

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	nAPP2111044488
District RP	
Facility ID	
Application ID	

Release Notification

Responsible Party

Responsible Party EOG Resources, Inc.	OGRID 7377
Contact Name Chase Settle	Contact Telephone 575-748-1471
Contact email Chase_Settle@eogresources.com	Incident # (assigned by OCD)
Contact mailing address 104 S. 4th Street, Artesia, NM 88210	

Location of Release Source

Latitude 32.85807 Longitude -103.93198
(NAD 83 in decimal degrees to 5 decimal places)

Site Name Jackson B #17	Site Type Well
Date Release Discovered 04/19/2021	API# (if applicable) 30-015-04039

Unit Letter	Section	Township	Range	County
M	1	17S	30E	Eddy

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

Nature and Volume of Release

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

<input checked="" type="checkbox"/> Crude Oil	Volume Released (bbls) Unknown	Volume Recovered (bbls) 0
<input type="checkbox"/> Produced Water	Volume Released (bbls)	Volume Recovered (bbls)
	Is the concentration of dissolved chloride in the produced water >10,000 mg/l?	<input type="checkbox"/> Yes <input type="checkbox"/> No
<input type="checkbox"/> Condensate	Volume Released (bbls)	Volume Recovered (bbls)
<input type="checkbox"/> Natural Gas	Volume Released (Mcf)	Volume Recovered (Mcf)
<input type="checkbox"/> Other (describe)	Volume/Weight Released (provide units)	Volume/Weight Recovered (provide units)

Cause of Release

Historical impacts discovered during the P&A of the well. Release volume and date are unknown.

Incident ID	
District RP	
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Was this a major release as defined by 19.15.29.7(A) NMAC? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> 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

<input checked="" type="checkbox"/> The source of the release has been stopped. <input checked="" type="checkbox"/> The impacted area has been secured to protect human health and the environment. <input checked="" type="checkbox"/> Released materials have been contained via the use of berms or dikes, absorbent pads, or other containment devices. <input checked="" type="checkbox"/> All free liquids and recoverable materials have been removed and managed appropriately.	
If all the actions described above have <u>not</u> been undertaken, explain why:	
Per 19.15.29.8 B. (4) NMAC the responsible party may commence remediation immediately after discovery of a release. If remediation has begun, please attach a narrative of actions to date. If remedial efforts have been successfully completed or if the release occurred within a lined containment area (see 19.15.29.11(A)(5)(a) NMAC), please attach all information needed for closure evaluation.	
I hereby certify that the information given above is true and complete to the best of my knowledge and understand that pursuant to OCD rules and regulations all operators are required to report and/or file certain release notifications and perform corrective actions for releases which may endanger public health or the environment. The acceptance of a C-141 report by the OCD does not relieve the operator of liability should their operations have failed to adequately investigate and remediate contamination that pose a threat to groundwater, surface water, human health or the environment. In addition, OCD acceptance of a C-141 report does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations.	
Printed Name: <u>Chase Settle</u>	Title: <u>Rep Safety & Environmental Sr</u>
Signature: <u></u>	Date: <u>04/19/2021</u>
email: <u>Chase_Settle@eogresources.com</u>	Telephone: <u>575-748-1471</u>
<u>OCD Only</u>	
Received by: _____	Date: _____

Incident ID	nAPP211104488
District RP	
Facility ID	
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?	>100 (ft bgs)
Did this release impact groundwater or surface water?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 300 feet of a continuously flowing watercourse or any other significant watercourse?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark)?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 300 feet of an occupied permanent residence, school, hospital, institution, or church?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 500 horizontal feet of a spring or a private domestic fresh water well used by less than five households for domestic or stock watering purposes?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 1000 feet of any other fresh water well or spring?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within incorporated municipal boundaries or within a defined municipal fresh water well field?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 300 feet of a wetland?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release overlying a subsurface mine?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release overlying an unstable area such as karst geology?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within a 100-year floodplain?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Did the release impact areas not on an exploration, development, production, or storage site?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

Attach a comprehensive report (electronic submittals in .pdf format are preferred) demonstrating the lateral and vertical extents of soil contamination associated with the release have been determined. Refer to 19.15.29.11 NMAC for specifics.

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.

State of New Mexico
Oil Conservation Division

Page 4

Incident ID	nAPP2111044488
District RP	
Facility ID	
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: Chase Settle Title: Rep Safety & Environmental Sr
Signature:  Date: 08/31/2021
email: Chase_Settle@eogresources.com Telephone: 575-748-1471

OCD Only

Received by: _____ Date: _____

Incident ID	nAPP2111044488
District RP	
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Closure

The responsible party must attach information demonstrating they have complied with all applicable closure requirements and any conditions or directives of the OCD. This demonstration should be in the form of a comprehensive report (electronic submittals in .pdf format are preferred) including a scaled site map, sampling diagrams, relevant field notes, photographs of any excavation prior to backfilling, laboratory data including chain of custody documents of final sampling, and a narrative of the remedial activities. Refer to 19.15.29.12 NMAC.

Closure Report Attachment Checklist: *Each of the following items must be included in the closure report.*

- ☒ A scaled site and sampling diagram as described in 19.15.29.11 NMAC
- ☒ Photographs of the remediated site prior to backfill or photos of the liner integrity if applicable (Note: appropriate OCD District office must be notified 2 days prior to liner inspection)
- ☒ Laboratory analyses of final sampling (Note: appropriate ODC District office must be notified 2 days prior to final sampling)
- ☒ Description of remediation activities

I hereby certify that the information given above is true and complete to the best of my knowledge and understand that pursuant to OCD rules and regulations all operators are required to report and/or file certain release notifications and perform corrective actions for releases which may endanger public health or the environment. The acceptance of a C-141 report by the OCD does not relieve the operator of liability should their operations have failed to adequately investigate and remediate contamination that pose a threat to groundwater, surface water, human health or the environment. In addition, OCD acceptance of a C-141 report does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations. The responsible party acknowledges they must substantially restore, reclaim, and re-vegetate the impacted surface area to the conditions that existed prior to the release or their final land use in accordance with 19.15.29.13 NMAC including notification to the OCD when reclamation and re-vegetation are complete.

Printed Name: Chase Settle Title: Rep Safety & Environmental Sr
Signature: Chase Settle Date: 06/19/2023
email: Chase_Settle@eogresources.com Telephone: 575-748-1471

OCD Only

Received by: _____ Date: _____

Closure approval by the OCD does not relieve the responsible party of liability should their operations have failed to adequately investigate and remediate contamination that poses a threat to groundwater, surface water, human health, or the environment nor does not relieve the responsible party of compliance with any other federal, state, or local laws and/or regulations.

Closure Approved by: Shelly Wells Date: 11/17/2023
Printed Name: Shelly Wells Title: Environmental Specialist-Advanced

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

Our ref: 11228313-LTR-2

June 07, 2023

New Mexico Oil Conservation Division
District 2
811 South First Street
Artesia, New Mexico 88210

Site Closure Report
Jackson B #17 Wellhead Release Site
EOG Resources Inc.
Incident ID: nAPP2111044488
M-01-17S-30E, Eddy County, New Mexico

To Whom It May Concern:

1. Introduction

GHD Services Inc. (GHD), on behalf of EOG Resources (EOG), submits this Site Closure Report to the New Mexico Oil Conservation Division (NMOCD) District 2 Office. This Report provides documentation of remedial activities and analyses conducted at the EOG Jackson B #17 Wellhead Release Site (Site). The Site is located in Unit Letter M Section 01 of Township 17 South and Range 30 East in Eddy County, New Mexico. The GPS coordinates for the release site are 32.85807 N latitude and 103.93198 W longitude. The release occurred on land managed by the Bureau of Land Management (BLM). Figure 1 depicts the Site location. The EOG production facility and other site details are depicted on Figure 2, Site Details Map.

2. Regulatory Information

A C-141 initial report for this release was submitted to the NMOCD on April 19, 2021. The C-141 stated that no known volume or date could be assigned to this historical release. The potential release area was discovered during EOG well plugging and site abandonment activities associated with this location. Soils within the former oil well appeared to be discolored and after discussions between field personnel and environmental staff EOG made the decision to file a C-141 for this suspect release location.

The release falls under the jurisdiction of the NMOCD District 2 Office in Artesia, New Mexico. The NMOCD assigned the release with Incident Number nAPP2111044488. The Initial Form C-141 Release Notification, Site Assessment/ Characterization, Remediation, and Closure portions of Form C-141 are attached to the front of this report.

3. Groundwater and Site Characterization

GHD characterized the Site according to Table I, Closure Criteria for Soils Impacted by a Release, from New Mexico Administrative Code (NMAC) Title 19, Chapter 15, Part 29, Section 12 (NMAC 19.15.29.12). The release falls under the jurisdiction of the NMOCD District 2 in Artesia, New Mexico. Details of the characterization can be found in the previously submitted Site Characterization and Remediation Work Plan dated August 27, 2021.

On May 18, 2021, Talon LPE (Talon) installed a temporary well, Jackson B #59, at GPS Coordinates, 32.85697 N latitude and 103.92703 W longitude to approximately 125 feet below ground surface (bgs.) which is located approximately 0.5 miles from the Site. The Jackson B #59 Temp Well was left open for 72 hours and a water level meter was utilized to determine the presence or absence of groundwater. No groundwater was detected and the temporary well was plugged and abandoned. Depth to groundwater for this Site is greater than 100 feet bgs. No other receptors (karst potential areas, water wells, playas, wetlands, waterways, lakebeds or ordinance boundaries) were located within each specific boundaries or distance from the Site. According to the Site characterization evaluation and 19.15.29.12.C(4)(a)(i), the Site is located within an area with depth to groundwater greater than 100 feet and meets the closure criteria for depth to groundwater greater than 100 feet in Table I in NMAC 19.15.29.12. The Site characterization documentation (Talon's Temporary Well Log, Karst Potential, FEMA, Points of Diversion and Wetlands maps) are provided in Attachment 1. The soil and closure criteria are listed below:

General Site Characterization and Groundwater:

Site Characterization	Average Groundwater Depth (feet)
No Receptors Found	>100'

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

Regulatory Standard	Benzene	BTEX	TPH (GRO+MRO)	TPH (GRO+DRO+MRO)	Chloride
19.15.29.13 Restoration, Reclamation and Re-Vegetation (Impacted Area 0-4 Feet)	10 mg/kg	50 mg/kg	---	100 mg/kg	600 mg/kg
19.15.29.12 NMAC Table I Closure Criteria for Soils Impacted by a Release	10 mg/kg	50 mg/kg	1,000 mg/kg	2,500 mg/kg	20,000 mg/kg

Notes: --- = not defined

4. Soil Delineation and Remedial Excavation Summary

Details of initial soil delineation and remedial excavation activities are provided in the Amended Site Remediation Work Plan submitted March 23, 2023 to NMOCD. Initial soil sampling activities took place on May 24 and 25, 2021. On July 22, 2021, GHD and Talon mobilized to the Site to install a soil boring to fully delineate the release. Due to the initial soil sampling activities exhibiting benzene, toluene, ethylbenzene, xylene (BTEX), total petroleum hydrocarbons (TPH), and chloride concentrations above Table I closure criteria values, GHD and Standard Safety and Supply (SS) mobilized to the Site on February 9, 2022, to excavate the affected soils. Excavation activities continued through April 6, 2022, and the extents were modified based off ongoing analytical sample results. The area containing affected soil totaled approximately 2,802 square feet

and was excavated to depths ranging from approximately four to 30 feet bgs. Two of the final confirmation samples exhibited TPH concentrations above Table 1 closure criteria (BH-17B and BH-18B). As outlined in the originally proposed Amended Site Remediation Work plan, dated April 21, 2022, bioremediation through microbial injections was selected to remediate those exceeded areas.

5. Initial Residual Soil Remediation Activities and Confirmation Sampling

EOG selected GHD to provide drilling oversight and management of the treatment well installation activities and subsequent bioremediation activities. Installation of the treatment wells was conducted on April 20, 2022 and April 28, 2022. Two soil treatment wells SB-1 and SB-2 were installed within the affected area to assist with the bioremediation and venting of the hydrocarbon impacts below 30 feet bgs.

