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Deferment Request

Perseus Central Battery
Chaves County, New Mexico
API ID # 30-005-29137
Incident # nAPP2109642047

Prepared For:

BAM Permian Operating, LLC
4416 Briarwood Ave, Suite 110 PMB #53
Midland, Texas 79707

Prepared By:

Talon/LPE
408 W. Texas Avenue
Artesia, New Mexico 88210

April 20, 2023

NMOCD District 2
506 W. Texas Ave.
Artesia, NM 88210

Subject: **Deferment Request**
Perseus Central Battery
Chaves County, New Mexico
API ID # 30-005-29137
Incident # nAPP2109642047

New Mexico Oil Conservation District,

BAM Permian Operating, LLC contracted Talon/LPE (Talon) to perform soil assessment and remediation services at the above referenced location. The incident description, soil sampling results, remedial actions and deferment request are presented herein.

Site Information

The Perseus Central Battery is located approximately 12.25 miles northwest of Maljamar, New Mexico. The legal location for this release is Unit Letter H, Section 10, Township 15 South and Range 31 East in Chaves County, New Mexico. The latitude and longitude for the site is 33.03190 and -103.80110. Site maps are presented in Appendix I.

According to the soil survey provided by the United States Department of Agriculture National Resources Conservation Services, the soils in the area are made up of Kimbrough-Stegall-Slaughter complex with 0 to 3 percent slopes, comprised of gravelly sandy loam. Per the New Mexico Bureau of Geology and Mineral Resources, the local surface and shallow geology consists of alluvial and eolian deposits of the Ogallala Formation, lower Pliocene to middle Miocene in age. Drainage courses in this area are typically well drained.

Groundwater and Site Characterization

Based on New Mexico Office of the State Engineer Database, the nearest reported groundwater depth is 264 feet below ground surface (bgs) but is located greater than 0.5 miles from the subject site. On May 6, 2022, a temporary well was drilled by Talon to a depth of 55 feet bgs on the northern side of the well pad (Figure 1) to conclusively determine the presence or absence of groundwater at that depth. See Appendix II for the boring log. Groundwater was not encountered at 55 feet bgs following a 72-hour period after the installation of a temporary well. The FEMA Flood Map Service Center does not locate the site in a 100-year flood plain. Further research of the Bureau of Land Management Karst data indicates that the site is located in a non-karst area. See Appendix II for the site characterization data.

If a release occurs within the following areas, the responsible party must treat the release as if it occurred in an area where the groundwater is less than 50 feet bgs in Table I, New Mexico Oil Conservation Division (NMOCD) Rule 19.15.29 NMAC.

Approximate Depth to Groundwater	**> 55 feet/bgs**
☐Yes ☒No	Within 300 feet of any continuously flowing watercourse or any other significant watercourse
☐Yes ☒No	Within 200 feet of any lakebed, sinkhole or a playa lake
☐Yes ☒No	Within 300 feet from an occupied permanent residence, school, hospital, institution or church
☐Yes ☒No	Within 500 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	Within 1000 feet of any freshwater well or spring
☐Yes ☒No	Within incorporated municipal boundaries or within a defined municipal freshwater well field covered under a municipal ordinance adopted pursuant to Section 3-2703 NMSA 1978
☐Yes ☒No	Within 300 feet of a wetland
☐Yes ☒No	Within the area overlying a subsurface mine
☐Yes ☒No	Within an unstable area
☐Yes ☒No	Within a 100-year floodplain

Because the release occurred in a production area (well pad) and the verified depth to groundwater on location is greater than 55 feet bgs, the clean up criteria for this site is as follows.

Table I
Closure Criteria for Soils Impacted by a Release

Depth below horizontal extents of release to ground water less than 10,000 mg/l TDS	Constituent	Method	Limit
50-100 feet	Total Chlorides	EPA 300.0 or SM4500 Cl B	10,000 mg/kg
	TPH (GRO+DRO+MRO)	EPA SW-846 Method 8015M	2,500 mg/kg
	TPH (GRO/DRO)	EPA SW-846 Method 8015M	1,000 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg
	Benzene	EPA SW-846 Method 8021B or 8260B	10 mg/kg

Incident Description

On March 27, 2021, approximately 20.64 barrels (bbls) of crude oil were discharged onto the well pad due to a failed gasket on the heater treater fire tube. A vacuum truck was dispatched and 20 bbls of crude oil was recovered from inside the berm containment. The release was reported to the NMOCD and was assigned incident # nAPP2109642047.

A site map of the release is presented in Appendix I. Initial C-141 spill notifications were filed with the NMOCD and are attached in Appendix III.

Site Assessment Activities

The initial soil assessment was completed by Larson & Associates, Inc. Talon/LPE installed a temporary groundwater monitoring well to conclusively prove the depth to groundwater at this site is greater than 55 feet bgs. The well was located on the well pad where shown on Figure 1. Subsequently, a remediation plan was generated by Talon/LPE and submitted to the NMOCD for review. A copy of the NMOCD remediation plan approval is provided in Appendix III.

Remediation Activities

Upon client authorization, remediation activities in accordance with the approved remediation plan began on July 5, 2022. A backhoe was utilized to excavate the impacted soil. The excavation depths ranged from 0.5 to 1.0 feet bgs. Confirmation samples were collected on July 8, 2022, to confirm that NMOCD closure criteria had been met. The soil samples were maintained on ice, in the custody of Talon personnel, until they were delivered to Eurofins Analytical Laboratory in Carlsbad, New Mexico for testing. The samples were analyzed for Volatile Organics (EPA Method 8012B), Total Petroleum Hydrocarbons (TPH via EPA Method 8015M) and Total Chlorides (EPA Method 300.0).

The results of these sampling events can be found in the following data table. Confirmation sample locations and excavation dimensions can be found on the Confirmation Sample Map, Figure 1, in Appendix I. Complete laboratory reports for the remediation efforts are attached in Appendix V. Photo documentation of remediation activities is provided in Appendix IV.

Table I

Remediation Soil Laboratory Results

Sample ID	Sample Date	Depth (BGS)	BTEX mg/kg	Benzene mg/kg	GRO mg/kg	DRO mg/kg	MRO mg/kg	Total TPH mg/kg	Chlorides mg/kg
NMOCD Table 1 Closure Criteria 19.15.29 NMAC			50 mg/kg	10 mg/kg	DRO + GRO combined = 1,000 mg/kg			2,500 mg/kg	10,000 mg/kg
S-1	7/5/2022	0.5'R	ND	ND	ND	339	106	445	48
S-2	7/8/2022	0.5'	ND	ND	33.9	44.4	ND	78.3	235
S-3	7/8/2022	0.5'	ND	ND	19.6	46.9	ND	66.5	1000
S-4	7/8/2022	0.5'	ND	ND	20.2	98.8	ND	119	1190
S-5	7/8/2022	0.5'	ND	ND	15.2	30.9	ND	46.1	286
S-6	7/8/2022	0.5'	ND	ND	ND	887	88.8	975.8	2050
S-7	7/8/2022	0.5'	ND	ND	28.6	98	26.2	152.8	3230
S-8	7/8/2022	0.5'	ND	0.000524	27.3	51	ND	78.3	589
S-9	7/8/2022	0.5'	ND	ND	25.2	28.4	ND	53.6	31.3
S-10	7/8/2022	0.5'	0.00361	0.000514	27.2	49.2	ND	76.4	6140
S-11	7/8/2022	0.5'	ND	ND	25.6	176	29.9	231.5	2290
S-12	7/8/2022	0.5'	ND	ND	19.7	62.7	ND	82.4	639
S-13	7/8/2022	0.5'	ND	ND	23.4	31.9	ND	55.3	502
S-14	7/8/2022	0.5'	ND	ND	20.9	30.3	ND	51.2	333
S-15	7/8/2022	0.5'	ND	ND	25.9	24.1	ND	50	557
S-16	7/8/2022	0.5'	ND	ND	29.4	21.1	15.3	65.8	604
S-17	7/8/2022	0.5'	ND	ND	25.1	17.2	ND	42.3	73
S-18	7/8/2022	1'	ND	ND	26.5	20.6	ND	47.1	191
N-SW1	7/8/2022	0.5'	ND	ND	28.8	19.6	ND	48.4	160
E-SW1	7/8/2022	0.5'	ND	ND	ND	21.3	ND	21.3	365
E-SW2	7/8/2022	0.5'	ND	ND	27.5	19.9	ND	47.4	228
S-SW1	7/8/2022	0.5'	ND	ND	ND	47.8	37.6	85.4	302
W-SW1	7/8/2022	0.5'	ND	ND	ND	ND	43.9	43.9	1440
W-SW2	7/8/2022	0.5'	ND	ND	ND	416	90.2	506.2	1090
N-SW2	7/8/2022	1'	ND	ND	19.5	57.8	43.3	120.6	14.1
E-SW3	7/8/2022	1'	ND	ND	23	886	265	1174	62.9
S-SW2	7/8/2022	1'	ND	ND	17	139	79	235	141
W-SW3	7/8/2022	1'	ND	ND	22.5	21.8	69.7	114	143

R = Refusal With Hand Auger ND = Analyte Not Detected N-SW = North Sidewall Sample

On July 22, 2022, Talon personnel were mobilized to the location in order to collect background samples. The analytical results for this sampling event can be found on the following data table and the complete lab report is attached in Appendix V. Sample locations are shown on Figure 1, Appendix I.

Table II

Background Laboratory Results

Sample ID	Sample Date	Depth (BGS)	BTEX mg/kg	Benzene mg/kg	GRO mg/kg	DRO mg/kg	MRO mg/kg	Total TPH mg/kg	Chlorides mg/kg
NMOCD Table 1 Closure Criteria 19.15.29 NMAC			50 mg/kg	10 mg/kg	DRO + GRO combined = 1000 mg/kg			2,500 mg/kg	10,000 mg/kg
BG-1	7/22/2022	0-1'	ND	ND	ND	ND	ND	-	64
BG-2	7/22/2022	0-1'	ND	ND	ND	ND	ND	-	32
BG-3	7/22/2022	0-1'	ND	ND	ND	ND	ND	-	ND
BG-4	7/22/2022	0-1'	ND	ND	ND	ND	ND	-	ND
BG-5	7/22/2022	0-1'	ND	ND	ND	54.7	52	106.7	32
BG = Background Sample ND = Analyte Not Detected									

Following NMOCD denial of the closure report, on November 10, 2022, additional horizontal delineation samples were collected from the site. The analytical results for this sampling event can be found on the following data table and the complete lab report is attached in Appendix V. Sample locations are shown on Figure 1, Appendix I.

Table III

Delineation Laboratory Results

Sample ID	Sample Date	Depth (BGS)	BTEX mg/kg	Benzene mg/kg	GRO mg/kg	DRO mg/kg	MRO mg/kg	Total TPH mg/kg	Chlorides mg/kg
NMOCD Table 1 Closure Criteria 19.15.29 NMAC			50 mg/kg	10 mg/kg	DRO + GRO combined = 1000 mg/kg			2,500 mg/kg	10,000 mg/kg
D-S	11/10/2022	0-6"	0.00181	ND	15.9	ND	ND	15.9	52.7
D-N	11/10/2022	0-6"	0.042	ND	18.5	ND	ND	18.5	52.1
D-W	11/10/2022	0-6"	0.0913	ND	16	ND	ND	16	12.4
D-E	11/10/2022	0-6"	0.0281	0.00184	26.2	ND	ND	26.2	52.5
D=Delineation Sample ND = Analyte Not Detected									

Remedial Action Summary

- The depth to groundwater at the site was confirmed to be greater than 55 feet bgs through installation of a temporary groundwater monitoring well.

- A grab sample was taken at confirmation sample locations, S-1 and D-E, to confirm the analyte levels within the infrastructure were below regulatory limits.

- The impacted areas in the vicinity of side wall samples W-SW1, W-SW2 and E-SW3 were excavated to the most horizontal extent possible but could not be extended further due to the presence of infrastructure citing safety and structural integrity concerns. Therefore this material remains in place until facility closure.

- The excavation was extended in the vicinity of sidewall sample location N-SW2 and a delineation sample, D-N, was collected. Analytical results indicate Total Chlorides to be less than 600 mg/kg and TPH less than 100 mg/kg.

- The impacted areas on site were excavated to depths of 0.5 and 1.0 feet bgs.

- Background samples were collected and analyzed in order to verify that horizontal remediation had been achieved in accordance with NMOCD guidance.

- Pursuant to NMOCD guidance, confirmation soil samples were collected at 200 square foot intervals and analyzed for TPH, BTEX and Total Chlorides to insure all other areas outside of deferment had reached NMOCD closure criteria.

- All excavated areas were backfilled with clean caliche, and restored to grade.

- All of the excavated material, approximately 158 tons, was transported to Lea Land, LLC, a NMOCD approved solid waste disposal facility.

Deferment Request

Based upon the completed remedial actions and confirmation sampling results, on behalf of BAM Permian Operating, LLC., we respectfully request that no further remedial actions be required until facility closure for the deferment area.

Should you have any questions or if further information is required, please do not hesitate to contact our office at 575-746-8768.

Respectfully submitted,

Talon/LPE

Kayla Taylor

Kayla Taylor
Project Manager

Attachments:
Appendix I Site Maps
Appendix II Boring Log, Groundwater and Soil Data, FEMA Flood Map
Appendix III C-141 Forms, NMOCD Correspodence
Appendix IV Photographic Documentation
Appendix V Laboratory Data

Appendix I

Site Maps

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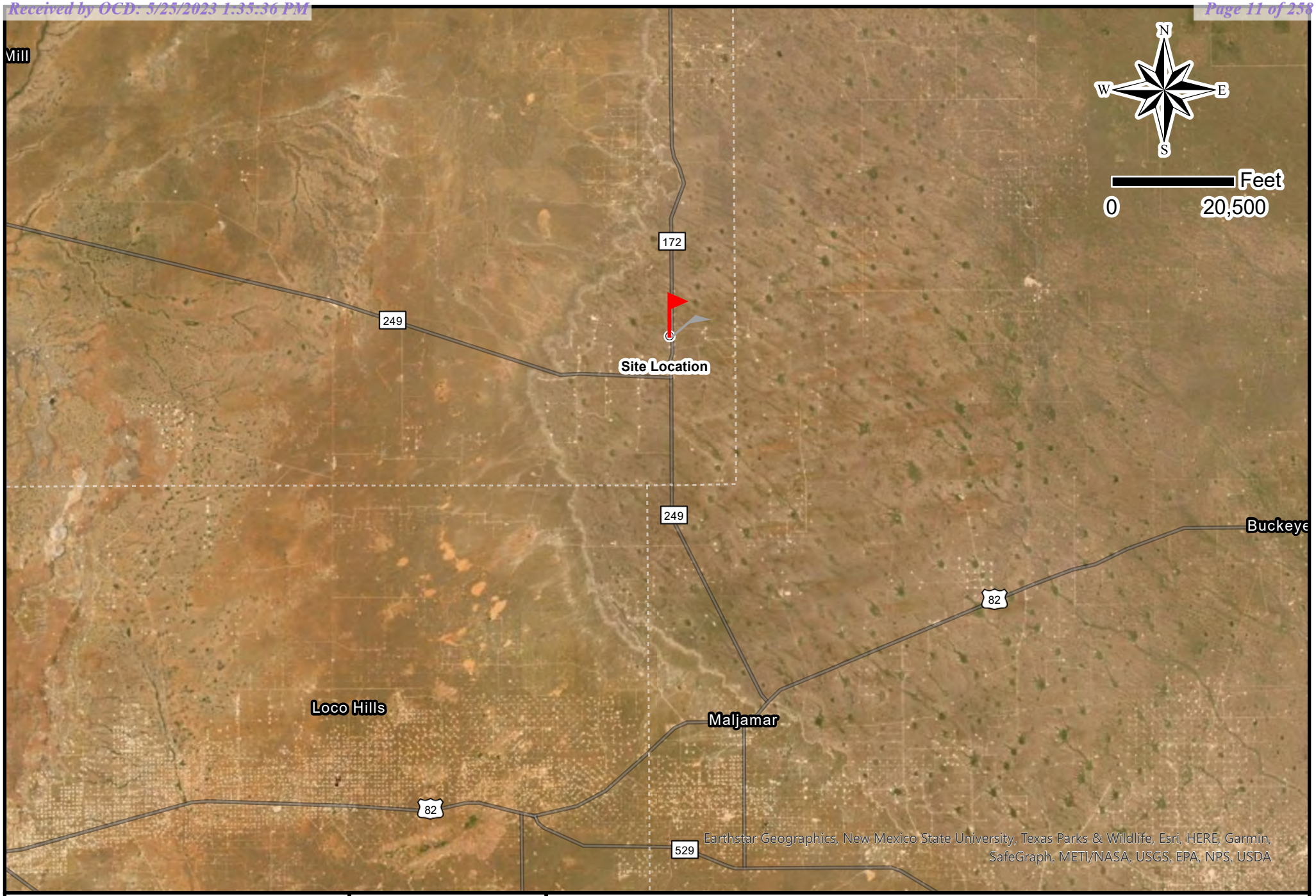
Drafted: 4/20/2023
1 in = 50 ft
Drafted By: IJR

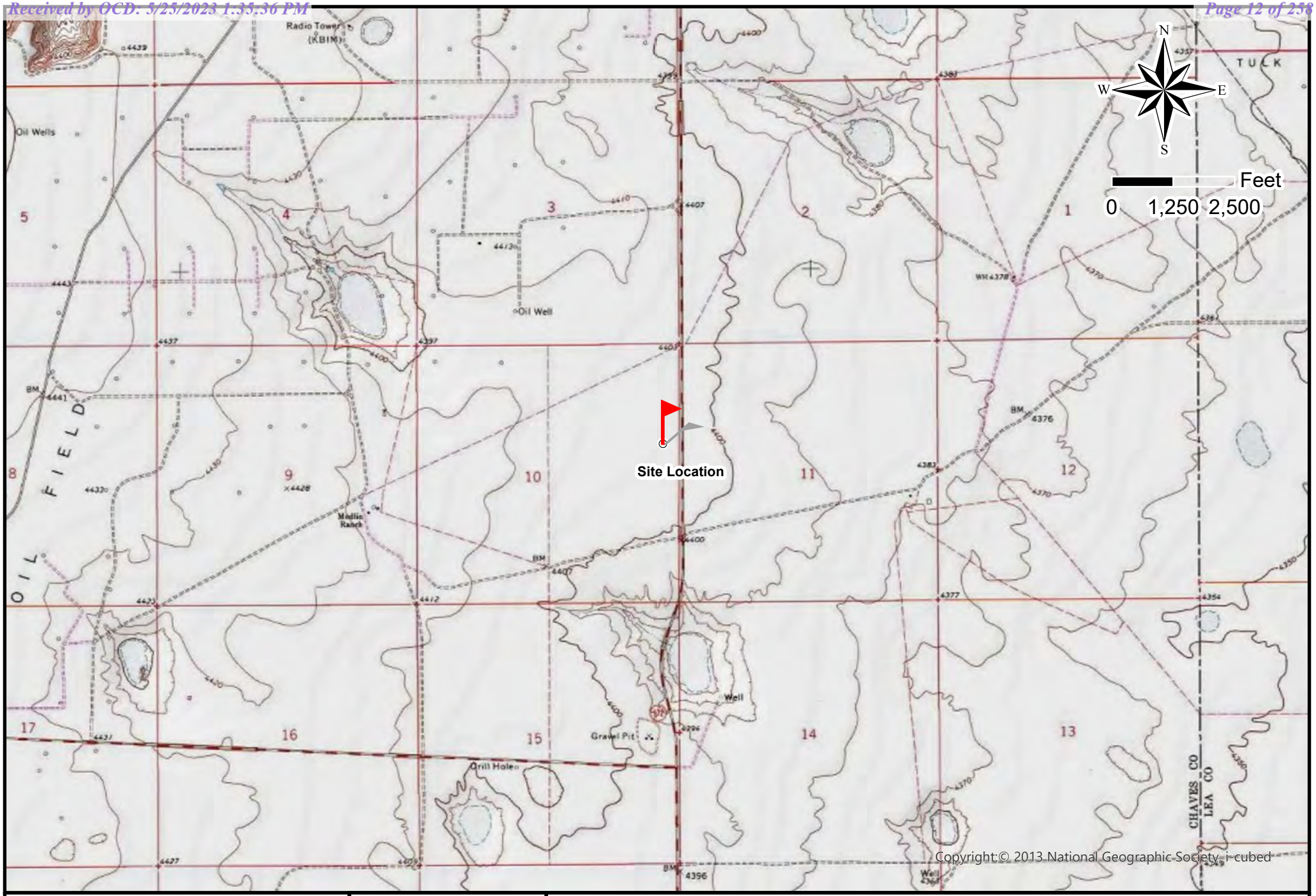
BAM Permian Operating, LLC
Perseus Central Battery
Chaves County, NM
Figure 1 - Confirmation Sample Location Map



TALON LPE

Drafted: 5/24/2022
1 in = 20,500 ft
Drafted By: IJR

BAM Permian Operating, LLC
Perseus Central Batery
Chaves County, NM
Figure 2 - Site Location Map



TALON LPE

Drafted: 5/24/2022
1 in = 2,500 ft
Drafted By: IJR

BAM Permian Operating, LLC
Perseus Central Battery
Chaves County, NM
Figure 3 - Topographic Map

Appendix II

Groundwater and Soil Data

FEMA Flood Map

SOIL BORING / MONITORING WELL LOG

PROJECT: Perseus Central Battery
PROJECT NUMBER: 704001.001.01
CLIENT: BAM Permian Operating, LLC
BORING / WELL NUMBER: B-1
TOTAL DEPTH: 55
SURFACE ELEVATION:
GEOLOGIST: K. Taylor
LATITUDE: 33.032701 N

DRILLING COMPANY: Talon/LPE
DRILLER: D. Lonagin
DRILLING METHOD: Air Rotary
BORE HOLE DIAMETER: 5 7/8"
SCREEN: Diam. ___ Length _____ Slot Size _____
CASING: Diam. ___ Length _____ Type _____
DATE DRILLED: 05/06/2022
LONGITUDE: -103.801365

PAGE 1 of 1

DEPTH (FT.)	Soil Symbol	WELL CONSTRUCTION	PID	SAMPLES	SAMPLE INTERVAL	DESCRIPTION INTERVAL	DESCRIPTION OF STRATUM	DEPTH (FT.)
0								0
						2'	Fine grained sandy silt, large limestone fragments, dark brown, dry, no odor	
							Fine grained sandy silt, large limestone fragments, dark brown, dry, no odor	
							Fine grained silty limestone, pinkish brown, dry, no odor	
10							Fine grained silty limestone, moderately cemented fragments, light brown, dry, no odor	10
							Fine grained sandy limestone, light brown, dry, no odor	
							Fine grained sandy limestone, moderately cemented fragments, light brown, dry, no odor	
20								20
							Fine grained silty limestone, lightly cemented, light brown, dry, no odor	
30								30
							Fine grained silty sandstone, medium brown, dry, no odor	
40								40
							Fine grained silty sandstone, light brown, dry	
50								50
						55'		
							Bottom of hole - Groundwater not encountered	
60								60

REMARKS: The borehole was advanced to 55' below ground surface (bgs). A 2-inch diameter temporary well was constructed of of schedule 40 PVC thread coupled to 10-feet of machine slotted well screen was installed in the open borehole. 72-hours after installation, a Solinest water level meter was utilized to determine the presence or absence of groundwater. The temporary well casing was subsequently removed and the bore hole backfilled with hole plug and hydrated.

KEY TO SYMBOLS

Symbol Description

Strata symbols

Silty sand (SM)

Poorly graded sand

Monitor Well Details

Plugged Soil Boring

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

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

(R=POD has been replaced, O=orphaned, C=the file is closed)

(quarters are 1=NW 2=NE 3=SW 4=SE)
(quarters are smallest to largest) (NAD83 UTM in meters) (In feet)

POD Number	Code	POD Sub-basin	County	Q 64	Q 16	Q 4	Sec	Tws	Rng	X	Y	Distance	Depth Well	Depth Water	Water Column
L 06307		L	CH	2	4	3	11	15S	31E	612686	3654805*	1067	297	264	33
L 03607		L	LE	2	3	1	14	15S	31E	612293	3653994*	1565	335	234	101
L 03610		L	LE	2	3	1	14	15S	31E	612293	3653994*	1565	322	242	80
L 12497 POD1		L	LE	2	2	4	09	15S	31E	610174	3655160	1738	332		
L 12528 POD1		L	CH	1	3	1	12	15S	31E	613665	3655617	1790	335		
L 12515 POD1		L	LE	1	1	3	14	15S	31E	612075	3653597	1915	335		
L 02798		L	LE	1	4	2	09	15S	31E	609961	3655671	1924	320	280	40
L 14856 POD1		L	CH	3	3	2	14	15S	31E	612950	3653765	2041	335		
L 03075		L	LE	3	3	3	34	14S	31E	610436	3657805*	2716	350		
L 03204		L	LE		3	2	34	14S	31E	611333	3652772	2784	290	260	30
L 03600		L	LE	1	1	1	24	15S	31E	613718	3652811*	3260	332	246	86
L 12598 POD1		L	LE	2	2	4	13	15S	31E	615155	3653704	3737	330		
L 03611		L	LE	4	4	3	23	15S	31E	612724	3651386*	4203	320	235	85
RA 12804 POD1		RA	CH	3	4	4	28	14S	31E	610043	3659452	4355	250	62	188
L 06328		L	LE	2	1	4	07	15S	32E	616360	3655352*	4484	345	234	111
L 05142 X11		L	LE	2	3	3	31	14S	32E	615462	3658234*	4505	339	220	119
L 04032		L	CH	4	1	2	36	14S	31E	614645	3659069*	4513	343	250	93
L 02785		L	LE		1	1	08	15S	31E	607339	3655848*	4552	308		
L 03601		L	LE	2	3	4	24	15S	31E	614738	3651616*	4825	340	240	100
L 03602		L	LE	2	3	2	26	15S	31E	613137	3650787*	4881	331		
L 03602	R	L	LE	2	3	2	26	15S	31E	613137	3650787*	4881	331		

Average Depth to Water: **230 feet**
Minimum Depth: **62 feet**
Maximum Depth: **280 feet**

Record Count: 21

UTMNAD83 Radius Search (in meters):

Easting (X): 611878 **Northing (Y):** 3655503 **Radius:** 5000

***UTM location was derived from PLSS - see Help**

Custom Soil Resource Report
Soil Map

Chaves County, New Mexico, Southern Part

Kt—Kimbrough-Stegall-Slaughter complex

Map Unit Setting

National map unit symbol: 1w7h
Elevation: 3,200 to 4,400 feet
Mean annual precipitation: 10 to 17 inches
Mean annual air temperature: 57 to 66 degrees F
Frost-free period: 180 to 230 days
Farmland classification: Not prime farmland

Map Unit Composition

Kimbrough and similar soils: 55 percent
Slaughter and similar soils: 20 percent
Stegall and similar soils: 20 percent
Minor components: 5 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Kimbrough

Setting

Landform: Ridges, plains
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Crest, rise
Down-slope shape: Convex
Across-slope shape: Convex
Parent material: Mixed alluvium and/or eolian deposits derived from sedimentary rock

Typical profile

H1 - 0 to 11 inches: gravelly fine sandy loam
H2 - 11 to 19 inches: cemented material
H3 - 19 to 60 inches: very gravelly loam

Properties and qualities

Slope: 0 to 3 percent
Depth to restrictive feature: 4 to 20 inches to petrocalcic
Drainage class: Well drained
Runoff class: Medium
Capacity of the most limiting layer to transmit water (Ksat): Low to moderately high (0.01 to 0.60 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 80 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Sodium adsorption ratio, maximum: 2.0
Available water supply, 0 to 60 inches: Very low (about 1.1 inches)

Interpretive groups

Land capability classification (irrigated): None specified
Land capability classification (nonirrigated): 7s
Hydrologic Soil Group: D
Ecological site: R077DY049TX - Very Shallow 12-17" PZ

Hydric soil rating: No

Description of Stegall

Setting

Landform: Plains
Landform position (three-dimensional): Rise
Down-slope shape: Convex
Across-slope shape: Convex
Parent material: Mixed alluvium and/or eolian deposits derived from sedimentary rock

Typical profile

H1 - 0 to 3 inches: loam
H2 - 3 to 35 inches: clay loam
H3 - 35 to 43 inches: cemented material
H4 - 43 to 60 inches: variable

Properties and qualities

Slope: 0 to 1 percent
Depth to restrictive feature: 31 to 60 inches to petrocalcic
Drainage class: Well drained
Runoff class: Low
Capacity of the most limiting layer to transmit water (Ksat): Low to moderately high (0.01 to 0.60 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 90 percent
Gypsum, maximum content: 6 percent
Maximum salinity: Very slightly saline to slightly saline (2.0 to 4.0 mmhos/cm)
Sodium adsorption ratio, maximum: 4.0
Available water supply, 0 to 60 inches: Low (about 6.0 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: C
Ecological site: R077CY028TX - Limy Upland 16-21" PZ
Hydric soil rating: No

Description of Slaughter

Setting

Landform: Plains
Landform position (three-dimensional): Rise
Down-slope shape: Convex
Across-slope shape: Convex
Parent material: Mixed alluvium and/or eolian deposits derived from sedimentary rock

Typical profile

H1 - 0 to 3 inches: loam
H2 - 3 to 14 inches: clay loam
H3 - 14 to 20 inches: cemented material
H4 - 20 to 60 inches: variable

Properties and qualities

Slope: 0 to 1 percent
Depth to restrictive feature: 9 to 20 inches to petrocalcic
Drainage class: Well drained
Runoff class: Low
Capacity of the most limiting layer to transmit water (Ksat): Low to moderately high (0.01 to 0.60 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 5 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Sodium adsorption ratio, maximum: 2.0
Available water supply, 0 to 60 inches: Very low (about 2.3 inches)

Interpretive groups

Land capability classification (irrigated): 4s
Land capability classification (nonirrigated): 4s
Hydrologic Soil Group: D
Ecological site: R077CY028TX - Limy Upland 16-21" PZ
Hydric soil rating: No

Minor Components

Sharvana

Percent of map unit: 4 percent
Ecological site: R077CY035TX - Sandy 16-21" PZ
Hydric soil rating: No

Playa

Percent of map unit: 1 percent
Landform: Flood-plain playas
Landform position (three-dimensional): Dip, talf
Down-slope shape: Concave
Across-slope shape: Concave
Ecological site: R042XC017NM - Bottomland
Hydric soil rating: Yes

National Flood Hazard Layer FIRMette

FEMA

103°48'26"W 33°2'11"N

103°47'48"W 33°1'41"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*
- Regulatory Floodway

OTHER AREAS OF FLOOD HAZARD
- 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 *Zone X*
- Future Conditions 1% Annual Chance Flood Hazard *Zone X*
- Area with Reduced Flood Risk due to Levee. See Notes. *Zone X*
- Area with Flood Risk due to Levee *Zone D*

OTHER AREAS
- NO SCREEN Area of Minimal Flood Hazard *Zone X*
- Effective LOMRs
- Area of Undetermined Flood Hazard *Zone D*

GENERAL STRUCTURES
- Channel, Culvert, or Storm Sewer
- Levee, Dike, or Floodwall

OTHER FEATURES
- 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
- Hydrographic Feature

MAP PANELS
- Digital Data Available
- No Digital Data Available
- Unmapped

N

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 8/18/2022 at 3:25 PM 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.

Appendix III

C-141 Forms

NMOCD Correspondence

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	nAPP2109642047
District RP	
Facility ID	
Application ID	

Release Notification

Responsible Party

Responsible Party: Chevron USA Inc	OGRID: 4323
Contact Name: Amy Barnhill	Contact Telephone: 432-687-7108
Contact email: ABarnhill@chevron.com	Incident # *nAPP2109642047*
Contact mailing address: 6301 Deauville Blvd Midland, Tx 79706	

Location of Release Source

Latitude 33.0319 Longitude -103.8011
(NAD 83 in decimal degrees to 5 decimal places)

Site Name: Perseus Central Battery	Site Type: Oil
Date Release Discovered: 3-27-21	API# *(if applicable)*

Unit Letter	Section	Township	Range	County
H	10	15S	31E	Chaves

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): 20.64	Volume Recovered (bbls): 20
☐ 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: Heater firetube gasket failed at the top of firetube flange area. Vac truck picked up ~20bbls oil from inside berm area. FS- shut in well, isolated heater treater, called for vac truck and made notifications.

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 not 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: Amy Barnhill Title: Water Specialist

Signature: Amy Barnhill Date: 4-6-21

email: ABarnhill@chevron.com Telephone: 432-687-7108

OCD Only

Received by: Ramona Marcus Date: 4/29/2021

Spill Calculations

Incident Date			3/27/2021		
Incident Time			Start Time	End Time	
			8:20am	12:36 PM	
Location	Persues CB Heater				
Lat/Long	33.0319,-103.8011				
All volumes in following table in barrels					
Area	Standing Liquid	In Soil	dimensions / shape	Oil Volume	Water Volume
1		x	31'x23'x3/8"	0.57	0
2		x	35'x20'x3/8"	0.39	0
3	x		39'x17'x2"	19.68	0
4					
5					
6					
7					
8					
			Total Fluid	20.64	0

State of New Mexico
Oil Conservation Division

Incident ID	nAPP2109642047
District RP	
Facility ID	30-005-29137
Application ID	

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?	>55 (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
Page 4

State of New Mexico
Oil Conservation Division

Incident ID	nAPP2109642047
District RP	
Facility ID	30-005-29137
Application ID	

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: Blake Morphew

Title: managing member

Signature: _____

Date: 06/16/2022

email: blake@bampermian.com

Telephone: 432-242-8851

OCD Only

Received by: _____

Date: _____

State of New Mexico
Oil Conservation Division

Incident ID	nAPP2109642047
District RP	
Facility ID	30-005-29137
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 site map 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: Blake Morphew
Title:

Signature: _____
Date: 04/21/2023

email: blake@bampermian.com
Telephone: 432-242-8851

OCD Only

Received by: _____ Date: _____

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

See text box below - NV

Signature: Nelson Velez
Date: 08/18/2023

Deferral approved under the following conditions;

1. Remediation has met rule requirements. Impacts above the reclamation standards has been left in place and is required to be addressed once site is no longer reasonably needed for production or drilling ops.
2. Remediation Due date left open until the well site is decommissioned or plugged and abandoned.

David J. Adkins

From: OCDOnline@state.nm.us
Sent: Friday, July 1, 2022 10:53 AM
To: Rebecca Pons
Subject: The Oil Conservation Division (OCD) has approved the application, Application ID: 118836

To whom it may concern (c/o Rebecca Pons for Talon LPE),

The OCD has approved the submitted *Application for administrative approval of a release notification and corrective action* (C-141), for incident ID (n#) nAPP2109642047,
with the following conditions:

- **Remediation Plan Approved.**

The signed C-141 can be found in the OCD Online: Imaging under the incident ID (n#).

If you have any questions regarding this application, please contact me.

Thank you,
Jennifer Nobui
Environmental Specialist-Advanced
505-470-3407
Jennifer.Nobui@state.nm.us

New Mexico Energy, Minerals and Natural Resources Department
1220 South St. Francis Drive
Santa Fe, NM 87505

David J. Adkins

From: Nobui, Jennifer, EMNRD <Jennifer.Nobui@state.nm.us>
Sent: Wednesday, July 6, 2022 1:13 PM
To: David J. Adkins
Cc: Bratcher, Mike, EMNRD; Harimon, Jocelyn, EMNRD; Hamlet, Robert, EMNRD
Subject: FW: [EXTERNAL] confirmation sample notification, Bam Operating, Perseus CTB, incident #nAPP2109642047, API 30-005-29137

This message originated from an **External Source**. Please use proper judgment and caution when opening attachments, clicking links, or responding to this email.

David,

Thank you for the notification. Please include a copy of this and all notifications in the remedial and/or closure reports to ensure the notifications are documented in the project file.

Thanks,
Jennifer Nobui

From: Enviro, OCD, EMNRD <OCD.Enviro@state.nm.us>
Sent: Wednesday, July 6, 2022 1:09 PM
To: Bratcher, Mike, EMNRD <mike.bratcher@state.nm.us>; Nobui, Jennifer, EMNRD <Jennifer.Nobui@state.nm.us>; Harimon, Jocelyn, EMNRD <Jocelyn.Harimon@state.nm.us>; Hamlet, Robert, EMNRD <Robert.Hamlet@state.nm.us>; Velez, Nelson, EMNRD <Nelson.Velez@state.nm.us>
Subject: Fw: [EXTERNAL] confirmation sample notification, Bam Operating, Perseus CTB, incident #nAPP2109642047, API 30-005-29137

From: David J. Adkins <dadkins@talonlpe.com>
Sent: Wednesday, July 6, 2022 12:08 PM
To: Enviro, OCD, EMNRD <OCD.Enviro@state.nm.us>
Cc: Blake Morphew <blake@bampermian.com>
Subject: [EXTERNAL] confirmation sample notification, Bam Operating, Perseus CTB, incident #nAPP2109642047, API 30-005-29137

CAUTION: This email originated outside of our organization. Exercise caution prior to clicking on links or opening attachments.

Hello,

It is the intent of this correspondence to provide 48-hour notification of confirmation sample collection for the above reference incident. We anticipate collecting samples on 7/8/2022 at approximately 2pm. Please let me know if you have any questions. Thank you.

Respectfully,

David J. Adkins
Regional Manager
Office: 575.746.8768 x702
Direct: 575.616.4022
Cell: 575.441.4835

Fax: 575.746.8905
Emergency: 866.742.0742
Web: www.talonlpe.com

At Talon/LPE, we are quality in all things, including communication. Have a question? Need a quote? Send an email to clientrelations@talonlpe.com.

Kayla Taylor

From: Chad Hensley
Sent: Thursday, November 3, 2022 1:27 PM
To: ocd.enviro@emnrd.nm.gov
Subject: RE: Sampling Event

Chad Hensley
Environmental Project Manager
Office: 575.746.8768 x
Cell:
Fax: 575.746.8905
Emergency: 866.742.0742
Web: www.talonlpe.com

From: Chad Hensley
Sent: Thursday, November 3, 2022 12:25 PM
To: ocd.enviro@emnrd.st.gov
Subject: Sampling Event

To whom it make concern.

Talon LPE will be collecting samples at the BAM Perseus Central Battery 11/7/2022 in the AM.

Chad Hensley
Environmental Project Manager
Office: 575.746.8768 x
Cell:
Fax: 575.746.8905
Emergency: 866.742.0742
Web: www.talonlpe.com

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TALON LPE

Remediation Work Plan

Perseus Central Battery
Chaves County, New Mexico
API ID # 30-005-29137
Incident # nAPP2109642047

Prepared For:

BAM Permian Operating, LLC
4416 Briarwood Ave, Suite 110 PMB #53
Midland, Texas 79707

Prepared By:

Talon/LPE
408 W. Texas Avenue
Artesia, New Mexico 88210

June 16, 2022

Mr. Mike Bratcher
NMOCD District 2
811 S. First St.
Artesia, NM 88210

Mr. Jim Amos
Bureau of Land Management
620 East Green Street
Carlsbad, NM 88220

Subject: **Remediation Work Plan**
Perseus Central Battery
Chaves County, New Mexico
API ID # 30-005-29137
Incident # nAPP2109642047

Dear Mr. Bratcher and Mr. Amos,

BAM Permian Operating, LLC contracted Talon/LPE (Talon) to perform site assessment activities at the above referenced location. The results of the site characterization and the remediation work plan are provided herein.

Site Information

The Perseus Central Battery is located approximately 12.25 miles northwest of Maljamar, New Mexico. The legal location for this release is Unit Letter H, Section 10, Township 15 South and Range 31 East in Chaves County, New Mexico. The latitude and longitude for the site is 33.03190 and -103.80110. Site maps are presented in Appendix I.

According to the soil survey provided by the United States Department of Agriculture National Resources Conservation Services, the soils in the area are made up of Kimbrough-Stegall-Slaughter complex with 0 to 3 percent slopes, comprised of gravelly sandy loam. Per the New Mexico Bureau of Geology and Mineral Resources, the local surface and shallow geology consists of alluvial and eolian deposits of the Ogallala Formation, lower Pliocene to middle Miocene in age. Drainage courses in this area are typically well drained.

Groundwater and Site Characterization

Based on New Mexico Office of the State Engineer Database, the nearest reported groundwater depth is 264 feet below ground surface (bgs) but is located greater than 0.5 miles from the subject site. On May 6, 2022, a temporary well was drilled to a depth of 55 feet bgs on the northern side of the pad to conclusively determine the presence or absence of groundwater at that depth. See Appendix II for the boring log. Groundwater was not encountered at 55 feet bgs following a 72-hour period after the installation of a temporary well. The FEMA Flood Map Service Center does not locate the site in a 100-year flood plain. Further research of the Bureau of Land Management Karst, the site is located in a non-karst area. See Appendix II for the site characterization data.

If a release occurs within the following areas, the responsible party must treat the release as if it occurred in an area where the groundwater is less than 50 feet bgs in Table I, New Mexico Oil Conservation Division (NMOCD) Rule 19.15.29 NMAC.

Approximate Depth to Groundwater	**> 55 feet/bgs**
☐Yes ☒No	Within 300 feet of any continuously flowing watercourse or any other significant watercourse
☐Yes ☒No	Within 200 feet of any lakebed, sinkhole or a playa lake
☐Yes ☒No	Within 300 feet from an occupied permanent residence, school, hospital, institution or church
☐Yes ☒No	Within 500 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	Within 1000 feet of any freshwater well or spring
☐Yes ☒No	Within incorporated municipal boundaries or within a defined municipal freshwater well field covered under a municipal ordinance adopted pursuant to Section 3-2703 NMSA 1978
☐Yes ☒No	Within 300 feet of a wetland
☐Yes ☒No	Within the area overlying a subsurface mine
☐Yes ☒No	Within an unstable area
☐Yes ☒No	Within a 100-year floodplain

Because the release occurred in a production area (well pad) and the verified depth to groundwater on location is greater than 55 feet bgs, the clean up criteria for this site is as follows.

Table I
Closure Criteria for Soils Impacted by a Release

Depth below horizontal extents of release to ground water less than 10,000 mg/l TDS	Constituent	Method	Limit
50-100 feet	Total Chlorides	EPA 300.0 or SM4500 Cl B	10,000 mg/kg
	TPH (GRO+DRO+MRO)	EPA SW-846 Method 8015M	2,500 mg/kg
	TPH (GRO/DRO)	EPA SW-846 Method 8015M	1,000 mg/kg
	BTEX	EPA SW-846 Method 8021B or 8260B	50 mg/kg
	Benzene	EPA SW-846 Method 8021B or 8260B	10 mg/kg

Incident Description

On March 27, 2021, approximately 20.64 barrels (bbls) of crude oil was discharged onto the well pad due to a failed gasket on the heater treater fire tube. A vacuum truck was dispatched and 20 bbls of crude oil was recovered from inside the berm containment. The release was reported to the NMOCD and was assigned incident # nAPP2109642047.

Site maps of the release are presented in Appendix I. Initial C-141 spill notifications were filed with the NMOCD and are attached in Appendix III.

Site Assessment Activities

On May 11, 2021, soil samples were collected from 0-1 feet bgs from the site at nine (9) locations. Additional soil samples were collected on October 13, 2021 to assist with vertical delineation in the areas of S-1, S-2, S-3, and S-8. All samples were transported via chain of custody to Eurofins Laboratories, Inc., for analysis of Total Chlorides (EPA Method 300.0), Total Petroleum Hydrocarbons (TPH, EPA Method 8015B NM) and Volatile Organics (BTEX, EPA Method 8021B).

On December 7, 2021, the boring at S-8 was advanced to 20 feet bgs for vertical chloride delineation. The samples were transported via chain of custody to Eurofins Laboratories, Inc., for analysis of Total Chlorides (EPA Method 300.0).

The soil assessment was completed by Larson & Associates, Inc. Results from the initial sampling event are presented on the following data table and the complete laboratory report and site characterization data provided by Larson & Associates, Inc., can be found in Appendix V. Sample locations are shown on the attached Figure 1 in Appendix I.

