20/21 14:16	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	10332	10/24/21 16:03	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10497	10/25/21 15:44	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10533	10/25/21 19:23	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	10137	10/21/21 15:23	AM	XEN MID
Total/NA	Analysis	8015B NM		1			10165	10/22/21 16:39	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	9975	10/20/21 12:21	CH	XEN MID
Soluble	Analysis	300.0		1			10221	10/23/21 12:28	CH	XEN MID

Client Sample ID: AH2 - 3'

Lab Sample ID: 880-7292-4

Date Collected: 10/14/21 11:25

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			10946	10/29/21 13:53	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.05 g	10 mL	10766	10/27/21 16:03	DM	XEN MID
Total/NA	Analysis	8015B NM		1			10808	10/28/21 13:54	AJ	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH3 - 1'

Lab Sample ID: 880-7292-5

Date Collected: 10/14/21 11:55

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	10011	10/20/21 14:16	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	10332	10/24/21 16:24	KL	XEN MID
Total/NA	Prep	5035			4.96 g	5 mL	10273	10/22/21 16:35	MR	XEN MID
Total/NA	Analysis	8021B		100	5 mL	5 mL	10341	10/25/21 14:43	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			10497	10/25/21 15:44	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10533	10/25/21 19:23	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	10137	10/21/21 15:23	AM	XEN MID
Total/NA	Analysis	8015B NM		1			10165	10/22/21 17:00	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	9975	10/20/21 12:21	CH	XEN MID
Soluble	Analysis	300.0		1			10221	10/23/21 12:35	CH	XEN MID

Client Sample ID: AH3 - 3'

Lab Sample ID: 880-7292-6

Date Collected: 10/14/21 12:00

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.99 g	5 mL	10593	10/26/21 09:12	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	10594	10/27/21 07:12	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			11149	11/01/21 13:47	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10946	10/29/21 13:53	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	10766	10/27/21 16:03	DM	XEN MID
Total/NA	Analysis	8015B NM		1			10808	10/28/21 14:21	AJ	XEN MID

Client Sample ID: AH3 - 5'

Lab Sample ID: 880-7292-7

Date Collected: 10/14/21 12:05

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	10011	10/20/21 14:16	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	10332	10/24/21 16:45	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			11149	11/01/21 13:47	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			11118	11/01/21 12:32	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	10910	10/28/21 09:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			10885	10/30/21 02:41	AJ	XEN MID

Client Sample ID: AH4 - 1'

Lab Sample ID: 880-7292-8

Date Collected: 10/14/21 12:40

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	10005	10/20/21 14:01	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	10194	10/25/21 00:19	MR	XEN MID
Total/NA	Prep	5035			4.97 g	5 mL	10273	10/22/21 16:35	MR	XEN MID
Total/NA	Analysis	8021B		100	5 mL	5 mL	10341	10/25/21 15:10	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			10497	10/25/21 15:44	AJ	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Client Sample ID: AH4 - 1'

Lab Sample ID: 880-7292-8

Date Collected: 10/14/21 12:40

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			10533	10/25/21 19:23	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	10137	10/21/21 15:23	AM	XEN MID
Total/NA	Analysis	8015B NM		1			10165	10/22/21 17:21	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	9975	10/20/21 12:21	CH	XEN MID
Soluble	Analysis	300.0		1			10221	10/23/21 12:43	CH	XEN MID

Client Sample ID: AH4 - 3'

Lab Sample ID: 880-7292-9

Date Collected: 10/14/21 12:45

Matrix: Solid

Date Received: 10/18/21 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.99 g	5 mL	10593	10/26/21 09:12	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	10594	10/27/21 07:33	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			11149	11/01/21 13:47	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			11118	11/01/21 12:32	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.04 g	10 mL	10910	10/28/21 09:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			10885	10/30/21 03:02	AJ	XEN MID

Laboratory References:

XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Accreditation/Certification Summary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Laboratory: Eurofins Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Program	Identification Number	Expiration Date
Texas	NELAP	T104704400-21-22	06-30-22

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
8015 NM		Solid	Total TPH
Total BTEX		Solid	Total BTEX

Method Summary

Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

Protocol References:

ASTM = ASTM International

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

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

TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

Laboratory References:

XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Midland

Sample Summary

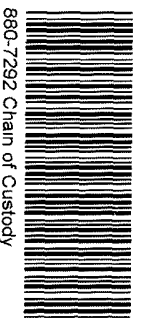
Client: GHD Services Inc.
Project/Site: Snapping Pump Site - 12565619

Job ID: 880-7292-1
SDG: Eddy County NM

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
880-7292-1	AH1 - 1'	Solid	10/14/21 11:00	10/18/21 09:45
880-7292-2	AH1 - 3'	Solid	10/14/21 11:05	10/18/21 09:45
880-7292-3	AH2 - 2'	Solid	10/14/21 11:20	10/18/21 09:45
880-7292-4	AH2 - 3'	Solid	10/14/21 11:25	10/18/21 09:45
880-7292-5	AH3 - 1'	Solid	10/14/21 11:55	10/18/21 09:45
880-7292-6	AH3 - 3'	Solid	10/14/21 12:00	10/18/21 09:45
880-7292-7	AH3 - 5'	Solid	10/14/21 12:05	10/18/21 09:45
880-7292-8	AH4 - 1'	Solid	10/14/21 12:40	10/18/21 09:45
880-7292-9	AH4 - 3'	Solid	10/14/21 12:45	10/18/21 09:45

Xenoco Laboratories

The Environmental Lab of Texas



880-7292 Chain of Custody

ORD AND ANALYSIS REQUEST

 Phone: 432-563-1800
 Fax: 432-563-1713

Project Manager

Becky Hoskell

Company Name

GHD "Direct Bill to Texans"

Company Address

2135 S Loop 250 W.

City/State/Zip

Midland, TX 79703

Telephone No

(432) 686-0086

Sample Signature

e-mail

Becky.Hoskell@GHD.COM
ALGroves@PALB.COM

Report Format.

☒ Standard☐ TRRP☐ NPDES

Project Name

Snapping Pump Site

Project #:

12565619

Project Loc

Eddy County, NM

PO #:

N/A

(Lab use only)

OKDI R #:

7292

(ALCO 887 18) E 47

FIELD CODE

Beginning Depth

Ending Depth

Date Sampled

Time Sampled

Field Filtered

Total # of Containers

Ice

HNO₃

HCl

H₂SO₄

NaOH

Na₂S₂O₃

None

Other (Specify)

DW=Drinking Water SL=Sludge

GW = Groundwater S=Soil/Solid

NP=Non-Potable Specify Other

TPH 418 1 8015M 8015E

TPH TX 1005 TX 1006

Cations (Ca Mg Na K)

Anions (Cl SO₄ Alkalinity)

SAR / ESP / CEC

Metals: As Ag Ba Cd Cr Pb Hg Se

Volatiles

Semivolatiles

BTEX 8021B/5030 or BTEX 8260

RCI

NORM

Chlorides 300

RUSH TAT (Pre-Schedule) 24 48 72 hrs

Standard TAT

 AH1-1'
 AH1-3'
 AH2-2'
 AH2-3'
 AH3-1'
 AH3-3'
 AH3-5'
 AH4-1'
 AH4-3'

 10/14/21
 1100
 1105
 1120
 1125
 1155
 1200
 1205
 1240
 1245

 X
 X
 X
 X
 X
 X
 X
 X
 X
 X

 X
 X
 X
 X
 X
 X
 X
 X
 X
 X

Special Instructions

"Run Samples until Benzene is below 10mg/kg, BTEX below 50, TPH below 100 & Chloride below 600 from shallowest deepest sample"

Relinquished by

Date

10/15/21

Time

900

Received by

Date

10/15/21

Time

900

Relinquished by

Date

10/15/21

Time

900

Received by

Date

10/15/21

Time

900

Relinquished by

Date

10/15/21

Time

900

Received by

Date

10/15/21

Time

900

Laboratory Comments.

Sample Containers Intact?

VOCs Free of Headspace?

Labels on container(s)

Custody seals on container(s)

Sample Hand Delivered

by Sampler/Client Rep?

by Courier?

UPS

DHL

FedEx

As Read

Corrected

Login Sample Receipt Checklist

Client: GHD Services Inc.

Job Number: 880-7292-1
SDG Number: Eddy County NM

Login Number: 7292

List Number: 1

Creator: Kramer, Jessica

List Source: Eurofins Midland

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
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	
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 <6mm (1/4").	N/A	



Environment Testing America

ANALYTICAL REPORT

Eurofins Xenco, Midland
1211 W. Florida Ave
Midland, TX 79701
Tel: (432)704-5440

Laboratory Job ID: 880-9353-1

Laboratory Sample Delivery Group: Eddy County, NM
Client Project/Site: Snapping Pumps

For:

GHD Services Inc.
2135 South Loop 250 West
Midland, Texas 79703

Attn: Becky Haskell

A handwritten signature in black ink that reads "Debbie Simmons".

Authorized for release by:
12/28/2021 10:06:41 AM

Debbie Simmons, Project Manager
(832)986-6768
debbie.simmons@eurofinset.com

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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.

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Laboratory Job ID: 880-9353-1
SDG: Eddy County, NM

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Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Qualifiers

GC VOA

Qualifier	Qualifier Description
F1	MS and/or MSD recovery exceeds control limits.
F2	MS/MSD RPD exceeds control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
S1-	Surrogate recovery exceeds control limits, low biased.
S1+	Surrogate recovery exceeds control limits, high biased.
U	Indicates the analyte was analyzed for but not detected.

GC Semi VOA

Qualifier	Qualifier Description
B	Compound was found in the blank and sample.
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.

HPLC/IC

Qualifier	Qualifier Description
F1	MS and/or MSD recovery exceeds control 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.

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)
TEQ	Toxicity Equivalent Quotient (Dioxin)

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Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Glossary (Continued)

Abbreviation	These commonly used abbreviations may or may not be present in this report.
TNTC	Too Numerous To Count

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

Case Narrative

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Job ID: 880-9353-1

Laboratory: Eurofins Xenco, Midland

Narrative

Job Narrative
880-9353-1

Receipt

The samples were received on 12/14/2021 3:44 PM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 9.8°C

GC VOA

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

GC Semi VOA

Method 8015MOD_NM: The method blank for preparation batch 880-14812 and analytical batch 880-15015 contained Gasoline Range Organics (GRO)-C6-C10 above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

HPLC/IC

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-1

Lab Sample ID: 880-9353-1

Date Collected: 12/13/21 11:30

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000384	U	0.00200	0.000384	mg/Kg		12/15/21 08:29	12/15/21 22:47	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg		12/15/21 08:29	12/15/21 22:47	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		12/15/21 08:29	12/15/21 22:47	1
m-Xylene & p-Xylene	<0.00101	U F1 F2	0.00399	0.00101	mg/Kg		12/15/21 08:29	12/15/21 22:47	1
o-Xylene	<0.000343	U	0.00200	0.000343	mg/Kg		12/15/21 08:29	12/15/21 22:47	1
Xylenes, Total	<0.00101	U F1	0.00399	0.00101	mg/Kg		12/15/21 08:29	12/15/21 22:47	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	121		70 - 130				12/15/21 08:29	12/15/21 22:47	1
1,4-Difluorobenzene (Surr)	105		70 - 130				12/15/21 08:29	12/15/21 22:47	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00399	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	56.4		50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	37.6	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 11:08	1
Diesel Range Organics (Over C10-C28)	18.8	J	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 11:08	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 11:08	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	98		70 - 130				12/15/21 10:25	12/17/21 11:08	1
o-Terphenyl	96		70 - 130				12/15/21 10:25	12/17/21 11:08	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	37.0		4.98	0.855	mg/Kg			12/18/21 13:47	1

Client Sample ID: BH-2

Lab Sample ID: 880-9353-2

Date Collected: 12/13/21 11:35

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000981	J	0.00202	0.000388	mg/Kg		12/15/21 08:29	12/15/21 23:07	1
Toluene	0.00107	J	0.00202	0.000460	mg/Kg		12/15/21 08:29	12/15/21 23:07	1
Ethylbenzene	<0.000570	U	0.00202	0.000570	mg/Kg		12/15/21 08:29	12/15/21 23:07	1
m-Xylene & p-Xylene	<0.00102	U	0.00403	0.00102	mg/Kg		12/15/21 08:29	12/15/21 23:07	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		12/15/21 08:29	12/15/21 23:07	1
Xylenes, Total	<0.00102	U	0.00403	0.00102	mg/Kg		12/15/21 08:29	12/15/21 23:07	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	113		70 - 130				12/15/21 08:29	12/15/21 23:07	1
1,4-Difluorobenzene (Surr)	97		70 - 130				12/15/21 08:29	12/15/21 23:07	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-2

Lab Sample ID: 880-9353-2

Date Collected: 12/13/21 11:35

Matrix: Solid

Date Received: 12/14/21 15:44

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00205	J	0.00403	0.00102	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	31.6	J	49.9	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	31.6	J B	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 12:14	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 12:14	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 12:14	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	88		70 - 130				12/15/21 10:25	12/17/21 12:14	1
o-Terphenyl	89		70 - 130				12/15/21 10:25	12/17/21 12:14	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.17		4.99	0.857	mg/Kg			12/18/21 13:53	1

Client Sample ID: BH-3

Lab Sample ID: 880-9353-3

Date Collected: 12/13/21 11:40

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		12/15/21 08:29	12/15/21 23:27	1
Toluene	0.000864	J	0.00199	0.000454	mg/Kg		12/15/21 08:29	12/15/21 23:27	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		12/15/21 08:29	12/15/21 23:27	1
m-Xylene & p-Xylene	<0.00101	U	0.00398	0.00101	mg/Kg		12/15/21 08:29	12/15/21 23:27	1
o-Xylene	0.000940	J	0.00199	0.000343	mg/Kg		12/15/21 08:29	12/15/21 23:27	1
Xylenes, Total	<0.00101	U	0.00398	0.00101	mg/Kg		12/15/21 08:29	12/15/21 23:27	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	112		70 - 130				12/15/21 08:29	12/15/21 23:27	1
1,4-Difluorobenzene (Surr)	92		70 - 130				12/15/21 08:29	12/15/21 23:27	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00180	J	0.00398	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	33.7	J	50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	33.7	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 12:35	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 12:35	1

Eurofins Xenco, Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-3

Lab Sample ID: 880-9353-3

Date Collected: 12/13/21 11:40

Matrix: Solid

Date Received: 12/14/21 15:44

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 12:35	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	89		70 - 130				12/15/21 10:25	12/17/21 12:35	1
o-Terphenyl	90		70 - 130				12/15/21 10:25	12/17/21 12:35	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	226		4.95	0.850	mg/Kg			12/18/21 14:13	1

Client Sample ID: BH-4

Lab Sample ID: 880-9353-4

Date Collected: 12/13/21 11:45

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000745	J	0.00199	0.000383	mg/Kg		12/15/21 08:29	12/15/21 23:48	1
Toluene	<0.000454	U	0.00199	0.000454	mg/Kg		12/15/21 08:29	12/15/21 23:48	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		12/15/21 08:29	12/15/21 23:48	1
m-Xylene & p-Xylene	0.00178	J	0.00398	0.00101	mg/Kg		12/15/21 08:29	12/15/21 23:48	1
o-Xylene	<0.000343	U	0.00199	0.000343	mg/Kg		12/15/21 08:29	12/15/21 23:48	1
Xylenes, Total	0.00178	J	0.00398	0.00101	mg/Kg		12/15/21 08:29	12/15/21 23:48	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	117		70 - 130				12/15/21 08:29	12/15/21 23:48	1
1,4-Difluorobenzene (Surr)	95		70 - 130				12/15/21 08:29	12/15/21 23:48	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00253	J	0.00398	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	32.4	J	50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	32.4	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 12:57	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 12:57	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 12:57	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	93		70 - 130				12/15/21 10:25	12/17/21 12:57	1
o-Terphenyl	94		70 - 130				12/15/21 10:25	12/17/21 12:57	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.22		5.00	0.858	mg/Kg			12/18/21 14:20	1

Eurofins Xenco, Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-5

Lab Sample ID: 880-9353-5

Date Collected: 12/13/21 11:50

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000386	U	0.00200	0.000386	mg/Kg	-	12/15/21 08:29	12/16/21 00:08	1
Toluene	0.00200		0.00200	0.000457	mg/Kg		12/15/21 08:29	12/16/21 00:08	1
Ethylbenzene	<0.000566	U	0.00200	0.000566	mg/Kg		12/15/21 08:29	12/16/21 00:08	1
m-Xylene & p-Xylene	<0.00101	U	0.00401	0.00101	mg/Kg		12/15/21 08:29	12/16/21 00:08	1
o-Xylene	0.000703	J	0.00200	0.000345	mg/Kg		12/15/21 08:29	12/16/21 00:08	1
Xylenes, Total	<0.00101	U	0.00401	0.00101	mg/Kg		12/15/21 08:29	12/16/21 00:08	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	124		70 - 130				12/15/21 08:29	12/16/21 00:08	1
1,4-Difluorobenzene (Surr)	96		70 - 130				12/15/21 08:29	12/16/21 00:08	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00270	J	0.00401	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	45.4	J	50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	45.4	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 13:19	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 13:19	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 13:19	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	120		70 - 130				12/15/21 10:25	12/17/21 13:19	1
o-Terphenyl	122		70 - 130				12/15/21 10:25	12/17/21 13:19	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	6.25		5.04	0.865	mg/Kg			12/18/21 14:27	1

Client Sample ID: BH-6

Lab Sample ID: 880-9353-6

Date Collected: 12/13/21 11:55

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000387	U	0.00201	0.000387	mg/Kg	-	12/15/21 08:29	12/16/21 00:29	1
Toluene	<0.000458	U	0.00201	0.000458	mg/Kg		12/15/21 08:29	12/16/21 00:29	1
Ethylbenzene	<0.000567	U	0.00201	0.000567	mg/Kg		12/15/21 08:29	12/16/21 00:29	1
m-Xylene & p-Xylene	<0.00101	U	0.00402	0.00101	mg/Kg		12/15/21 08:29	12/16/21 00:29	1
o-Xylene	<0.000345	U	0.00201	0.000345	mg/Kg		12/15/21 08:29	12/16/21 00:29	1
Xylenes, Total	<0.00101	U	0.00402	0.00101	mg/Kg		12/15/21 08:29	12/16/21 00:29	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	117		70 - 130				12/15/21 08:29	12/16/21 00:29	1
1,4-Difluorobenzene (Surr)	96		70 - 130				12/15/21 08:29	12/16/21 00:29	1

Eurofins Xenco, Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-6

Lab Sample ID: 880-9353-6

Date Collected: 12/13/21 11:55

Matrix: Solid

Date Received: 12/14/21 15:44

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00402	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	29.4	J	49.9	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	29.4	J B	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 13:41	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 13:41	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 13:41	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	96		70 - 130				12/15/21 10:25	12/17/21 13:41	1
o-Terphenyl	99		70 - 130				12/15/21 10:25	12/17/21 13:41	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	5.41		4.98	0.855	mg/Kg			12/18/21 14:33	1

Client Sample ID: BH-7

Lab Sample ID: 880-9353-7

Date Collected: 12/13/21 12:00

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		12/15/21 08:29	12/16/21 00:49	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		12/15/21 08:29	12/16/21 00:49	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		12/15/21 08:29	12/16/21 00:49	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		12/15/21 08:29	12/16/21 00:49	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		12/15/21 08:29	12/16/21 00:49	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		12/15/21 08:29	12/16/21 00:49	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	121		70 - 130				12/15/21 08:29	12/16/21 00:49	1
1,4-Difluorobenzene (Surr)	88		70 - 130				12/15/21 08:29	12/16/21 00:49	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00400	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	39.6	J	50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	39.6	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 14:03	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 14:03	1

Eurofins Xenco, Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-7

Lab Sample ID: 880-9353-7

Date Collected: 12/13/21 12:00

Matrix: Solid

Date Received: 12/14/21 15:44

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 14:03	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	93		70 - 130				12/15/21 10:25	12/17/21 14:03	1
o-Terphenyl	95		70 - 130				12/15/21 10:25	12/17/21 14:03	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	71.1		4.98	0.855	mg/Kg			12/18/21 14:40	1

Client Sample ID: BH-8

Lab Sample ID: 880-9353-8

Date Collected: 12/13/21 12:10

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000384	U	0.00200	0.000384	mg/Kg		12/15/21 08:29	12/16/21 01:09	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg		12/15/21 08:29	12/16/21 01:09	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		12/15/21 08:29	12/16/21 01:09	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		12/15/21 08:29	12/16/21 01:09	1
o-Xylene	<0.000343	U	0.00200	0.000343	mg/Kg		12/15/21 08:29	12/16/21 01:09	1
Xylenes, Total	<0.00101	U	0.00399	0.00101	mg/Kg		12/15/21 08:29	12/16/21 01:09	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	127		70 - 130				12/15/21 08:29	12/16/21 01:09	1
1,4-Difluorobenzene (Surr)	102		70 - 130				12/15/21 08:29	12/16/21 01:09	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00399	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	55.2		50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	36.5	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 14:25	1
Diesel Range Organics (Over C10-C28)	18.7	J	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 14:25	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 14:25	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	90		70 - 130				12/15/21 10:25	12/17/21 14:25	1
o-Terphenyl	90		70 - 130				12/15/21 10:25	12/17/21 14:25	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	6.02	F1	4.95	0.850	mg/Kg			12/18/21 14:47	1

Eurofins Xenco, Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-9

Lab Sample ID: 880-9353-9

Date Collected: 12/13/21 12:15

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000399	J	0.00202	0.000388	mg/Kg		12/15/21 08:29	12/16/21 01:30	1
Toluene	0.00107	J	0.00202	0.000460	mg/Kg		12/15/21 08:29	12/16/21 01:30	1
Ethylbenzene	<0.000570	U	0.00202	0.000570	mg/Kg		12/15/21 08:29	12/16/21 01:30	1
m-Xylene & p-Xylene	0.00146	J	0.00403	0.00102	mg/Kg		12/15/21 08:29	12/16/21 01:30	1
o-Xylene	0.000711	J	0.00202	0.000347	mg/Kg		12/15/21 08:29	12/16/21 01:30	1
Xylenes, Total	0.00217	J	0.00403	0.00102	mg/Kg		12/15/21 08:29	12/16/21 01:30	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	55	S1-	70 - 130	12/15/21 08:29	12/16/21 01:30	1
1,4-Difluorobenzene (Surr)	93		70 - 130	12/15/21 08:29	12/16/21 01:30	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00364	J	0.00403	0.00102	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	23.7	J	49.9	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	23.7	J B	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 14:47	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 14:47	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 14:47	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	90		70 - 130				12/15/21 10:25	12/17/21 14:47	1
o-Terphenyl	90		70 - 130				12/15/21 10:25	12/17/21 14:47	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	15.6		5.01	0.860	mg/Kg			12/18/21 15:07	1

Client Sample ID: BH-10

Lab Sample ID: 880-9353-10

Date Collected: 12/13/21 12:30

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00110	J	0.00199	0.000383	mg/Kg		12/15/21 08:29	12/16/21 01:50	1
Toluene	<0.000453	U	0.00199	0.000453	mg/Kg		12/15/21 08:29	12/16/21 01:50	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		12/15/21 08:29	12/16/21 01:50	1
m-Xylene & p-Xylene	<0.00100	U	0.00398	0.00100	mg/Kg		12/15/21 08:29	12/16/21 01:50	1
o-Xylene	0.000510	J	0.00199	0.000342	mg/Kg		12/15/21 08:29	12/16/21 01:50	1
Xylenes, Total	<0.00100	U	0.00398	0.00100	mg/Kg		12/15/21 08:29	12/16/21 01:50	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	120		70 - 130	12/15/21 08:29	12/16/21 01:50	1
1,4-Difluorobenzene (Surr)	89		70 - 130	12/15/21 08:29	12/16/21 01:50	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-10

Lab Sample ID: 880-9353-10

Date Collected: 12/13/21 12:30

Matrix: Solid

Date Received: 12/14/21 15:44

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00161	J	0.00398	0.00100	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	34.0	J	49.9	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	34.0	J B	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 15:08	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 15:08	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 15:08	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	90		70 - 130				12/15/21 10:25	12/17/21 15:08	1
o-Terphenyl	89		70 - 130				12/15/21 10:25	12/17/21 15:08	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	7.98		4.97	0.853	mg/Kg			12/18/21 15:14	1

Client Sample ID: BH-13

Lab Sample ID: 880-9353-11

Date Collected: 12/13/21 12:30

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000387	U	0.00201	0.000387	mg/Kg		12/15/21 08:29	12/16/21 03:40	1
Toluene	<0.000459	U	0.00201	0.000459	mg/Kg		12/15/21 08:29	12/16/21 03:40	1
Ethylbenzene	<0.000568	U	0.00201	0.000568	mg/Kg		12/15/21 08:29	12/16/21 03:40	1
m-Xylene & p-Xylene	<0.00102	U	0.00402	0.00102	mg/Kg		12/15/21 08:29	12/16/21 03:40	1
o-Xylene	<0.000346	U	0.00201	0.000346	mg/Kg		12/15/21 08:29	12/16/21 03:40	1
Xylenes, Total	<0.00102	U	0.00402	0.00102	mg/Kg		12/15/21 08:29	12/16/21 03:40	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	100		70 - 130				12/15/21 08:29	12/16/21 03:40	1
1,4-Difluorobenzene (Surr)	80		70 - 130				12/15/21 08:29	12/16/21 03:40	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00402	0.00102	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	47.9	J	50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	47.9	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 15:52	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 15:52	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-13

Lab Sample ID: 880-9353-11

Date Collected: 12/13/21 12:30

Matrix: Solid

Date Received: 12/14/21 15:44

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 15:52	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	106		70 - 130				12/15/21 10:25	12/17/21 15:52	1
o-Terphenyl	105		70 - 130				12/15/21 10:25	12/17/21 15:52	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	4.92	J	4.98	0.855	mg/Kg			12/18/21 15:34	1

Client Sample ID: BH-12

Lab Sample ID: 880-9353-12

Date Collected: 12/13/21 12:25

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		12/15/21 08:29	12/16/21 04:00	1
Toluene	<0.000454	U	0.00199	0.000454	mg/Kg		12/15/21 08:29	12/16/21 04:00	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		12/15/21 08:29	12/16/21 04:00	1
m-Xylene & p-Xylene	<0.00101	U	0.00398	0.00101	mg/Kg		12/15/21 08:29	12/16/21 04:00	1
o-Xylene	<0.000343	U	0.00199	0.000343	mg/Kg		12/15/21 08:29	12/16/21 04:00	1
Xylenes, Total	<0.00101	U	0.00398	0.00101	mg/Kg		12/15/21 08:29	12/16/21 04:00	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	103		70 - 130				12/15/21 08:29	12/16/21 04:00	1
1,4-Difluorobenzene (Surr)	88		70 - 130				12/15/21 08:29	12/16/21 04:00	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00398	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	32.6	J	49.8	14.9	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	32.6	J B	49.8	14.9	mg/Kg		12/15/21 10:25	12/17/21 16:13	1
Diesel Range Organics (Over C10-C28)	<14.9	U	49.8	14.9	mg/Kg		12/15/21 10:25	12/17/21 16:13	1
Oil Range Organics (Over C28-C36)	<14.9	U	49.8	14.9	mg/Kg		12/15/21 10:25	12/17/21 16:13	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	89		70 - 130				12/15/21 10:25	12/17/21 16:13	1
o-Terphenyl	90		70 - 130				12/15/21 10:25	12/17/21 16:13	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	5.76		4.95	0.850	mg/Kg			12/18/21 15:40	1

Eurofins Xenco, Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-11

Lab Sample ID: 880-9353-13

Date Collected: 12/13/21 12:20

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000387	U	0.00201	0.000387	mg/Kg		12/15/21 08:29	12/16/21 04:21	1
Toluene	<0.000458	U	0.00201	0.000458	mg/Kg		12/15/21 08:29	12/16/21 04:21	1
Ethylbenzene	<0.000567	U	0.00201	0.000567	mg/Kg		12/15/21 08:29	12/16/21 04:21	1
m-Xylene & p-Xylene	<0.00101	U	0.00402	0.00101	mg/Kg		12/15/21 08:29	12/16/21 04:21	1
o-Xylene	<0.000345	U	0.00201	0.000345	mg/Kg		12/15/21 08:29	12/16/21 04:21	1
Xylenes, Total	<0.00101	U	0.00402	0.00101	mg/Kg		12/15/21 08:29	12/16/21 04:21	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	102		70 - 130	12/15/21 08:29	12/16/21 04:21	1
1,4-Difluorobenzene (Surr)	102		70 - 130	12/15/21 08:29	12/16/21 04:21	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00402	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	32.1	J	50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	32.1	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 16:35	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 16:35	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 16:35	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	102		70 - 130				12/15/21 10:25	12/17/21 16:35	1
o-Terphenyl	103		70 - 130				12/15/21 10:25	12/17/21 16:35	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	8.69		5.00	0.858	mg/Kg			12/18/21 15:47	1

Client Sample ID: SW-1

Lab Sample ID: 880-9353-14

Date Collected: 12/13/21 12:45

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000387	U	0.00201	0.000387	mg/Kg		12/15/21 08:29	12/16/21 04:41	1
Toluene	<0.000459	U	0.00201	0.000459	mg/Kg		12/15/21 08:29	12/16/21 04:41	1
Ethylbenzene	<0.000568	U	0.00201	0.000568	mg/Kg		12/15/21 08:29	12/16/21 04:41	1
m-Xylene & p-Xylene	<0.00102	U	0.00402	0.00102	mg/Kg		12/15/21 08:29	12/16/21 04:41	1
o-Xylene	<0.000346	U	0.00201	0.000346	mg/Kg		12/15/21 08:29	12/16/21 04:41	1
Xylenes, Total	<0.00102	U	0.00402	0.00102	mg/Kg		12/15/21 08:29	12/16/21 04:41	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	98		70 - 130	12/15/21 08:29	12/16/21 04:41	1
1,4-Difluorobenzene (Surr)	85		70 - 130	12/15/21 08:29	12/16/21 04:41	1

Eurofins Xenco, Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: SW-1

Lab Sample ID: 880-9353-14

Date Collected: 12/13/21 12:45

Matrix: Solid

Date Received: 12/14/21 15:44

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00402	0.00102	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	36.7	J	50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	36.7	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 16:57	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 16:57	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 16:57	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	88		70 - 130				12/15/21 10:25	12/17/21 16:57	1
o-Terphenyl	85		70 - 130				12/15/21 10:25	12/17/21 16:57	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	7.69		5.01	0.860	mg/Kg			12/18/21 15:53	1

Client Sample ID: SW-2

Lab Sample ID: 880-9353-15

Date Collected: 12/13/21 12:50

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		12/15/21 08:29	12/16/21 05:02	1
Toluene	<0.000454	U	0.00199	0.000454	mg/Kg		12/15/21 08:29	12/16/21 05:02	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		12/15/21 08:29	12/16/21 05:02	1
m-Xylene & p-Xylene	<0.00101	U	0.00398	0.00101	mg/Kg		12/15/21 08:29	12/16/21 05:02	1
o-Xylene	<0.000343	U	0.00199	0.000343	mg/Kg		12/15/21 08:29	12/16/21 05:02	1
Xylenes, Total	<0.00101	U	0.00398	0.00101	mg/Kg		12/15/21 08:29	12/16/21 05:02	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	127		70 - 130				12/15/21 08:29	12/16/21 05:02	1
1,4-Difluorobenzene (Surr)	88		70 - 130				12/15/21 08:29	12/16/21 05:02	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00398	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	47.5	J	50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	29.6	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 17:18	1
Diesel Range Organics (Over C10-C28)	17.9	J	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 17:18	1

Eurofins Xenco, Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: SW-2

Lab Sample ID: 880-9353-15

Date Collected: 12/13/21 12:50

Matrix: Solid

Date Received: 12/14/21 15:44

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 17:18	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	91		70 - 130				12/15/21 10:25	12/17/21 17:18	1
o-Terphenyl	91		70 - 130				12/15/21 10:25	12/17/21 17:18	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	6.17		4.95	0.850	mg/Kg			12/18/21 16:00	1

Client Sample ID: SW-3

Lab Sample ID: 880-9353-16

Date Collected: 12/13/21 12:55

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00112	J	0.00200	0.000384	mg/Kg		12/15/21 08:29	12/16/21 05:22	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg		12/15/21 08:29	12/16/21 05:22	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		12/15/21 08:29	12/16/21 05:22	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		12/15/21 08:29	12/16/21 05:22	1
o-Xylene	0.00123	J	0.00200	0.000343	mg/Kg		12/15/21 08:29	12/16/21 05:22	1
Xylenes, Total	0.00123	J	0.00399	0.00101	mg/Kg		12/15/21 08:29	12/16/21 05:22	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	119		70 - 130				12/15/21 08:29	12/16/21 05:22	1
1,4-Difluorobenzene (Surr)	91		70 - 130				12/15/21 08:29	12/16/21 05:22	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00235	J	0.00399	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	29.9	J	49.9	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	29.9	J B	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 17:39	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 17:39	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 17:39	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	94		70 - 130				12/15/21 10:25	12/17/21 17:39	1
o-Terphenyl	96		70 - 130				12/15/21 10:25	12/17/21 17:39	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	6.63		5.04	0.865	mg/Kg			12/18/21 16:07	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: SW-4

Lab Sample ID: 880-9353-17

Date Collected: 12/13/21 13:00

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000384	U	0.00200	0.000384	mg/Kg		12/15/21 08:29	12/16/21 05:43	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg		12/15/21 08:29	12/16/21 05:43	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		12/15/21 08:29	12/16/21 05:43	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		12/15/21 08:29	12/16/21 05:43	1
o-Xylene	<0.000343	U	0.00200	0.000343	mg/Kg		12/15/21 08:29	12/16/21 05:43	1
Xylenes, Total	<0.00101	U	0.00399	0.00101	mg/Kg		12/15/21 08:29	12/16/21 05:43	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	132	S1+	70 - 130	12/15/21 08:29	12/16/21 05:43	1
1,4-Difluorobenzene (Surr)	78		70 - 130	12/15/21 08:29	12/16/21 05:43	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00399	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	29.1	J	50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	29.1	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 17:59	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 17:59	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 17:59	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	91		70 - 130				12/15/21 10:25	12/17/21 17:59	1
o-Terphenyl	94		70 - 130				12/15/21 10:25	12/17/21 17:59	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	6.04		5.00	0.858	mg/Kg			12/18/21 16:14	1

Client Sample ID: SW-5

Lab Sample ID: 880-9353-18

Date Collected: 12/13/21 13:05

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		12/15/21 08:29	12/16/21 06:03	1
Toluene	0.00137	J	0.00200	0.000456	mg/Kg		12/15/21 08:29	12/16/21 06:03	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		12/15/21 08:29	12/16/21 06:03	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		12/15/21 08:29	12/16/21 06:03	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		12/15/21 08:29	12/16/21 06:03	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		12/15/21 08:29	12/16/21 06:03	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	117		70 - 130	12/15/21 08:29	12/16/21 06:03	1
1,4-Difluorobenzene (Surr)	87		70 - 130	12/15/21 08:29	12/16/21 06:03	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: SW-5

Lab Sample ID: 880-9353-18

Date Collected: 12/13/21 13:05

Matrix: Solid

Date Received: 12/14/21 15:44

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00137	J	0.00400	0.00101	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	34.7	J	49.9	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	34.7	J B	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 18:20	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 18:20	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 18:20	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	93		70 - 130				12/15/21 10:25	12/17/21 18:20	1
o-Terphenyl	94		70 - 130				12/15/21 10:25	12/17/21 18:20	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.857	U	4.99	0.857	mg/Kg			12/17/21 21:40	1

Client Sample ID: SW-6

Lab Sample ID: 880-9353-19

Date Collected: 12/13/21 13:10

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000388	U	0.00202	0.000388	mg/Kg		12/15/21 08:29	12/16/21 06:23	1
Toluene	<0.000460	U	0.00202	0.000460	mg/Kg		12/15/21 08:29	12/16/21 06:23	1
Ethylbenzene	<0.000570	U	0.00202	0.000570	mg/Kg		12/15/21 08:29	12/16/21 06:23	1
m-Xylene & p-Xylene	<0.00102	U	0.00403	0.00102	mg/Kg		12/15/21 08:29	12/16/21 06:23	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		12/15/21 08:29	12/16/21 06:23	1
Xylenes, Total	<0.00102	U	0.00403	0.00102	mg/Kg		12/15/21 08:29	12/16/21 06:23	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	76		70 - 130				12/15/21 08:29	12/16/21 06:23	1
1,4-Difluorobenzene (Surr)	95		70 - 130				12/15/21 08:29	12/16/21 06:23	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00403	0.00102	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	82.2		50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	38.6	J B	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 18:41	1
Diesel Range Organics (Over C10-C28)	43.6	J	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 18:41	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: SW-6

Lab Sample ID: 880-9353-19

Date Collected: 12/13/21 13:10

Matrix: Solid

Date Received: 12/14/21 15:44

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 18:41	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	85		70 - 130				12/15/21 10:25	12/17/21 18:41	1
o-Terphenyl	83		70 - 130				12/15/21 10:25	12/17/21 18:41	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	4.38	J	4.95	0.850	mg/Kg			12/17/21 22:13	1

Client Sample ID: SW-7

Lab Sample ID: 880-9353-20

Date Collected: 12/13/21 13:15

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000389	U	0.00202	0.000389	mg/Kg		12/15/21 08:29	12/16/21 06:44	1
Toluene	<0.000461	U	0.00202	0.000461	mg/Kg		12/15/21 08:29	12/16/21 06:44	1
Ethylbenzene	<0.000571	U	0.00202	0.000571	mg/Kg		12/15/21 08:29	12/16/21 06:44	1
m-Xylene & p-Xylene	<0.00102	U	0.00404	0.00102	mg/Kg		12/15/21 08:29	12/16/21 06:44	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		12/15/21 08:29	12/16/21 06:44	1
Xylenes, Total	<0.00102	U	0.00404	0.00102	mg/Kg		12/15/21 08:29	12/16/21 06:44	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	120		70 - 130				12/15/21 08:29	12/16/21 06:44	1
1,4-Difluorobenzene (Surr)	101		70 - 130				12/15/21 08:29	12/16/21 06:44	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00404	0.00102	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	241		49.9	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	39.1	J B	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 19:01	1
Diesel Range Organics (Over C10-C28)	202		49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 19:01	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		12/15/21 10:25	12/17/21 19:01	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	92		70 - 130				12/15/21 10:25	12/17/21 19:01	1
o-Terphenyl	89		70 - 130				12/15/21 10:25	12/17/21 19:01	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.5		5.00	0.858	mg/Kg			12/17/21 22:24	1

Eurofins Xenco, Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: SW-8

Lab Sample ID: 880-9353-21

Date Collected: 12/13/21 13:20

Matrix: Solid

Date Received: 12/14/21 15:44

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg		12/15/21 07:30	12/16/21 03:44	1
Toluene	0.00135	J	0.00198	0.000451	mg/Kg		12/15/21 07:30	12/16/21 03:44	1
Ethylbenzene	0.000727	J	0.00198	0.000559	mg/Kg		12/15/21 07:30	12/16/21 03:44	1
m-Xylene & p-Xylene	0.00238	J	0.00396	0.00100	mg/Kg		12/15/21 07:30	12/16/21 03:44	1
o-Xylene	0.00119	J	0.00198	0.000341	mg/Kg		12/15/21 07:30	12/16/21 03:44	1
Xylenes, Total	0.00357	J	0.00396	0.00100	mg/Kg		12/15/21 07:30	12/16/21 03:44	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	120		70 - 130	12/15/21 07:30	12/16/21 03:44	1
1,4-Difluorobenzene (Surr)	107		70 - 130	12/15/21 07:30	12/16/21 03:44	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00565		0.00396	0.00100	mg/Kg			12/21/21 14:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	118		50.0	15.0	mg/Kg			12/27/21 14:12	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	22.3	J	50.0	15.0	mg/Kg		12/15/21 10:41	12/17/21 20:45	1
Diesel Range Organics (Over C10-C28)	95.5		50.0	15.0	mg/Kg		12/15/21 10:41	12/17/21 20:45	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:41	12/17/21 20:45	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	93		70 - 130	12/15/21 10:41	12/17/21 20:45	1
o-Terphenyl	95		70 - 130	12/15/21 10:41	12/17/21 20:45	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	6.19		5.04	0.865	mg/Kg			12/17/21 22:35	1

Eurofins Xenco, Midland

Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	BFB1 (70-130)	DFBZ1 (70-130)
880-9353-1	BH-1	121	105
880-9353-1 MS	BH-1	139 S1+	93
880-9353-1 MSD	BH-1	120	101
880-9353-2	BH-2	113	97
880-9353-3	BH-3	112	92
880-9353-4	BH-4	117	95
880-9353-5	BH-5	124	96
880-9353-6	BH-6	117	96
880-9353-7	BH-7	121	88
880-9353-8	BH-8	127	102
880-9353-9	BH-9	55 S1-	93
880-9353-10	BH-10	120	89
880-9353-11	BH-13	100	80
880-9353-12	BH-12	103	88
880-9353-13	BH-11	102	102
880-9353-14	SW-1	98	85
880-9353-15	SW-2	127	88
880-9353-16	SW-3	119	91
880-9353-17	SW-4	132 S1+	78
880-9353-18	SW-5	117	87
880-9353-19	SW-6	76	95
880-9353-20	SW-7	120	101
880-9353-21	SW-8	120	107
LCS 880-14781/1-A	Lab Control Sample	106	104
LCS 880-14804/1-A	Lab Control Sample	107	94
LCSD 880-14781/2-A	Lab Control Sample Dup	104	106
LCSD 880-14804/2-A	Lab Control Sample Dup	132 S1+	101
MB 880-14759/5-A	Method Blank	119	94
MB 880-14762/5-A	Method Blank	127	105
MB 880-14781/5-A	Method Blank	105	95
MB 880-14804/5-A	Method Blank	125	109

Surrogate Legend

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO1 (70-130)	OTPH1 (70-130)
880-9353-1	BH-1	98	96
880-9353-1 MS	BH-1	82	84
880-9353-1 MSD	BH-1	83	83
880-9353-2	BH-2	88	89
880-9353-3	BH-3	89	90
880-9353-4	BH-4	93	94
880-9353-5	BH-5	120	122
880-9353-6	BH-6	96	99

Eurofins Xenco, Midland

Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

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

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO1 (70-130)	OTPH1 (70-130)
880-9353-7	BH-7	93	95
880-9353-8	BH-8	90	90
880-9353-9	BH-9	90	90
880-9353-10	BH-10	90	89
880-9353-11	BH-13	106	105
880-9353-12	BH-12	89	90
880-9353-13	BH-11	102	103
880-9353-14	SW-1	88	85
880-9353-15	SW-2	91	91
880-9353-16	SW-3	94	96
880-9353-17	SW-4	91	94
880-9353-18	SW-5	93	94
880-9353-19	SW-6	85	83
880-9353-20	SW-7	92	89
880-9353-21	SW-8	93	95
880-9353-21 MS	SW-8	84	88
880-9353-21 MSD	SW-8	83	87
Surrogate Legend			
1CO = 1-Chlorooctane			
OTPH = o-Terphenyl			

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO2 (70-130)	OTPH2 (70-130)
LCS 880-14812/2-A	Lab Control Sample	96	103
LCS 880-14820/2-A	Lab Control Sample	98	104
LCSD 880-14812/3-A	Lab Control Sample Dup	108	116
LCSD 880-14820/3-A	Lab Control Sample Dup	108	115
MB 880-14812/1-A	Method Blank	110	112
MB 880-14820/1-A	Method Blank	119	121
Surrogate Legend			
1CO = 1-Chlorooctane			
OTPH = o-Terphenyl			

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-14759/5-A

Matrix: Solid

Analysis Batch: 14796

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 14759

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		12/14/21 12:00	12/15/21 10:42	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		12/14/21 12:00	12/15/21 10:42	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		12/14/21 12:00	12/15/21 10:42	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		12/14/21 12:00	12/15/21 10:42	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		12/14/21 12:00	12/15/21 10:42	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		12/14/21 12:00	12/15/21 10:42	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	119		70 - 130	12/14/21 12:00	12/15/21 10:42	1
1,4-Difluorobenzene (Surr)	94		70 - 130	12/14/21 12:00	12/15/21 10:42	1