One treatment well was installed for every 100 square feet of impacted area to be remediated. The wells consisted of 2-inch pvc pipe with slotted well screen installed for the last 5-10 feet of the well, well depth was staggered to ensure the microbial product used to increase bioremediation made contact with all areas that required treatment. Following the completion of the bioremediation well installation activities, soil treatment activities were initiated. The product utilized for treatment was Rigby Taylor (RT) Remediate, which is a concentrated solution of bacteria and microorganisms used to bioremediate hydrocarbons in soils. The RT Remediate was absorbed into the surrounding soils, allowing for the digestion of organics and the breakdown of the hydrocarbons. The RT Remediate was injected into the wells every 2 weeks for approximately 12 weeks, totalling six separate treatments. Each well was injected with 37 gallons of solution for each treatment event. A total of 444 gallons of solution and 4,440 gallons of water was injected for the entire treatment period. The first treatment was completed the week of August 22, 2022, and the final treatment was completed the week of October 31, 2022.

On November 10, 2022, GHD and HCI Drilling advanced two confirmation soil borings (CB-1 and CB-2) for the purpose of collecting confirmation soil samples within the treatment areas. This consisted of performing one sample boring per 200 square feet, with samples collected at 5-foot intervals beginning at 28 feet bgs to a depth of 35 feet bgs. All confirmation soil samples were analyzed for BTEX by EPA Method 8021B, TPH by EPA Method 8015B Modified, and chloride by EPA Method 300 by Hall Environmental Analysis Laboratory, Inc. in Albuquerque, New Mexico. One of the two soil borings (CB-1) had samples exceeding applicable Table I closure criteria for TPH GRO/DRO and Total TPH for groundwater greater than 100 feet.

Figure 2, Site Details Map, depicts the locations of the confirmation boring samples. The CB-1 and CB-2 soil boring logs are provided as Attachment 2. Analytical results are provided in Table 1 and on Figure 3.

6. Final residual Soil Remediation Activities and Confirmation Sampling

Following confirmation soil sampling activities completed in November 2022, it was determined that additional microbial injections were necessary to remediate soils. The RT Remediate microbial strain was injected into the wells every 3 weeks for approximately 18 weeks, totalling six separate treatment events. Each well was injected with approximately 37 gallons of solution for each treatment event. A total of 444 gallons of solution and 4,440 gallons of water was injected for the entire treatment period. The first treatment was completed the week of December 12, 2022, and the final treatment was completed the week of March 27, 2023.

On April 19, 2023, GHD and HCI Drilling advanced two confirmation soil borings (CB-1A and CB-2A) for the purpose of collecting confirmation soil samples within the treatment areas. This consisted of performing one sampling boring per 200 square feet, with samples collected at 5-foot intervals beginning at 29 feet bgs to a depth of 35 feet bgs. All confirmation samples were analyzed for BTEX by EPA Method 8021B, TPH by EPA Method 8015B Modified, and chloride by EPA Method 300 by Envirotech Inc. in Farmington, New Mexico. All samples were below Table 1 closure criteria for TPH GRO/DRO and Total TPH for groundwater greater than 100 feet.

Figure 2, Site Details Map, depicts the locations of the confirmation boring samples. The CB-1A and CB-2A soil boring logs are provided as Attachment 2. Analytical results are provided in Table 1, on Figure 3, and in the Laboratory Analytical Reports provided in Attachment 3.

7. nAPP2111044488 Closure Request

Site characterization, soil delineation, and remediation activities for Incident nAPP2111044488 have been performed in accordance with applicable NMOCD guidance and regulations. Based upon supporting documentation provided in this report, GHD, on behalf of EOG, respectfully requests closure of nAPP2111044488.

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

Regards,



Moshghan Mansoori
Senior Project Manager

+1 817 690 0204
moshghan.mansoori@ghd.com



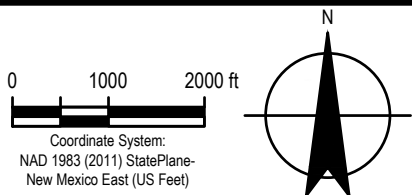
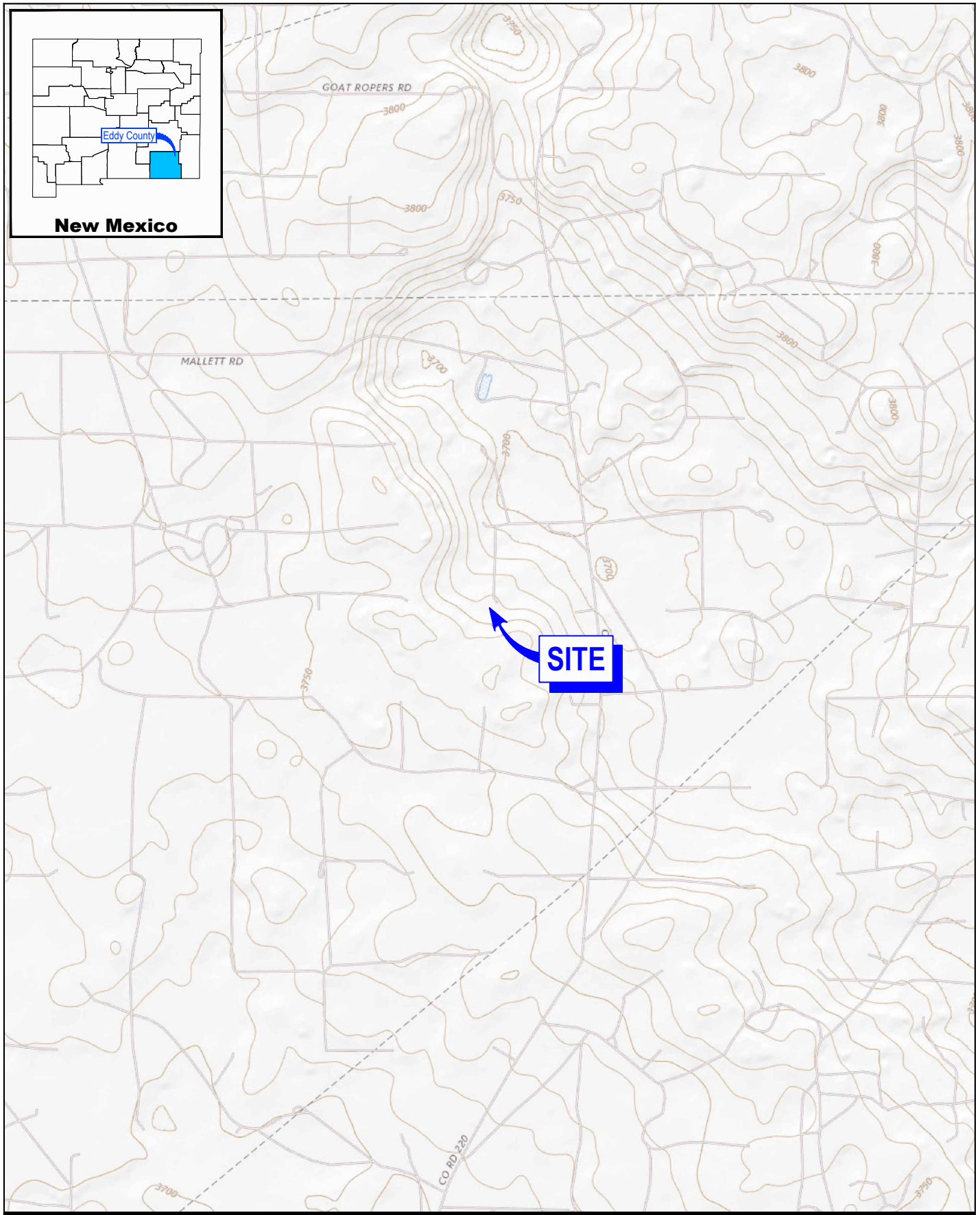
J.T. Murrey
Project Director

+1 361 252-6136
jt.murrey@ghd.com

NR/mk

Encl. Figure 1 – Site Location Map
 Figure 2 – Site Details Map
 Figure 3 – Confirmation Soil Analytical
 Table 1 – Summary of Soil Analytical Data
 Attachment 1 – Site Characterization Documentation
 Attachment 2 – Boring Completion Logs
 Attachment 3 – Laboratory Analytical Reports and Chain-of-Custody Documentation

cc: Chase Settle/Amber Griffin

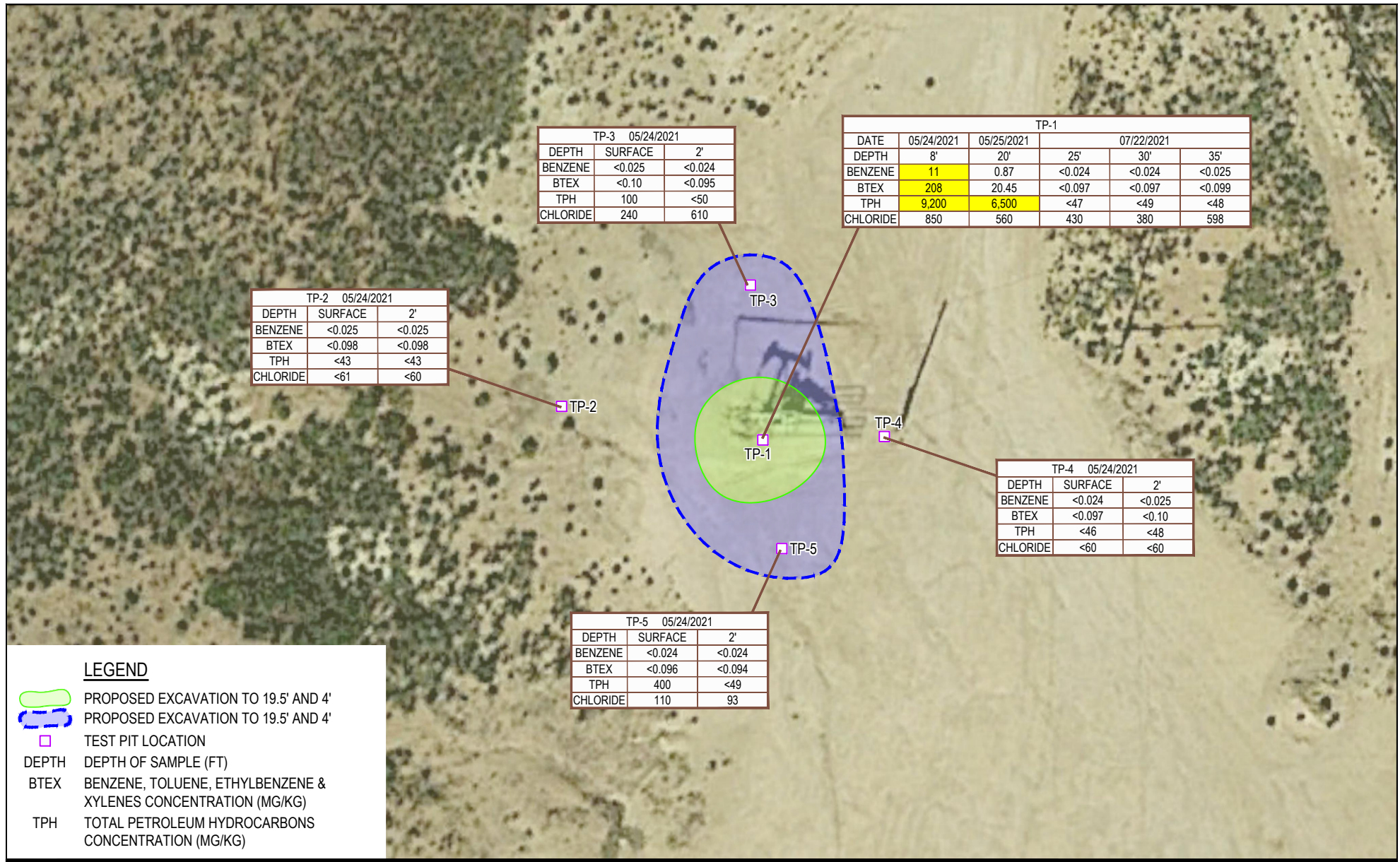


EOG RESOURCES
EDDY COUNTY, NEW MEXICO
JACKSON B #17 WELLHEAD

Project No. 11228313
Date May 2023

SITE LOCATION MAP

FIGURE 1

**NOTES:**

1. RESULTS IN MILLIGRAMS PER KILOGRAM (MG/KG).
2. SEE TABLE 1 FOR FULL ANALYTICAL RESULTS/DETAILS.
3. YELLOW SHADED CELLS INDICATE EXCEEDANCE.