Table I

Soil Assessment Laboratory Results

Sample ID	Sample Date	Depth (bgs)	BTEX mg/kg	Benzene mg/kg	GRO mg/kg	DRO mg/kg	MRO mg/kg	Total TPH mg/kg	Chlorides mg/kg
NMOCD Table 1 Closure Criteria 19.15.29 NMAC			50 mg/kg	10 mg/kg	DRO + GRO combined = 1,000 mg/kg			2,500 mg/kg	10,000 mg/kg
S-1	5/11/2021	0.5'	ND	ND	ND	ND	ND	ND	11600
S-1	5/11/2021	1.0'	ND	ND	ND	116	ND	116	4150
S-1	10/13/2021	1.0'	ND	ND	ND	ND	ND	ND	426
S-1	10/13/2021	3.0'	ND	ND	ND	ND	ND	ND	526
S-1	10/13/2021	5.0'	ND	ND	ND	ND	ND	ND	332
S-1	10/13/2021	8.0'	ND	ND	ND	ND	ND	ND	333
S-2	5/11/2021	0.5'	ND	ND	ND	ND	ND	ND	5790
S-2	5/11/2021	1.0'	ND	ND	ND	ND	ND	ND	3300
S-2	10/13/2021	1.0'	ND	ND	ND	ND	ND	ND	143
S-2	10/13/2021	3.0'	ND	ND	ND	ND	ND	ND	4160

Sample ID	Sample Date	Depth (bgs)	BTEX mg/kg	Benzene mg/kg	GRO mg/kg	DRO mg/kg	MRO mg/kg	Total TPH mg/kg	Chlorides mg/kg
NMOCD Table 1 Closure Criteria 19.15.29 NMAC			50 mg/kg	10 mg/kg	DRO + GRO combined = 1,000 mg/kg			2,500 mg/kg	10,000 mg/kg
S-2	10/13/2021	5.0'	0.00579	ND	ND	ND	ND	ND	430
S-2	10/13/2021	7.0'	ND	ND	ND	ND	ND	ND	496
S-3	5/11/2021	0.5'	0.516	ND	89.8	1930	257	2276.8	714
S-3	5/11/2021	1.0'	0.393	ND	63.2	1650	218	1931.2	687
S-3	10/13/2021	1.0'	ND	ND	ND	ND	ND	ND	6.93
S-3	10/13/2021	3.0'	ND	ND	ND	ND	ND	ND	26.6
S-3	10/13/2021	5.0'	ND	ND	ND	ND	ND	ND	54.0
S-4	5/11/2021	0.5'	0.0189	ND	ND	366	ND	366	48.3
S-4	5/11/2021	1.0'	0.00488	ND	ND	ND	ND	ND	36.8
S-5	5/11/2021	0.5'	ND	ND	ND	ND	ND	ND	5.14
S-5	5/11/2021	1.0'	ND	ND	ND	ND	ND	ND	ND
S-6	5/11/2021	0.5'	ND	ND	ND	ND	ND	ND	ND
S-6	5/11/2021	1.0'	ND	ND	ND	ND	ND	ND	7.45
S-7	5/11/2021	0.5'	ND	ND	ND	ND	ND	ND	19.0
S-7	5/11/2021	1.0'	ND	ND	ND	ND	ND	ND	9.01
S-8	5/11/2021	0.5'	ND	ND	ND	57.1	ND	57.1	9720
S-8	5/11/2021	1.0'	ND	ND	ND	161	62.5	223.5	5250
S-8	10/13/2021	1.0'	ND	ND	ND	ND	ND	ND	4970
S-8	10/13/2021	3.0'	ND	ND	ND	ND	ND	ND	1510
S-8	10/13/2021	5.0'	ND	ND	ND	ND	ND	ND	880
S-8	10/13/2021	6.0'	ND	ND	ND	ND	ND	ND	818
S-8	12/7/2021	10.0'	NT	NT	NT	NT	NT	NT	688
S-8	12/7/2021	15.0'	NT	NT	NT	NT	NT	NT	105
S-8	12/7/2021	20.0'	NT	NT	NT	NT	NT	NT	61.6
S-9	5/11/2021	0.5'	ND	ND	ND	ND	ND	ND	ND
S-9	5/11/2021	1.0'	ND	ND	ND	ND	ND	ND	ND

ND = Analyte Not Detected NT=Analyte Not Tested

Proposed Remedial Actions

- The depth to groundwater at the site was confirmed to be greater than 55 feet bgs.
- Based on laboratory data results, the area of S-1 on the eastern side of the tank battery exceeded the chloride concentration for the closure criteria from 0 - 0.5 feet bgs, and the area of S-3 on the western side of the berm exceeded for the combined DRO and GRO TPH concentration limit. The area of S-1 will be excavated to a depth of 0.5 feet bgs, and the area in the vicinity of sample location S-3 will be excavated to a depth of 1.0 feet bgs to remove impacted soils.
- Composite soil samples will be collected from the side walls of the excavation at 200 sq. ft. intervals to verify that all horizontal and vertical soil impacts have been removed.
- All excavated areas will be backfilled with clean, like material.
- Photo documentation of all remedial actions and analytical data will be presented in the closure report along with a Final C-141 for the referenced incident.
- Remediation activities will be completed within 60 days of NMOCD approval of this plan.

Should you have any questions or if further information is required, please do not hesitate to contact our office at 575-746-8768.

Respectfully submitted,

Talon/LPE

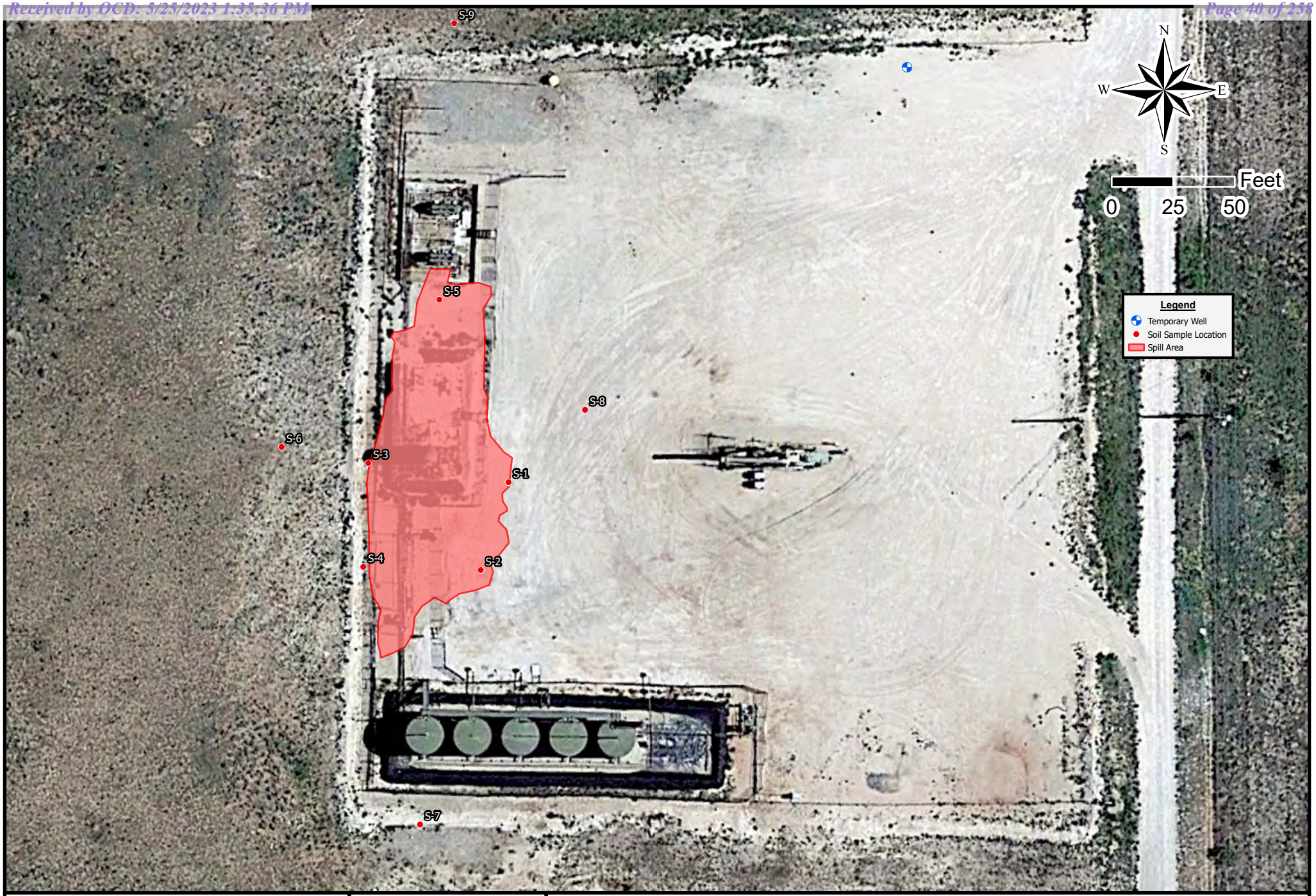
Kayla Taylor
Project Manager

David J. Adkins
Regional Manager

Attachments:
Appendix I Site Plans
Appendix II Boring Log, Groundwater and Soil Data, FEMA Flood Map
Appendix III C-141 Forms, NMOCD Correspodence
Appendix IV Photographic Documentation
Appendix V Site Assessment Data, Larson and Associates, Inc.

APPENDIX I

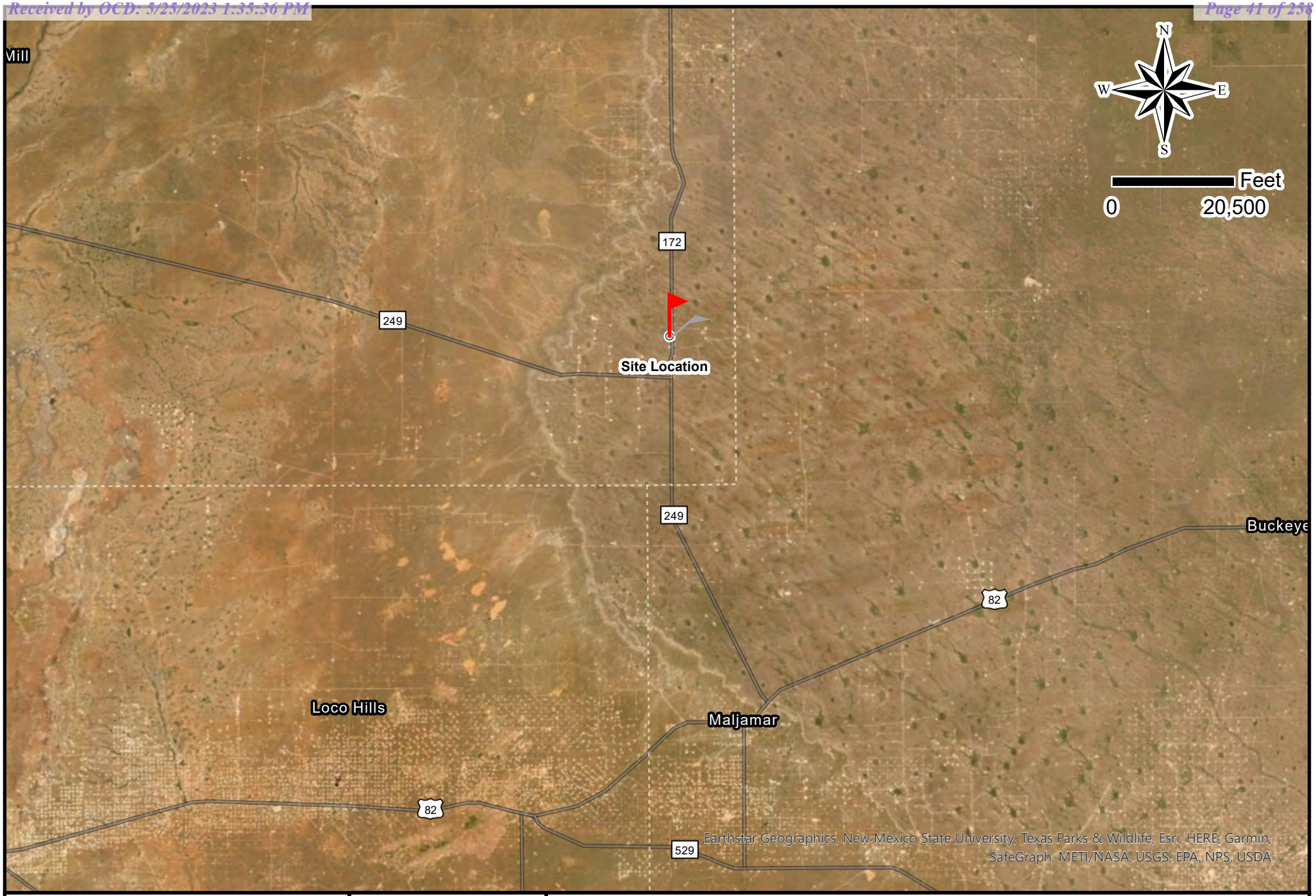
Site Plans



TALON LPE

Drafted: 6/9/2022
1 in = 50 ft
Drafted By: IJR

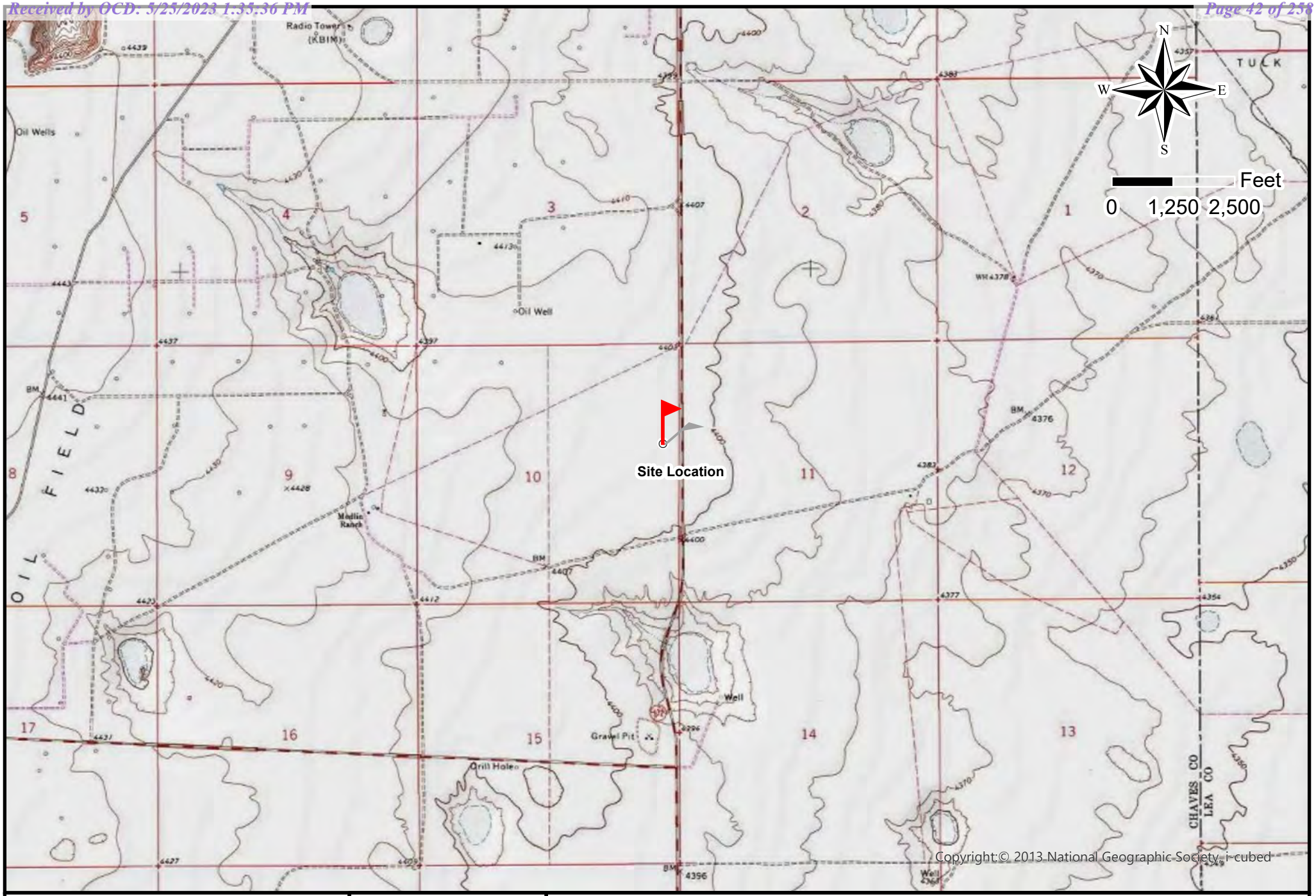
BAM Permian Operating, LLC
Perseus Central Batery
Chaves County, NM
Figure 1 - Site Map



TALON LPE

Drafted: 5/24/2022
1 in = 20,500 ft
Drafted By: IJR

BAM Permian Operating, LLC
Perseus Central Batery
Chaves County, NM
Figure 2 - Site Location Map



TALON LPE

Drafted: 5/24/2022
1 in = 2,500 ft
Drafted By: IJR

BAM Permian Operating, LLC
Perseus Central Battery
Chaves County, NM
Figure 3 - Topographic Map

APPENDIX II

Boring Log

Groundwater and Soil Data

FEMA Flood Map

SOIL BORING / MONITORING WELL LOG

PROJECT: Perseus Central Battery
PROJECT NUMBER: 704001.001.01
CLIENT: BAM Permian Operating, LLC
BORING / WELL NUMBER: B-1
TOTAL DEPTH: 55
SURFACE ELEVATION:
GEOLOGIST: K. Taylor
LATITUDE: 33.032701 N

DRILLING COMPANY: Talon/LPE
DRILLER: D. Lonagin
DRILLING METHOD: Air Rotary
BORE HOLE DIAMETER: 5 7/8"
SCREEN: Diam. ___ Length _____ Slot Size _____
CASING: Diam. ___ Length _____ Type _____
DATE DRILLED: 05/06/2022
LONGITUDE: -103.801365

PAGE 1 of 1

DEPTH (FT.)	Soil Symbol	WELL CONSTRUCTION	PID	SAMPLES	SAMPLE INTERVAL	DESCRIPTION INTERVAL	DESCRIPTION OF STRATUM	DEPTH (FT.)
0								0
						2'	Fine grained sandy silt, large limestone fragments, dark brown, dry, no odor	
							Fine grained sandy silt, large limestone fragments, dark brown, dry, no odor	
							Fine grained silty limestone, pinkish brown, dry, no odor	
10							Fine grained silty limestone, moderately cemented fragments, light brown, dry, no odor	10
							Fine grained sandy limestone, light brown, dry, no odor	
							Fine grained sandy limestone, moderately cemented fragments, light brown, dry, no odor	
20								20
							Fine grained silty limestone, lightly cemented, light brown, dry, no odor	
30								30
							Fine grained silty sandstone, medium brown, dry, no odor	
40								40
							Fine grained silty sandstone, light brown, dry	
50								50
						55'		
							Bottom of hole - Groundwater not encountered	
60								60

REMARKS: The borehole was advanced to 55' below ground surface (bgs). A 2-inch diameter temporary well was constructed of of schedule 40 PVC thread coupled to 10-feet of machine slotted well screen was installed in the open borehole. 72-hours after installation, a Solinest water level meter was utilized to determine the presence or absence of groundwater. The temporary well casing was subsequently removed and the bore hole backfilled with hole plug and hydrated.

KEY TO SYMBOLS

Symbol Description

Strata symbols

Silty sand (SM)

Poorly graded sand

Monitor Well Details

Plugged Soil Boring

New Mexico Office of the State Engineer

Point of Diversion Summary

(quarters are 1=NW 2=NE 3=SW 4=SE)
(quarters are smallest to largest) (NAD83 UTM in meters)

Well Tag	POD Number	Q64	Q16	Q4	Sec	Tws	Rng	X	Y
2249C	RA 12804 POD1	3	4	4	28	14S	31E	610043	3659452

Driller License: 1737 **Driller Company:** SHADE TREE DRILLING

Driller Name: MULLINS, JUSTINIEL.NER

Drill Start Date:	03/12/2020	**Drill Finish Date:**	03/13/2020	**Plug Date:**	
Log File Date:	04/13/2020	**PCW Rcv Date:**		**Source:**	Shallow
Pump Type:		**Pipe Discharge Size:**		**Estimated Yield:**	250 GPM
Casing Size:	6.00	**Depth Well:**	250 feet	**Depth Water:**	62 feet

Water Bearing Stratifications:	Top	Bottom	Description
	62	187	Sandstone/Gravel/Conglomerate
	206	245	Sandstone/Gravel/Conglomerate

Casing Perforations:	Top	Bottom
	130	250

Custom Soil Resource Report
Soil Map

Chaves County, New Mexico, Southern Part

Kt—Kimbrough-Stegall-Slaughter complex

Map Unit Setting

National map unit symbol: 1w7h
Elevation: 3,200 to 4,400 feet
Mean annual precipitation: 10 to 17 inches
Mean annual air temperature: 57 to 66 degrees F
Frost-free period: 180 to 230 days
Farmland classification: Not prime farmland

Map Unit Composition

Kimbrough and similar soils: 55 percent
Slaughter and similar soils: 20 percent
Stegall and similar soils: 20 percent
Minor components: 5 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Kimbrough

Setting

Landform: Ridges, plains
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Crest, rise
Down-slope shape: Convex
Across-slope shape: Convex
Parent material: Mixed alluvium and/or eolian deposits derived from sedimentary rock

Typical profile

H1 - 0 to 11 inches: gravelly fine sandy loam
H2 - 11 to 19 inches: cemented material
H3 - 19 to 60 inches: very gravelly loam

Properties and qualities

Slope: 0 to 3 percent
Depth to restrictive feature: 4 to 20 inches to petrocalcic
Drainage class: Well drained
Runoff class: Medium
Capacity of the most limiting layer to transmit water (Ksat): Low to moderately high (0.01 to 0.60 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 80 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Sodium adsorption ratio, maximum: 2.0
Available water supply, 0 to 60 inches: Very low (about 1.1 inches)

Interpretive groups

Land capability classification (irrigated): None specified
Land capability classification (nonirrigated): 7s
Hydrologic Soil Group: D
Ecological site: R077DY049TX - Very Shallow 12-17" PZ

Hydric soil rating: No

Description of Stegall

Setting

Landform: Plains
Landform position (three-dimensional): Rise
Down-slope shape: Convex
Across-slope shape: Convex
Parent material: Mixed alluvium and/or eolian deposits derived from sedimentary rock

Typical profile

H1 - 0 to 3 inches: loam
H2 - 3 to 35 inches: clay loam
H3 - 35 to 43 inches: cemented material
H4 - 43 to 60 inches: variable

Properties and qualities

Slope: 0 to 1 percent
Depth to restrictive feature: 31 to 60 inches to petrocalcic
Drainage class: Well drained
Runoff class: Low
Capacity of the most limiting layer to transmit water (Ksat): Low to moderately high (0.01 to 0.60 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 90 percent
Gypsum, maximum content: 6 percent
Maximum salinity: Very slightly saline to slightly saline (2.0 to 4.0 mmhos/cm)
Sodium adsorption ratio, maximum: 4.0
Available water supply, 0 to 60 inches: Low (about 6.0 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: C
Ecological site: R077CY028TX - Limy Upland 16-21" PZ
Hydric soil rating: No

Description of Slaughter

Setting

Landform: Plains
Landform position (three-dimensional): Rise
Down-slope shape: Convex
Across-slope shape: Convex
Parent material: Mixed alluvium and/or eolian deposits derived from sedimentary rock

Typical profile

H1 - 0 to 3 inches: loam
H2 - 3 to 14 inches: clay loam
H3 - 14 to 20 inches: cemented material
H4 - 20 to 60 inches: variable

Properties and qualities

Slope: 0 to 1 percent
Depth to restrictive feature: 9 to 20 inches to petrocalcic
Drainage class: Well drained
Runoff class: Low
Capacity of the most limiting layer to transmit water (Ksat): Low to moderately high (0.01 to 0.60 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 5 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Sodium adsorption ratio, maximum: 2.0
Available water supply, 0 to 60 inches: Very low (about 2.3 inches)

Interpretive groups

Land capability classification (irrigated): 4s
Land capability classification (nonirrigated): 4s
Hydrologic Soil Group: D
Ecological site: R077CY028TX - Limy Upland 16-21" PZ
Hydric soil rating: No

Minor Components

Sharvana

Percent of map unit: 4 percent
Ecological site: R077CY035TX - Sandy 16-21" PZ
Hydric soil rating: No

Playa

Percent of map unit: 1 percent
Landform: Flood-plain playas
Landform position (three-dimensional): Dip, talf
Down-slope shape: Concave
Across-slope shape: Concave
Ecological site: R042XC017NM - Bottomland
Hydric soil rating: Yes

APPENDIX III

C-141 Forms

NMOCD Correspondence

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	nAPP2109642047
District RP	
Facility ID	
Application ID	

Release Notification

Responsible Party

Responsible Party: Chevron USA Inc	OGRID: 4323
Contact Name: Amy Barnhill	Contact Telephone: 432-687-7108
Contact email: ABarnhill@chevron.com	Incident # *nAPP2109642047*
Contact mailing address: 6301 Deauville Blvd Midland, Tx 79706	

Location of Release Source

Latitude 33.0319 Longitude -103.8011
(NAD 83 in decimal degrees to 5 decimal places)

Site Name: Perseus Central Battery	Site Type: Oil
Date Release Discovered: 3-27-21	API# *(if applicable)*

Unit Letter	Section	Township	Range	County
H	10	15S	31E	Chaves

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): 20.64	Volume Recovered (bbls): 20
☐ 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: Heater firetube gasket failed at the top of firetube flange area. Vac truck picked up ~20bbls oil from inside berm area. FS- shut in well, isolated heater treater, called for vac truck and made notifications.

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 not 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: Amy Barnhill_____ Title: Water Specialist_____

Signature: _____ Date: 4-6-21_____

email: ABarnhill@chevron.com_____ Telephone: 432-687-7108

OCD Only

Received by: _____ Date: _____

Spill Calculations

Incident Date			3/27/2021		
Incident Time			Start Time	End Time	
			8:20am	12:36 PM	
Location	Persues CB Heater				
Lat/Long	33.0319,-103.8011				
All volumes in following table in barrels					
Area	Standing Liquid	In Soil	dimensions / shape	Oil Volume	Water Volume
1		x	31'x23'x3/8"	0.57	0
2		x	35'x20'x3/8"	0.39	0
3	x		39'x17'x2"	19.68	0
4					
5					
6					
7					
8					
			Total Fluid	20.64	0

State of New Mexico
Oil Conservation Division

Incident ID	nAPP2109642047
District RP	
Facility ID	30-005-29137
Application ID	

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?	>55 (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
Page 4

State of New Mexico
Oil Conservation Division

Incident ID	nAPP2109642047
District RP	
Facility ID	30-005-29137
Application ID	

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: Blake Morphew

Title: managing member

Signature: _____

Date: 06/16/2022

email: blake@bampermian.com

Telephone: 432-242-8851

OCD Only

Received by: _____

Date: _____

Form C-141
Page 5

State of New Mexico
Oil Conservation Division

Incident ID	nAPP2109642047
District RP	
Facility ID	30-005-29137
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 site map 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: Blake Morphew
Title: managing member

Signature: _____
Date: 06/16/2022

email: blake@bampermian.com
Telephone: 432-242-8851

OCD Only

Received by: _____ Date: _____

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

Signature: _____ Date: _____

APPENDIX IV

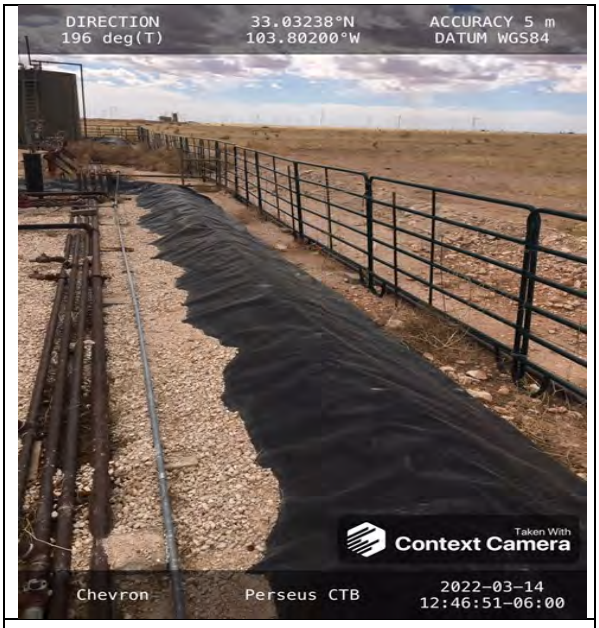
Photographic Documentation

Photograph No.1 Description:

View of well sign.

Photograph No.2 Description:

View of release area in containment on western portion of the well pad.



Photograph No.3 Description:

View of release area and adjacent pasture on western portion of well pad.

Photograph No.4 Description:

View of completed temporary well on northern portion of well pad.

APPENDIX V

Site Assessment Data

Larson and Associates, Inc.

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	nAPP2109642047
District RP	
Facility ID	
Application ID	

Release Notification

Responsible Party

Responsible Party: Chevron USA Inc	OGRID: 4323
Contact Name: Amy Barnhill	Contact Telephone: 432-687-7108
Contact email: ABarnhill@chevron.com	Incident # *nAPP2109642047*
Contact mailing address: 6301 Deauville Blvd Midland, Tx 79706	

Location of Release Source

Latitude 33.0319 Longitude -103.8011
(NAD 83 in decimal degrees to 5 decimal places)

Site Name: Perseus Central Battery	Site Type: Oil
Date Release Discovered: 3-27-21	API# *(if applicable)*

Unit Letter	Section	Township	Range	County
H	10	15S	31E	Chaves

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): 20.64	Volume Recovered (bbls): 20
☐ 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: Heater firetube gasket failed at the top of firetube flange area. Vac truck picked up ~20bbls oil from inside berm area. FS- shut in well, isolated heater treater, called for vac truck and made notifications.

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 not 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: Amy Barnhill_____ Title: Water Specialist_____

Signature: _____ Date: 4-6-21_____

email: ABarnhill@chevron.com_____ Telephone: 432-687-7108

OCD Only

Received by: _____ Date: _____

Spill Calculations

Incident Date			3/27/2021		
Incident Time			Start Time	End Time	
			8:20am	12:36 PM	
Location	Persues CB Heater				
Lat/Long	33.0319,-103.8011				
All volumes in following table in barrels					
Area	Standing Liquid	In Soil	dimensions / shape	Oil Volume	Water Volume
1		x	31'x23'x3/8"	0.57	0
2		x	35'x20'x3/8"	0.39	0
3	x		39'x17'x2"	19.68	0
4					
5					
6					
7					
8					
			Total Fluid	20.64	0

eurofins | Environment Testing America

ANALYTICAL REPORT

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

Laboratory Job ID: 880-2126-1
Laboratory Sample Delivery Group: 21-0100-21
Client Project/Site: PERSEUS CTB

For:
Larson & Associates, Inc.
507 N Marienfeld
Suite 202
Midland, Texas 79701

Attn: Mr. Mark J Larson

Authorized for release by:
5/17/2021 11:52:45 AM
Jamie Herman, Client Program Manager
(303)941-7857
jamie.herman@eurofinset.com

Designee for

Holly Taylor, Project Manager
(806)794-1296
holly.taylor@eurofinset.com

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.

Table of Contents

Definitions/Glossary

Client: Larson & Associates, Inc. Job ID: 880-2126-1
Project/Site: PERSEUS CTB SDG: 21-0100-21

Qualifiers

GC VOA

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

Case Narrative

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Job ID: 880-2126-1

Laboratory: Eurofins Xenco, Midland

Narrative

Job Narrative
880-2126-1

Receipt
The samples were received on 5/12/2021 3:30 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 0.5°C

GC VOA
Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-3024 and analytical batch 880-3036 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 880-3037 and analytical batch 880-3006 recovered outside control limits for the following analytes: Gasoline Range Organics (GRO)-C6-C10.

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: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-1 0.5'

Lab Sample ID: 880-2126-1
Matrix: Solid

Date Collected: 05/11/21 12:00
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U F1	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:36	1
Toluene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:36	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:36	1
m-Xylene & p-Xylene	<0.00401	U	0.00401		mg/Kg		05/12/21 15:57	05/12/21 19:36	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:36	1
Xylenes, Total	<0.00401	U	0.00401		mg/Kg		05/12/21 15:57	05/12/21 19:36	1
Total BTEX	<0.00401	U	0.00401		mg/Kg		05/12/21 15:57	05/12/21 19:36	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*108*		*70 - 130*	*05/12/21 15:57*	*05/12/21 19:36*	*1*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*	*05/12/21 15:57*	*05/12/21 19:36*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.7	U *1	49.7		mg/Kg		05/12/21 16:07	05/12/21 20:47	1
Diesel Range Organics (Over C10-C28)	<49.7	U	49.7		mg/Kg		05/12/21 16:07	05/12/21 20:47	1
Oil Range Organics (Over C28-C36)	<49.7	U	49.7		mg/Kg		05/12/21 16:07	05/12/21 20:47	1
Total TPH	<49.7	U	49.7		mg/Kg		05/12/21 16:07	05/12/21 20:47	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*89*		*70 - 130*	*05/12/21 16:07*	*05/12/21 20:47*	*1*
o-Terphenyl	*100*		*70 - 130*	*05/12/21 16:07*	*05/12/21 20:47*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**11600**		99.2		mg/Kg			05/14/21 10:55	20

Client Sample ID: S-1 1'

Lab Sample ID: 880-2126-2
Matrix: Solid

Date Collected: 05/11/21 12:05
Date Received: 05/12/21 15:30
Sample Depth: 1'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:57	1
Toluene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:57	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:57	1
m-Xylene & p-Xylene	<0.00399	U	0.00399		mg/Kg		05/12/21 15:57	05/12/21 19:57	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:57	1
Xylenes, Total	<0.00399	U	0.00399		mg/Kg		05/12/21 15:57	05/12/21 19:57	1
Total BTEX	<0.00399	U	0.00399		mg/Kg		05/12/21 15:57	05/12/21 19:57	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*113*		*70 - 130*	*05/12/21 15:57*	*05/12/21 19:57*	*1*
1,4-Difluorobenzene (Surr)	*102*		*70 - 130*	*05/12/21 15:57*	*05/12/21 19:57*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-1 1'

Lab Sample ID: 880-2126-2
Matrix: Solid
Date Collected: 05/11/21 12:05
Date Received: 05/12/21 15:30
Sample Depth: 1'

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U *1	50.0		mg/Kg		05/12/21 16:07	05/12/21 21:49	1
Diesel Range Organics (Over C10-C28)	**116**		50.0		mg/Kg		05/12/21 16:07	05/12/21 21:49	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/12/21 21:49	1
Total TPH	**116**		50.0		mg/Kg		05/12/21 16:07	05/12/21 21:49	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*80*		*70 - 130*	*05/12/21 16:07*	*05/12/21 21:49*	*1*
o-Terphenyl	*89*		*70 - 130*	*05/12/21 16:07*	*05/12/21 21:49*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**4150**		25.0		mg/Kg			05/13/21 19:22	5

Client Sample ID: S-2 0.5'

Lab Sample ID: 880-2126-3
Matrix: Solid
Date Collected: 05/11/21 12:10
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/12/21 20:17	1
Toluene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/12/21 20:17	1
Ethylbenzene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/12/21 20:17	1
m-Xylene & p-Xylene	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/12/21 20:17	1
o-Xylene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/12/21 20:17	1
Xylenes, Total	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/12/21 20:17	1
Total BTEX	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/12/21 20:17	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*116*		*70 - 130*	*05/12/21 15:57*	*05/12/21 20:17*	*1*
1,4-Difluorobenzene (Surr)	*103*		*70 - 130*	*05/12/21 15:57*	*05/12/21 20:17*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.8	U *1	49.8		mg/Kg		05/12/21 16:07	05/12/21 22:10	1
Diesel Range Organics (Over C10-C28)	<49.8	U	49.8		mg/Kg		05/12/21 16:07	05/12/21 22:10	1
Oil Range Organics (Over C28-C36)	<49.8	U	49.8		mg/Kg		05/12/21 16:07	05/12/21 22:10	1
Total TPH	<49.8	U	49.8		mg/Kg		05/12/21 16:07	05/12/21 22:10	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*76*		*70 - 130*	*05/12/21 16:07*	*05/12/21 22:10*	*1*
o-Terphenyl	*85*		*70 - 130*	*05/12/21 16:07*	*05/12/21 22:10*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**5790**		50.0		mg/Kg			05/13/21 19:28	10

Eurofins Xenco, Midland

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-2 1'

Lab Sample ID: 880-2126-4
Matrix: Solid
Date Collected: 05/11/21 12:15
Date Received: 05/12/21 15:30
Sample Depth: 1'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/12/21 20:38	1
Toluene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/12/21 20:38	1
Ethylbenzene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/12/21 20:38	1
m-Xylene & p-Xylene	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/12/21 20:38	1
o-Xylene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/12/21 20:38	1
Xylenes, Total	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/12/21 20:38	1
Total BTEX	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/12/21 20:38	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*113*		*70 - 130*	*05/12/21 15:57*	*05/12/21 20:38*	*1*
1,4-Difluorobenzene (Surr)	*100*		*70 - 130*	*05/12/21 15:57*	*05/12/21 20:38*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U *1	50.0		mg/Kg		05/12/21 16:07	05/12/21 22:31	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/12/21 22:31	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/12/21 22:31	1
Total TPH	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/12/21 22:31	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*77*		*70 - 130*	*05/12/21 16:07*	*05/12/21 22:31*	*1*
o-Terphenyl	*86*		*70 - 130*	*05/12/21 16:07*	*05/12/21 22:31*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**3300**		25.0		mg/Kg			05/13/21 19:33	5

Client Sample ID: S-3 0.5'

Lab Sample ID: 880-2126-5
Matrix: Solid
Date Collected: 05/11/21 12:20
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 20:58	1
Toluene	**0.0161**		0.00200		mg/Kg		05/12/21 15:57	05/12/21 20:58	1
Ethylbenzene	**0.181**		0.00200		mg/Kg		05/12/21 15:57	05/12/21 20:58	1
m-Xylene & p-Xylene	**0.183**		0.00399		mg/Kg		05/12/21 15:57	05/12/21 20:58	1
o-Xylene	**0.136**		0.00200		mg/Kg		05/12/21 15:57	05/12/21 20:58	1
Xylenes, Total	**0.319**		0.00399		mg/Kg		05/12/21 15:57	05/12/21 20:58	1
Total BTEX	**0.516**		0.00399		mg/Kg		05/12/21 15:57	05/12/21 20:58	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*107*		*70 - 130*	*05/12/21 15:57*	*05/12/21 20:58*	*1*
1,4-Difluorobenzene (Surr)	*91*		*70 - 130*	*05/12/21 15:57*	*05/12/21 20:58*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-3 0.5'

Lab Sample ID: 880-2126-5
Matrix: Solid
Date Collected: 05/11/21 12:20
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	89.8	*1	49.9		mg/Kg		05/12/21 16:07	05/12/21 22:59	1
Diesel Range Organics (Over C10-C28)	1930		49.9		mg/Kg		05/12/21 16:07	05/12/21 22:59	1
Oil Range Organics (Over C28-C36)	257		49.9		mg/Kg		05/12/21 16:07	05/12/21 22:59	1
Total TPH	2280		49.9		mg/Kg		05/12/21 16:07	05/12/21 22:59	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*81*		*70 - 130*	*05/12/21 16:07*	*05/12/21 22:59*	*1*
o-Terphenyl	*88*		*70 - 130*	*05/12/21 16:07*	*05/12/21 22:59*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	714		5.04		mg/Kg			05/13/21 19:48	1

Client Sample ID: S-3 1'

Lab Sample ID: 880-2126-6
Matrix: Solid
Date Collected: 05/11/21 12:22
Date Received: 05/12/21 15:30
Sample Depth: 1'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 21:19	1
Toluene	0.0112		0.00200		mg/Kg		05/12/21 15:57	05/12/21 21:19	1
Ethylbenzene	0.140		0.00200		mg/Kg		05/12/21 15:57	05/12/21 21:19	1
m-Xylene & p-Xylene	0.134		0.00401		mg/Kg		05/12/21 15:57	05/12/21 21:19	1
o-Xylene	0.108		0.00200		mg/Kg		05/12/21 15:57	05/12/21 21:19	1
Xylenes, Total	0.242		0.00401		mg/Kg		05/12/21 15:57	05/12/21 21:19	1
Total BTEX	0.393		0.00401		mg/Kg		05/12/21 15:57	05/12/21 21:19	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*181*	*S1+*	*70 - 130*	*05/12/21 15:57*	*05/12/21 21:19*	*1*
1,4-Difluorobenzene (Surr)	*79*		*70 - 130*	*05/12/21 15:57*	*05/12/21 21:19*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	63.2	*1	49.8		mg/Kg		05/12/21 16:07	05/12/21 23:30	1
Diesel Range Organics (Over C10-C28)	1650		49.8		mg/Kg		05/12/21 16:07	05/12/21 23:30	1
Oil Range Organics (Over C28-C36)	218		49.8		mg/Kg		05/12/21 16:07	05/12/21 23:30	1
Total TPH	1930		49.8		mg/Kg		05/12/21 16:07	05/12/21 23:30	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*84*		*70 - 130*	*05/12/21 16:07*	*05/12/21 23:30*	*1*
o-Terphenyl	*91*		*70 - 130*	*05/12/21 16:07*	*05/12/21 23:30*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	687		5.05		mg/Kg			05/13/21 19:53	1

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-4 0.5'

Lab Sample ID: 880-2126-7
Matrix: Solid
Date Collected: 05/11/21 12:25
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00201	U	0.00201		mg/Kg		05/12/21 15:57	05/12/21 21:39	1
Toluene	<0.00201	U	0.00201		mg/Kg		05/12/21 15:57	05/12/21 21:39	1
Ethylbenzene	**0.00415**		0.00201		mg/Kg		05/12/21 15:57	05/12/21 21:39	1
m-Xylene & p-Xylene	<0.00402	U	0.00402		mg/Kg		05/12/21 15:57	05/12/21 21:39	1
o-Xylene	**0.0147**		0.00201		mg/Kg		05/12/21 15:57	05/12/21 21:39	1
Xylenes, Total	**0.0147**		0.00402		mg/Kg		05/12/21 15:57	05/12/21 21:39	1
Total BTEX	**0.0189**		0.00402		mg/Kg		05/12/21 15:57	05/12/21 21:39	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*101*		*70 - 130*	*05/12/21 15:57*	*05/12/21 21:39*	*1*
1,4-Difluorobenzene (Surr)	*89*		*70 - 130*	*05/12/21 15:57*	*05/12/21 21:39*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.7	U *1	49.7		mg/Kg		05/12/21 16:07	05/13/21 00:02	1
Diesel Range Organics (Over C10-C28)	**366**		49.7		mg/Kg		05/12/21 16:07	05/13/21 00:02	1
Oil Range Organics (Over C28-C36)	<49.7	U	49.7		mg/Kg		05/12/21 16:07	05/13/21 00:02	1
Total TPH	**366**		49.7		mg/Kg		05/12/21 16:07	05/13/21 00:02	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*86*		*70 - 130*	*05/12/21 16:07*	*05/13/21 00:02*	*1*
o-Terphenyl	*97*		*70 - 130*	*05/12/21 16:07*	*05/13/21 00:02*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**48.3**		4.98		mg/Kg			05/13/21 19:59	1

Client Sample ID: S-4 1'

Lab Sample ID: 880-2126-8
Matrix: Solid
Date Collected: 05/11/21 12:27
Date Received: 05/12/21 15:30
Sample Depth: 1'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00201	U	0.00201		mg/Kg		05/12/21 15:57	05/12/21 21:59	1
Toluene	<0.00201	U	0.00201		mg/Kg		05/12/21 15:57	05/12/21 21:59	1
Ethylbenzene	<0.00201	U	0.00201		mg/Kg		05/12/21 15:57	05/12/21 21:59	1
m-Xylene & p-Xylene	<0.00402	U	0.00402		mg/Kg		05/12/21 15:57	05/12/21 21:59	1
o-Xylene	**0.00488**		0.00201		mg/Kg		05/12/21 15:57	05/12/21 21:59	1
Xylenes, Total	**0.00488**		0.00402		mg/Kg		05/12/21 15:57	05/12/21 21:59	1
Total BTEX	**0.00488**		0.00402		mg/Kg		05/12/21 15:57	05/12/21 21:59	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*152*	*S1+*	*70 - 130*	*05/12/21 15:57*	*05/12/21 21:59*	*1*
1,4-Difluorobenzene (Surr)	*100*		*70 - 130*	*05/12/21 15:57*	*05/12/21 21:59*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-4 1'

Lab Sample ID: 880-2126-8
Matrix: Solid
Date Collected: 05/11/21 12:27
Date Received: 05/12/21 15:30
Sample Depth: 1'

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U *1	49.9		mg/Kg		05/12/21 16:07	05/13/21 00:23	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 00:23	1
Oil Range Organics (Over C28-C36)	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 00:23	1
Total TPH	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 00:23	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*85*		*70 - 130*	*05/12/21 16:07*	*05/13/21 00:23*	*1*
o-Terphenyl	*96*		*70 - 130*	*05/12/21 16:07*	*05/13/21 00:23*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**36.8**		4.97		mg/Kg			05/13/21 20:04	1

Client Sample ID: S-5 0.5'

Lab Sample ID: 880-2126-9
Matrix: Solid
Date Collected: 05/11/21 12:30
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/12/21 22:20	1
Toluene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/12/21 22:20	1
Ethylbenzene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/12/21 22:20	1
m-Xylene & p-Xylene	<0.00403	U	0.00403		mg/Kg		05/12/21 15:57	05/12/21 22:20	1
o-Xylene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/12/21 22:20	1
Xylenes, Total	<0.00403	U	0.00403		mg/Kg		05/12/21 15:57	05/12/21 22:20	1
Total BTEX	<0.00403	U	0.00403		mg/Kg		05/12/21 15:57	05/12/21 22:20	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*116*		*70 - 130*	*05/12/21 15:57*	*05/12/21 22:20*	*1*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*	*05/12/21 15:57*	*05/12/21 22:20*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U *1	50.0		mg/Kg		05/12/21 16:07	05/13/21 00:44	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 00:44	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 00:44	1
Total TPH	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 00:44	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*78*		*70 - 130*	*05/12/21 16:07*	*05/13/21 00:44*	*1*
o-Terphenyl	*88*		*70 - 130*	*05/12/21 16:07*	*05/13/21 00:44*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**5.14**		4.99		mg/Kg			05/13/21 20:09	1

