

October 17, 2019 Vertex Project #: 19E-000614

Spill Closure Report: Rick Deckard State 25-28-4 WA #2H (Section 4, Township 25 South, Range 28 East)

API: 30-015-45344

County: Eddy

Incident Report: 2RP-5601

Prepared For: Marathon Oil Company

4111 S. Tidwell Road Carlsbad, NM 88220

New Mexico Oil Conservation Division - District 2 Artesia

811 S. 1st Street

Artesia, New Mexico 88210

Marathon Oil Company (Marathon) retained Vertex Resource Services Inc. (Vertex) to conduct a Spill Assessment for Incident 2RP-5601. This incident was a release of produced water that was the result of a small leak from the bottom of an aboveground storage tank (AST) at Rick Deckard State 25-28-4 WA #2H, API 30-015-45344 (hereafter referred to as "site"). This letter provides a description of the Spill Assessment and includes a request for Spill Closure. The spill area is located at N 32.16425, W -104.09560.

Background

The site is located approximately 8.4 miles south of Loving, New Mexico on State-owned property. The legal location for the site is Unit Letter "C", Section 4, Township 25 South, Range 28 East in Eddy County, New Mexico. An aerial photograph and site schematic are included as Attachment 1.

The Geological Map of New Mexico (New Mexico Bureau of Geology and Mineral Resources, 2014 – 2017) indicates the site's surface geology is comprised primarily of Pr ---- Rustler Formation (Upper Permian), and is characterized as siltstone, gypsum, sandstone and dolomite. Predominant soil texture on the site is well-drained gravelly loam to loam with the potential for some runoff.

Incident Description

The referenced release occurred on July 31, 2019, due to a small leak at the bottom of a produced water AST, resulting in the release of approximately 18.31 barrels (bbls) of produced water onto the pad. Upon discovery, an initial spill cleanup was conducted in which approximately 15 bbls of free liquid were recovered. The release was reported to New Mexico Oil Conservation Division (NM OCD) on August 14, 2019; the initial C-141 Report, 2RP-5601, is included in this document as Attachment 2. Daily Field Report (DFRs) and site photographs are included as Attachment 3.

Closure Criteria Determination

Depth to groundwater at the site was determined using information from Oil and Gas Drilling records and the New Mexico Office of the State Engineer Water Column/Average Depth to Water report. A 5,000-meter search radius was used to determine groundwater depth. The shallowest recorded depth to groundwater was determined to be 35 feet below ground surface (bgs) at 223 feet from the site. All documentation used in Closure Criteria Determination research is included as Attachment 4.

Table 1.				
Site Name: Rick Deckard State 25-28-4 WA 2H				
Spil	l Coordinates:	X: 32.16430	Y: -104.09560	
Site	Specific Conditions	Value	Unit	Reference
1	Depth to Groundwater	35	feet	1
2	Within 300 feet of any continuously flowing watercourse or any other significant watercourse	223	feet	2
3	Within 200 feet of any lakebed, sinkhole or playa lake (measured from the ordinary high-water mark)	8,381	feet	3
4	Within 300 feet from an occupied residence, school, hospital, institution or church	12,403	feet	4
5	i) 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, or	3,688	feet	5
	ii) Within 1000 feet of any fresh water well or spring	12,090	feet	5
6	Within incorporated municipal boundaries or within a defined municipal fresh water field covered under a municipal ordinance adopted pursuant to Section 3-27-3 NMSA 1978 as amended, unless the municipality specifically approves	No	(Y/N)	6
7	Within 300 feet of a wetland	2,300	feet	7
8	Within the area overlying a subsurface mine	No	(Y/N)	8
9	Within an unstable area (Karst Map)	Medium	Critical High Medium Low	9
10	Within a 100-year Floodplain	500	year	10
	NMAC 19.15.29.12 E (Table 1) Closure Criteria	<50'	<50' 51-100' >100'	

The closure criteria determined for the site are associated with the following constituent concentration limits as presented in Table 2.

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Table 2. Closure Criteria for Soils Impacted by a Release		
Minimum depth below any point within the horizontal boundary of the release to groundwater less than 10,000 mg/l TDS	Constituent	Limit
	Chloride	600 mg/kg
< 50 feet	TPH (GRO+DRO+MRO)	100 mg/kg
< 50 feet	ВТЕХ	50 mg/kg
	Benzene	10 mg/kg

Remedial Actions Taken

Vertex completed an initial site inspection at Rick Deckard 25-28-4 WA #2H on August 3, 2019. This site inspection identified the area of the release specified in the initial C-141 Report, estimated the approximate volume of the spill, and white lined the area required for the 811 One Call request. The area impacted by this release was determined to be approximately 79 feet long and 37 feet wide; the total affected area was determined to be 2,309 square feet. The DFR associated with the site inspection is included in Attachment 3.

Remediation efforts at the site began on August 17, 2019 and were completed on September 6, 2019. Vertex personnel supervised the excavation of impacted soils. Field screening was completed on a total of 36 sample points and consisted of analysis using a Photo Ionization Detector (volatile hydrocarbons), Dexsil Petroflag using EPA SW-846 Method 9074 (extractable hydrocarbons) and Quantabs (chlorides). These field screen results were used to differentiate areas requiring further remediation from those areas showing concentrations below determined closure criteria levels. Soils were removed, as necessary, up to a depth of 3.5 feet bgs from areas determined to have been impacted by this release. Contaminated soil was transported off-site by a licensed waste hauler for disposal at an approved waste management facility. Waste Manifests are presented in Attachment 5. Field screening results are presented in Attachment 6, as well as in the DFRs in Attachment 3.