EOG RESOURCES
EDDY COUNTY, NEW MEXICO
JACKSON B #17 WELLHEAD

Project No. 11228313
Date May 2023

**SITE ASSESSMENT:
SOIL ANALYTICAL RESULTS MAP**

FIGURE 2

Sample ID	Sample Date	Depth (ft bgs)	Benzene	BTEX	Total Petroleum Hydrocarbons (TPH)		Chloride
			mg/kg	mg/kg	Total GRO/DRO/MRO		
					mg/kg		
					mg/kg		
Table 1 Closure Criteria for Soils >100 feet Depth to Groundwater 19.15.29 NMAC							
			10 mg/kg	50 mg/kg	2,500 mg/kg	20,000 mg/kg	
Initial Assessment Samples							
TP1-8	5/24/21	8	11	208	9,200	850	
TP1-20	5/25/21	20	0.87	20.45	6,500	560	
TP1-25	7/22/21	25	<0.024	<0.097	<47	430	
TP1-30	7/22/21	30	<0.024	<0.097	<49	380	
TP1-35	7/22/21	35	<0.025	<0.099	<48	598	
TP2-S	5/24/21	Surface	<0.025	<0.098	<43	<61	
TP2-2	5/24/21	2	<0.025	<0.098	<43	<60	
TP3-S	5/24/21	Surface	<0.025	<0.10	100	240	
TP3-2	5/24/21	2	<0.024	<0.095	<50	610	
TP4-S	5/24/21	Surface	<0.024	<0.097	<46	<60	
TP4-2	5/24/21	2	<0.025	<0.10	<48	<60	
TP5-S	5/24/21	Surface	<0.024	<0.096	400	110	
TP5-2	5/24/21	2	<0.024	<0.094	<49	93	
Sidewall Confirmation Samples							
SW-1	2/15/22	Sidewall	<0.024	<0.097	138	240	
SW-2	2/15/22	Sidewall	<0.025	<0.098	85	<60	
SW-3	2/15/22	Sidewall	<0.023	<0.094	109	130	
SW-4	2/15/22	Sidewall	<0.024	<0.096	<48	<60	
SW-5	2/15/22	Sidewall	<0.025	<0.099	458	90	
SW-6	2/15/22	Sidewall	<0.025	<0.099	<48	570	
SW-7	2/15/22	Sidewall	<0.024	<0.095	<44	110	
SW-8	2/15/22	Sidewall	<0.025	<0.10	<47	390	
SW-9	2/15/22	Sidewall	<0.11	<0.45	1470	3100	
SW-10	2/15/22	Sidewall	<0.024	<0.098	<46	760	
SW-11	2/15/22	Sidewall	<0.023	<0.094	<49	1000	
SW-12	2/15/22	Sidewall	<0.024	<0.098	<47	720	
SW-13	2/15/22	Sidewall	<0.024	<0.096	<50	420	
SW-14	2/15/22	Sidewall	<0.024	<0.097	<44	370	
SW-15	2/15/22	Sidewall	<0.12	<0.47	1040	660	
SW-16	2/15/22	Sidewall	<0.025	<0.098	<46	660	
SW-N-21'-27'	3/15/22	Sidewall	<0.023	<0.094	<50	240	
SW-S-21'-30'	3/15/22	Sidewall	<0.12	0.45	4,056	830	
SW-S-21'-30'	4/6/22	Sidewall	<0.050	<0.300	124.2	976	
SW-E-21'-30'	3/15/22	Sidewall	<0.12	<0.49	4,490	860	
SW-E-21'-30'	4/6/22	Sidewall	<0.050	<0.300	<10.0	432	
SW-W-21'-27'	3/15/22	Sidewall	<0.025	<0.10	<48	740	
Bottom Hole Confirmation Samples							
BH-1	2/16/22	4	<0.024	<0.094	<50	690	
BH-2	2/16/22	4	<0.12	<0.49	440	480	
BH-3	2/16/22	4	<0.024	<0.098	196	<60	
BH-4	2/16/22	4	<0.024	<0.097	<50	<60	
BH-5	2/16/22	4	<0.025	<0.098	<49	<60	
BH-6	2/16/22	4	<0.024	<0.097	84	240	
BH-7	2/16/22	4	<0.023	<0.094	<49	5,200	
BH-8	2/16/22	4	<0.024	<0.095	<50	2,100	
BH-9	2/16/22	4	<0.024	<0.096	<49	720	
BH-10	2/16/22	4	<0.025	<0.098	<50	220	
BH-11	2/16/22	4	<0.024	<0.097	<49	440	
BH-12	2/16/22	9	<0.025	<0.099	<49	270	
BH-13	2/16/22	9	<0.024	<0.098	<50	390	
BH-14	2/16/22	9	<0.025	<0.10	<50	1,200	
BH-15	2/16/22	15	<0.025	<0.099	<49	410	
BH-16	2/16/22	15	<0.024	<0.099	<49	560	
BH-17	2/15/22	24	<0.12	1.00	7,558	750	
BH-22-17	3/15/22	22	<0.082	0.48	3,748	940	
BH-25-17	3/15/22	25	<0.11	4.0	9,150	780	
BH-27-17	3/15/22	27	<0.12	1.4	0,600	620	
BH-17B	4/6/22	30	0.210	3.72	5,027	928	
BH-18	2/15/22	24	<0.024	0.33	4,935	860	
BH-22-18	3/15/22	22	<0.080	0.20	4,320	780	
BH-25-18	3/15/22	25	<0.12	4.3	9,570	880	
BH-27-18	3/15/22	27	<0.12	1.4	9,740	840	
BH-18B	4/6/22	30	0.105	5.75	5,015	1,010	
Ramp-1	2/16/22	-	<0.025	<0.099	<48	670	
Ramp-2	2/16/22	-	<0.025	<0.098	<47	520	
Ramp-3	2/16/22	-	<0.024	<0.092	<50	1,060	
Ramp-3A	3/15/22	-	<0.017	<0.069	<47	120	
Soil Boring Samples							
SB-1 (35')	4/26/22	35	<0.12	<0.50	<49	2,200	
SB-1 (40')	4/26/22	40	<0.025	<0.10	<47	950	
SB-2 (35')	4/28/22	35	<0.12	<0.48	600	400	
SB-2 (40')	4/28/22	40	<0.12	<0.50	620	270	
SB-2 (45')	4/28/22	45	<0.024	<0.094	<47	1,400	
Confirmation Soil Samples							
CB-1 (30')	11/10/22	30	<0.024	<0.10	880	98	
CB-1 (35')	11/10/22	35	<0.025	<0.10	3800	180	
CB-2 (30')	11/10/22	30	<0.025	<0.10	<48	340	
CB-2 (35')	11/10/22	35	<0.025	<0.10	<48	490	
CB-1A (30')	4/19/23	30	<0.025	<0.025	<50	440	
CB-1A (35')	4/19/23	35	<0.025	<0.025	<50	253	
CB-2A (30')	4/19/23	30	<0.025	<0.025	516	87	
CB-2A (35')	4/19/23	35	<0.025	<0.025	30.9	122	

LEGEND

EXCAVATED AREA

DEPTH

DEPTH OF SAMPLE (FT)

BTEX

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

TPH

TOTAL PETROLEUM HYDROCARBONS CONCENTRATION (MG/KG)

INDICATES SIDE WALL COMPOSITE SAMPLE

INDICATES SIDE WALL COMPOSITE SAMPLE

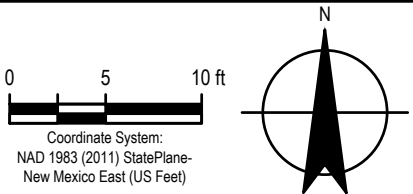
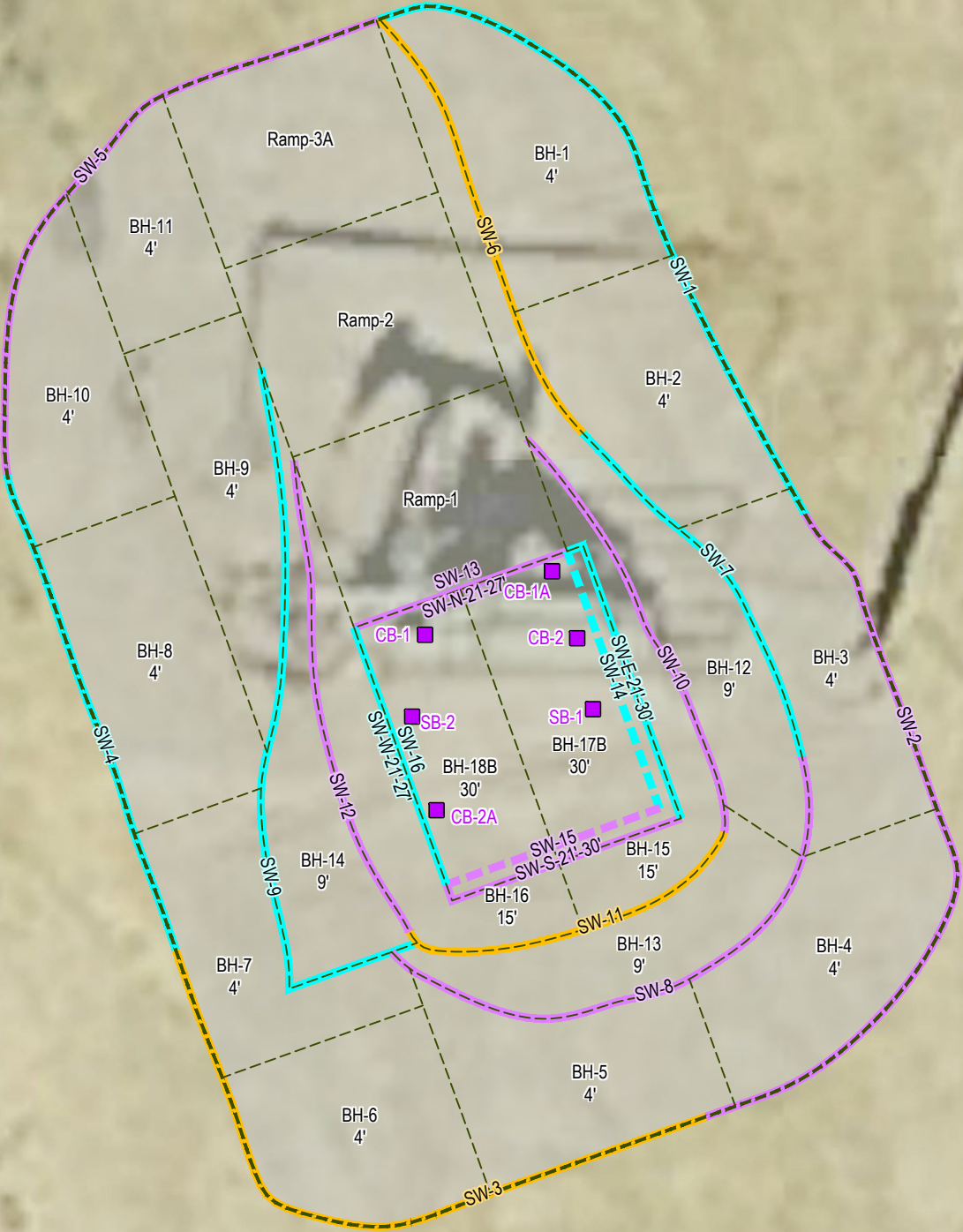
INDICATES SIDE WALL COMPOSITE SAMPLE