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-5 1'

Lab Sample ID: 880-2126-10
Matrix: Solid
Date Collected: 05/11/21 12:32
Date Received: 05/12/21 15:30
Sample Depth: 1'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/12/21 22:40	1
Toluene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/12/21 22:40	1
Ethylbenzene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/12/21 22:40	1
m-Xylene & p-Xylene	<0.00404	U	0.00404		mg/Kg		05/12/21 15:57	05/12/21 22:40	1
o-Xylene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/12/21 22:40	1
Xylenes, Total	<0.00404	U	0.00404		mg/Kg		05/12/21 15:57	05/12/21 22:40	1
Total BTEX	<0.00404	U	0.00404		mg/Kg		05/12/21 15:57	05/12/21 22:40	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*110*		*70 - 130*	*05/12/21 15:57*	*05/12/21 22:40*	*1*
1,4-Difluorobenzene (Surr)	*100*		*70 - 130*	*05/12/21 15:57*	*05/12/21 22:40*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.8	U *1	49.8		mg/Kg		05/12/21 16:07	05/13/21 01:04	1
Diesel Range Organics (Over C10-C28)	<49.8	U	49.8		mg/Kg		05/12/21 16:07	05/13/21 01:04	1
Oil Range Organics (Over C28-C36)	<49.8	U	49.8		mg/Kg		05/12/21 16:07	05/13/21 01:04	1
Total TPH	<49.8	U	49.8		mg/Kg		05/12/21 16:07	05/13/21 01:04	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*77*		*70 - 130*	*05/12/21 16:07*	*05/13/21 01:04*	*1*
o-Terphenyl	*88*		*70 - 130*	*05/12/21 16:07*	*05/13/21 01:04*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.02	U	5.02		mg/Kg			05/13/21 20:14	1

Client Sample ID: S-6 0.5'

Lab Sample ID: 880-2126-11
Matrix: Solid
Date Collected: 05/11/21 12:35
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/13/21 00:30	1
Toluene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/13/21 00:30	1
Ethylbenzene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/13/21 00:30	1
m-Xylene & p-Xylene	<0.00404	U	0.00404		mg/Kg		05/12/21 15:57	05/13/21 00:30	1
o-Xylene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/13/21 00:30	1
Xylenes, Total	<0.00404	U	0.00404		mg/Kg		05/12/21 15:57	05/13/21 00:30	1
Total BTEX	<0.00404	U	0.00404		mg/Kg		05/12/21 15:57	05/13/21 00:30	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*108*		*70 - 130*	*05/12/21 15:57*	*05/13/21 00:30*	*1*
1,4-Difluorobenzene (Surr)	*97*		*70 - 130*	*05/12/21 15:57*	*05/13/21 00:30*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-6 0.5'

Lab Sample ID: 880-2126-11
Matrix: Solid
Date Collected: 05/11/21 12:35
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U *1	49.9		mg/Kg		05/12/21 16:07	05/13/21 01:46	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 01:46	1
Oil Range Organics (Over C28-C36)	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 01:46	1
Total TPH	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 01:46	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*79*		*70 - 130*	*05/12/21 16:07*	*05/13/21 01:46*	*1*
o-Terphenyl	*89*		*70 - 130*	*05/12/21 16:07*	*05/13/21 01:46*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.00	U	5.00		mg/Kg			05/14/21 11:10	1

Client Sample ID: S-6 1'

Lab Sample ID: 880-2126-12
Matrix: Solid
Date Collected: 05/11/21 12:37
Date Received: 05/12/21 15:30
Sample Depth: 1'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/13/21 00:50	1
Toluene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/13/21 00:50	1
Ethylbenzene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/13/21 00:50	1
m-Xylene & p-Xylene	<0.00403	U	0.00403		mg/Kg		05/12/21 15:57	05/13/21 00:50	1
o-Xylene	<0.00202	U	0.00202		mg/Kg		05/12/21 15:57	05/13/21 00:50	1
Xylenes, Total	<0.00403	U	0.00403		mg/Kg		05/12/21 15:57	05/13/21 00:50	1
Total BTEX	<0.00403	U	0.00403		mg/Kg		05/12/21 15:57	05/13/21 00:50	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*134*	*S1+*	*70 - 130*	*05/12/21 15:57*	*05/13/21 00:50*	*1*
1,4-Difluorobenzene (Surr)	*84*		*70 - 130*	*05/12/21 15:57*	*05/13/21 00:50*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U *1	50.0		mg/Kg		05/12/21 16:07	05/13/21 02:07	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 02:07	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 02:07	1
Total TPH	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 02:07	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*77*		*70 - 130*	*05/12/21 16:07*	*05/13/21 02:07*	*1*
o-Terphenyl	*87*		*70 - 130*	*05/12/21 16:07*	*05/13/21 02:07*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**7.45**		5.04		mg/Kg			05/13/21 20:53	1

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-7 0.5'

Lab Sample ID: 880-2126-13
Matrix: Solid
Date Collected: 05/11/21 12:40
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/13/21 01:10	1
Toluene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/13/21 01:10	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/13/21 01:10	1
m-Xylene & p-Xylene	<0.00401	U	0.00401		mg/Kg		05/12/21 15:57	05/13/21 01:10	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/13/21 01:10	1
Xylenes, Total	<0.00401	U	0.00401		mg/Kg		05/12/21 15:57	05/13/21 01:10	1
Total BTEX	<0.00401	U	0.00401		mg/Kg		05/12/21 15:57	05/13/21 01:10	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*134*	*S1+*	*70 - 130*	*05/12/21 15:57*	*05/13/21 01:10*	*1*
1,4-Difluorobenzene (Surr)	*86*		*70 - 130*	*05/12/21 15:57*	*05/13/21 01:10*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U *1	49.9		mg/Kg		05/12/21 16:07	05/13/21 02:27	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 02:27	1
Oil Range Organics (Over C28-C36)	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 02:27	1
Total TPH	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 02:27	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*80*		*70 - 130*	*05/12/21 16:07*	*05/13/21 02:27*	*1*
o-Terphenyl	*89*		*70 - 130*	*05/12/21 16:07*	*05/13/21 02:27*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**19.0**		5.02		mg/Kg			05/13/21 20:59	1

Client Sample ID: S-7 1'

Lab Sample ID: 880-2126-14
Matrix: Solid
Date Collected: 05/11/21 12:42
Date Received: 05/12/21 15:30
Sample Depth: 1'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/13/21 01:31	1
Toluene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/13/21 01:31	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/13/21 01:31	1
m-Xylene & p-Xylene	<0.00399	U	0.00399		mg/Kg		05/12/21 15:57	05/13/21 01:31	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/13/21 01:31	1
Xylenes, Total	<0.00399	U	0.00399		mg/Kg		05/12/21 15:57	05/13/21 01:31	1
Total BTEX	<0.00399	U	0.00399		mg/Kg		05/12/21 15:57	05/13/21 01:31	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*114*		*70 - 130*	*05/12/21 15:57*	*05/13/21 01:31*	*1*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*	*05/12/21 15:57*	*05/13/21 01:31*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-7 1'

Lab Sample ID: 880-2126-14
Matrix: Solid
Date Collected: 05/11/21 12:42
Date Received: 05/12/21 15:30
Sample Depth: 1'

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U *1	49.9		mg/Kg		05/12/21 16:07	05/13/21 02:48	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 02:48	1
Oil Range Organics (Over C28-C36)	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 02:48	1
Total TPH	<49.9	U	49.9		mg/Kg		05/12/21 16:07	05/13/21 02:48	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*79*		*70 - 130*	*05/12/21 16:07*	*05/13/21 02:48*	*1*
o-Terphenyl	*91*		*70 - 130*	*05/12/21 16:07*	*05/13/21 02:48*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**9.01**		4.96		mg/Kg			05/13/21 21:14	1

Client Sample ID: S-8 0.5'

Lab Sample ID: 880-2126-15
Matrix: Solid
Date Collected: 05/11/21 12:48
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/13/21 01:51	1
Toluene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/13/21 01:51	1
Ethylbenzene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/13/21 01:51	1
m-Xylene & p-Xylene	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/13/21 01:51	1
o-Xylene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/13/21 01:51	1
Xylenes, Total	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/13/21 01:51	1
Total BTEX	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/13/21 01:51	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*116*		*70 - 130*	*05/12/21 15:57*	*05/13/21 01:51*	*1*
1,4-Difluorobenzene (Surr)	*96*		*70 - 130*	*05/12/21 15:57*	*05/13/21 01:51*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U *1	50.0		mg/Kg		05/12/21 16:07	05/13/21 03:09	1
Diesel Range Organics (Over C10-C28)	**57.1**		50.0		mg/Kg		05/12/21 16:07	05/13/21 03:09	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 03:09	1
Total TPH	**57.1**		50.0		mg/Kg		05/12/21 16:07	05/13/21 03:09	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*82*		*70 - 130*	*05/12/21 16:07*	*05/13/21 03:09*	*1*
o-Terphenyl	*93*		*70 - 130*	*05/12/21 16:07*	*05/13/21 03:09*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**9720**		49.5		mg/Kg			05/13/21 21:19	10

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-8 1'

Lab Sample ID: 880-2126-16
Matrix: Solid
Date Collected: 05/11/21 12:50
Date Received: 05/12/21 15:30
Sample Depth: 1'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/13/21 02:12	1
Toluene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/13/21 02:12	1
Ethylbenzene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/13/21 02:12	1
m-Xylene & p-Xylene	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/13/21 02:12	1
o-Xylene	<0.00199	U	0.00199		mg/Kg		05/12/21 15:57	05/13/21 02:12	1
Xylenes, Total	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/13/21 02:12	1
Total BTEX	<0.00398	U	0.00398		mg/Kg		05/12/21 15:57	05/13/21 02:12	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*113*		*70 - 130*	*05/12/21 15:57*	*05/13/21 02:12*	*1*
1,4-Difluorobenzene (Surr)	*100*		*70 - 130*	*05/12/21 15:57*	*05/13/21 02:12*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U *1	50.0		mg/Kg		05/12/21 16:07	05/13/21 03:30	1
Diesel Range Organics (Over C10-C28)	**161**		50.0		mg/Kg		05/12/21 16:07	05/13/21 03:30	1
Oil Range Organics (Over C28-C36)	**62.5**		50.0		mg/Kg		05/12/21 16:07	05/13/21 03:30	1
Total TPH	**224**		50.0		mg/Kg		05/12/21 16:07	05/13/21 03:30	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*79*		*70 - 130*	*05/12/21 16:07*	*05/13/21 03:30*	*1*
o-Terphenyl	*89*		*70 - 130*	*05/12/21 16:07*	*05/13/21 03:30*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**5250**		50.4		mg/Kg			05/13/21 21:24	10

Client Sample ID: S-9 0.5'

Lab Sample ID: 880-2126-17
Matrix: Solid
Date Collected: 05/11/21 13:00
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00198	U	0.00198		mg/Kg		05/12/21 15:57	05/13/21 02:32	1
Toluene	<0.00198	U	0.00198		mg/Kg		05/12/21 15:57	05/13/21 02:32	1
Ethylbenzene	<0.00198	U	0.00198		mg/Kg		05/12/21 15:57	05/13/21 02:32	1
m-Xylene & p-Xylene	<0.00397	U	0.00397		mg/Kg		05/12/21 15:57	05/13/21 02:32	1
o-Xylene	<0.00198	U	0.00198		mg/Kg		05/12/21 15:57	05/13/21 02:32	1
Xylenes, Total	<0.00397	U	0.00397		mg/Kg		05/12/21 15:57	05/13/21 02:32	1
Total BTEX	<0.00397	U	0.00397		mg/Kg		05/12/21 15:57	05/13/21 02:32	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*110*		*70 - 130*	*05/12/21 15:57*	*05/13/21 02:32*	*1*
1,4-Difluorobenzene (Surr)	*101*		*70 - 130*	*05/12/21 15:57*	*05/13/21 02:32*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-9 0.5'

Lab Sample ID: 880-2126-17
Matrix: Solid
Date Collected: 05/11/21 13:00
Date Received: 05/12/21 15:30
Sample Depth: 0.5'

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.8	U *1	49.8		mg/Kg		05/12/21 16:07	05/13/21 03:51	1
Diesel Range Organics (Over C10-C28)	<49.8	U	49.8		mg/Kg		05/12/21 16:07	05/13/21 03:51	1
Oil Range Organics (Over C28-C36)	<49.8	U	49.8		mg/Kg		05/12/21 16:07	05/13/21 03:51	1
Total TPH	<49.8	U	49.8		mg/Kg		05/12/21 16:07	05/13/21 03:51	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*76*		*70 - 130*	*05/12/21 16:07*	*05/13/21 03:51*	*1*
o-Terphenyl	*86*		*70 - 130*	*05/12/21 16:07*	*05/13/21 03:51*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<4.99	U	4.99		mg/Kg			05/13/21 21:30	1

Client Sample ID: S-9 1'

Lab Sample ID: 880-2126-18
Matrix: Solid
Date Collected: 05/11/21 13:02
Date Received: 05/12/21 15:30
Sample Depth: 1'

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00198	U	0.00198		mg/Kg		05/12/21 15:57	05/13/21 02:53	1
Toluene	<0.00198	U	0.00198		mg/Kg		05/12/21 15:57	05/13/21 02:53	1
Ethylbenzene	<0.00198	U	0.00198		mg/Kg		05/12/21 15:57	05/13/21 02:53	1
m-Xylene & p-Xylene	<0.00396	U	0.00396		mg/Kg		05/12/21 15:57	05/13/21 02:53	1
o-Xylene	<0.00198	U	0.00198		mg/Kg		05/12/21 15:57	05/13/21 02:53	1
Xylenes, Total	<0.00396	U	0.00396		mg/Kg		05/12/21 15:57	05/13/21 02:53	1
Total BTEX	<0.00396	U	0.00396		mg/Kg		05/12/21 15:57	05/13/21 02:53	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*109*		*70 - 130*	*05/12/21 15:57*	*05/13/21 02:53*	*1*
1,4-Difluorobenzene (Surr)	*101*		*70 - 130*	*05/12/21 15:57*	*05/13/21 02:53*	*1*

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U *1	50.0		mg/Kg		05/12/21 16:07	05/13/21 04:12	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 04:12	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 04:12	1
Total TPH	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/13/21 04:12	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*77*		*70 - 130*	*05/12/21 16:07*	*05/13/21 04:12*	*1*
o-Terphenyl	*87*		*70 - 130*	*05/12/21 16:07*	*05/13/21 04:12*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.00	U	5.00		mg/Kg			05/13/21 21:35	1

Surrogate Summary

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

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)										
880-2126-1	S-1 0.5'	108	99										
880-2126-1 MS	S-1 0.5'	110	99										
880-2126-1 MSD	S-1 0.5'	112	97										
880-2126-2	S-1 1'	113	102										
880-2126-3	S-2 0.5'	116	103										
880-2126-4	S-2 1'	113	100										
880-2126-5	S-3 0.5'	107	91										
880-2126-6	S-3 1'	181 S1+	79										
880-2126-7	S-4 0.5'	101	89										
880-2126-8	S-4 1'	152 S1+	100										
880-2126-9	S-5 0.5'	116	99										
880-2126-10	S-5 1'	110	100										
880-2126-11	S-6 0.5'	108	97										
880-2126-12	S-6 1'	134 S1+	84										
880-2126-13	S-7 0.5'	134 S1+	86										
880-2126-14	S-7 1'	114	99										
880-2126-15	S-8 0.5'	116	96										
880-2126-16	S-8 1'	113	100										
880-2126-17	S-9 0.5'	110	101										
880-2126-18	S-9 1'	109	101										
LCS 880-3024/1-A	Lab Control Sample	101	97										
LCSD 880-3024/2-A	Lab Control Sample Dup	102	99										
MB 880-3024/5-A	Method Blank	106	94										

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)										
880-2126-1	S-1 0.5'	89	100										
880-2126-1 MS	S-1 0.5'	81	83										
880-2126-1 MSD	S-1 0.5'	90	92										
880-2126-2	S-1 1'	80	89										
880-2126-3	S-2 0.5'	76	85										
880-2126-4	S-2 1'	77	86										
880-2126-5	S-3 0.5'	81	88										
880-2126-6	S-3 1'	84	91										
880-2126-7	S-4 0.5'	86	97										
880-2126-8	S-4 1'	85	96										
880-2126-9	S-5 0.5'	78	88										
880-2126-10	S-5 1'	77	88										
880-2126-11	S-6 0.5'	79	89										
880-2126-12	S-6 1'	77	87										
880-2126-13	S-7 0.5'	80	89										
880-2126-14	S-7 1'	79	91										

Surrogate Summary

Client: Larson & Associates, Inc. Job ID: 880-2126-1
Project/Site: PERSEUS CTB SDG: 21-0100-21

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

Matrix: Solid **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)									
		1CO1	OTPH1								
Lab Sample ID	Client Sample ID	(70-130)	(70-130)								
880-2126-15	S-8 0.5'	82	93								
880-2126-16	S-8 1'	79	89								
880-2126-17	S-9 0.5'	76	86								
880-2126-18	S-9 1'	77	87								
LCS 880-3037/2-A	Lab Control Sample	101	109								
LCSD 880-3037/3-A	Lab Control Sample Dup	136 S1+	149 S1+								
MB 880-3037/1-A	Method Blank	92	107								

Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-3024/5-A
Matrix: Solid
Analysis Batch: 3036

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 3024

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:08	1
Toluene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:08	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:08	1
m-Xylene & p-Xylene	<0.00400	U	0.00400		mg/Kg		05/12/21 15:57	05/12/21 19:08	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		05/12/21 15:57	05/12/21 19:08	1
Xylenes, Total	<0.00400	U	0.00400		mg/Kg		05/12/21 15:57	05/12/21 19:08	1
Total BTEX	<0.00400	U	0.00400		mg/Kg		05/12/21 15:57	05/12/21 19:08	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*106*		*70 - 130*	*05/12/21 15:57*	*05/12/21 19:08*	*1*
1,4-Difluorobenzene (Surr)	*94*		*70 - 130*	*05/12/21 15:57*	*05/12/21 19:08*	*1*

Lab Sample ID: LCS 880-3024/1-A
Matrix: Solid
Analysis Batch: 3036

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 3024

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Benzene			0.100	0.08391		mg/Kg		84	70 - 130		
Toluene			0.100	0.09578		mg/Kg		96	70 - 130		
Ethylbenzene			0.100	0.1016		mg/Kg		102	70 - 130		
m-Xylene & p-Xylene			0.200	0.2071		mg/Kg		104	70 - 130		
o-Xylene			0.100	0.1031		mg/Kg		103	70 - 130		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*101*		*70 - 130*
1,4-Difluorobenzene (Surr)	*97*		*70 - 130*

Lab Sample ID: LCSD 880-3024/2-A
Matrix: Solid
Analysis Batch: 3036

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 3024

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene			0.100	0.08288		mg/Kg		83	70 - 130	1	35
Toluene			0.100	0.09568		mg/Kg		96	70 - 130	0	35
Ethylbenzene			0.100	0.1011		mg/Kg		101	70 - 130	1	35
m-Xylene & p-Xylene			0.200	0.2072		mg/Kg		104	70 - 130	0	35
o-Xylene			0.100	0.1047		mg/Kg		105	70 - 130	2	35

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*102*		*70 - 130*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*

Lab Sample ID: 880-2126-1 MS
Matrix: Solid
Analysis Batch: 3036

Client Sample ID: S-1 0.5'
Prep Type: Total/NA
Prep Batch: 3024

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Benzene	<0.00200	U F1	0.101	0.07814		mg/Kg		78	70 - 130		

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

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

Lab Sample ID: 880-2126-1 MS
Matrix: Solid
Analysis Batch: 3036

Client Sample ID: S-1 0.5'
Prep Type: Total/NA
Prep Batch: 3024

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Toluene	<0.00200	U	0.101	0.09201		mg/Kg		91	70 - 130
Ethylbenzene	<0.00200	U	0.101	0.09487		mg/Kg		94	70 - 130
m-Xylene & p-Xylene	<0.00401	U	0.202	0.1948		mg/Kg		97	70 - 130
o-Xylene	<0.00200	U	0.101	0.09805		mg/Kg		97	70 - 130

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*110*		*70 - 130*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*

Lab Sample ID: 880-2126-1 MSD
Matrix: Solid
Analysis Batch: 3036

Client Sample ID: S-1 0.5'
Prep Type: Total/NA
Prep Batch: 3024

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.00200	U F1	0.0998	0.06588	F1	mg/Kg		66	70 - 130	17	35
Toluene	<0.00200	U	0.0998	0.07810		mg/Kg		78	70 - 130	16	35
Ethylbenzene	<0.00200	U	0.0998	0.08049		mg/Kg		81	70 - 130	16	35
m-Xylene & p-Xylene	<0.00401	U	0.200	0.1664		mg/Kg		83	70 - 130	16	35
o-Xylene	<0.00200	U	0.0998	0.08414		mg/Kg		84	70 - 130	15	35

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*112*		*70 - 130*
1,4-Difluorobenzene (Surr)	*97*		*70 - 130*

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

Lab Sample ID: MB 880-3037/1-A
Matrix: Solid
Analysis Batch: 3006

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 3037

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/12/21 19:45	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/12/21 19:45	1
OII Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/12/21 19:45	1
Total TPH	<50.0	U	50.0		mg/Kg		05/12/21 16:07	05/12/21 19:45	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*92*		*70 - 130*	*05/12/21 16:07*	*05/12/21 19:45*	*1*
o-Terphenyl	*107*		*70 - 130*	*05/12/21 16:07*	*05/12/21 19:45*	*1*

Lab Sample ID: LCS 880-3037/2-A
Matrix: Solid
Analysis Batch: 3006

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 3037

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Gasoline Range Organics (GRO)-C6-C10	1000	888.3		mg/Kg		89	70 - 130

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

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

Lab Sample ID: LCS 880-3037/2-A
Matrix: Solid
Analysis Batch: 3006

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 3037

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Diesel Range Organics (Over C10-C28)			1000	1074		mg/Kg		107	70 - 130		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1-Chlorooctane	*101*		*70 - 130*
o-Terphenyl	*109*		*70 - 130*

Lab Sample ID: LCSD 880-3037/3-A
Matrix: Solid
Analysis Batch: 3006

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 3037

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10			1000	1098	*1	mg/Kg		110	70 - 130	21	20
Diesel Range Organics (Over C10-C28)			1000	1285		mg/Kg		129	70 - 130	18	20

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
1-Chlorooctane	*136*	*S1+*	*70 - 130*
o-Terphenyl	*149*	*S1+*	*70 - 130*

Lab Sample ID: 880-2126-1 MS
Matrix: Solid
Analysis Batch: 3006

Client Sample ID: S-1 0.5'
Prep Type: Total/NA
Prep Batch: 3037

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Gasoline Range Organics (GRO)-C6-C10	<49.7	U *1	996	816.6		mg/Kg		77	70 - 130		
Diesel Range Organics (Over C10-C28)	<49.7	U	996	923.2		mg/Kg		90	70 - 130		

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
1-Chlorooctane	*81*		*70 - 130*
o-Terphenyl	*83*		*70 - 130*

Lab Sample ID: 880-2126-1 MSD
Matrix: Solid
Analysis Batch: 3006

Client Sample ID: S-1 0.5'
Prep Type: Total/NA
Prep Batch: 3037

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	<49.7	U *1	998	851.4		mg/Kg		81	70 - 130	4	20
Diesel Range Organics (Over C10-C28)	<49.7	U	998	1036		mg/Kg		101	70 - 130	12	20

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
1-Chlorooctane	*90*		*70 - 130*
o-Terphenyl	*92*		*70 - 130*

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-3054/1-A
Matrix: Solid
Analysis Batch: 3081

Client Sample ID: Method Blank
Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.00	U	5.00		mg/Kg			05/13/21 18:25	1

Lab Sample ID: LCS 880-3054/2-A
Matrix: Solid
Analysis Batch: 3081

Client Sample ID: Lab Control Sample
Prep Type: Soluble

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride			250	247.0		mg/Kg		99	90 - 110		

Lab Sample ID: LCSD 880-3054/3-A
Matrix: Solid
Analysis Batch: 3081

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	244.2		mg/Kg		98	90 - 110	1	20

Lab Sample ID: 880-2126-1 MS
Matrix: Solid
Analysis Batch: 3081

Client Sample ID: S-1 0.5'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride	11600		4960	16360		mg/Kg		95	90 - 110		

Lab Sample ID: 880-2126-1 MSD
Matrix: Solid
Analysis Batch: 3081

Client Sample ID: S-1 0.5'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	11600		4960	16330		mg/Kg		95	90 - 110	0	20

Lab Sample ID: 880-2126-11 MS
Matrix: Solid
Analysis Batch: 3081

Client Sample ID: S-6 0.5'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride	<5.00	U	250	248.4		mg/Kg		98	90 - 110		

Lab Sample ID: 880-2126-11 MSD
Matrix: Solid
Analysis Batch: 3081

Client Sample ID: S-6 0.5'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	<5.00	U	250	246.7		mg/Kg		97	90 - 110	1	20

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

GC VOA

Prep Batch: 3024

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-2126-1	S-1 0.5'	Total/NA	Solid	5035	
880-2126-2	S-1 1'	Total/NA	Solid	5035	
880-2126-3	S-2 0.5'	Total/NA	Solid	5035	
880-2126-4	S-2 1'	Total/NA	Solid	5035	
880-2126-5	S-3 0.5'	Total/NA	Solid	5035	
880-2126-6	S-3 1'	Total/NA	Solid	5035	
880-2126-7	S-4 0.5'	Total/NA	Solid	5035	
880-2126-8	S-4 1'	Total/NA	Solid	5035	
880-2126-9	S-5 0.5'	Total/NA	Solid	5035	
880-2126-10	S-5 1'	Total/NA	Solid	5035	
880-2126-11	S-6 0.5'	Total/NA	Solid	5035	
880-2126-12	S-6 1'	Total/NA	Solid	5035	
880-2126-13	S-7 0.5'	Total/NA	Solid	5035	
880-2126-14	S-7 1'	Total/NA	Solid	5035	
880-2126-15	S-8 0.5'	Total/NA	Solid	5035	
880-2126-16	S-8 1'	Total/NA	Solid	5035	
880-2126-17	S-9 0.5'	Total/NA	Solid	5035	
880-2126-18	S-9 1'	Total/NA	Solid	5035	
MB 880-3024/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-3024/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-3024/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-2126-1 MS	S-1 0.5'	Total/NA	Solid	5035	
880-2126-1 MSD	S-1 0.5'	Total/NA	Solid	5035	

Analysis Batch: 3036

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-2126-1	S-1 0.5'	Total/NA	Solid	8021B	3024
880-2126-2	S-1 1'	Total/NA	Solid	8021B	3024
880-2126-3	S-2 0.5'	Total/NA	Solid	8021B	3024
880-2126-4	S-2 1'	Total/NA	Solid	8021B	3024
880-2126-5	S-3 0.5'	Total/NA	Solid	8021B	3024
880-2126-6	S-3 1'	Total/NA	Solid	8021B	3024
880-2126-7	S-4 0.5'	Total/NA	Solid	8021B	3024
880-2126-8	S-4 1'	Total/NA	Solid	8021B	3024
880-2126-9	S-5 0.5'	Total/NA	Solid	8021B	3024
880-2126-10	S-5 1'	Total/NA	Solid	8021B	3024
880-2126-11	S-6 0.5'	Total/NA	Solid	8021B	3024
880-2126-12	S-6 1'	Total/NA	Solid	8021B	3024
880-2126-13	S-7 0.5'	Total/NA	Solid	8021B	3024
880-2126-14	S-7 1'	Total/NA	Solid	8021B	3024
880-2126-15	S-8 0.5'	Total/NA	Solid	8021B	3024
880-2126-16	S-8 1'	Total/NA	Solid	8021B	3024
880-2126-17	S-9 0.5'	Total/NA	Solid	8021B	3024
880-2126-18	S-9 1'	Total/NA	Solid	8021B	3024
MB 880-3024/5-A	Method Blank	Total/NA	Solid	8021B	3024
LCS 880-3024/1-A	Lab Control Sample	Total/NA	Solid	8021B	3024
LCSD 880-3024/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	3024
880-2126-1 MS	S-1 0.5'	Total/NA	Solid	8021B	3024
880-2126-1 MSD	S-1 0.5'	Total/NA	Solid	8021B	3024

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

GC Semi VOA

Analysis Batch: 3006

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-2126-1	S-1 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-2	S-1 1'	Total/NA	Solid	8015B NM	3037
880-2126-3	S-2 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-4	S-2 1'	Total/NA	Solid	8015B NM	3037
880-2126-5	S-3 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-6	S-3 1'	Total/NA	Solid	8015B NM	3037
880-2126-7	S-4 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-8	S-4 1'	Total/NA	Solid	8015B NM	3037
880-2126-9	S-5 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-10	S-5 1'	Total/NA	Solid	8015B NM	3037
880-2126-11	S-6 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-12	S-6 1'	Total/NA	Solid	8015B NM	3037
880-2126-13	S-7 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-14	S-7 1'	Total/NA	Solid	8015B NM	3037
880-2126-15	S-8 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-16	S-8 1'	Total/NA	Solid	8015B NM	3037
880-2126-17	S-9 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-18	S-9 1'	Total/NA	Solid	8015B NM	3037
MB 880-3037/1-A	Method Blank	Total/NA	Solid	8015B NM	3037
LCS 880-3037/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	3037
LCSD 880-3037/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	3037
880-2126-1 MS	S-1 0.5'	Total/NA	Solid	8015B NM	3037
880-2126-1 MSD	S-1 0.5'	Total/NA	Solid	8015B NM	3037

Prep Batch: 3037

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-2126-1	S-1 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-2	S-1 1'	Total/NA	Solid	8015NM Prep	
880-2126-3	S-2 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-4	S-2 1'	Total/NA	Solid	8015NM Prep	
880-2126-5	S-3 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-6	S-3 1'	Total/NA	Solid	8015NM Prep	
880-2126-7	S-4 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-8	S-4 1'	Total/NA	Solid	8015NM Prep	
880-2126-9	S-5 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-10	S-5 1'	Total/NA	Solid	8015NM Prep	
880-2126-11	S-6 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-12	S-6 1'	Total/NA	Solid	8015NM Prep	
880-2126-13	S-7 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-14	S-7 1'	Total/NA	Solid	8015NM Prep	
880-2126-15	S-8 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-16	S-8 1'	Total/NA	Solid	8015NM Prep	
880-2126-17	S-9 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-18	S-9 1'	Total/NA	Solid	8015NM Prep	
MB 880-3037/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-3037/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-3037/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-2126-1 MS	S-1 0.5'	Total/NA	Solid	8015NM Prep	
880-2126-1 MSD	S-1 0.5'	Total/NA	Solid	8015NM Prep	

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

HPLC/IC

Leach Batch: 3054

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-2126-1	S-1 0.5'	Soluble	Solid	DI Leach	
880-2126-2	S-1 1'	Soluble	Solid	DI Leach	
880-2126-3	S-2 0.5'	Soluble	Solid	DI Leach	
880-2126-4	S-2 1'	Soluble	Solid	DI Leach	
880-2126-5	S-3 0.5'	Soluble	Solid	DI Leach	
880-2126-6	S-3 1'	Soluble	Solid	DI Leach	
880-2126-7	S-4 0.5'	Soluble	Solid	DI Leach	
880-2126-8	S-4 1'	Soluble	Solid	DI Leach	
880-2126-9	S-5 0.5'	Soluble	Solid	DI Leach	
880-2126-10	S-5 1'	Soluble	Solid	DI Leach	
880-2126-11	S-6 0.5'	Soluble	Solid	DI Leach	
880-2126-12	S-6 1'	Soluble	Solid	DI Leach	
880-2126-13	S-7 0.5'	Soluble	Solid	DI Leach	
880-2126-14	S-7 1'	Soluble	Solid	DI Leach	
880-2126-15	S-8 0.5'	Soluble	Solid	DI Leach	
880-2126-16	S-8 1'	Soluble	Solid	DI Leach	
880-2126-17	S-9 0.5'	Soluble	Solid	DI Leach	
880-2126-18	S-9 1'	Soluble	Solid	DI Leach	
MB 880-3054/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-3054/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-3054/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-2126-1 MS	S-1 0.5'	Soluble	Solid	DI Leach	
880-2126-1 MSD	S-1 0.5'	Soluble	Solid	DI Leach	
880-2126-11 MS	S-6 0.5'	Soluble	Solid	DI Leach	
880-2126-11 MSD	S-6 0.5'	Soluble	Solid	DI Leach	

Analysis Batch: 3081

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-2126-1	S-1 0.5'	Soluble	Solid	300.0	3054
880-2126-2	S-1 1'	Soluble	Solid	300.0	3054
880-2126-3	S-2 0.5'	Soluble	Solid	300.0	3054
880-2126-4	S-2 1'	Soluble	Solid	300.0	3054
880-2126-5	S-3 0.5'	Soluble	Solid	300.0	3054
880-2126-6	S-3 1'	Soluble	Solid	300.0	3054
880-2126-7	S-4 0.5'	Soluble	Solid	300.0	3054
880-2126-8	S-4 1'	Soluble	Solid	300.0	3054
880-2126-9	S-5 0.5'	Soluble	Solid	300.0	3054
880-2126-10	S-5 1'	Soluble	Solid	300.0	3054
880-2126-11	S-6 0.5'	Soluble	Solid	300.0	3054
880-2126-12	S-6 1'	Soluble	Solid	300.0	3054
880-2126-13	S-7 0.5'	Soluble	Solid	300.0	3054
880-2126-14	S-7 1'	Soluble	Solid	300.0	3054
880-2126-15	S-8 0.5'	Soluble	Solid	300.0	3054
880-2126-16	S-8 1'	Soluble	Solid	300.0	3054
880-2126-17	S-9 0.5'	Soluble	Solid	300.0	3054
880-2126-18	S-9 1'	Soluble	Solid	300.0	3054
MB 880-3054/1-A	Method Blank	Soluble	Solid	300.0	3054
LCS 880-3054/2-A	Lab Control Sample	Soluble	Solid	300.0	3054
LCSD 880-3054/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	3054
880-2126-1 MS	S-1 0.5'	Soluble	Solid	300.0	3054
880-2126-1 MSD	S-1 0.5'	Soluble	Solid	300.0	3054

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

HPLC/IC (Continued)

Analysis Batch: 3081 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-2126-11 MS	S-6 0.5'	Soluble	Solid	300.0	3054
880-2126-11 MSD	S-6 0.5'	Soluble	Solid	300.0	3054

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-1 0.5'

Lab Sample ID: 880-2126-1
Matrix: Solid
Date Collected: 05/11/21 12:00
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 19:36	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/12/21 20:47	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		20	3081	05/14/21 10:55	SC	XM

Client Sample ID: S-1 1'

Lab Sample ID: 880-2126-2
Matrix: Solid
Date Collected: 05/11/21 12:05
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 19:57	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/12/21 21:49	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		5	3081	05/13/21 19:22	SC	XM

Client Sample ID: S-2 0.5'

Lab Sample ID: 880-2126-3
Matrix: Solid
Date Collected: 05/11/21 12:10
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 20:17	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/12/21 22:10	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		10	3081	05/13/21 19:28	SC	XM

Client Sample ID: S-2 1'

Lab Sample ID: 880-2126-4
Matrix: Solid
Date Collected: 05/11/21 12:15
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 20:38	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/12/21 22:31	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		5	3081	05/13/21 19:33	SC	XM

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-3 0.5'

Lab Sample ID: 880-2126-5
Matrix: Solid
Date Collected: 05/11/21 12:20
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 20:58	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/12/21 22:59	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 19:48	SC	XM

Client Sample ID: S-3 1'

Lab Sample ID: 880-2126-6
Matrix: Solid
Date Collected: 05/11/21 12:22
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 21:19	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/12/21 23:30	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 19:53	SC	XM

Client Sample ID: S-4 0.5'

Lab Sample ID: 880-2126-7
Matrix: Solid
Date Collected: 05/11/21 12:25
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 21:39	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 00:02	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 19:59	SC	XM

Client Sample ID: S-4 1'

Lab Sample ID: 880-2126-8
Matrix: Solid
Date Collected: 05/11/21 12:27
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 21:59	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 00:23	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 20:04	SC	XM

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-5 0.5'

Lab Sample ID: 880-2126-9
Matrix: Solid
Date Collected: 05/11/21 12:30
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 22:20	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 00:44	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 20:09	SC	XM

Client Sample ID: S-5 1'

Lab Sample ID: 880-2126-10
Matrix: Solid
Date Collected: 05/11/21 12:32
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/12/21 22:40	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 01:04	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 20:14	SC	XM

Client Sample ID: S-6 0.5'

Lab Sample ID: 880-2126-11
Matrix: Solid
Date Collected: 05/11/21 12:35
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/13/21 00:30	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 01:46	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/14/21 11:10	SC	XM

Client Sample ID: S-6 1'

Lab Sample ID: 880-2126-12
Matrix: Solid
Date Collected: 05/11/21 12:37
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/13/21 00:50	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 02:07	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 20:53	SC	XM

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-7 0.5'

Lab Sample ID: 880-2126-13
Matrix: Solid
Date Collected: 05/11/21 12:40
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/13/21 01:10	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 02:27	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 20:59	SC	XM

Client Sample ID: S-7 1'

Lab Sample ID: 880-2126-14
Matrix: Solid
Date Collected: 05/11/21 12:42
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/13/21 01:31	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 02:48	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 21:14	SC	XM

Client Sample ID: S-8 0.5'

Lab Sample ID: 880-2126-15
Matrix: Solid
Date Collected: 05/11/21 12:48
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/13/21 01:51	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 03:09	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		10	3081	05/13/21 21:19	SC	XM

Client Sample ID: S-8 1'

Lab Sample ID: 880-2126-16
Matrix: Solid
Date Collected: 05/11/21 12:50
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/13/21 02:12	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 03:30	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		10	3081	05/13/21 21:24	SC	XM

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Client Sample ID: S-9 0.5'

Lab Sample ID: 880-2126-17
Matrix: Solid
Date Collected: 05/11/21 13:00
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/13/21 02:32	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 03:51	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 21:30	SC	XM

Client Sample ID: S-9 1'

Lab Sample ID: 880-2126-18
Matrix: Solid
Date Collected: 05/11/21 13:02
Date Received: 05/12/21 15:30

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			3024	05/12/21 15:57	MR	XM
Total/NA	Analysis	8021B		1	3036	05/13/21 02:53	MR	XM
Total/NA	Prep	8015NM Prep			3037	05/12/21 16:07	DM	XM
Total/NA	Analysis	8015B NM		1	3006	05/13/21 04:12	AJ	XM
Soluble	Leach	DI Leach			3054	05/13/21 09:23	CH	XM
Soluble	Analysis	300.0		1	3081	05/13/21 21:35	SC	XM

Laboratory References:

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

Accreditation/Certification Summary

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

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	T104704400-20-21	06-30-21

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
8015B NM	8015NM Prep	Solid	Total TPH
8021B	5035	Solid	Total BTEX

Method Summary

Client: Larson & Associates, Inc. Job ID: 880-2126-1
Project/Site: PERSEUS CTB SDG: 21-0100-21

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

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.

Laboratory References:

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

Sample Summary

Client: Larson & Associates, Inc.
Project/Site: PERSEUS CTB

Job ID: 880-2126-1
SDG: 21-0100-21

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth
880-2126-1	S-1 0.5'	Solid	05/11/21 12:00	05/12/21 15:30	0.5'
880-2126-2	S-1 1'	Solid	05/11/21 12:05	05/12/21 15:30	1'
880-2126-3	S-2 0.5'	Solid	05/11/21 12:10	05/12/21 15:30	0.5'
880-2126-4	S-2 1'	Solid	05/11/21 12:15	05/12/21 15:30	1'
880-2126-5	S-3 0.5'	Solid	05/11/21 12:20	05/12/21 15:30	0.5'
880-2126-6	S-3 1'	Solid	05/11/21 12:22	05/12/21 15:30	1'
880-2126-7	S-4 0.5'	Solid	05/11/21 12:25	05/12/21 15:30	0.5'
880-2126-8	S-4 1'	Solid	05/11/21 12:27	05/12/21 15:30	1'
880-2126-9	S-5 0.5'	Solid	05/11/21 12:30	05/12/21 15:30	0.5'
880-2126-10	S-5 1'	Solid	05/11/21 12:32	05/12/21 15:30	1'
880-2126-11	S-6 0.5'	Solid	05/11/21 12:35	05/12/21 15:30	0.5'
880-2126-12	S-6 1'	Solid	05/11/21 12:37	05/12/21 15:30	1'
880-2126-13	S-7 0.5'	Solid	05/11/21 12:40	05/12/21 15:30	0.5'
880-2126-14	S-7 1'	Solid	05/11/21 12:42	05/12/21 15:30	1'
880-2126-15	S-8 0.5'	Solid	05/11/21 12:48	05/12/21 15:30	0.5'
880-2126-16	S-8 1'	Solid	05/11/21 12:50	05/12/21 15:30	1'
880-2126-17	S-9 0.5'	Solid	05/11/21 13:00	05/12/21 15:30	0.5'
880-2126-18	S-9 1'	Solid	05/11/21 13:02	05/12/21 15:30	1'

2126

№1476

CHAIN-OF-CUSTODY

Larson & Associates, Inc.
Environmental Consultants
Data Reported to

880-2126 Chain of Custody

432-687-0901

DATE: 5/12/2021 PAGE 1 OF 2

PO#: LAB WORK ORDER#:

PROJECT LOCATION OR NAME: ~~21-0100-21~~ Perseus CTB

LAI PROJECT #: 21-0100-21 COLLECTOR: DSG/MB

TRRP report? ☐ Yes ☒ No

S=SOIL P=PAINT
W=WATER SL=SLUDGE
A=AIR OT=OTHER

TIME ZONE
Time zone/State: MST / NM

Field Sample I D	Lab #	Date	Time	Matrix	# of Containers	PRESERVATION: HCl	HNO_3	H_2SO_4 ☐ NaOH ☐	ICE	UNPRESSERVED	ANALYSES: BTEX ☒ MTBE ☐	TRPH 418.1 ☐	TPH 1005 ☐ TPH 1006 ☐	GASOLINE MOD 8015 ☒	DIESEL - MOD 8015 ☒	OIL - MOD 8015 ☐	VOC 8260 ☐	SVOC 8270 ☐ PAH 8270 ☐ HOLDPAH ☐	8081 PESTICIDES ☐ 8151 HERBICIDES ☐	8082 PCBS ☐	TBLP - METALS (RCRA) ☐ TCLP VOC ☐	TCLP - PEST ☐ HERB ☐ Semi-VOC ☐	TOTAL METALS (RCRA) ☐ OTHER LIST ☐	LEAD - TOTAL ☐ DW 200.8 ☐ TCLP ☐	RCI ☐ TOX ☐ FLASHPOINT ☐	TDS ☐ TSS ☐ % MOISTURE ☐ CYANIDE ☐	pH ☐ HEXAVALENT CHROMIUM ☐	EXPLOSIVES ☐ PECHLORATE ☐	CHLORIDE ☒ ANIONS ☐ ALKALINITY ☐	FIELD NOTES
S1 0.5'		5/11/21	1200	S	1				X		X			X	X	X													X	
S-1 1'			1205																											
S-2 0.5'			1210																											
S-2 1'			1215																											
S-3 0.5'			1220																											
S-3 1'			1222																											
S-4 0.5'			1225																											
S-4 1'			1227																											
S-5 0.5			1230																											
S-5 1			1232																											
S-6 0.5'			1235																											
S-6 1'			1237																											
S 7 0.5'			1240																											
S-7 1'			1242																											
S-8 0.5'			1248																											

TOTAL 15

RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)
DSG	5/12/21 1530	K. Phillips
RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)
RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)

LABORATORY XENCO

TURN AROUND TIME
NORMAL ☒
1 DAY ☐
2 DAY ☐
OTHER ☐

LABORATORY USE ONLY:
RECEIVING TEMP 0/0.5 THERM# IR-8
CUSTODY SEALS - ☐ BROKEN ☐ INTACT ☒ NOT USED
☐ CARRIER BILL #
☒ HAND DELIVERED

№1477

CHAIN-OF-CUSTODY

Larson & Associates, Inc.
Environmental Consultants
507 N. Marienfeld, Ste. 200
Midland, TX 79701
432-687-0901

DATE: 5/12/2021 PAGE 2 OF 2

PO#: _____ LAB WORK ORDER#: _____

PROJECT LOCATION OR NAME: Perseus CTB

LAI PROJECT #: 21-0100-21 COLLECTOR: DSG/MB

Data Reported to

TRRP report? ☐ Yes ☒ No

S=SOIL P=PAINT
W=WATER SL=SLUDGE
A=AIR OT=OTHER

TIME ZONE
Time zone/State: MST / NM

Field Sample I D	Lab #	Date	Time	Matrix	# of Containers	PRESERVATION: HCl	HNO_3	H_2SO_4 ☐ NaOH ☐	ICE	UNPRESSERVED	ANALYSES: BTEX ☒ MTBE ☐	TRPH 418.1 ☐	TPH 1005 ☐ TPH 1006 ☐	GASOLINE MOD 8015 ☒	DIESEL - MOD 8015 ☒	OIL - MOD 8015 ☐	VOC 8260 ☐	SVOC 8270 ☐	PAH 8270 ☐ HOLDPAH ☐	8081 PESTICIDES ☐ 8151 HERBICIDES ☐	8082 PCBS ☐	TBLP - METALS (RCRA) ☐ TCLP VOC ☐	TCLP - PEST ☐ HERB ☐ Semi-VOC ☐	TOTAL METALS (RCRA) ☐ OTHER LIST ☐	LEAD - TOTAL ☐ D W 200.8 ☐ TCLP ☐	RCI ☐ TOX ☐ FLASHPOINT ☐	TDS ☐ TSS ☐ % MOISTURE ☐ CYANIDE ☐	pH ☐ HEXAVALENT CHROMIUM ☐	EXPLOSIVES ☐ PECHLORATE ☐	CHLORIDE ☒ ANIONS ☐ ALKALINITY ☐	FIELD NOTES
S-8 1'		5/11/21	1250	S	1				X		X			X	X	X													X		
S-9 0.5'		"	1300	"	"				"		"			"	"	"													"		
S-9 1'		"	1302	"	"				"		"			"	"	"													"		
TOTAL 3																															

RELINQUISHED BY (Signature) DaSG DATE/TIME 5/12/21 1530 RECEIVED BY (Signature) R Ephillips

RELINQUISHED BY (Signature) DATE/TIME RECEIVED BY (Signature)

RELINQUISHED BY (Signature) DATE/TIME RECEIVED BY (Signature)

LABORATORY Xenco

TURN AROUND TIME
NORMAL ☒
1 DAY ☐
2 DAY ☐
OTHER ☐

LABORATORY USE ONLY:
RECEIVING TEMP 0/0.5 THERM# IR8
CUSTODY SEALS - ☐ BROKEN ☐ INTACT ☒ NOT USED
☐ CARRIER BILL # _____
☐ HAND DELIVERED

Login Sample Receipt Checklist

Client: Larson & Associates, Inc.