Notification that confirmatory samples were being collected was provided to NM OCD on August 17, 2019 and is included with this report as Attachment 7. Confirmatory five-point composite samples were collected from the base and walls of the excavation such that no composite sample was representative of more than 200 square feet per the alternate sampling method outlined in Subparagraph (c) of Paragraph (1) of Subsection D of 19.15.29.12 NMAC. A total of thirty-six (36) samples, including three (3) background samples, were collected for laboratory analysis following NM OCD soil sampling procedures. Samples were submitted to Hall Environmental Analysis Laboratory under chain-of-custody protocols and analyzed using Method 300.0/9056A for chlorides, Method 8021B for volatile organics, including Benzene, Toluene, Ethyl benzene and Xylene (BTEX), and EPA Method 8015D for total petroleum hydrocarbons (TPH), including Motor Oil Range Organics (MRO), Diesel Range Organics (DRO), and Gasoline Range Organics (GRO). Laboratory results are presented in Table 3, Attachment 6 and the complete laboratory data report and chain of custody documentation can be found in Attachment 8. All confirmatory samples collected and analyzed were below closure criteria for the site.

Closure Request

The spill area was fully delineated, remediated and backfilled with local soils by September 6, 2019. Confirmatory samples were analyzed by a laboratory and found to be below allowable concentrations as per Table I of 19.15.29.12 NMAC - Closure Criteria for Soils Impacted by a Release for locations less than 50 feet to groundwater. Based on these findings, Marathon requests that this release be closed.

Should you have any questions or concerns, please do not hesitate to contact the undersigned at 505.506.0040 or ngordon@vertex.ca.

Sincerely,

Natalie Gordon PROJECT MANAGER

Attachments

Attachment 1. Site Schematic

Attachment 2. NMOCD C-141 Report

Attachment 3. Daily Field Report(s) with Photos

Attachment 4. Closure Criteria for Soils Impacted by a Release Research Determination Documentation

Attachment 5. Waste Manifest(s)

Attachment 6. Table 3 - Laboratory Results Table

Attachment 7. Confirmatory Samples

Attachment 8. Laboratory Data Reports and COCs

References

- Water Column/Average Depth to Water Report. New Mexico Water Rights Reporting System, (2019). Retrieved from http://nmwrrs.ose.state.nm.us/nmwrrs/waterColumn.html
- Assessed and Impaired Waters of New Mexico. New Mexico Department of Surface Water Quality Bureau, (2019). Retrieved from https://gis.web.env.nm.gov/oem/?map=swqb
- Interactive Geologic Map. New Mexico Bureau of Geology and Mineral Resources, (2019). Retrieved from http://geoinfo.nmt.edu
- Measured Distance from the Subject Site to Residence. Google Earth Pro, (2019). Retrieved from https://earth.google.com
- Point of Diversion Location Report. New Mexico Water Rights Reporting System, (2019). Retrieved from http://nmwrrs.ose.state.nm.us/nmwrrs/wellSurfaceDiversion.html
- Measured Distance from the Subject Site to Municipal Boundaries. Google Earth Pro, (2019). Retrieved from https://earth.google.com
- National Wetland Inventory Surface Waters and Wetland. United State Fish and Wildlife Service, (2019). Retrieved from https://www.fws.gov/wetlands/data/mapper.html
- Coal Mine Resources in New Mexico. NM Mining and Minerals Division, (2019). Retrieved from http://www.emnrd.state.nm.us/MMD/gismapminedata.html
- *New Mexico Cave/Karsts*. United States Department of the Interior, Bureau of Land Management, (2019) Retrieved from https://www.blm.gov/programs/recreation/recreation-programs/caves/new-mexico
- Flood Map Number 35015C1875D. United States Department of Homeland Security, FEMA Flood Map Service Center, (2010). Retrieved from
 - https://msc.fema.gov/portal/search?AddressQuery=malaga%20new%20mexico#searchresultsanchor
- Well Log/Meter Information Report. NM Office of the State Engineer, New Mexico Water Rights Reporting System. (2019). Retrieved from
 - http://nmwrrs.ose.state.nm.us/nmwrrs/meterReport.html
- Natural Resources and Wildlife Oil and Gas Releases. New Mexico Oil Conservation Division, (2019). Santa Fe, New Mexico.
- Soil Survey, New Mexico. United States Department of Agriculture, Soil Conservation Service in Cooperation with New Mexico Agricultural Experiment Station. (1971). Retrieved from
 - $http://www.wipp.energy.gov/library/Information_Repository_A/Supplemental_Information/Chugg\%20et\%20al\%201971\%20w-map.pdf$