SAMPLE POINT EXCAVATED

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

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

3. YELLOW SHADED CELLS INDICATE EXCEEDANCE.



EOG RESOURCES
EDDY COUNTY, NEW MEXICO
JACKSON B #17 WELLHEAD

CONFIRMATION SAMPLING:
SOIL ANALYTICAL RESULTS MAP

Project No. 11228313
Date May 2023

FIGURE 3

Table 1
Summary of Soil Analytical Data
Jackson B #17 Wellhead
EOG Resources
Eddy County, New Mexico

Sample ID	Sample Date	Depth (ft bgs)	Benzene	Toluene	Ethylbenzene	Xylenes	BTEX	Total Petroleum Hydrocarbons (TPH)				Chloride
								GRO (C6-C10)	DRO (C10-C28)	MRO (C28-C35)	Total GRO/DRO/MRO	
			mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
			Table I Closure Criteria for Soils >100 feet Depth to Groundwater 19.15.29 NMAC									
10 mg/kg	---	---	---	50 mg/kg	1,000 mg/kg		---	2,500 mg/kg	20,000 mg/kg			
Initial Assessment Samples												
TP1-8	5/24/21	8	11	58	63	76	208	1,600	3,200	4,400	9,200	850
TP1-20	5/25/21	20	0.87	0.38	10	9.2	20.45	570	3,500	2,500	6,500	560
TP1-25	7/22/21	25	<0.024	<0.048	<0.048	<0.097	<0.097	<4.8	<9.4	<47	<47	430
TP1-30	7/22/21	30	<0.024	<0.048	<0.048	<0.097	<0.097	<4.8	<9.8	<49	<49	380
TP1-35	7/22/21	35	<0.025	<0.050	<0.050	<0.099	<0.099	<5.0	<9.7	<48	<48	598
TP2-S	5/24/21	Surface	<0.025	<0.049	<0.049	<0.098	<0.098	<4.9	<8.5	<43	<43	<61
TP2-2	5/24/21	2	<0.025	<0.049	<0.049	<0.098	<0.098	<4.9	<8.6	<43	<43	<60
TP3-S	5/24/21	Surface	<0.025	<0.050	<0.050	<0.10	<0.10	<5.0	<8.6	100	100	240
TP3-2	5/24/21	2	<0.024	<0.048	<0.048	<0.095	<0.095	<4.8	<10	<50	<50	610
TP4-S	5/24/21	Surface	<0.024	<0.049	<0.049	<0.097	<0.097	<4.9	<9.2	<46	<46	<60
TP4-2	5/24/21	2	<0.025	<0.050	<0.050	<0.10	<0.10	<5.0	<9.7	<48	<48	<60
TP5-S	5/24/21	Surface	<0.024	<0.048	<0.048	<0.096	<0.096	<4.8	170	230	400	110
TP5-2	5/24/21	2	<0.024	<0.047	<0.047	<0.094	<0.094	<4.7	<9.7	<49	<49	93
Sidewall Confirmation Samples												
SW-1	2/15/22	Sidewall	<0.024	<0.048	<0.048	<0.097	<0.097	<4.8	54	84	138	240
SW-2	2/15/22	Sidewall	<0.025	<0.049	<0.049	<0.098	<0.098	<4.9	14	71	85	<60
SW-3	2/15/22	Sidewall	<0.023	<0.047	<0.047	<0.094	<0.094	<4.7	11	98	109	130
SW-4	2/15/22	Sidewall	<0.024	<0.048	<0.048	<0.096	<0.096	<4.8	<9.6	<48	<48	<60
SW-5	2/15/22	Sidewall	<0.025	<0.049	<0.049	<0.099	<0.099	<4.9	78	380	458	90
SW-6	2/15/22	Sidewall	<0.025	<0.050	<0.050	<0.099	<0.099	<5.0	<9.7	<48	<48	570
SW-7	2/15/22	Sidewall	<0.024	<0.048	<0.048	<0.095	<0.095	<4.8	<8.8	<44	<44	110
SW-8	2/15/22	Sidewall	<0.025	<0.050	<0.050	<0.10	<0.10	<5.0	<9.5	<47	<47	390
SW-9	2/15/22	Sidewall	<0.11	<0.23	<0.23	<0.46	<0.45	<23	870	600	1470	3100
SW-10	2/15/22	Sidewall	<0.024	<0.049	<0.049	<0.098	<0.098	<4.9	<9.2	<46	<46	760
SW-11	2/15/22	Sidewall	<0.023	<0.047	<0.047	<0.094	<0.094	<4.7	<9.9	<49	<49	1000
SW-12	2/15/22	Sidewall	<0.024	<0.049	<0.049	<0.098	<0.098	<4.9	<9.5	<47	<47	720
SW-13	2/15/22	Sidewall	<0.024	<0.048	<0.048	<0.096	<0.096	<4.8	<10	<50	<50	420
SW-14	2/15/22	Sidewall	<0.024	<0.049	<0.049	<0.097	<0.097	<4.9	<8.9	<44	<44	370
SW-15	2/15/22	Sidewall	<0.12	<0.24	<0.24	<0.47	<0.47	<24	790	250	1040	660
SW-16	2/15/22	Sidewall	<0.025	<0.049	<0.049	<0.098	<0.098	<4.9	<9.3	<46	<46	660
SW-N-21'-27'	3/15/22	Sidewall	<0.023	<0.047	<0.047	<0.094	<0.094	<4.7	<10	<50	<50	240
SW-S-21'-27'	3/15/22	Sidewall	<0.12	<0.24	0.45	<0.47	0.45	56	2,600	1,400	4,056	830
SW-S-21'-30'	4/6/22	Sidewall	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	107	17.2	124.2	976
SW-E-21'-27'	3/15/22	Sidewall	<0.12	<0.24	<0.24	<0.49	<0.49	<24	3,300	1,100	4,400	800
SW-E-21'-30'	4/6/22	Sidewall	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	432
SW-W-21'-27'	3/15/22	Sidewall	<0.025	<0.050	<0.050	<0.10	<0.10	<5.0	<9.6	<48	<48	740

Table 1
Summary of Soil Analytical Data
Jackson B #17 Wellhead
EOG Resources
Eddy County, New Mexico

Sample ID	Sample Date	Depth (ft bgs)	Benzene	Toluene	Ethylbenzene	Xylenes	BTEX	Total Petroleum Hydrocarbons (TPH)				Chloride
								GRO (C6-C10)	DRO (C10-C28)	MRO (C28-C35)	Total GRO/DRO/MRO	
			mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
			Table I Closure Criteria for Soils >100 feet Depth to Groundwater 19.15.29 NMAC									
10 mg/kg	---	---	---	50 mg/kg	1,000 mg/kg		---	2,500 mg/kg	20,000 mg/kg			
Bottom Hole Confirmation Samples												
BH-1	2/16/22	4	<0.024	<0.047	<0.047	<0.094	<0.094	<4.7	<10	<50	<50	690
BH-2	2/16/22	4	<0.12	<0.25	<0.25	<0.49	<0.49	<25	280	160	440	480
BH-3	2/16/22	4	<0.024	<0.049	<0.049	<0.098	<0.098	<4.9	56	140	196	<60
BH-4	2/16/22	4	<0.024	<0.048	<0.048	<0.097	<0.097	<4.8	<10	<50	<50	<60
BH-5	2/16/22	4	<0.025	<0.049	<0.049	<0.098	<0.098	<4.9	<9.7	<49	<49	<60
BH-6	2/16/22	4	<0.024	<0.049	<0.049	<0.097	<0.097	<4.9	12	72	84	240
BH-7	2/16/22	4	<0.023	<0.047	<0.047	<0.094	<0.094	<4.7	<9.9	<49	<49	5,200
BH-8	2/16/22	4	<0.024	<0.048	<0.048	<0.095	<0.095	<4.8	<9.9	<50	<50	2,100
BH-9	2/16/22	4	<0.024	<0.048	<0.048	<0.096	<0.096	<4.8	<9.7	<49	<49	720
BH-10	2/16/22	4	<0.025	<0.049	<0.049	<0.098	<0.098	<4.9	<10	<50	<50	220
BH-11	2/16/22	4	<0.024	<0.049	<0.049	<0.097	<0.097	<4.9	<9.9	<49	<49	440
BH-12	2/16/22	9	<0.025	<0.050	<0.050	<0.099	<0.099	<5.0	<9.9	<49	<49	270
BH-13	2/16/22	9	<0.024	<0.049	<0.049	<0.098	<0.098	<4.9	<10	<50	<50	390
BH-14	2/16/22	9	<0.025	<0.050	<0.050	<0.10	<0.10	<5.0	<10	<50	<50	1,200
BH-15	2/16/22	15	<0.025	<0.050	<0.050	<0.099	<0.099	<5.0	<9.7	<49	<49	410
BH-16	2/16/22	15	<0.024	<0.049	<0.049	<0.099	<0.099	<4.9	<9.7	<49	<49	560
BH-17	2/15/22	21	<0.12	<0.23	0.47	0.53	1.00	58	5,200	2,300	7,558	750
BH-22 17	3/15/22	22	<0.082	<0.16	0.18	0.33	0.18	18	2,700	1,000	3,718	910
BH-25 17	3/15/22	25	<0.11	<0.23	2.2	1.8	4.0	150	6,300	2,700	9,150	780
BH-27 17	3/15/22	27	<0.12	<0.24	0.91	0.5	1.4	100	6,100	2,400	8,600	820
BH-17B	4/6/22	30	0.210	0.413	1.20	1.90	3.72	215	4,090	722	5,027	928
BH-18	2/15/22	21	<0.024	<0.048	0.14	0.19	0.33	35	3,200	1,700	4,935	800
BH-22 18	3/15/22	22	<0.080	<0.16	0.20	0.32	0.20	20	3,000	1,300	4,320	780
BH-25 18	3/15/22	25	<0.12	<0.24	2.4	1.9	4.3	170	6,400	3,000	9,570	880
BH-27 18	3/15/22	27	<0.12	<0.24	0.85	0.51	1.4	110	7,300	2,300	9,710	840
BH-18B	4/6/22	30	0.105	0.381	2.23	3.04	5.75	241	4,080	694	5,015	1,010
Ramp-1	2/16/22	-	<0.025	<0.050	<0.050	<0.099	<0.099	<5.0	<9.7	<48	<48	670
Ramp-2	2/16/22	-	<0.025	<0.049	<0.049	<0.098	<0.098	<4.9	<9.5	<47	<47	520
Ramp-3	2/16/22	-	<0.024	<0.049	<0.049	<0.097	<0.097	<4.9	<10	<50	<50	1,000
Ramp-3A	3/15/22	-	<0.017	<0.035	<0.035	<0.069	<0.069	<3.5	<9.4	<47	<47	120

Table 1
Summary of Soil Analytical Data
Jackson B #17 Wellhead
EOG Resources
Eddy County, New Mexico

Sample ID	Sample Date	Depth (ft bgs)	Benzene	Toluene	Ethylbenzene	Xylenes	BTEX	Total Petroleum Hydrocarbons (TPH)				Chloride
								GRO (C6-C10)	DRO (C10-C28)	MRO (C28-C35)	Total GRO/DRO/MRO	
			mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
			Table I Closure Criteria for Soils >100 feet Depth to Groundwater 19.15.29 NMAC									
10 mg/kg	---	---	---	50 mg/kg	1,000 mg/kg		---	2,500 mg/kg	20,000 mg/kg			
Soil Pile Samples												
SP-1	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	320
SP-2	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	320
SP-3	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	320
SP-4	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	240
SP-5	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	336
SP-6	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	400
SP-7	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	160
SP-8	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	160
SP-9	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	336
SP-10	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	320
SP-11	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	400
SP-12	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	480
SP-13	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	512
SP-14	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	432
SP-15	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	13.7	<10	13.7	432
SP-16	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	32.6	<10	32.6	384
SP-17	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	400
SP-18	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	432
SP-19	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	<10	<10	<10	320
SP-20	4/6/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10	16.9	<10	16.9	368
SP-21	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	11.7	<10.0	11.7	352
SP-22	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	176
SP-23	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	186	97.1	283	160
SP-24	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	94.1	53.9	148	192
SP-25	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	480
SP-26	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	176
SP-27	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	192
SP-28	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	400
SP-29	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	416
SP-30	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	432
SP-31	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	352
SP-32	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	84	23	107	304
SP-33	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	272
SP-34	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	10.3	<10.0	10.3	224
SP-35	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	30.7	12.8	43.5	240
SP-36	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	22.7	<10.0	22.7	352
SP-37	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	352
SP-38	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	336
SP-39	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	384
SP-40	4/7/22	-	<0.050	<0.050	<0.050	<0.150	<0.300	<10.0	<10.0	<10.0	<10.0	448