Lab Sample ID: MB 880-14762/5-A

Matrix: Solid

Analysis Batch: 14797

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 14762

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		12/14/21 13:00	12/15/21 11:03	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		12/14/21 13:00	12/15/21 11:03	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		12/14/21 13:00	12/15/21 11:03	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		12/14/21 13:00	12/15/21 11:03	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		12/14/21 13:00	12/15/21 11:03	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		12/14/21 13:00	12/15/21 11:03	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	127		70 - 130	12/14/21 13:00	12/15/21 11:03	1
1,4-Difluorobenzene (Surr)	105		70 - 130	12/14/21 13:00	12/15/21 11:03	1

Lab Sample ID: MB 880-14781/5-A

Matrix: Solid

Analysis Batch: 14797

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 14781

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		12/15/21 07:30	12/15/21 21:56	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		12/15/21 07:30	12/15/21 21:56	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		12/15/21 07:30	12/15/21 21:56	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		12/15/21 07:30	12/15/21 21:56	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		12/15/21 07:30	12/15/21 21:56	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		12/15/21 07:30	12/15/21 21:56	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	105		70 - 130	12/15/21 07:30	12/15/21 21:56	1
1,4-Difluorobenzene (Surr)	95		70 - 130	12/15/21 07:30	12/15/21 21:56	1

Eurofins Xenco, Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCS 880-14781/1-A

Matrix: Solid

Analysis Batch: 14797

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 14781

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.08250		mg/Kg		82	70 - 130
Toluene	0.100	0.07543		mg/Kg		75	70 - 130
Ethylbenzene	0.100	0.07558		mg/Kg		76	70 - 130
m-Xylene & p-Xylene	0.200	0.1566		mg/Kg		78	70 - 130
o-Xylene	0.100	0.07945		mg/Kg		79	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	106		70 - 130
1,4-Difluorobenzene (Surr)	104		70 - 130

Lab Sample ID: LCSD 880-14781/2-A

Matrix: Solid

Analysis Batch: 14797

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 14781

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.08617		mg/Kg		86	70 - 130	4	35
Toluene	0.100	0.07850		mg/Kg		79	70 - 130	4	35
Ethylbenzene	0.100	0.07743		mg/Kg		77	70 - 130	2	35
m-Xylene & p-Xylene	0.200	0.1597		mg/Kg		80	70 - 130	2	35
o-Xylene	0.100	0.08121		mg/Kg		81	70 - 130	2	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	104		70 - 130
1,4-Difluorobenzene (Surr)	106		70 - 130

Lab Sample ID: MB 880-14804/5-A

Matrix: Solid

Analysis Batch: 14796

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 14804

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		12/15/21 08:29	12/15/21 22:18	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		12/15/21 08:29	12/15/21 22:18	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		12/15/21 08:29	12/15/21 22:18	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		12/15/21 08:29	12/15/21 22:18	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		12/15/21 08:29	12/15/21 22:18	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		12/15/21 08:29	12/15/21 22:18	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	125		70 - 130	12/15/21 08:29	12/15/21 22:18	1
1,4-Difluorobenzene (Surr)	109		70 - 130	12/15/21 08:29	12/15/21 22:18	1

Lab Sample ID: LCS 880-14804/1-A

Matrix: Solid

Analysis Batch: 14796

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 14804

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.08054		mg/Kg		81	70 - 130
Toluene	0.100	0.08227		mg/Kg		82	70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCS 880-14804/1-A

Matrix: Solid

Analysis Batch: 14796

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 14804

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethylbenzene	0.100	0.08459		mg/Kg		85	70 - 130
m-Xylene & p-Xylene	0.200	0.1629		mg/Kg		81	70 - 130
o-Xylene	0.100	0.08277		mg/Kg		83	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	107		70 - 130
1,4-Difluorobenzene (Surr)	94		70 - 130

Lab Sample ID: LCSD 880-14804/2-A

Matrix: Solid

Analysis Batch: 14796

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 14804

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.07437		mg/Kg		74	70 - 130	8	35
Toluene	0.100	0.08812		mg/Kg		88	70 - 130	7	35
Ethylbenzene	0.100	0.1023		mg/Kg		102	70 - 130	19	35
m-Xylene & p-Xylene	0.200	0.1836		mg/Kg		92	70 - 130	12	35
o-Xylene	0.100	0.09327		mg/Kg		93	70 - 130	12	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	132	S1+	70 - 130
1,4-Difluorobenzene (Surr)	101		70 - 130

Lab Sample ID: 880-9353-1 MS

Matrix: Solid

Analysis Batch: 14796

Client Sample ID: BH-1

Prep Type: Total/NA

Prep Batch: 14804

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	<0.000384	U	0.0996	0.08504		mg/Kg		85	70 - 130
Toluene	<0.000455	U	0.0996	0.09643		mg/Kg		97	70 - 130
Ethylbenzene	<0.000564	U	0.0996	0.09182		mg/Kg		92	70 - 130
m-Xylene & p-Xylene	<0.00101	U F1 F2	0.199	0.1120	F1	mg/Kg		56	70 - 130
o-Xylene	<0.000343	U	0.0996	0.07376		mg/Kg		74	70 - 130

Surrogate	MS %Recovery	MS Qualifier	Limits
4-Bromofluorobenzene (Surr)	139	S1+	70 - 130
1,4-Difluorobenzene (Surr)	93		70 - 130

Lab Sample ID: 880-9353-1 MSD

Matrix: Solid

Analysis Batch: 14796

Client Sample ID: BH-1

Prep Type: Total/NA

Prep Batch: 14804

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.000384	U	0.100	0.07431		mg/Kg		74	70 - 130	13	35
Toluene	<0.000455	U	0.100	0.08697		mg/Kg		87	70 - 130	10	35
Ethylbenzene	<0.000564	U	0.100	0.07951		mg/Kg		79	70 - 130	14	35
m-Xylene & p-Xylene	<0.00101	U F1 F2	0.200	0.1607	F2	mg/Kg		80	70 - 130	36	35
o-Xylene	<0.000343	U	0.100	0.07737		mg/Kg		77	70 - 130	5	35

Eurofins Xenco, Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Surrogate	MSD %Recovery	MSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	120		70 - 130
1,4-Difluorobenzene (Surr)	101		70 - 130

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 880-14812/1-A

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 14812

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Gasoline Range Organics (GRO)-C6-C10	15.27	J	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 10:03	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 10:03	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:25	12/17/21 10:03	1
Surrogate	MB	MB	Limits				Prepared	Analyzed	Dil Fac
	%Recovery	Qualifier							
1-Chlorooctane	110		70 - 130				12/15/21 10:25	12/17/21 10:03	1
o-Terphenyl	112		70 - 130				12/15/21 10:25	12/17/21 10:03	1

Lab Sample ID: LCS 880-14812/2-A

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 14812

Analyte			Spike	LCS	LCS	Unit	D	%Rec.		
			Added	Result	Qualifier			%Rec		
Gasoline Range Organics (GRO)-C6-C10			1000	857.8		mg/Kg		86	70 - 130	
Diesel Range Organics (Over C10-C28)			1000	895.5		mg/Kg		90	70 - 130	
Surrogate	LCS	LCS								
	%Recovery	Qualifier	Limits							
1-Chlorooctane	96		70 - 130							
o-Terphenyl	103		70 - 130							

Lab Sample ID: LCSD 880-14812/3-A

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 14812

			Spike	LCSD	LCSD				%Rec.	RPD	
Analyte			Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics (GRO)-C6-C10			1000	899.3		mg/Kg		90	70 - 130	5	20
Diesel Range Organics (Over C10-C28)			1000	945.2		mg/Kg		95	70 - 130	5	20
			LCSD	LCSD							
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	108		70 - 130								
o-Terphenyl	116		70 - 130								

Eurofins Xenco, Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

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

Lab Sample ID: 880-9353-1 MS

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: BH-1

Prep Type: Total/NA

Prep Batch: 14812

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	37.6	J B	996	1006		mg/Kg		97	70 - 130
Diesel Range Organics (Over C10-C28)	18.8	J	996	843.0		mg/Kg		83	70 - 130
Surrogate	MS %Recovery	MS Qualifier	Limits						
1-Chlorooctane	82		70 - 130						
o-Terphenyl	84		70 - 130						

Lab Sample ID: 880-9353-1 MSD

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: BH-1

Prep Type: Total/NA

Prep Batch: 14812

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	37.6	J B	995	997.4		mg/Kg		96	70 - 130	1	20
Diesel Range Organics (Over C10-C28)	18.8	J	995	833.5		mg/Kg		82	70 - 130	1	20
Surrogate	MSD %Recovery	MSD Qualifier	Limits								
1-Chlorooctane	83		70 - 130								
o-Terphenyl	83		70 - 130								

Lab Sample ID: MB 880-14820/1-A

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 14820

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:41	12/17/21 19:43	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:41	12/17/21 19:43	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		12/15/21 10:41	12/17/21 19:43	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	119		70 - 130				12/15/21 10:41	12/17/21 19:43	1
o-Terphenyl	121		70 - 130				12/15/21 10:41	12/17/21 19:43	1

Lab Sample ID: LCS 880-14820/2-A

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 14820

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	871.5		mg/Kg		87	70 - 130
Diesel Range Organics (Over C10-C28)	1000	909.9		mg/Kg		91	70 - 130

Eurofins Xenco, Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

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

Lab Sample ID: LCS 880-14820/2-A

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 14820

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	98		70 - 130
o-Terphenyl	104		70 - 130

Lab Sample ID: LCSD 880-14820/3-A

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 14820

			Spike	LCSD	LCSD				%Rec.		RPD
Analyte			Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics (GRO)-C6-C10			1000	921.3		mg/Kg		92	70 - 130	6	20
Diesel Range Organics (Over C10-C28)			1000	938.2		mg/Kg		94	70 - 130	3	20
	LCSD	LCSD									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	108		70 - 130								
o-Terphenyl	115		70 - 130								

Lab Sample ID: 880-9353-21 MS

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: SW-8

Prep Type: Total/NA

Prep Batch: 14820

	Sample	Sample	Spike	MS	MS				%Rec.		
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics (GRO)-C6-C10	22.3	J	996	1061		mg/Kg		104	70 - 130		
Diesel Range Organics (Over C10-C28)	95.5		996	931.0		mg/Kg		84	70 - 130		
	MS	MS									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	84		70 - 130								
o-Terphenyl	88		70 - 130								

Lab Sample ID: 880-9353-21 MSD

Matrix: Solid

Analysis Batch: 15015

Client Sample ID: SW-8

Prep Type: Total/NA

Prep Batch: 14820

	Sample	Sample	Spike	MSD	MSD				%Rec.		RPD
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics (GRO)-C6-C10	22.3	J	995	1057		mg/Kg		104	70 - 130	0	20
Diesel Range Organics (Over C10-C28)	95.5		995	924.9		mg/Kg		83	70 - 130	1	20
	MSD	MSD									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	83		70 - 130								
o-Terphenyl	87		70 - 130								

Eurofins Xenco, Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-14838/1-A

Matrix: Solid

Analysis Batch: 15047

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			12/18/21 12:53	1

Lab Sample ID: LCS 880-14838/2-A

Matrix: Solid

Analysis Batch: 15047

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	269.8		mg/Kg		108	90 - 110

Lab Sample ID: LCSD 880-14838/3-A

Matrix: Solid

Analysis Batch: 15047

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	250	275.0		mg/Kg		110	90 - 110	2	20

Lab Sample ID: 880-9353-8 MS

Matrix: Solid

Analysis Batch: 15047

Client Sample ID: BH-8

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	6.02	F1	248	305.4	F1	mg/Kg		121	90 - 110

Lab Sample ID: 880-9353-8 MSD

Matrix: Solid

Analysis Batch: 15047

Client Sample ID: BH-8

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	6.02	F1	248	303.2	F1	mg/Kg		120	90 - 110	1	20

Lab Sample ID: MB 880-14839/1-A

Matrix: Solid

Analysis Batch: 15070

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			12/17/21 15:25	1

Lab Sample ID: LCS 880-14839/2-A

Matrix: Solid

Analysis Batch: 15070

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	266.5		mg/Kg		107	90 - 110

Lab Sample ID: LCSD 880-14839/3-A

Matrix: Solid

Analysis Batch: 15070

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	250	252.7		mg/Kg		101	90 - 110	5	20

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

GC VOA

Prep Batch: 14759

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-14759/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 14762

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-14762/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 14781

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-21	SW-8	Total/NA	Solid	5035	
MB 880-14781/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-14781/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-14781/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Analysis Batch: 14796

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-1	BH-1	Total/NA	Solid	8021B	14804
880-9353-2	BH-2	Total/NA	Solid	8021B	14804
880-9353-3	BH-3	Total/NA	Solid	8021B	14804
880-9353-4	BH-4	Total/NA	Solid	8021B	14804
880-9353-5	BH-5	Total/NA	Solid	8021B	14804
880-9353-6	BH-6	Total/NA	Solid	8021B	14804
880-9353-7	BH-7	Total/NA	Solid	8021B	14804
880-9353-8	BH-8	Total/NA	Solid	8021B	14804
880-9353-9	BH-9	Total/NA	Solid	8021B	14804
880-9353-10	BH-10	Total/NA	Solid	8021B	14804
880-9353-11	BH-13	Total/NA	Solid	8021B	14804
880-9353-12	BH-12	Total/NA	Solid	8021B	14804
880-9353-13	BH-11	Total/NA	Solid	8021B	14804
880-9353-14	SW-1	Total/NA	Solid	8021B	14804
880-9353-15	SW-2	Total/NA	Solid	8021B	14804
880-9353-16	SW-3	Total/NA	Solid	8021B	14804
880-9353-17	SW-4	Total/NA	Solid	8021B	14804
880-9353-18	SW-5	Total/NA	Solid	8021B	14804
880-9353-19	SW-6	Total/NA	Solid	8021B	14804
880-9353-20	SW-7	Total/NA	Solid	8021B	14804
MB 880-14759/5-A	Method Blank	Total/NA	Solid	8021B	14759
MB 880-14804/5-A	Method Blank	Total/NA	Solid	8021B	14804
LCS 880-14804/1-A	Lab Control Sample	Total/NA	Solid	8021B	14804
LCSD 880-14804/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	14804
880-9353-1 MS	BH-1	Total/NA	Solid	8021B	14804
880-9353-1 MSD	BH-1	Total/NA	Solid	8021B	14804

Analysis Batch: 14797

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-21	SW-8	Total/NA	Solid	8021B	14781
MB 880-14762/5-A	Method Blank	Total/NA	Solid	8021B	14762
MB 880-14781/5-A	Method Blank	Total/NA	Solid	8021B	14781
LCS 880-14781/1-A	Lab Control Sample	Total/NA	Solid	8021B	14781
LCSD 880-14781/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	14781

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

GC VOA

Prep Batch: 14804

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-1	BH-1	Total/NA	Solid	5035	
880-9353-2	BH-2	Total/NA	Solid	5035	
880-9353-3	BH-3	Total/NA	Solid	5035	
880-9353-4	BH-4	Total/NA	Solid	5035	
880-9353-5	BH-5	Total/NA	Solid	5035	
880-9353-6	BH-6	Total/NA	Solid	5035	
880-9353-7	BH-7	Total/NA	Solid	5035	
880-9353-8	BH-8	Total/NA	Solid	5035	
880-9353-9	BH-9	Total/NA	Solid	5035	
880-9353-10	BH-10	Total/NA	Solid	5035	
880-9353-11	BH-13	Total/NA	Solid	5035	
880-9353-12	BH-12	Total/NA	Solid	5035	
880-9353-13	BH-11	Total/NA	Solid	5035	
880-9353-14	SW-1	Total/NA	Solid	5035	
880-9353-15	SW-2	Total/NA	Solid	5035	
880-9353-16	SW-3	Total/NA	Solid	5035	
880-9353-17	SW-4	Total/NA	Solid	5035	
880-9353-18	SW-5	Total/NA	Solid	5035	
880-9353-19	SW-6	Total/NA	Solid	5035	
880-9353-20	SW-7	Total/NA	Solid	5035	
MB 880-14804/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-14804/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-14804/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-9353-1 MS	BH-1	Total/NA	Solid	5035	
880-9353-1 MSD	BH-1	Total/NA	Solid	5035	

Analysis Batch: 15276

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-1	BH-1	Total/NA	Solid	Total BTEX	
880-9353-2	BH-2	Total/NA	Solid	Total BTEX	
880-9353-3	BH-3	Total/NA	Solid	Total BTEX	
880-9353-4	BH-4	Total/NA	Solid	Total BTEX	
880-9353-5	BH-5	Total/NA	Solid	Total BTEX	
880-9353-6	BH-6	Total/NA	Solid	Total BTEX	
880-9353-7	BH-7	Total/NA	Solid	Total BTEX	
880-9353-8	BH-8	Total/NA	Solid	Total BTEX	
880-9353-9	BH-9	Total/NA	Solid	Total BTEX	
880-9353-10	BH-10	Total/NA	Solid	Total BTEX	
880-9353-11	BH-13	Total/NA	Solid	Total BTEX	
880-9353-12	BH-12	Total/NA	Solid	Total BTEX	
880-9353-13	BH-11	Total/NA	Solid	Total BTEX	
880-9353-14	SW-1	Total/NA	Solid	Total BTEX	
880-9353-15	SW-2	Total/NA	Solid	Total BTEX	
880-9353-16	SW-3	Total/NA	Solid	Total BTEX	
880-9353-17	SW-4	Total/NA	Solid	Total BTEX	
880-9353-18	SW-5	Total/NA	Solid	Total BTEX	
880-9353-19	SW-6	Total/NA	Solid	Total BTEX	
880-9353-20	SW-7	Total/NA	Solid	Total BTEX	
880-9353-21	SW-8	Total/NA	Solid	Total BTEX	

Eurofins Xenco, Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

GC Semi VOA

Prep Batch: 14812

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-1	BH-1	Total/NA	Solid	8015NM Prep	
880-9353-2	BH-2	Total/NA	Solid	8015NM Prep	
880-9353-3	BH-3	Total/NA	Solid	8015NM Prep	
880-9353-4	BH-4	Total/NA	Solid	8015NM Prep	
880-9353-5	BH-5	Total/NA	Solid	8015NM Prep	
880-9353-6	BH-6	Total/NA	Solid	8015NM Prep	
880-9353-7	BH-7	Total/NA	Solid	8015NM Prep	
880-9353-8	BH-8	Total/NA	Solid	8015NM Prep	
880-9353-9	BH-9	Total/NA	Solid	8015NM Prep	
880-9353-10	BH-10	Total/NA	Solid	8015NM Prep	
880-9353-11	BH-13	Total/NA	Solid	8015NM Prep	
880-9353-12	BH-12	Total/NA	Solid	8015NM Prep	
880-9353-13	BH-11	Total/NA	Solid	8015NM Prep	
880-9353-14	SW-1	Total/NA	Solid	8015NM Prep	
880-9353-15	SW-2	Total/NA	Solid	8015NM Prep	
880-9353-16	SW-3	Total/NA	Solid	8015NM Prep	
880-9353-17	SW-4	Total/NA	Solid	8015NM Prep	
880-9353-18	SW-5	Total/NA	Solid	8015NM Prep	
880-9353-19	SW-6	Total/NA	Solid	8015NM Prep	
880-9353-20	SW-7	Total/NA	Solid	8015NM Prep	
MB 880-14812/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-14812/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-14812/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-9353-1 MS	BH-1	Total/NA	Solid	8015NM Prep	
880-9353-1 MSD	BH-1	Total/NA	Solid	8015NM Prep	

Prep Batch: 14820

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-21	SW-8	Total/NA	Solid	8015NM Prep	
MB 880-14820/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-14820/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-14820/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-9353-21 MS	SW-8	Total/NA	Solid	8015NM Prep	
880-9353-21 MSD	SW-8	Total/NA	Solid	8015NM Prep	

Analysis Batch: 15015

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-1	BH-1	Total/NA	Solid	8015B NM	14812
880-9353-2	BH-2	Total/NA	Solid	8015B NM	14812
880-9353-3	BH-3	Total/NA	Solid	8015B NM	14812
880-9353-4	BH-4	Total/NA	Solid	8015B NM	14812
880-9353-5	BH-5	Total/NA	Solid	8015B NM	14812
880-9353-6	BH-6	Total/NA	Solid	8015B NM	14812
880-9353-7	BH-7	Total/NA	Solid	8015B NM	14812
880-9353-8	BH-8	Total/NA	Solid	8015B NM	14812
880-9353-9	BH-9	Total/NA	Solid	8015B NM	14812
880-9353-10	BH-10	Total/NA	Solid	8015B NM	14812
880-9353-11	BH-13	Total/NA	Solid	8015B NM	14812
880-9353-12	BH-12	Total/NA	Solid	8015B NM	14812
880-9353-13	BH-11	Total/NA	Solid	8015B NM	14812
880-9353-14	SW-1	Total/NA	Solid	8015B NM	14812

Eurofins Xenco, Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

GC Semi VOA (Continued)

Analysis Batch: 15015 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-15	SW-2	Total/NA	Solid	8015B NM	14812
880-9353-16	SW-3	Total/NA	Solid	8015B NM	14812
880-9353-17	SW-4	Total/NA	Solid	8015B NM	14812
880-9353-18	SW-5	Total/NA	Solid	8015B NM	14812
880-9353-19	SW-6	Total/NA	Solid	8015B NM	14812
880-9353-20	SW-7	Total/NA	Solid	8015B NM	14812
880-9353-21	SW-8	Total/NA	Solid	8015B NM	14820
MB 880-14812/1-A	Method Blank	Total/NA	Solid	8015B NM	14812
MB 880-14820/1-A	Method Blank	Total/NA	Solid	8015B NM	14820
LCS 880-14812/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	14812
LCS 880-14820/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	14820
LCSD 880-14812/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	14812
LCSD 880-14820/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	14820
880-9353-1 MS	BH-1	Total/NA	Solid	8015B NM	14812
880-9353-1 MSD	BH-1	Total/NA	Solid	8015B NM	14812
880-9353-21 MS	SW-8	Total/NA	Solid	8015B NM	14820
880-9353-21 MSD	SW-8	Total/NA	Solid	8015B NM	14820

Analysis Batch: 15595

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-1	BH-1	Total/NA	Solid	8015 NM	
880-9353-2	BH-2	Total/NA	Solid	8015 NM	
880-9353-3	BH-3	Total/NA	Solid	8015 NM	
880-9353-4	BH-4	Total/NA	Solid	8015 NM	
880-9353-5	BH-5	Total/NA	Solid	8015 NM	
880-9353-6	BH-6	Total/NA	Solid	8015 NM	
880-9353-7	BH-7	Total/NA	Solid	8015 NM	
880-9353-8	BH-8	Total/NA	Solid	8015 NM	
880-9353-9	BH-9	Total/NA	Solid	8015 NM	
880-9353-10	BH-10	Total/NA	Solid	8015 NM	
880-9353-11	BH-13	Total/NA	Solid	8015 NM	
880-9353-12	BH-12	Total/NA	Solid	8015 NM	
880-9353-13	BH-11	Total/NA	Solid	8015 NM	
880-9353-14	SW-1	Total/NA	Solid	8015 NM	
880-9353-15	SW-2	Total/NA	Solid	8015 NM	
880-9353-16	SW-3	Total/NA	Solid	8015 NM	
880-9353-17	SW-4	Total/NA	Solid	8015 NM	
880-9353-18	SW-5	Total/NA	Solid	8015 NM	
880-9353-19	SW-6	Total/NA	Solid	8015 NM	
880-9353-20	SW-7	Total/NA	Solid	8015 NM	
880-9353-21	SW-8	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 14838

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-1	BH-1	Soluble	Solid	DI Leach	
880-9353-2	BH-2	Soluble	Solid	DI Leach	
880-9353-3	BH-3	Soluble	Solid	DI Leach	
880-9353-4	BH-4	Soluble	Solid	DI Leach	
880-9353-5	BH-5	Soluble	Solid	DI Leach	

Eurofins Xenco, Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

HPLC/IC (Continued)

Leach Batch: 14838 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-6	BH-6	Soluble	Solid	DI Leach	
880-9353-7	BH-7	Soluble	Solid	DI Leach	
880-9353-8	BH-8	Soluble	Solid	DI Leach	
880-9353-9	BH-9	Soluble	Solid	DI Leach	
880-9353-10	BH-10	Soluble	Solid	DI Leach	
880-9353-11	BH-13	Soluble	Solid	DI Leach	
880-9353-12	BH-12	Soluble	Solid	DI Leach	
880-9353-13	BH-11	Soluble	Solid	DI Leach	
880-9353-14	SW-1	Soluble	Solid	DI Leach	
880-9353-15	SW-2	Soluble	Solid	DI Leach	
880-9353-16	SW-3	Soluble	Solid	DI Leach	
880-9353-17	SW-4	Soluble	Solid	DI Leach	
MB 880-14838/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-14838/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-14838/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-9353-8 MS	BH-8	Soluble	Solid	DI Leach	
880-9353-8 MSD	BH-8	Soluble	Solid	DI Leach	

Leach Batch: 14839

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-18	SW-5	Soluble	Solid	DI Leach	
880-9353-19	SW-6	Soluble	Solid	DI Leach	
880-9353-20	SW-7	Soluble	Solid	DI Leach	
880-9353-21	SW-8	Soluble	Solid	DI Leach	
MB 880-14839/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-14839/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-14839/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Analysis Batch: 15047

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-1	BH-1	Soluble	Solid	300.0	14838
880-9353-2	BH-2	Soluble	Solid	300.0	14838
880-9353-3	BH-3	Soluble	Solid	300.0	14838
880-9353-4	BH-4	Soluble	Solid	300.0	14838
880-9353-5	BH-5	Soluble	Solid	300.0	14838
880-9353-6	BH-6	Soluble	Solid	300.0	14838
880-9353-7	BH-7	Soluble	Solid	300.0	14838
880-9353-8	BH-8	Soluble	Solid	300.0	14838
880-9353-9	BH-9	Soluble	Solid	300.0	14838
880-9353-10	BH-10	Soluble	Solid	300.0	14838
880-9353-11	BH-13	Soluble	Solid	300.0	14838
880-9353-12	BH-12	Soluble	Solid	300.0	14838
880-9353-13	BH-11	Soluble	Solid	300.0	14838
880-9353-14	SW-1	Soluble	Solid	300.0	14838
880-9353-15	SW-2	Soluble	Solid	300.0	14838
880-9353-16	SW-3	Soluble	Solid	300.0	14838
880-9353-17	SW-4	Soluble	Solid	300.0	14838
MB 880-14838/1-A	Method Blank	Soluble	Solid	300.0	14838
LCS 880-14838/2-A	Lab Control Sample	Soluble	Solid	300.0	14838
LCSD 880-14838/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	14838
880-9353-8 MS	BH-8	Soluble	Solid	300.0	14838

Eurofins Xenco, Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

HPLC/IC (Continued)

Analysis Batch: 15047 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-8 MSD	BH-8	Soluble	Solid	300.0	14838

Analysis Batch: 15070

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9353-18	SW-5	Soluble	Solid	300.0	14839
880-9353-19	SW-6	Soluble	Solid	300.0	14839
880-9353-20	SW-7	Soluble	Solid	300.0	14839
880-9353-21	SW-8	Soluble	Solid	300.0	14839
MB 880-14839/1-A	Method Blank	Soluble	Solid	300.0	14839
LCS 880-14839/2-A	Lab Control Sample	Soluble	Solid	300.0	14839
LCSD 880-14839/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	14839

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-1

Lab Sample ID: 880-9353-1

Date Collected: 12/13/21 11:30

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/15/21 22:47	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 11:08	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 13:47	CH	XEN MID

Client Sample ID: BH-2

Lab Sample ID: 880-9353-2

Date Collected: 12/13/21 11:35

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/15/21 23:07	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 12:14	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 13:53	CH	XEN MID

Client Sample ID: BH-3

Lab Sample ID: 880-9353-3

Date Collected: 12/13/21 11:40

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/15/21 23:27	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 12:35	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 14:13	CH	XEN MID

Client Sample ID: BH-4

Lab Sample ID: 880-9353-4

Date Collected: 12/13/21 11:45

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/15/21 23:48	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID

Eurofins Xenco, Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-4

Lab Sample ID: 880-9353-4

Date Collected: 12/13/21 11:45

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 12:57	AJ	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 14:20	CH	XEN MID

Client Sample ID: BH-5

Lab Sample ID: 880-9353-5

Date Collected: 12/13/21 11:50

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.99 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 00:08	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 13:19	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 14:27	CH	XEN MID

Client Sample ID: BH-6

Lab Sample ID: 880-9353-6

Date Collected: 12/13/21 11:55

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.98 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 00:29	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 13:41	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 14:33	CH	XEN MID

Client Sample ID: BH-7

Lab Sample ID: 880-9353-7

Date Collected: 12/13/21 12:00

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.00 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 00:49	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 14:03	AJ	XEN MID

Eurofins Xenco, Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-7

Lab Sample ID: 880-9353-7

Date Collected: 12/13/21 12:00

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			5.02 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 14:40	CH	XEN MID

Client Sample ID: BH-8

Lab Sample ID: 880-9353-8

Date Collected: 12/13/21 12:10

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 01:09	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 14:25	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 14:47	CH	XEN MID

Client Sample ID: BH-9

Lab Sample ID: 880-9353-9

Date Collected: 12/13/21 12:15

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 01:30	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 14:47	AJ	XEN MID
Soluble	Leach	DI Leach			4.99 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 15:07	CH	XEN MID

Client Sample ID: BH-10

Lab Sample ID: 880-9353-10

Date Collected: 12/13/21 12:30

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 01:50	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 15:08	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 15:14	CH	XEN MID

Eurofins Xenco, Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: BH-13

Lab Sample ID: 880-9353-11

Date Collected: 12/13/21 12:30

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.97 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 03:40	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 15:52	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 15:34	CH	XEN MID

Client Sample ID: BH-12

Lab Sample ID: 880-9353-12

Date Collected: 12/13/21 12:25

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 04:00	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.05 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 16:13	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 15:40	CH	XEN MID

Client Sample ID: BH-11

Lab Sample ID: 880-9353-13

Date Collected: 12/13/21 12:20

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.98 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 04:21	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 16:35	AJ	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 15:47	CH	XEN MID

Client Sample ID: SW-1

Lab Sample ID: 880-9353-14

Date Collected: 12/13/21 12:45

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.97 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 04:41	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID

Eurofins Xenco, Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: SW-1

Lab Sample ID: 880-9353-14

Date Collected: 12/13/21 12:45

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 16:57	AJ	XEN MID
Soluble	Leach	DI Leach			4.99 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 15:53	CH	XEN MID

Client Sample ID: SW-2

Lab Sample ID: 880-9353-15

Date Collected: 12/13/21 12:50

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 05:02	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 17:18	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 16:00	CH	XEN MID

Client Sample ID: SW-3

Lab Sample ID: 880-9353-16

Date Collected: 12/13/21 12:55

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 05:22	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 17:39	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 16:07	CH	XEN MID

Client Sample ID: SW-4

Lab Sample ID: 880-9353-17

Date Collected: 12/13/21 13:00

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 05:43	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 17:59	AJ	XEN MID

Eurofins Xenco, Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: SW-4

Lab Sample ID: 880-9353-17

Date Collected: 12/13/21 13:00

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			5 g	50 mL	14838	12/15/21 11:38	CA	XEN MID
Soluble	Analysis	300.0		1			15047	12/18/21 16:14	CH	XEN MID

Client Sample ID: SW-5

Lab Sample ID: 880-9353-18

Date Collected: 12/13/21 13:05

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.00 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 06:03	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 18:20	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	14839	12/15/21 11:40	CA	XEN MID
Soluble	Analysis	300.0		1			15070	12/17/21 21:40	SC	XEN MID

Client Sample ID: SW-6

Lab Sample ID: 880-9353-19

Date Collected: 12/13/21 13:10

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 06:23	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 18:41	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	14839	12/15/21 11:40	CA	XEN MID
Soluble	Analysis	300.0		1			15070	12/17/21 22:13	SC	XEN MID

Client Sample ID: SW-7

Lab Sample ID: 880-9353-20

Date Collected: 12/13/21 13:15

Matrix: Solid

Date Received: 12/14/21 15:44

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.95 g	5 mL	14804	12/15/21 08:29	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14796	12/16/21 06:44	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	14812	12/15/21 10:25	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 19:01	AJ	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	14839	12/15/21 11:40	CA	XEN MID
Soluble	Analysis	300.0		1			15070	12/17/21 22:24	SC	XEN MID

Eurofins Xenco, Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Client Sample ID: SW-8

Date Collected: 12/13/21 13:20

Date Received: 12/14/21 15:44

Lab Sample ID: 880-9353-21

Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	14781	12/15/21 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	14797	12/16/21 03:44	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			15276	12/21/21 14:36	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			15595	12/27/21 14:12	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	14820	12/15/21 10:41	DM	XEN MID
Total/NA	Analysis	8015B NM		1			15015	12/17/21 20:45	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	14839	12/15/21 11:40	CA	XEN MID
Soluble	Analysis	300.0		1			15070	12/17/21 22:35	SC	XEN MID

Laboratory References:
XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Accreditation/Certification Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Program	Identification Number	Expiration Date
Texas	NELAP	T104704400-21-22	06-30-22

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
8015 NM		Solid	Total TPH
Total BTEX		Solid	Total BTEX

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

Method Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

Protocol References:

ASTM = ASTM International

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

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

TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Midland

Sample Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9353-1
SDG: Eddy County, NM

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
880-9353-1	BH-1	Solid	12/13/21 11:30	12/14/21 15:44
880-9353-2	BH-2	Solid	12/13/21 11:35	12/14/21 15:44
880-9353-3	BH-3	Solid	12/13/21 11:40	12/14/21 15:44
880-9353-4	BH-4	Solid	12/13/21 11:45	12/14/21 15:44
880-9353-5	BH-5	Solid	12/13/21 11:50	12/14/21 15:44
880-9353-6	BH-6	Solid	12/13/21 11:55	12/14/21 15:44
880-9353-7	BH-7	Solid	12/13/21 12:00	12/14/21 15:44
880-9353-8	BH-8	Solid	12/13/21 12:10	12/14/21 15:44
880-9353-9	BH-9	Solid	12/13/21 12:15	12/14/21 15:44
880-9353-10	BH-10	Solid	12/13/21 12:30	12/14/21 15:44
880-9353-11	BH-13	Solid	12/13/21 12:30	12/14/21 15:44
880-9353-12	BH-12	Solid	12/13/21 12:25	12/14/21 15:44
880-9353-13	BH-11	Solid	12/13/21 12:20	12/14/21 15:44
880-9353-14	SW-1	Solid	12/13/21 12:45	12/14/21 15:44
880-9353-15	SW-2	Solid	12/13/21 12:50	12/14/21 15:44
880-9353-16	SW-3	Solid	12/13/21 12:55	12/14/21 15:44
880-9353-17	SW-4	Solid	12/13/21 13:00	12/14/21 15:44
880-9353-18	SW-5	Solid	12/13/21 13:05	12/14/21 15:44
880-9353-19	SW-6	Solid	12/13/21 13:10	12/14/21 15:44
880-9353-20	SW-7	Solid	12/13/21 13:15	12/14/21 15:44
880-9353-21	SW-8	Solid	12/13/21 13:20	12/14/21 15:44



Environment Testing Xenco

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El Paso, TX (915) 585-3443 Lubbock, TX (806) 794-1296
Hobbs, NM (575) 392-7550, Carlsbad, NM (575) 988-3199

Chain of Custody

World



880-9353 Chain of Custody

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Project Manager:	Becky Haskell @ GHD.COM	Bill to: (if different)	Direct to Plains
Company Name:	GHD	Company Name:	
Address:	2135 S. Loop 280 W.	Address:	
City/State/Zip:	Midland, TX 79703	City/State/Zip:	
Phone:	432-686-0086	Email:	"Becky", ALGROVES@PALP.COM

Work Order Comments			
Program:	UST/PST ☐ PRP ☐ Brownfields ☐ RRC ☐ Superfund ☐		
State of Project:			
Reporting Level II ☐ Level III ☐ PST/UST ☐ TRRP ☐ Level IV ☐			
Deliverables	EDD ☐ ADAPT ☐ Other ☐		

Project Name:	Snapping Pumps	Turn Around	1-3 days	Pres. Code	
Project Number:	12565619	Due Date:	1-3 days		
Project Location:	Eddy County, NM	TAT starts the day received by the lab, if received by 4:30pm			
Sample's Name:	Heath Boyd				
PO #					
SAMPLE RECEIPT		Temp Blank:	Yes (No)	Wet Ice:	Yes (No)
Samples Received Intact:		Yes (No)	Thermometer ID:	Yes (No)	
Cooler Custody Seals:		Yes (No)	Correction Factor:	Yes (No)	
Sample Custody Seals:		Yes (No)	Temperature Reading:	Yes (No)	
Total Containers:		Corrected Temperature:			

Sample Identification	Matrix	Date Sampled	Time Sampled	Depth	Grab/Comp	# of Cont	Parameters
BH-1	S	12/13/21	1130		Comp	1	TPH 8015M
BH-2			1135			1	BTEX 8021B
BH-3			1140			1	Chloride 300
BH-4			1145			1	
BH-5			1150			1	
BH-6			1155			1	
BH-7			1200			1	
BH-8			1210			1	
BH-9			1215			1	
BH-10			1230			1	

Total 200.7 / 6010	200.8 / 6020:	8RCRA 13PPM Texas 11	Al Sb As Ba Be B Cd Ca Cr Co Cu Fe Pb Mg Mn Mo Ni K Se Ag Sn U V Zn
Circle Method(s) and Metal(s) to be analyzed	TCLP / SPLP 6010	8RCRA Sb As Ba Be Cd Cr Co Cu Pb Mn Mo Ni Se Ag Ti U	Hg 1631 / 2451 / 7470 / 7471

Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Eurofins Xenco, its affiliates and subcontractors. It assigns standard terms and conditions of service. Eurofins Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Eurofins Xenco. A minimum charge of \$85.00 will be applied to each project and a charge of \$5 for each sample submitted to Eurofins Xenco, but not analyzed. These terms will be enforced unless previously negotiated.

Relinquished by: (Signature)	Received by: (Signature)	Date/Time	Relinquished by: (Signature)	Received by: (Signature)	Date/Time
Heath Boyd		12/14/21 1400	Heath Boyd	Heath Boyd	12-14-21 1514



Environment Testing

Xenco

Chain of Custody

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 El Paso, TX (915) 585-3443, Lubbock, TX (806) 794-1296
 Hobbs, NM (575) 392-7550, Carlsbad, NM (575) 988-3199

Work Order No:

9353

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Page 2 of 3

Project Manager:	Becky, Haskeu@GHD.COM	Bill to: (if different)	Direct To Plains
Company Name:	GHD	Company Name:	
Address:	2135 S. Loop 250 W.	Address:	
City, State ZIP:	Midland, TX 79703	City, State ZIP:	
Phone:	432-686-0086	Email:	Becky, A@GHD.COM

Program:	UST/PST	PRP	Brownfields	RRC	Superfund
State of Project:					
Reporting Level II	☐	Level III	☐	PST/UST	TRRP
Level IV	☐				
Deliverables	EDD	☐	ADAPT	☐	Other

Project Name:	Snapping Pumps	Due Date:	12/13/21	TAI starts the day received by the lab, if received by 4:30pm
Project Number:	12565819	Due Date:	12/13/21	TAI starts the day received by the lab, if received by 4:30pm
Project Location:	Eddy County, NM	Due Date:	12/13/21	TAI starts the day received by the lab, if received by 4:30pm
Sample Name:	Heath Boyd	Due Date:	12/13/21	TAI starts the day received by the lab, if received by 4:30pm
PO #		Due Date:	12/13/21	TAI starts the day received by the lab, if received by 4:30pm
SAMPLE RECEIPT	Temp Blank: Yes () No ()	Wet Ice: Yes () No ()	Thermometer ID: 1.10	Parameters
Samples Received Intact:	Yes () No ()	Correction Factor:	1.0	
Cooler Custody Seals:	Yes () No ()	Temperature Reading:	9.9	
Sample Custody Seals:	Yes () No ()	Corrected Temperature:	9.9	
Total Containers:				
Sample Identification	Matrix	Date Sampled	Time Sampled	Depth
BH-13	S	12/13/21	12:30	10m
BH-12				
BH-11				
SW-1				
SW-2				
SW-3				
SW-4				
SW-5				
SW-6				
SW-7				

Total 200.7 / 6010	200.8 / 6020:	8RCRA 13PPM Texas 11	Al Sb As Ba Be B Cd Ca Cr Co Cu Fe Pb Mg Mn Mo Ni K Se Ag SiO ₂ Na Sr Ti Sn U V Zn
Circle Method(s) and Metal(s) to be analyzed	TCLP / SPLP 6010	8RCRA Sb As Ba Be Cd Cr Co Cu Pb Mn Mo Ni Se Ag Ti U	Hg 1631 / 2451 / 7470 / 7471

Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Eurofins Xenco, its affiliates and subcontractors. It assigns standard terms and conditions of service. Eurofins Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Eurofins Xenco. A minimum charge of \$85.00 will be applied to each project and a charge of \$5 for each sample submitted to Eurofins Xenco, but not analyzed. These terms will be enforced unless previously negotiated.

Relinquished by (Signature)	Received by (Signature)	Date/Time	Relinquished by (Signature)	Received by (Signature)	Date/Time



Environment Testing

Houston, TX (281) 240-4200, Dallas, TX (214) 902-0300
Midland, TX (432) 704-5440, San Antonio, TX (210) 509-3334
El Paso, TX (915) 585-3443, Lubbock, TX (806) 794-1296
Hobbs, NM (575) 392 7550, Carlsbad, NM (575) 988-3199

Chain of Custody

Work Order No: 9353

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Project Manager	Beky	Bill to: (if different)	Plains
Company Name	674D	Company Name	
Address:		Address:	
City, State ZIP		City, State ZIP	
Phone		Email	Beky, Allnoves

Work Order Comments				
Program:	UST/PST ☐	PRP ☐	Brownfields ☐	RRC ☐ Superfund ☐
State of Project:				
Reporting	Level II ☐	Level III ☐	PST/UST ☐	TRRP ☐ Level IV ☐
Deliverables	EDD ☐	Adapt ☐	Other ☐	

[illegible]

Login Sample Receipt Checklist

Client: GHD Services Inc.

Job Number: 880-9353-1

SDG Number: Eddy County, NM

Login Number: 9353

List Number: 1

Creator: Rodriguez, Leticia

List Source: Eurofins Xenco, Midland

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
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	brought the next day after it was sampled
Cooler Temperature is recorded.	True	
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.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	



Environment Testing America

ANALYTICAL REPORT

Eurofins Midland
1211 W. Florida Ave
Midland, TX 79701
Tel: (432)704-5440

Laboratory Job ID: 880-9906-1

Laboratory Sample Delivery Group: Eddy County, NM
Client Project/Site: Snapping Pumps

For:

GHD Services Inc.
2135 South Loop 250 West
Midland, Texas 79703

Attn: Becky Haskell

A handwritten signature in black ink that reads "Debbie Simmons".

Authorized for release by:
1/11/2022 3:20:39 PM

Debbie Simmons, Project Manager
(832)986-6768
debbie.simmons@eurofinset.com

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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.

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Laboratory Job ID: 880-9906-1
SDG: Eddy County, NM

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Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Qualifiers

GC VOA

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.
S1+	Surrogate recovery exceeds control limits, high biased.
U	Indicates the analyte was analyzed for but not detected.

GC Semi VOA

Qualifier	Qualifier Description
*1	LCS/LCSD RPD exceeds control limits.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
S1+	Surrogate recovery exceeds control limits, high biased.
U	Indicates the analyte was analyzed for but not detected.

HPLC/IC

Qualifier	Qualifier Description
F1	MS and/or MSD recovery exceeds control 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.