Job Number: 880-2126-1
SDG Number: 21-0100-21

Login Number: 2126
List Number: 1
Creator: Phillips, Kerianna

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	

eurofins | Environment Testing America

ANALYTICAL REPORT

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

Laboratory Job ID: 880-7229-1
Laboratory Sample Delivery Group: 21-0100-21
Client Project/Site: Perseus
Revision: 1

For:
Larson & Associates, Inc.
507 N Marienfeld
Suite 202
Midland, Texas 79701

Attn: Mr. Mark J Larson

Holly Taylor

Authorized for release by:
10/25/2021 2:06:24 PM

Holly Taylor, Project Manager
(806)794-1296
holly.taylor@eurofinset.com

Client: Larson & Associates, Inc.
Project/Site: Perseus

Laboratory Job ID: 880-7229-1
SDG: 21-0100-21

Table of Contents

Definitions/Glossary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Qualifiers

GC VOA

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

Case Narrative

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Job ID: 880-7229-1

Laboratory: Eurofins Xenco, Midland

Narrative

Job Narrative
880-7229-1

Comments
No additional comments.

Revision
The report being provided is a revision of the original report sent on 10/22/2021. The report (revision 1) is being revised to correct the result for Total TPH and correct the sampling depth for S2 per Robert Nelson (phone).

Receipt
The samples were received on 10/14/2021 8:45 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 was -2.2º C.

Receipt Exceptions

The report was revised to correct the result for Total TPH and correct the sampling depth for S2 per Robert Nelson (phone).

GC VOA
Method 8021B: Surrogate recovery for the following samples were outside control limits: S-8 5' (880-7229-6), S-1 5' (880-7229-10), S-1 8' (880-7229-11), S-2 1' (880-7229-12), S-2 3' (880-7229-13), S-2 5' (880-7229-14) and S-2 7' (880-7229-15). 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 8015B NM: Surrogate recovery for the following samples were outside control limits: (890-1428-A-3-C), (890-1428-A-3-D MS) and (890-1428-A-3-E 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.

General Chemistry
No analytical or quality issues were noted, other than those described 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: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-3 1'

Date Collected: 10/13/21 11:15
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-1

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 18:25	1
Toluene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 18:25	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 18:25	1
m,p-Xylenes	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/20/21 18:25	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 18:25	1
Xylenes, Total	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/20/21 18:25	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*113*		*70 - 130*	*10/18/21 14:13*	*10/20/21 18:25*	*1*
1,4-Difluorobenzene (Surr)	*73*		*70 - 130*	*10/18/21 14:13*	*10/20/21 18:25*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00399	U	0.00399		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 17:20	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 17:20	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 17:20	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*103*		*70 - 130*	*10/20/21 10:56*	*10/20/21 17:20*	*1*
o-Terphenyl (Surr)	*123*		*70 - 130*	*10/20/21 10:56*	*10/20/21 17:20*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**6.93**	**F1**	4.95		mg/Kg			10/22/21 11:10	1

Client Sample ID: S-3 3'

Date Collected: 10/13/21 11:16
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-2

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 18:46	1
Toluene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 18:46	1
Ethylbenzene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 18:46	1
m,p-Xylenes	<0.00404	U	0.00404		mg/Kg		10/18/21 14:13	10/20/21 18:46	1
o-Xylene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 18:46	1
Xylenes, Total	<0.00404	U	0.00404		mg/Kg		10/18/21 14:13	10/20/21 18:46	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*129*		*70 - 130*	*10/18/21 14:13*	*10/20/21 18:46*	*1*
1,4-Difluorobenzene (Surr)	*74*		*70 - 130*	*10/18/21 14:13*	*10/20/21 18:46*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-3 3'
Date Collected: 10/13/21 11:16
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-2
Matrix: Solid

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00404	U	0.00404		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 13:49	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 13:49	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 13:49	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*110*		*70 - 130*	*10/20/21 10:56*	*10/20/21 13:49*	*1*
o-Terphenyl (Surr)	*127*		*70 - 130*	*10/20/21 10:56*	*10/20/21 13:49*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**26.6**		5.03		mg/Kg			10/22/21 11:31	1

Client Sample ID: S-3 5'
Date Collected: 10/13/21 11:17
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-3
Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00198	U	0.00198		mg/Kg		10/18/21 14:13	10/20/21 19:06	1
Toluene	<0.00198	U	0.00198		mg/Kg		10/18/21 14:13	10/20/21 19:06	1
Ethylbenzene	<0.00198	U	0.00198		mg/Kg		10/18/21 14:13	10/20/21 19:06	1
m,p-Xylenes	<0.00397	U	0.00397		mg/Kg		10/18/21 14:13	10/20/21 19:06	1
o-Xylene	<0.00198	U	0.00198		mg/Kg		10/18/21 14:13	10/20/21 19:06	1
Xylenes, Total	<0.00397	U	0.00397		mg/Kg		10/18/21 14:13	10/20/21 19:06	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*118*		*70 - 130*	*10/18/21 14:13*	*10/20/21 19:06*	*1*
1,4-Difluorobenzene (Surr)	*70*		*70 - 130*	*10/18/21 14:13*	*10/20/21 19:06*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00397	U	0.00397		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 14:10	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 14:10	1

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-3 5'
Date Collected: 10/13/21 11:17
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-3
Matrix: Solid

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 14:10	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*98*		*70 - 130*	*10/20/21 10:56*	*10/20/21 14:10*	*1*
o-Terphenyl (Surr)	*117*		*70 - 130*	*10/20/21 10:56*	*10/20/21 14:10*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**54.0**		5.03		mg/Kg			10/22/21 11:38	1

Client Sample ID: S-8 1'
Date Collected: 10/13/21 11:30
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-4
Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 19:27	1
Toluene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 19:27	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 19:27	1
m,p-Xylenes	<0.00400	U	0.00400		mg/Kg		10/18/21 14:13	10/20/21 19:27	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 19:27	1
Xylenes, Total	<0.00400	U	0.00400		mg/Kg		10/18/21 14:13	10/20/21 19:27	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*134*	*S1+*	*70 - 130*	*10/18/21 14:13*	*10/20/21 19:27*	*1*
1,4-Difluorobenzene (Surr)	*96*		*70 - 130*	*10/18/21 14:13*	*10/20/21 19:27*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00400	U	0.00400		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.9	U	49.9		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 14:32	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 14:32	1
Oil Range Organics (Over C28-C36)	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 14:32	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*99*		*70 - 130*	*10/20/21 10:56*	*10/20/21 14:32*	*1*
o-Terphenyl (Surr)	*120*		*70 - 130*	*10/20/21 10:56*	*10/20/21 14:32*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**4970**		25.1		mg/Kg			10/22/21 11:45	5

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-8 3'

Date Collected: 10/13/21 11:31
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-5

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00198	U	0.00198		mg/Kg		10/18/21 14:13	10/20/21 19:47	1
Toluene	<0.00198	U	0.00198		mg/Kg		10/18/21 14:13	10/20/21 19:47	1
Ethylbenzene	<0.00198	U	0.00198		mg/Kg		10/18/21 14:13	10/20/21 19:47	1
m,p-Xylenes	<0.00397	U	0.00397		mg/Kg		10/18/21 14:13	10/20/21 19:47	1
o-Xylene	<0.00198	U	0.00198		mg/Kg		10/18/21 14:13	10/20/21 19:47	1
Xylenes, Total	<0.00397	U	0.00397		mg/Kg		10/18/21 14:13	10/20/21 19:47	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*117*		*70 - 130*	*10/18/21 14:13*	*10/20/21 19:47*	*1*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*	*10/18/21 14:13*	*10/20/21 19:47*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00397	U	0.00397		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 14:52	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 14:52	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 14:52	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*100*		*70 - 130*	*10/20/21 10:56*	*10/20/21 14:52*	*1*
o-Terphenyl (Surr)	*119*		*70 - 130*	*10/20/21 10:56*	*10/20/21 14:52*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**1510**		24.8		mg/Kg			10/22/21 11:51	5

Client Sample ID: S-8 5'

Date Collected: 10/13/21 11:32
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-6

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 21:09	1
Toluene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 21:09	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 21:09	1
m,p-Xylenes	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/20/21 21:09	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 21:09	1
Xylenes, Total	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/20/21 21:09	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*124*		*70 - 130*	*10/18/21 14:13*	*10/20/21 21:09*	*1*
1,4-Difluorobenzene (Surr)	*80*		*70 - 130*	*10/18/21 14:13*	*10/20/21 21:09*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-8 5'
Date Collected: 10/13/21 11:32
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-6
Matrix: Solid

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00399	U	0.00399		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 15:14	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 15:14	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 15:14	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*99*		*70 - 130*	*10/20/21 10:56*	*10/20/21 15:14*	*1*
o-Terphenyl (Surr)	*119*		*70 - 130*	*10/20/21 10:56*	*10/20/21 15:14*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**880**		5.04		mg/Kg			10/22/21 12:12	1

Client Sample ID: S-8 6'
Date Collected: 10/13/21 11:33
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-7
Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 21:29	1
Toluene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 21:29	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 21:29	1
m,p-Xylenes	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/20/21 21:29	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 21:29	1
Xylenes, Total	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/20/21 21:29	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*135*	*S1+*	*70 - 130*	*10/18/21 14:13*	*10/20/21 21:29*	*1*
1,4-Difluorobenzene (Surr)	*96*		*70 - 130*	*10/18/21 14:13*	*10/20/21 21:29*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00399	U	0.00399		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.9	U	49.9		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 15:35	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 15:35	1

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Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-8 6'

Date Collected: 10/13/21 11:33
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-7
Matrix: Solid

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Oll Range Organics (Over C28-C36)	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 15:35	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*101*		*70 - 130*	*10/20/21 10:56*	*10/20/21 15:35*	*1*
o-Terphenyl (Surr)	*121*		*70 - 130*	*10/20/21 10:56*	*10/20/21 15:35*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**818**		4.99		mg/Kg			10/22/21 12:19	1

Client Sample ID: S-1 1'

Date Collected: 10/13/21 12:10
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-8
Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 21:50	1
Toluene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 21:50	1
Ethylbenzene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 21:50	1
m,p-Xylenes	<0.00403	U	0.00403		mg/Kg		10/18/21 14:13	10/20/21 21:50	1
o-Xylene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 21:50	1
Xylenes, Total	<0.00403	U	0.00403		mg/Kg		10/18/21 14:13	10/20/21 21:50	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*110*		*70 - 130*	*10/18/21 14:13*	*10/20/21 21:50*	*1*
1,4-Difluorobenzene (Surr)	*72*		*70 - 130*	*10/18/21 14:13*	*10/20/21 21:50*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00403	U	0.00403		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.9	U	49.9		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 15:56	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 15:56	1
Oll Range Organics (Over C28-C36)	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 15:56	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*104*		*70 - 130*	*10/20/21 10:56*	*10/20/21 15:56*	*1*
o-Terphenyl (Surr)	*125*		*70 - 130*	*10/20/21 10:56*	*10/20/21 15:56*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**426**		4.97		mg/Kg			10/22/21 12:26	1

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-1 3'

Date Collected: 10/13/21 12:11
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-9

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199		mg/Kg		10/18/21 14:13	10/20/21 22:10	1
Toluene	<0.00199	U	0.00199		mg/Kg		10/18/21 14:13	10/20/21 22:10	1
Ethylbenzene	<0.00199	U	0.00199		mg/Kg		10/18/21 14:13	10/20/21 22:10	1
m,p-Xylenes	<0.00398	U	0.00398		mg/Kg		10/18/21 14:13	10/20/21 22:10	1
o-Xylene	<0.00199	U	0.00199		mg/Kg		10/18/21 14:13	10/20/21 22:10	1
Xylenes, Total	<0.00398	U	0.00398		mg/Kg		10/18/21 14:13	10/20/21 22:10	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*114*		*70 - 130*	*10/18/21 14:13*	*10/20/21 22:10*	*1*
1,4-Difluorobenzene (Surr)	*68*	*S1-*	*70 - 130*	*10/18/21 14:13*	*10/20/21 22:10*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00398	U	0.00398		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 16:17	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 16:17	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 16:17	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*102*		*70 - 130*	*10/20/21 10:56*	*10/20/21 16:17*	*1*
o-Terphenyl (Surr)	*123*		*70 - 130*	*10/20/21 10:56*	*10/20/21 16:17*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**526**		5.05		mg/Kg			10/22/21 12:33	1

Client Sample ID: S-1 5'

Date Collected: 10/13/21 12:12
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-10

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 22:31	1
Toluene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 22:31	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 22:31	1
m,p-Xylenes	<0.00400	U	0.00400		mg/Kg		10/18/21 14:13	10/20/21 22:31	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 22:31	1
Xylenes, Total	<0.00400	U	0.00400		mg/Kg		10/18/21 14:13	10/20/21 22:31	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*130*		*70 - 130*	*10/18/21 14:13*	*10/20/21 22:31*	*1*
1,4-Difluorobenzene (Surr)	*79*		*70 - 130*	*10/18/21 14:13*	*10/20/21 22:31*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-1 5'
Date Collected: 10/13/21 12:12
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-10
Matrix: Solid

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00400	U	0.00400		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 16:38	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 16:38	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 16:38	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*102*		*70 - 130*	*10/20/21 10:56*	*10/20/21 16:38*	*1*
o-Terphenyl (Surr)	*124*		*70 - 130*	*10/20/21 10:56*	*10/20/21 16:38*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**332**		5.00		mg/Kg			10/22/21 12:40	1

Client Sample ID: S-1 8'
Date Collected: 10/13/21 12:13
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-11
Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00201	U	0.00201		mg/Kg		10/18/21 14:13	10/20/21 22:51	1
Toluene	<0.00201	U	0.00201		mg/Kg		10/18/21 14:13	10/20/21 22:51	1
Ethylbenzene	<0.00201	U	0.00201		mg/Kg		10/18/21 14:13	10/20/21 22:51	1
m,p-Xylenes	<0.00402	U	0.00402		mg/Kg		10/18/21 14:13	10/20/21 22:51	1
o-Xylene	<0.00201	U	0.00201		mg/Kg		10/18/21 14:13	10/20/21 22:51	1
Xylenes, Total	<0.00402	U	0.00402		mg/Kg		10/18/21 14:13	10/20/21 22:51	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*111*		*70 - 130*	*10/18/21 14:13*	*10/20/21 22:51*	*1*
1,4-Difluorobenzene (Surr)	*77*		*70 - 130*	*10/18/21 14:13*	*10/20/21 22:51*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00402	U	0.00402		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.9	U	49.9		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 12:45	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 12:45	1

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-1 8'
Date Collected: 10/13/21 12:13
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-11
Matrix: Solid

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<49.9	U	49.9		mg/Kg		10/20/21 10:56	10/20/21 12:45	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*102*		*70 - 130*	*10/20/21 10:56*	*10/20/21 12:45*	*1*
o-Terphenyl (Surr)	*123*		*70 - 130*	*10/20/21 10:56*	*10/20/21 12:45*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**333**		5.01		mg/Kg			10/22/21 12:47	1

Client Sample ID: S-2 1'
Date Collected: 10/13/21 12:30
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-12
Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 23:11	1
Toluene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 23:11	1
Ethylbenzene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 23:11	1
m,p-Xylenes	<0.00404	U	0.00404		mg/Kg		10/18/21 14:13	10/20/21 23:11	1
o-Xylene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 23:11	1
Xylenes, Total	<0.00404	U	0.00404		mg/Kg		10/18/21 14:13	10/20/21 23:11	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*112*		*70 - 130*	*10/18/21 14:13*	*10/20/21 23:11*	*1*
1,4-Difluorobenzene (Surr)	*71*		*70 - 130*	*10/18/21 14:13*	*10/20/21 23:11*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00404	U	0.00404		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 17:42	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 17:42	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 17:42	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*103*		*70 - 130*	*10/20/21 10:56*	*10/20/21 17:42*	*1*
o-Terphenyl (Surr)	*123*		*70 - 130*	*10/20/21 10:56*	*10/20/21 17:42*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**143**		4.97		mg/Kg			10/22/21 14:09	1

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-2 3'

Date Collected: 10/13/21 12:31
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-13

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 23:32	1
Toluene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 23:32	1
Ethylbenzene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 23:32	1
m,p-Xylenes	<0.00404	U	0.00404		mg/Kg		10/18/21 14:13	10/20/21 23:32	1
o-Xylene	<0.00202	U	0.00202		mg/Kg		10/18/21 14:13	10/20/21 23:32	1
Xylenes, Total	<0.00404	U	0.00404		mg/Kg		10/18/21 14:13	10/20/21 23:32	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*113*		*70 - 130*	*10/18/21 14:13*	*10/20/21 23:32*	*1*
1,4-Difluorobenzene (Surr)	*97*		*70 - 130*	*10/18/21 14:13*	*10/20/21 23:32*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00404	U	0.00404		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/19/21 09:45	10/19/21 19:09	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/19/21 09:45	10/19/21 19:09	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/19/21 09:45	10/19/21 19:09	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*113*		*70 - 130*	*10/19/21 09:45*	*10/19/21 19:09*	*1*
o-Terphenyl (Surr)	*129*		*70 - 130*	*10/19/21 09:45*	*10/19/21 19:09*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**4160**		25.0		mg/Kg			10/22/21 13:07	5

Client Sample ID: S-2 5'

Date Collected: 10/13/21 12:32
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-14

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 23:52	1
Toluene	**0.00307**		0.00200		mg/Kg		10/18/21 14:13	10/20/21 23:52	1
Ethylbenzene	**0.00272**		0.00200		mg/Kg		10/18/21 14:13	10/20/21 23:52	1
m,p-Xylenes	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/20/21 23:52	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 23:52	1
Xylenes, Total	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/20/21 23:52	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*127*		*70 - 130*	*10/18/21 14:13*	*10/20/21 23:52*	*1*
1,4-Difluorobenzene (Surr)	*96*		*70 - 130*	*10/18/21 14:13*	*10/20/21 23:52*	*1*

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-2 5'

Date Collected: 10/13/21 12:32
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-14

Matrix: Solid

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	**0.00579**		0.00399		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/19/21 09:45	10/19/21 19:31	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/19/21 09:45	10/19/21 19:31	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/19/21 09:45	10/19/21 19:31	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*98*		*70 - 130*	*10/19/21 09:45*	*10/19/21 19:31*	*1*
o-Terphenyl (Surr)	*112*		*70 - 130*	*10/19/21 09:45*	*10/19/21 19:31*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**430**		4.96		mg/Kg			10/22/21 13:14	1

Client Sample ID: S-2 7'

Date Collected: 10/13/21 12:33
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-15

Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/21/21 00:13	1
Toluene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/21/21 00:13	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/21/21 00:13	1
m,p-Xylenes	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/21/21 00:13	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/21/21 00:13	1
Xylenes, Total	<0.00399	U	0.00399		mg/Kg		10/18/21 14:13	10/21/21 00:13	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*116*		*70 - 130*	*10/18/21 14:13*	*10/21/21 00:13*	*1*
1,4-Difluorobenzene (Surr)	*72*		*70 - 130*	*10/18/21 14:13*	*10/21/21 00:13*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00399	U	0.00399		mg/Kg			10/21/21 17:04	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.9	U	49.9		mg/Kg			10/21/21 16:01	1

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9		mg/Kg		10/19/21 09:45	10/19/21 19:52	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9		mg/Kg		10/19/21 09:45	10/19/21 19:52	1

Client Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-2 7'
Date Collected: 10/13/21 12:33
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-15
Matrix: Solid

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

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Oil Range Organics (Over C28-C36)	<49.9	U	49.9		mg/Kg		10/19/21 09:45	10/19/21 19:52	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*113*		*70 - 130*	*10/19/21 09:45*	*10/19/21 19:52*	*1*
o-Terphenyl (Surr)	*128*		*70 - 130*	*10/19/21 09:45*	*10/19/21 19:52*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**496**		5.04		mg/Kg			10/22/21 13:35	1

Surrogate Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

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)
820-2232-A-45-B MS	Matrix Spike	123	106
820-2232-A-45-C MSD	Matrix Spike Duplicate	123	101
880-7229-1	S-3 1'	113	73
880-7229-2	S-3 3'	129	74
880-7229-3	S-3 5'	118	70
880-7229-4	S-8 1'	134 S1+	96
880-7229-5	S-8 3'	117	99
880-7229-6	S-8 5'	124	80
880-7229-6 MS	S-8 5'	106	95
880-7229-6 MSD	S-8 5'	107	88
880-7229-7	S-8 6'	135 S1+	96
880-7229-8	S-1 1'	110	72
880-7229-9	S-1 3'	114	68 S1-
880-7229-10	S-1 5'	130	79
880-7229-11	S-1 8'	111	77
880-7229-12	S-2 1'	112	71
880-7229-13	S-2 3'	113	97
880-7229-14	S-2 5'	127	96
880-7229-15	S-2 7'	116	72
LCS 880-9753/1-A	Lab Control Sample	105	99
LCS 880-9957/1-A	Lab Control Sample	105	95
LCSD 880-9753/2-A	Lab Control Sample Dup	112	102
LCSD 880-9957/2-A	Lab Control Sample Dup	109	89
MB 880-10041/5-A	Method Blank	106	99
MB 880-9753/5-A	Method Blank	106	94
MB 880-9957/5-A	Method Blank	128	107

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)
880-7229-1	S-3 1'	103	123
880-7229-2	S-3 3'	110	127
880-7229-3	S-3 5'	98	117
880-7229-4	S-8 1'	99	120
880-7229-5	S-8 3'	100	119
880-7229-6	S-8 5'	99	119
880-7229-7	S-8 6'	101	121
880-7229-8	S-1 1'	104	125
880-7229-9	S-1 3'	102	123
880-7229-10	S-1 5'	102	124
880-7229-11	S-1 8'	102	123
880-7229-11 MS	S-1 8'	110	117
880-7229-11 MSD	S-1 8'	108	118

Surrogate Summary

Client: Larson & Associates, Inc. Job ID: 880-7229-1
Project/Site: Perseus SDG: 21-0100-21

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)
880-7229-12	S-2 1'	103	123
880-7229-13	S-2 3'	113	129
880-7229-14	S-2 5'	98	112
880-7229-15	S-2 7'	113	128
890-1428-A-3-D MS	Matrix Spike	312 S1+	215 S1+
890-1428-A-3-E MSD	Matrix Spike Duplicate	268 S1+	203 S1+
LCS 880-9834/2-A	Lab Control Sample	94	96
LCS 880-9955/2-A	Lab Control Sample	105	119
LCSD 880-9834/3-A	Lab Control Sample Dup	86	89
LCSD 880-9955/3-A	Lab Control Sample Dup	102	113
MB 880-9834/1-A	Method Blank	101	116
MB 880-9955/1-A	Method Blank	106	130

Surrogate Legend

1CO = 1-Chlorooctane (Surr)
OTPH = o-Terphenyl (Surr)

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-10041/5-A
Matrix: Solid
Analysis Batch: 10083

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 10041

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/21/21 10:15	10/21/21 15:47	1
Toluene	<0.00200	U	0.00200		mg/Kg		10/21/21 10:15	10/21/21 15:47	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		10/21/21 10:15	10/21/21 15:47	1
m,p-Xylenes	<0.00400	U	0.00400		mg/Kg		10/21/21 10:15	10/21/21 15:47	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/21/21 10:15	10/21/21 15:47	1
Xylenes, Total	<0.00400	U	0.00400		mg/Kg		10/21/21 10:15	10/21/21 15:47	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*106*		*70 - 130*	*10/21/21 10:15*	*10/21/21 15:47*	*1*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*	*10/21/21 10:15*	*10/21/21 15:47*	*1*

Lab Sample ID: MB 880-9753/5-A
Matrix: Solid
Analysis Batch: 9941

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 9753

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 16:22	1
Toluene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 16:22	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 16:22	1
m,p-Xylenes	<0.00400	U	0.00400		mg/Kg		10/18/21 14:13	10/20/21 16:22	1
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/18/21 14:13	10/20/21 16:22	1
Xylenes, Total	<0.00400	U	0.00400		mg/Kg		10/18/21 14:13	10/20/21 16:22	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*106*		*70 - 130*	*10/18/21 14:13*	*10/20/21 16:22*	*1*
1,4-Difluorobenzene (Surr)	*94*		*70 - 130*	*10/18/21 14:13*	*10/20/21 16:22*	*1*

Lab Sample ID: LCS 880-9753/1-A
Matrix: Solid
Analysis Batch: 9941

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 9753

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Benzene			0.100	0.09216		mg/Kg		92	70 - 130		
Toluene			0.100	0.09030		mg/Kg		90	70 - 130		
Ethylbenzene			0.100	0.08762		mg/Kg		88	70 - 130		
m,p-Xylenes			0.200	0.1908		mg/Kg		95	70 - 130		
o-Xylene			0.100	0.09524		mg/Kg		95	70 - 130		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*105*		*70 - 130*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*

Lab Sample ID: LCSD 880-9753/2-A
Matrix: Solid
Analysis Batch: 9941

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 9753

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene			0.100	0.09667		mg/Kg		97	70 - 130	5	35

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

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

Lab Sample ID: LCSD 880-9753/2-A
Matrix: Solid
Analysis Batch: 9941

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 9753

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Toluene			0.100	0.09542		mg/Kg		95	70 - 130	6	35
Ethylbenzene			0.100	0.09422		mg/Kg		94	70 - 130	7	35
m,p-Xylenes			0.200	0.2061		mg/Kg		103	70 - 130	8	35
o-Xylene			0.100	0.1022		mg/Kg		102	70 - 130	7	35

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*112*		*70 - 130*
1,4-Difluorobenzene (Surr)	*102*		*70 - 130*

Lab Sample ID: 820-2232-A-45-B MS
Matrix: Solid
Analysis Batch: 9941

Client Sample ID: Matrix Spike
Prep Type: Total/NA
Prep Batch: 9753

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzene	<0.00202	U	0.101	0.07281		mg/Kg		72	70 - 130
Toluene	<0.00202	U F1	0.101	0.06977	F1	mg/Kg		69	70 - 130
Ethylbenzene	<0.00202	U	0.101	0.07075		mg/Kg		70	70 - 130
m,p-Xylenes	<0.00403	U	0.202	0.1558		mg/Kg		77	70 - 130
o-Xylene	<0.00202	U	0.101	0.07831		mg/Kg		78	70 - 130

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*123*		*70 - 130*
1,4-Difluorobenzene (Surr)	*106*		*70 - 130*

Lab Sample ID: 820-2232-A-45-C MSD
Matrix: Solid
Analysis Batch: 9941

Client Sample ID: Matrix Spike Duplicate
Prep Type: Total/NA
Prep Batch: 9753

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.00202	U	0.101	0.07730		mg/Kg		77	70 - 130	6	35
Toluene	<0.00202	U F1	0.101	0.07622		mg/Kg		76	70 - 130	9	35
Ethylbenzene	<0.00202	U	0.101	0.07873		mg/Kg		78	70 - 130	11	35
m,p-Xylenes	<0.00403	U	0.201	0.1722		mg/Kg		86	70 - 130	10	35
o-Xylene	<0.00202	U	0.101	0.08702		mg/Kg		87	70 - 130	11	35

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*123*		*70 - 130*
1,4-Difluorobenzene (Surr)	*101*		*70 - 130*

Lab Sample ID: MB 880-9957/5-A
Matrix: Solid
Analysis Batch: 10083

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 9957

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200		mg/Kg		10/21/21 10:00	10/22/21 02:38	1
Toluene	<0.00200	U	0.00200		mg/Kg		10/21/21 10:00	10/22/21 02:38	1
Ethylbenzene	<0.00200	U	0.00200		mg/Kg		10/21/21 10:00	10/22/21 02:38	1
m,p-Xylenes	<0.00400	U	0.00400		mg/Kg		10/21/21 10:00	10/22/21 02:38	1

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

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

Lab Sample ID: MB 880-9957/5-A
Matrix: Solid
Analysis Batch: 10083

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 9957

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
o-Xylene	<0.00200	U	0.00200		mg/Kg		10/21/21 10:00	10/22/21 02:38	1
Xylenes, Total	<0.00400	U	0.00400		mg/Kg		10/21/21 10:00	10/22/21 02:38	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*128*		*70 - 130*	*10/21/21 10:00*	*10/22/21 02:38*	*1*
1,4-Difluorobenzene (Surr)	*107*		*70 - 130*	*10/21/21 10:00*	*10/22/21 02:38*	*1*

Lab Sample ID: LCS 880-9957/1-A
Matrix: Solid
Analysis Batch: 10083

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 9957

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Benzene			0.100	0.08846		mg/Kg		88	70 - 130		
Toluene			0.100	0.09078		mg/Kg		91	70 - 130		
Ethylbenzene			0.100	0.08864		mg/Kg		89	70 - 130		
m,p-Xylenes			0.200	0.1871		mg/Kg		94	70 - 130		
o-Xylene			0.100	0.09257		mg/Kg		93	70 - 130		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*105*		*70 - 130*
1,4-Difluorobenzene (Surr)	*95*		*70 - 130*

Lab Sample ID: LCSD 880-9957/2-A
Matrix: Solid
Analysis Batch: 10083

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 9957

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene			0.100	0.08499		mg/Kg		85	70 - 130	4	35
Toluene			0.100	0.08920		mg/Kg		89	70 - 130	2	35
Ethylbenzene			0.100	0.08834		mg/Kg		88	70 - 130	0	35
m,p-Xylenes			0.200	0.1877		mg/Kg		94	70 - 130	0	35
o-Xylene			0.100	0.09315		mg/Kg		93	70 - 130	1	35

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*109*		*70 - 130*
1,4-Difluorobenzene (Surr)	*89*		*70 - 130*

Lab Sample ID: 880-7229-6 MS
Matrix: Solid
Analysis Batch: 10083

Client Sample ID: S-8 5'
Prep Type: Total/NA
Prep Batch: 9957

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Benzene	<0.00199	U	0.0998	0.08667		mg/Kg		87	70 - 130		
Toluene	<0.00199	U	0.0998	0.08829		mg/Kg		88	70 - 130		
Ethylbenzene	<0.00199	U	0.0998	0.08859		mg/Kg		89	70 - 130		
m,p-Xylenes	<0.00398	U	0.200	0.1869		mg/Kg		94	70 - 130		
o-Xylene	<0.00199	U	0.0998	0.09235		mg/Kg		92	70 - 130		

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

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

Lab Sample ID: 880-7229-6 MS
Matrix: Solid
Analysis Batch: 10083

Client Sample ID: S-8 5'
Prep Type: Total/NA
Prep Batch: 9957

Surrogate	MS %Recovery	MS Qualifier	Limits
4-Bromofluorobenzene (Surr)	106		70 - 130
1,4-Difluorobenzene (Surr)	95		70 - 130

Lab Sample ID: 880-7229-6 MSD
Matrix: Solid
Analysis Batch: 10083

Client Sample ID: S-8 5'
Prep Type: Total/NA
Prep Batch: 9957

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Benzene	<0.00199	U	0.101	0.07819		mg/Kg		78	70 - 130	10	35
Toluene	<0.00199	U	0.101	0.08150		mg/Kg		81	70 - 130	8	35
Ethylbenzene	<0.00199	U	0.101	0.08171		mg/Kg		81	70 - 130	8	35
m,p-Xylenes	<0.00398	U	0.201	0.1744		mg/Kg		87	70 - 130	7	35
o-Xylene	<0.00199	U	0.101	0.08603		mg/Kg		85	70 - 130	7	35

Surrogate	MSD %Recovery	MSD Qualifier	Limits
4-Bromofluorobenzene (Surr)	107		70 - 130
1,4-Difluorobenzene (Surr)	88		70 - 130

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

Lab Sample ID: MB 880-9834/1-A
Matrix: Solid
Analysis Batch: 9827

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 9834

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/19/21 09:45	10/19/21 10:56	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/19/21 09:45	10/19/21 10:56	1
Oil Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/19/21 09:45	10/19/21 10:56	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane (Surr)	101		70 - 130	10/19/21 09:45	10/19/21 10:56	1
o-Terphenyl (Surr)	116		70 - 130	10/19/21 09:45	10/19/21 10:56	1

Lab Sample ID: LCS 880-9834/2-A
Matrix: Solid
Analysis Batch: 9827

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 9834

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Gasoline Range Organics (GRO)-C6-C10			1000	822.9		mg/Kg		82	70 - 130		
Diesel Range Organics (Over C10-C28)			1000	1015		mg/Kg		101	70 - 130		

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1-Chlorooctane (Surr)	94		70 - 130
o-Terphenyl (Surr)	96		70 - 130

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

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

Lab Sample ID: LCSD 880-9834/3-A
Matrix: Solid
Analysis Batch: 9827

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 9834

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10			1000	825.7		mg/Kg		83	70 - 130	0	20
Diesel Range Organics (Over C10-C28)			1000	965.7		mg/Kg		97	70 - 130	5	20

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
1-Chlorooctane (Surr)	*86*		*70 - 130*
o-Terphenyl (Surr)	*89*		*70 - 130*

Lab Sample ID: 890-1428-A-3-D MS
Matrix: Solid
Analysis Batch: 9827

Client Sample ID: Matrix Spike
Prep Type: Total/NA
Prep Batch: 9834

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Gasoline Range Organics (GRO)-C6-C10	3310		998	4234		mg/Kg		92	70 - 130		

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
1-Chlorooctane (Surr)	*312*	*S1+*	*70 - 130*
o-Terphenyl (Surr)	*215*	*S1+*	*70 - 130*

Lab Sample ID: 890-1428-A-3-E MSD
Matrix: Solid
Analysis Batch: 9827

Client Sample ID: Matrix Spike Duplicate
Prep Type: Total/NA
Prep Batch: 9834

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	3310		1000	4491		mg/Kg		118	70 - 130	6	20

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
1-Chlorooctane (Surr)	*268*	*S1+*	*70 - 130*
o-Terphenyl (Surr)	*203*	*S1+*	*70 - 130*

Lab Sample ID: MB 880-9955/1-A
Matrix: Solid
Analysis Batch: 9931

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 9955

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 11:41	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 11:41	1
Oll Range Organics (Over C28-C36)	<50.0	U	50.0		mg/Kg		10/20/21 10:56	10/20/21 11:41	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane (Surr)	*106*		*70 - 130*	*10/20/21 10:56*	*10/20/21 11:41*	*1*
o-Terphenyl (Surr)	*130*		*70 - 130*	*10/20/21 10:56*	*10/20/21 11:41*	*1*

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

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

Lab Sample ID: LCS 880-9955/2-A
Matrix: Solid
Analysis Batch: 9931

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 9955

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Gasoline Range Organics (GRO)-C6-C10			1000	1033		mg/Kg		103	70 - 130		
Diesel Range Organics (Over C10-C28)			1000	1164		mg/Kg		116	70 - 130		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1-Chlorooctane (Surr)	*105*		*70 - 130*
o-Terphenyl (Surr)	*119*		*70 - 130*

Lab Sample ID: LCSD 880-9955/3-A
Matrix: Solid
Analysis Batch: 9931

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 9955

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10			1000	1045		mg/Kg		104	70 - 130	1	20
Diesel Range Organics (Over C10-C28)			1000	1155		mg/Kg		116	70 - 130	1	20

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
1-Chlorooctane (Surr)	*102*		*70 - 130*
o-Terphenyl (Surr)	*113*		*70 - 130*

Lab Sample ID: 880-7229-11 MS
Matrix: Solid
Analysis Batch: 9931

Client Sample ID: S-1 8'
Prep Type: Total/NA
Prep Batch: 9955

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	997	887.7		mg/Kg		89	70 - 130		
Diesel Range Organics (Over C10-C28)	<49.9	U	997	924.8		mg/Kg		93	70 - 130		

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
1-Chlorooctane (Surr)	*110*		*70 - 130*
o-Terphenyl (Surr)	*117*		*70 - 130*

Lab Sample ID: 880-7229-11 MSD
Matrix: Solid
Analysis Batch: 9931

Client Sample ID: S-1 8'
Prep Type: Total/NA
Prep Batch: 9955

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	<49.9	U	998	908.5		mg/Kg		91	70 - 130	2	20
Diesel Range Organics (Over C10-C28)	<49.9	U	998	944.2		mg/Kg		95	70 - 130	2	20

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
1-Chlorooctane (Surr)	*108*		*70 - 130*

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

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

Lab Sample ID: 880-7229-11 MSD
Matrix: Solid
Analysis Batch: 9931

Client Sample ID: S-1 8'
Prep Type: Total/NA
Prep Batch: 9955

Surrogate	MSD %Recovery	MSD Qualifier	Limits
o-Terphenyl (Surr)	118		70 - 130

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-9767/1-A
Matrix: Solid
Analysis Batch: 10156

Client Sample ID: Method Blank
Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.00	U	5.00		mg/Kg			10/22/21 10:49	1

Lab Sample ID: LCS 880-9767/2-A
Matrix: Solid
Analysis Batch: 10156

Client Sample ID: Lab Control Sample
Prep Type: Soluble

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride			250	253.8		mg/Kg		102	90 - 110		

Lab Sample ID: LCSD 880-9767/3-A
Matrix: Solid
Analysis Batch: 10156

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	253.8		mg/Kg		102	90 - 110	0	20

Lab Sample ID: 880-7229-1 MS
Matrix: Solid
Analysis Batch: 10156

Client Sample ID: S-3 1'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride	6.93	F1	248	285.7	F1	mg/Kg		113	90 - 110		

Lab Sample ID: 880-7229-1 MSD
Matrix: Solid
Analysis Batch: 10156

Client Sample ID: S-3 1'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	6.93	F1	248	268.9		mg/Kg		106	90 - 110	6	20

Lab Sample ID: 880-7229-11 MS
Matrix: Solid
Analysis Batch: 10156

Client Sample ID: S-1 8'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride	333		251	580.8		mg/Kg		99	90 - 110		

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: 880-7229-11 MSD
Matrix: Solid
Analysis Batch: 10156

Client Sample ID: S-1 8'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	333		251	575.8		mg/Kg		97	90 - 110	1	20

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

GC VOA

Prep Batch: 9753

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-1	S-3 1'	Total/NA	Solid	5035	
880-7229-2	S-3 3'	Total/NA	Solid	5035	
880-7229-3	S-3 5'	Total/NA	Solid	5035	
880-7229-4	S-8 1'	Total/NA	Solid	5035	
880-7229-5	S-8 3'	Total/NA	Solid	5035	
880-7229-6	S-8 5'	Total/NA	Solid	5035	
880-7229-7	S-8 6'	Total/NA	Solid	5035	
880-7229-8	S-1 1'	Total/NA	Solid	5035	
880-7229-9	S-1 3'	Total/NA	Solid	5035	
880-7229-10	S-1 5'	Total/NA	Solid	5035	
880-7229-11	S-1 8'	Total/NA	Solid	5035	
880-7229-12	S-2 1'	Total/NA	Solid	5035	
880-7229-13	S-2 3'	Total/NA	Solid	5035	
880-7229-14	S-2 5'	Total/NA	Solid	5035	
880-7229-15	S-2 7'	Total/NA	Solid	5035	
MB 880-9753/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-9753/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-9753/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
820-2232-A-45-B MS	Matrix Spike	Total/NA	Solid	5035	
820-2232-A-45-C MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	

Analysis Batch: 9941

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-1	S-3 1'	Total/NA	Solid	8021B	9753
880-7229-2	S-3 3'	Total/NA	Solid	8021B	9753
880-7229-3	S-3 5'	Total/NA	Solid	8021B	9753
880-7229-4	S-8 1'	Total/NA	Solid	8021B	9753
880-7229-5	S-8 3'	Total/NA	Solid	8021B	9753
880-7229-6	S-8 5'	Total/NA	Solid	8021B	9753
880-7229-7	S-8 6'	Total/NA	Solid	8021B	9753
880-7229-8	S-1 1'	Total/NA	Solid	8021B	9753
880-7229-9	S-1 3'	Total/NA	Solid	8021B	9753
880-7229-10	S-1 5'	Total/NA	Solid	8021B	9753
880-7229-11	S-1 8'	Total/NA	Solid	8021B	9753
880-7229-12	S-2 1'	Total/NA	Solid	8021B	9753
880-7229-13	S-2 3'	Total/NA	Solid	8021B	9753
880-7229-14	S-2 5'	Total/NA	Solid	8021B	9753
880-7229-15	S-2 7'	Total/NA	Solid	8021B	9753
MB 880-9753/5-A	Method Blank	Total/NA	Solid	8021B	9753
LCS 880-9753/1-A	Lab Control Sample	Total/NA	Solid	8021B	9753
LCSD 880-9753/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	9753
820-2232-A-45-B MS	Matrix Spike	Total/NA	Solid	8021B	9753
820-2232-A-45-C MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	9753

Prep Batch: 9957

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-9957/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-9957/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-9957/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-7229-6 MS	S-8 5'	Total/NA	Solid	5035	
880-7229-6 MSD	S-8 5'	Total/NA	Solid	5035	

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

GC VOA

Prep Batch: 10041

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-10041/5-A	Method Blank	Total/NA	Solid	5035	

Analysis Batch: 10083

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-10041/5-A	Method Blank	Total/NA	Solid	8021B	10041
MB 880-9957/5-A	Method Blank	Total/NA	Solid	8021B	9957
LCS 880-9957/1-A	Lab Control Sample	Total/NA	Solid	8021B	9957
LCSD 880-9957/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	9957
880-7229-6 MS	S-8 5'	Total/NA	Solid	8021B	9957
880-7229-6 MSD	S-8 5'	Total/NA	Solid	8021B	9957

Analysis Batch: 10147

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-1	S-3 1'	Total/NA	Solid	Total BTEX	
880-7229-2	S-3 3'	Total/NA	Solid	Total BTEX	
880-7229-3	S-3 5'	Total/NA	Solid	Total BTEX	
880-7229-4	S-8 1'	Total/NA	Solid	Total BTEX	
880-7229-5	S-8 3'	Total/NA	Solid	Total BTEX	
880-7229-6	S-8 5'	Total/NA	Solid	Total BTEX	
880-7229-7	S-8 6'	Total/NA	Solid	Total BTEX	
880-7229-8	S-1 1'	Total/NA	Solid	Total BTEX	
880-7229-9	S-1 3'	Total/NA	Solid	Total BTEX	
880-7229-10	S-1 5'	Total/NA	Solid	Total BTEX	
880-7229-11	S-1 8'	Total/NA	Solid	Total BTEX	
880-7229-12	S-2 1'	Total/NA	Solid	Total BTEX	
880-7229-13	S-2 3'	Total/NA	Solid	Total BTEX	
880-7229-14	S-2 5'	Total/NA	Solid	Total BTEX	
880-7229-15	S-2 7'	Total/NA	Solid	Total BTEX	

GC Semi VOA

Analysis Batch: 9827

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-13	S-2 3'	Total/NA	Solid	8015B NM	9834
880-7229-14	S-2 5'	Total/NA	Solid	8015B NM	9834
880-7229-15	S-2 7'	Total/NA	Solid	8015B NM	9834
MB 880-9834/1-A	Method Blank	Total/NA	Solid	8015B NM	9834
LCS 880-9834/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9834
LCSD 880-9834/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9834
890-1428-A-3-D MS	Matrix Spike	Total/NA	Solid	8015B NM	9834
890-1428-A-3-E MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9834