Table 1
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Jackson B #17 Wellhead
EOG Resources
Eddy County, New Mexico

Sample ID	Sample Date	Depth (ft bgs)	Benzene	Toluene	Ethylbenzene	Xylenes	BTEX	Total Petroleum Hydrocarbons (TPH)				Chloride
								GRO (C6-C10)	DRO (C10-C28)	MRO (C28-C35)	Total GRO/DRO/MRO	
			mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	
			Table I Closure Criteria for Soils >100 feet Depth to Groundwater 19.15.29 NMAC									
10 mg/kg	---	---	---	50 mg/kg	1,000 mg/kg		---	2,500 mg/kg		20,000 mg/kg		
Soil Boring Samples												
SB-1 (35')	4/26/22	35	<0.12	<0.25	<0.25	<0.50	<0.50	<25	<9.9	<49	<49	2,200
SB-1 (40')	4/26/22	40	<0.025	<0.050	<0.050	<0.10	<0.10	<5.0	<9.4	<47	<47	950
SB-2 (35')	4/28/22	35	<0.12	<0.24	<0.24	<0.48	<0.48	<24	410	190	600	400
SB-2 (40')	4/28/22	40	<0.12	<0.25	<0.25	<0.50	<0.50	<25	410	210	620	270
SB-2 (45')	4/28/22	45	<0.024	<0.047	<0.047	<0.094	<0.094	<4.7	<9.4	<47	<47	1,400
Confirmation Soil Samples												
CB-1 (30')	11/10/22	30	<0.024	<0.048	<0.048	<0.096	<0.10	<4.8	580	300	880	98
CB-1 (35')	11/10/22	35	<0.025	<0.050	<0.050	<0.099	<0.10	<5.0	2800	1000	3800	180
CB-2 (30')	11/10/22	30	<0.025	<0.050	<0.050	<0.10	<0.10	<5.0	<14	<48	<48	340
CB-2 (35')	11/10/22	35	<0.025	<0.049	<0.049	<0.099	<0.10	<4.9	<14	<48	<48	490
CB-1A (30')	4/19/23	30	<0.025	<0.025	<0.025	<0.025	<0.025	<20	<25	<50	<50	440
CB-1A (35')	4/19/23	35	<0.025	<0.025	<0.025	<0.025	<0.025	<20	<25	<50	<50	253
CB-2A (30')	4/19/23	30	<0.025	<0.025	<0.025	<0.025	<0.025	<20	240	276	516	87
CB-2A (35')	4/19/23	35	<0.025	<0.025	<0.025	<0.025	<0.025	<20	30.9	<50	30.9	122

Notes:

1. Values reported in mg/kg

2. < = Value Less than Reporting Limit (RL)

3. Bold Indicates Analyte Detected

4. BTEX analyses by EPA Method SW 8021B.

5. TPH analyses by EPA Method SW 8015 Mod.

B-DH 2

Sample Point Excavated
6. GRO/DRO/MRO = Gasoline/Diesel/Motor Oil

7. Yellow shaded cells indicate analytical samples that exceed the NMAC 19.15.29.12 Table I Closure Criteria for the site.

8. Peach shaded cells indicate analytical samples that exceed the NMAC 19.15.29.12 Table I Closure Criteria for depth to groundwater <50 ft bgs.

9. J - the target analytes was positively identified below the quantitation limit and above the detection limit.

10. --- = not defined

Attachments

Attachment 1

Site Characterization Documentation

EOG Resources

Eddy County, NM

Groundwater Reference Map

Legend


-  .10 Miles
-  .30 Miles
-  .50 Miles
-  Jackson B
-  Temporary Well




EOG Jackson B#59

Eddy County, New Mexico

Legend

 32.85697,-103.92703

32.85697,-103.92703

 Jackson B#59 Temp Well

Square Lake Rd

220

Google Earth

1000 ft





BORING LOG

Project No.: 700438.238.01

Weather: Clear, Temp.: 75°F

Driller: D. Londagin

Site Name: Jackson B #59

Logger: D. Adkins

Rig Type: Reich Drill

Location: Eddy County, New Mexico

Field Instrument: NA

Bit Size: 5-7/8"

Date: 5/18/2021

Latitude: 32.85697 N

Drilling Method: Air Rotary

Boring Number: B-1

Longitude: -103.92703 W

Sample Retrieval Method: Drill Cuttings

Time	Lab Sample Collected	Sample Interval (ft)	Sample Recovery (ft)	USCS	Composition (%)	Sample Material/Comments Include composition, color, grain size, moisture, hardness, plasticity, density	Hydrocarbon Odor	PID (ppm)
	<input type="checkbox"/>	0-30'				Red/brown fine Sand (SP)	<u>None</u> Slight Mod. Strong	
	<input type="checkbox"/>	30-40'				Red/brown fine Sand (SP) with varying amounts of silt and caliche	<u>None</u> Slight Mod. Strong	
	<input type="checkbox"/>	40-80'				Dry, dark red/brown sandy Silts (SM)	<u>None</u> Slight Mod. Strong	
	<input type="checkbox"/>	80-125'				Red/brown fine Sand (SP)	<u>None</u> Slight Mod. Strong	
	<input type="checkbox"/>					__ TD 125' __	None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	

Surface Elevation: _____

Notes: Groundwater Not Encountered @ 125' BGS – 72 hr.

Logger Initials: DJA

Time	Lab Sample Collected	Sample Interval (ft)	Sample Recovery (ft)	USCS	Composition (%)	Sample Material/Comments Include composition, color, grain size, moisture, hardness, plasticity, density	Hydrocarbon Odor	PID (ppm)
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	
	<input type="checkbox"/>						None Slight Mod. Strong	





Notes:


The borehole was advanced to 125' below ground surface (bgs). A 2-inch diameter temporary well constructed 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 Solinst 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 (bentonite chips) and hydrated.

EOG Jackson B #17 Wellhead

Karst Potential Map

Legend

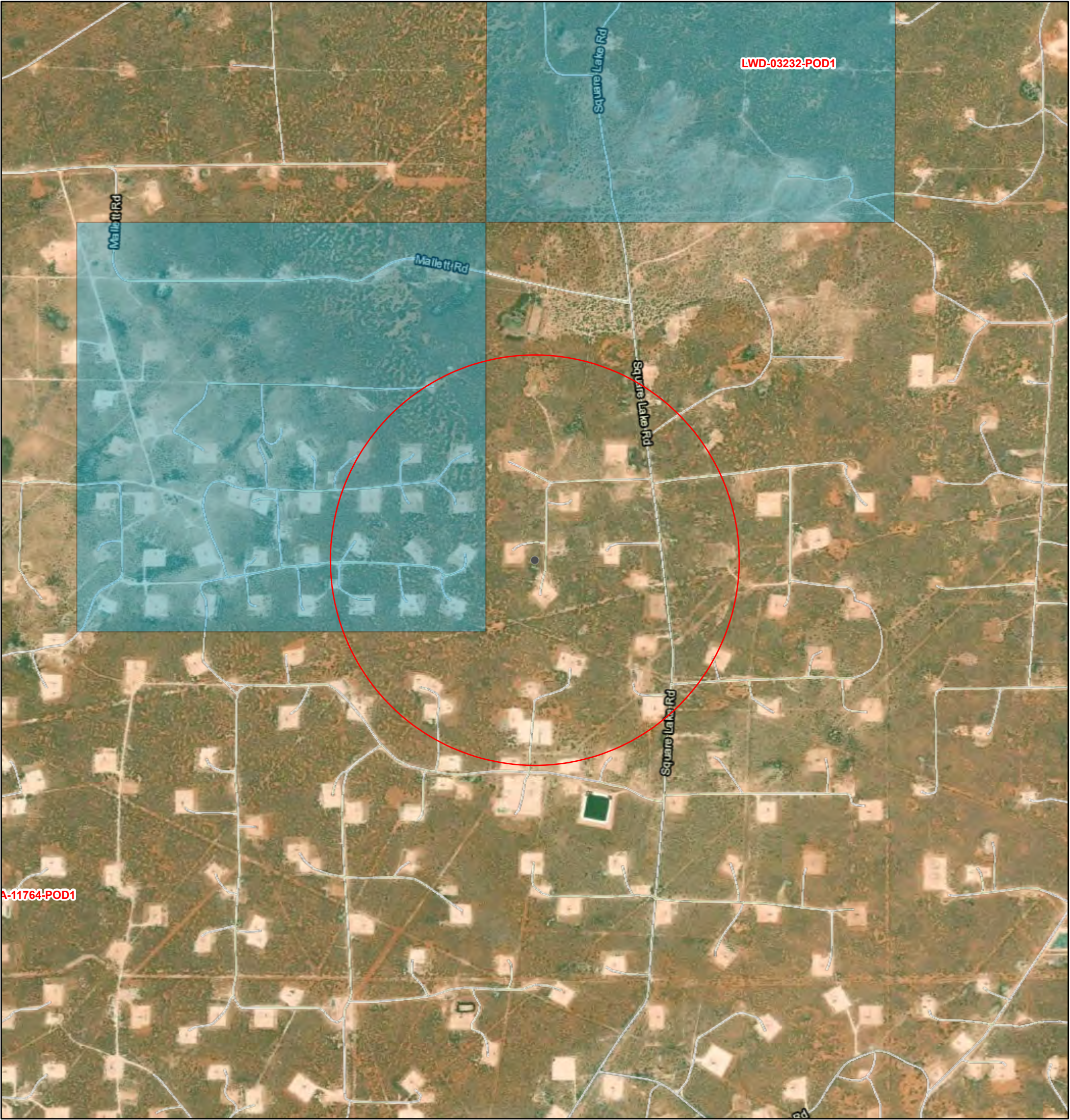
-  EOG Jackson B #17 Wellhead
-  High
-  Low
-  Medium

 EOG Jackson B #17 Wellhead



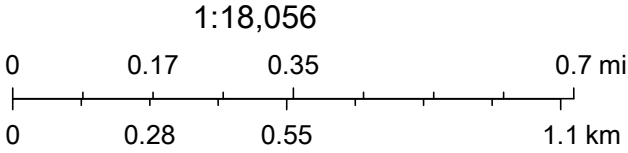
3000 ft

OSE PUBLIC PRINT



8/19/2021, 2:53:19 PM


- OSE District Boundary
- New Mexico State Trust Lands
- Both Estates
- SiteBoundaries