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)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

Eurofins Midland

Case Narrative

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Job ID: 880-9906-1**Laboratory: Eurofins Midland****Narrative****Job Narrative
880-9906-1****Receipt**

The samples were received on 1/6/2022 12:00 AM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 3.4°C

GC VOA

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

GC Semi VOA

Method 8015MOD_NM: The RPD of the laboratory control sample (LCS) and laboratory control sample duplicate (LCSD) for preparation batch 880-16164 and analytical batch 880-16119 recovered outside control limits for the following analytes: Gasoline Range Organics (GRO)-C6-C10 and Diesel Range Organics (Over C10-C28)

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

HPLC/IC

Method 300_ORGFM_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-16227 and analytical batch 880-16331 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

Method 300_ORGFM_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-16230 and analytical batch 880-16332 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-9

Lab Sample ID: 880-9906-1

Date Collected: 01/04/22 13:00

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/06/22 12:58	01/06/22 17:18	1
Toluene	<0.000453	U	0.00199	0.000453	mg/Kg		01/06/22 12:58	01/06/22 17:18	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		01/06/22 12:58	01/06/22 17:18	1
m-Xylene & p-Xylene	<0.00100	U	0.00398	0.00100	mg/Kg		01/06/22 12:58	01/06/22 17:18	1
o-Xylene	<0.000342	U	0.00199	0.000342	mg/Kg		01/06/22 12:58	01/06/22 17:18	1
Xylenes, Total	<0.00100	U	0.00398	0.00100	mg/Kg		01/06/22 12:58	01/06/22 17:18	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	115		70 - 130	01/06/22 12:58	01/06/22 17:18	1
1,4-Difluorobenzene (Surr)	114		70 - 130	01/06/22 12:58	01/06/22 17:18	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00398	0.00100	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	79.9		49.9	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	19.0	J *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 16:58	1
Diesel Range Organics (Over C10-C28)	60.9	*1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 16:58	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 16:58	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	74		70 - 130	01/06/22 13:57	01/06/22 16:58	1
o-Terphenyl	79		70 - 130	01/06/22 13:57	01/06/22 16:58	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	16.7	F1	5.05	0.867	mg/Kg			01/07/22 23:54	1

Client Sample ID: SW-10

Lab Sample ID: 880-9906-2

Date Collected: 01/04/22 13:05

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/06/22 12:58	01/06/22 17:39	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/06/22 12:58	01/06/22 17:39	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/06/22 12:58	01/06/22 17:39	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 12:58	01/06/22 17:39	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/06/22 12:58	01/06/22 17:39	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 12:58	01/06/22 17:39	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	122		70 - 130	01/06/22 12:58	01/06/22 17:39	1
1,4-Difluorobenzene (Surr)	103		70 - 130	01/06/22 12:58	01/06/22 17:39	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-10

Lab Sample ID: 880-9906-2

Date Collected: 01/04/22 13:05

Matrix: Solid

Date Received: 01/06/22 00:00

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00400	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 18:00	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 18:00	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 18:00	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	76		70 - 130				01/06/22 13:57	01/06/22 18:00	1
o-Terphenyl	80		70 - 130				01/06/22 13:57	01/06/22 18:00	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	30.9		4.98	0.855	mg/Kg			01/08/22 00:19	1

Client Sample ID: SW-11

Lab Sample ID: 880-9906-3

Date Collected: 01/04/22 13:10

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/06/22 12:58	01/06/22 17:59	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/06/22 12:58	01/06/22 17:59	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/06/22 12:58	01/06/22 17:59	1
m-Xylene & p-Xylene	0.00123	J	0.00400	0.00101	mg/Kg		01/06/22 12:58	01/06/22 17:59	1
o-Xylene	0.00152	J	0.00200	0.000344	mg/Kg		01/06/22 12:58	01/06/22 17:59	1
Xylenes, Total	0.00275	J	0.00400	0.00101	mg/Kg		01/06/22 12:58	01/06/22 17:59	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	113		70 - 130				01/06/22 12:58	01/06/22 17:59	1
1,4-Difluorobenzene (Surr)	106		70 - 130				01/06/22 12:58	01/06/22 17:59	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00275	J	0.00400	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 18:21	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 18:21	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-11

Lab Sample ID: 880-9906-3

Date Collected: 01/04/22 13:10

Matrix: Solid

Date Received: 01/06/22 00:00

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 18:21	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	85		70 - 130				01/06/22 13:57	01/06/22 18:21	1
o-Terphenyl	85		70 - 130				01/06/22 13:57	01/06/22 18:21	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	2.85	J	4.95	0.850	mg/Kg			01/08/22 00:27	1

Client Sample ID: SW-12

Lab Sample ID: 880-9906-4

Date Collected: 01/04/22 13:15

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg		01/06/22 12:58	01/06/22 18:20	1
Toluene	0.00121	J	0.00198	0.000451	mg/Kg		01/06/22 12:58	01/06/22 18:20	1
Ethylbenzene	<0.000559	U	0.00198	0.000559	mg/Kg		01/06/22 12:58	01/06/22 18:20	1
m-Xylene & p-Xylene	<0.00100	U	0.00396	0.00100	mg/Kg		01/06/22 12:58	01/06/22 18:20	1
o-Xylene	0.00167	J	0.00198	0.000341	mg/Kg		01/06/22 12:58	01/06/22 18:20	1
Xylenes, Total	0.00167	J	0.00396	0.00100	mg/Kg		01/06/22 12:58	01/06/22 18:20	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	118		70 - 130				01/06/22 12:58	01/06/22 18:20	1
1,4-Difluorobenzene (Surr)	102		70 - 130				01/06/22 12:58	01/06/22 18:20	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00288	J	0.00396	0.00100	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 18:42	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 18:42	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 18:42	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	77		70 - 130				01/06/22 13:57	01/06/22 18:42	1
o-Terphenyl	82		70 - 130				01/06/22 13:57	01/06/22 18:42	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	3.94	J	5.04	0.865	mg/Kg			01/08/22 00:36	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-13

Lab Sample ID: 880-9906-5

Date Collected: 01/04/22 13:20

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000388	U	0.00202	0.000388	mg/Kg		01/06/22 12:58	01/06/22 18:40	1
Toluene	<0.000460	U	0.00202	0.000460	mg/Kg		01/06/22 12:58	01/06/22 18:40	1
Ethylbenzene	<0.000570	U	0.00202	0.000570	mg/Kg		01/06/22 12:58	01/06/22 18:40	1
m-Xylene & p-Xylene	<0.00102	U	0.00403	0.00102	mg/Kg		01/06/22 12:58	01/06/22 18:40	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		01/06/22 12:58	01/06/22 18:40	1
Xylenes, Total	<0.00102	U	0.00403	0.00102	mg/Kg		01/06/22 12:58	01/06/22 18:40	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	119		70 - 130	01/06/22 12:58	01/06/22 18:40	1
1,4-Difluorobenzene (Surr)	104		70 - 130	01/06/22 12:58	01/06/22 18:40	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00403	0.00102	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 19:04	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 19:04	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 19:04	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	77		70 - 130	01/06/22 13:57	01/06/22 19:04	1
o-Terphenyl	84		70 - 130	01/06/22 13:57	01/06/22 19:04	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	3.91	J	4.99	0.857	mg/Kg			01/08/22 00:44	1

Client Sample ID: SW-14

Lab Sample ID: 880-9906-6

Date Collected: 01/04/22 13:25

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00128	J	0.00200	0.000384	mg/Kg		01/06/22 12:58	01/06/22 19:01	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg		01/06/22 12:58	01/06/22 19:01	1
Ethylbenzene	0.000775	J	0.00200	0.000564	mg/Kg		01/06/22 12:58	01/06/22 19:01	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		01/06/22 12:58	01/06/22 19:01	1
o-Xylene	0.00123	J	0.00200	0.000343	mg/Kg		01/06/22 12:58	01/06/22 19:01	1
Xylenes, Total	0.00123	J	0.00399	0.00101	mg/Kg		01/06/22 12:58	01/06/22 19:01	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	118		70 - 130	01/06/22 12:58	01/06/22 19:01	1
1,4-Difluorobenzene (Surr)	104		70 - 130	01/06/22 12:58	01/06/22 19:01	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-14

Lab Sample ID: 880-9906-6

Date Collected: 01/04/22 13:25

Matrix: Solid

Date Received: 01/06/22 00:00

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00329	J	0.00399	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 19:25	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 19:25	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 19:25	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	89		70 - 130				01/06/22 13:57	01/06/22 19:25	1
o-Terphenyl	93		70 - 130				01/06/22 13:57	01/06/22 19:25	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	3.46	J	4.95	0.850	mg/Kg			01/08/22 01:09	1

Client Sample ID: SW-15

Lab Sample ID: 880-9906-7

Date Collected: 01/04/22 13:30

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00112	J	0.00201	0.000387	mg/Kg		01/06/22 12:58	01/06/22 19:21	1
Toluene	0.000924	J	0.00201	0.000458	mg/Kg		01/06/22 12:58	01/06/22 19:21	1
Ethylbenzene	<0.000567	U	0.00201	0.000567	mg/Kg		01/06/22 12:58	01/06/22 19:21	1
m-Xylene & p-Xylene	<0.00101	U	0.00402	0.00101	mg/Kg		01/06/22 12:58	01/06/22 19:21	1
o-Xylene	<0.000345	U	0.00201	0.000345	mg/Kg		01/06/22 12:58	01/06/22 19:21	1
Xylenes, Total	<0.00101	U	0.00402	0.00101	mg/Kg		01/06/22 12:58	01/06/22 19:21	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	109		70 - 130				01/06/22 12:58	01/06/22 19:21	1
1,4-Difluorobenzene (Surr)	97		70 - 130				01/06/22 12:58	01/06/22 19:21	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00204	J	0.00402	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 19:47	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 19:47	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-15

Lab Sample ID: 880-9906-7

Date Collected: 01/04/22 13:30

Matrix: Solid

Date Received: 01/06/22 00:00

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 19:47	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	78		70 - 130				01/06/22 13:57	01/06/22 19:47	1
o-Terphenyl	83		70 - 130				01/06/22 13:57	01/06/22 19:47	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	18.9		5.00	0.858	mg/Kg			01/08/22 01:17	1

Client Sample ID: SW-16

Lab Sample ID: 880-9906-8

Date Collected: 01/04/22 13:40

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000386	U	0.00200	0.000386	mg/Kg		01/06/22 12:58	01/06/22 19:42	1
Toluene	0.00116	J	0.00200	0.000457	mg/Kg		01/06/22 12:58	01/06/22 19:42	1
Ethylbenzene	<0.000566	U	0.00200	0.000566	mg/Kg		01/06/22 12:58	01/06/22 19:42	1
m-Xylene & p-Xylene	0.00111	J	0.00401	0.00101	mg/Kg		01/06/22 12:58	01/06/22 19:42	1
o-Xylene	0.00172	J	0.00200	0.000345	mg/Kg		01/06/22 12:58	01/06/22 19:42	1
Xylenes, Total	0.00283	J	0.00401	0.00101	mg/Kg		01/06/22 12:58	01/06/22 19:42	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	115		70 - 130				01/06/22 12:58	01/06/22 19:42	1
1,4-Difluorobenzene (Surr)	103		70 - 130				01/06/22 12:58	01/06/22 19:42	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00399	J	0.00401	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 20:08	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 20:08	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 20:08	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	76		70 - 130				01/06/22 13:57	01/06/22 20:08	1
o-Terphenyl	80		70 - 130				01/06/22 13:57	01/06/22 20:08	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	27.5		4.97	0.853	mg/Kg			01/08/22 01:26	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-17

Lab Sample ID: 880-9906-9

Date Collected: 01/04/22 13:45

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000387	U	0.00201	0.000387	mg/Kg		01/06/22 12:58	01/06/22 20:02	1
Toluene	<0.000458	U	0.00201	0.000458	mg/Kg		01/06/22 12:58	01/06/22 20:02	1
Ethylbenzene	<0.000567	U	0.00201	0.000567	mg/Kg		01/06/22 12:58	01/06/22 20:02	1
m-Xylene & p-Xylene	<0.00101	U	0.00402	0.00101	mg/Kg		01/06/22 12:58	01/06/22 20:02	1
o-Xylene	<0.000345	U	0.00201	0.000345	mg/Kg		01/06/22 12:58	01/06/22 20:02	1
Xylenes, Total	<0.00101	U	0.00402	0.00101	mg/Kg		01/06/22 12:58	01/06/22 20:02	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	128		70 - 130	01/06/22 12:58	01/06/22 20:02	1
1,4-Difluorobenzene (Surr)	115		70 - 130	01/06/22 12:58	01/06/22 20:02	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00402	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 20:30	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 20:30	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 20:30	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	74		70 - 130	01/06/22 13:57	01/06/22 20:30	1
o-Terphenyl	77		70 - 130	01/06/22 13:57	01/06/22 20:30	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	46.5		4.95	0.850	mg/Kg			01/08/22 17:09	1

Client Sample ID: SW-18

Lab Sample ID: 880-9906-10

Date Collected: 01/04/22 13:50

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/06/22 12:58	01/06/22 20:23	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/06/22 12:58	01/06/22 20:23	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/06/22 12:58	01/06/22 20:23	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 12:58	01/06/22 20:23	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/06/22 12:58	01/06/22 20:23	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 12:58	01/06/22 20:23	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	118		70 - 130	01/06/22 12:58	01/06/22 20:23	1
1,4-Difluorobenzene (Surr)	103		70 - 130	01/06/22 12:58	01/06/22 20:23	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-18

Lab Sample ID: 880-9906-10

Date Collected: 01/04/22 13:50

Matrix: Solid

Date Received: 01/06/22 00:00

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00400	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	77.2		49.9	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 20:51	1
Diesel Range Organics (Over C10-C28)	77.2	*1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 20:51	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 20:51	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	79		70 - 130				01/06/22 13:57	01/06/22 20:51	1
o-Terphenyl	83		70 - 130				01/06/22 13:57	01/06/22 20:51	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.7		4.99	0.857	mg/Kg			01/08/22 17:17	1

Client Sample ID: SW-19

Lab Sample ID: 880-9906-11

Date Collected: 01/04/22 13:55

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000384	U	0.00200	0.000384	mg/Kg		01/06/22 12:58	01/06/22 22:13	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg		01/06/22 12:58	01/06/22 22:13	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		01/06/22 12:58	01/06/22 22:13	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		01/06/22 12:58	01/06/22 22:13	1
o-Xylene	<0.000343	U	0.00200	0.000343	mg/Kg		01/06/22 12:58	01/06/22 22:13	1
Xylenes, Total	<0.00101	U	0.00399	0.00101	mg/Kg		01/06/22 12:58	01/06/22 22:13	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	117		70 - 130				01/06/22 12:58	01/06/22 22:13	1
1,4-Difluorobenzene (Surr)	103		70 - 130				01/06/22 12:58	01/06/22 22:13	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00399	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	59.3		50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 21:34	1
Diesel Range Organics (Over C10-C28)	59.3	*1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 21:34	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-19

Lab Sample ID: 880-9906-11

Date Collected: 01/04/22 13:55

Matrix: Solid

Date Received: 01/06/22 00:00

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 21:34	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	72		70 - 130				01/06/22 13:57	01/06/22 21:34	1
o-Terphenyl	76		70 - 130				01/06/22 13:57	01/06/22 21:34	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	15.3		5.00	0.858	mg/Kg			01/08/22 17:25	1

Client Sample ID: SW-20

Lab Sample ID: 880-9906-12

Date Collected: 01/04/22 14:00

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000389	U	0.00202	0.000389	mg/Kg		01/06/22 12:58	01/06/22 22:34	1
Toluene	<0.000461	U	0.00202	0.000461	mg/Kg		01/06/22 12:58	01/06/22 22:34	1
Ethylbenzene	<0.000571	U	0.00202	0.000571	mg/Kg		01/06/22 12:58	01/06/22 22:34	1
m-Xylene & p-Xylene	<0.00102	U	0.00404	0.00102	mg/Kg		01/06/22 12:58	01/06/22 22:34	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		01/06/22 12:58	01/06/22 22:34	1
Xylenes, Total	<0.00102	U	0.00404	0.00102	mg/Kg		01/06/22 12:58	01/06/22 22:34	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	108		70 - 130				01/06/22 12:58	01/06/22 22:34	1
1,4-Difluorobenzene (Surr)	99		70 - 130				01/06/22 12:58	01/06/22 22:34	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00404	0.00102	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 21:56	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 21:56	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 21:56	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	77		70 - 130				01/06/22 13:57	01/06/22 21:56	1
o-Terphenyl	80		70 - 130				01/06/22 13:57	01/06/22 21:56	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	6.46		4.98	0.855	mg/Kg			01/08/22 17:50	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-21

Lab Sample ID: 880-9906-13

Date Collected: 01/04/22 14:05

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00103	J	0.00199	0.000383	mg/Kg		01/06/22 12:58	01/06/22 22:54	1
Toluene	0.00178	J	0.00199	0.000453	mg/Kg		01/06/22 12:58	01/06/22 22:54	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		01/06/22 12:58	01/06/22 22:54	1
m-Xylene & p-Xylene	<0.00100	U	0.00398	0.00100	mg/Kg		01/06/22 12:58	01/06/22 22:54	1
o-Xylene	0.000977	J	0.00199	0.000342	mg/Kg		01/06/22 12:58	01/06/22 22:54	1
Xylenes, Total	<0.00100	U	0.00398	0.00100	mg/Kg		01/06/22 12:58	01/06/22 22:54	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	107		70 - 130	01/06/22 12:58	01/06/22 22:54	1
1,4-Difluorobenzene (Surr)	101		70 - 130	01/06/22 12:58	01/06/22 22:54	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00379	J	0.00398	0.00100	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 22:17	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 22:17	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 22:17	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	72		70 - 130	01/06/22 13:57	01/06/22 22:17	1
o-Terphenyl	76		70 - 130	01/06/22 13:57	01/06/22 22:17	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	14.5		4.95	0.850	mg/Kg			01/08/22 17:59	1

Client Sample ID: SW-22

Lab Sample ID: 880-9906-14

Date Collected: 01/04/22 14:10

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/06/22 12:58	01/06/22 23:15	1
Toluene	<0.000453	U	0.00199	0.000453	mg/Kg		01/06/22 12:58	01/06/22 23:15	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		01/06/22 12:58	01/06/22 23:15	1
m-Xylene & p-Xylene	<0.00100	U	0.00398	0.00100	mg/Kg		01/06/22 12:58	01/06/22 23:15	1
o-Xylene	0.00104	J	0.00199	0.000342	mg/Kg		01/06/22 12:58	01/06/22 23:15	1
Xylenes, Total	0.00104	J	0.00398	0.00100	mg/Kg		01/06/22 12:58	01/06/22 23:15	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	113		70 - 130	01/06/22 12:58	01/06/22 23:15	1
1,4-Difluorobenzene (Surr)	104		70 - 130	01/06/22 12:58	01/06/22 23:15	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-22

Lab Sample ID: 880-9906-14

Date Collected: 01/04/22 14:10

Matrix: Solid

Date Received: 01/06/22 00:00

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00104	J	0.00398	0.00100	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	66.1		49.9	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 22:39	1
Diesel Range Organics (Over C10-C28)	66.1	*1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 22:39	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 22:39	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	71		70 - 130				01/06/22 13:57	01/06/22 22:39	1
o-Terphenyl	75		70 - 130				01/06/22 13:57	01/06/22 22:39	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.93		4.95	0.850	mg/Kg			01/08/22 18:24	1

Client Sample ID: SW-23

Lab Sample ID: 880-9906-15

Date Collected: 01/04/22 14:15

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000387	U	0.00201	0.000387	mg/Kg		01/06/22 12:58	01/06/22 23:35	1
Toluene	0.00105	J	0.00201	0.000459	mg/Kg		01/06/22 12:58	01/06/22 23:35	1
Ethylbenzene	<0.000568	U	0.00201	0.000568	mg/Kg		01/06/22 12:58	01/06/22 23:35	1
m-Xylene & p-Xylene	0.00103	J	0.00402	0.00102	mg/Kg		01/06/22 12:58	01/06/22 23:35	1
o-Xylene	0.000593	J	0.00201	0.000346	mg/Kg		01/06/22 12:58	01/06/22 23:35	1
Xylenes, Total	0.00162	J	0.00402	0.00102	mg/Kg		01/06/22 12:58	01/06/22 23:35	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	113		70 - 130				01/06/22 12:58	01/06/22 23:35	1
1,4-Difluorobenzene (Surr)	104		70 - 130				01/06/22 12:58	01/06/22 23:35	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00267	J	0.00402	0.00102	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 23:00	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 23:00	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-23

Lab Sample ID: 880-9906-15

Date Collected: 01/04/22 14:15

Matrix: Solid

Date Received: 01/06/22 00:00

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 23:00	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	73		70 - 130				01/06/22 13:57	01/06/22 23:00	1
o-Terphenyl	76		70 - 130				01/06/22 13:57	01/06/22 23:00	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	19.7		5.04	0.865	mg/Kg			01/08/22 18:32	1

Client Sample ID: SW-24

Lab Sample ID: 880-9906-16

Date Collected: 01/04/22 14:20

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00136	J	0.00200	0.000386	mg/Kg		01/06/22 12:58	01/06/22 23:55	1
Toluene	0.00103	J	0.00200	0.000457	mg/Kg		01/06/22 12:58	01/06/22 23:55	1
Ethylbenzene	<0.000566	U	0.00200	0.000566	mg/Kg		01/06/22 12:58	01/06/22 23:55	1
m-Xylene & p-Xylene	<0.00101	U	0.00401	0.00101	mg/Kg		01/06/22 12:58	01/06/22 23:55	1
o-Xylene	0.000516	J	0.00200	0.000345	mg/Kg		01/06/22 12:58	01/06/22 23:55	1
Xylenes, Total	<0.00101	U	0.00401	0.00101	mg/Kg		01/06/22 12:58	01/06/22 23:55	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	117		70 - 130				01/06/22 12:58	01/06/22 23:55	1
1,4-Difluorobenzene (Surr)	106		70 - 130				01/06/22 12:58	01/06/22 23:55	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00291	J	0.00401	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 23:22	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 23:22	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 23:22	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	88		70 - 130				01/06/22 13:57	01/06/22 23:22	1
o-Terphenyl	92		70 - 130				01/06/22 13:57	01/06/22 23:22	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.4		5.00	0.858	mg/Kg			01/08/22 18:41	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-25

Lab Sample ID: 880-9906-17

Date Collected: 01/04/22 14:25

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg		01/06/22 12:58	01/07/22 00:16	1
Toluene	<0.000451	U	0.00198	0.000451	mg/Kg		01/06/22 12:58	01/07/22 00:16	1
Ethylbenzene	<0.000559	U	0.00198	0.000559	mg/Kg		01/06/22 12:58	01/07/22 00:16	1
m-Xylene & p-Xylene	<0.00100	U	0.00396	0.00100	mg/Kg		01/06/22 12:58	01/07/22 00:16	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		01/06/22 12:58	01/07/22 00:16	1
Xylenes, Total	<0.00100	U	0.00396	0.00100	mg/Kg		01/06/22 12:58	01/07/22 00:16	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	111		70 - 130	01/06/22 12:58	01/07/22 00:16	1
1,4-Difluorobenzene (Surr)	97		70 - 130	01/06/22 12:58	01/07/22 00:16	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00396	0.00100	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 23:43	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 23:43	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:57	01/06/22 23:43	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	75		70 - 130	01/06/22 13:57	01/06/22 23:43	1
o-Terphenyl	78		70 - 130	01/06/22 13:57	01/06/22 23:43	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	6.81		5.00	0.858	mg/Kg			01/08/22 18:49	1

Client Sample ID: SW-26

Lab Sample ID: 880-9906-18

Date Collected: 01/04/22 14:30

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00117	J	0.00198	0.000382	mg/Kg		01/06/22 12:58	01/07/22 00:36	1
Toluene	<0.000452	U	0.00198	0.000452	mg/Kg		01/06/22 12:58	01/07/22 00:36	1
Ethylbenzene	<0.000561	U	0.00198	0.000561	mg/Kg		01/06/22 12:58	01/07/22 00:36	1
m-Xylene & p-Xylene	0.00178	J	0.00397	0.00100	mg/Kg		01/06/22 12:58	01/07/22 00:36	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		01/06/22 12:58	01/07/22 00:36	1
Xylenes, Total	0.00178	J	0.00397	0.00100	mg/Kg		01/06/22 12:58	01/07/22 00:36	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	120		70 - 130	01/06/22 12:58	01/07/22 00:36	1
1,4-Difluorobenzene (Surr)	118		70 - 130	01/06/22 12:58	01/07/22 00:36	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-26

Lab Sample ID: 880-9906-18

Date Collected: 01/04/22 14:30

Matrix: Solid

Date Received: 01/06/22 00:00

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00295	J	0.00397	0.00100	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/07/22 00:04	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:57	01/07/22 00:04	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:57	01/07/22 00:04	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	74		70 - 130				01/06/22 13:57	01/07/22 00:04	1
o-Terphenyl	78		70 - 130				01/06/22 13:57	01/07/22 00:04	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	23.1		4.96	0.851	mg/Kg			01/08/22 18:57	1

Client Sample ID: Ramp-1

Lab Sample ID: 880-9906-19

Date Collected: 01/04/22 14:35

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/06/22 12:58	01/07/22 00:57	1
Toluene	0.00119	J	0.00199	0.000454	mg/Kg		01/06/22 12:58	01/07/22 00:57	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		01/06/22 12:58	01/07/22 00:57	1
m-Xylene & p-Xylene	0.00103	J	0.00398	0.00101	mg/Kg		01/06/22 12:58	01/07/22 00:57	1
o-Xylene	0.000428	J	0.00199	0.000343	mg/Kg		01/06/22 12:58	01/07/22 00:57	1
Xylenes, Total	0.00146	J	0.00398	0.00101	mg/Kg		01/06/22 12:58	01/07/22 00:57	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	106		70 - 130				01/06/22 12:58	01/07/22 00:57	1
1,4-Difluorobenzene (Surr)	96		70 - 130				01/06/22 12:58	01/07/22 00:57	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00265	J	0.00398	0.00101	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	180		50.0	15.0	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:57	01/07/22 00:26	1
Diesel Range Organics (Over C10-C28)	180	*1	50.0	15.0	mg/Kg		01/06/22 13:57	01/07/22 00:26	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: Ramp-1

Lab Sample ID: 880-9906-19

Date Collected: 01/04/22 14:35

Matrix: Solid

Date Received: 01/06/22 00:00

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/07/22 00:26	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	73		70 - 130				01/06/22 13:57	01/07/22 00:26	1
o-Terphenyl	77		70 - 130				01/06/22 13:57	01/07/22 00:26	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	4.65	J	5.02	0.862	mg/Kg			01/08/22 19:06	1

Client Sample ID: Ramp-2

Lab Sample ID: 880-9906-20

Date Collected: 01/04/22 14:40

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000513	J	0.00201	0.000387	mg/Kg		01/06/22 12:58	01/07/22 01:17	1
Toluene	0.000989	J	0.00201	0.000459	mg/Kg		01/06/22 12:58	01/07/22 01:17	1
Ethylbenzene	<0.000568	U	0.00201	0.000568	mg/Kg		01/06/22 12:58	01/07/22 01:17	1
m-Xylene & p-Xylene	<0.00102	U	0.00402	0.00102	mg/Kg		01/06/22 12:58	01/07/22 01:17	1
o-Xylene	0.00140	J	0.00201	0.000346	mg/Kg		01/06/22 12:58	01/07/22 01:17	1
Xylenes, Total	0.00140	J	0.00402	0.00102	mg/Kg		01/06/22 12:58	01/07/22 01:17	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	114		70 - 130				01/06/22 12:58	01/07/22 01:17	1
1,4-Difluorobenzene (Surr)	102		70 - 130				01/06/22 12:58	01/07/22 01:17	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00290	J	0.00402	0.00102	mg/Kg			01/07/22 08:34	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	170		49.8	14.9	mg/Kg			01/07/22 12:24	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<14.9	U *1	49.8	14.9	mg/Kg		01/06/22 13:57	01/07/22 00:47	1
Diesel Range Organics (Over C10-C28)	170	*1	49.8	14.9	mg/Kg		01/06/22 13:57	01/07/22 00:47	1
Oil Range Organics (Over C28-C36)	<14.9	U	49.8	14.9	mg/Kg		01/06/22 13:57	01/07/22 00:47	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	87		70 - 130				01/06/22 13:57	01/07/22 00:47	1
o-Terphenyl	87		70 - 130				01/06/22 13:57	01/07/22 00:47	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	3.55	J	4.98	0.855	mg/Kg			01/08/22 19:14	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: Ramp-3

Lab Sample ID: 880-9906-21

Date Collected: 01/04/22 14:45

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000389	U	0.00202	0.000389	mg/Kg		01/06/22 16:00	01/06/22 21:46	1
Toluene	0.00131	J	0.00202	0.000461	mg/Kg		01/06/22 16:00	01/06/22 21:46	1
Ethylbenzene	<0.000571	U	0.00202	0.000571	mg/Kg		01/06/22 16:00	01/06/22 21:46	1
m-Xylene & p-Xylene	<0.00102	U	0.00404	0.00102	mg/Kg		01/06/22 16:00	01/06/22 21:46	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		01/06/22 16:00	01/06/22 21:46	1
Xylenes, Total	<0.00102	U	0.00404	0.00102	mg/Kg		01/06/22 16:00	01/06/22 21:46	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	218	S1+	70 - 130	01/06/22 16:00	01/06/22 21:46	1
1,4-Difluorobenzene (Surr)	95		70 - 130	01/06/22 16:00	01/06/22 21:46	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00131	J	0.00404	0.00102	mg/Kg			01/07/22 08:42	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	166		50.0	15.0	mg/Kg			01/07/22 12:49	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:56	1
Diesel Range Organics (Over C10-C28)	166		50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:56	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:56	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	110		70 - 130	01/06/22 13:00	01/06/22 22:56	1
o-Terphenyl	112		70 - 130	01/06/22 13:00	01/06/22 22:56	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	11.1	F1	5.04	0.865	mg/Kg			01/10/22 11:08	1

Client Sample ID: Ramp-4

Lab Sample ID: 880-9906-22

Date Collected: 01/04/22 14:50

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/06/22 16:00	01/06/22 22:13	1
Toluene	0.000616	J	0.00199	0.000453	mg/Kg		01/06/22 16:00	01/06/22 22:13	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		01/06/22 16:00	01/06/22 22:13	1
m-Xylene & p-Xylene	<0.00100	U	0.00398	0.00100	mg/Kg		01/06/22 16:00	01/06/22 22:13	1
o-Xylene	<0.000342	U	0.00199	0.000342	mg/Kg		01/06/22 16:00	01/06/22 22:13	1
Xylenes, Total	<0.00100	U	0.00398	0.00100	mg/Kg		01/06/22 16:00	01/06/22 22:13	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	210	S1+	70 - 130	01/06/22 16:00	01/06/22 22:13	1
1,4-Difluorobenzene (Surr)	104		70 - 130	01/06/22 16:00	01/06/22 22:13	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: Ramp-4

Lab Sample ID: 880-9906-22

Date Collected: 01/04/22 14:50

Matrix: Solid

Date Received: 01/06/22 00:00

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00398	0.00100	mg/Kg			01/07/22 08:42	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	129		49.9	15.0	mg/Kg			01/07/22 12:49	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:17	1
Diesel Range Organics (Over C10-C28)	129		49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:17	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:17	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	102		70 - 130				01/06/22 13:00	01/06/22 23:17	1
o-Terphenyl	103		70 - 130				01/06/22 13:00	01/06/22 23:17	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	7.85		4.98	0.855	mg/Kg			01/10/22 11:34	1

Client Sample ID: Ramp-5

Lab Sample ID: 880-9906-23

Date Collected: 01/04/22 14:55

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/06/22 16:00	01/06/22 22:40	1
Toluene	0.000599	J	0.00199	0.000454	mg/Kg		01/06/22 16:00	01/06/22 22:40	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		01/06/22 16:00	01/06/22 22:40	1
m-Xylene & p-Xylene	<0.00101	U	0.00398	0.00101	mg/Kg		01/06/22 16:00	01/06/22 22:40	1
o-Xylene	<0.000343	U	0.00199	0.000343	mg/Kg		01/06/22 16:00	01/06/22 22:40	1
Xylenes, Total	<0.00101	U	0.00398	0.00101	mg/Kg		01/06/22 16:00	01/06/22 22:40	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	206	S1+	70 - 130				01/06/22 16:00	01/06/22 22:40	1
1,4-Difluorobenzene (Surr)	93		70 - 130				01/06/22 16:00	01/06/22 22:40	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00398	0.00101	mg/Kg			01/07/22 08:42	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	137		50.0	15.0	mg/Kg			01/07/22 12:49	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:38	1
Diesel Range Organics (Over C10-C28)	137		50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:38	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: Ramp-5

Lab Sample ID: 880-9906-23

Date Collected: 01/04/22 14:55

Matrix: Solid

Date Received: 01/06/22 00:00

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:38	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	105		70 - 130				01/06/22 13:00	01/06/22 23:38	1
o-Terphenyl	108		70 - 130				01/06/22 13:00	01/06/22 23:38	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.4		4.95	0.850	mg/Kg			01/10/22 11:42	1

Client Sample ID: Ramp-6

Lab Sample ID: 880-9906-24

Date Collected: 01/04/22 15:00

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000388	U	0.00202	0.000388	mg/Kg		01/06/22 16:00	01/06/22 23:07	1
Toluene	<0.000460	U	0.00202	0.000460	mg/Kg		01/06/22 16:00	01/06/22 23:07	1
Ethylbenzene	<0.000570	U	0.00202	0.000570	mg/Kg		01/06/22 16:00	01/06/22 23:07	1
m-Xylene & p-Xylene	<0.00102	U	0.00403	0.00102	mg/Kg		01/06/22 16:00	01/06/22 23:07	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		01/06/22 16:00	01/06/22 23:07	1
Xylenes, Total	<0.00102	U	0.00403	0.00102	mg/Kg		01/06/22 16:00	01/06/22 23:07	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	195	S1+	70 - 130				01/06/22 16:00	01/06/22 23:07	1
1,4-Difluorobenzene (Surr)	88		70 - 130				01/06/22 16:00	01/06/22 23:07	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00403	0.00102	mg/Kg			01/07/22 08:42	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	76.7		50.0	15.0	mg/Kg			01/07/22 12:49	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:59	1
Diesel Range Organics (Over C10-C28)	76.7		50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:59	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:59	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	102		70 - 130				01/06/22 13:00	01/06/22 23:59	1
o-Terphenyl	108		70 - 130				01/06/22 13:00	01/06/22 23:59	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	8.60		5.05	0.867	mg/Kg			01/10/22 11:51	1

Eurofins Midland

Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

Prep Type: Total/NA

Lab Sample ID	Client Sample ID	Percent Surrogate Recovery (Acceptance Limits)	
		BFB1 (70-130)	DFBZ1 (70-130)
880-9906-1	SW-9	115	114
880-9906-1 MS	SW-9	113	104
880-9906-1 MSD	SW-9	114	104
880-9906-2	SW-10	122	103
880-9906-3	SW-11	113	106
880-9906-4	SW-12	118	102
880-9906-5	SW-13	119	104
880-9906-6	SW-14	118	104
880-9906-7	SW-15	109	97
880-9906-8	SW-16	115	103
880-9906-9	SW-17	128	115
880-9906-10	SW-18	118	103
880-9906-11	SW-19	117	103
880-9906-12	SW-20	108	99
880-9906-13	SW-21	107	101
880-9906-14	SW-22	113	104
880-9906-15	SW-23	113	104
880-9906-16	SW-24	117	106
880-9906-17	SW-25	111	97
880-9906-18	SW-26	120	118
880-9906-19	Ramp-1	106	96
880-9906-20	Ramp-2	114	102
880-9906-21	Ramp-3	218 S1+	95
880-9906-22	Ramp-4	210 S1+	104
880-9906-23	Ramp-5	206 S1+	93
880-9906-24	Ramp-6	195 S1+	88
LCS 880-16093/1-A	Lab Control Sample	206 S1+	74
LCS 880-16149/1-A	Lab Control Sample	96	87
LCSD 880-16093/2-A	Lab Control Sample Dup	171 S1+	115
LCSD 880-16149/2-A	Lab Control Sample Dup	105	97
MB 880-16093/5-A	Method Blank	104	96
MB 880-16149/5-A	Method Blank	123	102

Surrogate Legend

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

Lab Sample ID	Client Sample ID	Percent Surrogate Recovery (Acceptance Limits)	
		1CO1 (70-130)	OTPH1 (70-130)
880-9906-1	SW-9	74	79
880-9906-1 MS	SW-9	75	73
880-9906-1 MSD	SW-9	76	74
880-9906-2	SW-10	76	80
880-9906-3	SW-11	85	85
880-9906-4	SW-12	77	82
880-9906-5	SW-13	77	84

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Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

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

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO1 (70-130)	OTPH1 (70-130)
880-9906-6	SW-14	89	93
880-9906-7	SW-15	78	83
880-9906-8	SW-16	76	80
880-9906-9	SW-17	74	77
880-9906-10	SW-18	79	83
880-9906-11	SW-19	72	76
880-9906-12	SW-20	77	80
880-9906-13	SW-21	72	76
880-9906-14	SW-22	71	75
880-9906-15	SW-23	73	76
880-9906-16	SW-24	88	92
880-9906-17	SW-25	75	78
880-9906-18	SW-26	74	78
880-9906-19	Ramp-1	73	77
880-9906-20	Ramp-2	87	87
880-9906-21	Ramp-3	110	112
880-9906-22	Ramp-4	102	103
880-9906-23	Ramp-5	105	108
880-9906-24	Ramp-6	102	108
LCS 880-16164/2-A	Lab Control Sample	103	105
LCSD 880-16164/3-A	Lab Control Sample Dup	135 S1+	135 S1+
MB 880-16164/1-A	Method Blank	82	92
Surrogate Legend			
1CO = 1-Chlorooctane			
OTPH = o-Terphenyl			

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO2 (70-130)	OTPH2 (70-130)
LCS 880-16124/2-A	Lab Control Sample	100	103
LCSD 880-16124/3-A	Lab Control Sample Dup	103	104
MB 880-16124/1-A	Method Blank	110	114
Surrogate Legend			
1CO = 1-Chlorooctane			
OTPH = o-Terphenyl			

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-16093/5-A

Matrix: Solid

Analysis Batch: 16114

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16093

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/06/22 07:45	01/06/22 12:37	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/06/22 07:45	01/06/22 12:37	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/06/22 07:45	01/06/22 12:37	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 07:45	01/06/22 12:37	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/06/22 07:45	01/06/22 12:37	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 07:45	01/06/22 12:37	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	104		70 - 130	01/06/22 07:45	01/06/22 12:37	1
1,4-Difluorobenzene (Surr)	96		70 - 130	01/06/22 07:45	01/06/22 12:37	1

Lab Sample ID: LCS 880-16093/1-A

Matrix: Solid

Analysis Batch: 16114

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 16093

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.09961		mg/Kg		100	70 - 130
Toluene	0.100	0.1069		mg/Kg		107	70 - 130
Ethylbenzene	0.100	0.1041		mg/Kg		104	70 - 130
m-Xylene & p-Xylene	0.200	0.2119		mg/Kg		106	70 - 130
o-Xylene	0.100	0.09340		mg/Kg		93	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	206	S1+	70 - 130
1,4-Difluorobenzene (Surr)	74		70 - 130

Lab Sample ID: LCSD 880-16093/2-A

Matrix: Solid

Analysis Batch: 16114

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 16093

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.1111		mg/Kg		111	70 - 130	11	35
Toluene	0.100	0.1028		mg/Kg		103	70 - 130	4	35
Ethylbenzene	0.100	0.1003		mg/Kg		100	70 - 130	4	35
m-Xylene & p-Xylene	0.200	0.2033		mg/Kg		102	70 - 130	4	35
o-Xylene	0.100	0.09628		mg/Kg		96	70 - 130	3	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	171	S1+	70 - 130
1,4-Difluorobenzene (Surr)	115		70 - 130

Lab Sample ID: MB 880-16149/5-A

Matrix: Solid

Analysis Batch: 16151

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16149

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/06/22 12:58	01/06/22 16:49	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/06/22 12:58	01/06/22 16:49	1

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: MB 880-16149/5-A

Matrix: Solid

Analysis Batch: 16151

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16149

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/06/22 12:58	01/06/22 16:49	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 12:58	01/06/22 16:49	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/06/22 12:58	01/06/22 16:49	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 12:58	01/06/22 16:49	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	123		70 - 130	01/06/22 12:58	01/06/22 16:49	1
1,4-Difluorobenzene (Surr)	102		70 - 130	01/06/22 12:58	01/06/22 16:49	1

Lab Sample ID: LCS 880-16149/1-A

Matrix: Solid

Analysis Batch: 16151

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 16149

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.08607		mg/Kg		86	70 - 130
Toluene	0.100	0.08965		mg/Kg		90	70 - 130
Ethylbenzene	0.100	0.09815		mg/Kg		98	70 - 130
m-Xylene & p-Xylene	0.200	0.1882		mg/Kg		94	70 - 130
o-Xylene	0.100	0.08899		mg/Kg		89	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	96		70 - 130
1,4-Difluorobenzene (Surr)	87		70 - 130

Lab Sample ID: LCSD 880-16149/2-A

Matrix: Solid

Analysis Batch: 16151

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 16149

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.09272		mg/Kg		93	70 - 130	7	35
Toluene	0.100	0.1062		mg/Kg		106	70 - 130	17	35
Ethylbenzene	0.100	0.1065		mg/Kg		106	70 - 130	8	35
m-Xylene & p-Xylene	0.200	0.2085		mg/Kg		104	70 - 130	10	35
o-Xylene	0.100	0.09736		mg/Kg		97	70 - 130	9	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	105		70 - 130
1,4-Difluorobenzene (Surr)	97		70 - 130

Lab Sample ID: 880-9906-1 MS

Matrix: Solid

Analysis Batch: 16151

Client Sample ID: SW-9

Prep Type: Total/NA

Prep Batch: 16149

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	<0.000383	U	0.0998	0.08669		mg/Kg		87	70 - 130
Toluene	<0.000453	U	0.0998	0.08765		mg/Kg		88	70 - 130
Ethylbenzene	<0.000562	U	0.0998	0.09299		mg/Kg		93	70 - 130
m-Xylene & p-Xylene	<0.00100	U	0.200	0.1775		mg/Kg		89	70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 880-9906-1 MS

Matrix: Solid

Analysis Batch: 16151

Client Sample ID: SW-9

Prep Type: Total/NA

Prep Batch: 16149

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
o-Xylene	<0.000342	U	0.0998	0.08719		mg/Kg		87	70 - 130
Surrogate	MS %Recovery	MS Qualifier	Limits						
4-Bromofluorobenzene (Surr)	113		70 - 130						
1,4-Difluorobenzene (Surr)	104		70 - 130						

Lab Sample ID: 880-9906-1 MSD

Matrix: Solid

Analysis Batch: 16151

Client Sample ID: SW-9

Prep Type: Total/NA

Prep Batch: 16149

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.000383	U	0.100	0.09017		mg/Kg		90	70 - 130	4	35
Toluene	<0.000453	U	0.100	0.09997		mg/Kg		100	70 - 130	13	35
Ethylbenzene	<0.000562	U	0.100	0.09771		mg/Kg		97	70 - 130	5	35
m-Xylene & p-Xylene	<0.00100	U	0.201	0.1936		mg/Kg		96	70 - 130	9	35
o-Xylene	<0.000342	U	0.100	0.09390		mg/Kg		94	70 - 130	7	35
Surrogate	MSD %Recovery	MSD Qualifier	Limits								
4-Bromofluorobenzene (Surr)	114		70 - 130								
1,4-Difluorobenzene (Surr)	104		70 - 130								

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 880-16124/1-A

Matrix: Solid

Analysis Batch: 16116

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16124

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 11:08	01/06/22 19:45	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 11:08	01/06/22 19:45	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 11:08	01/06/22 19:45	1
Surrogate	MB %Recovery	MB Qualifier	Limits						
1-Chlorooctane	110		70 - 130						
o-Terphenyl	114		70 - 130						

Lab Sample ID: LCS 880-16124/2-A

Matrix: Solid

Analysis Batch: 16116

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 16124

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	920.2		mg/Kg		92	70 - 130
Diesel Range Organics (Over C10-C28)	1000	977.5		mg/Kg		98	70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

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

Lab Sample ID: LCS 880-16124/2-A

Matrix: Solid

Analysis Batch: 16116

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 16124

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	100		70 - 130
o-Terphenyl	103		70 - 130

Lab Sample ID: LCSD 880-16124/3-A

Matrix: Solid

Analysis Batch: 16116

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 16124

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	927.2		mg/Kg		93	70 - 130	1	20
Diesel Range Organics (Over C10-C28)	1000	973.5		mg/Kg		97	70 - 130	0	20