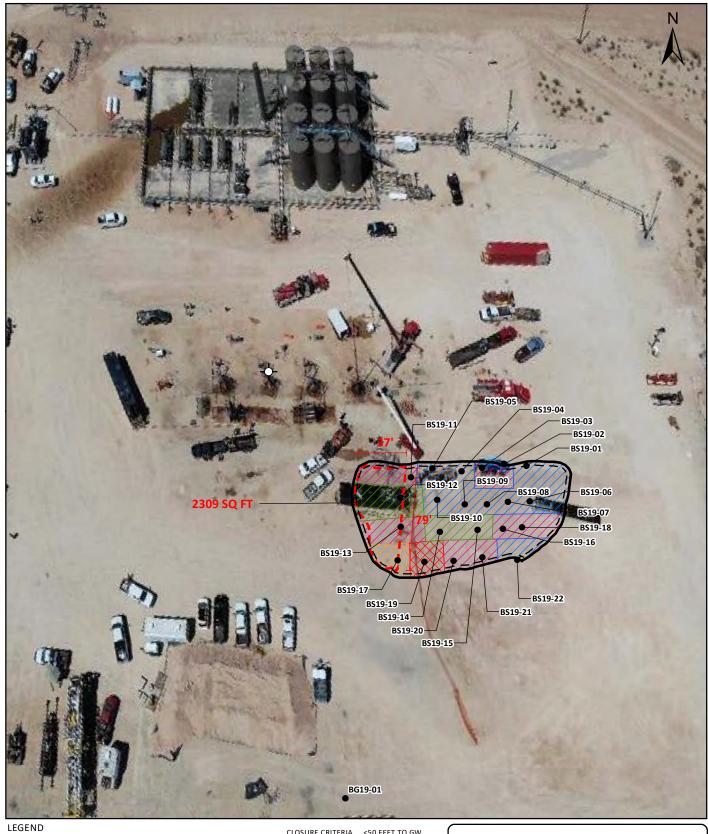
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Limitations

This report has been prepared for the sole benefit of Marathon Oil Company (Marathon). This document may not be used by any other person or entity, with the exception of the New Mexico Oil Conservation Division, without the express written consent of Vertex Resource Services Inc. (Vertex) and Marathon. Any use of this report by a third party, or any reliance on decisions made based on it, or damages suffered as a result of the use of this report are the sole responsibility of the user.

The information and conclusions contained in this report are based upon work undertaken by trained professional and technical staff in accordance with generally accepted scientific practices current at the time the work was performed. The conclusions and recommendations presented represent the best judgement of Vertex based on the data collected during the assessment. Due to the nature of the assessment and the data available, Vertex cannot warrant against undiscovered environmental liabilities. Conclusions and recommendations presented in this report should not be considered legal advice.

ATTACHMENT 1





nnts\Natasha Mocny\Projects\Marathon\Rick Deckard State 25-28-4 WA 2H\Rick Deckard State 25-28-4 Figure 5 Final.mxd

SOIL SAMPLE WELLHEAD EXCAVATION SPILL AREA

0.5' EXCAVATED DEPTH 1.0' EXCAVATED DEPTH 1.5' EXCAVATED DEPTH

2.0' EXCAVATED DEPTH 3.5' EXCAVATED DEPTH

CLOSURE CRITERIA

<50 FEET TO GW BACKGROUND BG BASE SAMPLE BS TP SS TEST PIT SURFACE SAMPLE

SCALE 1:900



Final Confirmatory Rick Deckard State 25-28-4 WA 2H



DRAWN: NM APPROVED: AH DATE: OCT 03/19

5

FIGURE:

Notes: Aerial Image from ESRI Digital Globe 2016

ATTACHMENT 2

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

Responsible Party

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	NAB1923552658
District RP	2RP-5601
Facility ID	
Application ID	pAB1923539811

Release Notification

OGRID

IGQ51-190814-C-1410

Responsible Party

Contact Name			Contact Te	Contact Telephone		
Contact email			Incident #	Incident # (assigned by OCD) NAB1923552658		
Contact maili	ng address			1		
			Location	of Release So	ource	
Latitude			(NAD 83 in dec	Longitude _cimal degrees to 5 decim	nal places)	
Site Name				Site Type		
Date Release l	Discovered			API# (if app	plicable)	
Unit Letter	Section	Township	Range	Coun	nty	
Surface Owner		Federal Tri	Nature and	l Volume of I		e volumes provided below)
Material(s) Released (Select all that apply and attach calc Crude Oil Volume Released (bbls)		calculations of specific	Volume Reco			
Produced Water Volume Released (bbls)			Volume Reco	overed (bbls)		
Is the concentration of total dissolved so in the produced water >10,000 mg/l?			Yes 1	No		
Condensat	Condensate Volume Released (bbls)			Volume Reco	overed (bbls)	
Natural Gas Volume Released (Mcf)			Volume Reco	overed (Mcf)		
Other (describe) Volume/Weight Released (provide unit		e units)	Volume/Wei	ght Recovered (provide units)		
Cause of Rele	ease					

State of New Mexico Oil Conservation Division

Incident ID	NAB1923552658
District RP	2RP-5601
Facility ID	
Application ID	pAB1923539811

Was this a major release as defined by	If YES, for what reason(s) does the respon	sible party consider this a major release?	
19.15.29.7(A) NMAC?			
☐ Yes ☐ No			
If YES, was immediate no	otice given to the OCD? By whom? To wh	om? When and by what means (phone, email, etc)?	
·			
	Initial Re	sponse	
The responsible p	party must undertake the following actions immediately	unless they could create a safety hazard that would result in injury	
☐ The source of the rele	ease has been stopped.		
☐ The impacted area ha	s been secured to protect human health and	the environment.	
Released materials ha	we been contained via the use of berms or d	ikes, absorbent pads, or other containment devices.	
All free liquids and re	ecoverable materials have been removed and	managed appropriately.	
If all the actions described	d above have <u>not</u> been undertaken, explain v	rhy:	
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:		Title:	
Signature: \(\sqrt{sa}	ac Castro	Date:	
email:		Telephone:	
OCD Only	· D	0/02/0010	
Received by:Amal	ia Bustamante	Date:	