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

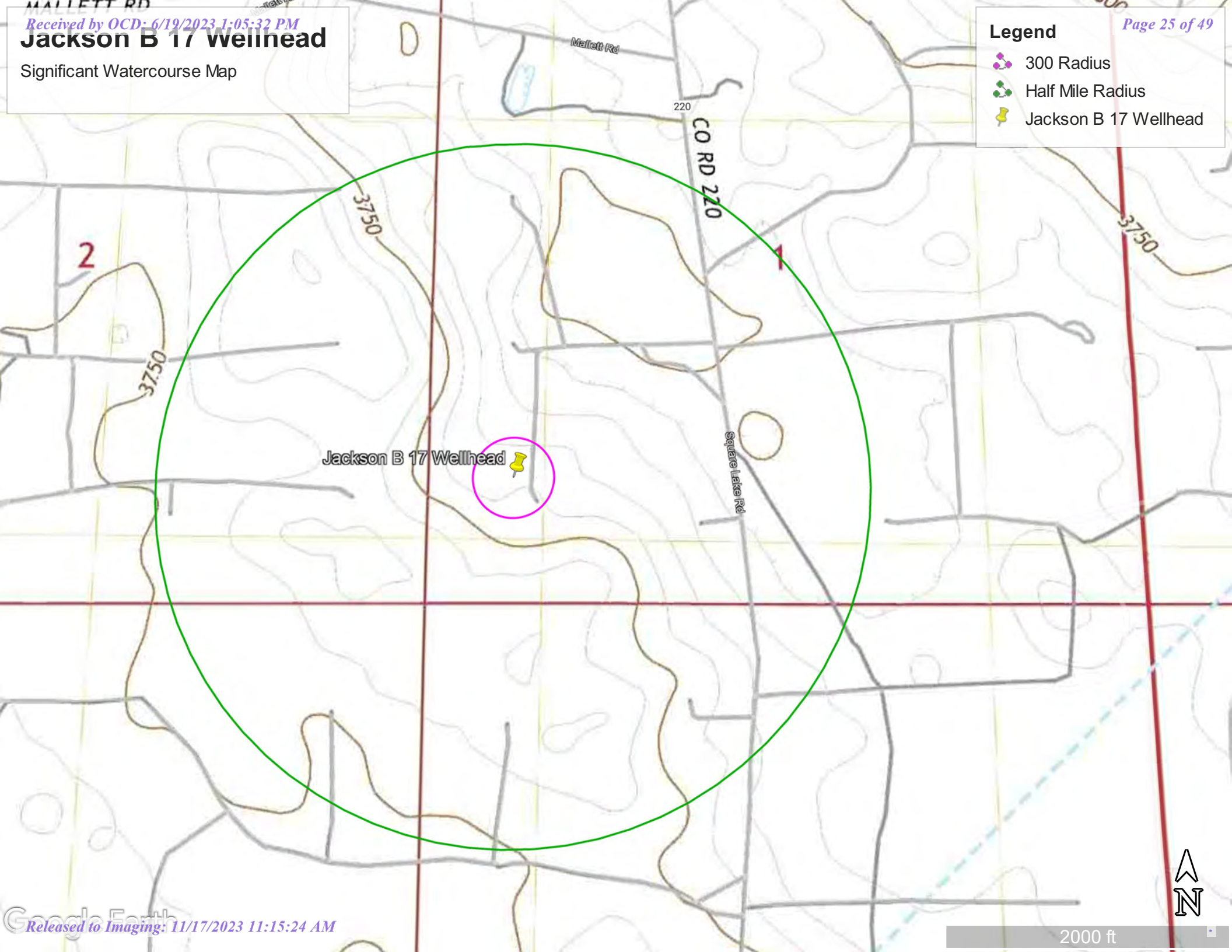
Significant Watercourse Map

Legend

 300 Radius

 Half Mile Radius

 Jackson B 17 Wellhead



National Flood Hazard Layer FIRMette



103°56'14"W 32°51'47"N



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 Water Surface Elevation
		17.5 Cross Sections with 1% Annual Chance Water Surface Elevation
		Coastal Transect
		Base Flood Elevation Line (BFE)
		Limit of Study
		Jurisdiction Boundary
		Coastal Transect Baseline
MAP PANELS		Profile Baseline
		Hydrographic Feature
		Digital Data Available
		No Digital Data Available
		Unmapped



The pin displayed on the map is an approximate point selected by the user and does not represent an authoritative property location.

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

The flood hazard information is derived directly from the authoritative NFHL web services provided by FEMA. This map was exported on 8/19/2021 at 4:53 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.

Released to Imaging: 11/17/2023 11:15:24 AM

Basemap: USGS National Map: Orthoimagery: Data refreshed October, 2020



EOG Jackson B #17 Wellhead



August 27, 2021

Wetlands

- Estuarine and Marine Deepwater
- Estuarine and Marine Wetland

- Freshwater Emergent Wetland
- Freshwater Forested/Shrub Wetland
- Freshwater Pond

- Lake
- Other
- Riverine

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

Attachment 2

Boring Completion Logs



STRATIGRAPHIC LOG (OVERBURDEN)

Page 1 of 1

PROJECT NAME: Jackson B #17 Wellhead

HOLE DESIGNATION: CB-1

PROJECT NUMBER: 11228313

DATE COMPLETED: 10 November 2022

CLIENT: EOG Resources

DRILLING METHOD: Air Rotary

LOCATION: Eddy County, New Mexico

FIELD PERSONNEL: L. Mullins

DRILLING CONTRACTOR: HCI Drilling

DRILLER: K. Cooper

File: \\GHDNET\GHD\USMIDLAND\PROJECTS\11228313\TECH\GINT LOGS\11228313 LOG-BACKFILL.GPJ Library File: GHD_ENVIRO_V06.GLB Report: OVERBURDEN LOG Date: 11/11/22

DEPTH ft BGS	STRATIGRAPHIC DESCRIPTION & REMARKS	DEPTH BGS	SAMPLE				
			NUMBER	INTERVAL	REC (%)	"N" VALUE	PID (ppm)
2	SP-SAND, fine to medium grained, with caliche gravel interbedded throughout, light brown, dry						
4							
6							
8							
10							
12							
14							
16	- with silt at 15.00ft BGS						
18							
20							
22							
24							
26							
28	- moist at 27.00ft BGS						
30			28 - 30'				4.2
32							
34	Bed of consolidated CALICHE	33.00	33 - 35'				5.7
36	END OF BOREHOLE @ 35.00ft BGS	35.00					
38							
40							
42							
44							
46							

NOTES: MEASURING POINT ELEVATIONS MAY CHANGE; REFER TO CURRENT ELEVATION TABLE

CHEMICAL ANALYSIS ☐



STRATIGRAPHIC LOG (OVERBURDEN)

Page 1 of 1

PROJECT NAME: Jackson B #17 Wellhead

HOLE DESIGNATION: CB-2

PROJECT NUMBER: 11228313

DATE COMPLETED: 10 November 2022

CLIENT: EOG Resources

DRILLING METHOD: Air Rotary

LOCATION: Eddy County, New Mexico

FIELD PERSONNEL: L. Mullins

DRILLING CONTRACTOR: HCI Drilling

DRILLER: K. Cooper

File: \\GHDNET\GHD\USMIDLAND\PROJECTS\11228313\TECH\GINT LOGS\11228313 LOG-BACKFILL.GPJ Library File: GHD_ENVIRO_V06.GLB Report: OVERBURDEN LOG Date: 11/11/22

DEPTH ft BGS	STRATIGRAPHIC DESCRIPTION & REMARKS	DEPTH BGS	SAMPLE				
			NUMBER	INTERVAL	REC (%)	"N" VALUE	PID (ppm)
2	SP-SAND, fine to medium grained, with caliche gravel interbedded throughout, light brown, dry						
4							
6							
8							
10							
12							
14							
16	- with silt at 15.00ft BGS						
18							
20							
22							
24							
26							
28	- slightly moist at 28.00ft BGS						
30	- dry at 30.00ft BGS		28 - 30				1.1
32							
34	Bed of consolidated CALICHE, dry	33.00	33 - 35				3.5
36	END OF BOREHOLE @ 35.00ft BGS	35.00					
38							
40							
42							
44							
46							

NOTES: MEASURING POINT ELEVATIONS MAY CHANGE; REFER TO CURRENT ELEVATION TABLE

CHEMICAL ANALYSIS ☐



STRATIGRAPHIC LOG (OVERBURDEN)

Page 1 of 1

PROJECT NAME: Jackson B #17 Wellhead
PROJECT NUMBER: 11228313
CLIENT: EOG Resources
LOCATION: Eddy County, New Mexico

HOLE DESIGNATION: CB-1A
DATE COMPLETED: 19 April 2023
DRILLING METHOD: Air Rotary
FIELD PERSONNEL: D. Sparks

File: \\GHDNET\GHD\USMIDLAND\PROJECTS\11228313\TECH\GINT LOGS\11228313-WA-052023.GPJ Library File: GHD_ENVIRO_V08.GLB Report: OVERBURDEN LOG Date: 23/5/23

DEPTH ft BGS	STRATIGRAPHIC DESCRIPTION & REMARKS	DEPTH BGS	SAMPLE				
			NUMBER	INTERVAL	REC (%)	"N" VALUE	
2	SP-SAND, fine to medium grained, with caliche gravel interbedded throughout, light brown						
4							
6							
8							
10							
12							
14							
16	- with silt at 15.00ft BGS						
18							
20							
22							
24							
26							
28							
30							
32							
34	- bed of consolidated caliche from 33.00 to 35.00ft BGS						
36	END OF BOREHOLE @ 35.00ft BGS	35.00					
38							
40							
42							
44							
46							

NOTES: MEASURING POINT ELEVATIONS MAY CHANGE; REFER TO CURRENT ELEVATION TABLE

CHEMICAL ANALYSIS





STRATIGRAPHIC LOG (OVERBURDEN)

Page 1 of 1

PROJECT NAME: Jackson B #17 Wellhead

HOLE DESIGNATION: CB-2A

PROJECT NUMBER: 11228313

DATE COMPLETED: 19 April 2023

CLIENT: EOG Resources

DRILLING METHOD: Air Rotary

LOCATION: Eddy County, New Mexico

FIELD PERSONNEL: D. Sparks

File: \\GHDNET\GHD\USMIDLAND\PROJECTS\56211228313\TECH\GINT LOGS\11228313-WA-052023.GPJ Library File: GHD_ENVIRO_V08.GLB Report: OVERBURDEN LOG Date: 23/5/23

DEPTH ft BGS	STRATIGRAPHIC DESCRIPTION & REMARKS	DEPTH BGS	SAMPLE				
			NUMBER	INTERVAL	REC (%)	"N" VALUE	
2	SP-SAND, fine to medium grained, with caliche gravel interbedded throughout, light brown						
4							
6							
8							
10							
12							
14							
16	- with silt at 15.00ft BGS						
18							
20							
22							
24							
26							
28							
30							
32							
34	- bed of consolidated caliche from 33.00 to 35.00ft BGS						
36	END OF BOREHOLE @ 35.00ft BGS	35.00					
38							
40							
42							
44							
46							

NOTES: MEASURING POINT ELEVATIONS MAY CHANGE; REFER TO CURRENT ELEVATION TABLE

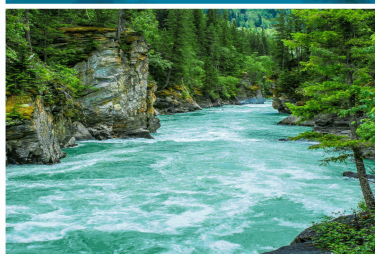
CHEMICAL ANALYSIS



Attachment 3

Laboratory Analytical Reports and Chain-of-Custody Documentation

Report to:
Moshghan Mansoori



envirotech

Practical Solutions for a Better Tomorrow

Analytical Report

GHD

Project Name: 11228313/ Jackson B #17

Work Order: E304102

Job Number: 19034-0001

Received: 4/20/2023

Revision: 2

Report Reviewed By:

Walter Hinchman
Laboratory Director
4/26/23

5796 U.S. Hwy 64
Farmington, NM 87401

Phone: (505) 632-1881
Envirotech-inc.com



Envirotech Inc. certifies the test results meet all requirements of TNI unless noted otherwise.
Statement of Data Authenticity: Envirotech Inc. attests the data reported has not been altered in any way.
Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech Inc.
Envirotech Inc. holds the Utah TNI certification NM00979 for data reported.
Envirotech Inc. holds the Texas TNI certification T104704557 for data reported.

Date Reported: 4/26/23

Moshghan Mansoori
6121 Indian School Rd. NE #200
Albuquerque, NM 87110



Project Name: 11228313/ Jackson B #17
Workorder: E304102
Date Received: 4/20/2023 8:15:00AM

Moshghan Mansoori,

Thank you for choosing Envirotech, Inc. as your analytical testing laboratory for the sample(s) received on, 4/20/2023 8:15:00AM, under the Project Name: 11228313/ Jackson B #17.

The analytical test results summarized in this report with the Project Name: 11228313/ Jackson B #17 apply to the individual samples collected, identified and submitted bearing the project name on the enclosed chain-of-custody. Subcontracted sample analyses not conducted by Envirotech, Inc., are attached in full as issued by the subcontract laboratory.

Please review the Chain-of-Custody (COC) and Sample Receipt Checklist (SRC) for any issues regarding sample receipt temperature, containers, preservation etc. To best understand your test results, review the entire report summarizing your sample data and the associated quality control batch data.