	LCSD	LCSD	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	103		70 - 130
o-Terphenyl	104		70 - 130

Lab Sample ID: MB 880-16164/1-A

Matrix: Solid

Analysis Batch: 16119

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16164

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 15:37	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 15:37	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:57	01/06/22 15:37	1

	MB	MB					Prepared	Analyzed	Dil Fac
Surrogate	%Recovery	Qualifier	Limits						
1-Chlorooctane	82		70 - 130				01/06/22 13:57	01/06/22 15:37	1
o-Terphenyl	92		70 - 130				01/06/22 13:57	01/06/22 15:37	1

Lab Sample ID: LCS 880-16164/2-A

Matrix: Solid

Analysis Batch: 16119

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 16164

	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Gasoline Range Organics (GRO)-C6-C10	1000	877.7		mg/Kg		88	70 - 130		
Diesel Range Organics (Over C10-C28)	1000	849.8		mg/Kg		85	70 - 130		

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	103		70 - 130
o-Terphenyl	105		70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

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

Lab Sample ID: LCSD 880-16164/3-A

Matrix: Solid

Analysis Batch: 16119

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 16164

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	1142	*1	mg/Kg		114	70 - 130	26	20
Diesel Range Organics (Over C10-C28)	1000	1150	*1	mg/Kg		115	70 - 130	30	20
		LCSD %Recovery	LCSD Qualifier						
Surrogate									
1-Chlorooctane		135	S1+						
o-Terphenyl		135	S1+						

Lab Sample ID: 880-9906-1 MS

Matrix: Solid

Analysis Batch: 16119

Client Sample ID: SW-9

Prep Type: Total/NA

Prep Batch: 16164

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	19.0	J *1	996	838.4		mg/Kg		82	70 - 130		
Diesel Range Organics (Over C10-C28)	60.9	*1	996	799.3		mg/Kg		74	70 - 130		
		MS %Recovery	MS Qualifier								
Surrogate											
1-Chlorooctane		75									
o-Terphenyl		73									

Lab Sample ID: 880-9906-1 MSD

Matrix: Solid

Analysis Batch: 16119

Client Sample ID: SW-9

Prep Type: Total/NA

Prep Batch: 16164

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	19.0	J *1	999	875.2		mg/Kg		86	70 - 130	4	20
Diesel Range Organics (Over C10-C28)	60.9	*1	999	838.6		mg/Kg		78	70 - 130	5	20
		MSD %Recovery	MSD Qualifier								
Surrogate											
1-Chlorooctane		76									
o-Terphenyl		74									

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-16227/1-A

Matrix: Solid

Analysis Batch: 16331

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			01/07/22 23:29	1

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: LCS 880-16227/2-A

Matrix: Solid

Analysis Batch: 16331

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	240.4		mg/Kg		96	90 - 110

Lab Sample ID: LCSD 880-16227/3-A

Matrix: Solid

Analysis Batch: 16331

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	250	226.0		mg/Kg		90	90 - 110	6	20

Lab Sample ID: 880-9906-1 MS

Matrix: Solid

Analysis Batch: 16331

Client Sample ID: SW-9

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	16.7	F1	253	210.9	F1	mg/Kg		77	90 - 110

Lab Sample ID: 880-9906-1 MSD

Matrix: Solid

Analysis Batch: 16331

Client Sample ID: SW-9

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	16.7	F1	253	202.5	F1	mg/Kg		74	90 - 110	4	20

Lab Sample ID: 880-9906-11 MS

Matrix: Solid

Analysis Batch: 16331

Client Sample ID: SW-19

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	15.3		250	285.6		mg/Kg		108	90 - 110

Lab Sample ID: 880-9906-11 MSD

Matrix: Solid

Analysis Batch: 16331

Client Sample ID: SW-19

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	15.3		250	288.6		mg/Kg		109	90 - 110	1	20

Lab Sample ID: MB 880-16230/1-A

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			01/10/22 10:15	1

Lab Sample ID: LCS 880-16230/2-A

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	244.2		mg/Kg		98	90 - 110

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: LCSD 880-16230/3-A

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride			250	261.9		mg/Kg		105	90 - 110	7	20

Lab Sample ID: 880-9906-21 MS

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: Ramp-3

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride	11.1	F1	252	291.4	F1	mg/Kg		111	90 - 110		

Lab Sample ID: 880-9906-21 MSD

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: Ramp-3

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	11.1	F1	252	300.3	F1	mg/Kg		115	90 - 110	3	20

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

GC VOA

Prep Batch: 16093

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-21	Ramp-3	Total/NA	Solid	5035	
880-9906-22	Ramp-4	Total/NA	Solid	5035	
880-9906-23	Ramp-5	Total/NA	Solid	5035	
880-9906-24	Ramp-6	Total/NA	Solid	5035	
MB 880-16093/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-16093/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-16093/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Analysis Batch: 16114

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-21	Ramp-3	Total/NA	Solid	8021B	16093
880-9906-22	Ramp-4	Total/NA	Solid	8021B	16093
880-9906-23	Ramp-5	Total/NA	Solid	8021B	16093
880-9906-24	Ramp-6	Total/NA	Solid	8021B	16093
MB 880-16093/5-A	Method Blank	Total/NA	Solid	8021B	16093
LCS 880-16093/1-A	Lab Control Sample	Total/NA	Solid	8021B	16093
LCSD 880-16093/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	16093

Prep Batch: 16149

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-1	SW-9	Total/NA	Solid	5035	
880-9906-2	SW-10	Total/NA	Solid	5035	
880-9906-3	SW-11	Total/NA	Solid	5035	
880-9906-4	SW-12	Total/NA	Solid	5035	
880-9906-5	SW-13	Total/NA	Solid	5035	
880-9906-6	SW-14	Total/NA	Solid	5035	
880-9906-7	SW-15	Total/NA	Solid	5035	
880-9906-8	SW-16	Total/NA	Solid	5035	
880-9906-9	SW-17	Total/NA	Solid	5035	
880-9906-10	SW-18	Total/NA	Solid	5035	
880-9906-11	SW-19	Total/NA	Solid	5035	
880-9906-12	SW-20	Total/NA	Solid	5035	
880-9906-13	SW-21	Total/NA	Solid	5035	
880-9906-14	SW-22	Total/NA	Solid	5035	
880-9906-15	SW-23	Total/NA	Solid	5035	
880-9906-16	SW-24	Total/NA	Solid	5035	
880-9906-17	SW-25	Total/NA	Solid	5035	
880-9906-18	SW-26	Total/NA	Solid	5035	
880-9906-19	Ramp-1	Total/NA	Solid	5035	
880-9906-20	Ramp-2	Total/NA	Solid	5035	
MB 880-16149/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-16149/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-16149/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-9906-1 MS	SW-9	Total/NA	Solid	5035	
880-9906-1 MSD	SW-9	Total/NA	Solid	5035	

Analysis Batch: 16151

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-1	SW-9	Total/NA	Solid	8021B	16149
880-9906-2	SW-10	Total/NA	Solid	8021B	16149
880-9906-3	SW-11	Total/NA	Solid	8021B	16149

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

GC VOA (Continued)

Analysis Batch: 16151 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-4	SW-12	Total/NA	Solid	8021B	16149
880-9906-5	SW-13	Total/NA	Solid	8021B	16149
880-9906-6	SW-14	Total/NA	Solid	8021B	16149
880-9906-7	SW-15	Total/NA	Solid	8021B	16149
880-9906-8	SW-16	Total/NA	Solid	8021B	16149
880-9906-9	SW-17	Total/NA	Solid	8021B	16149
880-9906-10	SW-18	Total/NA	Solid	8021B	16149
880-9906-11	SW-19	Total/NA	Solid	8021B	16149
880-9906-12	SW-20	Total/NA	Solid	8021B	16149
880-9906-13	SW-21	Total/NA	Solid	8021B	16149
880-9906-14	SW-22	Total/NA	Solid	8021B	16149
880-9906-15	SW-23	Total/NA	Solid	8021B	16149
880-9906-16	SW-24	Total/NA	Solid	8021B	16149
880-9906-17	SW-25	Total/NA	Solid	8021B	16149
880-9906-18	SW-26	Total/NA	Solid	8021B	16149
880-9906-19	Ramp-1	Total/NA	Solid	8021B	16149
880-9906-20	Ramp-2	Total/NA	Solid	8021B	16149
MB 880-16149/5-A	Method Blank	Total/NA	Solid	8021B	16149
LCS 880-16149/1-A	Lab Control Sample	Total/NA	Solid	8021B	16149
LCSD 880-16149/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	16149
880-9906-1 MS	SW-9	Total/NA	Solid	8021B	16149
880-9906-1 MSD	SW-9	Total/NA	Solid	8021B	16149

Analysis Batch: 16205

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-1	SW-9	Total/NA	Solid	Total BTEX	
880-9906-2	SW-10	Total/NA	Solid	Total BTEX	
880-9906-3	SW-11	Total/NA	Solid	Total BTEX	
880-9906-4	SW-12	Total/NA	Solid	Total BTEX	
880-9906-5	SW-13	Total/NA	Solid	Total BTEX	
880-9906-6	SW-14	Total/NA	Solid	Total BTEX	
880-9906-7	SW-15	Total/NA	Solid	Total BTEX	
880-9906-8	SW-16	Total/NA	Solid	Total BTEX	
880-9906-9	SW-17	Total/NA	Solid	Total BTEX	
880-9906-10	SW-18	Total/NA	Solid	Total BTEX	
880-9906-11	SW-19	Total/NA	Solid	Total BTEX	
880-9906-12	SW-20	Total/NA	Solid	Total BTEX	
880-9906-13	SW-21	Total/NA	Solid	Total BTEX	
880-9906-14	SW-22	Total/NA	Solid	Total BTEX	
880-9906-15	SW-23	Total/NA	Solid	Total BTEX	
880-9906-16	SW-24	Total/NA	Solid	Total BTEX	
880-9906-17	SW-25	Total/NA	Solid	Total BTEX	
880-9906-18	SW-26	Total/NA	Solid	Total BTEX	
880-9906-19	Ramp-1	Total/NA	Solid	Total BTEX	
880-9906-20	Ramp-2	Total/NA	Solid	Total BTEX	

Analysis Batch: 16207

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-21	Ramp-3	Total/NA	Solid	Total BTEX	
880-9906-22	Ramp-4	Total/NA	Solid	Total BTEX	
880-9906-23	Ramp-5	Total/NA	Solid	Total BTEX	

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

GC VOA (Continued)

Analysis Batch: 16207 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-24	Ramp-6	Total/NA	Solid	Total BTEX	

GC Semi VOA

Analysis Batch: 16116

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-21	Ramp-3	Total/NA	Solid	8015B NM	16124
880-9906-22	Ramp-4	Total/NA	Solid	8015B NM	16124
880-9906-23	Ramp-5	Total/NA	Solid	8015B NM	16124
880-9906-24	Ramp-6	Total/NA	Solid	8015B NM	16124
MB 880-16124/1-A	Method Blank	Total/NA	Solid	8015B NM	16124
LCS 880-16124/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	16124
LCSD 880-16124/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	16124

Analysis Batch: 16119

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-1	SW-9	Total/NA	Solid	8015B NM	16164
880-9906-2	SW-10	Total/NA	Solid	8015B NM	16164
880-9906-3	SW-11	Total/NA	Solid	8015B NM	16164
880-9906-4	SW-12	Total/NA	Solid	8015B NM	16164
880-9906-5	SW-13	Total/NA	Solid	8015B NM	16164
880-9906-6	SW-14	Total/NA	Solid	8015B NM	16164
880-9906-7	SW-15	Total/NA	Solid	8015B NM	16164
880-9906-8	SW-16	Total/NA	Solid	8015B NM	16164
880-9906-9	SW-17	Total/NA	Solid	8015B NM	16164
880-9906-10	SW-18	Total/NA	Solid	8015B NM	16164
880-9906-11	SW-19	Total/NA	Solid	8015B NM	16164
880-9906-12	SW-20	Total/NA	Solid	8015B NM	16164
880-9906-13	SW-21	Total/NA	Solid	8015B NM	16164
880-9906-14	SW-22	Total/NA	Solid	8015B NM	16164
880-9906-15	SW-23	Total/NA	Solid	8015B NM	16164
880-9906-16	SW-24	Total/NA	Solid	8015B NM	16164
880-9906-17	SW-25	Total/NA	Solid	8015B NM	16164
880-9906-18	SW-26	Total/NA	Solid	8015B NM	16164
880-9906-19	Ramp-1	Total/NA	Solid	8015B NM	16164
880-9906-20	Ramp-2	Total/NA	Solid	8015B NM	16164
MB 880-16164/1-A	Method Blank	Total/NA	Solid	8015B NM	16164
LCS 880-16164/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	16164
LCSD 880-16164/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	16164
880-9906-1 MS	SW-9	Total/NA	Solid	8015B NM	16164
880-9906-1 MSD	SW-9	Total/NA	Solid	8015B NM	16164

Prep Batch: 16124

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-21	Ramp-3	Total/NA	Solid	8015NM Prep	
880-9906-22	Ramp-4	Total/NA	Solid	8015NM Prep	
880-9906-23	Ramp-5	Total/NA	Solid	8015NM Prep	
880-9906-24	Ramp-6	Total/NA	Solid	8015NM Prep	
MB 880-16124/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-16124/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-16124/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

GC Semi VOA

Prep Batch: 16164

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-1	SW-9	Total/NA	Solid	8015NM Prep	
880-9906-2	SW-10	Total/NA	Solid	8015NM Prep	
880-9906-3	SW-11	Total/NA	Solid	8015NM Prep	
880-9906-4	SW-12	Total/NA	Solid	8015NM Prep	
880-9906-5	SW-13	Total/NA	Solid	8015NM Prep	
880-9906-6	SW-14	Total/NA	Solid	8015NM Prep	
880-9906-7	SW-15	Total/NA	Solid	8015NM Prep	
880-9906-8	SW-16	Total/NA	Solid	8015NM Prep	
880-9906-9	SW-17	Total/NA	Solid	8015NM Prep	
880-9906-10	SW-18	Total/NA	Solid	8015NM Prep	
880-9906-11	SW-19	Total/NA	Solid	8015NM Prep	
880-9906-12	SW-20	Total/NA	Solid	8015NM Prep	
880-9906-13	SW-21	Total/NA	Solid	8015NM Prep	
880-9906-14	SW-22	Total/NA	Solid	8015NM Prep	
880-9906-15	SW-23	Total/NA	Solid	8015NM Prep	
880-9906-16	SW-24	Total/NA	Solid	8015NM Prep	
880-9906-17	SW-25	Total/NA	Solid	8015NM Prep	
880-9906-18	SW-26	Total/NA	Solid	8015NM Prep	
880-9906-19	Ramp-1	Total/NA	Solid	8015NM Prep	
880-9906-20	Ramp-2	Total/NA	Solid	8015NM Prep	
MB 880-16164/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-16164/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-16164/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-9906-1 MS	SW-9	Total/NA	Solid	8015NM Prep	
880-9906-1 MSD	SW-9	Total/NA	Solid	8015NM Prep	

Analysis Batch: 16246

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-1	SW-9	Total/NA	Solid	8015 NM	
880-9906-2	SW-10	Total/NA	Solid	8015 NM	
880-9906-3	SW-11	Total/NA	Solid	8015 NM	
880-9906-4	SW-12	Total/NA	Solid	8015 NM	
880-9906-5	SW-13	Total/NA	Solid	8015 NM	
880-9906-6	SW-14	Total/NA	Solid	8015 NM	
880-9906-7	SW-15	Total/NA	Solid	8015 NM	
880-9906-8	SW-16	Total/NA	Solid	8015 NM	
880-9906-9	SW-17	Total/NA	Solid	8015 NM	
880-9906-10	SW-18	Total/NA	Solid	8015 NM	
880-9906-11	SW-19	Total/NA	Solid	8015 NM	
880-9906-12	SW-20	Total/NA	Solid	8015 NM	
880-9906-13	SW-21	Total/NA	Solid	8015 NM	
880-9906-14	SW-22	Total/NA	Solid	8015 NM	
880-9906-15	SW-23	Total/NA	Solid	8015 NM	
880-9906-16	SW-24	Total/NA	Solid	8015 NM	
880-9906-17	SW-25	Total/NA	Solid	8015 NM	
880-9906-18	SW-26	Total/NA	Solid	8015 NM	
880-9906-19	Ramp-1	Total/NA	Solid	8015 NM	
880-9906-20	Ramp-2	Total/NA	Solid	8015 NM	
880-9906-21	Ramp-3	Total/NA	Solid	8015 NM	
880-9906-22	Ramp-4	Total/NA	Solid	8015 NM	
880-9906-23	Ramp-5	Total/NA	Solid	8015 NM	

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

GC Semi VOA (Continued)

Analysis Batch: 16246 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-24	Ramp-6	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 16227

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-1	SW-9	Soluble	Solid	DI Leach	
880-9906-2	SW-10	Soluble	Solid	DI Leach	
880-9906-3	SW-11	Soluble	Solid	DI Leach	
880-9906-4	SW-12	Soluble	Solid	DI Leach	
880-9906-5	SW-13	Soluble	Solid	DI Leach	
880-9906-6	SW-14	Soluble	Solid	DI Leach	
880-9906-7	SW-15	Soluble	Solid	DI Leach	
880-9906-8	SW-16	Soluble	Solid	DI Leach	
880-9906-9	SW-17	Soluble	Solid	DI Leach	
880-9906-10	SW-18	Soluble	Solid	DI Leach	
880-9906-11	SW-19	Soluble	Solid	DI Leach	
880-9906-12	SW-20	Soluble	Solid	DI Leach	
880-9906-13	SW-21	Soluble	Solid	DI Leach	
880-9906-14	SW-22	Soluble	Solid	DI Leach	
880-9906-15	SW-23	Soluble	Solid	DI Leach	
880-9906-16	SW-24	Soluble	Solid	DI Leach	
880-9906-17	SW-25	Soluble	Solid	DI Leach	
880-9906-18	SW-26	Soluble	Solid	DI Leach	
880-9906-19	Ramp-1	Soluble	Solid	DI Leach	
880-9906-20	Ramp-2	Soluble	Solid	DI Leach	
MB 880-16227/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-16227/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-16227/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-9906-1 MS	SW-9	Soluble	Solid	DI Leach	
880-9906-1 MSD	SW-9	Soluble	Solid	DI Leach	
880-9906-11 MS	SW-19	Soluble	Solid	DI Leach	
880-9906-11 MSD	SW-19	Soluble	Solid	DI Leach	

Leach Batch: 16230

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-21	Ramp-3	Soluble	Solid	DI Leach	
880-9906-22	Ramp-4	Soluble	Solid	DI Leach	
880-9906-23	Ramp-5	Soluble	Solid	DI Leach	
880-9906-24	Ramp-6	Soluble	Solid	DI Leach	
MB 880-16230/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-16230/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-16230/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-9906-21 MS	Ramp-3	Soluble	Solid	DI Leach	
880-9906-21 MSD	Ramp-3	Soluble	Solid	DI Leach	

Analysis Batch: 16331

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-1	SW-9	Soluble	Solid	300.0	16227
880-9906-2	SW-10	Soluble	Solid	300.0	16227
880-9906-3	SW-11	Soluble	Solid	300.0	16227

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

HPLC/IC (Continued)

Analysis Batch: 16331 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-4	SW-12	Soluble	Solid	300.0	16227
880-9906-5	SW-13	Soluble	Solid	300.0	16227
880-9906-6	SW-14	Soluble	Solid	300.0	16227
880-9906-7	SW-15	Soluble	Solid	300.0	16227
880-9906-8	SW-16	Soluble	Solid	300.0	16227
880-9906-9	SW-17	Soluble	Solid	300.0	16227
880-9906-10	SW-18	Soluble	Solid	300.0	16227
880-9906-11	SW-19	Soluble	Solid	300.0	16227
880-9906-12	SW-20	Soluble	Solid	300.0	16227
880-9906-13	SW-21	Soluble	Solid	300.0	16227
880-9906-14	SW-22	Soluble	Solid	300.0	16227
880-9906-15	SW-23	Soluble	Solid	300.0	16227
880-9906-16	SW-24	Soluble	Solid	300.0	16227
880-9906-17	SW-25	Soluble	Solid	300.0	16227
880-9906-18	SW-26	Soluble	Solid	300.0	16227
880-9906-19	Ramp-1	Soluble	Solid	300.0	16227
880-9906-20	Ramp-2	Soluble	Solid	300.0	16227
MB 880-16227/1-A	Method Blank	Soluble	Solid	300.0	16227
LCS 880-16227/2-A	Lab Control Sample	Soluble	Solid	300.0	16227
LCSD 880-16227/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	16227
880-9906-1 MS	SW-9	Soluble	Solid	300.0	16227
880-9906-1 MSD	SW-9	Soluble	Solid	300.0	16227
880-9906-11 MS	SW-19	Soluble	Solid	300.0	16227
880-9906-11 MSD	SW-19	Soluble	Solid	300.0	16227

Analysis Batch: 16332

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9906-21	Ramp-3	Soluble	Solid	300.0	16230
880-9906-22	Ramp-4	Soluble	Solid	300.0	16230
880-9906-23	Ramp-5	Soluble	Solid	300.0	16230
880-9906-24	Ramp-6	Soluble	Solid	300.0	16230
MB 880-16230/1-A	Method Blank	Soluble	Solid	300.0	16230
LCS 880-16230/2-A	Lab Control Sample	Soluble	Solid	300.0	16230
LCSD 880-16230/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	16230
880-9906-21 MS	Ramp-3	Soluble	Solid	300.0	16230
880-9906-21 MSD	Ramp-3	Soluble	Solid	300.0	16230

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-9

Lab Sample ID: 880-9906-1

Date Collected: 01/04/22 13:00

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 17:18	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 16:58	AJ	XEN MID
Soluble	Leach	DI Leach			4.95 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/07/22 23:54	CH	XEN MID

Client Sample ID: SW-10

Lab Sample ID: 880-9906-2

Date Collected: 01/04/22 13:05

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.00 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 17:39	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 18:00	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 00:19	CH	XEN MID

Client Sample ID: SW-11

Lab Sample ID: 880-9906-3

Date Collected: 01/04/22 13:10

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.00 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 17:59	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 18:21	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 00:27	CH	XEN MID

Client Sample ID: SW-12

Lab Sample ID: 880-9906-4

Date Collected: 01/04/22 13:15

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 18:20	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-12

Lab Sample ID: 880-9906-4

Date Collected: 01/04/22 13:15

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 18:42	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 00:36	CH	XEN MID

Client Sample ID: SW-13

Lab Sample ID: 880-9906-5

Date Collected: 01/04/22 13:20

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 18:40	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 19:04	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 00:44	CH	XEN MID

Client Sample ID: SW-14

Lab Sample ID: 880-9906-6

Date Collected: 01/04/22 13:25

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 19:01	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 19:25	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 01:09	CH	XEN MID

Client Sample ID: SW-15

Lab Sample ID: 880-9906-7

Date Collected: 01/04/22 13:30

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.98 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 19:21	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 19:47	AJ	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-15

Lab Sample ID: 880-9906-7

Date Collected: 01/04/22 13:30

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			5 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 01:17	CH	XEN MID

Client Sample ID: SW-16

Lab Sample ID: 880-9906-8

Date Collected: 01/04/22 13:40

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.99 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 19:42	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 20:08	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 01:26	CH	XEN MID

Client Sample ID: SW-17

Lab Sample ID: 880-9906-9

Date Collected: 01/04/22 13:45

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.98 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 20:02	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 20:30	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 17:09	CH	XEN MID

Client Sample ID: SW-18

Lab Sample ID: 880-9906-10

Date Collected: 01/04/22 13:50

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.00 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 20:23	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 20:51	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 17:17	CH	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-19

Lab Sample ID: 880-9906-11

Date Collected: 01/04/22 13:55

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 22:13	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 21:34	AJ	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 17:25	CH	XEN MID

Client Sample ID: SW-20

Lab Sample ID: 880-9906-12

Date Collected: 01/04/22 14:00

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.95 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 22:34	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 21:56	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 17:50	CH	XEN MID

Client Sample ID: SW-21

Lab Sample ID: 880-9906-13

Date Collected: 01/04/22 14:05

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 22:54	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 22:17	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 17:59	CH	XEN MID

Client Sample ID: SW-22

Lab Sample ID: 880-9906-14

Date Collected: 01/04/22 14:10

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 23:15	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-22

Lab Sample ID: 880-9906-14

Date Collected: 01/04/22 14:10

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 22:39	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 18:24	CH	XEN MID

Client Sample ID: SW-23

Lab Sample ID: 880-9906-15

Date Collected: 01/04/22 14:15

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.97 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 23:35	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 23:00	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 18:32	CH	XEN MID

Client Sample ID: SW-24

Lab Sample ID: 880-9906-16

Date Collected: 01/04/22 14:20

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.99 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/06/22 23:55	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 23:22	AJ	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 18:41	CH	XEN MID

Client Sample ID: SW-25

Lab Sample ID: 880-9906-17

Date Collected: 01/04/22 14:25

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/07/22 00:16	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/06/22 23:43	AJ	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: SW-25

Lab Sample ID: 880-9906-17

Date Collected: 01/04/22 14:25

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			5 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 18:49	CH	XEN MID

Client Sample ID: SW-26

Lab Sample ID: 880-9906-18

Date Collected: 01/04/22 14:30

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.04 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/07/22 00:36	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/07/22 00:04	AJ	XEN MID
Soluble	Leach	DI Leach			5.04 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 18:57	CH	XEN MID

Client Sample ID: Ramp-1

Lab Sample ID: 880-9906-19

Date Collected: 01/04/22 14:35

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/07/22 00:57	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/07/22 00:26	AJ	XEN MID
Soluble	Leach	DI Leach			4.98 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 19:06	CH	XEN MID

Client Sample ID: Ramp-2

Lab Sample ID: 880-9906-20

Date Collected: 01/04/22 14:40

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.97 g	5 mL	16149	01/06/22 12:58	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16151	01/07/22 01:17	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16205	01/07/22 08:34	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:24	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.04 g	10 mL	16164	01/06/22 13:57	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16119	01/07/22 00:47	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	16227	01/07/22 10:06	CH	XEN MID
Soluble	Analysis	300.0		1			16331	01/08/22 19:14	CH	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: Ramp-3

Lab Sample ID: 880-9906-21

Date Collected: 01/04/22 14:45

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.95 g	5 mL	16093	01/06/22 16:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16114	01/06/22 21:46	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16207	01/07/22 08:42	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:49	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16124	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16116	01/06/22 22:56	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 11:08	CH	XEN MID

Client Sample ID: Ramp-4

Lab Sample ID: 880-9906-22

Date Collected: 01/04/22 14:50

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	16093	01/06/22 16:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16114	01/06/22 22:13	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16207	01/07/22 08:42	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:49	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16124	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16116	01/06/22 23:17	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 11:34	CH	XEN MID

Client Sample ID: Ramp-5

Lab Sample ID: 880-9906-23

Date Collected: 01/04/22 14:55

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	16093	01/06/22 16:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16114	01/06/22 22:40	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16207	01/07/22 08:42	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:49	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16124	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16116	01/06/22 23:38	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 11:42	CH	XEN MID

Client Sample ID: Ramp-6

Lab Sample ID: 880-9906-24

Date Collected: 01/04/22 15:00

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	16093	01/06/22 16:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16114	01/06/22 23:07	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16207	01/07/22 08:42	KL	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Client Sample ID: Ramp-6
Date Collected: 01/04/22 15:00
Date Received: 01/06/22 00:00

Lab Sample ID: 880-9906-24
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			16246	01/07/22 12:49	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16124	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16116	01/06/22 23:59	AJ	XEN MID
Soluble	Leach	DI Leach			4.95 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 11:51	CH	XEN MID

Laboratory References:
XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

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

Accreditation/Certification Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Laboratory: Eurofins Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Program	Identification Number	Expiration Date
Texas	NELAP	T104704400-21-22	06-30-22

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
8015 NM		Solid	Total TPH
Total BTEX		Solid	Total BTEX

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

Method Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

Protocol References:

ASTM = ASTM International

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

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

TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

Laboratory References:

XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Sample Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9906-1
SDG: Eddy County, NM

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
880-9906-1	SW-9	Solid	01/04/22 13:00	01/06/22 00:00
880-9906-2	SW-10	Solid	01/04/22 13:05	01/06/22 00:00
880-9906-3	SW-11	Solid	01/04/22 13:10	01/06/22 00:00
880-9906-4	SW-12	Solid	01/04/22 13:15	01/06/22 00:00
880-9906-5	SW-13	Solid	01/04/22 13:20	01/06/22 00:00
880-9906-6	SW-14	Solid	01/04/22 13:25	01/06/22 00:00
880-9906-7	SW-15	Solid	01/04/22 13:30	01/06/22 00:00
880-9906-8	SW-16	Solid	01/04/22 13:40	01/06/22 00:00
880-9906-9	SW-17	Solid	01/04/22 13:45	01/06/22 00:00
880-9906-10	SW-18	Solid	01/04/22 13:50	01/06/22 00:00
880-9906-11	SW-19	Solid	01/04/22 13:55	01/06/22 00:00
880-9906-12	SW-20	Solid	01/04/22 14:00	01/06/22 00:00
880-9906-13	SW-21	Solid	01/04/22 14:05	01/06/22 00:00
880-9906-14	SW-22	Solid	01/04/22 14:10	01/06/22 00:00
880-9906-15	SW-23	Solid	01/04/22 14:15	01/06/22 00:00
880-9906-16	SW-24	Solid	01/04/22 14:20	01/06/22 00:00
880-9906-17	SW-25	Solid	01/04/22 14:25	01/06/22 00:00
880-9906-18	SW-26	Solid	01/04/22 14:30	01/06/22 00:00
880-9906-19	Ramp-1	Solid	01/04/22 14:35	01/06/22 00:00
880-9906-20	Ramp-2	Solid	01/04/22 14:40	01/06/22 00:00
880-9906-21	Ramp-3	Solid	01/04/22 14:45	01/06/22 00:00
880-9906-22	Ramp-4	Solid	01/04/22 14:50	01/06/22 00:00
880-9906-23	Ramp-5	Solid	01/04/22 14:55	01/06/22 00:00
880-9906-24	Ramp-6	Solid	01/04/22 15:00	01/06/22 00:00



Environment Testing
Xenco

Chain of Custody

Houston, TX (281) 240-4200, Dallas, TX (214) 902-0300
Midland, TX (432) 704-5440, San Antonio, TX (210) 509-3334
El Paso, TX (915) 585-3443, Lubbock, TX (806) 794-1296
Hobbs, NM (575) 392-7550, Carlsbad, NM (575) 988-3199



880-9906 Chain of Custody

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Project Manager:	Becky Haskell @ GHDCM	Bill to: (if different)	Direct to Plains
Company Name:	GHDCM	Company Name:	
Address:	2135 S Loop 250 W.	Address:	
City, State ZIP:	Midland, TX 79703	City, State ZIP:	
Phone:	(432) 686-0086	Email:	"Becky", ALGROVES@PALLP.COM

Work Order Comments			
Program:	UST/PST ☐ PRP ☐ Brownfields ☐ RRC ☐ Superfund ☐		
State of Project:			
Reporting Level II ☐ Level III ☐ PST/UST ☐ TRRP ☐ Level IV ☐			
Deliverables	EDD ☐ ADAPT ☐ Other		

Project Name:	Snapping Pumps	Tum Around	☐ Routine ☒ Rush	Pres. Code	
Project Number:	12565619	Due Date:	3 Day		
Project Location:	Eddy County, NM	TAT starts the day received by the lab, if received by 4:30pm			
Sample's Name:	Heath Boyd				
PO #					
SAMPLE RECEIPT	Temp Blank: Yes ☒ No ☐	Wet Ice: Yes ☐ No ☒	Parameters		
Samples Received Intact:	Yes ☒ No ☐	Thermometer ID:	TPH 8015 M		
Cooler Custody Seals:	Yes ☐ No ☒	Correction Factor:	BTX 8021B		
Sample Custody Seals:	Yes ☐ No ☒	Temperature Reading:	Chloride 300		
Total Containers:	Corrected Temperature:	3.4			

Sample Identification	Matrix	Date Sampled	Time Sampled	Depth	Grab/Comp	# of Cont	ANALYSIS REQUEST														Preservative Codes		Sample Comments
SW-9	S	1/4	1300		Comp	1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	
SW-10			1305			1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X		
SW-11			1310			1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X		
SW-12			1315			1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X		
SW-13			1320			1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X		
SW-14			1325			1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X		
SW-15			1330			1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X		
SW-16			1340			1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X		
SW-17			1345			1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X		
SW-18			1350			1	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X		

Total 2007 / 6010 2008 / 6020: 8RCRA 13PPM Texas 11 Al Sb As Ba Be B Cd Ca Cr Co Cu Fe Pb Mg Mn Mo Ni K Se Ag SiO₂ Na Sr Ti Sn U V Zn
Circle Method(s) and Metal(s) to be analyzed TCLP/SPLP 6010 8RCRA Sb As Ba Be Cd Cr Co Cu Pb Mn Mo Ni Se Ag Ti U Hg 1631 / 2451 / 7470 / 7471

Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Eurofins Xenco, its affiliates and subcontractors. It assigns standard terms and conditions of service. Eurofins Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Eurofins Xenco. A minimum charge of \$85.00 will be applied to each project and a charge of \$5 for each sample submitted to Eurofins Xenco but not analyzed. These terms will be enforced unless previously negotiated.

Relinquished by (Signature)	Received by (Signature)	Date/Time	Relinquished by (Signature)	Received by (Signature)	Date/Time
		1/5/22 1120			1-5-22 1140



Chain of Custody

Houston, TX (281) 240-4200 Dallas TX (214) 902-0300
Midland TX (432) 704-5440 San Antonio TX (210) 509-3334
El Paso TX (915) 585-3443 Lubbock, TX (806) 794-1296
Hobbs, NM (575) 392-7550 Carlsbad, NM (575) 988-3199

Work Order No: 9900

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Project Manager	Becky	Bill to (if different)	Direct to Plains
Company Name	SHD	Company Name	
Address		Address	
City, State ZIP		City, State ZIP	
Phone		Email	Becky, AL Groves

Work Order Comments	
Program: UST/PST	☐ PRF ☐ Brownfield ☐ RRD ☐ Superfund
State of Project:	
Reporting Level II	☐ Level III ☐ PST/UST ☐ TRRP ☐ Level IV
Deliverables EDD	☐ ADAPT ☐ Other

Project Name	Snapping Reefs	Turn Around	☐ Routine ☒ Rush	Pres. Code	
Project Number	12565619				
Project Location	Eddy County, NM	Due Date	3 Day		
Sampler's Name	Heath Boyd	TAT starts the day received by the lab if received by 4:30pm			
PO #					
SAMPLE RECEIPT		Temp Blank	Yes ☒ No ☐	Wet Ice	Yes ☒ No ☐
Samples Received Intact		Yes ☒ No ☐	Thermometer ID	123	
Cooler Custody Seals		Yes ☒ No ☐	Correction Factor	.10	
Sample Custody Seals		Yes ☒ No ☐	Temperature Reading	33	
Total Containers		Corrected Temperature	34		

Sample Identification	Matrix	Date Sampled	Time Sampled	Depth	Grab/Comp	# of Cont	Parameters
SW-19	S	1/4	1355		Comp	1	TPH 8015 M
SW-20			1400			1	BTEX 8021 B
SW-21			1405			1	Chloride 300
SW-22			1410			1	
SW-23			1415			1	
SW-24			1420			1	
SW-25			1425			1	
SW-26			1430			1	
Ramp-1			1435			1	
Ramp-2			1440			1	

Total 200.7 / 6010	200.8 / 6020:	8RCRA 13PPM Texas 11	Al Sb As Ba Be B Cd Ca Cr Co Cu Fe Pb Mg Mn Mo Ni K Se Ag SiO ₂ Na Sr Ti Sn U V Zn
Circle Method(s) and Metal(s) to be analyzed	TCIP / SPLP 6010	8RCRA Sb As Ba Be Cd Cr Co Cu Pb Mn Mo Ni Se Ag Ti U	Hg 1631 / 2451 / 7470 / 7471

Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Eurofins Xenco, its affiliates and subcontractors. It assigns standard terms and conditions of service. Eurofins Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Eurofins Xenco. A minimum charge of \$85.00 will be applied to each project and a charge of \$5 for each sample submitted to Eurofins Xenco, but not analyzed. These terms will be enforced unless previously negotiated.

Relinquished by (Signature)	Received by (Signature)	Date/Time	Relinquished by (Signature)	Received by (Signature)	Date/Time
1		1/5/22 1:20	2		1-6-22
3			4		
5			6		

Login Sample Receipt Checklist

Client: GHD Services Inc.

Job Number: 880-9906-1
SDG Number: Eddy County, NM

Login Number: 9906

List Number: 1

Creator: Teel, Brianna

List Source: Eurofins Midland

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
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	
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.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	



Environment Testing America

ANALYTICAL REPORT

Eurofins Midland
1211 W. Florida Ave
Midland, TX 79701
Tel: (432)704-5440

Laboratory Job ID: 880-9907-1

Laboratory Sample Delivery Group: Eddy County, NM
Client Project/Site: Snapping Pumps

For:

GHD Services Inc.
2135 South Loop 250 West
Midland, Texas 79703

Attn: Becky Haskell

A handwritten signature in cursive script, appearing to read "Debbie Simmons".

Authorized for release by:
1/11/2022 3:34:37 PM

Debbie Simmons, Project Manager
(832)986-6768
debbie.simmons@eurofinset.com

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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.

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Laboratory Job ID: 880-9907-1
SDG: Eddy County, NM

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Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Qualifiers

GC VOA

Qualifier	Qualifier Description
F1	MS and/or MSD recovery exceeds control limits.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
S1+	Surrogate recovery exceeds control limits, high biased.
U	Indicates the analyte was analyzed for but not detected.

GC Semi VOA

Qualifier	Qualifier Description
*1	LCS/LCSD RPD exceeds control limits.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
S1-	Surrogate recovery exceeds control limits, low biased.
U	Indicates the analyte was analyzed for but not detected.

HPLC/IC

Qualifier	Qualifier Description
F1	MS and/or MSD recovery exceeds control limits.
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)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

Eurofins Midland

Case Narrative

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Job ID: 880-9907-1

Laboratory: Eurofins Midland

Narrative

Job Narrative 880-9907-1

Comments

No additional comments.

Receipt

The samples were received on 1/6/2022 11:40 AM. Unless otherwise noted below, the samples arrived in good condition, and where required, properly preserved and on ice. The temperature of the cooler at receipt was 3.4° C.

GC VOA

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-16150 and analytical batch 880-16113 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

GC Semi VOA

Method 8015B NM: The RPD of the laboratory control sample (LCS) and laboratory control sample duplicate (LCSD) for preparation batch 880-16142 and analytical batch 880-16117 recovered outside control limits for the following analytes: <AffectedAnalytes>.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

General Chemistry

Method 300.0: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-16230 and analytical batch 880-16332 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

Organic Prep

No analytical or quality issues were noted, other than those described in the Definitions/Glossary page.

VOA Prep

No analytical or quality issues were noted, other than those described in the Definitions/Glossary page.