Prep Batch: 9834

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-13	S-2 3'	Total/NA	Solid	8015NM Prep	
880-7229-14	S-2 5'	Total/NA	Solid	8015NM Prep	
880-7229-15	S-2 7'	Total/NA	Solid	8015NM Prep	
MB 880-9834/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9834/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9834/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1428-A-3-D MS	Matrix Spike	Total/NA	Solid	8015NM Prep	

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

GC Semi VOA (Continued)

Prep Batch: 9834 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1428-A-3-E MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

Analysis Batch: 9931

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-1	S-3 1'	Total/NA	Solid	8015B NM	9955
880-7229-2	S-3 3'	Total/NA	Solid	8015B NM	9955
880-7229-3	S-3 5'	Total/NA	Solid	8015B NM	9955
880-7229-4	S-8 1'	Total/NA	Solid	8015B NM	9955
880-7229-5	S-8 3'	Total/NA	Solid	8015B NM	9955
880-7229-6	S-8 5'	Total/NA	Solid	8015B NM	9955
880-7229-7	S-8 6'	Total/NA	Solid	8015B NM	9955
880-7229-8	S-1 1'	Total/NA	Solid	8015B NM	9955
880-7229-9	S-1 3'	Total/NA	Solid	8015B NM	9955
880-7229-10	S-1 5'	Total/NA	Solid	8015B NM	9955
880-7229-11	S-1 8'	Total/NA	Solid	8015B NM	9955
880-7229-12	S-2 1'	Total/NA	Solid	8015B NM	9955
MB 880-9955/1-A	Method Blank	Total/NA	Solid	8015B NM	9955
LCS 880-9955/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9955
LCSD 880-9955/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9955
880-7229-11 MS	S-1 8'	Total/NA	Solid	8015B NM	9955
880-7229-11 MSD	S-1 8'	Total/NA	Solid	8015B NM	9955

Prep Batch: 9955

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-1	S-3 1'	Total/NA	Solid	8015NM Prep	
880-7229-2	S-3 3'	Total/NA	Solid	8015NM Prep	
880-7229-3	S-3 5'	Total/NA	Solid	8015NM Prep	
880-7229-4	S-8 1'	Total/NA	Solid	8015NM Prep	
880-7229-5	S-8 3'	Total/NA	Solid	8015NM Prep	
880-7229-6	S-8 5'	Total/NA	Solid	8015NM Prep	
880-7229-7	S-8 6'	Total/NA	Solid	8015NM Prep	
880-7229-8	S-1 1'	Total/NA	Solid	8015NM Prep	
880-7229-9	S-1 3'	Total/NA	Solid	8015NM Prep	
880-7229-10	S-1 5'	Total/NA	Solid	8015NM Prep	
880-7229-11	S-1 8'	Total/NA	Solid	8015NM Prep	
880-7229-12	S-2 1'	Total/NA	Solid	8015NM Prep	
MB 880-9955/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9955/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9955/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-7229-11 MS	S-1 8'	Total/NA	Solid	8015NM Prep	
880-7229-11 MSD	S-1 8'	Total/NA	Solid	8015NM Prep	

Analysis Batch: 10145

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-1	S-3 1'	Total/NA	Solid	8015 NM	
880-7229-2	S-3 3'	Total/NA	Solid	8015 NM	
880-7229-3	S-3 5'	Total/NA	Solid	8015 NM	
880-7229-4	S-8 1'	Total/NA	Solid	8015 NM	
880-7229-5	S-8 3'	Total/NA	Solid	8015 NM	
880-7229-6	S-8 5'	Total/NA	Solid	8015 NM	
880-7229-7	S-8 6'	Total/NA	Solid	8015 NM	

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

GC Semi VOA (Continued)

Analysis Batch: 10145 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-8	S-1 1'	Total/NA	Solid	8015 NM	
880-7229-9	S-1 3'	Total/NA	Solid	8015 NM	
880-7229-10	S-1 5'	Total/NA	Solid	8015 NM	
880-7229-11	S-1 8'	Total/NA	Solid	8015 NM	
880-7229-12	S-2 1'	Total/NA	Solid	8015 NM	
880-7229-13	S-2 3'	Total/NA	Solid	8015 NM	
880-7229-14	S-2 5'	Total/NA	Solid	8015 NM	
880-7229-15	S-2 7'	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 9767

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-1	S-3 1'	Soluble	Solid	DI Leach	
880-7229-2	S-3 3'	Soluble	Solid	DI Leach	
880-7229-3	S-3 5'	Soluble	Solid	DI Leach	
880-7229-4	S-8 1'	Soluble	Solid	DI Leach	
880-7229-5	S-8 3'	Soluble	Solid	DI Leach	
880-7229-6	S-8 5'	Soluble	Solid	DI Leach	
880-7229-7	S-8 6'	Soluble	Solid	DI Leach	
880-7229-8	S-1 1'	Soluble	Solid	DI Leach	
880-7229-9	S-1 3'	Soluble	Solid	DI Leach	
880-7229-10	S-1 5'	Soluble	Solid	DI Leach	
880-7229-11	S-1 8'	Soluble	Solid	DI Leach	
880-7229-12	S-2 1'	Soluble	Solid	DI Leach	
880-7229-13	S-2 3'	Soluble	Solid	DI Leach	
880-7229-14	S-2 5'	Soluble	Solid	DI Leach	
880-7229-15	S-2 7'	Soluble	Solid	DI Leach	
MB 880-9767/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9767/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9767/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-7229-1 MS	S-3 1'	Soluble	Solid	DI Leach	
880-7229-1 MSD	S-3 1'	Soluble	Solid	DI Leach	
880-7229-11 MS	S-1 8'	Soluble	Solid	DI Leach	
880-7229-11 MSD	S-1 8'	Soluble	Solid	DI Leach	

Analysis Batch: 10156

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-1	S-3 1'	Soluble	Solid	300.0	9767
880-7229-2	S-3 3'	Soluble	Solid	300.0	9767
880-7229-3	S-3 5'	Soluble	Solid	300.0	9767
880-7229-4	S-8 1'	Soluble	Solid	300.0	9767
880-7229-5	S-8 3'	Soluble	Solid	300.0	9767
880-7229-6	S-8 5'	Soluble	Solid	300.0	9767
880-7229-7	S-8 6'	Soluble	Solid	300.0	9767
880-7229-8	S-1 1'	Soluble	Solid	300.0	9767
880-7229-9	S-1 3'	Soluble	Solid	300.0	9767
880-7229-10	S-1 5'	Soluble	Solid	300.0	9767
880-7229-11	S-1 8'	Soluble	Solid	300.0	9767
880-7229-12	S-2 1'	Soluble	Solid	300.0	9767
880-7229-13	S-2 3'	Soluble	Solid	300.0	9767

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

HPLC/IC (Continued)

Analysis Batch: 10156 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7229-14	S-2 5'	Soluble	Solid	300.0	9767
880-7229-15	S-2 7'	Soluble	Solid	300.0	9767
MB 880-9767/1-A	Method Blank	Soluble	Solid	300.0	9767
LCS 880-9767/2-A	Lab Control Sample	Soluble	Solid	300.0	9767
LCSD 880-9767/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9767
880-7229-1 MS	S-3 1'	Soluble	Solid	300.0	9767
880-7229-1 MSD	S-3 1'	Soluble	Solid	300.0	9767
880-7229-11 MS	S-1 8'	Soluble	Solid	300.0	9767
880-7229-11 MSD	S-1 8'	Soluble	Solid	300.0	9767

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-3 1'
Date Collected: 10/13/21 11:15
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-1
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	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 18:25	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 17:20	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 11:10	CH	XEN MID

Client Sample ID: S-3 3'
Date Collected: 10/13/21 11:16
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-2
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			4.95 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 18:46	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 13:49	AJ	XEN MID
Soluble	Leach	DI Leach			4.97 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 11:31	CH	XEN MID

Client Sample ID: S-3 5'
Date Collected: 10/13/21 11:17
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-3
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			5.04 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 19:06	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 14:10	AJ	XEN MID
Soluble	Leach	DI Leach			4.97 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 11:38	CH	XEN MID

Client Sample ID: S-8 1'
Date Collected: 10/13/21 11:30
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-4
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.00 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 19:27	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-8 1'
Date Collected: 10/13/21 11:30
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-4
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			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 14:32	AJ	XEN MID
Soluble	Leach	DI Leach			4.99 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		5			10156	10/22/21 11:45	CH	XEN MID

Client Sample ID: S-8 3'
Date Collected: 10/13/21 11:31
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-5
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			5.04 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 19:47	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 14:52	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		5			10156	10/22/21 11:51	CH	XEN MID

Client Sample ID: S-8 5'
Date Collected: 10/13/21 11:32
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-6
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	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 21:09	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 15:14	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 12:12	CH	XEN MID

Client Sample ID: S-8 6'
Date Collected: 10/13/21 11:33
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-7
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	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 21:29	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 15:35	AJ	XEN MID

Eurofins Xenco, Midland

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-8 6'
Date Collected: 10/13/21 11:33
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-7
Matrix: Solid

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	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 12:19	CH	XEN MID

Client Sample ID: S-1 1'
Date Collected: 10/13/21 12:10
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-8
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			4.96 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 21:50	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 15:56	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 12:26	CH	XEN MID

Client Sample ID: S-1 3'
Date Collected: 10/13/21 12:11
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-9
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			5.03 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 22:10	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 16:17	AJ	XEN MID
Soluble	Leach	DI Leach			4.95 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 12:33	CH	XEN MID

Client Sample ID: S-1 5'
Date Collected: 10/13/21 12:12
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-10
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			5.00 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 22:31	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 16:38	AJ	XEN MID
Soluble	Leach	DI Leach			5.00 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 12:40	CH	XEN MID

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-1 8'
Date Collected: 10/13/21 12:13
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-11
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			4.98 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 22:51	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 12:45	AJ	XEN MID
Soluble	Leach	DI Leach			4.99 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 12:47	CH	XEN MID

Client Sample ID: S-2 1'
Date Collected: 10/13/21 12:30
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-12
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			4.95 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 23:11	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	9955	10/20/21 10:56	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9931	10/20/21 17:42	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 14:09	CH	XEN MID

Client Sample ID: S-2 3'
Date Collected: 10/13/21 12:31
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-13
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			4.95 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 23:32	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	9834	10/19/21 09:45	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9827	10/19/21 19:09	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		5			10156	10/22/21 13:07	CH	XEN MID

Client Sample ID: S-2 5'
Date Collected: 10/13/21 12:32
Date Received: 10/14/21 08:45

Lab Sample ID: 880-7229-14
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	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/20/21 23:52	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Client Sample ID: S-2 5'

Lab Sample ID: 880-7229-14
Matrix: Solid
Date Collected: 10/13/21 12:32
Date Received: 10/14/21 08:45

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			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	9834	10/19/21 09:45	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9827	10/19/21 19:31	AJ	XEN MID
Soluble	Leach	DI Leach			5.04 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 13:14	CH	XEN MID

Client Sample ID: S-2 7'

Lab Sample ID: 880-7229-15
Matrix: Solid
Date Collected: 10/13/21 12:33
Date Received: 10/14/21 08:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	9753	10/18/21 14:13	KL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	9941	10/21/21 00:13	KL	XEN MID
Total/NA	Analysis	Total BTEX		1			10147	10/21/21 17:04	AJ	XEN MID
Total/NA	Analysis	8015 NM		1			10145	10/21/21 16:01	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	9834	10/19/21 09:45	AJ	XEN MID
Total/NA	Analysis	8015B NM		1			9827	10/19/21 19:52	AJ	XEN MID
Soluble	Leach	DI Leach			4.96 g	50 mL	9767	10/18/21 14:24	CA	XEN MID
Soluble	Analysis	300.0		1			10156	10/22/21 13:35	CH	XEN MID

Laboratory References:

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

Accreditation/Certification Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

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

Method Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

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

Sample Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus

Job ID: 880-7229-1
SDG: 21-0100-21

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
880-7229-1	S-3 1'	Solid	10/13/21 11:15	10/14/21 08:45
880-7229-2	S-3 3'	Solid	10/13/21 11:16	10/14/21 08:45
880-7229-3	S-3 5'	Solid	10/13/21 11:17	10/14/21 08:45
880-7229-4	S-8 1'	Solid	10/13/21 11:30	10/14/21 08:45
880-7229-5	S-8 3'	Solid	10/13/21 11:31	10/14/21 08:45
880-7229-6	S-8 5'	Solid	10/13/21 11:32	10/14/21 08:45
880-7229-7	S-8 6'	Solid	10/13/21 11:33	10/14/21 08:45
880-7229-8	S-1 1'	Solid	10/13/21 12:10	10/14/21 08:45
880-7229-9	S-1 3'	Solid	10/13/21 12:11	10/14/21 08:45
880-7229-10	S-1 5'	Solid	10/13/21 12:12	10/14/21 08:45
880-7229-11	S-1 8'	Solid	10/13/21 12:13	10/14/21 08:45
880-7229-12	S-2 1'	Solid	10/13/21 12:30	10/14/21 08:45
880-7229-13	S-2 3'	Solid	10/13/21 12:31	10/14/21 08:45
880-7229-14	S-2 5'	Solid	10/13/21 12:32	10/14/21 08:45
880-7229-15	S-2 7'	Solid	10/13/21 12:33	10/14/21 08:45

No. 2154

880-7229 Chain of Custody

STODY

1 OF 1

Larson & Associates, Inc.
Environmental Consultants
507 N Marienfeld Ste 202
Midland TX 79701
432-687 0901

DATE 10-13-21

PO#

LAB WORK ORDER

PROJECT LOCATION OR NAME Perseus

LAI PROJECT # 21-0100-21

COLLECTOR TP & MB

Data Reported to

TRRP report? ☐ Yes ☒ No

TIME ZONE
Time zone/State MST/NM

S=SOIL P=PAINT
W=WATER SL=SLUDGE
A=AIR OT=OTHER

PRESERVATION: HCl, HNO_3, H_2SO_4, NaOH, ICE, UNPRESERVED

ANALYSES: BTEX ☒ MTBE ☐ | TRPH 418.1 ☐ | TPH 1005 ☐ | TPH 1006 ☐ | GASOLINE MOD 8015 ☐ | DIESEL - MOD 8015 ☐ | OIL - MOD 8015 ☐ | VOC 8260 ☐ | SVOC 8270 ☐ | PAH 8270 ☐ | HOLDPAH ☐ | 8081 PESTICIDES ☐ | 8151 HERBICIDES ☐ | 8082 PCBS ☐ | TCLP - METALS (RCRA) ☐ | TCLP VOC ☐ | TCLP - PEST ☐ | HERB ☐ | Semi-VOC ☐ | TOTAL METALS (RCRA) ☐ | OTHER LIST ☐ | LEAD - TOTAL ☐ | D W 200.8 ☐ | TCLP ☐ | RCI ☐ | TOX ☐ | FLASHPOINT ☐ | TDS ☐ | TSS ☐ | % MOISTURE ☐ | pH ☐ | HEXAVALENT CHROMIUM ☐ | EXPLOSIVES ☐ | CYANIDE ☐ | CHLORIDES ☐ | PECHLORATE ☐ | ANIONS ☐ | ALKALINITY ☐

Field Sample I D	Lab #	Date	Time	Matrix	# of Containers	HCl	HNO_3	H_2SO_4 NaOH	ICE	UNPRESERVED	BTEX	TRPH 418.1	GASOLINE MOD 8015	DIESEL - MOD 8015	OIL - MOD 8015	pH	FIELD NOTES
S-3 1'		10/13/21	1115	S	1				X		X		X	X	X		
S-3 3'			1116														
S-3 5'			1117														
S-8 1'			1130														
S-8 3'			1131														
S-8 5'			1132														
S-8 6'			1133														
S-1 1'			1210														
S-1 3'			1211														
S-1 5'			1212														
S-1 8'			1213														
S-2 1'			1230														
S-2 3'			1231														
S-2 5'			1232														
S-2 7'			1233														
TOTAL 15																	

RELINQUISHED BY (Signature) DATE/TIME
2 Pet 0849 10/14/21

RECEIVED BY (Signature)
10-14-21 0845

RELINQUISHED BY (Signature) DATE/TIME

RECEIVED BY (Signature)

RELINQUISHED BY (Signature) DATE/TIME

RECEIVED BY (Signature)

LABORATORY

TURN AROUND TIME
NORMAL ☒
1 DAY ☐
2 DAY ☐
OTHER ☐

LABORATORY USE ONLY:
RECEIVING TEMP -2.1/-2.2 THERM# IR8
CUSTODY SEALS - ☐ BROKEN ☐ INTACT ☐ NOT USED
☐ CARRIER BILL #
☐ HAND DELIVERED

Login Sample Receipt Checklist

Client: Larson & Associates, Inc.

Job Number: 880-7229-1
SDG Number: 21-0100-21

Login Number: 7229
List Number: 1
Creator: Kramer, Jessica

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	
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	

eurofins | Environment Testing America

ANALYTICAL REPORT

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

Laboratory Job ID: 880-9102-1
Laboratory Sample Delivery Group: 21-0100-21
Client Project/Site: Perseus CB

For:
Larson & Associates, Inc.
507 N Marienfeld
Suite 202
Midland, Texas 79701

Attn: Mr. Mark J Larson

Holly Taylor

Authorized for release by:
12/16/2021 1:54:43 PM

Holly Taylor, Project Manager
(806)794-1296
holly.taylor@eurofinset.com

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: Larson & Associates, Inc.
Project/Site: Perseus CB

Laboratory Job ID: 880-9102-1
SDG: 21-0100-21

Table of Contents

Definitions/Glossary

Client: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

Qualifiers

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.
¤	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

Case Narrative

Client: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

Job ID: 880-9102-1

Laboratory: Eurofins Xenco, Midland

Narrative

Job Narrative
880-9102-1

Receipt
The samples were received on 12/8/2021 9:32 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 -1.3°C

Per Robert Nelson the lab was instructed to run Cl only on all three samples.

HPLC/IC
Method 300_ORGFM_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-14488 and analytical batch 880-14573 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: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

Client Sample ID: S-8,10'
Lab Sample ID: 880-9102-1
Date Collected: 12/07/21 10:56
Matrix: Solid
Date Received: 12/08/21 09:32

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	688	F1	4.95		mg/Kg			12/12/21 19:46	1

Client Sample ID: S-8,15'
Lab Sample ID: 880-9102-2
Date Collected: 12/07/21 11:08
Matrix: Solid
Date Received: 12/08/21 09:32

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	105		4.97		mg/Kg			12/15/21 22:49	1

Client Sample ID: S-8,20'
Lab Sample ID: 880-9102-3
Date Collected: 12/07/21 11:17
Matrix: Solid
Date Received: 12/08/21 09:32

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	61.6		4.98		mg/Kg			12/15/21 22:57	1

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-14488/1-A
Matrix: Solid
Analysis Batch: 14573

Client Sample ID: Method Blank
Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.00	U	5.00		mg/Kg			12/12/21 19:26	1

Lab Sample ID: LCS 880-14488/2-A
Matrix: Solid
Analysis Batch: 14573

Client Sample ID: Lab Control Sample
Prep Type: Soluble

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 880-14488/3-A
Matrix: Solid
Analysis Batch: 14573

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	263.2		mg/Kg		105	90 - 110	0	20

Lab Sample ID: 880-9102-1 MS
Matrix: Solid
Analysis Batch: 14573

Client Sample ID: S-8,10'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride	688	F1	248	978.3	F1	mg/Kg		117	90 - 110		

Lab Sample ID: 880-9102-1 MSD
Matrix: Solid
Analysis Batch: 14573

Client Sample ID: S-8,10'
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Chloride	688	F1	248	950.5		mg/Kg		106	90 - 110	3	20

Lab Sample ID: MB 880-14911/1-A
Matrix: Solid
Analysis Batch: 14925

Client Sample ID: Method Blank
Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.00	U	5.00		mg/Kg			12/15/21 20:59	1

Lab Sample ID: LCS 880-14911/2-A
Matrix: Solid
Analysis Batch: 14925

Client Sample ID: Lab Control Sample
Prep Type: Soluble

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Chloride			250	249.4		mg/Kg		100	90 - 110		

Lab Sample ID: LCSD 880-14911/3-A
Matrix: Solid
Analysis Batch: 14925

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	248.9		mg/Kg		100	90 - 110	0	20

QC Sample Results

Client: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: 880-9379-A-1-B MS
Matrix: Solid
Analysis Batch: 14925

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	12300		5050	17280		mg/Kg		98	90 - 110		

Lab Sample ID: 880-9379-A-1-C MSD
Matrix: Solid
Analysis Batch: 14925

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	12300		5050	17290		mg/Kg		98	90 - 110	0	20

QC Association Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

HPLC/IC

Leach Batch: 14488

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9102-1	S-8,10'	Soluble	Solid	DI Leach	
MB 880-14488/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-14488/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-14488/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-9102-1 MS	S-8,10'	Soluble	Solid	DI Leach	
880-9102-1 MSD	S-8,10'	Soluble	Solid	DI Leach	

Analysis Batch: 14573

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9102-1	S-8,10'	Soluble	Solid	300.0	14488
MB 880-14488/1-A	Method Blank	Soluble	Solid	300.0	14488
LCS 880-14488/2-A	Lab Control Sample	Soluble	Solid	300.0	14488
LCSD 880-14488/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	14488
880-9102-1 MS	S-8,10'	Soluble	Solid	300.0	14488
880-9102-1 MSD	S-8,10'	Soluble	Solid	300.0	14488

Leach Batch: 14911

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9102-2	S-8,15'	Soluble	Solid	DI Leach	
880-9102-3	S-8,20'	Soluble	Solid	DI Leach	
MB 880-14911/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-14911/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-14911/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-9379-A-1-B MS	Matrix Spike	Soluble	Solid	DI Leach	
880-9379-A-1-C MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	

Analysis Batch: 14925

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-9102-2	S-8,15'	Soluble	Solid	300.0	14911
880-9102-3	S-8,20'	Soluble	Solid	300.0	14911
MB 880-14911/1-A	Method Blank	Soluble	Solid	300.0	14911
LCS 880-14911/2-A	Lab Control Sample	Soluble	Solid	300.0	14911
LCSD 880-14911/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	14911
880-9379-A-1-B MS	Matrix Spike	Soluble	Solid	300.0	14911
880-9379-A-1-C MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	14911

Lab Chronicle

Client: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

Client Sample ID: S-8,10'
Date Collected: 12/07/21 10:56
Date Received: 12/08/21 09:32

Lab Sample ID: 880-9102-1
Matrix: Solid

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	14488	12/10/21 12:00	CH	XEN MID
Soluble	Analysis	300.0		1			14573	12/12/21 19:46	CH	XEN MID

Client Sample ID: S-8,15'
Date Collected: 12/07/21 11:08
Date Received: 12/08/21 09:32

Lab Sample ID: 880-9102-2
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			5.03 g	50 mL	14911	12/15/21 16:00	CH	XEN MID
Soluble	Analysis	300.0		1			14925	12/15/21 22:49	CH	XEN MID

Client Sample ID: S-8,20'
Date Collected: 12/07/21 11:17
Date Received: 12/08/21 09:32

Lab Sample ID: 880-9102-3
Matrix: Solid

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	14911	12/15/21 16:00	CH	XEN MID
Soluble	Analysis	300.0		1			14925	12/15/21 22:57	CH	XEN MID

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

Accreditation/Certification Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

Laboratory: Eurofins Xenco, Midland

The accreditations/certifications listed below are applicable to this report.

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

Method Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

Method	Method Description	Protocol	Laboratory
300.0	Anions, Ion Chromatography	MCAWW	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.

Laboratory References:

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

Sample Summary

Client: Larson & Associates, Inc.
Project/Site: Perseus CB

Job ID: 880-9102-1
SDG: 21-0100-21

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
880-9102-1	S-8,10'	Solid	12/07/21 10:56	12/08/21 09:32
880-9102-2	S-8,15'	Solid	12/07/21 11:08	12/08/21 09:32
880-9102-3	S-8,20'	Solid	12/07/21 11:17	12/08/21 09:32

No. 2288

9102

CHAIN-OF-CUSTODY

Larson & Associates, Inc.
Environmental Consultants
507 N Marienfeld, Ste 202
Midland TX 79701
432-687 0901

Data Reported to

DATE 12/7/21 PAGE 1 OF 1

PO# LAB WORK ORDER#

PROJECT LOCATION OR NAME Perseus CB

LAI PROJECT # 21-0100-21 COLLECTOR RW

TRRP report? ☐ Yes ☒ No

S=SOIL P=PAINT
W=WATER SL=SLUDGE
A=AIR OT=OTHER

TIME ZONE
Time zone/State
MST/NM

Field Sample I D	Lab #	Date	Time	Matrix	# of Containers	PRESERVATION: HCl	HNO_3	H_2SO_4 / NaOH	ICE	UNPRESSERVED	ANALYSES: BTEX	TRPH 418.1	TPH 1005	TPH 1006	GASOLINE MOD 8015	DIESEL - MOD 8015	OIL MOD 8015	VOC 8260	SVOC 8270	PAH 8270	HOLDPAH	8081 PESTICIDES	8151 HERBICIDES	8082 PCBS	TCLP - METALS (RCRA)	TCLP - PEST	HERB	TCLP VOC	TOTAL METALS (RCRA)	Semi-VOC	LEAD - TOTAL	OTHER LIST	DW 200.8	TCLP	RCI	TOX	FLASHPOINT	TDS	TSS	% MOISTURE	pH	CYANIDE	HEXAVALENT CHROMIUM	EXPLOSIVES	PECHLORATE	CHLORIDE	ANIONS	ALKALINITY	FIELD NOTES
S-8, 10'		12/7/21	1056	S	1				X		X				X	X	X																															Analyze Chloride to 600 mg/kg
S-8, 15'		1	1108	1	1				1		1				1	1	1																																	
S-8, 20'		1	1117	1	1				1		1				1	1	1																																	
TOTAL 3					3																																										

880-9102 Chain of Custody

RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)
	12/7/21 1706	
RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)
	12/8 932	
RELINQUISHED BY (Signature)	DATE/TIME	RECEIVED BY (Signature)

LABORATORY Xenco

TURN AROUND TIME
NORMAL ☒
1 DAY ☐
2 DAY ☐
OTHER ☐

LABORATORY USE ONLY:
RECEIVING TEMP° 1.2-1.3 THERM# IR8
CUSTODY SEALS - ☐ BROKEN ☑ INTACT ☐ NOT USED
☐ CARRIER BILL #
☐ HAND DELIVERED

Login Sample Receipt Checklist

Client: Larson & Associates, Inc.

Job Number: 880-9102-1
SDG Number: 21-0100-21

Login Number: 9102
List Number: 1
Creator: Teel, Brianna

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	
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	

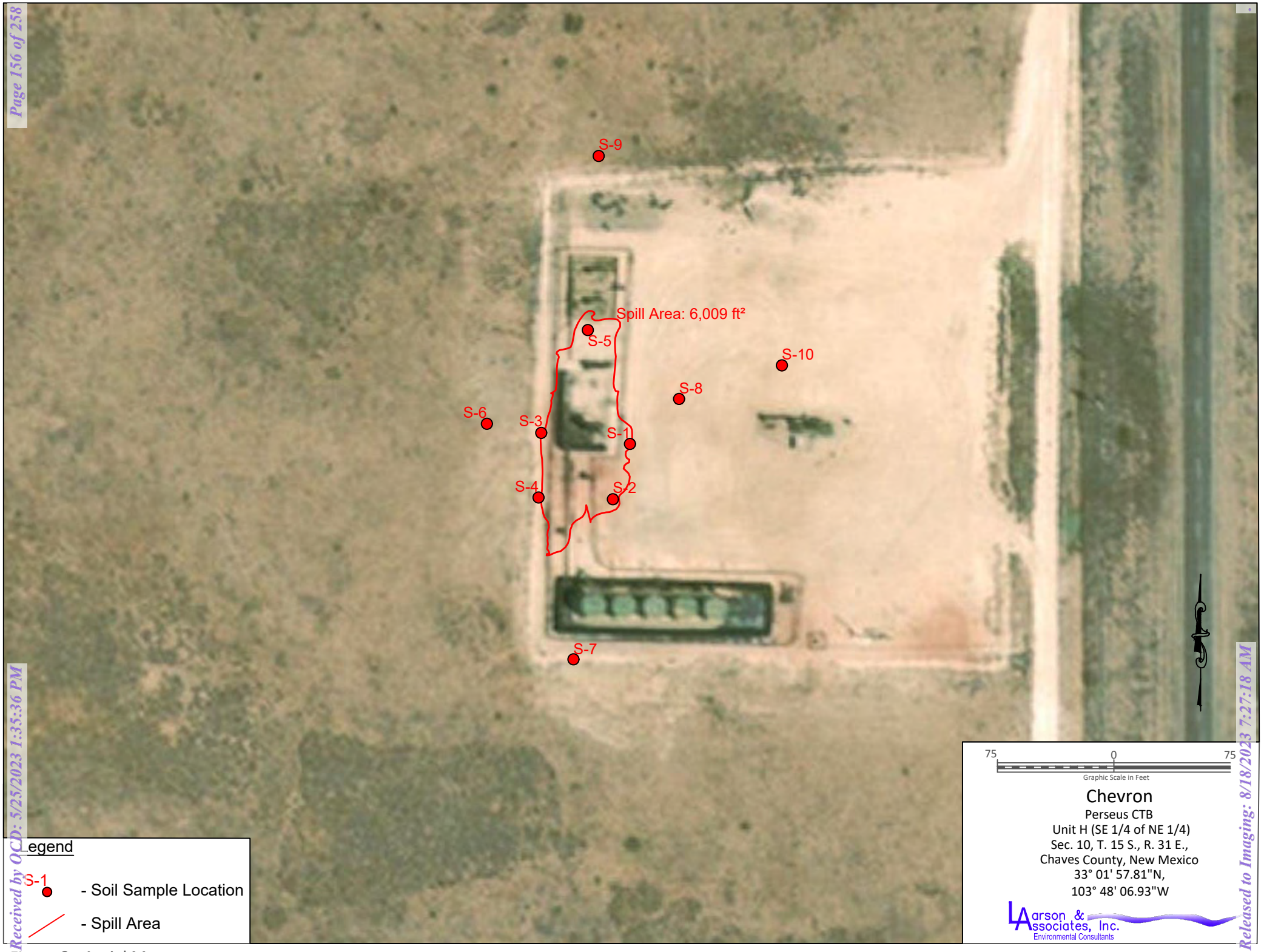


Figure 2 - Aerial Map

Appendix IV

Photographic Documentation

Photograph No.1 Description:

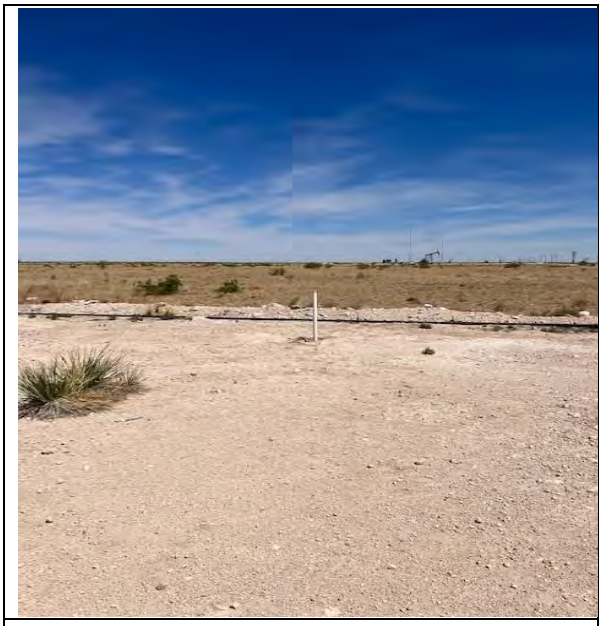
Well sign.

Photograph No.2 Description:

Release area in containment on western portion of the well pad.

Photograph No.3 Description:

Release area and adjacent pasture on western portion of well pad.



Photograph No.4 Description:

Completed temporary well on northern portion of well pad.

Photograph No.5 Description:

Excavation of S-3 area

Photograph No.6 Description:

Excavation of areas around S-1 and S-2

Photograph No.7 Description:

Aerial of backfilled area

Photograph No.8 Description:

Aerial of backfilled area

Appendix V

Laboratory Analytical Data

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

July 18, 2022

DAVID ADKINS

TALON LPE

408 W. TEXAS AVE.

ARTESIA, NM 88210

RE: PERSEUS 10 CTB

Enclosed are the results of analyses for samples received by the laboratory on 07/13/22 12:15.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-22-15. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/qa/lab_accred_certif.html.

Cardinal Laboratories is accreditated through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2	Haloacetic Acids (HAA-5)
Method EPA 524.2	Total Trihalomethanes (TTHM)
Method EPA 524.4	Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Celey D. Keene

Celey D. Keene

Lab Director/Quality Manager

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Analytical Results For:

TALON LPE
DAVID ADKINS
408 W. TEXAS AVE.
ARTESIA NM, 88210
Fax To: (575) 745-8905

Received:	07/13/2022	Sampling Date:	07/05/2022
Reported:	07/18/2022	Sampling Type:	Soil
Project Name:	PERSEUS 10 CTB	Sampling Condition:	Cool & Intact
Project Number:	704001.001.01	Sample Received By:	Shalyn Rodriguez
Project Location:	BAM PERMIAN - CHAVES COUNTY, NM		

Sample ID: S - 1 0.5R (H223033-01)

BTEX 8021B mg/kg Analyzed By: JH

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	07/15/2022	ND	1.96	98.1	2.00	0.0412	
Toluene*	<0.050	0.050	07/15/2022	ND	2.14	107	2.00	0.928	
Ethylbenzene*	<0.050	0.050	07/15/2022	ND	2.07	104	2.00	0.0974	
Total Xylenes*	<0.150	0.150	07/15/2022	ND	6.51	108	6.00	0.318	
Total BTEX	<0.300	0.300	07/15/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID *102 %* *69.9-140*

Chloride, SM4500Cl-B mg/kg Analyzed By: GM

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	**48.0**	16.0	07/14/2022	ND	432	108	400	7.69	

TPH 8015M mg/kg Analyzed By: MS

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	07/14/2022	ND	203	101	200	3.05	
DRO >C10-C28*	**339**	10.0	07/14/2022	ND	194	97.2	200	6.23	
EXT DRO >C28-C36	**106**	10.0	07/14/2022	ND					

Surrogate: 1-Chlorooctane *89.8 %* *43-149*

Surrogate: 1-Chlorooctadecane *130 %* *42.5-161*

Cardinal Laboratories *=Accredited Analyte

Celey D. Keene, Lab Director/Quality Manager

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Notes and Definitions

QM-07	The spike recovery was outside acceptance limits for the MS and/or MSD. The batch was accepted based on acceptable LCS recovery.
ND	Analyte NOT DETECTED at or above the reporting limit
RPD	Relative Percent Difference
**	Samples not received at proper temperature of 6°C or below.
***	Insufficient time to reach temperature.
-	Chloride by SM4500Cl-B does not require samples be received at or below 6°C
	Samples reported on an as received basis (wet) unless otherwise noted on report

Cardinal Laboratories *=Accredited Analyte

Celey D. Keene, Lab Director/Quality Manager

CARDINAL Laboratories

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

101 East Marland, Hobbs, NM 88240
(575) 393-2326 FAX (575) 393-2476

Company Name: Talon LPE
Project Manager: D. Adkins
Address: 408 W. Texas Ave
City: Artesia State: NM Zip: 88210
Phone #: 575.746.8768 Fax #:
Project #: 704001.001.01 Project Owner: BAM Permian
Project Name: Perseus 10 CTB
Project Location: Chaves County, NM
Sampler Name: M. Gomez

BILL TO
P.O. #:
Company:
Attn:
Address:
City:
State: Zip:
Phone #:
Fax #:

ANALYSIS REQUEST

FOR LAB USE ONLY Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX: GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :	PRESERV.: ACID/BASE:	ICE / COOL	OTHER :	SAMPLING: DATE	TIME	Chlorides	TPH	BTEX
H223033-1	S-1 0.5'R	G	1			X					X		7/5/22	10:00	X	X	X

PLEASE NOTE: Liability and Damages. Cardinal's liability and client's exclusive remedy for any claim arising whether based in contract or tort, shall be limited to the amount paid by the client for the analyses. All claims including those for negligence and any other cause whatsoever shall be deemed waived unless made in writing and received by Cardinal within 30 days after completion of the applicable service. In no event shall Cardinal be liable for incidental or consequental damages, including without limitation, business interruptions, loss of use, or loss of profits incurred by client, its subsidiaries, affiliates or successors arising out of or related to the performance of services hereunder by Cardinal, regardless of whether such claim is based upon any of the above stated reasons or otherwise.

Relinquished By: Matthew Gomez Date: 7.13.22 Time: 125 Received By: S Rodriguez
Relinquished By: Date: Time: Received By:

Delivered By: (Circle One) Sampler - UPS - Bus - Other: 4.1°C-0.6°C 3.5°C #113

Sample Condition: Cool ☐ Yes ☐ No Intact ☐ Yes ☐ No
CHECKED BY: (Initials) SR

Phone Result: ☐ Yes ☐ No Add'l Phone #:
Fax Result: ☐ Yes ☐ No Add'l Fax #:
REMARKS:

† Cardinal cannot accept verbal changes. Please fax written changes to (575) 393-2326

eurofins | Environment Testing America

ANALYTICAL REPORT

Eurofins Carlsbad
1089 N Canal St.
Carlsbad, NM 88220
Tel: (575)988-3199

Laboratory Job ID: 890-2529-1
Laboratory Sample Delivery Group: 704001.001.01
Client Project/Site: Perserus CTB
Revision: 1

For:
Talon/LPE
408 W. Texas St.
Artesia, New Mexico 88210

Attn: David Adkins

JKramer

Authorized for release by:
7/20/2022 4:18:37 PM

Jessica Kramer, Project Manager
(432)704-5440
Jessica.Kramer@et.eurofinsus.com

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: Talon/LPE
Project/Site: Perserus CTB

Laboratory Job ID: 890-2529-1
SDG: 704001.001.01

Table of Contents

Definitions/Glossary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

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
B	Compound was found in the blank and sample.
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.
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.
¤	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

Case Narrative

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Job ID: 890-2529-1

Laboratory: Eurofins Carlsbad

Narrative

Job Narrative
890-2529-1

REVISION

The report being provided is a revision of the original report sent on 7/18/2022. The report (revision 1) is being revised due to Samples 26 & 27 incorrect chloride data reported. Revision needed.

Report revision history

Receipt
The samples were received on 7/11/2022 10:43 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 3.8°C

GC VOA
Method 8021B: Surrogate recovery for the following sample was outside control limits: S-10 (890-2529-9). 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: S-14 (890-2529-13). Evidence of matrix interference is present; therefore, re-extraction and/or re-analysis was not performed.

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 matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-29564 and analytical batch 880-29605 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 8015MOD_NM: Surrogate recovery for the following samples were outside control limits: S-3 (890-2529-2), S-4 (890-2529-3), S-5 (890-2529-4), S-7 (890-2529-6), E-SW2 (890-2529-20), (890-2529-A-1-B MS) and (890-2529-A-1-C MSD). Evidence of matrix interferences is not obvious.

Method 8015MOD_NM: The method blank for preparation batch 880-29622 and analytical batch 880-29609 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.