All reported data in this analytical report were analyzed according to the referenced method(s) and are in compliance with the latest NELAC/TNI standards, unless otherwise noted. Samples or analytical quality control parameters not meeting specific QC criteria are qualified with a data flag. Data flag definitions are located in the Notes and Definitions section of this analytical report.

If you have any questions concerning this report, please feel free to contact Envirotech, Inc.

Respectfully,

Walter Hinchman
Laboratory Director
Office: 505-632-1881
Cell: 775-287-1762
whinchman@envirotech-inc.com

Raina Schwanz
Laboratory Administrator
Office: 505-632-1881
rainaschwanz@envirotech-inc.com

Alexa Michaels
Sample Custody Officer
Office: 505-632-1881
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ljjarboe@envirotech-inc.com

West Texas Midland/Odessa Area
Rayny Hagan
Technical Representative
Office: 505-421-LABS(5227)

Envirotech Web Address: www.envirotech-inc.com

Table of Contents

Title Page	1
Cover Page	2
Table of Contents	3
Sample Summary	4
Sample Data	5
CB-1A (30 ft)	5
CB-1A (35 ft)	6
CB-2A (30 ft)	7
CB-2A (35 ft)	8
QC Summary Data	9
QC - Volatile Organic Compounds by EPA 8260B	9
QC - Nonhalogenated Organics by EPA 8015D - GRO	10
QC - Nonhalogenated Organics by EPA 8015D - DRO/ORO	11
QC - Anions by EPA 300.0/9056A	12
Definitions and Notes	13
Chain of Custody etc.	14

Sample Summary

GHD	Project Name:	11228313/ Jackson B #17	Reported:
6121 Indian School Rd. NE #200	Project Number:	19034-0001	
Albuquerque NM, 87110	Project Manager:	Moshghan Mansoori	04/26/23 13:52

Client Sample ID	Lab Sample ID	Matrix	Sampled	Received	Container
CB-1A (30 ft)	E304102-01A	Soil	04/19/23	04/20/23	Glass Jar, 4 oz.
CB-1A (35 ft)	E304102-02A	Soil	04/19/23	04/20/23	Glass Jar, 4 oz.
CB-2A (30 ft)	E304102-03A	Soil	04/19/23	04/20/23	Glass Jar, 4 oz.
CB-2A (35 ft)	E304102-04A	Soil	04/19/23	04/20/23	Glass Jar, 4 oz.



Sample Data

GHD 6121 Indian School Rd. NE #200 Albuquerque NM, 87110	Project Name: 11228313/ Jackson B #17 Project Number: 19034-0001 Project Manager: Moshghan Mansoori	Reported: 4/26/2023 1:52:48PM
--	---	----------------------------------

CB-1A (30 ft)

E304102-01

Analyte	Result	Reporting Limit	Dilution	Prepared	Analyzed	Notes
---------	--------	-----------------	----------	----------	----------	-------

Volatile Organic Compounds by EPA 8260B	mg/kg	mg/kg	Analyst: IY		Batch: 2316038
Benzene	ND	0.0250	1	04/20/23	04/21/23
Ethylbenzene	ND	0.0250	1	04/20/23	04/21/23
Toluene	ND	0.0250	1	04/20/23	04/21/23
o-Xylene	ND	0.0250	1	04/20/23	04/21/23
p,m-Xylene	ND	0.0500	1	04/20/23	04/21/23
Total Xylenes	ND	0.0250	1	04/20/23	04/21/23
<hr/>					
Surrogate: Bromofluorobenzene	98.1 %	70-130		04/20/23	04/21/23
Surrogate: 1,2-Dichloroethane-d4	105 %	70-130		04/20/23	04/21/23
Surrogate: Toluene-d8	101 %	70-130		04/20/23	04/21/23

Nonhalogenated Organics by EPA 8015D - GRO	mg/kg	mg/kg	Analyst: IY		Batch: 2316038
Gasoline Range Organics (C6-C10)	ND	20.0	1	04/20/23	04/21/23
Surrogate: Bromofluorobenzene	98.1 %	70-130		04/20/23	04/21/23
Surrogate: 1,2-Dichloroethane-d4	105 %	70-130		04/20/23	04/21/23
Surrogate: Toluene-d8	101 %	70-130		04/20/23	04/21/23

Nonhalogenated Organics by EPA 8015D - DRO/ORO	mg/kg	mg/kg	Analyst: JL		Batch: 2316063
Diesel Range Organics (C10-C28)	ND	25.0	1	04/21/23	04/22/23
Oil Range Organics (C28-C36)	ND	50.0	1	04/21/23	04/22/23
Surrogate: n-Nonane	111 %	50-200		04/21/23	04/22/23

Anions by EPA 300.0/9056A	mg/kg	mg/kg	Analyst: RAS			Batch: 2316050
Chloride	440	20.0	1	04/20/23	04/22/23	



Sample Data

GHD
6121 Indian School Rd. NE #200
Albuquerque NM, 87110

Project Name: 11228313/ Jackson B #17
Project Number: 19034-0001
Project Manager: Moshghan Mansoori

Reported:
4/26/2023 1:52:48PM

CB-1A (35 ft)

E304102-02

Analyte	Result	Reporting Limit	Dilution	Prepared	Analyzed	Notes
Volatile Organic Compounds by EPA 8260B						
	mg/kg	mg/kg		Analyst: IY		Batch: 2316038
Benzene	ND	0.0250	1	04/20/23	04/21/23	
Ethylbenzene	ND	0.0250	1	04/20/23	04/21/23	
Toluene	ND	0.0250	1	04/20/23	04/21/23	
o-Xylene	ND	0.0250	1	04/20/23	04/21/23	
p,m-Xylene	ND	0.0500	1	04/20/23	04/21/23	
Total Xylenes	ND	0.0250	1	04/20/23	04/21/23	
Surrogate: Bromofluorobenzene		104 %	70-130	04/20/23	04/21/23	
Surrogate: 1,2-Dichloroethane-d4		105 %	70-130	04/20/23	04/21/23	
Surrogate: Toluene-d8		106 %	70-130	04/20/23	04/21/23	
Nonhalogenated Organics by EPA 8015D - GRO						
	mg/kg	mg/kg		Analyst: IY		Batch: 2316038
Gasoline Range Organics (C6-C10)	ND	20.0	1	04/20/23	04/21/23	
Surrogate: Bromofluorobenzene		104 %	70-130	04/20/23	04/21/23	
Surrogate: 1,2-Dichloroethane-d4		105 %	70-130	04/20/23	04/21/23	
Surrogate: Toluene-d8		106 %	70-130	04/20/23	04/21/23	
Nonhalogenated Organics by EPA 8015D - DRO/ORO						
	mg/kg	mg/kg		Analyst: JL		Batch: 2316063
Diesel Range Organics (C10-C28)	ND	25.0	1	04/21/23	04/22/23	
Oil Range Organics (C28-C36)	ND	50.0	1	04/21/23	04/22/23	
Surrogate: n-Nonane		109 %	50-200	04/21/23	04/22/23	
Anions by EPA 300.0/9056A						
	mg/kg	mg/kg		Analyst: RAS		Batch: 2316050
Chloride	253	20.0	1	04/20/23	04/22/23	



Sample Data

GHD	Project Name:	11228313/ Jackson B #17	Reported: 4/26/2023 1:52:48PM
6121 Indian School Rd. NE #200	Project Number:	19034-0001	
Albuquerque NM, 87110	Project Manager:	Moshghan Mansoori	

CB-2A (30 ft)

E304102-03

Analyte	Result	Reporting Limit	Dilution	Prepared	Analyzed	Notes
Volatile Organic Compounds by EPA 8260B						
	mg/kg	mg/kg		Analyst: IY		Batch: 2316038
Benzene	ND	0.0250	1	04/20/23	04/21/23	
Ethylbenzene	ND	0.0250	1	04/20/23	04/21/23	
Toluene	ND	0.0250	1	04/20/23	04/21/23	
o-Xylene	ND	0.0250	1	04/20/23	04/21/23	
p,m-Xylene	ND	0.0500	1	04/20/23	04/21/23	
Total Xylenes	ND	0.0250	1	04/20/23	04/21/23	
Surrogate: Bromofluorobenzene	99.8 %	70-130		04/20/23	04/21/23	
Surrogate: 1,2-Dichloroethane-d4	102 %	70-130		04/20/23	04/21/23	
Surrogate: Toluene-d8	107 %	70-130		04/20/23	04/21/23	
Nonhalogenated Organics by EPA 8015D - GRO						
	mg/kg	mg/kg		Analyst: IY		Batch: 2316038
Gasoline Range Organics (C6-C10)	ND	20.0	1	04/20/23	04/21/23	
Surrogate: Bromofluorobenzene	99.8 %	70-130		04/20/23	04/21/23	
Surrogate: 1,2-Dichloroethane-d4	102 %	70-130		04/20/23	04/21/23	
Surrogate: Toluene-d8	107 %	70-130		04/20/23	04/21/23	
Nonhalogenated Organics by EPA 8015D - DRO/ORO						
	mg/kg	mg/kg		Analyst: JL		Batch: 2316063
Diesel Range Organics (C10-C28)	240	125	5	04/21/23	04/22/23	
Oil Range Organics (C28-C36)	276	250	5	04/21/23	04/22/23	
Surrogate: n-Nonane	110 %	50-200		04/21/23	04/22/23	
Anions by EPA 300.0/9056A						
	mg/kg	mg/kg		Analyst: RAS		Batch: 2316050
Chloride	87.0	20.0	1	04/20/23	04/22/23	



Sample Data

GHD
6121 Indian School Rd. NE #200
Albuquerque NM, 87110

Project Name: 11228313/ Jackson B #17
Project Number: 19034-0001
Project Manager: Moshghan Mansoori

Reported:
4/26/2023 1:52:48PM

CB-2A (35 ft)

E304102-04

Analyte	Result	Reporting Limit	Dilution	Prepared	Analyzed	Notes
Volatile Organic Compounds by EPA 8260B						
	mg/kg	mg/kg		Analyst: IY		Batch: 2316038
Benzene	ND	0.0250	1	04/20/23	04/21/23	
Ethylbenzene	ND	0.0250	1	04/20/23	04/21/23	
Toluene	ND	0.0250	1	04/20/23	04/21/23	
o-Xylene	ND	0.0250	1	04/20/23	04/21/23	
p,m-Xylene	ND	0.0500	1	04/20/23	04/21/23	
Total Xylenes	ND	0.0250	1	04/20/23	04/21/23	
Surrogate: Bromofluorobenzene		101 %	70-130	04/20/23	04/21/23	
Surrogate: 1,2-Dichloroethane-d4		105 %	70-130	04/20/23	04/21/23	
Surrogate: Toluene-d8		109 %	70-130	04/20/23	04/21/23	
Nonhalogenated Organics by EPA 8015D - GRO						
	mg/kg	mg/kg		Analyst: IY		Batch: 2316038
Gasoline Range Organics (C6-C10)	ND	20.0	1	04/20/23	04/21/23	
Surrogate: Bromofluorobenzene		101 %	70-130	04/20/23	04/21/23	
Surrogate: 1,2-Dichloroethane-d4		105 %	70-130	04/20/23	04/21/23	
Surrogate: Toluene-d8		109 %	70-130	04/20/23	04/21/23	
Nonhalogenated Organics by EPA 8015D - DRO/ORO						
	mg/kg	mg/kg		Analyst: JL		Batch: 2316063
Diesel Range Organics (C10-C28)	30.9	25.0	1	04/21/23	04/22/23	
Oil Range Organics (C28-C36)	ND	50.0	1	04/21/23	04/22/23	
Surrogate: n-Nonane		113 %	50-200	04/21/23	04/22/23	
Anions by EPA 300.0/9056A						
	mg/kg	mg/kg		Analyst: RAS		Batch: 2316050
Chloride	122	20.0	1	04/20/23	04/22/23	



QC Summary Data

GHD	Project Name:	11228313/ Jackson B #17	Reported:
6121 Indian School Rd. NE #200	Project Number:	19034-0001	
Albuquerque NM, 87110	Project Manager:	Moshghan Mansoori	4/26/2023 1:52:48PM