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-14

Lab Sample ID: 880-9907-1

Date Collected: 01/05/22 07:50

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/06/22 13:04	01/06/22 22:31	1
Toluene	0.000469	J	0.00199	0.000453	mg/Kg		01/06/22 13:04	01/06/22 22:31	1
Ethylbenzene	<0.000562	U F1	0.00199	0.000562	mg/Kg		01/06/22 13:04	01/06/22 22:31	1
m-Xylene & p-Xylene	<0.00100	U F1	0.00398	0.00100	mg/Kg		01/06/22 13:04	01/06/22 22:31	1
o-Xylene	<0.000342	U F1	0.00199	0.000342	mg/Kg		01/06/22 13:04	01/06/22 22:31	1
Xylenes, Total	<0.00100	U F1	0.00398	0.00100	mg/Kg		01/06/22 13:04	01/06/22 22:31	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	98		70 - 130				01/06/22 13:04	01/06/22 22:31	1
1,4-Difluorobenzene (Surr)	117		70 - 130				01/06/22 13:04	01/06/22 22:31	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00398	0.00100	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	108		49.9	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	22.3	J	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 21:34	1
Diesel Range Organics (Over C10-C28)	85.9	*1	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 21:34	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 21:34	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	82		70 - 130				01/06/22 13:00	01/06/22 21:34	1
o-Terphenyl	96		70 - 130				01/06/22 13:00	01/06/22 21:34	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.9		4.99	0.857	mg/Kg			01/10/22 11:59	1

Client Sample ID: BH-15

Lab Sample ID: 880-9907-2

Date Collected: 01/05/22 08:00

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000625	J	0.00201	0.000387	mg/Kg		01/06/22 13:04	01/06/22 22:52	1
Toluene	0.000623	J	0.00201	0.000458	mg/Kg		01/06/22 13:04	01/06/22 22:52	1
Ethylbenzene	<0.000567	U	0.00201	0.000567	mg/Kg		01/06/22 13:04	01/06/22 22:52	1
m-Xylene & p-Xylene	<0.00101	U	0.00402	0.00101	mg/Kg		01/06/22 13:04	01/06/22 22:52	1
o-Xylene	0.000926	J	0.00201	0.000345	mg/Kg		01/06/22 13:04	01/06/22 22:52	1
Xylenes, Total	<0.00101	U	0.00402	0.00101	mg/Kg		01/06/22 13:04	01/06/22 22:52	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	113		70 - 130				01/06/22 13:04	01/06/22 22:52	1
1,4-Difluorobenzene (Surr)	106		70 - 130				01/06/22 13:04	01/06/22 22:52	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-15

Lab Sample ID: 880-9907-2

Date Collected: 01/05/22 08:00

Matrix: Solid

Date Received: 01/06/22 00:00

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00217	J	0.00402	0.00101	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	32.3	J	49.9	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 21:56	1
Diesel Range Organics (Over C10-C28)	32.3	J *1	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 21:56	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 21:56	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	69	S1-	70 - 130				01/06/22 13:00	01/06/22 21:56	1
o-Terphenyl	80		70 - 130				01/06/22 13:00	01/06/22 21:56	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	7.38		4.98	0.855	mg/Kg			01/10/22 12:24	1

Client Sample ID: BH-16

Lab Sample ID: 880-9907-3

Date Collected: 01/05/22 08:05

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00153	J	0.00200	0.000384	mg/Kg		01/06/22 13:04	01/06/22 23:12	1
Toluene	0.0487		0.00200	0.000455	mg/Kg		01/06/22 13:04	01/06/22 23:12	1
Ethylbenzene	0.0889		0.00200	0.000564	mg/Kg		01/06/22 13:04	01/06/22 23:12	1
m-Xylene & p-Xylene	0.427		0.00399	0.00101	mg/Kg		01/06/22 13:04	01/06/22 23:12	1
o-Xylene	0.143		0.00200	0.000343	mg/Kg		01/06/22 13:04	01/06/22 23:12	1
Xylenes, Total	0.570		0.00399	0.00101	mg/Kg		01/06/22 13:04	01/06/22 23:12	1

Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	201	S1+	70 - 130				01/06/22 13:04	01/06/22 23:12	1
1,4-Difluorobenzene (Surr)	105		70 - 130				01/06/22 13:04	01/06/22 23:12	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.709		0.00399	0.00101	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	656		50.0	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	36.2	J	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:17	1
Diesel Range Organics (Over C10-C28)	570	*1	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:17	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-16

Lab Sample ID: 880-9907-3

Date Collected: 01/05/22 08:05

Matrix: Solid

Date Received: 01/06/22 00:00

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	49.6	J	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:17	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	72		70 - 130				01/06/22 13:00	01/06/22 22:17	1
o-Terphenyl	84		70 - 130				01/06/22 13:00	01/06/22 22:17	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	7.92		4.95	0.850	mg/Kg			01/10/22 12:33	1

Client Sample ID: BH-17

Lab Sample ID: 880-9907-4

Date Collected: 01/05/22 08:10

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00211		0.00200	0.000384	mg/Kg		01/06/22 13:04	01/06/22 23:33	1
Toluene	0.0357		0.00200	0.000455	mg/Kg		01/06/22 13:04	01/06/22 23:33	1
Ethylbenzene	0.0641		0.00200	0.000564	mg/Kg		01/06/22 13:04	01/06/22 23:33	1
m-Xylene & p-Xylene	0.395		0.00399	0.00101	mg/Kg		01/06/22 13:04	01/06/22 23:33	1
o-Xylene	0.109		0.00200	0.000343	mg/Kg		01/06/22 13:04	01/06/22 23:33	1
Xylenes, Total	0.504		0.00399	0.00101	mg/Kg		01/06/22 13:04	01/06/22 23:33	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	173	S1+	70 - 130				01/06/22 13:04	01/06/22 23:33	1
1,4-Difluorobenzene (Surr)	103		70 - 130				01/06/22 13:04	01/06/22 23:33	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.606		0.00399	0.00101	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	527		50.0	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	45.2	J	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:39	1
Diesel Range Organics (Over C10-C28)	439	*1	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:39	1
Oil Range Organics (Over C28-C36)	42.7	J	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:39	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	84		70 - 130				01/06/22 13:00	01/06/22 22:39	1
o-Terphenyl	93		70 - 130				01/06/22 13:00	01/06/22 22:39	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	5.96		5.01	0.860	mg/Kg			01/10/22 12:41	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-18

Lab Sample ID: 880-9907-5

Date Collected: 01/05/22 08:15

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00143	J	0.00199	0.000383	mg/Kg		01/06/22 13:04	01/06/22 23:53	1
Toluene	0.0814		0.00199	0.000454	mg/Kg		01/06/22 13:04	01/06/22 23:53	1
Ethylbenzene	0.0862		0.00199	0.000563	mg/Kg		01/06/22 13:04	01/06/22 23:53	1
m-Xylene & p-Xylene	0.557		0.00398	0.00101	mg/Kg		01/06/22 13:04	01/06/22 23:53	1
o-Xylene	0.156		0.00199	0.000343	mg/Kg		01/06/22 13:04	01/06/22 23:53	1
Xylenes, Total	0.713		0.00398	0.00101	mg/Kg		01/06/22 13:04	01/06/22 23:53	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	202	S1+	70 - 130	01/06/22 13:04	01/06/22 23:53	1
1,4-Difluorobenzene (Surr)	101		70 - 130	01/06/22 13:04	01/06/22 23:53	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.882		0.00398	0.00101	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	1140		50.0	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	59.0		50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:00	1
Diesel Range Organics (Over C10-C28)	1000	*1	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:00	1
Oil Range Organics (Over C28-C36)	80.0		50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:00	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	81		70 - 130	01/06/22 13:00	01/06/22 23:00	1
o-Terphenyl	85		70 - 130	01/06/22 13:00	01/06/22 23:00	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	31.1		4.97	0.853	mg/Kg			01/10/22 12:49	1

Client Sample ID: BH-19

Lab Sample ID: 880-9907-6

Date Collected: 01/05/22 08:20

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg		01/06/22 13:04	01/07/22 00:14	1
Toluene	0.00342		0.00198	0.000451	mg/Kg		01/06/22 13:04	01/07/22 00:14	1
Ethylbenzene	0.000679	J	0.00198	0.000559	mg/Kg		01/06/22 13:04	01/07/22 00:14	1
m-Xylene & p-Xylene	0.00750		0.00396	0.00100	mg/Kg		01/06/22 13:04	01/07/22 00:14	1
o-Xylene	0.00251		0.00198	0.000341	mg/Kg		01/06/22 13:04	01/07/22 00:14	1
Xylenes, Total	0.0100		0.00396	0.00100	mg/Kg		01/06/22 13:04	01/07/22 00:14	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	106		70 - 130	01/06/22 13:04	01/07/22 00:14	1
1,4-Difluorobenzene (Surr)	110		70 - 130	01/06/22 13:04	01/07/22 00:14	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-19

Lab Sample ID: 880-9907-6

Date Collected: 01/05/22 08:20

Matrix: Solid

Date Received: 01/06/22 00:00

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.0141		0.00396	0.00100	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	21.0	J	49.9	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	21.0	J	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:22	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:22	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:22	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	76		70 - 130				01/06/22 13:00	01/06/22 23:22	1
o-Terphenyl	88		70 - 130				01/06/22 13:00	01/06/22 23:22	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	32.4		4.95	0.850	mg/Kg			01/10/22 12:57	1

Client Sample ID: BH-20

Lab Sample ID: 880-9907-7

Date Collected: 01/05/22 08:25

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000384	U	0.00200	0.000384	mg/Kg		01/06/22 13:04	01/07/22 00:34	1
Toluene	0.000575	J	0.00200	0.000455	mg/Kg		01/06/22 13:04	01/07/22 00:34	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		01/06/22 13:04	01/07/22 00:34	1
m-Xylene & p-Xylene	0.00185	J	0.00399	0.00101	mg/Kg		01/06/22 13:04	01/07/22 00:34	1
o-Xylene	0.000946	J	0.00200	0.000343	mg/Kg		01/06/22 13:04	01/07/22 00:34	1
Xylenes, Total	0.00280	J	0.00399	0.00101	mg/Kg		01/06/22 13:04	01/07/22 00:34	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	102		70 - 130				01/06/22 13:04	01/07/22 00:34	1
1,4-Difluorobenzene (Surr)	113		70 - 130				01/06/22 13:04	01/07/22 00:34	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00337	J	0.00399	0.00101	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:43	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:43	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-20

Lab Sample ID: 880-9907-7

Date Collected: 01/05/22 08:25

Matrix: Solid

Date Received: 01/06/22 00:00

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 23:43	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	65	S1-	70 - 130				01/06/22 13:00	01/06/22 23:43	1
o-Terphenyl	73		70 - 130				01/06/22 13:00	01/06/22 23:43	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	7.54	F1	4.99	0.857	mg/Kg			01/10/22 13:05	1

Client Sample ID: BH-21

Lab Sample ID: 880-9907-8

Date Collected: 01/05/22 08:30

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000389	U	0.00202	0.000389	mg/Kg		01/06/22 13:04	01/07/22 00:54	1
Toluene	0.000847	J	0.00202	0.000461	mg/Kg		01/06/22 13:04	01/07/22 00:54	1
Ethylbenzene	0.000629	J	0.00202	0.000571	mg/Kg		01/06/22 13:04	01/07/22 00:54	1
m-Xylene & p-Xylene	<0.00102	U	0.00404	0.00102	mg/Kg		01/06/22 13:04	01/07/22 00:54	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		01/06/22 13:04	01/07/22 00:54	1
Xylenes, Total	<0.00102	U	0.00404	0.00102	mg/Kg		01/06/22 13:04	01/07/22 00:54	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	114		70 - 130				01/06/22 13:04	01/07/22 00:54	1
1,4-Difluorobenzene (Surr)	105		70 - 130				01/06/22 13:04	01/07/22 00:54	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00148	J	0.00404	0.00102	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	30.7	J	49.9	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	30.7	J	49.9	15.0	mg/Kg		01/06/22 13:00	01/07/22 00:04	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/06/22 13:00	01/07/22 00:04	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/07/22 00:04	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	87		70 - 130				01/06/22 13:00	01/07/22 00:04	1
o-Terphenyl	96		70 - 130				01/06/22 13:00	01/07/22 00:04	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	8.11		5.05	0.867	mg/Kg			01/10/22 13:30	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-22

Lab Sample ID: 880-9907-9

Date Collected: 01/05/22 08:35

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/06/22 13:04	01/07/22 01:15	1
Toluene	0.00120	J	0.00199	0.000453	mg/Kg		01/06/22 13:04	01/07/22 01:15	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		01/06/22 13:04	01/07/22 01:15	1
m-Xylene & p-Xylene	0.00111	J	0.00398	0.00100	mg/Kg		01/06/22 13:04	01/07/22 01:15	1
o-Xylene	0.000597	J	0.00199	0.000342	mg/Kg		01/06/22 13:04	01/07/22 01:15	1
Xylenes, Total	0.00171	J	0.00398	0.00100	mg/Kg		01/06/22 13:04	01/07/22 01:15	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	115		70 - 130	01/06/22 13:04	01/07/22 01:15	1
1,4-Difluorobenzene (Surr)	108		70 - 130	01/06/22 13:04	01/07/22 01:15	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00291	J	0.00398	0.00100	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	15.4	J	50.0	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	15.4	J	50.0	15.0	mg/Kg		01/06/22 13:00	01/07/22 00:26	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:00	01/07/22 00:26	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/07/22 00:26	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	75		70 - 130				01/06/22 13:00	01/07/22 00:26	1
o-Terphenyl	86		70 - 130				01/06/22 13:00	01/07/22 00:26	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.22		4.98	0.855	mg/Kg			01/10/22 13:38	1

Client Sample ID: BH-23

Lab Sample ID: 880-9907-10

Date Collected: 01/05/22 08:40

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000403	J	0.00202	0.000388	mg/Kg		01/06/22 13:04	01/07/22 01:35	1
Toluene	0.000580	J	0.00202	0.000460	mg/Kg		01/06/22 13:04	01/07/22 01:35	1
Ethylbenzene	0.000591	J	0.00202	0.000570	mg/Kg		01/06/22 13:04	01/07/22 01:35	1
m-Xylene & p-Xylene	<0.00102	U	0.00403	0.00102	mg/Kg		01/06/22 13:04	01/07/22 01:35	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		01/06/22 13:04	01/07/22 01:35	1
Xylenes, Total	<0.00102	U	0.00403	0.00102	mg/Kg		01/06/22 13:04	01/07/22 01:35	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	106		70 - 130	01/06/22 13:04	01/07/22 01:35	1
1,4-Difluorobenzene (Surr)	110		70 - 130	01/06/22 13:04	01/07/22 01:35	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-23

Lab Sample ID: 880-9907-10

Date Collected: 01/05/22 08:40

Matrix: Solid

Date Received: 01/06/22 00:00

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00157	J	0.00403	0.00102	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/07/22 00:47	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/06/22 13:00	01/07/22 00:47	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/07/22 00:47	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	77		70 - 130				01/06/22 13:00	01/07/22 00:47	1
o-Terphenyl	86		70 - 130				01/06/22 13:00	01/07/22 00:47	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	47.9		5.02	0.862	mg/Kg			01/10/22 14:12	1

Client Sample ID: BH-24

Lab Sample ID: 880-9907-11

Date Collected: 01/05/22 08:45

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00359		0.00200	0.000385	mg/Kg		01/06/22 13:04	01/07/22 02:58	1
Toluene	0.00245		0.00200	0.000456	mg/Kg		01/06/22 13:04	01/07/22 02:58	1
Ethylbenzene	0.000691	J	0.00200	0.000565	mg/Kg		01/06/22 13:04	01/07/22 02:58	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 13:04	01/07/22 02:58	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/06/22 13:04	01/07/22 02:58	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 13:04	01/07/22 02:58	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	106		70 - 130				01/06/22 13:04	01/07/22 02:58	1
1,4-Difluorobenzene (Surr)	112		70 - 130				01/06/22 13:04	01/07/22 02:58	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00673		0.00400	0.00101	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 21:52	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 21:52	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-24

Lab Sample ID: 880-9907-11

Date Collected: 01/05/22 08:45

Matrix: Solid

Date Received: 01/06/22 00:00

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 13:00	01/06/22 21:52	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	107		70 - 130				01/06/22 13:00	01/06/22 21:52	1
o-Terphenyl	114		70 - 130				01/06/22 13:00	01/06/22 21:52	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	13.5		4.98	0.855	mg/Kg			01/10/22 14:20	1

Client Sample ID: BH-25

Lab Sample ID: 880-9907-12

Date Collected: 01/05/22 08:50

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg		01/06/22 13:04	01/07/22 03:18	1
Toluene	<0.000451	U	0.00198	0.000451	mg/Kg		01/06/22 13:04	01/07/22 03:18	1
Ethylbenzene	<0.000559	U	0.00198	0.000559	mg/Kg		01/06/22 13:04	01/07/22 03:18	1
m-Xylene & p-Xylene	<0.00100	U	0.00396	0.00100	mg/Kg		01/06/22 13:04	01/07/22 03:18	1
o-Xylene	0.000445	J	0.00198	0.000341	mg/Kg		01/06/22 13:04	01/07/22 03:18	1
Xylenes, Total	<0.00100	U	0.00396	0.00100	mg/Kg		01/06/22 13:04	01/07/22 03:18	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	116		70 - 130				01/06/22 13:04	01/07/22 03:18	1
1,4-Difluorobenzene (Surr)	111		70 - 130				01/06/22 13:04	01/07/22 03:18	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00396	0.00100	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:13	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:13	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:13	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	100		70 - 130				01/06/22 13:00	01/06/22 22:13	1
o-Terphenyl	107		70 - 130				01/06/22 13:00	01/06/22 22:13	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	59.8		5.04	0.865	mg/Kg			01/10/22 14:29	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-26

Lab Sample ID: 880-9907-13

Date Collected: 01/05/22 08:55

Matrix: Solid

Date Received: 01/06/22 00:00

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000382	U	0.00198	0.000382	mg/Kg		01/06/22 13:04	01/07/22 03:39	1
Toluene	<0.000452	U	0.00198	0.000452	mg/Kg		01/06/22 13:04	01/07/22 03:39	1
Ethylbenzene	<0.000561	U	0.00198	0.000561	mg/Kg		01/06/22 13:04	01/07/22 03:39	1
m-Xylene & p-Xylene	<0.00100	U	0.00397	0.00100	mg/Kg		01/06/22 13:04	01/07/22 03:39	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		01/06/22 13:04	01/07/22 03:39	1
Xylenes, Total	<0.00100	U	0.00397	0.00100	mg/Kg		01/06/22 13:04	01/07/22 03:39	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	110		70 - 130	01/06/22 13:04	01/07/22 03:39	1
1,4-Difluorobenzene (Surr)	111		70 - 130	01/06/22 13:04	01/07/22 03:39	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00397	0.00100	mg/Kg			01/07/22 08:36	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/10/22 12:40	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:34	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:34	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/06/22 13:00	01/06/22 22:34	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	100		70 - 130	01/06/22 13:00	01/06/22 22:34	1
o-Terphenyl	106		70 - 130	01/06/22 13:00	01/06/22 22:34	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	23.2		4.97	0.853	mg/Kg			01/10/22 14:37	1

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Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	BFB1 (70-130)	DFBZ1 (70-130)
880-9907-1	BH-14	98	117
880-9907-1 MS	BH-14	102	105
880-9907-1 MSD	BH-14	90	107
880-9907-2	BH-15	113	106
880-9907-3	BH-16	201 S1+	105
880-9907-4	BH-17	173 S1+	103
880-9907-5	BH-18	202 S1+	101
880-9907-6	BH-19	106	110
880-9907-7	BH-20	102	113
880-9907-8	BH-21	114	105
880-9907-9	BH-22	115	108
880-9907-10	BH-23	106	110
880-9907-11	BH-24	106	112
880-9907-12	BH-25	116	111
880-9907-13	BH-26	110	111
LCS 880-16150/1-A	Lab Control Sample	101	96
LCSD 880-16150/2-A	Lab Control Sample Dup	105	106
MB 880-16112/5-A	Method Blank	127	130
MB 880-16150/5-A	Method Blank	115	106
Surrogate Legend			
BFB = 4-Bromofluorobenzene (Surr)			
DFBZ = 1,4-Difluorobenzene (Surr)			

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO1 (70-130)	OTPH1 (70-130)
880-9907-1	BH-14	82	96
880-9907-2	BH-15	69 S1-	80
880-9907-3	BH-16	72	84
880-9907-4	BH-17	84	93
880-9907-5	BH-18	81	85
880-9907-6	BH-19	76	88
880-9907-7	BH-20	65 S1-	73
880-9907-8	BH-21	87	96
880-9907-9	BH-22	75	86
880-9907-10	BH-23	77	86
880-9907-11	BH-24	107	114
880-9907-12	BH-25	100	107
880-9907-13	BH-26	100	106
LCS 880-16142/2-A	Lab Control Sample	104	107
LCSD 880-16142/3-A	Lab Control Sample Dup	110	119
MB 880-16142/1-A	Method Blank	74	85
Surrogate Legend			
1CO = 1-Chlorooctane			
OTPH = o-Terphenyl			

Eurofins Midland

Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO2 (70-130)	OTPH2 (70-130)
LCS 880-16124/2-A	Lab Control Sample	100	103
LCSD 880-16124/3-A	Lab Control Sample Dup	103	104
MB 880-16124/1-A	Method Blank	110	114
Surrogate Legend			
1CO = 1-Chlorooctane			
OTPH = o-Terphenyl			

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-16112/5-A

Matrix: Solid

Analysis Batch: 16113

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16112

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/06/22 07:32	01/06/22 10:55	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/06/22 07:32	01/06/22 10:55	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/06/22 07:32	01/06/22 10:55	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 07:32	01/06/22 10:55	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/06/22 07:32	01/06/22 10:55	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 07:32	01/06/22 10:55	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	127		70 - 130	01/06/22 07:32	01/06/22 10:55	1
1,4-Difluorobenzene (Surr)	130		70 - 130	01/06/22 07:32	01/06/22 10:55	1

Lab Sample ID: MB 880-16150/5-A

Matrix: Solid

Analysis Batch: 16113

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16150

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/06/22 13:04	01/06/22 22:10	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/06/22 13:04	01/06/22 22:10	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/06/22 13:04	01/06/22 22:10	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 13:04	01/06/22 22:10	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/06/22 13:04	01/06/22 22:10	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/06/22 13:04	01/06/22 22:10	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	115		70 - 130	01/06/22 13:04	01/06/22 22:10	1
1,4-Difluorobenzene (Surr)	106		70 - 130	01/06/22 13:04	01/06/22 22:10	1

Lab Sample ID: LCS 880-16150/1-A

Matrix: Solid

Analysis Batch: 16113

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 16150

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.09616		mg/Kg		96	70 - 130
Toluene	0.100	0.08859		mg/Kg		89	70 - 130
Ethylbenzene	0.100	0.08705		mg/Kg		87	70 - 130
m-Xylene & p-Xylene	0.200	0.1824		mg/Kg		91	70 - 130
o-Xylene	0.100	0.09032		mg/Kg		90	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	101		70 - 130
1,4-Difluorobenzene (Surr)	96		70 - 130

Lab Sample ID: LCSD 880-16150/2-A

Matrix: Solid

Analysis Batch: 16113

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 16150

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	Limit
Benzene	0.100	0.09878		mg/Kg		99	70 - 130	3	35

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCSD 880-16150/2-A

Matrix: Solid

Analysis Batch: 16113

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 16150

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Toluene	0.100	0.09362		mg/Kg		94	70 - 130	6	35
Ethylbenzene	0.100	0.09167		mg/Kg		92	70 - 130	5	35
m-Xylene & p-Xylene	0.200	0.1882		mg/Kg		94	70 - 130	3	35
o-Xylene	0.100	0.09347		mg/Kg		93	70 - 130	3	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	105		70 - 130
1,4-Difluorobenzene (Surr)	106		70 - 130

Lab Sample ID: 880-9907-1 MS

Matrix: Solid

Analysis Batch: 16113

Client Sample ID: BH-14

Prep Type: Total/NA

Prep Batch: 16150

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	<0.000383	U	0.0996	0.08443		mg/Kg		85	70 - 130
Toluene	0.000469	J	0.0996	0.07332		mg/Kg		73	70 - 130
Ethylbenzene	<0.000562	U F1	0.0996	0.06304	F1	mg/Kg		63	70 - 130
m-Xylene & p-Xylene	<0.00100	U F1	0.199	0.1303	F1	mg/Kg		65	70 - 130
o-Xylene	<0.000342	U F1	0.0996	0.06593	F1	mg/Kg		66	70 - 130

Surrogate	MS %Recovery	MS Qualifier	Limits
4-Bromofluorobenzene (Surr)	102		70 - 130
1,4-Difluorobenzene (Surr)	105		70 - 130

Lab Sample ID: 880-9907-1 MSD

Matrix: Solid

Analysis Batch: 16113

Client Sample ID: BH-14

Prep Type: Total/NA

Prep Batch: 16150

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.000383	U	0.100	0.08798		mg/Kg		88	70 - 130	4	35
Toluene	0.000469	J	0.100	0.07665		mg/Kg		76	70 - 130	4	35
Ethylbenzene	<0.000562	U F1	0.100	0.06703	F1	mg/Kg		67	70 - 130	6	35
m-Xylene & p-Xylene	<0.00100	U F1	0.200	0.1359	F1	mg/Kg		68	70 - 130	4	35
o-Xylene	<0.000342	U F1	0.100	0.06898	F1	mg/Kg		69	70 - 130	5	35

Surrogate	MSD %Recovery	MSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	90		70 - 130
1,4-Difluorobenzene (Surr)	107		70 - 130

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 880-16124/1-A

Matrix: Solid

Analysis Batch: 16116

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16124

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 11:08	01/06/22 19:45	1

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

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

Lab Sample ID: MB 880-16124/1-A

Matrix: Solid

Analysis Batch: 16116

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16124

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 11:08	01/06/22 19:45	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 11:08	01/06/22 19:45	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	110		70 - 130				01/06/22 11:08	01/06/22 19:45	1
o-Terphenyl	114		70 - 130				01/06/22 11:08	01/06/22 19:45	1

Lab Sample ID: LCS 880-16124/2-A

Matrix: Solid

Analysis Batch: 16116

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 16124

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	920.2		mg/Kg		92	70 - 130
Diesel Range Organics (Over C10-C28)	1000	977.5		mg/Kg		98	70 - 130
Surrogate	LCS %Recovery	LCS Qualifier	Limits				
1-Chlorooctane	100		70 - 130				
o-Terphenyl	103		70 - 130				

Lab Sample ID: LCSD 880-16124/3-A

Matrix: Solid

Analysis Batch: 16116

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 16124

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	927.2		mg/Kg		93	70 - 130	1	20
Diesel Range Organics (Over C10-C28)	1000	973.5		mg/Kg		97	70 - 130	0	20
Surrogate	LCSD %Recovery	LCSD Qualifier	Limits						
1-Chlorooctane	103		70 - 130						
o-Terphenyl	104		70 - 130						

Lab Sample ID: MB 880-16142/1-A

Matrix: Solid

Analysis Batch: 16117

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16142

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/06/22 12:43	01/06/22 15:37	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 12:43	01/06/22 15:37	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/06/22 12:43	01/06/22 15:37	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	74		70 - 130				01/06/22 12:43	01/06/22 15:37	1

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

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

Lab Sample ID: MB 880-16142/1-A

Matrix: Solid

Analysis Batch: 16117

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 16142

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl	85		70 - 130	01/06/22 12:43	01/06/22 15:37	1

Lab Sample ID: LCS 880-16142/2-A

Matrix: Solid

Analysis Batch: 16117

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 16142

Analyte			Spike	LCS	LCS	Unit	D	%Rec	%Rec.		
			Added	Result	Qualifier			Limits			
Gasoline Range Organics (GRO)-C6-C10			1000	773.3		mg/Kg		77		70 - 130	
Diesel Range Organics (Over C10-C28)			1000	895.8		mg/Kg		90		70 - 130	
					</						

Lab Sample ID: LCSD 880-16142/3-A

Matrix: Solid

Analysis Batch: 16117

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 16142

			Spike	LCSD	LCSD				%Rec.			RPD
Analyte			Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit	
Gasoline Range Organics (GRO)-C6-C10			1000	917.7		mg/Kg		92	70 - 130	17	20	
Diesel Range Organics (Over C10-C28)			1000	1151	*1	mg/Kg		115	70 - 130	25	20	
			LCSD	LCSD								
Surrogate	%Recovery	Qualifier	Limits									
1-Chlorooctane	110		70 - 130									
o-Terphenyl	119		70 - 130									

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-16230/1-A

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			01/10/22 10:15	1

Lab Sample ID: LCS 880-16230/2-A

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	244.2		mg/Kg		98	90 - 110

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: LCSD 880-16230/3-A

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride			250	261.9		mg/Kg		105	90 - 110	7	20

Lab Sample ID: 880-9907-7 MS

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: BH-20

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride	7.54	F1	250	298.6	F1	mg/Kg		117	90 - 110		

Lab Sample ID: 880-9907-7 MSD

Matrix: Solid

Analysis Batch: 16332

Client Sample ID: BH-20

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	7.54	F1	250	303.6	F1	mg/Kg		119	90 - 110	2	20

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

GC VOA

Prep Batch: 16112

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-16112/5-A	Method Blank	Total/NA	Solid	5035	

Analysis Batch: 16113

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-1	BH-14	Total/NA	Solid	8021B	16150
880-9907-2	BH-15	Total/NA	Solid	8021B	16150
880-9907-3	BH-16	Total/NA	Solid	8021B	16150
880-9907-4	BH-17	Total/NA	Solid	8021B	16150
880-9907-5	BH-18	Total/NA	Solid	8021B	16150
880-9907-6	BH-19	Total/NA	Solid	8021B	16150
880-9907-7	BH-20	Total/NA	Solid	8021B	16150
880-9907-8	BH-21	Total/NA	Solid	8021B	16150
880-9907-9	BH-22	Total/NA	Solid	8021B	16150
880-9907-10	BH-23	Total/NA	Solid	8021B	16150
880-9907-11	BH-24	Total/NA	Solid	8021B	16150
880-9907-12	BH-25	Total/NA	Solid	8021B	16150
880-9907-13	BH-26	Total/NA	Solid	8021B	16150
MB 880-16112/5-A	Method Blank	Total/NA	Solid	8021B	16112
MB 880-16150/5-A	Method Blank	Total/NA	Solid	8021B	16150
LCS 880-16150/1-A	Lab Control Sample	Total/NA	Solid	8021B	16150
LCSD 880-16150/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	16150
880-9907-1 MS	BH-14	Total/NA	Solid	8021B	16150
880-9907-1 MSD	BH-14	Total/NA	Solid	8021B	16150

Prep Batch: 16150

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-1	BH-14	Total/NA	Solid	5035	
880-9907-2	BH-15	Total/NA	Solid	5035	
880-9907-3	BH-16	Total/NA	Solid	5035	
880-9907-4	BH-17	Total/NA	Solid	5035	
880-9907-5	BH-18	Total/NA	Solid	5035	
880-9907-6	BH-19	Total/NA	Solid	5035	
880-9907-7	BH-20	Total/NA	Solid	5035	
880-9907-8	BH-21	Total/NA	Solid	5035	
880-9907-9	BH-22	Total/NA	Solid	5035	
880-9907-10	BH-23	Total/NA	Solid	5035	
880-9907-11	BH-24	Total/NA	Solid	5035	
880-9907-12	BH-25	Total/NA	Solid	5035	
880-9907-13	BH-26	Total/NA	Solid	5035	
MB 880-16150/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-16150/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-16150/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-9907-1 MS	BH-14	Total/NA	Solid	5035	
880-9907-1 MSD	BH-14	Total/NA	Solid	5035	

Analysis Batch: 16206

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-1	BH-14	Total/NA	Solid	Total BTEX	
880-9907-2	BH-15	Total/NA	Solid	Total BTEX	
880-9907-3	BH-16	Total/NA	Solid	Total BTEX	
880-9907-4	BH-17	Total/NA	Solid	Total BTEX	

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

GC VOA (Continued)

Analysis Batch: 16206 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-5	BH-18	Total/NA	Solid	Total BTEX	
880-9907-6	BH-19	Total/NA	Solid	Total BTEX	
880-9907-7	BH-20	Total/NA	Solid	Total BTEX	
880-9907-8	BH-21	Total/NA	Solid	Total BTEX	
880-9907-9	BH-22	Total/NA	Solid	Total BTEX	
880-9907-10	BH-23	Total/NA	Solid	Total BTEX	
880-9907-11	BH-24	Total/NA	Solid	Total BTEX	
880-9907-12	BH-25	Total/NA	Solid	Total BTEX	
880-9907-13	BH-26	Total/NA	Solid	Total BTEX	

GC Semi VOA

Analysis Batch: 16116

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-11	BH-24	Total/NA	Solid	8015B NM	16124
880-9907-12	BH-25	Total/NA	Solid	8015B NM	16124
880-9907-13	BH-26	Total/NA	Solid	8015B NM	16124
MB 880-16124/1-A	Method Blank	Total/NA	Solid	8015B NM	16124
LCS 880-16124/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	16124
LCSD 880-16124/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	16124

Analysis Batch: 16117

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-1	BH-14	Total/NA	Solid	8015B NM	16142
880-9907-2	BH-15	Total/NA	Solid	8015B NM	16142
880-9907-3	BH-16	Total/NA	Solid	8015B NM	16142
880-9907-4	BH-17	Total/NA	Solid	8015B NM	16142
880-9907-5	BH-18	Total/NA	Solid	8015B NM	16142
880-9907-6	BH-19	Total/NA	Solid	8015B NM	16142
880-9907-7	BH-20	Total/NA	Solid	8015B NM	16142
880-9907-8	BH-21	Total/NA	Solid	8015B NM	16142
880-9907-9	BH-22	Total/NA	Solid	8015B NM	16142
880-9907-10	BH-23	Total/NA	Solid	8015B NM	16142
MB 880-16142/1-A	Method Blank	Total/NA	Solid	8015B NM	16142
LCS 880-16142/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	16142
LCSD 880-16142/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	16142

Prep Batch: 16124

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-11	BH-24	Total/NA	Solid	8015NM Prep	
880-9907-12	BH-25	Total/NA	Solid	8015NM Prep	
880-9907-13	BH-26	Total/NA	Solid	8015NM Prep	
MB 880-16124/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-16124/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-16124/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	

Prep Batch: 16142

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-1	BH-14	Total/NA	Solid	8015NM Prep	
880-9907-2	BH-15	Total/NA	Solid	8015NM Prep	
880-9907-3	BH-16	Total/NA	Solid	8015NM Prep	

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

GC Semi VOA (Continued)

Prep Batch: 16142 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-4	BH-17	Total/NA	Solid	8015NM Prep	
880-9907-5	BH-18	Total/NA	Solid	8015NM Prep	
880-9907-6	BH-19	Total/NA	Solid	8015NM Prep	
880-9907-7	BH-20	Total/NA	Solid	8015NM Prep	
880-9907-8	BH-21	Total/NA	Solid	8015NM Prep	
880-9907-9	BH-22	Total/NA	Solid	8015NM Prep	
880-9907-10	BH-23	Total/NA	Solid	8015NM Prep	
MB 880-16142/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-16142/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-16142/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	

Analysis Batch: 16428

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-1	BH-14	Total/NA	Solid	8015 NM	
880-9907-2	BH-15	Total/NA	Solid	8015 NM	
880-9907-3	BH-16	Total/NA	Solid	8015 NM	
880-9907-4	BH-17	Total/NA	Solid	8015 NM	
880-9907-5	BH-18	Total/NA	Solid	8015 NM	
880-9907-6	BH-19	Total/NA	Solid	8015 NM	
880-9907-7	BH-20	Total/NA	Solid	8015 NM	
880-9907-8	BH-21	Total/NA	Solid	8015 NM	
880-9907-9	BH-22	Total/NA	Solid	8015 NM	
880-9907-10	BH-23	Total/NA	Solid	8015 NM	
880-9907-11	BH-24	Total/NA	Solid	8015 NM	
880-9907-12	BH-25	Total/NA	Solid	8015 NM	
880-9907-13	BH-26	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 16230

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-1	BH-14	Soluble	Solid	DI Leach	
880-9907-2	BH-15	Soluble	Solid	DI Leach	
880-9907-3	BH-16	Soluble	Solid	DI Leach	
880-9907-4	BH-17	Soluble	Solid	DI Leach	
880-9907-5	BH-18	Soluble	Solid	DI Leach	
880-9907-6	BH-19	Soluble	Solid	DI Leach	
880-9907-7	BH-20	Soluble	Solid	DI Leach	
880-9907-8	BH-21	Soluble	Solid	DI Leach	
880-9907-9	BH-22	Soluble	Solid	DI Leach	
880-9907-10	BH-23	Soluble	Solid	DI Leach	
880-9907-11	BH-24	Soluble	Solid	DI Leach	
880-9907-12	BH-25	Soluble	Solid	DI Leach	
880-9907-13	BH-26	Soluble	Solid	DI Leach	
MB 880-16230/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-16230/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-16230/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-9907-7 MS	BH-20	Soluble	Solid	DI Leach	
880-9907-7 MSD	BH-20	Soluble	Solid	DI Leach	

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

HPLC/IC

Analysis Batch: 16332

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9907-1	BH-14	Soluble	Solid	300.0	16230
880-9907-2	BH-15	Soluble	Solid	300.0	16230
880-9907-3	BH-16	Soluble	Solid	300.0	16230
880-9907-4	BH-17	Soluble	Solid	300.0	16230
880-9907-5	BH-18	Soluble	Solid	300.0	16230
880-9907-6	BH-19	Soluble	Solid	300.0	16230
880-9907-7	BH-20	Soluble	Solid	300.0	16230
880-9907-8	BH-21	Soluble	Solid	300.0	16230
880-9907-9	BH-22	Soluble	Solid	300.0	16230
880-9907-10	BH-23	Soluble	Solid	300.0	16230
880-9907-11	BH-24	Soluble	Solid	300.0	16230
880-9907-12	BH-25	Soluble	Solid	300.0	16230
880-9907-13	BH-26	Soluble	Solid	300.0	16230
MB 880-16230/1-A	Method Blank	Soluble	Solid	300.0	16230
LCS 880-16230/2-A	Lab Control Sample	Soluble	Solid	300.0	16230
LCSD 880-16230/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	16230
880-9907-7 MS	BH-20	Soluble	Solid	300.0	16230
880-9907-7 MSD	BH-20	Soluble	Solid	300.0	16230

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-14

Lab Sample ID: 880-9907-1

Date Collected: 01/05/22 07:50

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/06/22 22:31	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/06/22 21:34	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 11:59	CH	XEN MID

Client Sample ID: BH-15

Lab Sample ID: 880-9907-2

Date Collected: 01/05/22 08:00

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.98 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/06/22 22:52	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/06/22 21:56	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 12:24	CH	XEN MID

Client Sample ID: BH-16

Lab Sample ID: 880-9907-3

Date Collected: 01/05/22 08:05

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/06/22 23:12	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/06/22 22:17	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 12:33	CH	XEN MID

Client Sample ID: BH-17

Lab Sample ID: 880-9907-4

Date Collected: 01/05/22 08:10

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/06/22 23:33	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-17

Lab Sample ID: 880-9907-4

Date Collected: 01/05/22 08:10

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/06/22 22:39	AJ	XEN MID
Soluble	Leach	DI Leach			4.99 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 12:41	CH	XEN MID

Client Sample ID: BH-18

Lab Sample ID: 880-9907-5

Date Collected: 01/05/22 08:15

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/06/22 23:53	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/06/22 23:00	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 12:49	CH	XEN MID

Client Sample ID: BH-19

Lab Sample ID: 880-9907-6

Date Collected: 01/05/22 08:20

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/07/22 00:14	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/06/22 23:22	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 12:57	CH	XEN MID

Client Sample ID: BH-20

Lab Sample ID: 880-9907-7

Date Collected: 01/05/22 08:25

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/07/22 00:34	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/06/22 23:43	AJ	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-20

Lab Sample ID: 880-9907-7

Date Collected: 01/05/22 08:25

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			5.01 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 13:05	CH	XEN MID

Client Sample ID: BH-21

Lab Sample ID: 880-9907-8

Date Collected: 01/05/22 08:30

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.95 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/07/22 00:54	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/07/22 00:04	AJ	XEN MID
Soluble	Leach	DI Leach			4.95 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 13:30	CH	XEN MID

Client Sample ID: BH-22

Lab Sample ID: 880-9907-9

Date Collected: 01/05/22 08:35

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/07/22 01:15	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/07/22 00:26	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 13:38	CH	XEN MID

Client Sample ID: BH-23

Lab Sample ID: 880-9907-10

Date Collected: 01/05/22 08:40

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/07/22 01:35	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16142	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16117	01/07/22 00:47	AJ	XEN MID
Soluble	Leach	DI Leach			4.98 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 14:12	CH	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Client Sample ID: BH-24

Lab Sample ID: 880-9907-11

Date Collected: 01/05/22 08:45

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.00 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/07/22 02:58	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	16124	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16116	01/06/22 21:52	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 14:20	CH	XEN MID

Client Sample ID: BH-25

Lab Sample ID: 880-9907-12

Date Collected: 01/05/22 08:50

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/07/22 03:18	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	16124	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16116	01/06/22 22:13	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 14:29	CH	XEN MID

Client Sample ID: BH-26

Lab Sample ID: 880-9907-13

Date Collected: 01/05/22 08:55

Matrix: Solid

Date Received: 01/06/22 00:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.04 g	5 mL	16150	01/06/22 13:04	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	16113	01/07/22 03:39	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			16206	01/07/22 08:36	KL	XEN MID
Total/NA	Analysis	8015 NM		1			16428	01/10/22 12:40	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	16124	01/06/22 13:00	DM	XEN MID
Total/NA	Analysis	8015B NM		1			16116	01/06/22 22:34	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	16230	01/07/22 10:08	CH	XEN MID
Soluble	Analysis	300.0		1			16332	01/10/22 14:37	CH	XEN MID

Laboratory References:

XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Midland

Accreditation/Certification Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Laboratory: Eurofins Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Program	Identification Number	Expiration Date
Texas	NELAP	T104704400-21-22	06-30-22

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
8015 NM		Solid	Total TPH
Total BTEX		Solid	Total BTEX

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

Method Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

Protocol References:

ASTM = ASTM International

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

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

TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

Laboratory References:

XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Midland

Sample Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-9907-1
SDG: Eddy County, NM

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
880-9907-1	BH-14	Solid	01/05/22 07:50	01/06/22 00:00
880-9907-2	BH-15	Solid	01/05/22 08:00	01/06/22 00:00
880-9907-3	BH-16	Solid	01/05/22 08:05	01/06/22 00:00
880-9907-4	BH-17	Solid	01/05/22 08:10	01/06/22 00:00
880-9907-5	BH-18	Solid	01/05/22 08:15	01/06/22 00:00
880-9907-6	BH-19	Solid	01/05/22 08:20	01/06/22 00:00
880-9907-7	BH-20	Solid	01/05/22 08:25	01/06/22 00:00
880-9907-8	BH-21	Solid	01/05/22 08:30	01/06/22 00:00
880-9907-9	BH-22	Solid	01/05/22 08:35	01/06/22 00:00
880-9907-10	BH-23	Solid	01/05/22 08:40	01/06/22 00:00
880-9907-11	BH-24	Solid	01/05/22 08:45	01/06/22 00:00
880-9907-12	BH-25	Solid	01/05/22 08:50	01/06/22 00:00
880-9907-13	BH-26	Solid	01/05/22 08:55	01/06/22 00:00

Xenoco Laboratories

The Environmental Lab of Texas



880-9907 Chain of Custody

 CHAIN OF CUSTODY RECORD AND ANALYSIS REQUEST
 12600 West I-20 East
 Odessa, Texas 79765

 Phone: 432-563-1800
 Fax: 432-563-1713

Pg 1 of 2

 Project Manager Becky Haskell @ GHD.com
 Company Name GHD
Company Address 2135 S. Loop 250 W.City/State/Zip Midland, TX 79703Telephone No (432) 686-0086Sampler Signature [Signature]

Fax No

e-mail ALGROVES@PALP.COM

"Becky"

 Report Format: ☐ Standard ☐ TRRP ☐ NPDES

PO #:

 Project Name: Snapping Turtles
 Project #. 12515619
 Project Loc. Eldorado County, NM

FIELD CODE		Beginning Depth	Ending Depth	Date Sampled	Time Sampled	Field Filtered	Total # of Containers	Ice	HNO ₃	HCl	H ₂ SO ₄	NaOH	Na ₂ S ₂ O ₃	None	Other (Specify)	DW=Drinking Water SL=Sludge GW=Groundwater S=Soil/Solid NP=Non-Potable Specify Other	Matrix	
BH-14				1/5/22	750													
BH-15					800													
BH-16					845													
BH-17					810													
BH-18					815													
BH-19					820													
BH-20					825													
BH-21					830													
BH-22					835													
BH-23					840													

Special Instructions:

Date	Time	Received by	Date	Time	Received by
1/5/22	11:20	[Signature]	1-5-22	11:07	[Signature]
1/5/22	11:30	[Signature]	1-6-22	11:40	[Signature]

Laboratory Comments:

Sample Containers Intact?

VOCs Free of Headspace?

Labels on containers?

Custody seals on containers?

Sample Hand Delivered by Sampler/Client Rep?

Temperature Upon Receipt

DHL FedEx UPS As Read Corrected

3.3

34c

Xenoco Laboratories

The Environmental Lab of Texas

CHAIN OF CUSTODY RECORD AND ANALYSIS REQUEST

12600 West I-20 East
Odessa, Texas 79765Phone: 432-563-1800
Fax: 432-563-1713

Pg 2 of 2

Project Manager

Becky Haskell @ GHD.com

Company Name

GHD

Company Address

City/State/Zip

Telephone No

Sampler Signature

Fax No

e-mail

"Becky", "ALG"

Report Format:

☐ Standard☐ TRRP☐ NPDES

PO #:

Project Loc:

Project Name:

Shaping Runways

Project #: 12565619

9907

(lab use only)

ORDER #:

(Lab use only)

FIELD CODE

Beginning Depth

Ending Depth

Date Sampled

Time Sampled

Field Filtered

Total # of Containers

Ice

HNO₃

HCl

H₂SO₄

NaOH

Na₂S₂O₃

None

Other (Specify)

DW=Drinking Water SL=Sludge

GW=Groundwater S=Soil/Solid

NP=Non-Potable Specify Other

TPH 418 1 8015M 8015B

TPH TX 1005 TX 1006

Cations (Ca Mg Na K)

Anions (Cl SO₄ Alkalinity)

SAR / ESP / CEC

Metals As Ag Ba Cd Cr Pb Hg Se

Volatiles

Semivolatiles

ETEX 8021B/5030 or BTEX 8260

RCI

NORM

Chloride 300

RUSH TAT (Pre-Schedule) 24 48 72 hrs

Standard TAT

Special Instructions.

Relinquished by

Date

Time

Received by

Received by

Date

Time

Relinquished by

Date

Time

Received by

Received by

Date

Time

Relinquished by

Date

Time

Received by

Received by

Date

Time

Laboratory Comments.

Sample Containers Intact?

Y

N

N

N

N

N

N

N

N

N

N

N

Labels on container(s)

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Custody seals on container(s)

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Custody seals on cooler(s)

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Sample Hand Delivered by Sampler/Client Rep ?

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Y

Temperature Upon Receipt

33

34

33

34

33

34

33

34

33

34

33

34

Login Sample Receipt Checklist

Client: GHD Services Inc.

Job Number: 880-9907-1
SDG Number: Eddy County, NM

Login Number: 9907

List Number: 1

Creator: Teel, Brianna

List Source: Eurofins Midland

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
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	
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.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	



Environment Testing America

ANALYTICAL REPORT

Eurofins Midland
1211 W. Florida Ave
Midland, TX 79701
Tel: (432)704-5440

Laboratory Job ID: 880-10347-1

Laboratory Sample Delivery Group: Eddy County, NM
Client Project/Site: Snapping Pumps

For:

GHD Services Inc.
2135 South Loop 250 West
Midland, Texas 79703

Attn: Becky Haskell

A handwritten signature in black ink, appearing to read "Debbie Simmons".

Authorized for release by:
1/24/2022 5:14:33 PM

Debbie Simmons, Project Manager
(832)986-6768
debbie.simmons@eurofinset.com

LINKS

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results through
TotalAccess

Have a Question?



Visit us at:

www.eurofinsus.com/Env

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.

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Laboratory Job ID: 880-10347-1
SDG: Eddy County, NM

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Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Qualifiers

GC VOA

Qualifier	Qualifier Description
F1	MS and/or MSD recovery exceeds control limits.
F2	MS/MSD RPD exceeds control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
S1+	Surrogate recovery exceeds control limits, high biased.
U	Indicates the analyte was analyzed for but not detected.

GC Semi VOA

Qualifier	Qualifier Description
*1	LCS/LCSD RPD exceeds control limits.
F1	MS and/or MSD recovery exceeds control 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.

HPLC/IC

Qualifier	Qualifier Description
F1	MS and/or MSD recovery exceeds control 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.