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 880-29573 and 880-29573 and analytical batch 880-29750 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: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-2

Date Collected: 07/08/22 14:00
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-1
Matrix: Solid

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		07/14/22 10:08	07/16/22 01:12	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		07/14/22 10:08	07/16/22 01:12	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		07/14/22 10:08	07/16/22 01:12	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 10:08	07/16/22 01:12	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		07/14/22 10:08	07/16/22 01:12	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 10:08	07/16/22 01:12	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*117*		*70 - 130*	*07/14/22 10:08*	*07/16/22 01:12*	*1*
1,4-Difluorobenzene (Surr)	*110*		*70 - 130*	*07/14/22 10:08*	*07/16/22 01:12*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**78.3**		49.9	15.0	mg/Kg			07/14/22 09:07	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	**33.9**	**J B F1 F2**	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 11:31	1
Diesel Range Organics (Over C10-C28)	**44.4**	**J B F1 F2**	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 11:31	1
OII Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 11:31	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*81*		*70 - 130*	*07/12/22 15:34*	*07/13/22 11:31*	*1*
o-Terphenyl	*84*		*70 - 130*	*07/12/22 15:34*	*07/13/22 11:31*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**235**		4.97	0.853	mg/Kg			07/15/22 16:23	1

Client Sample ID: S-3

Date Collected: 07/08/22 14:05
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-2
Matrix: Solid

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		07/14/22 10:08	07/16/22 01:33	1
Toluene	<0.000458	U	0.00201	0.000458	mg/Kg		07/14/22 10:08	07/16/22 01:33	1
Ethylbenzene	<0.000567	U	0.00201	0.000567	mg/Kg		07/14/22 10:08	07/16/22 01:33	1
m-Xylene & p-Xylene	<0.00101	U	0.00402	0.00101	mg/Kg		07/14/22 10:08	07/16/22 01:33	1
o-Xylene	<0.000345	U	0.00201	0.000345	mg/Kg		07/14/22 10:08	07/16/22 01:33	1
Xylenes, Total	<0.00101	U	0.00402	0.00101	mg/Kg		07/14/22 10:08	07/16/22 01:33	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*118*		*70 - 130*	*07/14/22 10:08*	*07/16/22 01:33*	*1*

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-3

Date Collected: 07/08/22 14:05
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-2
Matrix: Solid

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

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,4-Difluorobenzene (Surr)	*108*		*70 - 130*	*07/14/22 10:08*	*07/16/22 01:33*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**66.5**		50.0	15.0	mg/Kg			07/14/22 09:07	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	**19.6**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 12:36	1
Diesel Range Organics (Over C10-C28)	**46.9**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 12:36	1
OII Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 12:36	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*54*	*S1-*	*70 - 130*	*07/12/22 15:34*	*07/13/22 12:36*	*1*
o-Terphenyl	*52*	*S1-*	*70 - 130*	*07/12/22 15:34*	*07/13/22 12:36*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**1000**		4.95	0.850	mg/Kg			07/15/22 16:32	1

Client Sample ID: S-4

Date Collected: 07/08/22 14:10
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-3
Matrix: Solid

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		07/14/22 10:08	07/16/22 01:54	1
Toluene	<0.000457	U	0.00200	0.000457	mg/Kg		07/14/22 10:08	07/16/22 01:54	1
Ethylbenzene	<0.000566	U	0.00200	0.000566	mg/Kg		07/14/22 10:08	07/16/22 01:54	1
m-Xylene & p-Xylene	<0.00101	U	0.00401	0.00101	mg/Kg		07/14/22 10:08	07/16/22 01:54	1
o-Xylene	<0.000345	U	0.00200	0.000345	mg/Kg		07/14/22 10:08	07/16/22 01:54	1
Xylenes, Total	<0.00101	U	0.00401	0.00101	mg/Kg		07/14/22 10:08	07/16/22 01:54	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*112*		*70 - 130*	*07/14/22 10:08*	*07/16/22 01:54*	*1*
1,4-Difluorobenzene (Surr)	*108*		*70 - 130*	*07/14/22 10:08*	*07/16/22 01:54*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**119**		49.9	15.0	mg/Kg			07/14/22 09:07	1

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-4

Date Collected: 07/08/22 14:10
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-3
Matrix: Solid

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	20.2	J B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 12:58	1
Diesel Range Organics (Over C10-C28)	98.8	B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 12:58	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 12:58	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*63*	*S1-*	*70 - 130*	*07/12/22 15:34*	*07/13/22 12:58*	*1*
o-Terphenyl	*64*	*S1-*	*70 - 130*	*07/12/22 15:34*	*07/13/22 12:58*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	1190		4.98	0.855	mg/Kg			07/15/22 16:42	1

Client Sample ID: S-5

Date Collected: 07/08/22 14:15
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-4
Matrix: Solid

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		07/14/22 10:08	07/16/22 02:14	1
Toluene	<0.000453	U	0.00199	0.000453	mg/Kg		07/14/22 10:08	07/16/22 02:14	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		07/14/22 10:08	07/16/22 02:14	1
m-Xylene & p-Xylene	<0.00100	U	0.00398	0.00100	mg/Kg		07/14/22 10:08	07/16/22 02:14	1
o-Xylene	<0.000342	U	0.00199	0.000342	mg/Kg		07/14/22 10:08	07/16/22 02:14	1
Xylenes, Total	<0.00100	U	0.00398	0.00100	mg/Kg		07/14/22 10:08	07/16/22 02:14	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*114*		*70 - 130*	*07/14/22 10:08*	*07/16/22 02:14*	*1*
1,4-Difluorobenzene (Surr)	*105*		*70 - 130*	*07/14/22 10:08*	*07/16/22 02:14*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	46.1	J	49.9	15.0	mg/Kg			07/14/22 09:07	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	15.2	J B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 13:20	1
Diesel Range Organics (Over C10-C28)	30.9	J B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 13:20	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 13:20	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*64*	*S1-*	*70 - 130*	*07/12/22 15:34*	*07/13/22 13:20*	*1*
o-Terphenyl	*62*	*S1-*	*70 - 130*	*07/12/22 15:34*	*07/13/22 13:20*	*1*

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-5
Date Collected: 07/08/22 14:15
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-4
Matrix: Solid

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**286**		4.95	0.850	mg/Kg			07/15/22 16:51	1

Client Sample ID: S-6
Date Collected: 07/08/22 14:20
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-5
Matrix: Solid

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		07/14/22 10:08	07/16/22 02:35	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg		07/14/22 10:08	07/16/22 02:35	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		07/14/22 10:08	07/16/22 02:35	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		07/14/22 10:08	07/16/22 02:35	1
o-Xylene	<0.000343	U	0.00200	0.000343	mg/Kg		07/14/22 10:08	07/16/22 02:35	1
Xylenes, Total	<0.00101	U	0.00399	0.00101	mg/Kg		07/14/22 10:08	07/16/22 02:35	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*119*		*70 - 130*	*07/14/22 10:08*	*07/16/22 02:35*	*1*
1,4-Difluorobenzene (Surr)	*107*		*70 - 130*	*07/14/22 10:08*	*07/16/22 02:35*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**976**		50.0	15.0	mg/Kg			07/14/22 09:07	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		07/12/22 15:34	07/13/22 13:41	1
Diesel Range Organics (Over C10-C28)	**887**	**B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 13:41	1
Oil Range Organics (Over C28-C36)	**88.8**		50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 13:41	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*73*		*70 - 130*	*07/12/22 15:34*	*07/13/22 13:41*	*1*
o-Terphenyl	*74*		*70 - 130*	*07/12/22 15:34*	*07/13/22 13:41*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**2050**		25.1	4.31	mg/Kg			07/15/22 17:00	5

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-7

Date Collected: 07/08/22 14:25
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-6
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		07/14/22 10:08	07/16/22 02:56	1
Toluene	<0.000451	U	0.00198	0.000451	mg/Kg		07/14/22 10:08	07/16/22 02:56	1
Ethylbenzene	<0.000559	U	0.00198	0.000559	mg/Kg		07/14/22 10:08	07/16/22 02:56	1
m-Xylene & p-Xylene	<0.00100	U	0.00396	0.00100	mg/Kg		07/14/22 10:08	07/16/22 02:56	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		07/14/22 10:08	07/16/22 02:56	1
Xylenes, Total	<0.00100	U	0.00396	0.00100	mg/Kg		07/14/22 10:08	07/16/22 02:56	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*119*		*70 - 130*	*07/14/22 10:08*	*07/16/22 02:56*	*1*
1,4-Difluorobenzene (Surr)	*108*		*70 - 130*	*07/14/22 10:08*	*07/16/22 02:56*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**153**		50.0	15.0	mg/Kg			07/14/22 09:07	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	**28.6**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 14:03	1
Diesel Range Organics (Over C10-C28)	**98.0**	**B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 14:03	1
Oil Range Organics (Over C28-C36)	**26.2**	**J**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 14:03	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*69*	*S1-*	*70 - 130*	*07/12/22 15:34*	*07/13/22 14:03*	*1*
o-Terphenyl	*70*		*70 - 130*	*07/12/22 15:34*	*07/13/22 14:03*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**3230**	**F1**	25.1	4.30	mg/Kg			07/15/22 15:03	5

Client Sample ID: S-8

Date Collected: 07/08/22 14:30
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-7
Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	**0.000524**	**J**	0.00200	0.000385	mg/Kg		07/14/22 10:08	07/16/22 04:20	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		07/14/22 10:08	07/16/22 04:20	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		07/14/22 10:08	07/16/22 04:20	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 10:08	07/16/22 04:20	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		07/14/22 10:08	07/16/22 04:20	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 10:08	07/16/22 04:20	1

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-8

Date Collected: 07/08/22 14:30
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-7
Matrix: Solid

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	107		70 - 130	07/14/22 10:08	07/16/22 04:20	1
1,4-Difluorobenzene (Surr)	109		70 - 130	07/14/22 10:08	07/16/22 04:20	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00101	U	0.00400	0.00101	mg/Kg			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**78.3**		50.0	15.0	mg/Kg			07/14/22 09:07	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	**27.3**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 14:24	1
Diesel Range Organics (Over C10-C28)	**51.0**	**B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 14:24	1
OII Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 14:24	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	97		70 - 130	07/12/22 15:34	07/13/22 14:24	1
o-Terphenyl	102		70 - 130	07/12/22 15:34	07/13/22 14:24	1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**589**		4.98	0.855	mg/Kg			07/15/22 15:27	1

Client Sample ID: S-9

Date Collected: 07/08/22 14:35
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-8
Matrix: Solid

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		07/14/22 10:08	07/16/22 04:41	1
Toluene	<0.000452	U	0.00198	0.000452	mg/Kg		07/14/22 10:08	07/16/22 04:41	1
Ethylbenzene	<0.000561	U	0.00198	0.000561	mg/Kg		07/14/22 10:08	07/16/22 04:41	1
m-Xylene & p-Xylene	<0.00100	U	0.00397	0.00100	mg/Kg		07/14/22 10:08	07/16/22 04:41	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		07/14/22 10:08	07/16/22 04:41	1
Xylenes, Total	<0.00100	U	0.00397	0.00100	mg/Kg		07/14/22 10:08	07/16/22 04:41	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	108		70 - 130	07/14/22 10:08	07/16/22 04:41	1
1,4-Difluorobenzene (Surr)	107		70 - 130	07/14/22 10:08	07/16/22 04:41	1

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00100	U	0.00397	0.00100	mg/Kg			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**53.6**		49.9	15.0	mg/Kg			07/14/22 09:07	1

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Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-9

Date Collected: 07/08/22 14:35
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-8
Matrix: Solid

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	25.2	J B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 14:45	1
Diesel Range Organics (Over C10-C28)	28.4	J B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 14:45	1
OII Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 14:45	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*85*		*70 - 130*	*07/12/22 15:34*	*07/13/22 14:45*	*1*
o-Terphenyl	*95*		*70 - 130*	*07/12/22 15:34*	*07/13/22 14:45*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	31.3		5.05	0.867	mg/Kg			07/15/22 15:34	1

Client Sample ID: S-10

Date Collected: 07/08/22 14:40
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-9
Matrix: Solid

Method: 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.000514	J	0.00199	0.000383	mg/Kg		07/14/22 10:08	07/16/22 05:02	1
Toluene	0.00187	J	0.00199	0.000454	mg/Kg		07/14/22 10:08	07/16/22 05:02	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		07/14/22 10:08	07/16/22 05:02	1
m-Xylene & p-Xylene	0.00123	J	0.00398	0.00101	mg/Kg		07/14/22 10:08	07/16/22 05:02	1
o-Xylene	<0.000343	U	0.00199	0.000343	mg/Kg		07/14/22 10:08	07/16/22 05:02	1
Xylenes, Total	0.00123	J	0.00398	0.00101	mg/Kg		07/14/22 10:08	07/16/22 05:02	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*140*	*S1+*	*70 - 130*	*07/14/22 10:08*	*07/16/22 05:02*	*1*
1,4-Difluorobenzene (Surr)	*91*		*70 - 130*	*07/14/22 10:08*	*07/16/22 05:02*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00361	J	0.00398	0.00101	mg/Kg			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	76.4		49.9	15.0	mg/Kg			07/14/22 09:07	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	27.2	J B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 15:07	1
Diesel Range Organics (Over C10-C28)	49.2	J B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 15:07	1
OII Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 15:07	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*79*		*70 - 130*	*07/12/22 15:34*	*07/13/22 15:07*	*1*
o-Terphenyl	*87*		*70 - 130*	*07/12/22 15:34*	*07/13/22 15:07*	*1*

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-10
Date Collected: 07/08/22 14:40
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-9
Matrix: Solid

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**6140**		49.9	8.57	mg/Kg			07/15/22 15:42	10

Client Sample ID: S-11
Date Collected: 07/08/22 14:45
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-10
Matrix: Solid

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		07/14/22 10:08	07/16/22 05:23	1
Toluene	<0.000460	U	0.00202	0.000460	mg/Kg		07/14/22 10:08	07/16/22 05:23	1
Ethylbenzene	<0.000570	U	0.00202	0.000570	mg/Kg		07/14/22 10:08	07/16/22 05:23	1
m-Xylene & p-Xylene	<0.00102	U	0.00403	0.00102	mg/Kg		07/14/22 10:08	07/16/22 05:23	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		07/14/22 10:08	07/16/22 05:23	1
Xylenes, Total	<0.00102	U	0.00403	0.00102	mg/Kg		07/14/22 10:08	07/16/22 05:23	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*115*		*70 - 130*	*07/14/22 10:08*	*07/16/22 05:23*	*1*
1,4-Difluorobenzene (Surr)	*109*		*70 - 130*	*07/14/22 10:08*	*07/16/22 05:23*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**232**		49.9	15.0	mg/Kg			07/14/22 09:07	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	**25.6**	**J B**	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 15:28	1
Diesel Range Organics (Over C10-C28)	**176**	**B**	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 15:28	1
Oil Range Organics (Over C28-C36)	**29.9**	**J**	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 15:28	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*85*		*70 - 130*	*07/12/22 15:34*	*07/13/22 15:28*	*1*
o-Terphenyl	*92*		*70 - 130*	*07/12/22 15:34*	*07/13/22 15:28*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**2290**		24.8	4.25	mg/Kg			07/15/22 15:50	5

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-12

Date Collected: 07/08/22 14:50
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-11
Matrix: Solid

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		07/14/22 10:08	07/16/22 05:44	1
Toluene	<0.000459	U	0.00201	0.000459	mg/Kg		07/14/22 10:08	07/16/22 05:44	1
Ethylbenzene	<0.000568	U	0.00201	0.000568	mg/Kg		07/14/22 10:08	07/16/22 05:44	1
m-Xylene & p-Xylene	<0.00102	U	0.00402	0.00102	mg/Kg		07/14/22 10:08	07/16/22 05:44	1
o-Xylene	<0.000346	U	0.00201	0.000346	mg/Kg		07/14/22 10:08	07/16/22 05:44	1
Xylenes, Total	<0.00102	U	0.00402	0.00102	mg/Kg		07/14/22 10:08	07/16/22 05:44	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*117*		*70 - 130*	*07/14/22 10:08*	*07/16/22 05:44*	*1*
1,4-Difluorobenzene (Surr)	*110*		*70 - 130*	*07/14/22 10:08*	*07/16/22 05:44*	*1*

Method: Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00102	U	0.00402	0.00102	mg/Kg			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**82.4**		50.0	15.0	mg/Kg			07/14/22 09:07	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 B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 16:11	1
Diesel Range Organics (Over C10-C28)	**62.7**	**B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 16:11	1
OII Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 16:11	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*75*		*70 - 130*	*07/12/22 15:34*	*07/13/22 16:11*	*1*
o-Terphenyl	*79*		*70 - 130*	*07/12/22 15:34*	*07/13/22 16:11*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**639**		5.02	0.862	mg/Kg			07/15/22 16:14	1

Client Sample ID: S-13

Date Collected: 07/08/22 14:55
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-12
Matrix: Solid

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		07/14/22 10:08	07/16/22 06:04	1
Toluene	<0.000458	U	0.00201	0.000458	mg/Kg		07/14/22 10:08	07/16/22 06:04	1
Ethylbenzene	<0.000567	U	0.00201	0.000567	mg/Kg		07/14/22 10:08	07/16/22 06:04	1
m-Xylene & p-Xylene	<0.00101	U	0.00402	0.00101	mg/Kg		07/14/22 10:08	07/16/22 06:04	1
o-Xylene	<0.000345	U	0.00201	0.000345	mg/Kg		07/14/22 10:08	07/16/22 06:04	1
Xylenes, Total	<0.00101	U	0.00402	0.00101	mg/Kg		07/14/22 10:08	07/16/22 06:04	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*115*		*70 - 130*	*07/14/22 10:08*	*07/16/22 06:04*	*1*

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-13

Date Collected: 07/08/22 14:55
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-12

Matrix: Solid

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

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,4-Difluorobenzene (Surr)	*108*		*70 - 130*	*07/14/22 10:08*	*07/16/22 06:04*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**55.3**		50.0	15.0	mg/Kg			07/14/22 09:07	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	**23.4**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 16:32	1
Diesel Range Organics (Over C10-C28)	**31.9**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 16:32	1
OII Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 16:32	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	*72*		*70 - 130*	*07/12/22 15:34*	*07/13/22 16:32*	*1*
o-Terphenyl	*79*		*70 - 130*	*07/12/22 15:34*	*07/13/22 16:32*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**502**		5.00	0.858	mg/Kg			07/15/22 16:22	1

Client Sample ID: S-14

Date Collected: 07/08/22 15:00
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-13

Matrix: Solid

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		07/14/22 10:08	07/16/22 06:25	1
Toluene	<0.000457	U	0.00200	0.000457	mg/Kg		07/14/22 10:08	07/16/22 06:25	1
Ethylbenzene	<0.000566	U	0.00200	0.000566	mg/Kg		07/14/22 10:08	07/16/22 06:25	1
m-Xylene & p-Xylene	<0.00101	U	0.00401	0.00101	mg/Kg		07/14/22 10:08	07/16/22 06:25	1
o-Xylene	<0.000345	U	0.00200	0.000345	mg/Kg		07/14/22 10:08	07/16/22 06:25	1
Xylenes, Total	<0.00101	U	0.00401	0.00101	mg/Kg		07/14/22 10:08	07/16/22 06:25	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	*156*	*S1+*	*70 - 130*	*07/14/22 10:08*	*07/16/22 06:25*	*1*
1,4-Difluorobenzene (Surr)	*93*		*70 - 130*	*07/14/22 10:08*	*07/16/22 06:25*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**51.2**		50.0	15.0	mg/Kg			07/14/22 09:07	1

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-14

Date Collected: 07/08/22 15:00
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-13
Matrix: Solid

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	20.9	J B	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 16:53	1
Diesel Range Organics (Over C10-C28)	30.3	J B	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 16:53	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 16:53	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*86*		*70 - 130*	*07/12/22 15:34*	*07/13/22 16:53*	*1*
o-Terphenyl	*94*		*70 - 130*	*07/12/22 15:34*	*07/13/22 16:53*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	333		5.00	0.858	mg/Kg			07/15/22 16:30	1

Client Sample ID: S-15

Date Collected: 07/08/22 15:05
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-14
Matrix: Solid

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		07/14/22 10:08	07/16/22 06:46	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		07/14/22 10:08	07/16/22 06:46	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		07/14/22 10:08	07/16/22 06:46	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 10:08	07/16/22 06:46	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		07/14/22 10:08	07/16/22 06:46	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 10:08	07/16/22 06:46	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*117*		*70 - 130*	*07/14/22 10:08*	*07/16/22 06:46*	*1*
1,4-Difluorobenzene (Surr)	*106*		*70 - 130*	*07/14/22 10:08*	*07/16/22 06:46*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	50.0		49.9	15.0	mg/Kg			07/14/22 09:07	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	25.9	J B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 17:15	1
Diesel Range Organics (Over C10-C28)	24.1	J B	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 17:15	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 17:15	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*80*		*70 - 130*	*07/12/22 15:34*	*07/13/22 17:15*	*1*
o-Terphenyl	*88*		*70 - 130*	*07/12/22 15:34*	*07/13/22 17:15*	*1*

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-15
Date Collected: 07/08/22 15:05
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-14
Matrix: Solid

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	557		4.98	0.855	mg/Kg			07/15/22 16:37	1

Client Sample ID: S-16
Date Collected: 07/08/22 15:10
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-15
Matrix: Solid

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		07/14/22 10:08	07/16/22 07:06	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg		07/14/22 10:08	07/16/22 07:06	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		07/14/22 10:08	07/16/22 07:06	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		07/14/22 10:08	07/16/22 07:06	1
o-Xylene	<0.000343	U	0.00200	0.000343	mg/Kg		07/14/22 10:08	07/16/22 07:06	1
Xylenes, Total	<0.00101	U	0.00399	0.00101	mg/Kg		07/14/22 10:08	07/16/22 07:06	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*118*		*70 - 130*	*07/14/22 10:08*	*07/16/22 07:06*	*1*
1,4-Difluorobenzene (Surr)	*107*		*70 - 130*	*07/14/22 10:08*	*07/16/22 07:06*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	65.8		50.0	15.0	mg/Kg			07/14/22 09:07	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	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 17:36	1
Diesel Range Organics (Over C10-C28)	21.1	J B	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 17:36	1
Oil Range Organics (Over C28-C36)	15.3	J	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 17:36	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*73*		*70 - 130*	*07/12/22 15:34*	*07/13/22 17:36*	*1*
o-Terphenyl	*79*		*70 - 130*	*07/12/22 15:34*	*07/13/22 17:36*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	604		4.96	0.851	mg/Kg			07/15/22 16:45	1

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-17

Date Collected: 07/08/22 15:15
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-16
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		07/14/22 10:08	07/16/22 07:27	1
Toluene	<0.000451	U	0.00198	0.000451	mg/Kg		07/14/22 10:08	07/16/22 07:27	1
Ethylbenzene	<0.000559	U	0.00198	0.000559	mg/Kg		07/14/22 10:08	07/16/22 07:27	1
m-Xylene & p-Xylene	<0.00100	U	0.00396	0.00100	mg/Kg		07/14/22 10:08	07/16/22 07:27	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		07/14/22 10:08	07/16/22 07:27	1
Xylenes, Total	<0.00100	U	0.00396	0.00100	mg/Kg		07/14/22 10:08	07/16/22 07:27	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*114*		*70 - 130*	*07/14/22 10:08*	*07/16/22 07:27*	*1*
1,4-Difluorobenzene (Surr)	*107*		*70 - 130*	*07/14/22 10:08*	*07/16/22 07:27*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**42.3**	**J**	49.8	14.9	mg/Kg			07/14/22 09:07	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	**25.1**	**J B**	49.8	14.9	mg/Kg		07/12/22 15:34	07/13/22 17:57	1
Diesel Range Organics (Over C10-C28)	**17.2**	**J B**	49.8	14.9	mg/Kg		07/12/22 15:34	07/13/22 17:57	1
OII Range Organics (Over C28-C36)	<14.9	U	49.8	14.9	mg/Kg		07/12/22 15:34	07/13/22 17:57	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*77*		*70 - 130*	*07/12/22 15:34*	*07/13/22 17:57*	*1*
o-Terphenyl	*85*		*70 - 130*	*07/12/22 15:34*	*07/13/22 17:57*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**73.0**	**F1**	4.95	0.850	mg/Kg			07/15/22 16:53	1

Client Sample ID: S-18

Date Collected: 07/08/22 15:20
Date Received: 07/11/22 10:43
Sample Depth: 1

Lab Sample ID: 890-2529-17
Matrix: Solid

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		07/14/22 13:24	07/16/22 03:24	1
Toluene	<0.000452	U	0.00198	0.000452	mg/Kg		07/14/22 13:24	07/16/22 03:24	1
Ethylbenzene	<0.000561	U	0.00198	0.000561	mg/Kg		07/14/22 13:24	07/16/22 03:24	1
m-Xylene & p-Xylene	<0.00100	U	0.00397	0.00100	mg/Kg		07/14/22 13:24	07/16/22 03:24	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		07/14/22 13:24	07/16/22 03:24	1
Xylenes, Total	<0.00100	U	0.00397	0.00100	mg/Kg		07/14/22 13:24	07/16/22 03:24	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*113*		*70 - 130*	*07/14/22 13:24*	*07/16/22 03:24*	*1*

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-18

Date Collected: 07/08/22 15:20
Date Received: 07/11/22 10:43
Sample Depth: 1

Lab Sample ID: 890-2529-17

Matrix: Solid

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

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*	*07/14/22 13:24*	*07/16/22 03:24*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**47.1**	**J**	49.9	15.0	mg/Kg			07/14/22 09:07	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	**26.5**	**J B**	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 18:18	1
Diesel Range Organics (Over C10-C28)	**20.6**	**J B**	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 18:18	1
OII Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 18:18	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*77*		*70 - 130*	*07/12/22 15:34*	*07/13/22 18:18*	*1*
o-Terphenyl	*85*		*70 - 130*	*07/12/22 15:34*	*07/13/22 18:18*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**191**		5.01	0.860	mg/Kg			07/15/22 17:17	1

Client Sample ID: N-SW1

Date Collected: 07/08/22 15:25
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-18

Matrix: Solid

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		07/14/22 13:24	07/16/22 03:44	1
Toluene	<0.000461	U	0.00202	0.000461	mg/Kg		07/14/22 13:24	07/16/22 03:44	1
Ethylbenzene	<0.000571	U	0.00202	0.000571	mg/Kg		07/14/22 13:24	07/16/22 03:44	1
m-Xylene & p-Xylene	<0.00102	U	0.00404	0.00102	mg/Kg		07/14/22 13:24	07/16/22 03:44	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		07/14/22 13:24	07/16/22 03:44	1
Xylenes, Total	<0.00102	U	0.00404	0.00102	mg/Kg		07/14/22 13:24	07/16/22 03:44	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*112*		*70 - 130*	*07/14/22 13:24*	*07/16/22 03:44*	*1*
1,4-Difluorobenzene (Surr)	*94*		*70 - 130*	*07/14/22 13:24*	*07/16/22 03:44*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**48.4**	**J**	50.0	15.0	mg/Kg			07/14/22 09:07	1

Eurofins Carlsbad

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: N-SW1
Date Collected: 07/08/22 15:25
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-18
Matrix: Solid

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	**28.8**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 18:40	1
Diesel Range Organics (Over C10-C28)	**19.6**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 18:40	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 18:40	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*92*		*70 - 130*	*07/12/22 15:34*	*07/13/22 18:40*	*1*
o-Terphenyl	*97*		*70 - 130*	*07/12/22 15:34*	*07/13/22 18:40*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**160**		5.03	0.863	mg/Kg			07/15/22 17:25	1

Client Sample ID: E-SW1
Date Collected: 07/08/22 15:30
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-19
Matrix: Solid

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		07/14/22 13:24	07/16/22 04:05	1
Toluene	<0.000460	U	0.00202	0.000460	mg/Kg		07/14/22 13:24	07/16/22 04:05	1
Ethylbenzene	<0.000570	U	0.00202	0.000570	mg/Kg		07/14/22 13:24	07/16/22 04:05	1
m-Xylene & p-Xylene	<0.00102	U	0.00403	0.00102	mg/Kg		07/14/22 13:24	07/16/22 04:05	1
o-Xylene	<0.000347	U	0.00202	0.000347	mg/Kg		07/14/22 13:24	07/16/22 04:05	1
Xylenes, Total	<0.00102	U	0.00403	0.00102	mg/Kg		07/14/22 13:24	07/16/22 04:05	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*112*		*70 - 130*	*07/14/22 13:24*	*07/16/22 04:05*	*1*
1,4-Difluorobenzene (Surr)	*91*		*70 - 130*	*07/14/22 13:24*	*07/16/22 04:05*	*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			07/18/22 13:45	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			07/14/22 09:07	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		07/12/22 15:34	07/13/22 19:01	1
Diesel Range Organics (Over C10-C28)	**21.3**	**J B**	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 19:01	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		07/12/22 15:34	07/13/22 19:01	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*70*		*70 - 130*	*07/12/22 15:34*	*07/13/22 19:01*	*1*
o-Terphenyl	*71*		*70 - 130*	*07/12/22 15:34*	*07/13/22 19:01*	*1*

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: E-SW1
Date Collected: 07/08/22 15:30
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-19
Matrix: Solid

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**365**		5.03	0.863	mg/Kg			07/15/22 17:48	1

Client Sample ID: E-SW2
Date Collected: 07/08/22 15:35
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-20
Matrix: Solid

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		07/14/22 13:24	07/16/22 04:25	1
Toluene	<0.000455	U	0.00200	0.000455	mg/Kg		07/14/22 13:24	07/16/22 04:25	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		07/14/22 13:24	07/16/22 04:25	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		07/14/22 13:24	07/16/22 04:25	1
o-Xylene	<0.000343	U	0.00200	0.000343	mg/Kg		07/14/22 13:24	07/16/22 04:25	1
Xylenes, Total	<0.00101	U	0.00399	0.00101	mg/Kg		07/14/22 13:24	07/16/22 04:25	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*111*		*70 - 130*	*07/14/22 13:24*	*07/16/22 04:25*	*1*
1,4-Difluorobenzene (Surr)	*101*		*70 - 130*	*07/14/22 13:24*	*07/16/22 04:25*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**47.4**	**J**	50.0	15.0	mg/Kg			07/14/22 09:07	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	**27.5**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 19:22	1
Diesel Range Organics (Over C10-C28)	**19.9**	**J B**	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 19:22	1
OII Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 19:22	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*69*	*S1-*	*70 - 130*	*07/12/22 15:34*	*07/13/22 19:22*	*1*
o-Terphenyl	*68*	*S1-*	*70 - 130*	*07/12/22 15:34*	*07/13/22 19:22*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**228**		5.05	0.867	mg/Kg			07/15/22 17:56	1

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-SW1

Date Collected: 07/08/22 15:40
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-21
Matrix: Solid

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		07/14/22 13:24	07/16/22 04:46	1
Toluene	<0.000453	U	0.00199	0.000453	mg/Kg		07/14/22 13:24	07/16/22 04:46	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		07/14/22 13:24	07/16/22 04:46	1
m-Xylene & p-Xylene	<0.00100	U	0.00398	0.00100	mg/Kg		07/14/22 13:24	07/16/22 04:46	1
o-Xylene	<0.000342	U	0.00199	0.000342	mg/Kg		07/14/22 13:24	07/16/22 04:46	1
Xylenes, Total	<0.00100	U	0.00398	0.00100	mg/Kg		07/14/22 13:24	07/16/22 04:46	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*111*		*70 - 130*	*07/14/22 13:24*	*07/16/22 04:46*	*1*
1,4-Difluorobenzene (Surr)	*100*		*70 - 130*	*07/14/22 13:24*	*07/16/22 04:46*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**85.4**		50.0	15.0	mg/Kg			07/14/22 09:07	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		07/13/22 09:24	07/13/22 13:10	1
Diesel Range Organics (Over C10-C28)	**47.8**	**J B**	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 13:10	1
Oil Range Organics (Over C28-C36)	**37.6**	**J**	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 13:10	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*91*		*70 - 130*	*07/13/22 09:24*	*07/13/22 13:10*	*1*
o-Terphenyl	*112*		*70 - 130*	*07/13/22 09:24*	*07/13/22 13:10*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**302**		4.97	0.853	mg/Kg			07/15/22 18:04	1

Client Sample ID: W-SW1

Date Collected: 07/08/22 15:45
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-22
Matrix: Solid

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		07/14/22 13:24	07/16/22 05:06	1
Toluene	<0.000459	U	0.00201	0.000459	mg/Kg		07/14/22 13:24	07/16/22 05:06	1
Ethylbenzene	<0.000568	U	0.00201	0.000568	mg/Kg		07/14/22 13:24	07/16/22 05:06	1
m-Xylene & p-Xylene	<0.00102	U	0.00402	0.00102	mg/Kg		07/14/22 13:24	07/16/22 05:06	1
o-Xylene	<0.000346	U	0.00201	0.000346	mg/Kg		07/14/22 13:24	07/16/22 05:06	1
Xylenes, Total	<0.00102	U	0.00402	0.00102	mg/Kg		07/14/22 13:24	07/16/22 05:06	1

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: W-SW1

Date Collected: 07/08/22 15:45
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-22

Matrix: Solid

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	*115*		*70 - 130*	*07/14/22 13:24*	*07/16/22 05:06*	*1*
1,4-Difluorobenzene (Surr)	*100*		*70 - 130*	*07/14/22 13:24*	*07/16/22 05:06*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**43.9**	**J**	49.9	15.0	mg/Kg			07/14/22 09:07	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		07/13/22 09:24	07/13/22 13:31	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		07/13/22 09:24	07/13/22 13:31	1
Oil Range Organics (Over C28-C36)	**43.9**	**J**	49.9	15.0	mg/Kg		07/13/22 09:24	07/13/22 13:31	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	*106*		*70 - 130*	*07/13/22 09:24*	*07/13/22 13:31*	*1*
o-Terphenyl	*122*		*70 - 130*	*07/13/22 09:24*	*07/13/22 13:31*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**1440**		24.8	4.26	mg/Kg			07/15/22 18:12	5

Client Sample ID: W-SW2

Date Collected: 07/08/22 15:50
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-23

Matrix: Solid

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		07/14/22 13:24	07/16/22 05:26	1
Toluene	<0.000457	U	0.00200	0.000457	mg/Kg		07/14/22 13:24	07/16/22 05:26	1
Ethylbenzene	<0.000566	U	0.00200	0.000566	mg/Kg		07/14/22 13:24	07/16/22 05:26	1
m-Xylene & p-Xylene	<0.00101	U	0.00401	0.00101	mg/Kg		07/14/22 13:24	07/16/22 05:26	1
o-Xylene	<0.000345	U	0.00200	0.000345	mg/Kg		07/14/22 13:24	07/16/22 05:26	1
Xylenes, Total	<0.00101	U	0.00401	0.00101	mg/Kg		07/14/22 13:24	07/16/22 05:26	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	*123*		*70 - 130*	*07/14/22 13:24*	*07/16/22 05:26*	*1*
1,4-Difluorobenzene (Surr)	*98*		*70 - 130*	*07/14/22 13:24*	*07/16/22 05:26*	*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			07/18/22 13:45	1

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: W-SW2

Date Collected: 07/08/22 15:50
Date Received: 07/11/22 10:43
Sample Depth: 0.5

Lab Sample ID: 890-2529-23
Matrix: Solid

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**506**		49.9	15.0	mg/Kg			07/14/22 09:07	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		07/13/22 09:24	07/13/22 13:52	1
Diesel Range Organics (Over C10-C28)	**416**	**B**	49.9	15.0	mg/Kg		07/13/22 09:24	07/13/22 13:52	1
Oil Range Organics (Over C28-C36)	**90.2**		49.9	15.0	mg/Kg		07/13/22 09:24	07/13/22 13:52	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*98*		*70 - 130*	*07/13/22 09:24*	*07/13/22 13:52*	*1*
o-Terphenyl	*118*		*70 - 130*	*07/13/22 09:24*	*07/13/22 13:52*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**1090**		4.99	0.857	mg/Kg			07/15/22 18:19	1

Client Sample ID: N-SW2

Date Collected: 07/08/22 15:55
Date Received: 07/11/22 10:43
Sample Depth: 1

Lab Sample ID: 890-2529-24
Matrix: Solid

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		07/14/22 13:24	07/16/22 07:37	1
Toluene	**0.000488**	**J**	0.00200	0.000455	mg/Kg		07/14/22 13:24	07/16/22 07:37	1
Ethylbenzene	<0.000564	U	0.00200	0.000564	mg/Kg		07/14/22 13:24	07/16/22 07:37	1
m-Xylene & p-Xylene	<0.00101	U	0.00399	0.00101	mg/Kg		07/14/22 13:24	07/16/22 07:37	1
o-Xylene	<0.000343	U	0.00200	0.000343	mg/Kg		07/14/22 13:24	07/16/22 07:37	1
Xylenes, Total	<0.00101	U	0.00399	0.00101	mg/Kg		07/14/22 13:24	07/16/22 07:37	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*109*		*70 - 130*	*07/14/22 13:24*	*07/16/22 07:37*	*1*
1,4-Difluorobenzene (Surr)	*93*		*70 - 130*	*07/14/22 13:24*	*07/16/22 07:37*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**121**		50.0	15.0	mg/Kg			07/14/22 09:07	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	**19.5**	**J B**	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 14:14	1
Diesel Range Organics (Over C10-C28)	**57.8**	**B**	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 14:14	1

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: N-SW2

Lab Sample ID: 890-2529-24
Matrix: Solid
Date Collected: 07/08/22 15:55
Date Received: 07/11/22 10:43
Sample Depth: 1

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)	**43.3**	**J**	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 14:14	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*98*		*70 - 130*	*07/13/22 09:24*	*07/13/22 14:14*	*1*
o-Terphenyl	*119*		*70 - 130*	*07/13/22 09:24*	*07/13/22 14:14*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**14.1**		5.00	0.858	mg/Kg			07/15/22 18:27	1

Client Sample ID: E-SW3

Lab Sample ID: 890-2529-25
Matrix: Solid
Date Collected: 07/08/22 16:00
Date Received: 07/11/22 10:43
Sample Depth: 1

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		07/14/22 13:24	07/16/22 07:57	1
Toluene	**0.000475**	**J**	0.00199	0.000453	mg/Kg		07/14/22 13:24	07/16/22 07:57	1
Ethylbenzene	<0.000562	U	0.00199	0.000562	mg/Kg		07/14/22 13:24	07/16/22 07:57	1
m-Xylene & p-Xylene	<0.00100	U	0.00398	0.00100	mg/Kg		07/14/22 13:24	07/16/22 07:57	1
o-Xylene	<0.000342	U	0.00199	0.000342	mg/Kg		07/14/22 13:24	07/16/22 07:57	1
Xylenes, Total	<0.00100	U	0.00398	0.00100	mg/Kg		07/14/22 13:24	07/16/22 07:57	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*108*		*70 - 130*	*07/14/22 13:24*	*07/16/22 07:57*	*1*
1,4-Difluorobenzene (Surr)	*96*		*70 - 130*	*07/14/22 13:24*	*07/16/22 07:57*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**1170**		50.0	15.0	mg/Kg			07/14/22 09:07	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	**23.0**	**J B**	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 14:35	1
Diesel Range Organics (Over C10-C28)	**886**	**B**	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 14:35	1
Oil Range Organics (Over C28-C36)	**265**		50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 14:35	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*105*		*70 - 130*	*07/13/22 09:24*	*07/13/22 14:35*	*1*
o-Terphenyl	*123*		*70 - 130*	*07/13/22 09:24*	*07/13/22 14:35*	*1*

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: E-SW3

Lab Sample ID: 890-2529-25
Matrix: Solid
Date Collected: 07/08/22 16:00
Date Received: 07/11/22 10:43
Sample Depth: 1

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**62.9**		5.00	0.858	mg/Kg			07/15/22 18:35	1

Client Sample ID: S-SW2

Lab Sample ID: 890-2529-26
Matrix: Solid
Date Collected: 07/08/22 16:05
Date Received: 07/11/22 10:43
Sample Depth: 1

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		07/14/22 13:24	07/16/22 08:18	1
Toluene	<0.000454	U	0.00199	0.000454	mg/Kg		07/14/22 13:24	07/16/22 08:18	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		07/14/22 13:24	07/16/22 08:18	1
m-Xylene & p-Xylene	<0.00101	U	0.00398	0.00101	mg/Kg		07/14/22 13:24	07/16/22 08:18	1
o-Xylene	<0.000343	U	0.00199	0.000343	mg/Kg		07/14/22 13:24	07/16/22 08:18	1
Xylenes, Total	<0.00101	U	0.00398	0.00101	mg/Kg		07/14/22 13:24	07/16/22 08:18	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*115*		*70 - 130*	*07/14/22 13:24*	*07/16/22 08:18*	*1*
1,4-Difluorobenzene (Surr)	*100*		*70 - 130*	*07/14/22 13:24*	*07/16/22 08:18*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**235**		50.0	15.0	mg/Kg			07/14/22 09:07	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	**17.0**	**J B**	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 14:55	1
Diesel Range Organics (Over C10-C28)	**139**	**B**	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 14:55	1
Oil Range Organics (Over C28-C36)	**79.0**		50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 14:55	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*97*		*70 - 130*	*07/13/22 09:24*	*07/13/22 14:55*	*1*
o-Terphenyl	*119*		*70 - 130*	*07/13/22 09:24*	*07/13/22 14:55*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**141**		4.96	0.851	mg/Kg			07/20/22 15:01	1

Client Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: W-SW3

Date Collected: 07/08/22 16:10
Date Received: 07/11/22 10:43
Sample Depth: 1

Lab Sample ID: 890-2529-27

Matrix: Solid

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		07/14/22 13:24	07/16/22 08:38	1
Toluene	**0.000466**	**J**	0.00198	0.000452	mg/Kg		07/14/22 13:24	07/16/22 08:38	1
Ethylbenzene	<0.000561	U	0.00198	0.000561	mg/Kg		07/14/22 13:24	07/16/22 08:38	1
m-Xylene & p-Xylene	<0.00100	U	0.00397	0.00100	mg/Kg		07/14/22 13:24	07/16/22 08:38	1
o-Xylene	<0.000341	U	0.00198	0.000341	mg/Kg		07/14/22 13:24	07/16/22 08:38	1
Xylenes, Total	<0.00100	U	0.00397	0.00100	mg/Kg		07/14/22 13:24	07/16/22 08:38	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*109*		*70 - 130*	*07/14/22 13:24*	*07/16/22 08:38*	*1*
1,4-Difluorobenzene (Surr)	*95*		*70 - 130*	*07/14/22 13:24*	*07/16/22 08:38*	*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			07/18/22 13:45	1

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

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**114**		49.9	15.0	mg/Kg			07/14/22 09:07	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	**22.5**	**J B**	49.9	15.0	mg/Kg		07/13/22 09:24	07/13/22 15:17	1
Diesel Range Organics (Over C10-C28)	**21.8**	**J B**	49.9	15.0	mg/Kg		07/13/22 09:24	07/13/22 15:17	1
Oil Range Organics (Over C28-C36)	**69.7**		49.9	15.0	mg/Kg		07/13/22 09:24	07/13/22 15:17	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*99*		*70 - 130*	*07/13/22 09:24*	*07/13/22 15:17*	*1*
o-Terphenyl	*122*		*70 - 130*	*07/13/22 09:24*	*07/13/22 15:17*	*1*

Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**153**		5.01	0.860	mg/Kg			07/20/22 15:09	1

Surrogate Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

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)
890-2529-1	S-2	117	110
890-2529-2	S-3	118	108
890-2529-3	S-4	112	108
890-2529-4	S-5	114	105
890-2529-5	S-6	119	107
890-2529-6	S-7	119	108
890-2529-7	S-8	107	109
890-2529-8	S-9	108	107
890-2529-9	S-10	140 S1+	91
890-2529-10	S-11	115	109
890-2529-11	S-12	117	110
890-2529-12	S-13	115	108
890-2529-13	S-14	156 S1+	93
890-2529-14	S-15	117	106
890-2529-15	S-16	118	107
890-2529-16	S-17	114	107
890-2529-17	S-18	113	99
890-2529-18	N-SW1	112	94
890-2529-19	E-SW1	112	91
890-2529-20	E-SW2	111	101
890-2529-21	S-SW1	111	100
890-2529-22	W-SW1	115	100
890-2529-23	W-SW2	123	98
890-2529-24	N-SW2	109	93
890-2529-25	E-SW3	108	96
890-2529-26	S-SW2	115	100
890-2529-27	W-SW3	109	95
LCS 880-29739/1-A	Lab Control Sample	97	98
LCS 880-29759/1-A	Lab Control Sample	110	90
LCSD 880-29739/2-A	Lab Control Sample Dup	102	96
LCSD 880-29759/2-A	Lab Control Sample Dup	105	93
MB 880-29722/5-A	Method Blank	106	108
MB 880-29739/5-A	Method Blank	102	108
MB 880-29759/5-A	Method Blank	96	97
MB 880-29770/5-A	Method Blank	97	96

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)
890-2529-1	S-2	81	84
890-2529-1 MS	S-2	66 S1-	61 S1-
890-2529-1 MSD	S-2	56 S1-	52 S1-
890-2529-2	S-3	54 S1-	52 S1-

Surrogate Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

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)
890-2529-3	S-4	63 S1-	64 S1-
890-2529-4	S-5	64 S1-	62 S1-
890-2529-5	S-6	73	74
890-2529-6	S-7	69 S1-	70
890-2529-7	S-8	97	102
890-2529-8	S-9	85	95
890-2529-9	S-10	79	87
890-2529-10	S-11	85	92
890-2529-11	S-12	75	79
890-2529-12	S-13	72	79
890-2529-13	S-14	86	94
890-2529-14	S-15	80	88
890-2529-15	S-16	73	79
890-2529-16	S-17	77	85
890-2529-17	S-18	77	85
890-2529-18	N-SW1	92	97
890-2529-19	E-SW1	70	71
890-2529-20	E-SW2	69 S1-	68 S1-
890-2529-21	S-SW1	91	112
890-2529-22	W-SW1	106	122
890-2529-23	W-SW2	98	118
890-2529-24	N-SW2	98	119
890-2529-25	E-SW3	105	123
890-2529-26	S-SW2	97	119
890-2529-27	W-SW3	99	122
LCS 880-29564/2-A	Lab Control Sample	98	109
LCS 880-29622/2-A	Lab Control Sample	100	117
LCSD 880-29564/3-A	Lab Control Sample Dup	99	111
LCSD 880-29622/3-A	Lab Control Sample Dup	108	125
MB 880-29564/1-A	Method Blank	102	110
MB 880-29622/1-A	Method Blank	87	113

Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

QC Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-29722/5-A
Matrix: Solid
Analysis Batch: 29790

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 29722

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		07/14/22 09:52	07/15/22 11:11	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		07/14/22 09:52	07/15/22 11:11	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		07/14/22 09:52	07/15/22 11:11	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 09:52	07/15/22 11:11	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		07/14/22 09:52	07/15/22 11:11	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 09:52	07/15/22 11:11	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*106*		*70 - 130*	*07/14/22 09:52*	*07/15/22 11:11*	*1*
1,4-Difluorobenzene (Surr)	*108*		*70 - 130*	*07/14/22 09:52*	*07/15/22 11:11*	*1*

Lab Sample ID: MB 880-29739/5-A
Matrix: Solid
Analysis Batch: 29790

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 29739

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		07/14/22 10:08	07/15/22 23:27	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		07/14/22 10:08	07/15/22 23:27	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		07/14/22 10:08	07/15/22 23:27	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 10:08	07/15/22 23:27	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		07/14/22 10:08	07/15/22 23:27	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 10:08	07/15/22 23:27	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*102*		*70 - 130*	*07/14/22 10:08*	*07/15/22 23:27*	*1*
1,4-Difluorobenzene (Surr)	*108*		*70 - 130*	*07/14/22 10:08*	*07/15/22 23:27*	*1*

Lab Sample ID: LCS 880-29739/1-A
Matrix: Solid
Analysis Batch: 29790

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 29739

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Benzene	0.100	0.09154		mg/Kg		92	70 - 130
Toluene	0.100	0.08982		mg/Kg		90	70 - 130
Ethylbenzene	0.100	0.08005		mg/Kg		80	70 - 130
m-Xylene & p-Xylene	0.200	0.1608		mg/Kg		80	70 - 130
o-Xylene	0.100	0.08701		mg/Kg		87	70 - 130

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*97*		*70 - 130*
1,4-Difluorobenzene (Surr)	*98*		*70 - 130*

Lab Sample ID: LCSD 880-29739/2-A
Matrix: Solid
Analysis Batch: 29790

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 29739

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Benzene	0.100	0.07913		mg/Kg		79	70 - 130	15	35

QC Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

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

Lab Sample ID: LCSD 880-29739/2-A
Matrix: Solid
Analysis Batch: 29790

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 29739

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Toluene			0.100	0.08469		mg/Kg		85	70 - 130	6	35
Ethylbenzene			0.100	0.07885		mg/Kg		79	70 - 130	2	35
m-Xylene & p-Xylene			0.200	0.1600		mg/Kg		80	70 - 130	0	35
o-Xylene			0.100	0.08634		mg/Kg		86	70 - 130	1	35

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*102*		*70 - 130*
1,4-Difluorobenzene (Surr)	*96*		*70 - 130*

Lab Sample ID: MB 880-29759/5-A
Matrix: Solid
Analysis Batch: 29845

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 29759

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		07/14/22 13:24	07/16/22 02:14	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		07/14/22 13:24	07/16/22 02:14	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		07/14/22 13:24	07/16/22 02:14	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 13:24	07/16/22 02:14	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		07/14/22 13:24	07/16/22 02:14	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 13:24	07/16/22 02:14	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*96*		*70 - 130*	*07/14/22 13:24*	*07/16/22 02:14*	*1*
1,4-Difluorobenzene (Surr)	*97*		*70 - 130*	*07/14/22 13:24*	*07/16/22 02:14*	*1*

Lab Sample ID: LCS 880-29759/1-A
Matrix: Solid
Analysis Batch: 29845

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 29759

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Benzene			0.100	0.07297		mg/Kg		73	70 - 130
Toluene			0.100	0.08701		mg/Kg		87	70 - 130
Ethylbenzene			0.100	0.08425		mg/Kg		84	70 - 130
m-Xylene & p-Xylene			0.200	0.1807		mg/Kg		90	70 - 130
o-Xylene			0.100	0.09822		mg/Kg		98	70 - 130

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*110*		*70 - 130*
1,4-Difluorobenzene (Surr)	*90*		*70 - 130*

Lab Sample ID: LCSD 880-29759/2-A
Matrix: Solid
Analysis Batch: 29845

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 29759

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Benzene			0.100	0.08688		mg/Kg		87	70 - 130	17	35
Toluene			0.100	0.08609		mg/Kg		86	70 - 130	1	35
Ethylbenzene			0.100	0.08616		mg/Kg		86	70 - 130	2	35