State of New Mexico Oil Conservation Division

Incident ID	NAB1923552658
District RP	2RP-5601
Facility ID	
Application ID	pAB1923539811

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?	35 (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?	X 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 X 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 X No		
Are the lateral extents of the release within 1000 feet of any other fresh water well or spring?	Yes X No		
Are the lateral extents of the release within incorporated municipal boundaries or within a defined municipal fresh water well field?	☐ Yes X No		
Are the lateral extents of the release within 300 feet of a wetland?	Yes X No		
Are the lateral extents of the release overlying a subsurface mine?	Yes X No		
Are the lateral extents of the release overlying an unstable area such as karst geology?			
Are the lateral extents of the release within a 100-year floodplain?			
Did the release impact areas not on an exploration, development, production, or storage site?			
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 I shortery data including chain of custody			
☐ 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

Incident ID	NAB1923552658
District RP	2RP-5601
Facility ID	
Application ID	pAB1923539811

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>ISAAC CASTRO</u>	Title: ENVIRONMENTAL PROFESSIONAL		
Signature: \(\star \star \)	Date:		
email: ICASTRO@MARATHONOIL.COM .	Telephone: 575-988-0561 .		
OCD Only			
Received by:	Date:		

State of New Mexico Oil Conservation Division

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

Incident ID	NAB1923552658
District RP	2RP-5601
Facility ID	
Application ID	pAB1923539811

Remediation Plan

 ☑ Detailed description of proposed remediation technique ☑ Scaled sitemap with GPS coordinates showing delineation points ☑ Estimated volume of material to be remediated ☑ Closure criteria is to Table 1 specifications subject to 19.15.29.12(C)(4) NMAC ☑ Proposed schedule for remediation (note if remediation plan timeline is more than 90 days OCD approval is required) 			
Deferral Requests Only: Each of the following items must be con	nfirmed 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 healt	h, 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: ISAAC CASTRO	Title: ENVIRONMENTAL PROFESSIONAL		
Signature: \(\saac \) Castro	Date:		
email: <u>ICASTRO@MARATHONOIL.COM</u>	Telephone: 575-988-0561		
OCD Only			
Received by:	Date:		
Approved	Approval		
Signature:	<u>Date:</u>		

State of New Mexico Oil Conservation Division

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

Incident ID	NAB1923552658
District RP	2RP-5601
Facility ID	
Application ID	pAB1923539811

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.

A scaled site and sampling diagram as described in 19.15.29	2.11 NMAC
Photographs of the remediated site prior to backfill or photomust be notified 2 days prior to liner inspection)	os of the liner integrity if applicable (Note: appropriate OCD District office
☐ Laboratory analyses of final sampling (Note: appropriate OI	OC District office must be notified 2 days prior to final sampling)
Description of remediation activities	
and regulations all operators are required to report and/or file certa may endanger public health or the environment. The acceptance of should their operations have failed to adequately investigate and re human health or the environment. In addition, OCD acceptance of compliance with any other federal, state, or local laws and/or regu	Title: ENVIRONMENTAL PROFESSIONAL
email: ICASTRO@MARATHONOIL.COM	
OCD Only	
Received by:	Date:
	by of liability should their operations have failed to adequately investigate and e water, human health, or the environment nor does not relieve the responsible d/or regulations.
Closure Approved by:	Date:
Printed Name:	Title:

8/14/2019

State of New Mexico Energy, Minerals and Natural Resources Department Oil Conservation Division

Receipt of Fee Application Payment



PO Number: IGQ51-190814-C-1410

Payment Date:

8/14/2019 3:03:19 PM

Payment Amount:

\$150.00

Payment Type:

Credit Card

Application Type:

Application for administrative approval of a release notification and corrective action.

Fee Amount:

\$150.00

Application Status:

Under OCD Review

OGRID:

372098

First Name:

Isaac

Last Name:

Castro

Email:

icastro@marathonoil.com

IMPORTANT: If you are mailing or delivering your application, you must print and include your receipt of payment as the first page on your application. All mailed and delivered applications must be sent to the following address: 1220 S. St. Francis Dr., Santa Fe, NM 87505. For inquiries, reference the PO Number listed above.

ATTACHMENT 3



Client: Marathon Oil Permian LLC Inspection Date: 8/3/2019

Site Location Name: Rick Decard State 25-28-4 Report Run Date: 8/3/2019 7:46 PM

WA #2H

Project Owner: Isaac Castro File (Project) #: 19E-00614

Project Manager: Dennis Williams API #: 30-015-45344

Client Contact Name: Callie Karrigan Reference AST Tank Spill

Client Contact Phone #: (405) 202-1028

Left Office 8/3/2019 10:45 AM
Arrived at Site 8/3/2019 12:15 PM

Departed Site 8/3/2019 12:38 PM

Returned to Office 8/3/2019 1:30 PM

Summary of Daily Operations

12:21 Fill out arrival and safety forms

Map spill and take pictures

Fill out DFR

Return to office

Next Steps & Recommendations

1 Begin remediation



Site Photos

Viewing Direction: Southeast



Spill area

area



Viewing Direction: North



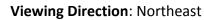
Spill area

Viewing Direction: North



Spill area











Spill area



Daily Site Visit Signature

Inspector: Jason Crabtree

Signature:



Client: Marathon Oil Permian LLC Inspection Date: 8/17/2019

Site Location Name: Rick Decard State 25-28-4 Report Run Date: 8/18/2019 1:15 AM

WA #2H

Project Owner: Isaac Castro File (Project) #: 19E-00614

Project Manager: Dennis Williams API #: 30-015-45344

Client Contact Name: Isaac Castro Reference AST Tank Spill

Client Contact Phone #: (575) 988-0561

Summary of Times

Left Office 8/17/2019 7:35 AM

Arrived at Site 8/17/2019 8:15 AM

Departed Site 8/17/2019 5:53 PM

Returned to Office 8/17/2019 6:39 PM

Summary of Daily Operations

9:51 Arrive on site.