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)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Eurofins Midland

Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Glossary (Continued)

Abbreviation	These commonly used abbreviations may or may not be present in this report.
TNTC	Too Numerous To Count

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

Case Narrative

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Job ID: 880-10347-1**Laboratory: Eurofins Midland****Narrative****Job Narrative
880-10347-1****Receipt**

The samples were received on 1/19/2022 1:15 PM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 2.2°C

GC VOA

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-17238 and analytical batch 880-17324 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

GC Semi VOA

Method 8015MOD_NM: The RPD of the laboratory control sample (LCS) and laboratory control sample duplicate (LCSD) for preparation batch 880-17332 and analytical batch 880-17331 recovered outside control limits for the following analytes: Diesel Range Organics (Over C10-C28)

Method 8015MOD_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-17332 and analytical batch 880-17331 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

HPLC/IC

Method 300_ORGFM_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-17255 and 880-17255 and analytical batch 880-17322 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: SW-7

Lab Sample ID: 880-10347-1

Date Collected: 01/17/22 11:50

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg		01/19/22 13:45	01/21/22 06:53	1
Toluene	<0.000451	U	0.00198	0.000451	mg/Kg		01/19/22 13:45	01/21/22 06:53	1
Ethylbenzene	<0.000559	U	0.00198	0.000559	mg/Kg		01/19/22 13:45	01/21/22 06:53	1
m-Xylene & p-Xylene	<0.00100	U	0.00396	0.00100	mg/Kg		01/19/22 13:45	01/21/22 06:53	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		01/19/22 13:45	01/21/22 06:53	1
Xylenes, Total	<0.00100	U	0.00396	0.00100	mg/Kg		01/19/22 13:45	01/21/22 06:53	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	121		70 - 130	01/19/22 13:45	01/21/22 06:53	1
1,4-Difluorobenzene (Surr)	89		70 - 130	01/19/22 13:45	01/21/22 06:53	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00396	0.00100	mg/Kg			01/24/22 16:52	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	22.0	J	49.9	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	22.0	J F1	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 20:46	1
Diesel Range Organics (Over C10-C28)	<15.0	U F1 *1	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 20:46	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 20:46	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	88		70 - 130				01/20/22 08:47	01/20/22 20:46	1
o-Terphenyl	89		70 - 130				01/20/22 08:47	01/20/22 20:46	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.26	F1	4.95	0.850	mg/Kg			01/19/22 19:20	1

Client Sample ID: SW-8

Lab Sample ID: 880-10347-2

Date Collected: 01/17/22 11:55

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000388	U	0.00202	0.000388	mg/Kg		01/19/22 13:45	01/21/22 07:13	1
Toluene	<0.000460	U	0.00202	0.000460	mg/Kg		01/19/22 13:45	01/21/22 07:13	1
Ethylbenzene	<0.000570	U	0.00202	0.000570	mg/Kg		01/19/22 13:45	01/21/22 07:13	1
m-Xylene & p-Xylene	<0.00102	U	0.00403	0.00102	mg/Kg		01/19/22 13:45	01/21/22 07:13	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		01/19/22 13:45	01/21/22 07:13	1
Xylenes, Total	<0.00102	U	0.00403	0.00102	mg/Kg		01/19/22 13:45	01/21/22 07:13	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	132	S1+	70 - 130	01/19/22 13:45	01/21/22 07:13	1
1,4-Difluorobenzene (Surr)	104		70 - 130	01/19/22 13:45	01/21/22 07:13	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: SW-8

Lab Sample ID: 880-10347-2

Date Collected: 01/17/22 11:55

Matrix: Solid

Date Received: 01/19/22 13:15

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00403	0.00102	mg/Kg			01/24/22 16:52	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	19.7	J	49.9	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	19.7	J	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 21:47	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 21:47	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 21:47	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	89		70 - 130				01/20/22 08:47	01/20/22 21:47	1
o-Terphenyl	89		70 - 130				01/20/22 08:47	01/20/22 21:47	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	8.50		4.95	0.850	mg/Kg			01/19/22 19:43	1

Client Sample ID: SW-26

Lab Sample ID: 880-10347-3

Date Collected: 01/17/22 12:55

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U F1	0.00199	0.000383	mg/Kg		01/20/22 07:30	01/20/22 11:20	1
Toluene	<0.000454	U F1	0.00199	0.000454	mg/Kg		01/20/22 07:30	01/20/22 11:20	1
Ethylbenzene	<0.000563	U F2 F1	0.00199	0.000563	mg/Kg		01/20/22 07:30	01/20/22 11:20	1
m-Xylene & p-Xylene	<0.00101	U F1	0.00398	0.00101	mg/Kg		01/20/22 07:30	01/20/22 11:20	1
o-Xylene	<0.000343	U F1	0.00199	0.000343	mg/Kg		01/20/22 07:30	01/20/22 11:20	1
Xylenes, Total	<0.00101	U F1	0.00398	0.00101	mg/Kg		01/20/22 07:30	01/20/22 11:20	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	115		70 - 130				01/20/22 07:30	01/20/22 11:20	1
1,4-Difluorobenzene (Surr)	96		70 - 130				01/20/22 07:30	01/20/22 11:20	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00398	0.00101	mg/Kg			01/20/22 15:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	23.3	J	50.0	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	23.3	J	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 22:08	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 22:08	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: SW-26

Lab Sample ID: 880-10347-3

Date Collected: 01/17/22 12:55

Matrix: Solid

Date Received: 01/19/22 13:15

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 22:08	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	104		70 - 130				01/20/22 08:47	01/20/22 22:08	1
o-Terphenyl	104		70 - 130				01/20/22 08:47	01/20/22 22:08	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	7.69		5.04	0.865	mg/Kg			01/19/22 19:50	1

Client Sample ID: SW-27

Lab Sample ID: 880-10347-4

Date Collected: 01/17/22 13:00

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg		01/20/22 07:30	01/20/22 11:41	1
Toluene	<0.000451	U	0.00198	0.000451	mg/Kg		01/20/22 07:30	01/20/22 11:41	1
Ethylbenzene	<0.000559	U	0.00198	0.000559	mg/Kg		01/20/22 07:30	01/20/22 11:41	1
m-Xylene & p-Xylene	<0.00100	U	0.00396	0.00100	mg/Kg		01/20/22 07:30	01/20/22 11:41	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		01/20/22 07:30	01/20/22 11:41	1
Xylenes, Total	<0.00100	U	0.00396	0.00100	mg/Kg		01/20/22 07:30	01/20/22 11:41	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	110		70 - 130				01/20/22 07:30	01/20/22 11:41	1
1,4-Difluorobenzene (Surr)	102		70 - 130				01/20/22 07:30	01/20/22 11:41	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00396	0.00100	mg/Kg			01/20/22 15:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	18.7	J	50.0	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	18.7	J	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 22:28	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 22:28	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 22:28	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	88		70 - 130				01/20/22 08:47	01/20/22 22:28	1
o-Terphenyl	91		70 - 130				01/20/22 08:47	01/20/22 22:28	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	7.99		4.97	0.853	mg/Kg			01/19/22 19:58	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: BH-27

Lab Sample ID: 880-10347-5

Date Collected: 01/17/22 12:00

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/20/22 07:30	01/20/22 12:01	1
Toluene	<0.000454	U	0.00199	0.000454	mg/Kg		01/20/22 07:30	01/20/22 12:01	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		01/20/22 07:30	01/20/22 12:01	1
m-Xylene & p-Xylene	<0.00101	U	0.00398	0.00101	mg/Kg		01/20/22 07:30	01/20/22 12:01	1
o-Xylene	0.000617	J	0.00199	0.000343	mg/Kg		01/20/22 07:30	01/20/22 12:01	1
Xylenes, Total	<0.00101	U	0.00398	0.00101	mg/Kg		01/20/22 07:30	01/20/22 12:01	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	117		70 - 130	01/20/22 07:30	01/20/22 12:01	1
1,4-Difluorobenzene (Surr)	75		70 - 130	01/20/22 07:30	01/20/22 12:01	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00398	0.00101	mg/Kg			01/20/22 15:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	21.3	J	49.9	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	21.3	J	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 22:49	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 22:49	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 22:49	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	88		70 - 130				01/20/22 08:47	01/20/22 22:49	1
o-Terphenyl	90		70 - 130				01/20/22 08:47	01/20/22 22:49	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	5.88		5.01	0.860	mg/Kg			01/19/22 20:05	1

Client Sample ID: BH-28

Lab Sample ID: 880-10347-6

Date Collected: 01/17/22 12:05

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00474		0.00202	0.000388	mg/Kg		01/20/22 07:30	01/20/22 12:22	1
Toluene	0.00346		0.00202	0.000460	mg/Kg		01/20/22 07:30	01/20/22 12:22	1
Ethylbenzene	0.000648	J	0.00202	0.000570	mg/Kg		01/20/22 07:30	01/20/22 12:22	1
m-Xylene & p-Xylene	<0.00102	U	0.00403	0.00102	mg/Kg		01/20/22 07:30	01/20/22 12:22	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		01/20/22 07:30	01/20/22 12:22	1
Xylenes, Total	<0.00102	U	0.00403	0.00102	mg/Kg		01/20/22 07:30	01/20/22 12:22	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	121		70 - 130	01/20/22 07:30	01/20/22 12:22	1
1,4-Difluorobenzene (Surr)	107		70 - 130	01/20/22 07:30	01/20/22 12:22	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: BH-28

Lab Sample ID: 880-10347-6

Date Collected: 01/17/22 12:05

Matrix: Solid

Date Received: 01/19/22 13:15

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00885		0.00403	0.00102	mg/Kg			01/20/22 15:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	23.7	J	50.0	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	23.7	J	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 23:09	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 23:09	1
OII Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 23:09	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	110		70 - 130				01/20/22 08:47	01/20/22 23:09	1
o-Terphenyl	114		70 - 130				01/20/22 08:47	01/20/22 23:09	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	3.37	J	4.99	0.857	mg/Kg			01/19/22 20:28	1

Client Sample ID: BH-29

Lab Sample ID: 880-10347-7

Date Collected: 01/17/22 12:15

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/20/22 07:30	01/20/22 12:42	1
Toluene	<0.000453	U	0.00199	0.000453	mg/Kg		01/20/22 07:30	01/20/22 12:42	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		01/20/22 07:30	01/20/22 12:42	1
m-Xylene & p-Xylene	<0.00100	U	0.00398	0.00100	mg/Kg		01/20/22 07:30	01/20/22 12:42	1
o-Xylene	<0.000342	U	0.00199	0.000342	mg/Kg		01/20/22 07:30	01/20/22 12:42	1
Xylenes, Total	<0.00100	U	0.00398	0.00100	mg/Kg		01/20/22 07:30	01/20/22 12:42	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	124		70 - 130				01/20/22 07:30	01/20/22 12:42	1
1,4-Difluorobenzene (Surr)	77		70 - 130				01/20/22 07:30	01/20/22 12:42	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00398	0.00100	mg/Kg			01/20/22 15:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	16.1	J	49.9	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	16.1	J	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 23:29	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 23:29	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: BH-29

Lab Sample ID: 880-10347-7

Date Collected: 01/17/22 12:15

Matrix: Solid

Date Received: 01/19/22 13:15

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/20/22 08:47	01/20/22 23:29	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	88		70 - 130				01/20/22 08:47	01/20/22 23:29	1
o-Terphenyl	89		70 - 130				01/20/22 08:47	01/20/22 23:29	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	6.71		5.00	0.858	mg/Kg			01/19/22 20:35	1

Client Sample ID: BH-30

Lab Sample ID: 880-10347-8

Date Collected: 01/17/22 12:20

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000386	U	0.00200	0.000386	mg/Kg		01/20/22 07:30	01/20/22 13:02	1
Toluene	<0.000457	U	0.00200	0.000457	mg/Kg		01/20/22 07:30	01/20/22 13:02	1
Ethylbenzene	<0.000566	U	0.00200	0.000566	mg/Kg		01/20/22 07:30	01/20/22 13:02	1
m-Xylene & p-Xylene	<0.00101	U	0.00401	0.00101	mg/Kg		01/20/22 07:30	01/20/22 13:02	1
o-Xylene	<0.000345	U	0.00200	0.000345	mg/Kg		01/20/22 07:30	01/20/22 13:02	1
Xylenes, Total	<0.00101	U	0.00401	0.00101	mg/Kg		01/20/22 07:30	01/20/22 13:02	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	120		70 - 130				01/20/22 07:30	01/20/22 13:02	1
1,4-Difluorobenzene (Surr)	103		70 - 130				01/20/22 07:30	01/20/22 13:02	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00401	0.00101	mg/Kg			01/20/22 15:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	22.1	J	50.0	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	22.1	J	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 23:50	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 23:50	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 23:50	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	100		70 - 130				01/20/22 08:47	01/20/22 23:50	1
o-Terphenyl	98		70 - 130				01/20/22 08:47	01/20/22 23:50	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	25.2		4.98	0.855	mg/Kg			01/20/22 12:43	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: BH-31

Lab Sample ID: 880-10347-9

Date Collected: 01/17/22 12:25

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000386	U	0.00200	0.000386	mg/Kg		01/20/22 07:30	01/20/22 13:23	1
Toluene	<0.000457	U	0.00200	0.000457	mg/Kg		01/20/22 07:30	01/20/22 13:23	1
Ethylbenzene	<0.000566	U	0.00200	0.000566	mg/Kg		01/20/22 07:30	01/20/22 13:23	1
m-Xylene & p-Xylene	<0.00101	U	0.00401	0.00101	mg/Kg		01/20/22 07:30	01/20/22 13:23	1
o-Xylene	<0.000345	U	0.00200	0.000345	mg/Kg		01/20/22 07:30	01/20/22 13:23	1
Xylenes, Total	<0.00101	U	0.00401	0.00101	mg/Kg		01/20/22 07:30	01/20/22 13:23	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	114		70 - 130	01/20/22 07:30	01/20/22 13:23	1
1,4-Difluorobenzene (Surr)	96		70 - 130	01/20/22 07:30	01/20/22 13:23	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00401	0.00101	mg/Kg			01/20/22 15:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	23.2	J	50.0	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	23.2	J	50.0	15.0	mg/Kg		01/20/22 08:47	01/21/22 00:10	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/20/22 08:47	01/21/22 00:10	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/20/22 08:47	01/21/22 00:10	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	91		70 - 130				01/20/22 08:47	01/21/22 00:10	1
o-Terphenyl	91		70 - 130				01/20/22 08:47	01/21/22 00:10	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	19.6		5.01	0.860	mg/Kg			01/20/22 12:52	1

Client Sample ID: BH-32

Lab Sample ID: 880-10347-10

Date Collected: 01/17/22 12:30

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000824	J	0.00198	0.000382	mg/Kg		01/20/22 07:30	01/20/22 15:47	1
Toluene	0.000935	J	0.00198	0.000452	mg/Kg		01/20/22 07:30	01/20/22 15:47	1
Ethylbenzene	<0.000561	U	0.00198	0.000561	mg/Kg		01/20/22 07:30	01/20/22 15:47	1
m-Xylene & p-Xylene	<0.00100	U	0.00397	0.00100	mg/Kg		01/20/22 07:30	01/20/22 15:47	1
o-Xylene	0.000947	J	0.00198	0.000341	mg/Kg		01/20/22 07:30	01/20/22 15:47	1
Xylenes, Total	<0.00100	U	0.00397	0.00100	mg/Kg		01/20/22 07:30	01/20/22 15:47	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	95		70 - 130	01/20/22 07:30	01/20/22 15:47	1
1,4-Difluorobenzene (Surr)	105		70 - 130	01/20/22 07:30	01/20/22 15:47	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: BH-32

Lab Sample ID: 880-10347-10

Date Collected: 01/17/22 12:30

Matrix: Solid

Date Received: 01/19/22 13:15

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00271	J	0.00397	0.00100	mg/Kg			01/24/22 16:52	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	15.9	J	49.9	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	15.9	J	49.9	15.0	mg/Kg		01/20/22 08:47	01/21/22 00:30	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		01/20/22 08:47	01/21/22 00:30	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/20/22 08:47	01/21/22 00:30	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	106		70 - 130				01/20/22 08:47	01/21/22 00:30	1
o-Terphenyl	104		70 - 130				01/20/22 08:47	01/21/22 00:30	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.66		4.99	0.857	mg/Kg			01/20/22 13:00	1

Client Sample ID: BH-33

Lab Sample ID: 880-10347-11

Date Collected: 01/17/22 12:35

Matrix: Solid

Date Received: 01/19/22 13:15

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000384	U	0.00200	0.000384	mg/Kg		01/20/22 07:30	01/20/22 16:07	1
Toluene	0.00182	J	0.00200	0.000455	mg/Kg		01/20/22 07:30	01/20/22 16:07	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		01/20/22 07:30	01/20/22 16:07	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		01/20/22 07:30	01/20/22 16:07	1
o-Xylene	<0.000343	U	0.00200	0.000343	mg/Kg		01/20/22 07:30	01/20/22 16:07	1
Xylenes, Total	<0.00101	U	0.00399	0.00101	mg/Kg		01/20/22 07:30	01/20/22 16:07	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	113		70 - 130				01/20/22 07:30	01/20/22 16:07	1
1,4-Difluorobenzene (Surr)	94		70 - 130				01/20/22 07:30	01/20/22 16:07	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00182	J	0.00399	0.00101	mg/Kg			01/24/22 16:52	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	23.1	J	50.0	15.0	mg/Kg			01/24/22 16:26	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	23.1	J	50.0	15.0	mg/Kg		01/20/22 08:47	01/21/22 01:12	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	50.0	15.0	mg/Kg		01/20/22 08:47	01/21/22 01:12	1

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Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: BH-33

Lab Sample ID: 880-10347-11

Date Collected: 01/17/22 12:35

Matrix: Solid

Date Received: 01/19/22 13:15

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/20/22 08:47	01/21/22 01:12	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	88		70 - 130	01/20/22 08:47	01/21/22 01:12	1
o-Terphenyl	87		70 - 130	01/20/22 08:47	01/21/22 01:12	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	17.0		4.95	0.850	mg/Kg			01/20/22 13:08	1

Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)					
Lab Sample ID	Client Sample ID	BFB1	DFBZ1				
		(70-130)	(70-130)				
880-10347-1	SW-7	121	89				
880-10347-2	SW-8	132 S1+	104				
880-10347-3	SW-26	115	96				
880-10347-3 MS	SW-26	73	74				
880-10347-3 MSD	SW-26	108	99				
880-10347-4	SW-27	110	102				
880-10347-5	BH-27	117	75				
880-10347-6	BH-28	121	107				
880-10347-7	BH-29	124	77				
880-10347-8	BH-30	120	103				
880-10347-9	BH-31	114	96				
880-10347-10	BH-32	95	105				
880-10347-11	BH-33	113	94				
LCS 880-17218/1-A	Lab Control Sample	112	94				
LCS 880-17238/1-A	Lab Control Sample	101	101				
LCSD 880-17218/2-A	Lab Control Sample Dup	110	98				
LCSD 880-17238/2-A	Lab Control Sample Dup	99	95				
MB 880-17131/5-A	Method Blank	123	97				
MB 880-17218/5-A	Method Blank	114	97				
MB 880-17238/5-A	Method Blank	100	101				
Surrogate Legend							
BFB = 4-Bromofluorobenzene (Surr)							
DFBZ = 1,4-Difluorobenzene (Surr)							

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)					
Lab Sample ID	Client Sample ID	1CO1	OTPH1				
		(70-130)	(70-130)				
880-10347-1	SW-7	88	89				
880-10347-1 MS	SW-7	103	88				
880-10347-1 MSD	SW-7	109	90				
880-10347-2	SW-8	89	89				
880-10347-3	SW-26	104	104				
880-10347-4	SW-27	88	91				
880-10347-5	BH-27	88	90				
880-10347-6	BH-28	110	114				
880-10347-7	BH-29	88	89				
880-10347-8	BH-30	100	98				
880-10347-9	BH-31	91	91				
880-10347-10	BH-32	106	104				
880-10347-11	BH-33	88	87				
Surrogate Legend							
1CO = 1-Chlorooctane							
OTPH = o-Terphenyl							

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Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO2 (70-130)	OTPH2 (70-130)
LCS 880-17332/2-A	Lab Control Sample	110	102
LCSD 880-17332/3-A	Lab Control Sample Dup	124	120
MB 880-17332/1-A	Method Blank	94	97
Surrogate Legend			
1CO = 1-Chlorooctane			
OTPH = o-Terphenyl			

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-17131/5-A

Matrix: Solid

Analysis Batch: 17325

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 17131

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/19/22 07:30	01/20/22 11:10	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/19/22 07:30	01/20/22 11:10	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/19/22 07:30	01/20/22 11:10	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/19/22 07:30	01/20/22 11:10	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/19/22 07:30	01/20/22 11:10	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/19/22 07:30	01/20/22 11:10	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	123		70 - 130	01/19/22 07:30	01/20/22 11:10	1
1,4-Difluorobenzene (Surr)	97		70 - 130	01/19/22 07:30	01/20/22 11:10	1

Lab Sample ID: MB 880-17218/5-A

Matrix: Solid

Analysis Batch: 17325

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 17218

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/19/22 13:45	01/20/22 22:47	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/19/22 13:45	01/20/22 22:47	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/19/22 13:45	01/20/22 22:47	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/19/22 13:45	01/20/22 22:47	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/19/22 13:45	01/20/22 22:47	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/19/22 13:45	01/20/22 22:47	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	114		70 - 130	01/19/22 13:45	01/20/22 22:47	1
1,4-Difluorobenzene (Surr)	97		70 - 130	01/19/22 13:45	01/20/22 22:47	1

Lab Sample ID: LCS 880-17218/1-A

Matrix: Solid

Analysis Batch: 17325

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 17218

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.08639		mg/Kg		86	70 - 130
Toluene	0.100	0.09391		mg/Kg		94	70 - 130
Ethylbenzene	0.100	0.1005		mg/Kg		101	70 - 130
m-Xylene & p-Xylene	0.200	0.1949		mg/Kg		97	70 - 130
o-Xylene	0.100	0.09578		mg/Kg		96	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	112		70 - 130
1,4-Difluorobenzene (Surr)	94		70 - 130

Lab Sample ID: LCSD 880-17218/2-A

Matrix: Solid

Analysis Batch: 17325

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 17218

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	Limit
Benzene	0.100	0.08994		mg/Kg		90	70 - 130	4	35

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCSD 880-17218/2-A

Matrix: Solid

Analysis Batch: 17325

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 17218

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec.		RPD	Limit
							Limits	RPD		
Toluene	0.100	0.1007		mg/Kg		101	70 - 130	7		35
Ethylbenzene	0.100	0.1039		mg/Kg		104	70 - 130	3		35
m-Xylene & p-Xylene	0.200	0.2066		mg/Kg		103	70 - 130	6		35
o-Xylene	0.100	0.1011		mg/Kg		101	70 - 130	5		35

Surrogate	LCSD		Limits
	%Recovery	Qualifier	
4-Bromofluorobenzene (Surr)	110		70 - 130
1,4-Difluorobenzene (Surr)	98		70 - 130

Lab Sample ID: MB 880-17238/5-A

Matrix: Solid

Analysis Batch: 17324

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 17238

Analyte	MB		RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/20/22 07:30	01/20/22 10:59	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/20/22 07:30	01/20/22 10:59	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/20/22 07:30	01/20/22 10:59	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/20/22 07:30	01/20/22 10:59	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/20/22 07:30	01/20/22 10:59	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/20/22 07:30	01/20/22 10:59	1

Surrogate	MB		Limits	Prepared	Analyzed	Dil Fac
	%Recovery	Qualifier				
4-Bromofluorobenzene (Surr)	100		70 - 130	01/20/22 07:30	01/20/22 10:59	1
1,4-Difluorobenzene (Surr)	101		70 - 130	01/20/22 07:30	01/20/22 10:59	1

Lab Sample ID: LCS 880-17238/1-A

Matrix: Solid

Analysis Batch: 17324

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 17238

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec.	
							Limits	RPD
Benzene	0.100	0.09261		mg/Kg		93	70 - 130	
Toluene	0.100	0.08521		mg/Kg		85	70 - 130	
Ethylbenzene	0.100	0.08395		mg/Kg		84	70 - 130	
m-Xylene & p-Xylene	0.200	0.1688		mg/Kg		84	70 - 130	
o-Xylene	0.100	0.08491		mg/Kg		85	70 - 130	

Surrogate	LCS		Limits
	%Recovery	Qualifier	
4-Bromofluorobenzene (Surr)	101		70 - 130
1,4-Difluorobenzene (Surr)	101		70 - 130

Lab Sample ID: LCSD 880-17238/2-A

Matrix: Solid

Analysis Batch: 17324

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 17238

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec.		RPD	Limit
							Limits	RPD		
Benzene	0.100	0.09272		mg/Kg		93	70 - 130	0		35
Toluene	0.100	0.08795		mg/Kg		88	70 - 130	3		35
Ethylbenzene	0.100	0.08263		mg/Kg		83	70 - 130	2		35

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCSD 880-17238/2-A

Matrix: Solid

Analysis Batch: 17324

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 17238

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
m-Xylene & p-Xylene	0.200	0.1790		mg/Kg		90	70 - 130	6	35
o-Xylene	0.100	0.08873		mg/Kg		89	70 - 130	4	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	99		70 - 130
1,4-Difluorobenzene (Surr)	95		70 - 130

Lab Sample ID: 880-10347-3 MS

Matrix: Solid

Analysis Batch: 17324

Client Sample ID: SW-26

Prep Type: Total/NA

Prep Batch: 17238

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.000383	U F1	0.0994	0.08493		mg/Kg		85	70 - 130		
Toluene	<0.000454	U F1	0.0994	0.06737	F1	mg/Kg		68	70 - 130		
Ethylbenzene	<0.000563	U F2 F1	0.0994	0.03949	F1	mg/Kg		40	70 - 130		
m-Xylene & p-Xylene	<0.00101	U F1	0.199	0.1450		mg/Kg		73	70 - 130		
o-Xylene	<0.000343	U F1	0.0994	0.09155		mg/Kg		92	70 - 130		

Surrogate	MS %Recovery	MS Qualifier	Limits
4-Bromofluorobenzene (Surr)	73		70 - 130
1,4-Difluorobenzene (Surr)	74		70 - 130

Lab Sample ID: 880-10347-3 MSD

Matrix: Solid

Analysis Batch: 17324

Client Sample ID: SW-26

Prep Type: Total/NA

Prep Batch: 17238

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.000383	U F1	0.100	0.06125	F1	mg/Kg		61	70 - 130	32	35
Toluene	<0.000454	U F1	0.100	0.05238	F1	mg/Kg		52	70 - 130	25	35
Ethylbenzene	<0.000563	U F2 F1	0.100	0.07693	F2	mg/Kg		77	70 - 130	64	35
m-Xylene & p-Xylene	<0.00101	U F1	0.200	0.1349	F1	mg/Kg		67	70 - 130	7	35
o-Xylene	<0.000343	U F1	0.100	0.06636	F1	mg/Kg		66	70 - 130	32	35

Surrogate	MSD %Recovery	MSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	108		70 - 130
1,4-Difluorobenzene (Surr)	99		70 - 130

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 880-17332/1-A

Matrix: Solid

Analysis Batch: 17331

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 17332

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 19:44	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 19:44	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/20/22 08:47	01/20/22 19:44	1

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

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

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	94		70 - 130	01/20/22 08:47	01/20/22 19:44	1
o-Terphenyl	97		70 - 130	01/20/22 08:47	01/20/22 19:44	1

Lab Sample ID: LCS 880-17332/2-A

Matrix: Solid

Analysis Batch: 17331

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 17332

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	886.3		mg/Kg		89	70 - 130
Diesel Range Organics (Over C10-C28)	1000	934.1		mg/Kg		93	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1-Chlorooctane	110		70 - 130
o-Terphenyl	102		70 - 130

Lab Sample ID: LCSD 880-17332/3-A

Matrix: Solid

Analysis Batch: 17331

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 17332

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	1065		mg/Kg		106	70 - 130	18	20
Diesel Range Organics (Over C10-C28)	1000	1170	*1	mg/Kg		117	70 - 130	22	20

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
1-Chlorooctane	124		70 - 130
o-Terphenyl	120		70 - 130

Lab Sample ID: 880-10347-1 MS

Matrix: Solid

Analysis Batch: 17331

Client Sample ID: SW-7

Prep Type: Total/NA

Prep Batch: 17332

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	22.0	J F1	997	1520	F1	mg/Kg		150	70 - 130
Diesel Range Organics (Over C10-C28)	<15.0	U F1 *1	997	1532	F1	mg/Kg		154	70 - 130

Surrogate	MS %Recovery	MS Qualifier	Limits
1-Chlorooctane	103		70 - 130
o-Terphenyl	88		70 - 130

Lab Sample ID: 880-10347-1 MSD

Matrix: Solid

Analysis Batch: 17331

Client Sample ID: SW-7

Prep Type: Total/NA

Prep Batch: 17332

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	22.0	J F1	996	1598	F1	mg/Kg		158	70 - 130	5	20

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

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

Lab Sample ID: 880-10347-1 MSD

Matrix: Solid

Analysis Batch: 17331

Client Sample ID: SW-7

Prep Type: Total/NA

Prep Batch: 17332

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Diesel Range Organics (Over C10-C28)	<15.0	U F1 *1	996	1621	F1	mg/Kg		163	70 - 130	6	20
Surrogate	MSD %Recovery	MSD Qualifier	Limits								
1-Chlorooctane	109		70 - 130								
o-Terphenyl	90		70 - 130								

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-17255/1-A

Matrix: Solid

Analysis Batch: 17322

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			01/19/22 18:57	1

Lab Sample ID: LCS 880-17255/2-A

Matrix: Solid

Analysis Batch: 17322

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	272.3		mg/Kg		109	90 - 110

Lab Sample ID: LCSD 880-17255/3-A

Matrix: Solid

Analysis Batch: 17322

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	250	271.8		mg/Kg		109	90 - 110	0	20

Lab Sample ID: 880-10347-1 MS

Matrix: Solid

Analysis Batch: 17322

Client Sample ID: SW-7

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	9.26	F1	248	281.8		mg/Kg		110	90 - 110

Lab Sample ID: 880-10347-1 MSD

Matrix: Solid

Analysis Batch: 17322

Client Sample ID: SW-7

Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	9.26	F1	248	283.7	F1	mg/Kg		111	90 - 110	1	20

Lab Sample ID: MB 880-17256/1-A

Matrix: Solid

Analysis Batch: 17344

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			01/20/22 09:14	1

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: LCS 880-17256/2-A				Client Sample ID: Lab Control Sample						
Matrix: Solid				Prep Type: Soluble						
Analysis Batch: 17344										
Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits			
Chloride	250	263.5		mg/Kg		105	90 - 110			

Lab Sample ID: LCSD 880-17256/3-A				Client Sample ID: Lab Control Sample Dup						
Matrix: Solid				Prep Type: Soluble						
Analysis Batch: 17344										
Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit	
Chloride	250	272.6		mg/Kg		109	90 - 110	3	20	

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

GC VOA

Prep Batch: 17131

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-17131/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 17218

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-1	SW-7	Total/NA	Solid	5035	
880-10347-2	SW-8	Total/NA	Solid	5035	
MB 880-17218/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-17218/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-17218/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Prep Batch: 17238

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-3	SW-26	Total/NA	Solid	5035	
880-10347-4	SW-27	Total/NA	Solid	5035	
880-10347-5	BH-27	Total/NA	Solid	5035	
880-10347-6	BH-28	Total/NA	Solid	5035	
880-10347-7	BH-29	Total/NA	Solid	5035	
880-10347-8	BH-30	Total/NA	Solid	5035	
880-10347-9	BH-31	Total/NA	Solid	5035	
880-10347-10	BH-32	Total/NA	Solid	5035	
880-10347-11	BH-33	Total/NA	Solid	5035	
MB 880-17238/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-17238/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-17238/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-10347-3 MS	SW-26	Total/NA	Solid	5035	
880-10347-3 MSD	SW-26	Total/NA	Solid	5035	

Analysis Batch: 17324

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-3	SW-26	Total/NA	Solid	8021B	17238
880-10347-4	SW-27	Total/NA	Solid	8021B	17238
880-10347-5	BH-27	Total/NA	Solid	8021B	17238
880-10347-6	BH-28	Total/NA	Solid	8021B	17238
880-10347-7	BH-29	Total/NA	Solid	8021B	17238
880-10347-8	BH-30	Total/NA	Solid	8021B	17238
880-10347-9	BH-31	Total/NA	Solid	8021B	17238
880-10347-10	BH-32	Total/NA	Solid	8021B	17238
880-10347-11	BH-33	Total/NA	Solid	8021B	17238
MB 880-17238/5-A	Method Blank	Total/NA	Solid	8021B	17238
LCS 880-17238/1-A	Lab Control Sample	Total/NA	Solid	8021B	17238
LCSD 880-17238/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	17238
880-10347-3 MS	SW-26	Total/NA	Solid	8021B	17238
880-10347-3 MSD	SW-26	Total/NA	Solid	8021B	17238

Analysis Batch: 17325

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-1	SW-7	Total/NA	Solid	8021B	17218
880-10347-2	SW-8	Total/NA	Solid	8021B	17218
MB 880-17131/5-A	Method Blank	Total/NA	Solid	8021B	17131
MB 880-17218/5-A	Method Blank	Total/NA	Solid	8021B	17218
LCS 880-17218/1-A	Lab Control Sample	Total/NA	Solid	8021B	17218

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

GC VOA (Continued)

Analysis Batch: 17325 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCSD 880-17218/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	17218

Analysis Batch: 17392

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-3	SW-26	Total/NA	Solid	Total BTEX	
880-10347-4	SW-27	Total/NA	Solid	Total BTEX	
880-10347-5	BH-27	Total/NA	Solid	Total BTEX	
880-10347-6	BH-28	Total/NA	Solid	Total BTEX	
880-10347-7	BH-29	Total/NA	Solid	Total BTEX	
880-10347-8	BH-30	Total/NA	Solid	Total BTEX	
880-10347-9	BH-31	Total/NA	Solid	Total BTEX	

Analysis Batch: 17647

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-1	SW-7	Total/NA	Solid	Total BTEX	
880-10347-2	SW-8	Total/NA	Solid	Total BTEX	
880-10347-10	BH-32	Total/NA	Solid	Total BTEX	
880-10347-11	BH-33	Total/NA	Solid	Total BTEX	

GC Semi VOA

Analysis Batch: 17331

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-1	SW-7	Total/NA	Solid	8015B NM	17332
880-10347-2	SW-8	Total/NA	Solid	8015B NM	17332
880-10347-3	SW-26	Total/NA	Solid	8015B NM	17332
880-10347-4	SW-27	Total/NA	Solid	8015B NM	17332
880-10347-5	BH-27	Total/NA	Solid	8015B NM	17332
880-10347-6	BH-28	Total/NA	Solid	8015B NM	17332
880-10347-7	BH-29	Total/NA	Solid	8015B NM	17332
880-10347-8	BH-30	Total/NA	Solid	8015B NM	17332
880-10347-9	BH-31	Total/NA	Solid	8015B NM	17332
880-10347-10	BH-32	Total/NA	Solid	8015B NM	17332
880-10347-11	BH-33	Total/NA	Solid	8015B NM	17332
MB 880-17332/1-A	Method Blank	Total/NA	Solid	8015B NM	17332
LCS 880-17332/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	17332
LCSD 880-17332/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	17332
880-10347-1 MS	SW-7	Total/NA	Solid	8015B NM	17332
880-10347-1 MSD	SW-7	Total/NA	Solid	8015B NM	17332

Prep Batch: 17332

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-1	SW-7	Total/NA	Solid	8015NM Prep	
880-10347-2	SW-8	Total/NA	Solid	8015NM Prep	
880-10347-3	SW-26	Total/NA	Solid	8015NM Prep	
880-10347-4	SW-27	Total/NA	Solid	8015NM Prep	
880-10347-5	BH-27	Total/NA	Solid	8015NM Prep	
880-10347-6	BH-28	Total/NA	Solid	8015NM Prep	
880-10347-7	BH-29	Total/NA	Solid	8015NM Prep	
880-10347-8	BH-30	Total/NA	Solid	8015NM Prep	
880-10347-9	BH-31	Total/NA	Solid	8015NM Prep	

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

GC Semi VOA (Continued)

Prep Batch: 17332 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-10	BH-32	Total/NA	Solid	8015NM Prep	
880-10347-11	BH-33	Total/NA	Solid	8015NM Prep	
MB 880-17332/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-17332/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-17332/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-10347-1 MS	SW-7	Total/NA	Solid	8015NM Prep	
880-10347-1 MSD	SW-7	Total/NA	Solid	8015NM Prep	

Analysis Batch: 17641

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-1	SW-7	Total/NA	Solid	8015 NM	
880-10347-2	SW-8	Total/NA	Solid	8015 NM	
880-10347-3	SW-26	Total/NA	Solid	8015 NM	
880-10347-4	SW-27	Total/NA	Solid	8015 NM	
880-10347-5	BH-27	Total/NA	Solid	8015 NM	
880-10347-6	BH-28	Total/NA	Solid	8015 NM	
880-10347-7	BH-29	Total/NA	Solid	8015 NM	
880-10347-8	BH-30	Total/NA	Solid	8015 NM	
880-10347-9	BH-31	Total/NA	Solid	8015 NM	
880-10347-10	BH-32	Total/NA	Solid	8015 NM	
880-10347-11	BH-33	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 17255

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-1	SW-7	Soluble	Solid	DI Leach	
880-10347-2	SW-8	Soluble	Solid	DI Leach	
880-10347-3	SW-26	Soluble	Solid	DI Leach	
880-10347-4	SW-27	Soluble	Solid	DI Leach	
880-10347-5	BH-27	Soluble	Solid	DI Leach	
880-10347-6	BH-28	Soluble	Solid	DI Leach	
880-10347-7	BH-29	Soluble	Solid	DI Leach	
MB 880-17255/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-17255/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-17255/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-10347-1 MS	SW-7	Soluble	Solid	DI Leach	
880-10347-1 MSD	SW-7	Soluble	Solid	DI Leach	

Leach Batch: 17256

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-8	BH-30	Soluble	Solid	DI Leach	
880-10347-9	BH-31	Soluble	Solid	DI Leach	
880-10347-10	BH-32	Soluble	Solid	DI Leach	
880-10347-11	BH-33	Soluble	Solid	DI Leach	
MB 880-17256/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-17256/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-17256/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

HPLC/IC

Analysis Batch: 17322

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-1	SW-7	Soluble	Solid	300.0	17255
880-10347-2	SW-8	Soluble	Solid	300.0	17255
880-10347-3	SW-26	Soluble	Solid	300.0	17255
880-10347-4	SW-27	Soluble	Solid	300.0	17255
880-10347-5	BH-27	Soluble	Solid	300.0	17255
880-10347-6	BH-28	Soluble	Solid	300.0	17255
880-10347-7	BH-29	Soluble	Solid	300.0	17255
MB 880-17255/1-A	Method Blank	Soluble	Solid	300.0	17255
LCS 880-17255/2-A	Lab Control Sample	Soluble	Solid	300.0	17255
LCSD 880-17255/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	17255
880-10347-1 MS	SW-7	Soluble	Solid	300.0	17255
880-10347-1 MSD	SW-7	Soluble	Solid	300.0	17255

Analysis Batch: 17344

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10347-8	BH-30	Soluble	Solid	300.0	17256
880-10347-9	BH-31	Soluble	Solid	300.0	17256
880-10347-10	BH-32	Soluble	Solid	300.0	17256
880-10347-11	BH-33	Soluble	Solid	300.0	17256
MB 880-17256/1-A	Method Blank	Soluble	Solid	300.0	17256
LCS 880-17256/2-A	Lab Control Sample	Soluble	Solid	300.0	17256
LCSD 880-17256/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	17256

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: SW-7

Lab Sample ID: 880-10347-1

Date Collected: 01/17/22 11:50

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	17218	01/19/22 13:45	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17325	01/21/22 06:53	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17647	01/24/22 16:52	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/20/22 20:46	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	17255	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17322	01/19/22 19:20	CH	XEN MID

Client Sample ID: SW-8

Lab Sample ID: 880-10347-2

Date Collected: 01/17/22 11:55

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	17218	01/19/22 13:45	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17325	01/21/22 07:13	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17647	01/24/22 16:52	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/20/22 21:47	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	17255	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17322	01/19/22 19:43	CH	XEN MID

Client Sample ID: SW-26

Lab Sample ID: 880-10347-3

Date Collected: 01/17/22 12:55

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	17238	01/20/22 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17324	01/20/22 11:20	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17392	01/20/22 15:55	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/20/22 22:08	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	17255	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17322	01/19/22 19:50	CH	XEN MID

Client Sample ID: SW-27

Lab Sample ID: 880-10347-4

Date Collected: 01/17/22 13:00

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	17238	01/20/22 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17324	01/20/22 11:41	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17392	01/20/22 15:55	AJ	XEN MID

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Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: SW-27

Lab Sample ID: 880-10347-4

Date Collected: 01/17/22 13:00

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/20/22 22:28	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	17255	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17322	01/19/22 19:58	CH	XEN MID

Client Sample ID: BH-27

Lab Sample ID: 880-10347-5

Date Collected: 01/17/22 12:00

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	17238	01/20/22 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17324	01/20/22 12:01	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17392	01/20/22 15:55	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/20/22 22:49	AJ	XEN MID
Soluble	Leach	DI Leach			4.99 g	50 mL	17255	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17322	01/19/22 20:05	CH	XEN MID

Client Sample ID: BH-28

Lab Sample ID: 880-10347-6

Date Collected: 01/17/22 12:05

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	17238	01/20/22 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17324	01/20/22 12:22	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17392	01/20/22 15:55	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/20/22 23:09	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	17255	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17322	01/19/22 20:28	CH	XEN MID

Client Sample ID: BH-29

Lab Sample ID: 880-10347-7

Date Collected: 01/17/22 12:15

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	17238	01/20/22 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17324	01/20/22 12:42	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17392	01/20/22 15:55	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/20/22 23:29	AJ	XEN MID

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Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: BH-29

Lab Sample ID: 880-10347-7

Date Collected: 01/17/22 12:15

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			5 g	50 mL	17255	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17322	01/19/22 20:35	CH	XEN MID

Client Sample ID: BH-30

Lab Sample ID: 880-10347-8

Date Collected: 01/17/22 12:20

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.99 g	5 mL	17238	01/20/22 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17324	01/20/22 13:02	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17392	01/20/22 15:55	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/20/22 23:50	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	17256	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17344	01/20/22 12:43	CH	XEN MID

Client Sample ID: BH-31

Lab Sample ID: 880-10347-9

Date Collected: 01/17/22 12:25

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.99 g	5 mL	17238	01/20/22 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17324	01/20/22 13:23	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17392	01/20/22 15:55	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/21/22 00:10	AJ	XEN MID
Soluble	Leach	DI Leach			4.99 g	50 mL	17256	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17344	01/20/22 12:52	CH	XEN MID

Client Sample ID: BH-32

Lab Sample ID: 880-10347-10

Date Collected: 01/17/22 12:30

Matrix: Solid

Date Received: 01/19/22 13:15

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.04 g	5 mL	17238	01/20/22 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17324	01/20/22 15:47	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17647	01/24/22 16:52	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/21/22 00:30	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	17256	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17344	01/20/22 13:00	CH	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Client Sample ID: BH-33
Date Collected: 01/17/22 12:35
Date Received: 01/19/22 13:15

Lab Sample ID: 880-10347-11
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	17238	01/20/22 07:30	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17324	01/20/22 16:07	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			17647	01/24/22 16:52	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			17641	01/24/22 16:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	17332	01/20/22 08:47	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17331	01/21/22 01:12	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	17256	01/19/22 14:00	CH	XEN MID
Soluble	Analysis	300.0		1			17344	01/20/22 13:08	CH	XEN MID

Laboratory References:
XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Accreditation/Certification Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Laboratory: Eurofins Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Program	Identification Number	Expiration Date
Texas	NELAP	T104704400-21-22	06-30-22

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
8015 NM		Solid	Total TPH
Total BTEX		Solid	Total BTEX

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

Method Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

Protocol References:

ASTM = ASTM International

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

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

TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

Laboratory References:

XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Midland

Sample Summary

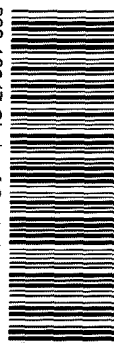
Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10347-1
SDG: Eddy County, NM

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
880-10347-1	SW-7	Solid	01/17/22 11:50	01/19/22 13:15
880-10347-2	SW-8	Solid	01/17/22 11:55	01/19/22 13:15
880-10347-3	SW-26	Solid	01/17/22 12:55	01/19/22 13:15
880-10347-4	SW-27	Solid	01/17/22 13:00	01/19/22 13:15
880-10347-5	BH-27	Solid	01/17/22 12:00	01/19/22 13:15
880-10347-6	BH-28	Solid	01/17/22 12:05	01/19/22 13:15
880-10347-7	BH-29	Solid	01/17/22 12:15	01/19/22 13:15
880-10347-8	BH-30	Solid	01/17/22 12:20	01/19/22 13:15
880-10347-9	BH-31	Solid	01/17/22 12:25	01/19/22 13:15
880-10347-10	BH-32	Solid	01/17/22 12:30	01/19/22 13:15
880-10347-11	BH-33	Solid	01/17/22 12:35	01/19/22 13:15

Xenoco Laboratories

The Environmental Lab of Texas



880-10347 Chain of Custody

12600 West 1-20 East
Odessa, Texas 79765

CHAIN OF CUSTODY RECORD AND ANALYSIS REQUEST

Phone: 432-563-1800
Fax: 432-563-1713

Pg. 2 of 2

Project Manager: "Becky"Company Name: CHD

Company Address: _____

City/State/Zip: Midland, TX

Telephone No: _____

Sampler Signature: [Signature]

Fax No: _____

e-mail: "Becky", AmberProject Name: Snapping PumpsProject #: 12565619Project Loc: Eddy County, NM

PO #:

Report Format: ☐ Standard ☐ TRRP ☐ NPDES

(lab use only)

ORDER #:

FIELD CODE

BA-33

Beginning Depth

Ending Depth

Date Sampled

1/17/22 1235

Time Sampled

Field Filtered

Total # of Containers

Ice

HNO₃

HCl

H₂SO₄

NaOH

Na₂S₂O₃

None

Other (Specify)

DW=Drinking Water SL=Sludge

GW = Groundwater S=Soil/Solid

NP=Non-Potable Specify Other

TPH 418 1 8015M 8015B

TPH TX 1005 TX 1006

Cations (Ca, Mg Na, K)

Anions (Cl SO₄ Alkalinity)

SAR / ESP / CEC

Metals, As Ag Ba Cd Cr Pb Hg Se

Volatiles

Semivolatiles

BTEX 8021B/5030 or BTEX 8260

RCI

N O.R.M.