QC Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

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

Lab Sample ID: LCSD 880-29759/2-A
Matrix: Solid
Analysis Batch: 29845

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 29759

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
m-Xylene & p-Xylene			0.200	0.1801		mg/Kg		90	70 - 130	0	35
o-Xylene			0.100	0.09676		mg/Kg		97	70 - 130	1	35

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*105*		*70 - 130*
1,4-Difluorobenzene (Surr)	*93*		*70 - 130*

Lab Sample ID: MB 880-29770/5-A
Matrix: Solid
Analysis Batch: 29845

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 29770

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		07/14/22 16:20	07/15/22 14:37	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		07/14/22 16:20	07/15/22 14:37	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		07/14/22 16:20	07/15/22 14:37	1
m-Xylene & p-Xylene	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 16:20	07/15/22 14:37	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		07/14/22 16:20	07/15/22 14:37	1
Xylenes, Total	<0.00101	U	0.00400	0.00101	mg/Kg		07/14/22 16:20	07/15/22 14:37	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*97*		*70 - 130*	*07/14/22 16:20*	*07/15/22 14:37*	*1*
1,4-Difluorobenzene (Surr)	*96*		*70 - 130*	*07/14/22 16:20*	*07/15/22 14:37*	*1*

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

Lab Sample ID: MB 880-29564/1-A
Matrix: Solid
Analysis Batch: 29605

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 29564

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	20.33	J	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 10:27	1
Diesel Range Organics (Over C10-C28)	44.53	J	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 10:27	1
OII Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		07/12/22 15:34	07/13/22 10:27	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*102*		*70 - 130*	*07/12/22 15:34*	*07/13/22 10:27*	*1*
o-Terphenyl	*110*		*70 - 130*	*07/12/22 15:34*	*07/13/22 10:27*	*1*

Lab Sample ID: LCS 880-29564/2-A
Matrix: Solid
Analysis Batch: 29605

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 29564

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Gasoline Range Organics (GRO)-C6-C10			1000	838.1		mg/Kg		84	70 - 130		
Diesel Range Organics (Over C10-C28)			1000	839.0		mg/Kg		84	70 - 130		

QC Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

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

Lab Sample ID: LCS 880-29564/2-A
Matrix: Solid
Analysis Batch: 29605

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 29564

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1-Chlorooctane	98		70 - 130
o-Terphenyl	109		70 - 130

Lab Sample ID: LCSD 880-29564/3-A
Matrix: Solid
Analysis Batch: 29605

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 29564

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10			1000	814.1		mg/Kg		81	70 - 130	3	20
Diesel Range Organics (Over C10-C28)			1000	843.4		mg/Kg		84	70 - 130	1	20

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
1-Chlorooctane	99		70 - 130
o-Terphenyl	111		70 - 130

Lab Sample ID: 890-2529-1 MS
Matrix: Solid
Analysis Batch: 29605

Client Sample ID: S-2
Prep Type: Total/NA
Prep Batch: 29564

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Gasoline Range Organics (GRO)-C6-C10	33.9	J B F1 F2	996	1338	F1	mg/Kg		131	70 - 130
Diesel Range Organics (Over C10-C28)	44.4	J B F1 F2	996	653.5	F1	mg/Kg		61	70 - 130

Surrogate	MS %Recovery	MS Qualifier	Limits
1-Chlorooctane	66	S1-	70 - 130
o-Terphenyl	61	S1-	70 - 130

Lab Sample ID: 890-2529-1 MSD
Matrix: Solid
Analysis Batch: 29605

Client Sample ID: S-2
Prep Type: Total/NA
Prep Batch: 29564

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	33.9	J B F1 F2	998	757.4	F2	mg/Kg		72	70 - 130	55	20
Diesel Range Organics (Over C10-C28)	44.4	J B F1 F2	998	499.0	F1 F2	mg/Kg		46	70 - 130	27	20

Surrogate	MSD %Recovery	MSD Qualifier	Limits
1-Chlorooctane	56	S1-	70 - 130
o-Terphenyl	52	S1-	70 - 130

QC Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

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

Lab Sample ID: MB 880-29622/1-A
Matrix: Solid
Analysis Batch: 29609

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 29622

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	17.22	J	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 11:02	1
Diesel Range Organics (Over C10-C28)	20.90	J	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 11:02	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		07/13/22 09:24	07/13/22 11:02	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*87*		*70 - 130*	*07/13/22 09:24*	*07/13/22 11:02*	*1*
o-Terphenyl	*113*		*70 - 130*	*07/13/22 09:24*	*07/13/22 11:02*	*1*

Lab Sample ID: LCS 880-29622/2-A
Matrix: Solid
Analysis Batch: 29609

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 29622

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Gasoline Range Organics (GRO)-C6-C10	1000	846.2		mg/Kg		85	70 - 130
Diesel Range Organics (Over C10-C28)	1000	1044		mg/Kg		104	70 - 130

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1-Chlorooctane	*100*		*70 - 130*
o-Terphenyl	*117*		*70 - 130*

Lab Sample ID: LCSD 880-29622/3-A
Matrix: Solid
Analysis Batch: 29609

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 29622

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	776.1		mg/Kg		78	70 - 130	9	20
Diesel Range Organics (Over C10-C28)	1000	1129		mg/Kg		113	70 - 130	8	20

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
1-Chlorooctane	*108*		*70 - 130*
o-Terphenyl	*125*		*70 - 130*

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-29401/1-A
Matrix: Solid
Analysis Batch: 29646

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			07/14/22 07:05	1

QC Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: LCS 880-29401/2-A
Matrix: Solid
Analysis Batch: 29646

Client Sample ID: Lab Control Sample
Prep Type: Soluble

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Chloride			250	257.7		mg/Kg		103	90 - 110		

Lab Sample ID: LCSD 880-29401/3-A
Matrix: Solid
Analysis Batch: 29646

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	266.9		mg/Kg		107	90 - 110	4	20

Lab Sample ID: MB 880-29573/1-A
Matrix: Solid
Analysis Batch: 29750

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			07/15/22 14:39	1

Lab Sample ID: LCS 880-29573/2-A
Matrix: Solid
Analysis Batch: 29750

Client Sample ID: Lab Control Sample
Prep Type: Soluble

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Chloride			250	267.4		mg/Kg		107	90 - 110		

Lab Sample ID: LCSD 880-29573/3-A
Matrix: Solid
Analysis Batch: 29750

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	267.7		mg/Kg		107	90 - 110	0	20

Lab Sample ID: 890-2529-6 MS
Matrix: Solid
Analysis Batch: 29750

Client Sample ID: S-7
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits		
Chloride	3230	F1	1250	4622	F1	mg/Kg		111	90 - 110		

Lab Sample ID: 890-2529-6 MSD
Matrix: Solid
Analysis Batch: 29750

Client Sample ID: S-7
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Chloride	3230	F1	1250	4632	F1	mg/Kg		112	90 - 110	0	20

Lab Sample ID: 890-2529-16 MS
Matrix: Solid
Analysis Batch: 29750

Client Sample ID: S-17
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits		
Chloride	73.0	F1	248	361.1	F1	mg/Kg		116	90 - 110		

QC Sample Results

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: 890-2529-16 MSD
Matrix: Solid
Analysis Batch: 29750

Client Sample ID: S-17
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Chloride	73.0	F1	248	360.5	F1	mg/Kg		116	90 - 110	0	20

Lab Sample ID: MB 880-29572/1-A
Matrix: Solid
Analysis Batch: 29761

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			07/15/22 12:24	1

Lab Sample ID: LCS 880-29572/2-A
Matrix: Solid
Analysis Batch: 29761

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 880-29572/3-A
Matrix: Solid
Analysis Batch: 29761

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	267.0		mg/Kg		107	90 - 110	0	20

Lab Sample ID: MB 880-30110/1-A
Matrix: Solid
Analysis Batch: 30137

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			07/20/22 12:41	1

Lab Sample ID: LCS 880-30110/2-A
Matrix: Solid
Analysis Batch: 30137

Client Sample ID: Lab Control Sample
Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Chloride	250	268.1		mg/Kg		107	90 - 110

Lab Sample ID: LCSD 880-30110/3-A
Matrix: Solid
Analysis Batch: 30137

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	268.3		mg/Kg		107	90 - 110	0	20

QC Association Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

GC VOA

Prep Batch: 29722

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-29722/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 29739

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-1	S-2	Total/NA	Solid	5035	
890-2529-2	S-3	Total/NA	Solid	5035	
890-2529-3	S-4	Total/NA	Solid	5035	
890-2529-4	S-5	Total/NA	Solid	5035	
890-2529-5	S-6	Total/NA	Solid	5035	
890-2529-6	S-7	Total/NA	Solid	5035	
890-2529-7	S-8	Total/NA	Solid	5035	
890-2529-8	S-9	Total/NA	Solid	5035	
890-2529-9	S-10	Total/NA	Solid	5035	
890-2529-10	S-11	Total/NA	Solid	5035	
890-2529-11	S-12	Total/NA	Solid	5035	
890-2529-12	S-13	Total/NA	Solid	5035	
890-2529-13	S-14	Total/NA	Solid	5035	
890-2529-14	S-15	Total/NA	Solid	5035	
890-2529-15	S-16	Total/NA	Solid	5035	
890-2529-16	S-17	Total/NA	Solid	5035	
MB 880-29739/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-29739/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-29739/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Prep Batch: 29759

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-17	S-18	Total/NA	Solid	5035	
890-2529-18	N-SW1	Total/NA	Solid	5035	
890-2529-19	E-SW1	Total/NA	Solid	5035	
890-2529-20	E-SW2	Total/NA	Solid	5035	
890-2529-21	S-SW1	Total/NA	Solid	5035	
890-2529-22	W-SW1	Total/NA	Solid	5035	
890-2529-23	W-SW2	Total/NA	Solid	5035	
890-2529-24	N-SW2	Total/NA	Solid	5035	
890-2529-25	E-SW3	Total/NA	Solid	5035	
890-2529-26	S-SW2	Total/NA	Solid	5035	
890-2529-27	W-SW3	Total/NA	Solid	5035	
MB 880-29759/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-29759/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-29759/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Prep Batch: 29770

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-29770/5-A	Method Blank	Total/NA	Solid	5035	

Analysis Batch: 29790

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-1	S-2	Total/NA	Solid	8021B	29739
890-2529-2	S-3	Total/NA	Solid	8021B	29739
890-2529-3	S-4	Total/NA	Solid	8021B	29739
890-2529-4	S-5	Total/NA	Solid	8021B	29739

QC Association Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

GC VOA (Continued)

Analysis Batch: 29790 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-5	S-6	Total/NA	Solid	8021B	29739
890-2529-6	S-7	Total/NA	Solid	8021B	29739
890-2529-7	S-8	Total/NA	Solid	8021B	29739
890-2529-8	S-9	Total/NA	Solid	8021B	29739
890-2529-9	S-10	Total/NA	Solid	8021B	29739
890-2529-10	S-11	Total/NA	Solid	8021B	29739
890-2529-11	S-12	Total/NA	Solid	8021B	29739
890-2529-12	S-13	Total/NA	Solid	8021B	29739
890-2529-13	S-14	Total/NA	Solid	8021B	29739
890-2529-14	S-15	Total/NA	Solid	8021B	29739
890-2529-15	S-16	Total/NA	Solid	8021B	29739
890-2529-16	S-17	Total/NA	Solid	8021B	29739
MB 880-29722/5-A	Method Blank	Total/NA	Solid	8021B	29722
MB 880-29739/5-A	Method Blank	Total/NA	Solid	8021B	29739
LCS 880-29739/1-A	Lab Control Sample	Total/NA	Solid	8021B	29739
LCSD 880-29739/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	29739

Analysis Batch: 29845

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-17	S-18	Total/NA	Solid	8021B	29759
890-2529-18	N-SW1	Total/NA	Solid	8021B	29759
890-2529-19	E-SW1	Total/NA	Solid	8021B	29759
890-2529-20	E-SW2	Total/NA	Solid	8021B	29759
890-2529-21	S-SW1	Total/NA	Solid	8021B	29759
890-2529-22	W-SW1	Total/NA	Solid	8021B	29759
890-2529-23	W-SW2	Total/NA	Solid	8021B	29759
890-2529-24	N-SW2	Total/NA	Solid	8021B	29759
890-2529-25	E-SW3	Total/NA	Solid	8021B	29759
890-2529-26	S-SW2	Total/NA	Solid	8021B	29759
890-2529-27	W-SW3	Total/NA	Solid	8021B	29759
MB 880-29759/5-A	Method Blank	Total/NA	Solid	8021B	29759
MB 880-29770/5-A	Method Blank	Total/NA	Solid	8021B	29770
LCS 880-29759/1-A	Lab Control Sample	Total/NA	Solid	8021B	29759
LCSD 880-29759/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	29759

Analysis Batch: 29954

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-1	S-2	Total/NA	Solid	Total BTEX	
890-2529-2	S-3	Total/NA	Solid	Total BTEX	
890-2529-3	S-4	Total/NA	Solid	Total BTEX	
890-2529-4	S-5	Total/NA	Solid	Total BTEX	
890-2529-5	S-6	Total/NA	Solid	Total BTEX	
890-2529-6	S-7	Total/NA	Solid	Total BTEX	
890-2529-7	S-8	Total/NA	Solid	Total BTEX	
890-2529-8	S-9	Total/NA	Solid	Total BTEX	
890-2529-9	S-10	Total/NA	Solid	Total BTEX	
890-2529-10	S-11	Total/NA	Solid	Total BTEX	
890-2529-11	S-12	Total/NA	Solid	Total BTEX	
890-2529-12	S-13	Total/NA	Solid	Total BTEX	
890-2529-13	S-14	Total/NA	Solid	Total BTEX	
890-2529-14	S-15	Total/NA	Solid	Total BTEX	

QC Association Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

GC VOA (Continued)

Analysis Batch: 29954 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-15	S-16	Total/NA	Solid	Total BTEX	
890-2529-16	S-17	Total/NA	Solid	Total BTEX	
890-2529-17	S-18	Total/NA	Solid	Total BTEX	
890-2529-18	N-SW1	Total/NA	Solid	Total BTEX	
890-2529-19	E-SW1	Total/NA	Solid	Total BTEX	
890-2529-20	E-SW2	Total/NA	Solid	Total BTEX	
890-2529-21	S-SW1	Total/NA	Solid	Total BTEX	
890-2529-22	W-SW1	Total/NA	Solid	Total BTEX	
890-2529-23	W-SW2	Total/NA	Solid	Total BTEX	
890-2529-24	N-SW2	Total/NA	Solid	Total BTEX	
890-2529-25	E-SW3	Total/NA	Solid	Total BTEX	
890-2529-26	S-SW2	Total/NA	Solid	Total BTEX	
890-2529-27	W-SW3	Total/NA	Solid	Total BTEX	

GC Semi VOA

Prep Batch: 29564

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-1	S-2	Total/NA	Solid	8015NM Prep	
890-2529-2	S-3	Total/NA	Solid	8015NM Prep	
890-2529-3	S-4	Total/NA	Solid	8015NM Prep	
890-2529-4	S-5	Total/NA	Solid	8015NM Prep	
890-2529-5	S-6	Total/NA	Solid	8015NM Prep	
890-2529-6	S-7	Total/NA	Solid	8015NM Prep	
890-2529-7	S-8	Total/NA	Solid	8015NM Prep	
890-2529-8	S-9	Total/NA	Solid	8015NM Prep	
890-2529-9	S-10	Total/NA	Solid	8015NM Prep	
890-2529-10	S-11	Total/NA	Solid	8015NM Prep	
890-2529-11	S-12	Total/NA	Solid	8015NM Prep	
890-2529-12	S-13	Total/NA	Solid	8015NM Prep	
890-2529-13	S-14	Total/NA	Solid	8015NM Prep	
890-2529-14	S-15	Total/NA	Solid	8015NM Prep	
890-2529-15	S-16	Total/NA	Solid	8015NM Prep	
890-2529-16	S-17	Total/NA	Solid	8015NM Prep	
890-2529-17	S-18	Total/NA	Solid	8015NM Prep	
890-2529-18	N-SW1	Total/NA	Solid	8015NM Prep	
890-2529-19	E-SW1	Total/NA	Solid	8015NM Prep	
890-2529-20	E-SW2	Total/NA	Solid	8015NM Prep	
MB 880-29564/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-29564/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-29564/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-2529-1 MS	S-2	Total/NA	Solid	8015NM Prep	
890-2529-1 MSD	S-2	Total/NA	Solid	8015NM Prep	

Analysis Batch: 29605

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-1	S-2	Total/NA	Solid	8015B NM	29564
890-2529-2	S-3	Total/NA	Solid	8015B NM	29564
890-2529-3	S-4	Total/NA	Solid	8015B NM	29564
890-2529-4	S-5	Total/NA	Solid	8015B NM	29564
890-2529-5	S-6	Total/NA	Solid	8015B NM	29564

QC Association Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

GC Semi VOA (Continued)

Analysis Batch: 29605 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-6	S-7	Total/NA	Solid	8015B NM	29564
890-2529-7	S-8	Total/NA	Solid	8015B NM	29564
890-2529-8	S-9	Total/NA	Solid	8015B NM	29564
890-2529-9	S-10	Total/NA	Solid	8015B NM	29564
890-2529-10	S-11	Total/NA	Solid	8015B NM	29564
890-2529-11	S-12	Total/NA	Solid	8015B NM	29564
890-2529-12	S-13	Total/NA	Solid	8015B NM	29564
890-2529-13	S-14	Total/NA	Solid	8015B NM	29564
890-2529-14	S-15	Total/NA	Solid	8015B NM	29564
890-2529-15	S-16	Total/NA	Solid	8015B NM	29564
890-2529-16	S-17	Total/NA	Solid	8015B NM	29564
890-2529-17	S-18	Total/NA	Solid	8015B NM	29564
890-2529-18	N-SW1	Total/NA	Solid	8015B NM	29564
890-2529-19	E-SW1	Total/NA	Solid	8015B NM	29564
890-2529-20	E-SW2	Total/NA	Solid	8015B NM	29564
MB 880-29564/1-A	Method Blank	Total/NA	Solid	8015B NM	29564
LCS 880-29564/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	29564
LCSD 880-29564/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	29564
890-2529-1 MS	S-2	Total/NA	Solid	8015B NM	29564
890-2529-1 MSD	S-2	Total/NA	Solid	8015B NM	29564

Analysis Batch: 29609

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-21	S-SW1	Total/NA	Solid	8015B NM	29622
890-2529-22	W-SW1	Total/NA	Solid	8015B NM	29622
890-2529-23	W-SW2	Total/NA	Solid	8015B NM	29622
890-2529-24	N-SW2	Total/NA	Solid	8015B NM	29622
890-2529-25	E-SW3	Total/NA	Solid	8015B NM	29622
890-2529-26	S-SW2	Total/NA	Solid	8015B NM	29622
890-2529-27	W-SW3	Total/NA	Solid	8015B NM	29622
MB 880-29622/1-A	Method Blank	Total/NA	Solid	8015B NM	29622
LCS 880-29622/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	29622
LCSD 880-29622/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	29622

Prep Batch: 29622

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-21	S-SW1	Total/NA	Solid	8015NM Prep	
890-2529-22	W-SW1	Total/NA	Solid	8015NM Prep	
890-2529-23	W-SW2	Total/NA	Solid	8015NM Prep	
890-2529-24	N-SW2	Total/NA	Solid	8015NM Prep	
890-2529-25	E-SW3	Total/NA	Solid	8015NM Prep	
890-2529-26	S-SW2	Total/NA	Solid	8015NM Prep	
890-2529-27	W-SW3	Total/NA	Solid	8015NM Prep	
MB 880-29622/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-29622/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-29622/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	

Analysis Batch: 29708

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-1	S-2	Total/NA	Solid	8015 NM	
890-2529-2	S-3	Total/NA	Solid	8015 NM	

QC Association Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

GC Semi VOA (Continued)

Analysis Batch: 29708 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-3	S-4	Total/NA	Solid	8015 NM	
890-2529-4	S-5	Total/NA	Solid	8015 NM	
890-2529-5	S-6	Total/NA	Solid	8015 NM	
890-2529-6	S-7	Total/NA	Solid	8015 NM	
890-2529-7	S-8	Total/NA	Solid	8015 NM	
890-2529-8	S-9	Total/NA	Solid	8015 NM	
890-2529-9	S-10	Total/NA	Solid	8015 NM	
890-2529-10	S-11	Total/NA	Solid	8015 NM	
890-2529-11	S-12	Total/NA	Solid	8015 NM	
890-2529-12	S-13	Total/NA	Solid	8015 NM	
890-2529-13	S-14	Total/NA	Solid	8015 NM	
890-2529-14	S-15	Total/NA	Solid	8015 NM	
890-2529-15	S-16	Total/NA	Solid	8015 NM	
890-2529-16	S-17	Total/NA	Solid	8015 NM	
890-2529-17	S-18	Total/NA	Solid	8015 NM	
890-2529-18	N-SW1	Total/NA	Solid	8015 NM	
890-2529-19	E-SW1	Total/NA	Solid	8015 NM	
890-2529-20	E-SW2	Total/NA	Solid	8015 NM	
890-2529-21	S-SW1	Total/NA	Solid	8015 NM	
890-2529-22	W-SW1	Total/NA	Solid	8015 NM	
890-2529-23	W-SW2	Total/NA	Solid	8015 NM	
890-2529-24	N-SW2	Total/NA	Solid	8015 NM	
890-2529-25	E-SW3	Total/NA	Solid	8015 NM	
890-2529-26	S-SW2	Total/NA	Solid	8015 NM	
890-2529-27	W-SW3	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 29401

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-29401/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-29401/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-29401/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Leach Batch: 29572

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-1	S-2	Soluble	Solid	DI Leach	
890-2529-2	S-3	Soluble	Solid	DI Leach	
890-2529-3	S-4	Soluble	Solid	DI Leach	
890-2529-4	S-5	Soluble	Solid	DI Leach	
890-2529-5	S-6	Soluble	Solid	DI Leach	
MB 880-29572/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-29572/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-29572/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Leach Batch: 29573

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-6	S-7	Soluble	Solid	DI Leach	
890-2529-7	S-8	Soluble	Solid	DI Leach	
890-2529-8	S-9	Soluble	Solid	DI Leach	
890-2529-9	S-10	Soluble	Solid	DI Leach	

QC Association Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

HPLC/IC (Continued)

Leach Batch: 29573 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-10	S-11	Soluble	Solid	DI Leach	
890-2529-11	S-12	Soluble	Solid	DI Leach	
890-2529-12	S-13	Soluble	Solid	DI Leach	
890-2529-13	S-14	Soluble	Solid	DI Leach	
890-2529-14	S-15	Soluble	Solid	DI Leach	
890-2529-15	S-16	Soluble	Solid	DI Leach	
890-2529-16	S-17	Soluble	Solid	DI Leach	
890-2529-17	S-18	Soluble	Solid	DI Leach	
890-2529-18	N-SW1	Soluble	Solid	DI Leach	
890-2529-19	E-SW1	Soluble	Solid	DI Leach	
890-2529-20	E-SW2	Soluble	Solid	DI Leach	
890-2529-21	S-SW1	Soluble	Solid	DI Leach	
890-2529-22	W-SW1	Soluble	Solid	DI Leach	
890-2529-23	W-SW2	Soluble	Solid	DI Leach	
890-2529-24	N-SW2	Soluble	Solid	DI Leach	
890-2529-25	E-SW3	Soluble	Solid	DI Leach	
MB 880-29573/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-29573/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-29573/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
890-2529-6 MS	S-7	Soluble	Solid	DI Leach	
890-2529-6 MSD	S-7	Soluble	Solid	DI Leach	
890-2529-16 MS	S-17	Soluble	Solid	DI Leach	
890-2529-16 MSD	S-17	Soluble	Solid	DI Leach	

Analysis Batch: 29646

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-29401/1-A	Method Blank	Soluble	Solid	300.0	29401
LCS 880-29401/2-A	Lab Control Sample	Soluble	Solid	300.0	29401
LCSD 880-29401/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	29401

Analysis Batch: 29750

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-6	S-7	Soluble	Solid	300.0	29573
890-2529-7	S-8	Soluble	Solid	300.0	29573
890-2529-8	S-9	Soluble	Solid	300.0	29573
890-2529-9	S-10	Soluble	Solid	300.0	29573
890-2529-10	S-11	Soluble	Solid	300.0	29573
890-2529-11	S-12	Soluble	Solid	300.0	29573
890-2529-12	S-13	Soluble	Solid	300.0	29573
890-2529-13	S-14	Soluble	Solid	300.0	29573
890-2529-14	S-15	Soluble	Solid	300.0	29573
890-2529-15	S-16	Soluble	Solid	300.0	29573
890-2529-16	S-17	Soluble	Solid	300.0	29573
890-2529-17	S-18	Soluble	Solid	300.0	29573
890-2529-18	N-SW1	Soluble	Solid	300.0	29573
890-2529-19	E-SW1	Soluble	Solid	300.0	29573
890-2529-20	E-SW2	Soluble	Solid	300.0	29573
890-2529-21	S-SW1	Soluble	Solid	300.0	29573
890-2529-22	W-SW1	Soluble	Solid	300.0	29573
890-2529-23	W-SW2	Soluble	Solid	300.0	29573
890-2529-24	N-SW2	Soluble	Solid	300.0	29573

QC Association Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

HPLC/IC (Continued)

Analysis Batch: 29750 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-25	E-SW3	Soluble	Solid	300.0	29573
MB 880-29573/1-A	Method Blank	Soluble	Solid	300.0	29573
LCS 880-29573/2-A	Lab Control Sample	Soluble	Solid	300.0	29573
LCSD 880-29573/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	29573
890-2529-6 MS	S-7	Soluble	Solid	300.0	29573
890-2529-6 MSD	S-7	Soluble	Solid	300.0	29573
890-2529-16 MS	S-17	Soluble	Solid	300.0	29573
890-2529-16 MSD	S-17	Soluble	Solid	300.0	29573

Analysis Batch: 29761

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-1	S-2	Soluble	Solid	300.0	29572
890-2529-2	S-3	Soluble	Solid	300.0	29572
890-2529-3	S-4	Soluble	Solid	300.0	29572
890-2529-4	S-5	Soluble	Solid	300.0	29572
890-2529-5	S-6	Soluble	Solid	300.0	29572
MB 880-29572/1-A	Method Blank	Soluble	Solid	300.0	29572
LCS 880-29572/2-A	Lab Control Sample	Soluble	Solid	300.0	29572
LCSD 880-29572/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	29572

Leach Batch: 30110

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-26	S-SW2	Soluble	Solid	DI Leach	
890-2529-27	W-SW3	Soluble	Solid	DI Leach	
MB 880-30110/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-30110/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-30110/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Analysis Batch: 30137

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-2529-26	S-SW2	Soluble	Solid	300.0	30110
890-2529-27	W-SW3	Soluble	Solid	300.0	30110
MB 880-30110/1-A	Method Blank	Soluble	Solid	300.0	30110
LCS 880-30110/2-A	Lab Control Sample	Soluble	Solid	300.0	30110
LCSD 880-30110/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	30110

Lab Chronicle

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-2
Date Collected: 07/08/22 14:00
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-1
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			5.00 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 01:12	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 11:31	AJ	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	29572	07/12/22 16:02	KS	XEN MID
Soluble	Analysis	300.0		1			29761	07/15/22 16:23	CH	XEN MID

Client Sample ID: S-3
Date Collected: 07/08/22 14:05
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-2
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			4.98 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 01:33	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 12:36	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	29572	07/12/22 16:02	KS	XEN MID
Soluble	Analysis	300.0		1			29761	07/15/22 16:32	CH	XEN MID

Client Sample ID: S-4
Date Collected: 07/08/22 14:10
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-3
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			4.99 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 01:54	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 12:58	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	29572	07/12/22 16:02	KS	XEN MID
Soluble	Analysis	300.0		1			29761	07/15/22 16:42	CH	XEN MID

Client Sample ID: S-5
Date Collected: 07/08/22 14:15
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-4
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.03 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 02:14	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID

Lab Chronicle

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-5
Date Collected: 07/08/22 14:15
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-4
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			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 13:20	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	29572	07/12/22 16:02	KS	XEN MID
Soluble	Analysis	300.0		1			29761	07/15/22 16:51	CH	XEN MID

Client Sample ID: S-6
Date Collected: 07/08/22 14:20
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-5
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	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 02:35	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 13:41	AJ	XEN MID
Soluble	Leach	DI Leach			4.98 g	50 mL	29572	07/12/22 16:02	KS	XEN MID
Soluble	Analysis	300.0		5			29761	07/15/22 17:00	CH	XEN MID

Client Sample ID: S-7
Date Collected: 07/08/22 14:25
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-6
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	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 02:56	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 14:03	AJ	XEN MID
Soluble	Leach	DI Leach			4.99 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		5			29750	07/15/22 15:03	CH	XEN MID

Client Sample ID: S-8
Date Collected: 07/08/22 14:30
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-7
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			5.00 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 04:20	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 14:24	AJ	XEN MID

Eurofins Carlsbad

Lab Chronicle

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-8
Date Collected: 07/08/22 14:30
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-7
Matrix: Solid

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	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 15:27	CH	XEN MID

Client Sample ID: S-9
Date Collected: 07/08/22 14:35
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-8
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			5.04 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 04:41	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 14:45	AJ	XEN MID
Soluble	Leach	DI Leach			4.95 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 15:34	CH	XEN MID

Client Sample ID: S-10
Date Collected: 07/08/22 14:40
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-9
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			5.02 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 05:02	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 15:07	AJ	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		10			29750	07/15/22 15:42	CH	XEN MID

Client Sample ID: S-11
Date Collected: 07/08/22 14:45
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-10
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			4.96 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 05:23	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 15:28	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		5			29750	07/15/22 15:50	CH	XEN MID

Lab Chronicle

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-12
Date Collected: 07/08/22 14:50
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-11
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			4.97 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 05:44	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 16:11	AJ	XEN MID
Soluble	Leach	DI Leach			4.98 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 16:14	CH	XEN MID

Client Sample ID: S-13
Date Collected: 07/08/22 14:55
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-12
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			4.98 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 06:04	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 16:32	AJ	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 16:22	CH	XEN MID

Client Sample ID: S-14
Date Collected: 07/08/22 15:00
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-13
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			4.99 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 06:25	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 16:53	AJ	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 16:30	CH	XEN MID

Client Sample ID: S-15
Date Collected: 07/08/22 15:05
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-14
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			5.00 g	5 mL	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 06:46	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID

Lab Chronicle

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-15
Date Collected: 07/08/22 15:05
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-14
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			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 17:15	AJ	XEN MID
Soluble	Leach	DI Leach			5.02 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 16:37	CH	XEN MID

Client Sample ID: S-16
Date Collected: 07/08/22 15:10
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-15
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	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 07:06	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 17:36	AJ	XEN MID
Soluble	Leach	DI Leach			5.04 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 16:45	CH	XEN MID

Client Sample ID: S-17
Date Collected: 07/08/22 15:15
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-16
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	29739	07/14/22 10:08	EL	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29790	07/16/22 07:27	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.04 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 17:57	AJ	XEN MID
Soluble	Leach	DI Leach			5.05 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 16:53	CH	XEN MID

Client Sample ID: S-18
Date Collected: 07/08/22 15:20
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-17
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			5.04 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 03:24	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 18:18	AJ	XEN MID

Lab Chronicle

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-18
Date Collected: 07/08/22 15:20
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-17
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			4.99 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 17:17	CH	XEN MID

Client Sample ID: N-SW1
Date Collected: 07/08/22 15:25
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-18
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			4.95 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 03:44	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 18:40	AJ	XEN MID
Soluble	Leach	DI Leach			4.97 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 17:25	CH	XEN MID

Client Sample ID: E-SW1
Date Collected: 07/08/22 15:30
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-19
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			4.96 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 04:05	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 19:01	AJ	XEN MID
Soluble	Leach	DI Leach			4.97 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 17:48	CH	XEN MID

Client Sample ID: E-SW2
Date Collected: 07/08/22 15:35
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-20
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	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 04:25	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	29564	07/12/22 15:34	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29605	07/13/22 19:22	AJ	XEN MID
Soluble	Leach	DI Leach			4.95 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 17:56	CH	XEN MID

Lab Chronicle

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: S-SW1
Date Collected: 07/08/22 15:40
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-21
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			5.03 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 04:46	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	29622	07/13/22 09:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29609	07/13/22 13:10	SM	XEN MID
Soluble	Leach	DI Leach			5.03 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 18:04	CH	XEN MID

Client Sample ID: W-SW1
Date Collected: 07/08/22 15:45
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-22
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			4.97 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 05:06	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	29622	07/13/22 09:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29609	07/13/22 13:31	SM	XEN MID
Soluble	Leach	DI Leach			5.04 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		5			29750	07/15/22 18:12	CH	XEN MID

Client Sample ID: W-SW2
Date Collected: 07/08/22 15:50
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-23
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			4.99 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 05:26	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.03 g	10 mL	29622	07/13/22 09:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29609	07/13/22 13:52	SM	XEN MID
Soluble	Leach	DI Leach			5.01 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 18:19	CH	XEN MID

Client Sample ID: N-SW2
Date Collected: 07/08/22 15:55
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-24
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.01 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 07:37	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID

Lab Chronicle

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: N-SW2
Date Collected: 07/08/22 15:55
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-24
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			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	29622	07/13/22 09:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29609	07/13/22 14:14	SM	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 18:27	CH	XEN MID

Client Sample ID: E-SW3
Date Collected: 07/08/22 16:00
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-25
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			5.03 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 07:57	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.00 g	10 mL	29622	07/13/22 09:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29609	07/13/22 14:35	SM	XEN MID
Soluble	Leach	DI Leach			5 g	50 mL	29573	07/12/22 16:03	KS	XEN MID
Soluble	Analysis	300.0		1			29750	07/15/22 18:35	CH	XEN MID

Client Sample ID: S-SW2
Date Collected: 07/08/22 16:05
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-26
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			5.02 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 08:18	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	29622	07/13/22 09:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29609	07/13/22 14:55	SM	XEN MID
Soluble	Leach	DI Leach			5.04 g	50 mL	30110	07/20/22 11:00	SMC	XEN MID
Soluble	Analysis	300.0		1			30137	07/20/22 15:01	CH	XEN MID

Client Sample ID: W-SW3
Date Collected: 07/08/22 16:10
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-27
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			5.04 g	5 mL	29759	07/14/22 13:24	MR	XEN MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	29845	07/16/22 08:38	MR	XEN MID
Total/NA	Analysis	Total BTEX		1			29954	07/18/22 13:45	SM	XEN MID
Total/NA	Analysis	8015 NM		1			29708	07/14/22 09:07	AJ	XEN MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	29622	07/13/22 09:24	DM	XEN MID
Total/NA	Analysis	8015B NM		1			29609	07/13/22 15:17	SM	XEN MID

Lab Chronicle

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Client Sample ID: W-SW3
Date Collected: 07/08/22 16:10
Date Received: 07/11/22 10:43

Lab Sample ID: 890-2529-27
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			4.99 g	50 mL	30110	07/20/22 11:00	SMC	XEN MID
Soluble	Analysis	300.0		1			30137	07/20/22 15:09	CH	XEN MID

Laboratory References:

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

Accreditation/Certification Summary

Client: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

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	T104704400-22-24	06-30-23

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: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

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: Talon/LPE
Project/Site: Perserus CTB

Job ID: 890-2529-1
SDG: 704001.001.01

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth
890-2529-1	S-2	Solid	07/08/22 14:00	07/11/22 10:43	0.5
890-2529-2	S-3	Solid	07/08/22 14:05	07/11/22 10:43	0.5
890-2529-3	S-4	Solid	07/08/22 14:10	07/11/22 10:43	0.5
890-2529-4	S-5	Solid	07/08/22 14:15	07/11/22 10:43	0.5
890-2529-5	S-6	Solid	07/08/22 14:20	07/11/22 10:43	0.5
890-2529-6	S-7	Solid	07/08/22 14:25	07/11/22 10:43	0.5
890-2529-7	S-8	Solid	07/08/22 14:30	07/11/22 10:43	0.5
890-2529-8	S-9	Solid	07/08/22 14:35	07/11/22 10:43	0.5
890-2529-9	S-10	Solid	07/08/22 14:40	07/11/22 10:43	0.5
890-2529-10	S-11	Solid	07/08/22 14:45	07/11/22 10:43	0.5
890-2529-11	S-12	Solid	07/08/22 14:50	07/11/22 10:43	0.5
890-2529-12	S-13	Solid	07/08/22 14:55	07/11/22 10:43	0.5
890-2529-13	S-14	Solid	07/08/22 15:00	07/11/22 10:43	0.5
890-2529-14	S-15	Solid	07/08/22 15:05	07/11/22 10:43	0.5
890-2529-15	S-16	Solid	07/08/22 15:10	07/11/22 10:43	0.5
890-2529-16	S-17	Solid	07/08/22 15:15	07/11/22 10:43	0.5
890-2529-17	S-18	Solid	07/08/22 15:20	07/11/22 10:43	1
890-2529-18	N-SW1	Solid	07/08/22 15:25	07/11/22 10:43	0.5
890-2529-19	E-SW1	Solid	07/08/22 15:30	07/11/22 10:43	0.5
890-2529-20	E-SW2	Solid	07/08/22 15:35	07/11/22 10:43	0.5
890-2529-21	S-SW1	Solid	07/08/22 15:40	07/11/22 10:43	0.5
890-2529-22	W-SW1	Solid	07/08/22 15:45	07/11/22 10:43	0.5
890-2529-23	W-SW2	Solid	07/08/22 15:50	07/11/22 10:43	0.5
890-2529-24	N-SW2	Solid	07/08/22 15:55	07/11/22 10:43	1
890-2529-25	E-SW3	Solid	07/08/22 16:00	07/11/22 10:43	1
890-2529-26	S-SW2	Solid	07/08/22 16:05	07/11/22 10:43	1
890-2529-27	W-SW3	Solid	07/08/22 16:10	07/11/22 10:43	1

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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: _____

www.xenco.com Page 1 of 3

Project Manager:	D. Adkins	Bill to: (if different)	
Company Name:	Talon LPE	Company Name:	
Address:	408 W. Texas Ave.	Address:	
City, State ZIP:	Artesia, NM 88210	City, State ZIP:	
Phone:	575.746.8768	Email:	

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:	Perseus CTB	Turn Around	
Project Number:	704001.001.01	☑ Routine ☐ Rush	
Project Location:	Chavez County, NM	Due Date:	
Sampler's Name:	M. Gomez	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:	TNM-007
Cooler Custody Seals:	Yes No N/A	Correction Factor:	-0.2
Sample Custody Seals:	Yes No N/A	Temperature Reading:	4.0
Total Containers:		Corrected Temperature:	3.8

Preservative Codes

None: NO; DI Water: H_2O; Cool: Cool; MeOH: Me; HCL: HC; HNO_3: HN; H_2SO_4: H_2; NaOH: Na; H_3PO_4: HP; $NaHSO_4$: NABIS; $Na_2S_2O_3$: $NaSO_3$; Zn Acetate+NaOH: Zn; NaOH+Ascorbic Acid: SAPC

890-2529 Chain of Custody

Sample Identification	Matrix	Date Sampled	Time Sampled	Depth	Grab/ Comp	# of Cont	Pres. Code	Parameters: Chlorides	Parameters: TPH	Parameters: BTEX
S-2	Soil	7/8/2022	2:00	0.5'	Comp	1		X	X	X
S-3			2:05							
S-4			2:10							
S-5			2:15							
S-6			2:20							
S-7			2:25							
S-8			2:30							
S-9			2:35							
S-10			2:40							
S-11			2:45							

Sample Comments

Email Analyticals to:
dadkins@talonlpe.com
mgomez@talonlpe.com

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 Tl 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 Tl U Hg: 1631 / 245.1 / 7470 / 7471

	Relinquished by: (Signature)	Received by: (Signature)	Date/Time	Relinquished by: (Signature)	Received by: (Signature)	Date/Time
1	Matthew Gomez	Amanda Bluff	7/11/22 1043			
3				4		
5				6		

Revised Date: 08/25/2020 Rev. 2020.2

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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: _____

www.xenco.com Page 2 of 3

Project Manager:	D. Adkins	Bill to: (if different)	
Company Name:	Talon LPE	Company Name:	
Address:	408 W. Texas Ave.	Address:	
City, State ZIP:	Artesia, NM 88210	City, State ZIP:	
Phone:	575.746.8768	Email:	

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:	Perseus CTB	Turn Around	☑ Routine ☐ Rush
Project Number:	704001.001.01	Due Date:	
Project Location:	Chavez County, NM	TAT starts the day received by the lab, if received by 4:30pm	
Sampler's Name:	M. Gomez		
PO #:			

SAMPLE RECEIPT			
Temp Blank:	Yes No	Wet Ice:	Yes No
Samples Received Intact:	Yes No	Thermometer ID:	TAM-007
Cooler Custody Seals:	Yes No N/A	Correction Factor:	-0.2
Sample Custody Seals:	Yes No N/A	Temperature Reading:	4.0
Total Containers:		Corrected Temperature:	3.8

Preservative Codes

None: NO; DI Water: H_2O; Cool: Cool; MeOH: Me; HCL: HC; HNO_3: HN; H_2SO_4: H_2; NaOH: Na; H_3PO_4: HP; $NaHSO_4$: NABIS; $Na_2S_2O_3$: $NaSO_3$; Zn Acetate+NaOH: Zn; NaOH+Ascorbic Acid: SAPC

Sample Identification	Matrix	Date Sampled	Time Sampled	Depth	Grab/ Comp	# of Cont	Chlorides	TPH	BTEX	Sample Comments
S-12	Soil	7/8/2022	2:50	0.5'	Comp	1	X	X	X	Email Analyticals to:
S-13			2:55							dadkins@talonlpe.com
S-14			3:00							mgomez@talonlpe.com
S-15			3:05							
S-16			3:10							
S-17			3:15							
S-18			3:20	1'						
N-SW1			3:25	0.5'						
E-SW1			3:30							
E-SW2			3:35							

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 Tl 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 Tl U Hg: 1631 / 245.1 / 7470 / 7471

Relinquished by: (Signature)	Received by: (Signature)	Date/Time	Relinquished by: (Signature)	Received by: (Signature)	Date/Time
1 Matthew Gomez	Amanda Stuff	7/11/22 10 43			
3			4		
5			6		

Revised Date: 08/25/2020 Rev. 2020.2

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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: _____

www.xenco.com Page 3 of 3

Project Manager:	D. Adkins	Bill to: (if different)	
Company Name:	Talon LPE	Company Name:	
Address:	408 W. Texas Ave.	Address:	
City, State ZIP:	Artesia, NM 88210	City, State ZIP:	
Phone:	575.746.8768	Email:	

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:	Perseus CTB	Turn Around	☑ Routine ☐ Rush
Project Number:	704001.001.01	Due Date:	
Project Location:	Chavez County, NM	TAT starts the day received by the lab, if received by 4:30pm	
Sampler's Name:	M. Gomez		
PO #:			

SAMPLE RECEIPT			
Temp Blank:	Yes No	Wet Ice:	Yes No
Samples Received Intact:	Yes No	Thermometer ID:	TAM-007
Cooler Custody Seals:	Yes No N/A	Correction Factor:	-0.2
Sample Custody Seals:	Yes No N/A	Temperature Reading:	4.0
Total Containers:		Corrected Temperature:	3.8

Preservative Codes

None: NO | DI Water: H_2O
Cool: Cool | MeOH: Me
HCL: HC | HNO_3: HN
H_2SO_4: H_2 | NaOH: Na
H_3PO_4: HP
$NaHSO_4$: NABIS
$Na_2S_2O_3$: $NaSO_3$
Zn Acetate+NaOH: Zn
NaOH+Ascorbic Acid: SAPC

Sample Identification	Matrix	Date Sampled	Time Sampled	Depth	Grab/ Comp	# of Cont	Chlorides	TPH	BTEX
S-SW1	Soil	7/8/2022	3:40	0.5'	Comp	1	X	X	X
W-SW1			3:45						
W-SW2			3:50						
N-SW2			3:55	1'					
E-SW3			4:00						
S-SW2			4:05						
W-SW3			4:10						

Sample Comments

Email Analyticals to:
dadkins@talonlpe.com
mgomez@talonlpe.com

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 Tl 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 Tl U Hg: 1631 / 245.1 / 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 Matthew Gomez	Amanda Stuff	7/11/22 1043			
3			4		
5			6		

Revised Date: 08/25/2020 Rev. 2020.2

Login Sample Receipt Checklist

Client: Talon/LPE

Job Number: 890-2529-1
SDG Number: 704001.001.01

Login Number: 2529
List Number: 1
Creator: Clifton, Cloe

List Source: Eurofins Carlsbad

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
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	

Login Sample Receipt Checklist

Client: Talon/LPE

Job Number: 890-2529-1
SDG Number: 704001.001.01

Login Number: 2529
List Number: 2
Creator: Rodriguez, Leticia

List Source: Eurofins Midland
List Creation: 07/12/22 11:11 AM

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	

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

August 01, 2022

DAVID ADKINS

TALON LPE

408 W. TEXAS AVE.

ARTESIA, NM 88210

RE: PERSEUS 10 CTB

Enclosed are the results of analyses for samples received by the laboratory on 07/27/22 11:25.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-22-15. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/qa/lab_accred_certif.html.