Complete safety paperwork.

Obtain background samples and begin excavation.

Complete DFR.

Return to office.

Next Steps & Recommendations

- 1 Continue excavation
- 2 Continue field screening
- 3 Schedule haul away of contaminated material

Sampling



	kground19-(N4	 						VERTEX
Басі	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	O ft.	0.4 ppm	12 ppm	Low (30-600 ppm)	32 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	/	32.163795, - 104.095030	Yes
	1 ft.	1.1 ppm	23 ppm	Low (30-600 ppm)	32 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.163795, - 104.095030	Yes
	2 ft.	1.2 ppm	27 ppm	Low (30-600 ppm)	0 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.163795, - 104.095030	Yes
ES-E	Base19-01								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	0.5 ft.	0.5 ppm	3 ppm	Low (30-600 ppm)	241 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	/	32.164078, - 104.094889	Yes
ES-E	Base19-02								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	0.5 ft.	0.9 ppm	22 ppm	Low (30-600 ppm)	436 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	/	32.164048, - 104.094825	Yes



ES-E	Base19-03								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	0.5 ft.	0.8 ppm	21 ppm	Low (30-600 ppm)	337 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16408, - 104.09495	Yes
ES-E	Base19-04								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	0.5 ft.	1.5 ppm	59 ppm	Low (30-600 ppm)	241 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16407, - 104.09502	Yes
ES-E	Base19-05								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	0.5 ft.	0.7 ppm	47 ppm	Low (30-600 ppm)	316 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	/	32.16408, - 104.09506	Yes



Site Photos

Viewing Direction: North



Background sample at 0', 1' and 2'

id sample at 0,1 and 2

Viewing Direction: East



Spill area under tank

Viewing Direction: East



Spill area under tank

Viewing Direction: Southeast



Spill area under tank



Viewing Direction: East



Spill area under tank



Spill area under tank



Excavated area



Excavated area





Viewing Direction: Southwest Excavated area

Excavated area





Excavated area





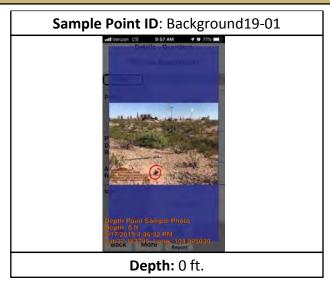


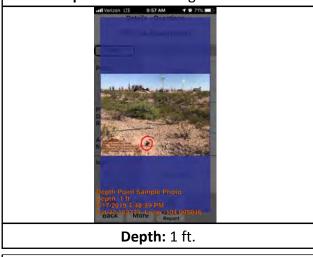


Excavated area

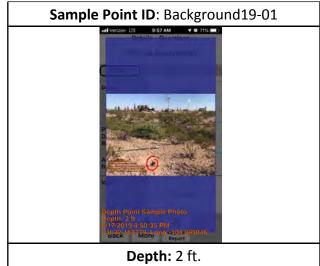


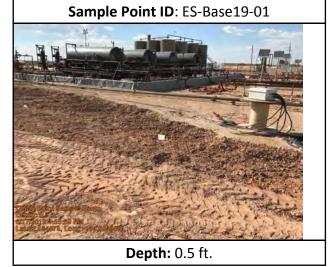
Depth Sample Photos





Sample Point ID: Background19-01



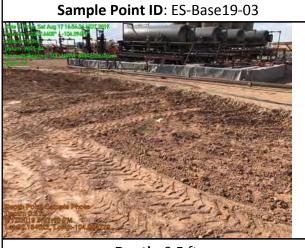




Sample Point ID: ES-Base19-02



Depth: 0.5 ft.



Depth: 0.5 ft.

Sample Point ID: ES-Base19-04



Depth: 0.5 ft.

Sample Point ID: ES-Base19-05



Depth: 0.5 ft.



Daily Site Visit Signature

Inspector: Austin Harris

Signature:



Client: Marathon Oil Permian LLC Inspection Date: 8/18/2019

Site Location Name: Rick Decard State 25-28-4 Report Run Date: 8/19/2019 1:32 AM

WA #2H

Project Owner: Isaac Castro File (Project) #: 19E-00614

Project Manager: Dennis Williams API #: 30-015-45344

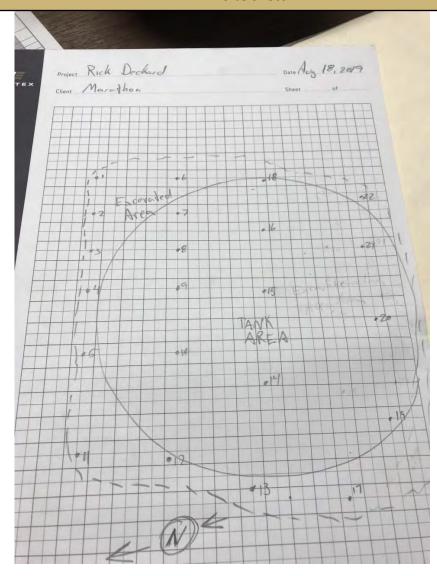
Client Contact Name: Isaac Castro Reference AST Tank

Client Contact Phone #: (575) 988-0561

	Summary of Times							
Left Office	8/18/2019 7:00 AM							
Arrived at Site	8/18/2019 7:36 AM							
Departed Site	8/18/2019 6:11 PM							
Returned to Office	8/18/2019 6:50 PM							



Site Sketch





Summary of Daily Operations

7:37 Arrive on site.