X Chloride 300

PUSH TAT (Pre-Schedule) 24 48 72 hrs

Standard TAT

Special Instructions:

Requisitioned by:

[Signature]

Requisitioned by:

[Signature]

Date

1/17/22

Time

1600

Received by:

[Signature]

Date

1/18/22

Time

1425

Received by:

[Signature]

Requisitioned by:

[Signature]

Date

1/18/22

Time

1425

Received by:

[Signature]

Date

1/19/22

Time

1115

Received by:

[Signature]

Laboratory Comments

Sample Containers Intact?

VOCs Free of Headspace?

Labels on containers?

Custody seals on containers?

Sample Hand Delivered by Courier?

UPS

DHL

FedEx

Y

Y

Y

Y

Y

Y

Y

Y

N

N

N

N

N

N

N

N

Y

Y

Y

Y

Y

Y

Y

Y

N

N

N

N

N

N

N

N

N

N

N

N

N

N

N

N

Login Sample Receipt Checklist

Client: GHD Services Inc.

Job Number: 880-10347-1
SDG Number: Eddy County, NM

Login Number: 10347

List Number: 1

Creator: Teel, Brianna

List Source: Eurofins Midland

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
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	
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.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	



Environment Testing America

ANALYTICAL REPORT

Eurofins Midland
1211 W. Florida Ave
Midland, TX 79701
Tel: (432)704-5440

Laboratory Job ID: 880-10688-1

Laboratory Sample Delivery Group: Eddy County, NM
Client Project/Site: Snapping Pumps
Revision: 1

For:

GHD Services Inc.
2135 South Loop 250 West
Midland, Texas 79703

Attn: Becky Haskell

A handwritten signature in black ink that reads "Debbie Simmons".

Authorized for release by:
2/3/2022 2:45:46 PM

Debbie Simmons, Project Manager
(832)986-6768
debbie.simmons@eurofinset.com

LINKS

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www.eurofinsus.com/Env

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.

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Laboratory Job ID: 880-10688-1
SDG: Eddy County, NM

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Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Qualifiers

GC VOA

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.
S1-	Surrogate recovery exceeds control limits, low biased.
S1+	Surrogate recovery exceeds control limits, high biased.
U	Indicates the analyte was analyzed for but not detected.

GC Semi VOA

Qualifier	Qualifier Description
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
S1+	Surrogate recovery exceeds control limits, high biased.
U	Indicates the analyte was analyzed for but not detected.

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)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

Eurofins Midland

Case Narrative

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Job ID: 880-10688-1

Laboratory: Eurofins Midland

Narrative

Job Narrative 880-10688-1

Comments

No additional comments.

Revision

The report being provided is a revision of the original report sent on 1/31/2022. The report (revision 1) is being revised due to: COC submitted with two different TATs, revised to report all samples submitted as one final report..

Receipt

The samples were received on 1/28/2022 12:00 PM. Unless otherwise noted below, the samples arrived in good condition, and where required, properly preserved and on ice. The temperature of the cooler at receipt was 3.3° C.

GC VOA

No analytical or quality issues were noted, other than those described in the Definitions/Glossary page.

GC Semi VOA

Method 8015B NM: The method blank for preparation batch 880-18062 and analytical batch 880-17977 contained Diesel Range Organics (Over C10-C28) above the method detection limit. This target analyte concentration was less than the reporting limit (RL); therefore, re-extraction and/or re-analysis of samples was not performed.

Method 8015B NM: Surrogate recovery for the following samples were outside control limits: (MB 880-18062/1-A), (890-1869-A-1-G) and (890-1869-A-1-I MSD). Evidence of matrix interferences is not obvious.

Method 8015B NM: The closing CCV bracketing these samples was biased high for diesel range hydrocarbons, the data was reported due to the samples being rush but is being reanalyzed for confirmation due to the possible high bias.

BH-16A (880-10688-2) and BH-17A (880-10688-3)

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

General Chemistry

Method 300.0: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-18091 and analytical batch 880-18196 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

Method 300.0: The matrix spike duplicate (MSD) recoveries for preparation batch 880-18269 and 880-18269 and analytical batch 880-18297 were outside control limits. Non-homogeneity is suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

Organic Prep

No analytical or quality issues were noted, other than those described in the Definitions/Glossary page.

VOA Prep

No analytical or quality issues were noted, other than those described in the Definitions/Glossary page.

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: BH-15A

Lab Sample ID: 880-10688-1

Date Collected: 01/27/22 14:10

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000389	U	0.00202	0.000389	mg/Kg		01/28/22 12:00	01/29/22 02:51	1
Toluene	0.000520	J	0.00202	0.000461	mg/Kg		01/28/22 12:00	01/29/22 02:51	1
Ethylbenzene	0.000641	J	0.00202	0.000571	mg/Kg		01/28/22 12:00	01/29/22 02:51	1
m-Xylene & p-Xylene	<0.00102	U	0.00404	0.00102	mg/Kg		01/28/22 12:00	01/29/22 02:51	1
o-Xylene	0.000695	J	0.00202	0.000347	mg/Kg		01/28/22 12:00	01/29/22 02:51	1
Xylenes, Total	<0.00102	U	0.00404	0.00102	mg/Kg		01/28/22 12:00	01/29/22 02:51	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	178	S1+	70 - 130	01/28/22 12:00	01/29/22 02:51	1
1,4-Difluorobenzene (Surr)	78		70 - 130	01/28/22 12:00	01/29/22 02:51	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00186	J	0.00404	0.00102	mg/Kg			01/31/22 13:52	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	125		50.0	15.0	mg/Kg			01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/28/22 14:42	01/29/22 05:46	1
Diesel Range Organics (Over C10-C28)	125	B	50.0	15.0	mg/Kg		01/28/22 14:42	01/29/22 05:46	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/28/22 14:42	01/29/22 05:46	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	82		70 - 130	01/28/22 14:42	01/29/22 05:46	1
o-Terphenyl	92		70 - 130	01/28/22 14:42	01/29/22 05:46	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	9.20		4.95	0.850	mg/Kg			01/30/22 21:29	1

Client Sample ID: BH-16A

Lab Sample ID: 880-10688-2

Date Collected: 01/27/22 14:20

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/28/22 12:00	01/29/22 03:20	1
Toluene	0.0129		0.00200	0.000456	mg/Kg		01/28/22 12:00	01/29/22 03:20	1
Ethylbenzene	0.0135		0.00200	0.000565	mg/Kg		01/28/22 12:00	01/29/22 03:20	1
m-Xylene & p-Xylene	0.353		0.00400	0.00101	mg/Kg		01/28/22 12:00	01/29/22 03:20	1
o-Xylene	0.155		0.00200	0.000344	mg/Kg		01/28/22 12:00	01/29/22 03:20	1
Xylenes, Total	0.508		0.00400	0.00101	mg/Kg		01/28/22 12:00	01/29/22 03:20	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	282	S1+	70 - 130	01/28/22 12:00	01/29/22 03:20	1
1,4-Difluorobenzene (Surr)	73		70 - 130	01/28/22 12:00	01/29/22 03:20	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: BH-16A

Lab Sample ID: 880-10688-2

Date Collected: 01/27/22 14:20

Matrix: Solid

Date Received: 01/28/22 07:29

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.534		0.00400	0.00101	mg/Kg	-		01/31/22 13:52	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	543		50.0	15.0	mg/Kg	-		01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	74.6		50.0	15.0	mg/Kg	-	01/28/22 14:42	01/29/22 06:06	1
Diesel Range Organics (Over C10-C28)	432	B	50.0	15.0	mg/Kg	-	01/28/22 14:42	01/29/22 06:06	1
Oil Range Organics (Over C28-C36)	36.8	J	50.0	15.0	mg/Kg	-	01/28/22 14:42	01/29/22 06:06	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	81		70 - 130				01/28/22 14:42	01/29/22 06:06	1
o-Terphenyl	91		70 - 130				01/28/22 14:42	01/29/22 06:06	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	17.4		5.04	0.865	mg/Kg	-		01/30/22 21:36	1

Client Sample ID: BH-17A

Lab Sample ID: 880-10688-3

Date Collected: 01/27/22 14:30

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	2.10		0.198	0.0381	mg/Kg	-	01/31/22 07:24	01/31/22 14:08	100
Toluene	5.81		0.198	0.0451	mg/Kg	-	01/31/22 07:24	01/31/22 14:08	100
Ethylbenzene	2.88		0.198	0.0559	mg/Kg	-	01/31/22 07:24	01/31/22 14:08	100
m-Xylene & p-Xylene	36.6		0.396	0.100	mg/Kg	-	01/31/22 07:24	01/31/22 14:08	100
o-Xylene	8.38		0.198	0.0341	mg/Kg	-	01/31/22 07:24	01/31/22 14:08	100
Xylenes, Total	45.0		0.396	0.100	mg/Kg	-	01/31/22 07:24	01/31/22 14:08	100
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	150	S1+	70 - 130				01/31/22 07:24	01/31/22 14:08	100
1,4-Difluorobenzene (Surr)	40	S1-	70 - 130				01/31/22 07:24	01/31/22 14:08	100

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	55.8		0.396	0.100	mg/Kg	-		01/31/22 13:52	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	8180		50.0	15.0	mg/Kg	-		01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	2970		50.0	15.0	mg/Kg	-	01/28/22 14:42	01/29/22 06:27	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: BH-17A

Lab Sample ID: 880-10688-3

Date Collected: 01/27/22 14:30

Matrix: Solid

Date Received: 01/28/22 07:29

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics (Over C10-C28)	4770	B	50.0	15.0	mg/Kg		01/28/22 14:42	01/29/22 06:27	1
Oil Range Organics (Over C28-C36)	435		50.0	15.0	mg/Kg		01/28/22 14:42	01/29/22 06:27	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	102		70 - 130				01/28/22 14:42	01/29/22 06:27	1
o-Terphenyl	84		70 - 130				01/28/22 14:42	01/29/22 06:27	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	15.8		4.97	0.853	mg/Kg			01/30/22 21:59	1

Client Sample ID: SW-28 14'-19'

Lab Sample ID: 880-10688-4

Date Collected: 01/27/22 13:20

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg		01/28/22 12:00	01/29/22 04:16	1
Toluene	<0.000451	U	0.00198	0.000451	mg/Kg		01/28/22 12:00	01/29/22 04:16	1
Ethylbenzene	<0.000559	U	0.00198	0.000559	mg/Kg		01/28/22 12:00	01/29/22 04:16	1
m-Xylene & p-Xylene	<0.00100	U	0.00396	0.00100	mg/Kg		01/28/22 12:00	01/29/22 04:16	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		01/28/22 12:00	01/29/22 04:16	1
Xylenes, Total	<0.00100	U	0.00396	0.00100	mg/Kg		01/28/22 12:00	01/29/22 04:16	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	179	S1+	70 - 130				01/28/22 12:00	01/29/22 04:16	1
1,4-Difluorobenzene (Surr)	104		70 - 130				01/28/22 12:00	01/29/22 04:16	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00396	0.00100	mg/Kg			02/03/22 13:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	30.0	J	49.9	15.0	mg/Kg			01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	49.9	15.0	mg/Kg		01/31/22 09:54	02/01/22 00:47	1
Diesel Range Organics (Over C10-C28)	30.0	J	49.9	15.0	mg/Kg		01/31/22 09:54	02/01/22 00:47	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/31/22 09:54	02/01/22 00:47	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	97		70 - 130				01/31/22 09:54	02/01/22 00:47	1
o-Terphenyl	95		70 - 130				01/31/22 09:54	02/01/22 00:47	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	13.1		5.00	0.858	mg/Kg			01/31/22 16:13	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: SW-29 14'-19'

Lab Sample ID: 880-10688-5

Date Collected: 01/27/22 13:30

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000388	U	0.00202	0.000388	mg/Kg		01/28/22 12:00	01/29/22 04:45	1
Toluene	0.00657		0.00202	0.000460	mg/Kg		01/28/22 12:00	01/29/22 04:45	1
Ethylbenzene	0.00102	J	0.00202	0.000570	mg/Kg		01/28/22 12:00	01/29/22 04:45	1
m-Xylene & p-Xylene	0.0129		0.00403	0.00102	mg/Kg		01/28/22 12:00	01/29/22 04:45	1
o-Xylene	0.00126	J	0.00202	0.000347	mg/Kg		01/28/22 12:00	01/29/22 04:45	1
Xylenes, Total	0.0142		0.00403	0.00102	mg/Kg		01/28/22 12:00	01/29/22 04:45	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	161	S1+	70 - 130	01/28/22 12:00	01/29/22 04:45	1
1,4-Difluorobenzene (Surr)	105		70 - 130	01/28/22 12:00	01/29/22 04:45	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.0218		0.00403	0.00102	mg/Kg			02/03/22 13:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	02/01/22 01:08	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	02/01/22 01:08	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	02/01/22 01:08	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	117		70 - 130	01/31/22 09:54	02/01/22 01:08	1
o-Terphenyl	115		70 - 130	01/31/22 09:54	02/01/22 01:08	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	53.2		4.96	0.851	mg/Kg			01/31/22 16:21	1

Client Sample ID: SW-30 14'-19'

Lab Sample ID: 880-10688-6

Date Collected: 01/27/22 13:40

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/28/22 12:00	01/29/22 05:13	1
Toluene	0.00324		0.00199	0.000453	mg/Kg		01/28/22 12:00	01/29/22 05:13	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		01/28/22 12:00	01/29/22 05:13	1
m-Xylene & p-Xylene	0.00539		0.00398	0.00100	mg/Kg		01/28/22 12:00	01/29/22 05:13	1
o-Xylene	<0.000342	U	0.00199	0.000342	mg/Kg		01/28/22 12:00	01/29/22 05:13	1
Xylenes, Total	0.00539		0.00398	0.00100	mg/Kg		01/28/22 12:00	01/29/22 05:13	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	156	S1+	70 - 130	01/28/22 12:00	01/29/22 05:13	1
1,4-Difluorobenzene (Surr)	106		70 - 130	01/28/22 12:00	01/29/22 05:13	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: SW-30 14'-19'

Lab Sample ID: 880-10688-6

Date Collected: 01/27/22 13:40

Matrix: Solid

Date Received: 01/28/22 07:29

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00863		0.00398	0.00100	mg/Kg			02/03/22 13:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	02/01/22 01:29	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	02/01/22 01:29	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	02/01/22 01:29	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	94		70 - 130				01/31/22 09:54	02/01/22 01:29	1
o-Terphenyl	91		70 - 130				01/31/22 09:54	02/01/22 01:29	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	13.4		4.98	0.855	mg/Kg			01/31/22 16:28	1

Client Sample ID: SW-31 14'-19'

Lab Sample ID: 880-10688-7

Date Collected: 01/27/22 13:50

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/28/22 12:00	01/29/22 05:40	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/28/22 12:00	01/29/22 05:40	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/28/22 12:00	01/29/22 05:40	1
m-Xylene & p-Xylene	0.00277	J	0.00400	0.00101	mg/Kg		01/28/22 12:00	01/29/22 05:40	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/28/22 12:00	01/29/22 05:40	1
Xylenes, Total	0.00277	J	0.00400	0.00101	mg/Kg		01/28/22 12:00	01/29/22 05:40	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	157	S1+	70 - 130				01/28/22 12:00	01/29/22 05:40	1
1,4-Difluorobenzene (Surr)	95		70 - 130				01/28/22 12:00	01/29/22 05:40	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00277	J	0.00400	0.00101	mg/Kg			02/03/22 13:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	49.9	15.0	mg/Kg		01/31/22 09:54	02/01/22 02:10	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		01/31/22 09:54	02/01/22 02:10	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: SW-31 14'-19'

Lab Sample ID: 880-10688-7

Date Collected: 01/27/22 13:50

Matrix: Solid

Date Received: 01/28/22 07:29

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg	-	01/31/22 09:54	02/01/22 02:10	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	102		70 - 130				01/31/22 09:54	02/01/22 02:10	1
o-Terphenyl	98		70 - 130				01/31/22 09:54	02/01/22 02:10	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	13.6		4.95	0.850	mg/Kg	-		02/01/22 16:48	1

Client Sample ID: BH-14A

Lab Sample ID: 880-10688-8

Date Collected: 01/27/22 14:00

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000384	U	0.00200	0.000384	mg/Kg	-	01/28/22 12:00	01/29/22 06:07	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg	-	01/28/22 12:00	01/29/22 06:07	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg	-	01/28/22 12:00	01/29/22 06:07	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg	-	01/28/22 12:00	01/29/22 06:07	1
o-Xylene	0.00109	J	0.00200	0.000343	mg/Kg	-	01/28/22 12:00	01/29/22 06:07	1
Xylenes, Total	0.00109	J	0.00399	0.00101	mg/Kg	-	01/28/22 12:00	01/29/22 06:07	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	154	S1+	70 - 130				01/28/22 12:00	01/29/22 06:07	1
1,4-Difluorobenzene (Surr)	96		70 - 130				01/28/22 12:00	01/29/22 06:07	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00109	J	0.00399	0.00101	mg/Kg	-		02/03/22 13:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg	-		01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg	-	01/31/22 09:54	02/01/22 02:30	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg	-	01/31/22 09:54	02/01/22 02:30	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg	-	01/31/22 09:54	02/01/22 02:30	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	96		70 - 130				01/31/22 09:54	02/01/22 02:30	1
o-Terphenyl	94		70 - 130				01/31/22 09:54	02/01/22 02:30	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	44.1		5.00	0.858	mg/Kg	-		02/01/22 16:55	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: BH-18A

Lab Sample ID: 880-10688-9

Date Collected: 01/27/22 14:40

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000389	U	0.00202	0.000389	mg/Kg		01/28/22 12:00	01/29/22 06:34	1
Toluene	<0.000461	U	0.00202	0.000461	mg/Kg		01/28/22 12:00	01/29/22 06:34	1
Ethylbenzene	<0.000571	U	0.00202	0.000571	mg/Kg		01/28/22 12:00	01/29/22 06:34	1
m-Xylene & p-Xylene	0.00126	J	0.00404	0.00102	mg/Kg		01/28/22 12:00	01/29/22 06:34	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		01/28/22 12:00	01/29/22 06:34	1
Xylenes, Total	0.00126	J	0.00404	0.00102	mg/Kg		01/28/22 12:00	01/29/22 06:34	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	174	S1+	70 - 130	01/28/22 12:00	01/29/22 06:34	1
1,4-Difluorobenzene (Surr)	111		70 - 130	01/28/22 12:00	01/29/22 06:34	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00126	J	0.00404	0.00102	mg/Kg			02/03/22 13:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	50.0	15.0	mg/Kg			01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	02/01/22 02:50	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	02/01/22 02:50	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	02/01/22 02:50	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	93		70 - 130				01/31/22 09:54	02/01/22 02:50	1
o-Terphenyl	88		70 - 130				01/31/22 09:54	02/01/22 02:50	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	42.7		4.99	0.857	mg/Kg			02/01/22 17:03	1

Client Sample ID: BH-19A

Lab Sample ID: 880-10688-10

Date Collected: 01/27/22 14:50

Matrix: Solid

Date Received: 01/28/22 07:29

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000383	U	0.00199	0.000383	mg/Kg		01/28/22 12:00	01/29/22 07:01	1
Toluene	<0.000454	U	0.00199	0.000454	mg/Kg		01/28/22 12:00	01/29/22 07:01	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		01/28/22 12:00	01/29/22 07:01	1
m-Xylene & p-Xylene	<0.00101	U	0.00398	0.00101	mg/Kg		01/28/22 12:00	01/29/22 07:01	1
o-Xylene	<0.000343	U	0.00199	0.000343	mg/Kg		01/28/22 12:00	01/29/22 07:01	1
Xylenes, Total	<0.00101	U	0.00398	0.00101	mg/Kg		01/28/22 12:00	01/29/22 07:01	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	154	S1+	70 - 130	01/28/22 12:00	01/29/22 07:01	1
1,4-Difluorobenzene (Surr)	108		70 - 130	01/28/22 12:00	01/29/22 07:01	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: BH-19A

Lab Sample ID: 880-10688-10

Date Collected: 01/27/22 14:50

Matrix: Solid

Date Received: 01/28/22 07:29

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00398	0.00101	mg/Kg			02/03/22 13:55	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<15.0	U	49.9	15.0	mg/Kg			01/31/22 13:01	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	49.9	15.0	mg/Kg		01/31/22 09:54	02/01/22 03:11	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		01/31/22 09:54	02/01/22 03:11	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		01/31/22 09:54	02/01/22 03:11	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	91		70 - 130				01/31/22 09:54	02/01/22 03:11	1
o-Terphenyl	87		70 - 130				01/31/22 09:54	02/01/22 03:11	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	2.51	J	4.98	0.855	mg/Kg			02/01/22 17:13	1

Eurofins Midland

Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	BFB1 (70-130)	DFBZ1 (70-130)
880-10688-1	BH-15A	178 S1+	78
880-10688-2	BH-16A	282 S1+	73
880-10688-3	BH-17A	150 S1+	40 S1-
880-10688-4	SW-28 14'-19'	179 S1+	104
880-10688-5	SW-29 14'-19'	161 S1+	105
880-10688-6	SW-30 14'-19'	156 S1+	106
880-10688-7	SW-31 14'-19'	157 S1+	95
880-10688-8	BH-14A	154 S1+	96
880-10688-9	BH-18A	174 S1+	111
880-10688-10	BH-19A	154 S1+	108
LCS 880-17925/1-A	Lab Control Sample	127	112
LCS 880-18098/1-A	Lab Control Sample	102	101
LCSD 880-17925/2-A	Lab Control Sample Dup	131 S1+	107
LCSD 880-18098/2-A	Lab Control Sample Dup	98	99
MB 880-17873/5-A	Method Blank	86	99
MB 880-17925/5-A	Method Blank	88	96
MB 880-18098/5-A	Method Blank	98	95
Surrogate Legend			
BFB = 4-Bromofluorobenzene (Surr)			
DFBZ = 1,4-Difluorobenzene (Surr)			

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO1 (70-130)	OTPH1 (70-130)
880-10688-1	BH-15A	82	92
880-10688-2	BH-16A	81	91
880-10688-3	BH-17A	102	84
880-10688-4	SW-28 14'-19'	97	95
880-10688-5	SW-29 14'-19'	117	115
880-10688-6	SW-30 14'-19'	94	91
880-10688-7	SW-31 14'-19'	102	98
880-10688-8	BH-14A	96	94
880-10688-9	BH-18A	93	88
880-10688-10	BH-19A	91	87
LCS 880-18062/2-A	Lab Control Sample	121	129
LCSD 880-18062/3-A	Lab Control Sample Dup	104	115
MB 880-18062/1-A	Method Blank	110	132 S1+
Surrogate Legend			
1CO = 1-Chlorooctane			
OTPH = o-Terphenyl			

Eurofins Midland

Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO2 (70-130)	OTPH2 (70-130)
LCS 880-18131/2-A	Lab Control Sample	84	82
LCSD 880-18131/3-A	Lab Control Sample Dup	82	78
MB 880-18131/1-A	Method Blank	106	105
Surrogate Legend			
1CO = 1-Chlorooctane			
OTPH = o-Terphenyl			

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-17873/5-A

Matrix: Solid

Analysis Batch: 17866

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 17873

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/27/22 08:57	01/28/22 04:03	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/27/22 08:57	01/28/22 04:03	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/27/22 08:57	01/28/22 04:03	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/27/22 08:57	01/28/22 04:03	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/27/22 08:57	01/28/22 04:03	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/27/22 08:57	01/28/22 04:03	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	86		70 - 130	01/27/22 08:57	01/28/22 04:03	1
1,4-Difluorobenzene (Surr)	99		70 - 130	01/27/22 08:57	01/28/22 04:03	1

Lab Sample ID: MB 880-17925/5-A

Matrix: Solid

Analysis Batch: 17866

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 17925

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/28/22 07:30	01/28/22 20:16	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/28/22 07:30	01/28/22 20:16	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/28/22 07:30	01/28/22 20:16	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/28/22 07:30	01/28/22 20:16	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/28/22 07:30	01/28/22 20:16	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/28/22 07:30	01/28/22 20:16	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	88		70 - 130	01/28/22 07:30	01/28/22 20:16	1
1,4-Difluorobenzene (Surr)	96		70 - 130	01/28/22 07:30	01/28/22 20:16	1

Lab Sample ID: LCS 880-17925/1-A

Matrix: Solid

Analysis Batch: 17866

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 17925

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.1153		mg/Kg		115	70 - 130
Toluene	0.100	0.09498		mg/Kg		95	70 - 130
Ethylbenzene	0.100	0.09455		mg/Kg		95	70 - 130
m-Xylene & p-Xylene	0.200	0.2078		mg/Kg		104	70 - 130
o-Xylene	0.100	0.1102		mg/Kg		110	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	127		70 - 130
1,4-Difluorobenzene (Surr)	112		70 - 130

Lab Sample ID: LCSD 880-17925/2-A

Matrix: Solid

Analysis Batch: 17866

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 17925

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.1157		mg/Kg		116	70 - 130	0	35

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCSD 880-17925/2-A

Matrix: Solid

Analysis Batch: 17866

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 17925

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Toluene	0.100	0.09650		mg/Kg		96	70 - 130	2	35
Ethylbenzene	0.100	0.09352		mg/Kg		94	70 - 130	1	35
m-Xylene & p-Xylene	0.200	0.2054		mg/Kg		103	70 - 130	1	35
o-Xylene	0.100	0.1096		mg/Kg		110	70 - 130	0	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	131	S1+	70 - 130
1,4-Difluorobenzene (Surr)	107		70 - 130

Lab Sample ID: MB 880-18098/5-A

Matrix: Solid

Analysis Batch: 18100

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 18098

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		01/31/22 07:24	01/31/22 10:43	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		01/31/22 07:24	01/31/22 10:43	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		01/31/22 07:24	01/31/22 10:43	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		01/31/22 07:24	01/31/22 10:43	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		01/31/22 07:24	01/31/22 10:43	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		01/31/22 07:24	01/31/22 10:43	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	98		70 - 130	01/31/22 07:24	01/31/22 10:43	1
1,4-Difluorobenzene (Surr)	95		70 - 130	01/31/22 07:24	01/31/22 10:43	1

Lab Sample ID: LCS 880-18098/1-A

Matrix: Solid

Analysis Batch: 18100

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 18098

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.07904		mg/Kg		79	70 - 130
Toluene	0.100	0.07722		mg/Kg		77	70 - 130
Ethylbenzene	0.100	0.07702		mg/Kg		77	70 - 130
m-Xylene & p-Xylene	0.200	0.1584		mg/Kg		79	70 - 130
o-Xylene	0.100	0.07663		mg/Kg		77	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	102		70 - 130
1,4-Difluorobenzene (Surr)	101		70 - 130

Lab Sample ID: LCSD 880-18098/2-A

Matrix: Solid

Analysis Batch: 18100

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 18098

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.08134		mg/Kg		81	70 - 130	3	35
Toluene	0.100	0.07230		mg/Kg		72	70 - 130	7	35
Ethylbenzene	0.100	0.07478		mg/Kg		75	70 - 130	3	35

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCSD 880-18098/2-A

Matrix: Solid

Analysis Batch: 18100

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 18098

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
m-Xylene & p-Xylene	0.200	0.1517		mg/Kg		76	70 - 130	4	35
o-Xylene	0.100	0.07439		mg/Kg		74	70 - 130	3	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	98		70 - 130
1,4-Difluorobenzene (Surr)	99		70 - 130

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 880-18062/1-A

Matrix: Solid

Analysis Batch: 17977

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 18062

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/28/22 14:42	01/28/22 21:35	1
Diesel Range Organics (Over C10-C28)	18.26	J	50.0	15.0	mg/Kg		01/28/22 14:42	01/28/22 21:35	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/28/22 14:42	01/28/22 21:35	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	110		70 - 130	01/28/22 14:42	01/28/22 21:35	1
o-Terphenyl	132	S1+	70 - 130	01/28/22 14:42	01/28/22 21:35	1

Lab Sample ID: LCS 880-18062/2-A

Matrix: Solid

Analysis Batch: 17977

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 18062

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	999.0		mg/Kg		100	70 - 130
Diesel Range Organics (Over C10-C28)	1000	1133		mg/Kg		113	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1-Chlorooctane	121		70 - 130
o-Terphenyl	129		70 - 130

Lab Sample ID: LCSD 880-18062/3-A

Matrix: Solid

Analysis Batch: 17977

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 18062

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	890.9		mg/Kg		89	70 - 130	11	20
Diesel Range Organics (Over C10-C28)	1000	1001		mg/Kg		100	70 - 130	12	20

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

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

Lab Sample ID: LCSD 880-18062/3-A

Matrix: Solid

Analysis Batch: 17977

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 18062

	LCSD	LCSD	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	104		70 - 130
o-Terphenyl	115		70 - 130

Lab Sample ID: MB 880-18131/1-A

Matrix: Solid

Analysis Batch: 18115

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 18131

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	01/31/22 20:34	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	01/31/22 20:34	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		01/31/22 09:54	01/31/22 20:34	1

Surrogate	MB	MB	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	106		70 - 130	01/31/22 09:54	01/31/22 20:34	1
o-Terphenyl	105		70 - 130	01/31/22 09:54	01/31/22 20:34	1

Lab Sample ID: LCS 880-18131/2-A

Matrix: Solid

Analysis Batch: 18115

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 18131

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	1174		mg/Kg		117	70 - 130
Diesel Range Organics (Over C10-C28)	1000	1153		mg/Kg		115	70 - 130

Surrogate	LCS	LCS	Limits
1-Chlorooctane	84		70 - 130
o-Terphenyl	82		70 - 130

Lab Sample ID: LCSD 880-18131/3-A

Matrix: Solid

Analysis Batch: 18115

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 18131

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	Limit
Gasoline Range Organics (GRO)-C6-C10	1000	1058		mg/Kg		106	70 - 130	10	20
Diesel Range Organics (Over C10-C28)	1000	983.1		mg/Kg		98	70 - 130	16	20

Surrogate	LCSD	LCSD	Limits
1-Chlorooctane	82		70 - 130
o-Terphenyl	78		70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-18023/1-A

Matrix: Solid

Analysis Batch: 18093

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			01/30/22 20:28	1

Lab Sample ID: LCS 880-18023/2-A

Matrix: Solid

Analysis Batch: 18093

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	267.9		mg/Kg		107	90 - 110

Lab Sample ID: LCSD 880-18023/3-A

Matrix: Solid

Analysis Batch: 18093

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	250	268.7		mg/Kg		107	90 - 110	0	20

Lab Sample ID: MB 880-18091/1-A

Matrix: Solid

Analysis Batch: 18196

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			01/31/22 15:08	1

Lab Sample ID: LCS 880-18091/2-A

Matrix: Solid

Analysis Batch: 18196

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	265.4		mg/Kg		106	90 - 110

Lab Sample ID: LCSD 880-18091/3-A

Matrix: Solid

Analysis Batch: 18196

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	250	268.7		mg/Kg		107	90 - 110	1	20

Lab Sample ID: MB 880-18269/1-A

Matrix: Solid

Analysis Batch: 18297

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.858	U	5.00	0.858	mg/Kg			02/01/22 15:09	1

Lab Sample ID: LCS 880-18269/2-A

Matrix: Solid

Analysis Batch: 18297

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloride	250	272.3		mg/Kg		109	90 - 110

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: LCSD 880-18269/3-A						Client Sample ID: Lab Control Sample Dup						
Matrix: Solid						Prep Type: Soluble						
Analysis Batch: 18297												
Analyte				Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride				250	271.6		mg/Kg		109	90 - 110	0	20

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

GC VOA

Analysis Batch: 17866

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-1	BH-15A	Total/NA	Solid	8021B	17925
880-10688-2	BH-16A	Total/NA	Solid	8021B	17925
880-10688-4	SW-28 14'-19'	Total/NA	Solid	8021B	17925
880-10688-5	SW-29 14'-19'	Total/NA	Solid	8021B	17925
880-10688-6	SW-30 14'-19'	Total/NA	Solid	8021B	17925
880-10688-7	SW-31 14'-19'	Total/NA	Solid	8021B	17925
880-10688-8	BH-14A	Total/NA	Solid	8021B	17925
880-10688-9	BH-18A	Total/NA	Solid	8021B	17925
880-10688-10	BH-19A	Total/NA	Solid	8021B	17925
MB 880-17873/5-A	Method Blank	Total/NA	Solid	8021B	17873
MB 880-17925/5-A	Method Blank	Total/NA	Solid	8021B	17925
LCS 880-17925/1-A	Lab Control Sample	Total/NA	Solid	8021B	17925
LCSD 880-17925/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	17925

Prep Batch: 17873

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-17873/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 17925

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-1	BH-15A	Total/NA	Solid	5035	
880-10688-2	BH-16A	Total/NA	Solid	5035	
880-10688-4	SW-28 14'-19'	Total/NA	Solid	5035	
880-10688-5	SW-29 14'-19'	Total/NA	Solid	5035	
880-10688-6	SW-30 14'-19'	Total/NA	Solid	5035	
880-10688-7	SW-31 14'-19'	Total/NA	Solid	5035	
880-10688-8	BH-14A	Total/NA	Solid	5035	
880-10688-9	BH-18A	Total/NA	Solid	5035	
880-10688-10	BH-19A	Total/NA	Solid	5035	
MB 880-17925/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-17925/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-17925/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Prep Batch: 18098

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-3	BH-17A	Total/NA	Solid	5035	
MB 880-18098/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-18098/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-18098/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Analysis Batch: 18100

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-3	BH-17A	Total/NA	Solid	8021B	18098
MB 880-18098/5-A	Method Blank	Total/NA	Solid	8021B	18098
LCS 880-18098/1-A	Lab Control Sample	Total/NA	Solid	8021B	18098
LCSD 880-18098/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	18098

Analysis Batch: 18172

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-1	BH-15A	Total/NA	Solid	Total BTEX	
880-10688-2	BH-16A	Total/NA	Solid	Total BTEX	

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

GC VOA (Continued)

Analysis Batch: 18172 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-3	BH-17A	Total/NA	Solid	Total BTEX	

Analysis Batch: 18428

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-4	SW-28 14'-19'	Total/NA	Solid	Total BTEX	
880-10688-5	SW-29 14'-19'	Total/NA	Solid	Total BTEX	
880-10688-6	SW-30 14'-19'	Total/NA	Solid	Total BTEX	
880-10688-7	SW-31 14'-19'	Total/NA	Solid	Total BTEX	
880-10688-8	BH-14A	Total/NA	Solid	Total BTEX	
880-10688-9	BH-18A	Total/NA	Solid	Total BTEX	
880-10688-10	BH-19A	Total/NA	Solid	Total BTEX	

GC Semi VOA

Analysis Batch: 17977

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-1	BH-15A	Total/NA	Solid	8015B NM	18062
880-10688-2	BH-16A	Total/NA	Solid	8015B NM	18062
880-10688-3	BH-17A	Total/NA	Solid	8015B NM	18062
MB 880-18062/1-A	Method Blank	Total/NA	Solid	8015B NM	18062
LCS 880-18062/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	18062
LCSD 880-18062/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	18062

Prep Batch: 18062

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-1	BH-15A	Total/NA	Solid	8015NM Prep	
880-10688-2	BH-16A	Total/NA	Solid	8015NM Prep	
880-10688-3	BH-17A	Total/NA	Solid	8015NM Prep	
MB 880-18062/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-18062/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-18062/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	

Analysis Batch: 18115

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-4	SW-28 14'-19'	Total/NA	Solid	8015B NM	18131
880-10688-5	SW-29 14'-19'	Total/NA	Solid	8015B NM	18131
880-10688-6	SW-30 14'-19'	Total/NA	Solid	8015B NM	18131
880-10688-7	SW-31 14'-19'	Total/NA	Solid	8015B NM	18131
880-10688-8	BH-14A	Total/NA	Solid	8015B NM	18131
880-10688-9	BH-18A	Total/NA	Solid	8015B NM	18131
880-10688-10	BH-19A	Total/NA	Solid	8015B NM	18131
MB 880-18131/1-A	Method Blank	Total/NA	Solid	8015B NM	18131
LCS 880-18131/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	18131
LCSD 880-18131/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	18131

Prep Batch: 18131

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-4	SW-28 14'-19'	Total/NA	Solid	8015NM Prep	
880-10688-5	SW-29 14'-19'	Total/NA	Solid	8015NM Prep	
880-10688-6	SW-30 14'-19'	Total/NA	Solid	8015NM Prep	
880-10688-7	SW-31 14'-19'	Total/NA	Solid	8015NM Prep	

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QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

GC Semi VOA (Continued)

Prep Batch: 18131 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-8	BH-14A	Total/NA	Solid	8015NM Prep	
880-10688-9	BH-18A	Total/NA	Solid	8015NM Prep	
880-10688-10	BH-19A	Total/NA	Solid	8015NM Prep	
MB 880-18131/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-18131/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-18131/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	

Analysis Batch: 18170

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-1	BH-15A	Total/NA	Solid	8015 NM	
880-10688-2	BH-16A	Total/NA	Solid	8015 NM	
880-10688-3	BH-17A	Total/NA	Solid	8015 NM	
880-10688-4	SW-28 14'-19'	Total/NA	Solid	8015 NM	
880-10688-5	SW-29 14'-19'	Total/NA	Solid	8015 NM	
880-10688-6	SW-30 14'-19'	Total/NA	Solid	8015 NM	
880-10688-7	SW-31 14'-19'	Total/NA	Solid	8015 NM	
880-10688-8	BH-14A	Total/NA	Solid	8015 NM	
880-10688-9	BH-18A	Total/NA	Solid	8015 NM	
880-10688-10	BH-19A	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 18023

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-1	BH-15A	Soluble	Solid	DI Leach	
880-10688-2	BH-16A	Soluble	Solid	DI Leach	
880-10688-3	BH-17A	Soluble	Solid	DI Leach	
MB 880-18023/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-18023/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-18023/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Leach Batch: 18091

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-4	SW-28 14'-19'	Soluble	Solid	DI Leach	
880-10688-5	SW-29 14'-19'	Soluble	Solid	DI Leach	
880-10688-6	SW-30 14'-19'	Soluble	Solid	DI Leach	
MB 880-18091/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-18091/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-18091/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Analysis Batch: 18093

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-1	BH-15A	Soluble	Solid	300.0	18023
880-10688-2	BH-16A	Soluble	Solid	300.0	18023
880-10688-3	BH-17A	Soluble	Solid	300.0	18023
MB 880-18023/1-A	Method Blank	Soluble	Solid	300.0	18023
LCS 880-18023/2-A	Lab Control Sample	Soluble	Solid	300.0	18023
LCSD 880-18023/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	18023

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

HPLC/IC

Analysis Batch: 18196

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-4	SW-28 14'-19'	Soluble	Solid	300.0	18091
880-10688-5	SW-29 14'-19'	Soluble	Solid	300.0	18091
880-10688-6	SW-30 14'-19'	Soluble	Solid	300.0	18091
MB 880-18091/1-A	Method Blank	Soluble	Solid	300.0	18091
LCS 880-18091/2-A	Lab Control Sample	Soluble	Solid	300.0	18091
LCSD 880-18091/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	18091

Leach Batch: 18269

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-7	SW-31 14'-19'	Soluble	Solid	DI Leach	
880-10688-8	BH-14A	Soluble	Solid	DI Leach	
880-10688-9	BH-18A	Soluble	Solid	DI Leach	
880-10688-10	BH-19A	Soluble	Solid	DI Leach	
MB 880-18269/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-18269/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-18269/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Analysis Batch: 18297

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-10688-7	SW-31 14'-19'	Soluble	Solid	300.0	18269
880-10688-8	BH-14A	Soluble	Solid	300.0	18269
880-10688-9	BH-18A	Soluble	Solid	300.0	18269
880-10688-10	BH-19A	Soluble	Solid	300.0	18269
MB 880-18269/1-A	Method Blank	Soluble	Solid	300.0	18269
LCS 880-18269/2-A	Lab Control Sample	Soluble	Solid	300.0	18269
LCSD 880-18269/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	18269

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: BH-15A

Lab Sample ID: 880-10688-1

Date Collected: 01/27/22 14:10

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.95 g	5 mL	17925	01/28/22 12:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17866	01/29/22 02:51	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			18172	01/31/22 13:52	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	18062	01/28/22 14:42	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17977	01/29/22 05:46	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	18023	01/28/22 10:13	CH	XEN MID
Soluble	Analysis	300.0		1			18093	01/30/22 21:29	CH	XEN MID

Client Sample ID: BH-16A

Lab Sample ID: 880-10688-2

Date Collected: 01/27/22 14:20

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.00 g	5 mL	17925	01/28/22 12:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17866	01/29/22 03:20	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			18172	01/31/22 13:52	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	18062	01/28/22 14:42	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17977	01/29/22 06:06	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	18023	01/28/22 10:13	CH	XEN MID
Soluble	Analysis	300.0		1			18093	01/30/22 21:36	CH	XEN MID

Client Sample ID: BH-17A

Lab Sample ID: 880-10688-3

Date Collected: 01/27/22 14:30

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	18098	01/31/22 07:24	KL	XEN MID
Total/NA	Analysis	8021B		100	5 mL	5 mL	18100	01/31/22 14:08	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			18172	01/31/22 13:52	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	18062	01/28/22 14:42	DM	XEN MID
Total/NA	Analysis	8015B NM		1			17977	01/29/22 06:27	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	18023	01/28/22 10:13	CH	XEN MID
Soluble	Analysis	300.0		1			18093	01/30/22 21:59	CH	XEN MID

Client Sample ID: SW-28 14'-19'

Lab Sample ID: 880-10688-4

Date Collected: 01/27/22 13:20

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	17925	01/28/22 12:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17866	01/29/22 04:16	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			18428	02/03/22 13:55	KL	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: SW-28 14'-19'

Lab Sample ID: 880-10688-4

Date Collected: 01/27/22 13:20

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	18131	01/31/22 09:54	DM	XEN MID
Total/NA	Analysis	8015B NM		1			18115	02/01/22 00:47	AJ	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	18091	01/29/22 10:41	CH	XEN MID
Soluble	Analysis	300.0		1			18196	01/31/22 16:13	CH	XEN MID

Client Sample ID: SW-29 14'-19'

Lab Sample ID: 880-10688-5

Date Collected: 01/27/22 13:30

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	17925	01/28/22 12:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17866	01/29/22 04:45	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			18428	02/03/22 13:55	KL	XEN MID
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	18131	01/31/22 09:54	DM	XEN MID
Total/NA	Analysis	8015B NM		1			18115	02/01/22 01:08	AJ	XEN MID
Soluble	Leach	DI Leach			5.04 g	50 mL	18091	01/29/22 10:41	CH	XEN MID
Soluble	Analysis	300.0		1			18196	01/31/22 16:21	CH	XEN MID

Client Sample ID: SW-30 14'-19'

Lab Sample ID: 880-10688-6

Date Collected: 01/27/22 13:40

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	17925	01/28/22 12:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17866	01/29/22 05:13	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			18428	02/03/22 13:55	KL	XEN MID
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	18131	01/31/22 09:54	DM	XEN MID
Total/NA	Analysis	8015B NM		1			18115	02/01/22 01:29	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	18091	01/29/22 10:41	CH	XEN MID
Soluble	Analysis	300.0		1			18196	01/31/22 16:28	CH	XEN MID

Client Sample ID: SW-31 14'-19'

Lab Sample ID: 880-10688-7

Date Collected: 01/27/22 13:50

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.00 g	5 mL	17925	01/28/22 12:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17866	01/29/22 05:40	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			18428	02/03/22 13:55	KL	XEN MID
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	18131	01/31/22 09:54	DM	XEN MID
Total/NA	Analysis	8015B NM		1			18115	02/01/22 02:10	AJ	XEN MID

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Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Client Sample ID: SW-31 14'-19'

Lab Sample ID: 880-10688-7

Date Collected: 01/27/22 13:50

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			5.05 g	50 mL	18269	02/01/22 14:22	SC	XEN MID
Soluble	Analysis	300.0		1	0 mL	1.0 mL	18297	02/01/22 16:48	SC	XEN MID

Client Sample ID: BH-14A

Lab Sample ID: 880-10688-8

Date Collected: 01/27/22 14:00

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	17925	01/28/22 12:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17866	01/29/22 06:07	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			18428	02/03/22 13:55	KL	XEN MID
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	18131	01/31/22 09:54	DM	XEN MID
Total/NA	Analysis	8015B NM		1			18115	02/01/22 02:30	AJ	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	18269	02/01/22 14:22	SC	XEN MID
Soluble	Analysis	300.0		1	0 mL	1.0 mL	18297	02/01/22 16:55	SC	XEN MID

Client Sample ID: BH-18A

Lab Sample ID: 880-10688-9

Date Collected: 01/27/22 14:40

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.95 g	5 mL	17925	01/28/22 12:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17866	01/29/22 06:34	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			18428	02/03/22 13:55	KL	XEN MID
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	18131	01/31/22 09:54	DM	XEN MID
Total/NA	Analysis	8015B NM		1			18115	02/01/22 02:50	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	18269	02/01/22 14:22	SC	XEN MID
Soluble	Analysis	300.0		1	0 mL	1.0 mL	18297	02/01/22 17:03	SC	XEN MID

Client Sample ID: BH-19A

Lab Sample ID: 880-10688-10

Date Collected: 01/27/22 14:50

Matrix: Solid

Date Received: 01/28/22 07:29

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	17925	01/28/22 12:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	17866	01/29/22 07:01	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			18428	02/03/22 13:55	KL	XEN MID
Total/NA	Analysis	8015 NM		1			18170	01/31/22 13:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	18131	01/31/22 09:54	DM	XEN MID
Total/NA	Analysis	8015B NM		1			18115	02/01/22 03:11	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	18269	02/01/22 14:22	SC	XEN MID
Soluble	Analysis	300.0		1	0 mL	1.0 mL	18297	02/01/22 17:13	SC	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Laboratory References:
XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

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Accreditation/Certification Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Laboratory: Eurofins Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Program	Identification Number	Expiration Date
Texas	NELAP	T104704400-21-22	06-30-22
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
8015 NM		Solid	Total TPH
Total BTEX		Solid	Total BTEX

Method Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

Protocol References:

ASTM = ASTM International

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

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

TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

Laboratory References:

XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Midland

Sample Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-10688-1
SDG: Eddy County, NM

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
880-10688-1	BH-15A	Solid	01/27/22 14:10	01/28/22 07:29
880-10688-2	BH-16A	Solid	01/27/22 14:20	01/28/22 07:29
880-10688-3	BH-17A	Solid	01/27/22 14:30	01/28/22 07:29
880-10688-4	SW-28 14'-19'	Solid	01/27/22 13:20	01/28/22 07:29
880-10688-5	SW-29 14'-19'	Solid	01/27/22 13:30	01/28/22 07:29
880-10688-6	SW-30 14'-19'	Solid	01/27/22 13:40	01/28/22 07:29
880-10688-7	SW-31 14'-19'	Solid	01/27/22 13:50	01/28/22 07:29
880-10688-8	BH-14A	Solid	01/27/22 14:00	01/28/22 07:29
880-10688-9	BH-18A	Solid	01/27/22 14:40	01/28/22 07:29
880-10688-10	BH-19A	Solid	01/27/22 14:50	01/28/22 07:29

Genco Laboratories

The Environmental Lab of Texas



880-10688 Chain of Custody

CHAIN OF CUSTODY RECORD AND ANALYSIS REQUEST

12600 West I-20 East
Odessa, Texas 79765

Phone: 432-563-1800
Fax: 432-563-1713

106088

Project Manager Becky Haskell @ GHD.COM

Company Name GHD

Company Address 2135 Loop 250 W.