Cardinal Laboratories is accreditated through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2	Haloacetic Acids (HAA-5)
Method EPA 524.2	Total Trihalomethanes (TTHM)
Method EPA 524.4	Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Celey D. Keene

Celey D. Keene

Lab Director/Quality Manager

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Analytical Results For:

TALON LPE
DAVID ADKINS
408 W. TEXAS AVE.
ARTESIA NM, 88210
Fax To: (575) 745-8905

Received:	07/27/2022	Sampling Date:	07/22/2022
Reported:	08/01/2022	Sampling Type:	Soil
Project Name:	PERSEUS 10 CTB	Sampling Condition:	Cool & Intact
Project Number:	704001.001.01	Sample Received By:	Shalyn Rodriguez
Project Location:	BAM PERMIAN - CHAVES COUNTY, NM		

Sample ID: BG - 1 0' (H223309-01)

BTEX 8021B mg/kg Analyzed By: JH

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	07/28/2022	ND	2.04	102	2.00	1.56	
Toluene*	<0.050	0.050	07/28/2022	ND	2.13	107	2.00	1.68	
Ethylbenzene*	<0.050	0.050	07/28/2022	ND	2.19	110	2.00	1.20	
Total Xylenes*	<0.150	0.150	07/28/2022	ND	6.69	111	6.00	1.40	
Total BTEX	<0.300	0.300	07/28/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID *116 %* *69.9-140*

Chloride, SM4500Cl-B mg/kg Analyzed By: AC

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	**64.0**	16.0	07/29/2022	ND	416	104	400	3.77	

TPH 8015M mg/kg Analyzed By: MS

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	07/28/2022	ND	223	111	200	7.16	
DRO >C10-C28*	<10.0	10.0	07/28/2022	ND	230	115	200	4.28	
EXT DRO >C28-C36	<10.0	10.0	07/28/2022	ND					

Surrogate: 1-Chlorooctane *67.6 %* *43-149*

Surrogate: 1-Chlorooctadecane *76.8 %* *42.5-161*

Cardinal Laboratories *=Accredited Analyte

Celey D. Keene, Lab Director/Quality Manager

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Analytical Results For:

TALON LPE
DAVID ADKINS
408 W. TEXAS AVE.
ARTESIA NM, 88210
Fax To: (575) 745-8905

Received:	07/27/2022	Sampling Date:	07/22/2022
Reported:	08/01/2022	Sampling Type:	Soil
Project Name:	PERSEUS 10 CTB	Sampling Condition:	Cool & Intact
Project Number:	704001.001.01	Sample Received By:	Shalyn Rodriguez
Project Location:	BAM PERMIAN - CHAVES COUNTY, NM		

Sample ID: BG - 2 0' (H223309-02)

BTEX 8021B mg/kg Analyzed By: JH

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	07/28/2022	ND	2.04	102	2.00	1.56	
Toluene*	<0.050	0.050	07/28/2022	ND	2.13	107	2.00	1.68	
Ethylbenzene*	<0.050	0.050	07/28/2022	ND	2.19	110	2.00	1.20	
Total Xylenes*	<0.150	0.150	07/28/2022	ND	6.69	111	6.00	1.40	
Total BTEX	<0.300	0.300	07/28/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID *117 %* *69.9-140*

Chloride, SM4500Cl-B mg/kg Analyzed By: AC

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	**32.0**	16.0	07/29/2022	ND	416	104	400	3.77	

TPH 8015M mg/kg Analyzed By: MS

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	07/28/2022	ND	223	111	200	7.16	
DRO >C10-C28*	<10.0	10.0	07/28/2022	ND	230	115	200	4.28	
EXT DRO >C28-C36	<10.0	10.0	07/28/2022	ND					

Surrogate: 1-Chlorooctane *75.4 %* *43-149*

Surrogate: 1-Chlorooctadecane *88.3 %* *42.5-161*

Cardinal Laboratories *=Accredited Analyte

Celey D. Keene

Celey D. Keene, Lab Director/Quality Manager

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Analytical Results For:

TALON LPE
DAVID ADKINS
408 W. TEXAS AVE.
ARTESIA NM, 88210
Fax To: (575) 745-8905

Received:	07/27/2022	Sampling Date:	07/22/2022
Reported:	08/01/2022	Sampling Type:	Soil
Project Name:	PERSEUS 10 CTB	Sampling Condition:	Cool & Intact
Project Number:	704001.001.01	Sample Received By:	Shalyn Rodriguez
Project Location:	BAM PERMIAN - CHAVES COUNTY, NM		

Sample ID: BG - 3 0' (H223309-03)

BTEX 8021B mg/kg Analyzed By: JH

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	07/28/2022	ND	2.04	102	2.00	1.56	
Toluene*	<0.050	0.050	07/28/2022	ND	2.13	107	2.00	1.68	
Ethylbenzene*	<0.050	0.050	07/28/2022	ND	2.19	110	2.00	1.20	
Total Xylenes*	<0.150	0.150	07/28/2022	ND	6.69	111	6.00	1.40	
Total BTEX	<0.300	0.300	07/28/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID *117 %* *69.9-140*

Chloride, SM4500Cl-B mg/kg Analyzed By: AC

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	07/29/2022	ND	416	104	400	3.77	

TPH 8015M mg/kg Analyzed By: MS

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	07/28/2022	ND	223	111	200	7.16	
DRO >C10-C28*	<10.0	10.0	07/28/2022	ND	230	115	200	4.28	
EXT DRO >C28-C36	<10.0	10.0	07/28/2022	ND					

Surrogate: 1-Chlorooctane *67.9 %* *43-149*

Surrogate: 1-Chlorooctadecane *78.1 %* *42.5-161*

Cardinal Laboratories *=Accredited Analyte

Celey D. Keene, Lab Director/Quality Manager

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Analytical Results For:

TALON LPE
DAVID ADKINS
408 W. TEXAS AVE.
ARTESIA NM, 88210
Fax To: (575) 745-8905

Received:	07/27/2022	Sampling Date:	07/22/2022
Reported:	08/01/2022	Sampling Type:	Soil
Project Name:	PERSEUS 10 CTB	Sampling Condition:	Cool & Intact
Project Number:	704001.001.01	Sample Received By:	Shalyn Rodriguez
Project Location:	BAM PERMIAN - CHAVES COUNTY, NM		

Sample ID: BG - 4 0' (H223309-04)

BTEX 8021B mg/kg Analyzed By: JH

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	07/28/2022	ND	2.04	102	2.00	1.56	
Toluene*	<0.050	0.050	07/28/2022	ND	2.13	107	2.00	1.68	
Ethylbenzene*	<0.050	0.050	07/28/2022	ND	2.19	110	2.00	1.20	
Total Xylenes*	<0.150	0.150	07/28/2022	ND	6.69	111	6.00	1.40	
Total BTEX	<0.300	0.300	07/28/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID *117 %* *69.9-140*

Chloride, SM4500Cl-B mg/kg Analyzed By: AC

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	07/29/2022	ND	416	104	400	3.77	

TPH 8015M mg/kg Analyzed By: MS

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	07/28/2022	ND	223	111	200	7.16	
DRO >C10-C28*	<10.0	10.0	07/28/2022	ND	230	115	200	4.28	
EXT DRO >C28-C36	<10.0	10.0	07/28/2022	ND					

Surrogate: 1-Chlorooctane *69.3 %* *43-149*

Surrogate: 1-Chlorooctadecane *76.1 %* *42.5-161*

Cardinal Laboratories *=Accredited Analyte

Celey D. Keene, Lab Director/Quality Manager

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Analytical Results For:

TALON LPE
DAVID ADKINS
408 W. TEXAS AVE.
ARTESIA NM, 88210
Fax To: (575) 745-8905

Received:	07/27/2022	Sampling Date:	07/22/2022
Reported:	08/01/2022	Sampling Type:	Soil
Project Name:	PERSEUS 10 CTB	Sampling Condition:	Cool & Intact
Project Number:	704001.001.01	Sample Received By:	Shalyn Rodriguez
Project Location:	BAM PERMIAN - CHAVES COUNTY, NM		

Sample ID: BG - 5 0' (H223309-05)

BTEX 8021B mg/kg Analyzed By: JH

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	07/28/2022	ND	2.04	102	2.00	1.56	
Toluene*	<0.050	0.050	07/28/2022	ND	2.13	107	2.00	1.68	
Ethylbenzene*	<0.050	0.050	07/28/2022	ND	2.19	110	2.00	1.20	
Total Xylenes*	<0.150	0.150	07/28/2022	ND	6.69	111	6.00	1.40	
Total BTEX	<0.300	0.300	07/28/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID *115 %* *69.9-140*

Chloride, SM4500Cl-B mg/kg Analyzed By: AC

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	**32.0**	16.0	07/29/2022	ND	416	104	400	3.77	

TPH 8015M mg/kg Analyzed By: MS

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	07/28/2022	ND	223	111	200	7.16	
DRO >C10-C28*	**54.7**	10.0	07/28/2022	ND	230	115	200	4.28	
EXT DRO >C28-C36	**52.0**	10.0	07/28/2022	ND					

Surrogate: 1-Chlorooctane *61.5 %* *43-149*

Surrogate: 1-Chlorooctadecane *66.4 %* *42.5-161*

Cardinal Laboratories *=Accredited Analyte

Celey D. Keene, Lab Director/Quality Manager

CARDINAL Laboratories

PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Notes and Definitions

ND	Analyte NOT DETECTED at or above the reporting limit
RPD	Relative Percent Difference
**	Samples not received at proper temperature of 6°C or below.
***	Insufficient time to reach temperature.
-	Chloride by SM4500Cl-B does not require samples be received at or below 6°C
	Samples reported on an as received basis (wet) unless otherwise noted on report

Cardinal Laboratories *=Accredited Analyte

Celey D. Keene, Lab Director/Quality Manager

CARDINAL Laboratories

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

101 East Marland, Hobbs, NM 88240
(575) 393-2326 FAX (575) 393-2476

Company Name:	Talon LPE	**BILL TO**	
Project Manager:	D. Adkins	P.O. #:	
Address:	408 W. Texas Ave	Company:	
City:	Artesia State: NM Zip: 88210	Attn:	
Phone #:	575.746.8768 Fax #:	Address:	
Project #:	704091.001.01 Project Owner: BAM Operating	City:	
Project Name:	Perseus CTB	State: Zip:	
Project Location:	Chaves County, NM	Phone #:	
Sampler Name:	A. Parra	Fax #:	

FOR LAB USE ONLY				MATRIX							PRESERV.			SAMPLING		ANALYSIS REQUEST												
Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :	ACID/BASE:	ICE / COOL	OTHER :	DATE	TIME	BTEX	TPH	Chlorides												
H223309																												
1	BG-1 0'	G	1			X					X		7/22/22	1:00	X	X	X											
2	BG-2 0'													1:10														
3	BG-3 0'													1:20														
4	BG-4 0'													1:30														
5	BG-5 0'													1:40														

Relinquished By:	Date: 7/27/22	Received By:	Phone Result: ☐ Yes ☐ No Add'l Phone #:
	Time: 1125		Fax Result: ☐ Yes ☐ No Add'l Fax #:
Relinquished By:	Date:	Received By:	REMARKS:
	Time:		
Delivered By: (Circle One) Sampler - UPS - Bus - Other:	2.8°C -0.4 2-2°C	Sample Condition Cool ☑ Yes ☐ No Intact ☐ Yes ☐ No	CHECKED BY: (Initials)

#113

† Cardinal cannot accept verbal changes. Please fax written changes to (575) 393-2326

eurofins | Environment Testing

ANALYTICAL REPORT

PREPARED FOR

Attn: Chad Hensley
Talon/LPE
408 W. Texas St.
Artesia, New Mexico 88210

Generated 2/2/2023 1:39:38 PM Revision 1

JOB DESCRIPTION

Perseus CTB
SDG NUMBER 704001.001.01

JOB NUMBER

890-3429-1

Eurofins Carlsbad
1089 N Canal St.
Carlsbad NM 88220

See page two for job notes and contact information.

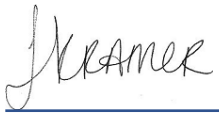
my EOL

Eurofins Carlsbad

Job Notes

Analytical test results meet all requirements of the associated regulatory program (i.e., NELAC (TNI), DoD, and ISO 17025) unless otherwise noted under the individual analysis.

Authorization



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Revision 1

Authorized for release by
Jessica Kramer, Project Manager
Jessica.Kramer@et.eurofinsus.com
(432)704-5440

Client: Talon/LPE
Project/Site: Perseus CTB

Laboratory Job ID: 890-3429-1
SDG: 704001.001.01

Table of Contents

Definitions/Glossary

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Qualifiers

GC 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.

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.
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.
¤	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

Case Narrative

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Job ID: 890-3429-1

Laboratory: Eurofins Carlsbad

Narrative

Job Narrative
890-3429-1

REVISION

The report being provided is a revision of the original report sent on 11/21/2022. The report (revision 1) is being revised due to Per client email, requesting project name edit.

Report revision history

Receipt
The samples were received on 11/10/2022 2:30 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 11.0°C

Receipt Exceptions
The following samples were received and analyzed from an unpreserved bulk soil jar: D-S (890-3429-1), D-N (890-3429-2), D-W (890-3429-3) and D-E (890-3429-4).

GC VOA
Method 8021B: The surrogate recovery for the blank associated with preparation batch 880-39696 and analytical batch 880-39930 was outside the upper control limits.

Method 8021B: The surrogate recovery for the blank associated with preparation batch 880-39722 and analytical batch 880-39930 was outside the upper control limits.

Method 8021B: The method blank for preparation batch 880-39696 and analytical batch 880-39930 contained m-Xylene & p-Xylene 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 8021B: The method blank for preparation batch 880-39722 and analytical batch 880-39930 contained m-Xylene & p-Xylene 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.

GC Semi VOA
Method 8015MOD_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-39514 and analytical batch 880-39389 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 8015MOD_NM: Surrogate recovery for the following sample was outside control limits: (LCSD 880-39418/3-A). Evidence of matrix interferences is not obvious.

Method 8015MOD_NM: The RPD of the laboratory control sample (LCS) and laboratory control sample duplicate (LCSD) for preparation batch 880-39418 and analytical batch 880-39385 recovered outside control limits for the following analytes: 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
No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Case Narrative

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Job ID: 890-3429-1 (Continued)

Laboratory: Eurofins Carlsbad (Continued)

Client Sample Results

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Client Sample ID: D-S
Date Collected: 11/10/22 12:15
Date Received: 11/10/22 14:30
Sample Depth: 0 - 6

Lab Sample ID: 890-3429-1
Matrix: Solid

Method: SW846 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		11/16/22 14:31	11/20/22 03:49	1
Toluene	<0.000454	U	0.00199	0.000454	mg/Kg		11/16/22 14:31	11/20/22 03:49	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		11/16/22 14:31	11/20/22 03:49	1
m-Xylene & p-Xylene	**0.00181**	**J B**	0.00398	0.00101	mg/Kg		11/16/22 14:31	11/20/22 03:49	1
o-Xylene	<0.000343	U	0.00199	0.000343	mg/Kg		11/16/22 14:31	11/20/22 03:49	1
Xylenes, Total	**0.00181**	**J B**	0.00398	0.00101	mg/Kg		11/16/22 14:31	11/20/22 03:49	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*121*		*70 - 130*	*11/16/22 14:31*	*11/20/22 03:49*	*1*
1,4-Difluorobenzene (Surr)	*99*		*70 - 130*	*11/16/22 14:31*	*11/20/22 03:49*	*1*

Method: TAL SOP Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	**0.00181**	**J**	0.00398	0.00101	mg/Kg			11/21/22 18:12	1

Method: SW846 8015 NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**15.9**	**J**	50.0	15.0	mg/Kg			11/15/22 09:20	1

Method: SW846 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 F1**	50.0	15.0	mg/Kg		11/14/22 14:24	11/14/22 21:30	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		11/14/22 14:24	11/14/22 21:30	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		11/14/22 14:24	11/14/22 21:30	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*102*		*70 - 130*	*11/14/22 14:24*	*11/14/22 21:30*	*1*
o-Terphenyl	*112*		*70 - 130*	*11/14/22 14:24*	*11/14/22 21:30*	*1*

Method: EPA 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**52.7**		5.05	0.399	mg/Kg			11/15/22 17:46	1

Client Sample ID: D-N
Date Collected: 11/10/22 12:20
Date Received: 11/10/22 14:30
Sample Depth: 0 - 6

Lab Sample ID: 890-3429-2
Matrix: Solid

Method: SW846 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		11/16/22 14:31	11/20/22 04:15	1
Toluene	**0.000885**	**J**	0.00199	0.000453	mg/Kg		11/16/22 14:31	11/20/22 04:15	1
Ethylbenzene	**0.00368**		0.00199	0.000562	mg/Kg		11/16/22 14:31	11/20/22 04:15	1
m-Xylene & p-Xylene	**0.0253**	**B**	0.00398	0.00100	mg/Kg		11/16/22 14:31	11/20/22 04:15	1
o-Xylene	**0.0121**		0.00199	0.000342	mg/Kg		11/16/22 14:31	11/20/22 04:15	1
Xylenes, Total	**0.0374**	**B**	0.00398	0.00100	mg/Kg		11/16/22 14:31	11/20/22 04:15	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*129*		*70 - 130*	*11/16/22 14:31*	*11/20/22 04:15*	*1*

Eurofins Carlsbad

Client Sample Results

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Client Sample ID: D-N
Date Collected: 11/10/22 12:20
Date Received: 11/10/22 14:30
Sample Depth: 0 - 6

Lab Sample ID: 890-3429-2
Matrix: Solid

Method: SW846 8021B - Volatile Organic Compounds (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1,4-Difluorobenzene (Surr)	92		70 - 130	11/16/22 14:31	11/20/22 04:15	1

Method: TAL SOP Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	**0.0420**		0.00398	0.00100	mg/Kg			11/21/22 18:12	1

Method: SW846 8015 NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**18.5**	**J**	49.8	14.9	mg/Kg			11/15/22 09:20	1

Method: SW846 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	**18.5**	**J**	49.8	14.9	mg/Kg		11/14/22 14:24	11/14/22 22:34	1
Diesel Range Organics (Over C10-C28)	<14.9	U	49.8	14.9	mg/Kg		11/14/22 14:24	11/14/22 22:34	1
Oil Range Organics (Over C28-C36)	<14.9	U	49.8	14.9	mg/Kg		11/14/22 14:24	11/14/22 22:34	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	107		70 - 130	11/14/22 14:24	11/14/22 22:34	1
o-Terphenyl	116		70 - 130	11/14/22 14:24	11/14/22 22:34	1

Method: EPA 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**52.1**		4.96	0.392	mg/Kg			11/15/22 18:08	1

Client Sample ID: D-W
Date Collected: 11/10/22 12:25
Date Received: 11/10/22 14:30
Sample Depth: 0 - 6

Lab Sample ID: 890-3429-3
Matrix: Solid

Method: SW846 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		11/16/22 14:31	11/20/22 04:41	1
Toluene	**0.00255**		0.00200	0.000455	mg/Kg		11/16/22 14:31	11/20/22 04:41	1
Ethylbenzene	**0.00765**		0.00200	0.000564	mg/Kg		11/16/22 14:31	11/20/22 04:41	1
m-Xylene & p-Xylene	**0.0390**	**B**	0.00399	0.00101	mg/Kg		11/16/22 14:31	11/20/22 04:41	1
o-Xylene	**0.0421**		0.00200	0.000343	mg/Kg		11/16/22 14:31	11/20/22 04:41	1
Xylenes, Total	**0.0811**	**B**	0.00399	0.00101	mg/Kg		11/16/22 14:31	11/20/22 04:41	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	123		70 - 130	11/16/22 14:31	11/20/22 04:41	1
1,4-Difluorobenzene (Surr)	99		70 - 130	11/16/22 14:31	11/20/22 04:41	1

Method: TAL SOP Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	**0.0913**		0.00399	0.00101	mg/Kg			11/21/22 18:12	1

Method: SW846 8015 NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	**16.0**	**J**	49.9	15.0	mg/Kg			11/15/22 09:20	1

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Client Sample Results

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Client Sample ID: D-W

Date Collected: 11/10/22 12:25
Date Received: 11/10/22 14:30
Sample Depth: 0 - 6

Lab Sample ID: 890-3429-3
Matrix: Solid

Method: SW846 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	16.0	J	49.9	15.0	mg/Kg		11/14/22 14:24	11/14/22 22:55	1
Diesel Range Organics (Over C10-C28)	<15.0	U	49.9	15.0	mg/Kg		11/14/22 14:24	11/14/22 22:55	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		11/14/22 14:24	11/14/22 22:55	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*106*		*70 - 130*	*11/14/22 14:24*	*11/14/22 22:55*	*1*
o-Terphenyl	*116*		*70 - 130*	*11/14/22 14:24*	*11/14/22 22:55*	*1*

Method: EPA 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.4		4.99	0.394	mg/Kg			11/15/22 18:15	1

Client Sample ID: D-E

Date Collected: 11/10/22 12:36
Date Received: 11/10/22 14:30
Sample Depth: 0 - 6

Lab Sample ID: 890-3429-4
Matrix: Solid

Method: SW846 8021B - Volatile Organic Compounds (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.00184	J	0.00199	0.000383	mg/Kg		11/16/22 14:31	11/20/22 05:06	1
Toluene	<0.000454	U	0.00199	0.000454	mg/Kg		11/16/22 14:31	11/20/22 05:06	1
Ethylbenzene	<0.000563	U	0.00199	0.000563	mg/Kg		11/16/22 14:31	11/20/22 05:06	1
m-Xylene & p-Xylene	0.00181	J B	0.00398	0.00101	mg/Kg		11/16/22 14:31	11/20/22 05:06	1
o-Xylene	0.0244		0.00199	0.000343	mg/Kg		11/16/22 14:31	11/20/22 05:06	1
Xylenes, Total	0.0262	B	0.00398	0.00101	mg/Kg		11/16/22 14:31	11/20/22 05:06	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*113*		*70 - 130*	*11/16/22 14:31*	*11/20/22 05:06*	*1*
1,4-Difluorobenzene (Surr)	*90*		*70 - 130*	*11/16/22 14:31*	*11/20/22 05:06*	*1*

Method: TAL SOP Total BTEX - Total BTEX Calculation

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.0281		0.00398	0.00101	mg/Kg			11/21/22 18:12	1

Method: SW846 8015 NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	26.2	J	49.9	15.0	mg/Kg			11/15/22 13:49	1

Method: SW846 8015B NM - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	26.2	J	49.9	15.0	mg/Kg		11/14/22 10:22	11/15/22 01:14	1
Diesel Range Organics (Over C10-C28)	<15.0	U *1	49.9	15.0	mg/Kg		11/14/22 10:22	11/15/22 01:14	1
Oil Range Organics (Over C28-C36)	<15.0	U	49.9	15.0	mg/Kg		11/14/22 10:22	11/15/22 01:14	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*101*		*70 - 130*	*11/14/22 10:22*	*11/15/22 01:14*	*1*
o-Terphenyl	*106*		*70 - 130*	*11/14/22 10:22*	*11/15/22 01:14*	*1*

Client Sample Results

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Client Sample ID: D-E

Date Collected: 11/10/22 12:36
Date Received: 11/10/22 14:30
Sample Depth: 0 - 6

Lab Sample ID: 890-3429-4

Matrix: Solid

Method: EPA 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	52.5		5.01	0.396	mg/Kg			11/15/22 18:22	1

Surrogate Summary

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)	
		BFB1	DFBZ1
Lab Sample ID	Client Sample ID	(70-130)	(70-130)
890-3429-1	D-S	121	99
890-3429-2	D-N	129	92
890-3429-3	D-W	123	99
890-3429-4	D-E	113	90
LCS 880-39722/1-A	Lab Control Sample	113	92
LCSD 880-39722/2-A	Lab Control Sample Dup	95	94
MB 880-39696/5-A	Method Blank	66 S1-	89
MB 880-39722/5-A	Method Blank	69 S1-	91

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)	
		1CO1	OTPH1
Lab Sample ID	Client Sample ID	(70-130)	(70-130)
890-3429-1	D-S	102	112
890-3429-1 MS	D-S	103	90
890-3429-1 MSD	D-S	115	102
890-3429-2	D-N	107	116
890-3429-3	D-W	106	116
890-3429-4	D-E	101	106
LCS 880-39418/2-A	Lab Control Sample	97	110
LCS 880-39514/2-A	Lab Control Sample	90	92
LCSD 880-39418/3-A	Lab Control Sample Dup	115	135 S1+
LCSD 880-39514/3-A	Lab Control Sample Dup	91	91
MB 880-39418/1-A	Method Blank	89	97
MB 880-39514/1-A	Method Blank	98	107

Surrogate Legend

1CO = 1-Chlorooctane
OTPH = o-Terphenyl

QC Sample Results

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-39696/5-A
Matrix: Solid
Analysis Batch: 39930

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 39696

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		11/16/22 10:35	11/19/22 06:32	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		11/16/22 10:35	11/19/22 06:32	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		11/16/22 10:35	11/19/22 06:32	1
m-Xylene & p-Xylene	0.001805	J	0.00400	0.00101	mg/Kg		11/16/22 10:35	11/19/22 06:32	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		11/16/22 10:35	11/19/22 06:32	1
Xylenes, Total	0.001805	J	0.00400	0.00101	mg/Kg		11/16/22 10:35	11/19/22 06:32	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*66*	*S1-*	*70 - 130*	*11/16/22 10:35*	*11/19/22 06:32*	*1*
1,4-Difluorobenzene (Surr)	*89*		*70 - 130*	*11/16/22 10:35*	*11/19/22 06:32*	*1*

Lab Sample ID: MB 880-39722/5-A
Matrix: Solid
Analysis Batch: 39930

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 39722

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.000385	U	0.00200	0.000385	mg/Kg		11/16/22 14:31	11/19/22 20:05	1
Toluene	<0.000456	U	0.00200	0.000456	mg/Kg		11/16/22 14:31	11/19/22 20:05	1
Ethylbenzene	<0.000565	U	0.00200	0.000565	mg/Kg		11/16/22 14:31	11/19/22 20:05	1
m-Xylene & p-Xylene	0.001799	J	0.00400	0.00101	mg/Kg		11/16/22 14:31	11/19/22 20:05	1
o-Xylene	<0.000344	U	0.00200	0.000344	mg/Kg		11/16/22 14:31	11/19/22 20:05	1
Xylenes, Total	0.001799	J	0.00400	0.00101	mg/Kg		11/16/22 14:31	11/19/22 20:05	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
4-Bromofluorobenzene (Surr)	*69*	*S1-*	*70 - 130*	*11/16/22 14:31*	*11/19/22 20:05*	*1*
1,4-Difluorobenzene (Surr)	*91*		*70 - 130*	*11/16/22 14:31*	*11/19/22 20:05*	*1*

Lab Sample ID: LCS 880-39722/1-A
Matrix: Solid
Analysis Batch: 39930

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 39722

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Benzene	0.100	0.08735		mg/Kg		87	70 - 130
Toluene	0.100	0.09484		mg/Kg		95	70 - 130
Ethylbenzene	0.100	0.08020		mg/Kg		80	70 - 130
m-Xylene & p-Xylene	0.200	0.1782		mg/Kg		89	70 - 130
o-Xylene	0.100	0.08946		mg/Kg		89	70 - 130

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*113*		*70 - 130*
1,4-Difluorobenzene (Surr)	*92*		*70 - 130*

Lab Sample ID: LCSD 880-39722/2-A
Matrix: Solid
Analysis Batch: 39930

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 39722

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Benzene	0.100	0.08926		mg/Kg		89	70 - 130	2	35

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QC Sample Results

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

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

Lab Sample ID: LCSD 880-39722/2-A
Matrix: Solid
Analysis Batch: 39930

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 39722

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Toluene			0.100	0.08918		mg/Kg		89	70 - 130	6	35
Ethylbenzene			0.100	0.08323		mg/Kg		83	70 - 130	4	35
m-Xylene & p-Xylene			0.200	0.1763		mg/Kg		88	70 - 130	1	35
o-Xylene			0.100	0.08097		mg/Kg		81	70 - 130	10	35

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
4-Bromofluorobenzene (Surr)	*95*		*70 - 130*
1,4-Difluorobenzene (Surr)	*94*		*70 - 130*

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

Lab Sample ID: MB 880-39418/1-A
Matrix: Solid
Analysis Batch: 39385

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 39418

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		11/14/22 10:22	11/14/22 20:35	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		11/14/22 10:22	11/14/22 20:35	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		11/14/22 10:22	11/14/22 20:35	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1-Chlorooctane	*89*		*70 - 130*	*11/14/22 10:22*	*11/14/22 20:35*	*1*
o-Terphenyl	*97*		*70 - 130*	*11/14/22 10:22*	*11/14/22 20:35*	*1*

Lab Sample ID: LCS 880-39418/2-A
Matrix: Solid
Analysis Batch: 39385

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 39418

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Gasoline Range Organics (GRO)-C6-C10			1000	860.5		mg/Kg		86	70 - 130
Diesel Range Organics (Over C10-C28)			1000	886.1		mg/Kg		89	70 - 130

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1-Chlorooctane	*97*		*70 - 130*
o-Terphenyl	*110*		*70 - 130*

Lab Sample ID: LCSD 880-39418/3-A
Matrix: Solid
Analysis Batch: 39385

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 39418

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10			1000	889.3		mg/Kg		89	70 - 130	3	20
Diesel Range Organics (Over C10-C28)			1000	1112	*1	mg/Kg		111	70 - 130	23	20

QC Sample Results

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

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

Lab Sample ID: LCSD 880-39418/3-A
Matrix: Solid
Analysis Batch: 39385

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 39418

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
1-Chlorooctane	115		70 - 130
o-Terphenyl	135	S1+	70 - 130

Lab Sample ID: MB 880-39514/1-A
Matrix: Solid
Analysis Batch: 39389

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 39514

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		11/14/22 14:24	11/14/22 20:26	1
Diesel Range Organics (Over C10-C28)	<15.0	U	50.0	15.0	mg/Kg		11/14/22 14:24	11/14/22 20:26	1
Oil Range Organics (Over C28-C36)	<15.0	U	50.0	15.0	mg/Kg		11/14/22 14:24	11/14/22 20:26	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	98		70 - 130	11/14/22 14:24	11/14/22 20:26	1
o-Terphenyl	107		70 - 130	11/14/22 14:24	11/14/22 20:26	1

Lab Sample ID: LCS 880-39514/2-A
Matrix: Solid
Analysis Batch: 39389

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 39514

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Gasoline Range Organics (GRO)-C6-C10	1000	1060		mg/Kg		106	70 - 130
Diesel Range Organics (Over C10-C28)	1000	937.0		mg/Kg		94	70 - 130

Surrogate	LCS %Recovery	LCS Qualifier	Limits
1-Chlorooctane	90		70 - 130
o-Terphenyl	92		70 - 130

Lab Sample ID: LCSD 880-39514/3-A
Matrix: Solid
Analysis Batch: 39389

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 39514

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Gasoline Range Organics (GRO)-C6-C10	1000	1076		mg/Kg		108	70 - 130	2	20
Diesel Range Organics (Over C10-C28)	1000	934.9		mg/Kg		93	70 - 130	0	20

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
1-Chlorooctane	91		70 - 130
o-Terphenyl	91		70 - 130

QC Sample Results

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

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

Lab Sample ID: 890-3429-1 MS
Matrix: Solid
Analysis Batch: 39389

Client Sample ID: D-S
Prep Type: Total/NA
Prep Batch: 39514

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Gasoline Range Organics (GRO)-C6-C10	15.9	J F1	997	1209		mg/Kg		120	70 - 130
Diesel Range Organics (Over C10-C28)	<15.0	U	997	1026		mg/Kg		103	70 - 130

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
1-Chlorooctane	*103*		*70 - 130*
o-Terphenyl	*90*		*70 - 130*

Lab Sample ID: 890-3429-1 MSD
Matrix: Solid
Analysis Batch: 39389

Client Sample ID: D-S
Prep Type: Total/NA
Prep Batch: 39514

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	15.9	J F1	999	1387	F1	mg/Kg		137	70 - 130	14	20
Diesel Range Organics (Over C10-C28)	<15.0	U	999	1164		mg/Kg		117	70 - 130	13	20

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
1-Chlorooctane	*115*		*70 - 130*
o-Terphenyl	*102*		*70 - 130*

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-39448/1-A
Matrix: Solid
Analysis Batch: 39641

Client Sample ID: Method Blank
Prep Type: Soluble

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<0.395	U	5.00	0.395	mg/Kg			11/15/22 17:25	1

Lab Sample ID: LCS 880-39448/2-A
Matrix: Solid
Analysis Batch: 39641

Client Sample ID: Lab Control Sample
Prep Type: Soluble

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Chloride	250	259.6		mg/Kg		104	90 - 110

Lab Sample ID: LCSD 880-39448/3-A
Matrix: Solid
Analysis Batch: 39641

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	266.9		mg/Kg		107	90 - 110	3	20

QC Sample Results

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: 890-3429-1 MS
Matrix: Solid
Analysis Batch: 39641

Client Sample ID: D-S
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits		
Chloride	52.7		253	300.0		mg/Kg		98	90 - 110		

Lab Sample ID: 890-3429-1 MSD
Matrix: Solid
Analysis Batch: 39641

Client Sample ID: D-S
Prep Type: Soluble

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Chloride	52.7		253	308.0		mg/Kg		101	90 - 110	3	20

QC Association Summary

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

GC VOA

Prep Batch: 39696

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-39696/5-A	Method Blank	Total/NA	Solid	5035	

Prep Batch: 39722

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-1	D-S	Total/NA	Solid	5035	
890-3429-2	D-N	Total/NA	Solid	5035	
890-3429-3	D-W	Total/NA	Solid	5035	
890-3429-4	D-E	Total/NA	Solid	5035	
MB 880-39722/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-39722/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-39722/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	

Analysis Batch: 39930

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-1	D-S	Total/NA	Solid	8021B	39722
890-3429-2	D-N	Total/NA	Solid	8021B	39722
890-3429-3	D-W	Total/NA	Solid	8021B	39722
890-3429-4	D-E	Total/NA	Solid	8021B	39722
MB 880-39696/5-A	Method Blank	Total/NA	Solid	8021B	39696
MB 880-39722/5-A	Method Blank	Total/NA	Solid	8021B	39722
LCS 880-39722/1-A	Lab Control Sample	Total/NA	Solid	8021B	39722
LCSD 880-39722/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	39722

Analysis Batch: 40148

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-1	D-S	Total/NA	Solid	Total BTEX	
890-3429-2	D-N	Total/NA	Solid	Total BTEX	
890-3429-3	D-W	Total/NA	Solid	Total BTEX	
890-3429-4	D-E	Total/NA	Solid	Total BTEX	

GC Semi VOA

Analysis Batch: 39385

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-4	D-E	Total/NA	Solid	8015B NM	39418
MB 880-39418/1-A	Method Blank	Total/NA	Solid	8015B NM	39418
LCS 880-39418/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	39418
LCSD 880-39418/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	39418

Analysis Batch: 39389

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-1	D-S	Total/NA	Solid	8015B NM	39514
890-3429-2	D-N	Total/NA	Solid	8015B NM	39514
890-3429-3	D-W	Total/NA	Solid	8015B NM	39514
MB 880-39514/1-A	Method Blank	Total/NA	Solid	8015B NM	39514
LCS 880-39514/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	39514
LCSD 880-39514/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	39514
890-3429-1 MS	D-S	Total/NA	Solid	8015B NM	39514
890-3429-1 MSD	D-S	Total/NA	Solid	8015B NM	39514

QC Association Summary

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

GC Semi VOA

Prep Batch: 39418

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-4	D-E	Total/NA	Solid	8015NM Prep	
MB 880-39418/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-39418/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-39418/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	

Prep Batch: 39514

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-1	D-S	Total/NA	Solid	8015NM Prep	
890-3429-2	D-N	Total/NA	Solid	8015NM Prep	
890-3429-3	D-W	Total/NA	Solid	8015NM Prep	
MB 880-39514/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-39514/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-39514/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-3429-1 MS	D-S	Total/NA	Solid	8015NM Prep	
890-3429-1 MSD	D-S	Total/NA	Solid	8015NM Prep	

Analysis Batch: 39578

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-1	D-S	Total/NA	Solid	8015 NM	
890-3429-2	D-N	Total/NA	Solid	8015 NM	
890-3429-3	D-W	Total/NA	Solid	8015 NM	
890-3429-4	D-E	Total/NA	Solid	8015 NM	

HPLC/IC

Leach Batch: 39448

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-1	D-S	Soluble	Solid	DI Leach	
890-3429-2	D-N	Soluble	Solid	DI Leach	
890-3429-3	D-W	Soluble	Solid	DI Leach	
890-3429-4	D-E	Soluble	Solid	DI Leach	
MB 880-39448/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-39448/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-39448/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
890-3429-1 MS	D-S	Soluble	Solid	DI Leach	
890-3429-1 MSD	D-S	Soluble	Solid	DI Leach	

Analysis Batch: 39641

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-3429-1	D-S	Soluble	Solid	300.0	39448
890-3429-2	D-N	Soluble	Solid	300.0	39448
890-3429-3	D-W	Soluble	Solid	300.0	39448
890-3429-4	D-E	Soluble	Solid	300.0	39448
MB 880-39448/1-A	Method Blank	Soluble	Solid	300.0	39448
LCS 880-39448/2-A	Lab Control Sample	Soluble	Solid	300.0	39448
LCSD 880-39448/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	39448
890-3429-1 MS	D-S	Soluble	Solid	300.0	39448
890-3429-1 MSD	D-S	Soluble	Solid	300.0	39448

Lab Chronicle

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Client Sample ID: D-S
Date Collected: 11/10/22 12:15
Date Received: 11/10/22 14:30

Lab Sample ID: 890-3429-1
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			5.02 g	5 mL	39722	11/16/22 14:31	MNR	EET MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	39930	11/20/22 03:49	SM	EET MID
Total/NA	Analysis	Total BTEX		1			40148	11/21/22 18:12	SM	EET MID
Total/NA	Analysis	8015 NM		1			39578	11/15/22 09:20	AJ	EET MID
Total/NA	Prep	8015NM Prep			10.01 g	10 mL	39514	11/14/22 14:24	DM	EET MID
Total/NA	Analysis	8015B NM		1	1 uL	1 uL	39389	11/14/22 21:30	AJ	EET MID
Soluble	Leach	DI Leach			4.95 g	50 mL	39448	11/14/22 11:42	KS	EET MID
Soluble	Analysis	300.0		1			39641	11/15/22 17:46	CH	EET MID

Client Sample ID: D-N
Date Collected: 11/10/22 12:20
Date Received: 11/10/22 14:30

Lab Sample ID: 890-3429-2
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			5.03 g	5 mL	39722	11/16/22 14:31	MNR	EET MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	39930	11/20/22 04:15	SM	EET MID
Total/NA	Analysis	Total BTEX		1			40148	11/21/22 18:12	SM	EET MID
Total/NA	Analysis	8015 NM		1			39578	11/15/22 09:20	AJ	EET MID
Total/NA	Prep	8015NM Prep			10.04 g	10 mL	39514	11/14/22 14:24	DM	EET MID
Total/NA	Analysis	8015B NM		1	1 uL	1 uL	39389	11/14/22 22:34	AJ	EET MID
Soluble	Leach	DI Leach			5.04 g	50 mL	39448	11/14/22 11:42	KS	EET MID
Soluble	Analysis	300.0		1			39641	11/15/22 18:08	CH	EET MID

Client Sample ID: D-W
Date Collected: 11/10/22 12:25
Date Received: 11/10/22 14:30

Lab Sample ID: 890-3429-3
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	39722	11/16/22 14:31	MNR	EET MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	39930	11/20/22 04:41	SM	EET MID
Total/NA	Analysis	Total BTEX		1			40148	11/21/22 18:12	SM	EET MID
Total/NA	Analysis	8015 NM		1			39578	11/15/22 09:20	AJ	EET MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	39514	11/14/22 14:24	DM	EET MID
Total/NA	Analysis	8015B NM		1	1 uL	1 uL	39389	11/14/22 22:55	AJ	EET MID
Soluble	Leach	DI Leach			5.01 g	50 mL	39448	11/14/22 11:42	KS	EET MID
Soluble	Analysis	300.0		1			39641	11/15/22 18:15	CH	EET MID

Client Sample ID: D-E
Date Collected: 11/10/22 12:36
Date Received: 11/10/22 14:30

Lab Sample ID: 890-3429-4
Matrix: Solid

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	5035			5.02 g	5 mL	39722	11/16/22 14:31	MNR	EET MID
Total/NA	Analysis	8021B		1	5 mL	5 mL	39930	11/20/22 05:06	SM	EET MID
Total/NA	Analysis	Total BTEX		1			40148	11/21/22 18:12	SM	EET MID

Eurofins Carlsbad

Lab Chronicle

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Client Sample ID: D-E

Date Collected: 11/10/22 12:36
Date Received: 11/10/22 14:30

Lab Sample ID: 890-3429-4

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			39578	11/15/22 13:49	AJ	EET MID
Total/NA	Prep	8015NM Prep			10.02 g	10 mL	39418	11/14/22 10:22	DM	EET MID
Total/NA	Analysis	8015B NM		1	1 uL	1 uL	39385	11/15/22 01:14	SM	EET MID
Soluble	Leach	DI Leach			4.99 g	50 mL	39448	11/14/22 11:42	KS	EET MID
Soluble	Analysis	300.0		1			39641	11/15/22 18:22	CH	EET MID

Laboratory References:

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

Accreditation/Certification Summary

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

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	T104704400-22-25	12-19-22

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: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

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

Protocol References:

ASTM = ASTM International
EPA = US Environmental Protection Agency
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:

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

Sample Summary

Client: Talon/LPE
Project/Site: Perseus CTB

Job ID: 890-3429-1
SDG: 704001.001.01

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth
890-3429-1	D-S	Solid	11/10/22 12:15	11/10/22 14:30	0 - 6
890-3429-2	D-N	Solid	11/10/22 12:20	11/10/22 14:30	0 - 6
890-3429-3	D-W	Solid	11/10/22 12:25	11/10/22 14:30	0 - 6
890-3429-4	D-E	Solid	11/10/22 12:36	11/10/22 14:30	0 - 6

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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: _____

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Project Manager:	Chad Hensley	Bill to: (if different)	
Company Name:	~~BTA~~ TALON/LPE	Company Name:	
Address:		Address:	
City, State ZIP:		City, State ZIP:	
Phone:	575-246-8832	Email:	Chensley@TALONLPE.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:	Perseus CTB	Turn Around	
Project Number:	704001.001.01	☒ Routine ☐ Rush	
Project Location:	Chaves	Due Date:	
Sampler's Name:	Chad Hensley	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:	TLWM097	
Cooler Custody Seals:	Yes No (N/A)	Correction Factor:	-0.2	
Sample Custody Seals:	Yes No (N/A)	Temperature Reading:	11.2	
Total Containers:		Corrected Temperature:	11.0	

ANALYSIS REQUEST

Preservative Codes

None: NO | DI Water: H_2O
Cool: Cool | MeOH: Me
HCL: HC | HNO_3: HN
H_2SO_4: H_2 | NaOH: Na
H_3PO_4: HP
$NaHSO_4$: NABIS
$Na_2S_2O_3$: $NaSO_3$
Zn Acetate+NaOH: Zn
NaOH+Ascorbic Acid: SAPC

890-3429 Chain of Custody

Sample Identification	Matrix	Date Sampled	Time Sampled	Depth	Grab/ Comp	# of Cont	Parameters: Cl	BTEX	TPH	Sample Comments
D-S		11/10/22	12:15	0-6"	Comp	1	↓	↓	↓	
D-N		11/10/22	12:20	↓	↓	1				
D-W		11/10/22	12:25			1				
D-E		11/10/22	12:34			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 Tl 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 Tl U Hg: 1631 / 245.1 / 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		11.10.22 1430	2		
3			4		
5			6		

Revised Date: 08/25/2020 Rev. 2020.2

Login Sample Receipt Checklist

Client: Talon/LPE

Job Number: 890-3429-1
SDG Number: 704001.001.01

Login Number: 3429
List Number: 1
Creator: Clifton, Cloe

List Source: Eurofins Carlsbad

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
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.	N/A	Refer to Job Narrative for details.
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	

Login Sample Receipt Checklist

Client: Talon/LPE

Job Number: 890-3429-1
SDG Number: 704001.001.01

Login Number: 3429
List Number: 2
Creator: Rodriguez, Leticia

List Source: Eurofins Midland
List Creation: 11/14/22 08:39 AM

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 212328

CONDITIONS

Operator:	OGRID:
BAM Permian Operating, LLC 4416 Briarwood Ave Midland, TX 79707	328565
	Action Number: 212328
	Action Type: [C-141] Release Corrective Action (C-141)

CONDITIONS

Created By	Condition	Condition Date
nvelez	Deferral approved under the following conditions; 1. Remediation has met rule requirements. Impacts above the reclamation standards has been left in place and is required to be addressed once site is no longer reasonably needed for production or drilling ops. 2. Remediation Due date left open until the well site is decommissioned or plugged and abandoned.	8/18/2023