Complete safety paperwork.

Continue excavation and field screening.

Complete DFR.

Return to office.

Next Steps & Recommendations

- 1 Schedule backfill and contaminant haul away
- 2 Closure report

	Sampling											
ES-E	ES-Base19-06											
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?			
	0.5 ft.	0.3 ppm	42 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	>	32.16397, - 104.09483	Yes			
ES-E	Base19-07											
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?			
	0.5 ft.	5.5 ppm	72 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	<	32.16403, - 104.09489	Yes			



S-Base19-0	8							
Depth	ft VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch
0.5 ft	. 0.8 ppm	85 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16404, - 104.09494	Yes
S-Base19-0	9							
Depth	ft VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
0.5 ft	. 0 ppm	36 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16400, - 104.09503	Yes
S-Base19-1	0							
Depth	ft VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
0.5 ft	. 1.3 ppm	40 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16406, - 104.09513	Yes
S-Base19-1	1							
Depth	ft VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
1 ft.	0.9 ppm	33 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16403, - 104.09515	Yes



ES-E	Base19-12								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1 ft.	2.1 ppm	58 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16403, - 104.09520	Yes
ES-E	Base19-13								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1 ft.	1.5 ppm	42 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16394, - 104.09513	Yes
ES-E	Base19-14								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1 ft.	1.1 ppm	65 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16394, - 104.09530	Yes
ES-E	Base19-15								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1 ft.	0.9 ppm	63 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16395, - 104.09529	Yes



ES-Ba	ase19-16								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	0.5 ft.	0.4 ppm	60 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16398, - 104.09511	Yes
ES-Ba	Base19-17								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1 ft.	1.5 ppm	50 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16393, - 104.09529	Yes
ES-Ba	ase19-18								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	0.5 ft.	0.4 ppm	50 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16396, - 104.09509	Yes
ES-Ba	ase19-19								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	3 ft.	0.5 ppm	88 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	/	32.16390, - 104.09518	Yes



ES-E	Base19-20											
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?			
	0.5 ft.	0.3 ppm	58 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16389, - 104.09507	Yes			
ES-E	ES-Base19-21											
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?			
	0.5 ft. 0.4 ppm		38 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16395, - 104.09510	Yes			
ES-E	Base19-22											
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?			
	0.5 ft.	0.3 ppm	66 ppm	Low (30-600 ppm)	600 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16383, - 104.09492	Yes			



Site Photos

Viewing Direction: Northeast



Excavated area

xcavated area





Excavated area

Viewing Direction: East



Excavated area

Viewing Direction: Northeast



Excavated area



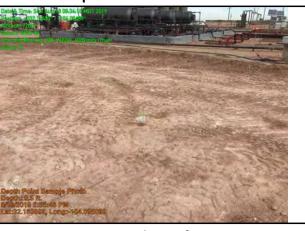
Depth Sample Photos

Sample Point ID: ES-Base19-06



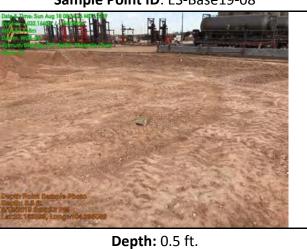
Depth: 0.5 ft.

Sample Point ID: ES-Base19-07



Depth: 0.5 ft.

Sample Point ID: ES-Base19-08



Sample Point ID: ES-Base19-09

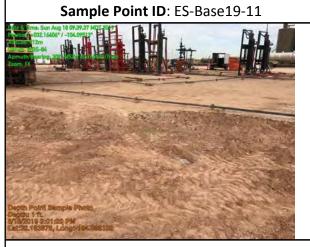


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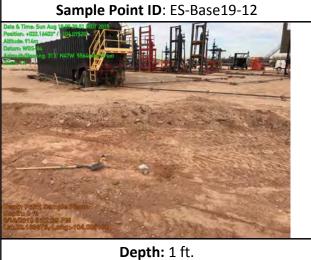


Sample Point ID: ES-Base19-10

Depth: 0.5 ft.



Depth: 1 ft.



Sample Point ID: ES-Base19-13

Septim Follow Grantia Points

Depth: 1 ft.

Run on 8/19/2019 1:32 AM UTC Powered by www.krinkleldar.com Page 10 of 14

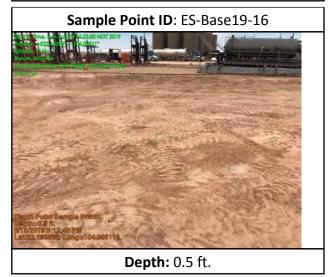


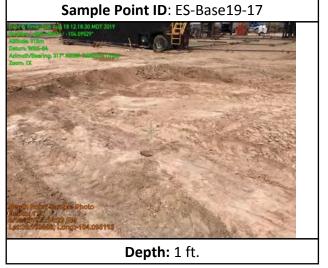
Depth: 1 ft.