City/State/Zip Midland, TX 79703

Telephone No (432) 686-0086

Sampler Signature [Signature]

Fax No _____

e-mail "Becky", Allgroves@GHD.COM

Project Name Shaping Pumps

Project # 12565619

Project Loc Eddy County, NM

PO #: _____

Report Format ☐ Standard ☐ TRRP ☐ NPDES

ORD# R#		Beginning Depth	Ending Depth	Date Sampled	Time Sampled	Field Filtered	Total # of Containers	Preservation & # of Containers							Matrix	Analyze For				RUSH TAT (Pre-Schedule) 24, 48, 72 hrs	Standard TAT										
								Ice	HNO ₃	HCl	H ₂ SO ₄	NaOH	Na ₂ S ₂ O ₃	None	Other (Specify)	DW=Drinking Water SL=Sludge GW=Groundwater S=Soil/Solid NP=Non-Potable Specify Other	TPH 418 1 8015M 8015E	TPH TX 1005 TX 1006	Cations (Ca Mg Na K)	Anions (Cl SO ₄ Alkalinity)	SAR / ESP / CEC	Metals As Ag Ba Cd Cr Pb Hg Se	Volatiles	Semivolatiles	BTEX 8021B, 5030 or BTEX 8260	RCI	NORM	Chloride 300			
	BH-15A			1/27/22	140		1																								
	BH-16A				1420		1																								
	BH-17A				1430		1																								
	SW-28-14'-19'				1320		1																								
	SW-29-14'-19'				1330		1																								
	SW-30-14'-19'				1340		1																								
	SW-31-14'-19'				1350		1																								
	BH-14A				1400		1																								
	BH-18A				1440		1																								
	BH-19A				1450		1																								

Laboratory Comments

Sample Containers Intact? ☒ Y

VOCs Free of Headspace? ☒ Y

Labels on container(s) ☒ Y

Custody seals on container(s) ☒ Y

Sample Hand Delivered by Sampler/Client Rep? ☒ Y

by Courier? ☒ Y

UPS ☒ Y

DHL ☒ Y

As Read ☒ Y

Corrected ☒ Y

Temperature Upon Receipt 32 °C

Lone Star ☒ Y

Login Sample Receipt Checklist

Client: GHD Services Inc.

Job Number: 880-10688-1
SDG Number: Eddy County, NM**Login Number: 10688****List Number: 1****Creator: Teel, Brianna****List Source: Eurofins Midland**

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
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	
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.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	



Environment Testing America

ANALYTICAL REPORT

Eurofins Midland
1211 W. Florida Ave
Midland, TX 79701
Tel: (432)704-5440

Laboratory Job ID: 880-11158-1

Laboratory Sample Delivery Group: Eddy County, NM
Client Project/Site: Snapping Pumps

For:

GHD Services Inc.
2135 South Loop 250 West
Midland, Texas 79703

Attn: Becky Haskell

A handwritten signature in black ink that reads "Debbie Simmons".

Authorized for release by:
2/22/2022 2:28:42 PM

Debbie Simmons, Project Manager
(832)986-6768
debbie.simmons@eurofinset.com

LINKS

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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.

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Laboratory Job ID: 880-11158-1
SDG: Eddy County, NM

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Definitions/Glossary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Qualifiers

GC VOA

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.

GC Semi VOA

Qualifier	Qualifier Description
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
S1-	Surrogate recovery exceeds control limits, low biased.
U	Indicates the analyte was analyzed for but not detected.

HPLC/IC

Qualifier	Qualifier Description
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.
⌘	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)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

Eurofins Midland

Case Narrative

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Job ID: 880-11158-1

Laboratory: Eurofins Midland

Narrative

Job Narrative 880-11158-1

Receipt

The samples were received on 2/10/2022 11:55 AM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 3.3°C

GC VOA

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

GC Semi VOA

Method 8015MOD_NM: Surrogate recovery for the following samples were outside control limits: SP-1 (880-11158-2), SP-3 (880-11158-4), (MB 880-19122/1-A), (MB 880-19128/1-A), (880-11151-A-1-G), (880-11151-A-1-H MS), (880-11151-A-1-I MSD), (880-11191-A-1-A), (880-11191-A-1-B MS) and (880-11191-A-1-C MSD). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

HPLC/IC

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Client Sample ID: TP1-26

Lab Sample ID: 880-11158-1

Date Collected: 02/09/22 08:50

Matrix: Solid

Date Received: 02/10/22 11:55

Sample Depth: 26"

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.0769	J	0.202	0.0388	mg/Kg	-	02/18/22 08:00	02/19/22 03:51	100
Toluene	5.46		0.202	0.0460	mg/Kg	-	02/18/22 08:00	02/19/22 03:51	100
Ethylbenzene	2.52		0.202	0.0570	mg/Kg	-	02/18/22 08:00	02/19/22 03:51	100
m-Xylene & p-Xylene	24.2		0.403	0.102	mg/Kg	-	02/18/22 08:00	02/19/22 03:51	100
o-Xylene	6.49		0.202	0.0347	mg/Kg	-	02/18/22 08:00	02/19/22 03:51	100
Xylenes, Total	30.7		0.403	0.102	mg/Kg	-	02/18/22 08:00	02/19/22 03:51	100

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	99		70 - 130	02/18/22 08:00	02/19/22 03:51	100
1,4-Difluorobenzene (Surr)	85		70 - 130	02/18/22 08:00	02/19/22 03:51	100

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	38.7		0.403	0.102	mg/Kg	-		02/15/22 20:33	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	3830		50.0	15.0	mg/Kg	-		02/17/22 15:56	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	1480		50.0	15.0	mg/Kg	-	02/11/22 11:24	02/13/22 02:09	1
Diesel Range Organics (Over C10-C28)	2350	B	50.0	15.0	mg/Kg	-	02/11/22 11:24	02/13/22 02:09	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg	-	02/11/22 11:24	02/13/22 02:09	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	79		70 - 130	02/11/22 11:24	02/13/22 02:09	1
o-Terphenyl	71		70 - 130	02/11/22 11:24	02/13/22 02:09	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	64.8		5.01	0.860	mg/Kg	-		02/16/22 02:44	1

Client Sample ID: SP-1

Lab Sample ID: 880-11158-2

Date Collected: 02/09/22 09:30

Matrix: Solid

Date Received: 02/10/22 11:55

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00578		0.00200	0.000384	mg/Kg	-	02/11/22 16:00	02/12/22 11:53	1
Toluene	0.125		0.00200	0.000455	mg/Kg	-	02/11/22 16:00	02/12/22 11:53	1
Ethylbenzene	0.0245		0.00200	0.000564	mg/Kg	-	02/11/22 16:00	02/12/22 11:53	1
m-Xylene & p-Xylene	0.308		0.00399	0.00101	mg/Kg	-	02/11/22 16:00	02/12/22 11:53	1
o-Xylene	0.0970		0.00200	0.000343	mg/Kg	-	02/11/22 16:00	02/12/22 11:53	1
Xylenes, Total	0.405		0.00399	0.00101	mg/Kg	-	02/11/22 16:00	02/12/22 11:53	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	107		70 - 130	02/11/22 16:00	02/12/22 11:53	1
1,4-Difluorobenzene (Surr)	118		70 - 130	02/11/22 16:00	02/12/22 11:53	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Client Sample ID: SP-1

Lab Sample ID: 880-11158-2

Date Collected: 02/09/22 09:30

Matrix: Solid

Date Received: 02/10/22 11:55

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.559		0.00399	0.00101	mg/Kg			02/14/22 09:43	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	1710		50.0	15.0	mg/Kg			02/17/22 15:56	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	27.0	J	50.0	15.0	mg/Kg		02/11/22 11:24	02/13/22 02:29	1
Diesel Range Organics (Over C10-C28)	1680	B	50.0	15.0	mg/Kg		02/11/22 11:24	02/13/22 02:29	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		02/11/22 11:24	02/13/22 02:29	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	67	S1-	70 - 130				02/11/22 11:24	02/13/22 02:29	1
o-Terphenyl	77		70 - 130				02/11/22 11:24	02/13/22 02:29	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.7		4.98	0.855	mg/Kg			02/16/22 02:50	1

Client Sample ID: SP-2

Lab Sample ID: 880-11158-3

Date Collected: 02/09/22 09:35

Matrix: Solid

Date Received: 02/10/22 11:55

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000476	J	0.00200	0.000386	mg/Kg		02/11/22 16:00	02/12/22 12:14	1
Toluene	0.0209		0.00200	0.000457	mg/Kg		02/11/22 16:00	02/12/22 12:14	1
Ethylbenzene	0.00195	J	0.00200	0.000566	mg/Kg		02/11/22 16:00	02/12/22 12:14	1
m-Xylene & p-Xylene	0.0375		0.00401	0.00101	mg/Kg		02/11/22 16:00	02/12/22 12:14	1
o-Xylene	0.0131		0.00200	0.000345	mg/Kg		02/11/22 16:00	02/12/22 12:14	1
Xylenes, Total	0.0506		0.00401	0.00101	mg/Kg		02/11/22 16:00	02/12/22 12:14	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	121		70 - 130				02/11/22 16:00	02/12/22 12:14	1
1,4-Difluorobenzene (Surr)	104		70 - 130				02/11/22 16:00	02/12/22 12:14	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.0736		0.00401	0.00101	mg/Kg			02/14/22 09:43	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	112		50.0	15.0	mg/Kg			02/17/22 15:56	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	29.4	J	50.0	15.0	mg/Kg		02/11/22 11:24	02/13/22 02:49	1
Diesel Range Organics (Over C10-C28)	82.2	B	50.0	15.0	mg/Kg		02/11/22 11:24	02/13/22 02:49	1

Eurofins Midland

Client Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Client Sample ID: SP-2

Lab Sample ID: 880-11158-3

Date Collected: 02/09/22 09:35

Matrix: Solid

Date Received: 02/10/22 11:55

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg	-	02/11/22 11:24	02/13/22 02:49	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	70		70 - 130				02/11/22 11:24	02/13/22 02:49	1
o-Terphenyl	80		70 - 130				02/11/22 11:24	02/13/22 02:49	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	17.9		5.04	0.865	mg/Kg	-		02/16/22 02:57	1

Client Sample ID: SP-3

Lab Sample ID: 880-11158-4

Date Collected: 02/09/22 09:40

Matrix: Solid

Date Received: 02/10/22 11:55

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000381	U	0.00198	0.000381	mg/Kg	-	02/11/22 16:00	02/12/22 12:34	1
Toluene	0.00623		0.00198	0.000451	mg/Kg	-	02/11/22 16:00	02/12/22 12:34	1
Ethylbenzene	0.000995	J	0.00198	0.000559	mg/Kg	-	02/11/22 16:00	02/12/22 12:34	1
m-Xylene & p-Xylene	0.0128		0.00396	0.00100	mg/Kg	-	02/11/22 16:00	02/12/22 12:34	1
o-Xylene	0.00337		0.00198	0.000341	mg/Kg	-	02/11/22 16:00	02/12/22 12:34	1
Xylenes, Total	0.0162		0.00396	0.00100	mg/Kg	-	02/11/22 16:00	02/12/22 12:34	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	107		70 - 130				02/11/22 16:00	02/12/22 12:34	1
1,4-Difluorobenzene (Surr)	109		70 - 130				02/11/22 16:00	02/12/22 12:34	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.0233		0.00396	0.00100	mg/Kg	-		02/14/22 09:43	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	17.6	J	49.9	15.0	mg/Kg	-		02/17/22 15:56	1

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	17.6	J	49.9	15.0	mg/Kg	-	02/11/22 10:14	02/12/22 17:37	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg	-	02/11/22 10:14	02/12/22 17:37	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg	-	02/11/22 10:14	02/12/22 17:37	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	63	S1-	70 - 130				02/11/22 10:14	02/12/22 17:37	1
o-Terphenyl	74		70 - 130				02/11/22 10:14	02/12/22 17:37	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	28.9		4.99	0.857	mg/Kg	-		02/16/22 03:03	1

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Surrogate Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	BFB1 (70-130)	DFBZ1 (70-130)
880-11158-1	TP1-26	99	85
880-11158-2	SP-1	107	118
880-11158-3	SP-2	121	104
880-11158-4	SP-3	107	109
LCS 880-19036/1-A	Lab Control Sample	93	106
LCS 880-19233/1-A	Lab Control Sample	94	105
LCS 880-19658/1-A	Lab Control Sample	117	95
LCS 880-19696/1-A	Lab Control Sample	112	99
LCS 880-19707/1-A	Lab Control Sample	108	98
LCSD 880-19036/2-A	Lab Control Sample Dup	97	88
LCSD 880-19233/2-A	Lab Control Sample Dup	98	103
LCSD 880-19658/2-A	Lab Control Sample Dup	121	106
LCSD 880-19696/2-A	Lab Control Sample Dup	113	91
LCSD 880-19707/2-A	Lab Control Sample Dup	109	96
MB 880-19035/5-A	Method Blank	89	100
MB 880-19036/5-A	Method Blank	104	104
MB 880-19233/5-A	Method Blank	105	101
MB 880-19658/5-A	Method Blank	128	97
MB 880-19696/5-A	Method Blank	116	89
MB 880-19707/5-A	Method Blank	119	98

Surrogate Legend

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)	
Lab Sample ID	Client Sample ID	1CO1 (70-130)	OTPH1 (70-130)
880-11158-1	TP1-26	79	71
880-11158-2	SP-1	67 S1-	77
880-11158-3	SP-2	70	80
880-11158-4	SP-3	63 S1-	74
LCS 880-19122/2-A	Lab Control Sample	90	95
LCS 880-19128/2-A	Lab Control Sample	99	107
LCSD 880-19122/3-A	Lab Control Sample Dup	94	100
LCSD 880-19128/3-A	Lab Control Sample Dup	94	100
MB 880-19122/1-A	Method Blank	65 S1-	81
MB 880-19128/1-A	Method Blank	63 S1-	75

Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-19035/5-A

Matrix: Solid

Analysis Batch: 19116

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 19035

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		02/11/22 11:13	02/11/22 22:14	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		02/11/22 11:13	02/11/22 22:14	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		02/11/22 11:13	02/11/22 22:14	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		02/11/22 11:13	02/11/22 22:14	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		02/11/22 11:13	02/11/22 22:14	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		02/11/22 11:13	02/11/22 22:14	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	89		70 - 130	02/11/22 11:13	02/11/22 22:14	1
1,4-Difluorobenzene (Surr)	100		70 - 130	02/11/22 11:13	02/11/22 22:14	1

Lab Sample ID: MB 880-19036/5-A

Matrix: Solid

Analysis Batch: 19116

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 19036

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		02/11/22 16:00	02/12/22 09:09	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		02/11/22 16:00	02/12/22 09:09	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		02/11/22 16:00	02/12/22 09:09	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		02/11/22 16:00	02/12/22 09:09	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		02/11/22 16:00	02/12/22 09:09	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		02/11/22 16:00	02/12/22 09:09	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	104		70 - 130	02/11/22 16:00	02/12/22 09:09	1
1,4-Difluorobenzene (Surr)	104		70 - 130	02/11/22 16:00	02/12/22 09:09	1

Lab Sample ID: LCS 880-19036/1-A

Matrix: Solid

Analysis Batch: 19116

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 19036

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.09249		mg/Kg		92	70 - 130
Toluene	0.100	0.09207		mg/Kg		92	70 - 130
Ethylbenzene	0.100	0.09926		mg/Kg		99	70 - 130
m-Xylene & p-Xylene	0.200	0.1837		mg/Kg		92	70 - 130
o-Xylene	0.100	0.09006		mg/Kg		90	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	93		70 - 130
1,4-Difluorobenzene (Surr)	106		70 - 130

Lab Sample ID: LCSD 880-19036/2-A

Matrix: Solid

Analysis Batch: 19116

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 19036

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.08701		mg/Kg		87	70 - 130	6	35

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCSD 880-19036/2-A

Matrix: Solid

Analysis Batch: 19116

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 19036

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Toluene	0.100	0.08975		mg/Kg		90	70 - 130	3	35
Ethylbenzene	0.100	0.09948		mg/Kg		99	70 - 130	0	35
m-Xylene & p-Xylene	0.200	0.1868		mg/Kg		93	70 - 130	2	35
o-Xylene	0.100	0.09313		mg/Kg		93	70 - 130	3	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	97		70 - 130
1,4-Difluorobenzene (Surr)	88		70 - 130

Lab Sample ID: MB 880-19233/5-A

Matrix: Solid

Analysis Batch: 19287

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 19233

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		02/14/22 07:30	02/14/22 10:45	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		02/14/22 07:30	02/14/22 10:45	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		02/14/22 07:30	02/14/22 10:45	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		02/14/22 07:30	02/14/22 10:45	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		02/14/22 07:30	02/14/22 10:45	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		02/14/22 07:30	02/14/22 10:45	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	105		70 - 130	02/14/22 07:30	02/14/22 10:45	1
1,4-Difluorobenzene (Surr)	101		70 - 130	02/14/22 07:30	02/14/22 10:45	1

Lab Sample ID: LCS 880-19233/1-A

Matrix: Solid

Analysis Batch: 19287

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 19233

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.08139		mg/Kg		81	70 - 130
Toluene	0.100	0.08280		mg/Kg		83	70 - 130
Ethylbenzene	0.100	0.08810		mg/Kg		88	70 - 130
m-Xylene & p-Xylene	0.200	0.1790		mg/Kg		90	70 - 130
o-Xylene	0.100	0.09153		mg/Kg		92	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	94		70 - 130
1,4-Difluorobenzene (Surr)	105		70 - 130

Lab Sample ID: LCSD 880-19233/2-A

Matrix: Solid

Analysis Batch: 19287

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 19233

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.08548		mg/Kg		85	70 - 130	5	35
Toluene	0.100	0.08704		mg/Kg		87	70 - 130	5	35
Ethylbenzene	0.100	0.09599		mg/Kg		96	70 - 130	9	35

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCSD 880-19233/2-A

Matrix: Solid

Analysis Batch: 19287

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 19233

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
m-Xylene & p-Xylene	0.200	0.1918		mg/Kg		96	70 - 130	7	35
o-Xylene	0.100	0.09502		mg/Kg		95	70 - 130	4	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	98		70 - 130
1,4-Difluorobenzene (Surr)	103		70 - 130

Lab Sample ID: MB 880-19658/5-A

Matrix: Solid

Analysis Batch: 19659

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 19658

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		02/17/22 08:20	02/17/22 11:45	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		02/17/22 08:20	02/17/22 11:45	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		02/17/22 08:20	02/17/22 11:45	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		02/17/22 08:20	02/17/22 11:45	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		02/17/22 08:20	02/17/22 11:45	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		02/17/22 08:20	02/17/22 11:45	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	128		70 - 130	02/17/22 08:20	02/17/22 11:45	1
1,4-Difluorobenzene (Surr)	97		70 - 130	02/17/22 08:20	02/17/22 11:45	1

Lab Sample ID: LCS 880-19658/1-A

Matrix: Solid

Analysis Batch: 19659

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 19658

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.08334		mg/Kg		83	70 - 130
Toluene	0.100	0.08855		mg/Kg		89	70 - 130
Ethylbenzene	0.100	0.1017		mg/Kg		102	70 - 130
m-Xylene & p-Xylene	0.200	0.1866		mg/Kg		93	70 - 130
o-Xylene	0.100	0.09302		mg/Kg		93	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	117		70 - 130
1,4-Difluorobenzene (Surr)	95		70 - 130

Lab Sample ID: LCSD 880-19658/2-A

Matrix: Solid

Analysis Batch: 19659

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 19658

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.08866		mg/Kg		89	70 - 130	6	35
Toluene	0.100	0.09804		mg/Kg		98	70 - 130	10	35
Ethylbenzene	0.100	0.1063		mg/Kg		106	70 - 130	4	35
m-Xylene & p-Xylene	0.200	0.2051		mg/Kg		103	70 - 130	9	35
o-Xylene	0.100	0.09797		mg/Kg		98	70 - 130	5	35

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	121		70 - 130
1,4-Difluorobenzene (Surr)	106		70 - 130

Lab Sample ID: MB 880-19696/5-A

Matrix: Solid

Analysis Batch: 19783

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 19696

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		02/18/22 07:00	02/18/22 12:41	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		02/18/22 07:00	02/18/22 12:41	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		02/18/22 07:00	02/18/22 12:41	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		02/18/22 07:00	02/18/22 12:41	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		02/18/22 07:00	02/18/22 12:41	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		02/18/22 07:00	02/18/22 12:41	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	116		70 - 130	02/18/22 07:00	02/18/22 12:41	1
1,4-Difluorobenzene (Surr)	89		70 - 130	02/18/22 07:00	02/18/22 12:41	1

Lab Sample ID: LCS 880-19696/1-A

Matrix: Solid

Analysis Batch: 19783

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 19696

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.09002		mg/Kg		90	70 - 130
Toluene	0.100	0.09048		mg/Kg		90	70 - 130
Ethylbenzene	0.100	0.1034		mg/Kg		103	70 - 130
m-Xylene & p-Xylene	0.200	0.1884		mg/Kg		94	70 - 130
o-Xylene	0.100	0.09890		mg/Kg		99	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	112		70 - 130
1,4-Difluorobenzene (Surr)	99		70 - 130

Lab Sample ID: LCSD 880-19696/2-A

Matrix: Solid

Analysis Batch: 19783

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 19696

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.08948		mg/Kg		89	70 - 130	1	35
Toluene	0.100	0.09333		mg/Kg		93	70 - 130	3	35
Ethylbenzene	0.100	0.1044		mg/Kg		104	70 - 130	1	35
m-Xylene & p-Xylene	0.200	0.1926		mg/Kg		96	70 - 130	2	35
o-Xylene	0.100	0.09354		mg/Kg		94	70 - 130	6	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	113		70 - 130
1,4-Difluorobenzene (Surr)	91		70 - 130

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QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: MB 880-19707/5-A

Matrix: Solid

Analysis Batch: 19783

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 19707

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		02/18/22 08:00	02/19/22 00:17	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		02/18/22 08:00	02/19/22 00:17	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		02/18/22 08:00	02/19/22 00:17	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		02/18/22 08:00	02/19/22 00:17	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		02/18/22 08:00	02/19/22 00:17	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		02/18/22 08:00	02/19/22 00:17	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	119		70 - 130	02/18/22 08:00	02/19/22 00:17	1
1,4-Difluorobenzene (Surr)	98		70 - 130	02/18/22 08:00	02/19/22 00:17	1

Lab Sample ID: LCS 880-19707/1-A

Matrix: Solid

Analysis Batch: 19783

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 19707

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	0.100	0.08860		mg/Kg		89	70 - 130
Toluene	0.100	0.1018		mg/Kg		102	70 - 130
Ethylbenzene	0.100	0.09205		mg/Kg		92	70 - 130
m-Xylene & p-Xylene	0.200	0.1862		mg/Kg		93	70 - 130
o-Xylene	0.100	0.08996		mg/Kg		90	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	108		70 - 130
1,4-Difluorobenzene (Surr)	98		70 - 130

Lab Sample ID: LCSD 880-19707/2-A

Matrix: Solid

Analysis Batch: 19783

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 19707

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	0.100	0.08442		mg/Kg		84	70 - 130	5	35
Toluene	0.100	0.09326		mg/Kg		93	70 - 130	9	35
Ethylbenzene	0.100	0.09408		mg/Kg		94	70 - 130	2	35
m-Xylene & p-Xylene	0.200	0.1842		mg/Kg		92	70 - 130	1	35
o-Xylene	0.100	0.08941		mg/Kg		89	70 - 130	1	35

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	109		70 - 130
1,4-Difluorobenzene (Surr)	96		70 - 130

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 880-19122/1-A

Matrix: Solid

Analysis Batch: 19227

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 19122

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		02/11/22 10:14	02/12/22 10:33	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		02/11/22 10:14	02/12/22 10:33	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		02/11/22 10:14	02/12/22 10:33	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
1-Chlorooctane	65	S1-	70 - 130				02/11/22 10:14	02/12/22 10:33	1
o-Terphenyl	81		70 - 130				02/11/22 10:14	02/12/22 10:33	1

Lab Sample ID: LCS 880-19122/2-A

Matrix: Solid

Analysis Batch: 19227

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 19122

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	849.9		mg/Kg		85	70 - 130
Diesel Range Organics (Over C10-C28)	1000	872.9		mg/Kg		87	70 - 130
Surrogate	LCS %Recovery	LCS Qualifier	Limits				
1-Chlorooctane	90		70 - 130				
o-Terphenyl	95		70 - 130				

Lab Sample ID: LCSD 880-19122/3-A

Matrix: Solid

Analysis Batch: 19227

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 19122

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	927.2		mg/Kg		93	70 - 130	9	20
Diesel Range Organics (Over C10-C28)	1000	956.0		mg/Kg		96	70 - 130	9	20
Surrogate	LCSD %Recovery	LCSD Qualifier	Limits						
1-Chlorooctane	94		70 - 130						
o-Terphenyl	100		70 - 130						

Lab Sample ID: MB 880-19128/1-A

Matrix: Solid

Analysis Batch: 19227

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 19128

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<15.0	U	50.0	15.0	mg/Kg		02/11/22 11:24	02/12/22 20:10	1
Diesel Range Organics (Over C10-C28)	15.23	J	50.0	15.0	mg/Kg		02/11/22 11:24	02/12/22 20:10	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		02/11/22 11:24	02/12/22 20:10	1

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

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

Lab Sample ID: MB 880-19128/1-A

Matrix: Solid

Analysis Batch: 19227

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 19128

	MB	MB							
Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac			
1-Chlorooctane	63	S1-	70 - 130	02/11/22 11:24	02/12/22 20:10	1			
o-Terphenyl	75		70 - 130	02/11/22 11:24	02/12/22 20:10	1			

Lab Sample ID: LCS 880-19128/2-A

Matrix: Solid

Analysis Batch: 19227

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 19128

Analyte		Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Gasoline Range Organics (GRO)-C6-C10		1000	917.8		mg/Kg		92	70 - 130		
Diesel Range Organics (Over C10-C28)		1000	989.6		mg/Kg		99	70 - 130		

Surrogate	LCS	LCS							
	%Recovery	Qualifier	Limits						
1-Chlorooctane	99		70 - 130						
o-Terphenyl	107		70 - 130						

Lab Sample ID: LCSD 880-19128/3-A

Matrix: Solid

Analysis Batch: 19227

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 19128

Analyte		Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10		1000	809.7		mg/Kg		81	70 - 130	13	20
Diesel Range Organics (Over C10-C28)		1000	863.2		mg/Kg		86	70 - 130	14	20

Surrogate	LCSD	LCSD								
	%Recovery	Qualifier	Limits							
1-Chlorooctane	94		70 - 130							
o-Terphenyl	100		70 - 130							

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-19069/1-A

Matrix: Solid

Analysis Batch: 19488

Client Sample ID: Method Blank

Prep Type: Soluble

Analyte	MB	MB								
	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac	
Chloride	<0.858	U	5.00	0.858	mg/Kg			02/16/22 02:07	1	

Lab Sample ID: LCS 880-19069/2-A

Matrix: Solid

Analysis Batch: 19488

Client Sample ID: Lab Control Sample

Prep Type: Soluble

Analyte		Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride		250	260.0		mg/Kg		104	90 - 110		

Eurofins Midland

QC Sample Results

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: LCSD 880-19069/3-A

Matrix: Solid

Analysis Batch: 19488

Client Sample ID: Lab Control Sample Dup

Prep Type: Soluble

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	250	240.1		mg/Kg		96	90 - 110	8	20

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

GC VOA

Prep Batch: 19035

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-19035/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 19036

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-2	SP-1	Total/NA	Solid	5035	
880-11158-3	SP-2	Total/NA	Solid	5035	
880-11158-4	SP-3	Total/NA	Solid	5035	
MB 880-19036/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-19036/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-19036/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Analysis Batch: 19116

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-2	SP-1	Total/NA	Solid	8021B	19036
880-11158-3	SP-2	Total/NA	Solid	8021B	19036
880-11158-4	SP-3	Total/NA	Solid	8021B	19036
MB 880-19035/5-A	Method Blank	Total/NA	Solid	8021B	19035
MB 880-19036/5-A	Method Blank	Total/NA	Solid	8021B	19036
LCS 880-19036/1-A	Lab Control Sample	Total/NA	Solid	8021B	19036
LCSD 880-19036/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	19036

Prep Batch: 19233

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-19233/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-19233/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-19233/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Analysis Batch: 19287

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-19233/5-A	Method Blank	Total/NA	Solid	8021B	19233
LCS 880-19233/1-A	Lab Control Sample	Total/NA	Solid	8021B	19233
LCSD 880-19233/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	19233

Analysis Batch: 19350

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-2	SP-1	Total/NA	Solid	Total BTEX	
880-11158-3	SP-2	Total/NA	Solid	Total BTEX	
880-11158-4	SP-3	Total/NA	Solid	Total BTEX	

Analysis Batch: 19539

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-1	TP1-26	Total/NA	Solid	Total BTEX	

Prep Batch: 19658

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-19658/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-19658/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-19658/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

GC VOA

Analysis Batch: 19659

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-19658/5-A	Method Blank	Total/NA	Solid	8021B	19658
LCS 880-19658/1-A	Lab Control Sample	Total/NA	Solid	8021B	19658
LCSD 880-19658/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	19658

Prep Batch: 19696

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-19696/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-19696/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-19696/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Prep Batch: 19707

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-1	TP1-26	Total/NA	Solid	5035	
MB 880-19707/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-19707/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-19707/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Analysis Batch: 19783

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-1	TP1-26	Total/NA	Solid	8021B	19707
MB 880-19696/5-A	Method Blank	Total/NA	Solid	8021B	19696
MB 880-19707/5-A	Method Blank	Total/NA	Solid	8021B	19707
LCS 880-19696/1-A	Lab Control Sample	Total/NA	Solid	8021B	19696
LCS 880-19707/1-A	Lab Control Sample	Total/NA	Solid	8021B	19707
LCSD 880-19696/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	19696
LCSD 880-19707/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	19707

GC Semi VOA

Prep Batch: 19122

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-4	SP-3	Total/NA	Solid	8015NM Prep	
MB 880-19122/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-19122/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-19122/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	

Prep Batch: 19128

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-1	TP1-26	Total/NA	Solid	8015NM Prep	
880-11158-2	SP-1	Total/NA	Solid	8015NM Prep	
880-11158-3	SP-2	Total/NA	Solid	8015NM Prep	
MB 880-19128/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-19128/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-19128/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	

Analysis Batch: 19227

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-1	TP1-26	Total/NA	Solid	8015B NM	19128
880-11158-2	SP-1	Total/NA	Solid	8015B NM	19128
880-11158-3	SP-2	Total/NA	Solid	8015B NM	19128
880-11158-4	SP-3	Total/NA	Solid	8015B NM	19122

Eurofins Midland

QC Association Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

GC Semi VOA (Continued)

Analysis Batch: 19227 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-19122/1-A	Method Blank	Total/NA	Solid	8015B NM	19122
MB 880-19128/1-A	Method Blank	Total/NA	Solid	8015B NM	19128
LCS 880-19122/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	19122
LCS 880-19128/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	19128
LCSD 880-19122/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	19122
LCSD 880-19128/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	19128

Analysis Batch: 19741

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-1	TP1-26	Total/NA	Solid	8015 NM	
880-11158-2	SP-1	Total/NA	Solid	8015 NM	
880-11158-3	SP-2	Total/NA	Solid	8015 NM	
880-11158-4	SP-3	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 19069

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-1	TP1-26	Soluble	Solid	DI Leach	
880-11158-2	SP-1	Soluble	Solid	DI Leach	
880-11158-3	SP-2	Soluble	Solid	DI Leach	
880-11158-4	SP-3	Soluble	Solid	DI Leach	
MB 880-19069/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-19069/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-19069/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Analysis Batch: 19488

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-11158-1	TP1-26	Soluble	Solid	300.0	19069
880-11158-2	SP-1	Soluble	Solid	300.0	19069
880-11158-3	SP-2	Soluble	Solid	300.0	19069
880-11158-4	SP-3	Soluble	Solid	300.0	19069
MB 880-19069/1-A	Method Blank	Soluble	Solid	300.0	19069
LCS 880-19069/2-A	Lab Control Sample	Soluble	Solid	300.0	19069
LCSD 880-19069/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	19069

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Client Sample ID: TP1-26

Lab Sample ID: 880-11158-1

Date Collected: 02/09/22 08:50

Matrix: Solid

Date Received: 02/10/22 11:55

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.96 g	5 mL	19707	02/18/22 08:00	KL	XEN MID
Total/NA	Analysis	8021B		100	5 mL	5 mL	19783	02/19/22 03:51	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			19539	02/15/22 20:33	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			19741	02/17/22 15:56	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	19128	02/11/22 11:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			19227	02/13/22 02:09	AJ	XEN MID
Soluble	Leach	DI Leach			4.99 g	50 mL	19069	02/10/22 15:46	CH	XEN MID
Soluble	Analysis	300.0		1			19488	02/16/22 02:44	CH	XEN MID

Client Sample ID: SP-1

Lab Sample ID: 880-11158-2

Date Collected: 02/09/22 09:30

Matrix: Solid

Date Received: 02/10/22 11:55

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	19036	02/11/22 16:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	19116	02/12/22 11:53	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			19350	02/14/22 09:43	KL	XEN MID
Total/NA	Analysis	8015 NM		1			19741	02/17/22 15:56	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	19128	02/11/22 11:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			19227	02/13/22 02:29	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	19069	02/10/22 15:46	CH	XEN MID
Soluble	Analysis	300.0		1			19488	02/16/22 02:50	CH	XEN MID

Client Sample ID: SP-2

Lab Sample ID: 880-11158-3

Date Collected: 02/09/22 09:35

Matrix: Solid

Date Received: 02/10/22 11:55

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			4.99 g	5 mL	19036	02/11/22 16:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	19116	02/12/22 12:14	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			19350	02/14/22 09:43	KL	XEN MID
Total/NA	Analysis	8015 NM		1			19741	02/17/22 15:56	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	19128	02/11/22 11:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			19227	02/13/22 02:49	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	19069	02/10/22 15:46	CH	XEN MID
Soluble	Analysis	300.0		1			19488	02/16/22 02:57	CH	XEN MID

Client Sample ID: SP-3

Lab Sample ID: 880-11158-4

Date Collected: 02/09/22 09:40

Matrix: Solid

Date Received: 02/10/22 11:55

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.05 g	5 mL	19036	02/11/22 16:00	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	19116	02/12/22 12:34	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			19350	02/14/22 09:43	KL	XEN MID

Eurofins Midland

Lab Chronicle

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Client Sample ID: SP-3
Date Collected: 02/09/22 09:40
Date Received: 02/10/22 11:55

Lab Sample ID: 880-11158-4
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1			19741	02/17/22 15:56	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	19122	02/11/22 10:14	DM	XEN MID
Total/NA	Analysis	8015B NM		1			19227	02/12/22 17:37	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	19069	02/10/22 15:46	CH	XEN MID
Soluble	Analysis	300.0		1			19488	02/16/22 03:03	CH	XEN MID

Laboratory References:
XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Accreditation/Certification Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Laboratory: Eurofins Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Program	Identification Number	Expiration Date
Texas	NELAP	T104704400-21-22	06-30-22
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
8015 NM		Solid	Total TPH
Total BTEX		Solid	Total BTEX

Method Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

Protocol References:

ASTM = ASTM International

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

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

TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

Laboratory References:

XEN MID = Eurofins Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Midland

Sample Summary

Client: GHD Services Inc.
Project/Site: Snapping Pumps

Job ID: 880-11158-1
SDG: Eddy County, NM

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth
880-11158-1	TP1-26	Solid	02/09/22 08:50	02/10/22 11:55	26"
880-11158-2	SP-1	Solid	02/09/22 09:30	02/10/22 11:55	
880-11158-3	SP-2	Solid	02/09/22 09:35	02/10/22 11:55	
880-11158-4	SP-3	Solid	02/09/22 09:40	02/10/22 11:55	

Xenoco Laboratories

The Environmental Lab of Texas

12600 West 1-20 East
Odessa, Texas 79765

Phone: 432-563-1800
Fax: 432-563-1713

CHAIN OF CUSTODY RECORD AND ANALYSIS REQUEST

11/15/8

Project Manager: Becky. Haskell @ GHD.com

Project Name: Snapping Turtles

Company Name: GHD

Project #: 17565619

Company Address: 2135 S. Loop 250 W.

Project Loc: Eddy County, NM

City/State/Zip: Midland, TX 79703

PO #:

Telephone No: (432) 686-0086

Fax No:

Report Format: ☒ Standard ☐ TRRP ☐ NPDES

Sampler Signature: [Signature]

e-mail: "Becky"

CJBryant @ PACEP.com

(lab use only)

ORDER #:

(lab use only)

FIELD CODE

Beginning Depth

Ending Depth

Date Sampled

Time Sampled

Field Filtered

Total #. of Containers

Ice

HNO₃

HCl

H₂SO₄

NaOH

Na₂S₂O₃

None

Other (Specify)

DW=Drinking Water SL=Sludge

GW=Groundwater S=Soil/Solid

NP=Non-Potable Specify Other

TPH: 418.1 8015M 8015B

TPH: TX 1005 TX 1006

Cations (Ca, Mg, Na, K)

Anions (Cl, SO₄, Alkalinity)

SAR / ESP / CEC

Metals: As Ag Ba Cd Cr Pb Hg Se

Volatiles

Semivolatiles

BTEX 8021B/5030 or BTEX 8250

RCI

N.O.R.M.

Chloride in 300

RUSH TAT (Pre-Schedule) 24, 48, 72 hrs

Standard TAT

Special Instructions:

Shipped by:

Date

Time

Received by:

Date

Time

Received by:

Date

Time

Received by:

Date

Time

Laboratory Comments:

Sample Containers Initialed?

VOCs Free of Headspace?

Labels on container(s)?

Custody seals on container(s)?

Sample Hand Delivered?

by Courier?

UPS

DHL

FedEx

As Read

Corrected



880-11158 Chain of Custody

Login Sample Receipt Checklist

Client: GHD Services Inc.

Job Number: 880-11158-1
SDG Number: Eddy County, NM**Login Number: 11158****List Number: 1****Creator: Rodriguez, Leticia****List Source: Eurofins Midland**

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
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	
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.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	

District I

1625 N. French Dr., Hobbs, NM 88240
Phone:(575) 393-6161 Fax:(575) 393-0720

District II

811 S. First St., Artesia, NM 88210
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

CONDITIONS

Action 96068

CONDITIONS

Operator: PLAINS MARKETING L.P. 333 Clay Street Suite 1900 Houston, TX 77002	OGRID: 34053
	Action Number: 96068
	Action Type: [C-141] Release Corrective Action (C-141)

CONDITIONS

Created By	Condition	Condition Date
jnobui	Remediation Plan Approved. Please provide subsequent Remediation Plan or Closure Report in 90 days. If you require additional time, please submit an extension request with valid reasoning.	4/20/2022