Volatile Organic Compounds by EPA 8260B

Analyst: IY

Analyte	Result	Reporting Limit	Spike Level	Source Result	Rec	Rec Limits	RPD	RPD Limit	Notes
	mg/kg	mg/kg	mg/kg	mg/kg	%	%	%	%	

Blank (2316038-BLK1)

Prepared: 04/20/23 Analyzed: 04/21/23

Benzene	ND	0.0250							
Ethylbenzene	ND	0.0250							
Toluene	ND	0.0250							
o-Xylene	ND	0.0250							
p,m-Xylene	ND	0.0500							
Total Xylenes	ND	0.0250							
Surrogate: Bromofluorobenzene	0.497		0.500		99.4	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.578		0.500		116	70-130			
Surrogate: Toluene-d8	0.522		0.500		104	70-130			

LCS (2316038-BS1)

Prepared: 04/20/23 Analyzed: 04/21/23

Benzene	2.41	0.0250	2.50		96.3	70-130			
Ethylbenzene	2.41	0.0250	2.50		96.2	70-130			
Toluene	2.47	0.0250	2.50		98.7	70-130			
o-Xylene	2.39	0.0250	2.50		95.6	70-130			
p,m-Xylene	4.82	0.0500	5.00		96.4	70-130			
Total Xylenes	7.21	0.0250	7.50		96.2	70-130			
Surrogate: Bromofluorobenzene	0.550		0.500		110	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.578		0.500		116	70-130			
Surrogate: Toluene-d8	0.531		0.500		106	70-130			

Matrix Spike (2316038-MS1)

Source: E304099-21

Prepared: 04/20/23 Analyzed: 04/21/23

Benzene	2.47	0.0250	2.50	ND	98.7	48-131			
Ethylbenzene	2.46	0.0250	2.50	ND	98.3	45-135			
Toluene	2.53	0.0250	2.50	ND	101	48-130			
o-Xylene	2.46	0.0250	2.50	ND	98.5	43-135			
p,m-Xylene	4.91	0.0500	5.00	ND	98.1	43-135			
Total Xylenes	7.37	0.0250	7.50	ND	98.2	43-135			
Surrogate: Bromofluorobenzene	0.543		0.500		109	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.544		0.500		109	70-130			
Surrogate: Toluene-d8	0.524		0.500		105	70-130			

Matrix Spike Dup (2316038-MSD1)

Source: E304099-21

Prepared: 04/20/23 Analyzed: 04/21/23

Benzene	2.51	0.0250	2.50	ND	100	48-131	1.73	23	
Ethylbenzene	2.48	0.0250	2.50	ND	99.1	45-135	0.851	27	
Toluene	2.55	0.0250	2.50	ND	102	48-130	0.688	24	
o-Xylene	2.47	0.0250	2.50	ND	98.9	43-135	0.365	27	
p,m-Xylene	4.90	0.0500	5.00	ND	98.1	43-135	0.0408	27	
Total Xylenes	7.38	0.0250	7.50	ND	98.3	43-135	0.0950	27	
Surrogate: Bromofluorobenzene	0.535		0.500		107	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.547		0.500		109	70-130			
Surrogate: Toluene-d8	0.516		0.500		103	70-130			



QC Summary Data

GHD	Project Name:	11228313/ Jackson B #17	Reported:
6121 Indian School Rd. NE #200	Project Number:	19034-0001	
Albuquerque NM, 87110	Project Manager:	Moshghan Mansoori	4/26/2023 1:52:48PM

Nonhalogenated Organics by EPA 8015D - GRO

Analyst: IY

Analyte	Result mg/kg	Reporting Limit mg/kg	Spike Level mg/kg	Source Result mg/kg	Rec %	Rec Limits %	RPD %	RPD Limit %	Notes
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Blank (2316038-BLK1)

Prepared: 04/20/23 Analyzed: 04/21/23

Gasoline Range Organics (C6-C10)	ND	20.0							
Surrogate: Bromofluorobenzene	0.497		0.500		99.4	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.578		0.500		116	70-130			
Surrogate: Toluene-d8	0.522		0.500		104	70-130			

LCS (2316038-BS2)

Prepared: 04/20/23 Analyzed: 04/21/23

Gasoline Range Organics (C6-C10)	51.9	20.0	50.0		104	70-130			
Surrogate: Bromofluorobenzene	0.519		0.500		104	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.551		0.500		110	70-130			
Surrogate: Toluene-d8	0.536		0.500		107	70-130			

Matrix Spike (2316038-MS2)

Source: E304099-21

Prepared: 04/20/23 Analyzed: 04/21/23

Gasoline Range Organics (C6-C10)	54.8	20.0	50.0	ND	110	70-130			
Surrogate: Bromofluorobenzene	0.503		0.500		101	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.524		0.500		105	70-130			
Surrogate: Toluene-d8	0.535		0.500		107	70-130			

Matrix Spike Dup (2316038-MSD2)

Source: E304099-21

Prepared: 04/20/23 Analyzed: 04/21/23

Gasoline Range Organics (C6-C10)	51.4	20.0	50.0	ND	103	70-130	6.38	20	
Surrogate: Bromofluorobenzene	0.501		0.500		100	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.536		0.500		107	70-130			
Surrogate: Toluene-d8	0.533		0.500		107	70-130			



QC Summary Data

GHD	Project Name:	11228313/ Jackson B #17	Reported:
6121 Indian School Rd. NE #200	Project Number:	19034-0001	
Albuquerque NM, 87110	Project Manager:	Moshghan Mansoori	4/26/2023 1:52:48PM

Nonhalogenated Organics by EPA 8015D - DRO/ORO

Analyst: JL

Analyte	Result mg/kg	Reporting Limit mg/kg	Spike Level mg/kg	Source Result mg/kg	Rec %	Rec Limits %	RPD %	RPD Limit %	Notes
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Blank (2316063-BLK1)					Prepared: 04/21/23 Analyzed: 04/22/23				
Diesel Range Organics (C10-C28)	ND	25.0							
Oil Range Organics (C28-C36)	ND	50.0							
Surrogate: n-Nonane	57.3		50.0		115	50-200			

LCS (2316063-BS1)					Prepared: 04/21/23 Analyzed: 04/22/23				
Diesel Range Organics (C10-C28)	281	25.0	250		112	38-132			
Surrogate: n-Nonane	54.9		50.0		110	50-200			

Matrix Spike (2316063-MS1)					Source: E304103-01		Prepared: 04/21/23 Analyzed: 04/22/23		
Diesel Range Organics (C10-C28)	587	25.0	250	353	93.8	38-132			
Surrogate: n-Nonane	54.8		50.0		110	50-200			

Matrix Spike Dup (2316063-MSD1)					Source: E304103-01		Prepared: 04/21/23 Analyzed: 04/22/23		
Diesel Range Organics (C10-C28)	591	25.0	250	353	95.4	38-132	0.663	20	
Surrogate: n-Nonane	55.1		50.0		110	50-200			



QC Summary Data

GHD	Project Name:	11228313/ Jackson B #17	Reported:
6121 Indian School Rd. NE #200	Project Number:	19034-0001	
Albuquerque NM, 87110	Project Manager:	Moshghan Mansoori	4/26/2023 1:52:48PM

Anions by EPA 300.0/9056A

Analyst: RAS

Analyte	Result	Reporting Limit	Spike Level	Source Result	Rec	Rec Limits	RPD	RPD Limit	Notes
	mg/kg	mg/kg	mg/kg	mg/kg	%	%	%	%	

Blank (2316050-BLK1)					Prepared: 04/20/23 Analyzed: 04/22/23				
Chloride	ND	20.0							
LCS (2316050-BS1)					Prepared: 04/20/23 Analyzed: 04/22/23				
Chloride	254	20.0	250		101	90-110			
Matrix Spike (2316050-MS1)					Source: E304102-01		Prepared: 04/20/23 Analyzed: 04/22/23		
Chloride	681	20.0	250	440	96.2	80-120			
Matrix Spike Dup (2316050-MSD1)					Source: E304102-01		Prepared: 04/20/23 Analyzed: 04/22/23		
Chloride	655	20.0	250	440	86.1	80-120	3.79	20	

QC Summary Report Comment:
Calculations are based off of the raw (non-rounded) data. However, for reporting purposes all QC data is rounded to three significant figures.
Therefore, hand calculated values may differ slightly.



Definitions and Notes

GHD	Project Name:	11228313/ Jackson B #17	
6121 Indian School Rd. NE #200	Project Number:	19034-0001	Reported:
Albuquerque NM, 87110	Project Manager:	Moshghan Mansoori	04/26/23 13:52

- ND Analyte NOT DETECTED at or above the reporting limit
- NR Not Reported
- RPD Relative Percent Difference
- DNI Did Not Ignite

Note (1): Methods marked with ** are non-accredited methods.

Note (2): Soil data is reported on an "as received" weight basis, unless reported otherwise.



Chain of Custody

**envirotech**

Envirotech Analytical Laboratory

Printed: 4/20/2023 12:30:34PM

Sample Receipt Checklist (SRC)

Instructions: Please take note of any NO checkmarks.

If we receive no response concerning these items within 24 hours of the date of this notice, all the samples will be analyzed as requested.

Client: GHD	Date Received: 04/20/23 08:15	Work Order ID: E304102
Phone: (505) 884-0672	Date Logged In: 04/20/23 09:31	Logged In By: Caitlin Christian
Email: moshghan.mansoori@ghd.com	Due Date: 04/26/23 17:00 (4 day TAT)	

Chain of Custody (COC)

1. Does the sample ID match the COC? Yes
2. Does the number of samples per sampling site location match the COC? Yes
3. Were samples dropped off by client or carrier? Yes
4. Was the COC complete, i.e., signatures, dates/times, requested analyses? No
5. Were all samples received within holding time? Yes

Note: Analysis, such as pH which should be conducted in the field, i.e., 15 minute hold time, are not included in this discussion.

Carrier: CourierComments/Resolution

Time sampled not provided on COC per client.

Sample Turn Around Time (TAT)

6. Did the COC indicate standard TAT, or Expedited TAT? Yes

Sample Cooler

7. Was a sample cooler received? Yes
8. If yes, was cooler received in good condition? Yes
9. Was the sample(s) received intact, i.e., not broken? Yes
10. Were custody/security seals present? No
11. If yes, were custody/security seals intact? NA
12. Was the sample received on ice? If yes, the recorded temp is 4°C, i.e., 6°±2°C? Yes

Note: Thermal preservation is not required, if samples are received w/i 15 minutes of sampling

13. If no visible ice, record the temperature. Actual sample temperature: 4°C

Sample Container

14. Are aqueous VOC samples present? No
15. Are VOC samples collected in VOA Vials? NA
16. Is the head space less than 6-8 mm (pea sized or less)? NA
17. Was a trip blank (TB) included for VOC analyses? NA
18. Are non-VOC samples collected in the correct containers? Yes
19. Is the appropriate volume/weight or number of sample containers collected? Yes

Field Label

20. Were field sample labels filled out with the minimum information:
 - Sample ID? Yes
 - Date/Time Collected? Yes
 - Collectors name? No

Sample Preservation

21. Does the COC or field labels indicate the samples were preserved? No
22. Are sample(s) correctly preserved? NA
24. Is lab filtration required and/or requested for dissolved metals? No

Multiphase Sample Matrix

26. Does the sample have more than one phase, i.e., multiphase? No
27. If yes, does the COC specify which phase(s) is to be analyzed? NA

Subcontract Laboratory

28. Are samples required to get sent to a subcontract laboratory? No
29. Was a subcontract laboratory specified by the client and if so who? NA Subcontract Lab: NA

Client Instruction

Signature of client authorizing changes to the COC or sample disposition.

Date



envirotech Inc.

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 230202

CONDITIONS

Operator: EOG RESOURCES INC P.O. Box 2267 Midland, TX 79702	OGRID: 7377
	Action Number: 230202
	Action Type: [C-141] Release Corrective Action (C-141)

CONDITIONS

Created By	Condition	Condition Date
scwells	None	11/17/2023