Sample Point ID: ES-Base19-15

Depth Point Dample Photo
Depth: 1

Text 2 - Through Photo
Depth: 1 ft.



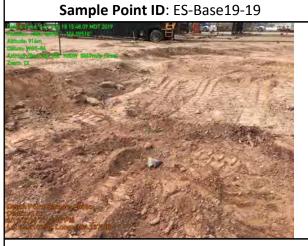




Sample Point ID: ES-Base19-18



Depth: 0.5 ft.

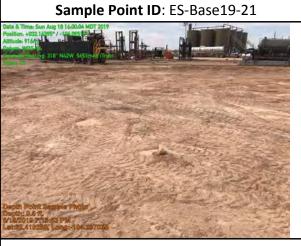


Depth: 3 ft.

Sample Point ID: ES-Base19-20

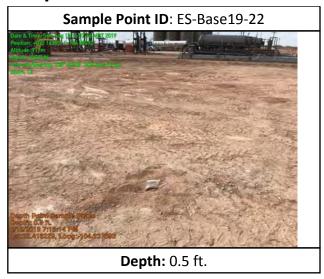


Depth: 0.5 ft.



Depth: 0.5 ft.







Daily Site Visit Signature

Inspector: Austin Harris

Signature:



Client: Marathon Oil Permian LLC Inspection Date: 8/19/2019

Site Location Name: Rick Decard State 25-28-4 Report Run Date: 8/20/2019 12:51 AM

WA #2H

Project Owner: Isaac Castro File (Project) #: 19E-00614

Project Manager: Dennis Williams API #: 30-015-45344

Client Contact Name: Isaac Castro Reference AST Tank Spill

Client Contact Phone #: (575) 988-0561

Summary of Times

Left Office 8/19/2019 11:15 AM

Arrived at Site 8/19/2019 11:38 AM

Departed Site 8/19/2019 1:07 PM

Returned to Office 8/19/2019 1:49 PM

Summary of Daily Operations

11:43 Arrive on site.

Complete safety paperwork.

Obtain confirmatory samples.

Complete DFR.

Return to office.

Next Steps & Recommendations

1



Daily Site Visit Signature

Inspector: Austin Harris

Signature:



Client: Marathon Oil Permian LLC Inspection Date: 8/23/2019

Site Location Name: Rick Decard State 25-28-4 Report Run Date: 8/26/2019 3:09 PM

WA #2H

Project Owner: Isaac Castro File (Project) #: 19E-00614

Project Manager: Dennis Williams API #: 30-015-45344

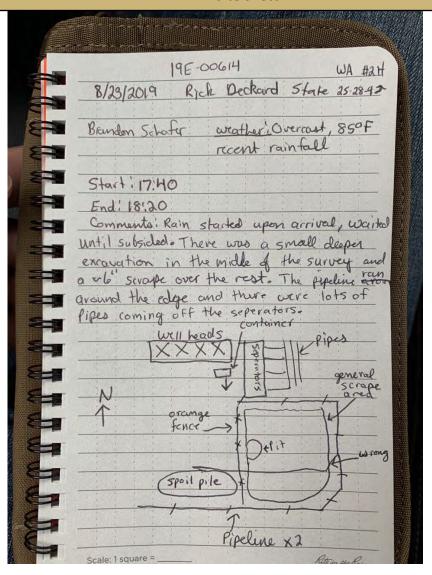
Client Contact Name: Isaac Castro Reference AST Tank

Client Contact Phone #: (575) 988-0561

	Summary of Times
Left Office	8/23/2019 4:15 PM
Arrived at Site	8/23/2019 4:50 PM
Departed Site	8/23/2019 6:30 PM
Returned to Office	8/23/2019 7:15 PM



Site Sketch





Summary of Daily Operations

17:16 EM Survey

Next Steps & Recommendations

1



Site Photos



Overview of survey area







Daily Site Visit Signature

Inspector: Brandon Schafer

Signature: Signature



Client: Marathon Oil Permian LLC Inspection Date: 8/24/2019

Site Location Name: Rick Decard State 25-28-4 Report Run Date: 8/24/2019 10:32 PM

WA #2H

Project Owner: Isaac Castro File (Project) #: 19E-00614

Project Manager: Dennis Williams API #: 30-015-45344

Client Contact Name: Isaac Castro Reference AST Tank

Client Contact Phone #: (575) 988-0561

Summary of Times

Left Office 8/24/2019 7:30 AM

Arrived at Site 8/24/2019 8:22 AM

Departed Site 8/24/2019 2:35 PM

Returned to Office 8/24/2019 3:21 PM

Summary of Daily Operations

8:25 Arrive on site.

Complete safety paperwork.

Field screen and I btain confirmatory samples.

Complete DFR.

Return to office.

Next Steps & Recommendations

- 1 Send samples to lab and confirm criterias are met
- 2 Schedule backfill and contaminant haul out

Sampling



ES-B	Base19-02								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1 ft.	0 ppm	0 ppm	Low (30-600 ppm)	32 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16480, - 104.09495	Yes
ES-B	Base19-12								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1.5 ft.	0 ppm	0 ppm	Low (30-600 ppm)	172 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	/	32.16405, - 104.09518	Yes
ES-B	Base19-14								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1.5 ft.	0 ppm	0 ppm	Low (30-600 ppm)	219 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16397, - 104.09521	Yes
ES-B	ase19-15								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1.5 ft.	0 ppm	0 ppm	Low (30-600 ppm)	393 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	/	32.16396, - 104.09521	Yes



ES-B	Base19-16								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	1 ft.	0 ppm	0 ppm	Low (30-600 ppm)	0.1 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16397, - 104.09514	Yes
ES-B	-Base19-17								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	2 ft.	0 ppm	0 ppm	Low (30-600 ppm)	88 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	/	32.16396, - 104.09519	Yes
ES-B	Base19-18								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis Pic		Trimble Location	Marked On Site Sketch?
	1 ft.	0 ppm	0 ppm	Low (30-600 ppm)	219 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 CI), TPH (EPA SW-846 Method 8015M)	/	32.16398, - 104.09509	Yes
ES-B	Base19-19								
	Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
	3.5 ft.	0 ppm	0 ppm	Low (30-600 ppm)	295 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	/	32.16396, - 104.09518	Yes



ES-Base1	9-20
----------	------

Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
1 ft.	0 ppm	0 ppm	Low (30-600 ppm)	317 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	>	32.16389, - 104.09517	Yes

ES-Base19-21

Depth ft	VOC PID	Petro Flag TPH ppm	Quantab Range ppm	Quantab Reading ppm	Lab Analysis	Picture	Trimble Location	Marked On Site Sketch?
1 ft.	0 ppm	0 ppm	Low (30-600 ppm)	38 ppm	BTEX (EPA SW-846 Method 8021B/8260B), Chloride (SW- 4500 Cl), TPH (EPA SW-846 Method 8015M)	\	32.16391, - 104.09508	Yes



Site Photos

Viewing Direction: East



Excavated area

Viewing Direction: North



Excavated area

Viewing Direction: Southeast



Excavated area

Viewing Direction: West



Contaminant pile





Contaminant pile



Contaminant pile







Run on 8/24/2019 10:32 PM UTC Powered by www.krinkleldar.com Page 6 of 10



Depth Sample Photos

Sample Point ID: ES-Base19-02



Depth: 1 ft.

Sample Point ID: ES-Base19-12



Depth: 1.5 ft.

Sample Point ID: ES-Base19-14



Depth: 1.5 ft.

Sample Point ID: ES-Base19-15

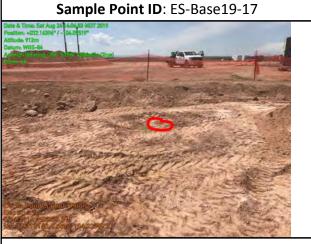


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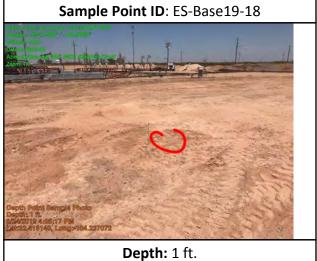


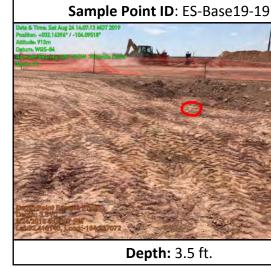
Sample Point ID: ES-Base19-16

Depth: 1 ft.

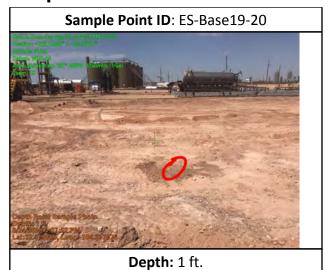


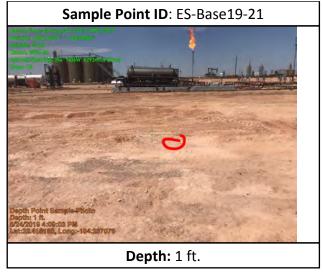
Depth: 2 ft.













Daily Site Visit Signature

Inspector: Austin Harris

Signature:



Client: Marathon Oil Permian LLC Inspection Date: 9/5/2019

Site Location Name: Rick Decard State 25-28-4 Report Run Date: 9/8/2019 2:43 AM

WA #2H

Project Owner: Isaac Castro File (Project) #: 19E-00614

Project Manager: Dennis Williams API #: 30-015-45344

Client Contact Name: Isaac Castro Reference 2019 Spill Projects

Client Contact Phone #: (575) 988-0561

	Summary of Times
Left Office	9/5/2019 6:57 AM
Arrived at Site	9/5/2019 7:20 AM
Departed Site	9/5/2019 8:29 PM
Returned to Office	9/5/2019 9:10 PM

Summary of Daily Operations

7:33 Load and haul contaminated soil offsite.

Next Steps & Recommendations

1



Site Photos

Viewing Direction: North



Excavation before any backfill.

Viewing Direction: North



Excavation partially filled.

Viewing Direction: North



Excavated contaminated soil pile - Midday.

Viewing Direction: North



Remaining soil pile.



Daily Site Visit Signature

Inspector: Sharlene Harvester

Signature:



Client: Marathon Oil Permian LLC Inspection Date: 9/6/2019

Site Location Name: Rick Decard State 25-28-4 Report Run Date: 10/7/2019 2:19 PM

WA #2H

Project Owner: Isaac Castro File (Project) #: 19E-00614

Project Manager: Dennis Williams API #: 30-015-45344

Client Contact Name: Isaac Castro Reference 2019 Spill Projects

Client Contact Phone #: (575) 988-0561

	Summary of Times										
Left Office	9/6/2019 9:15 AM										
Arrived at Site	9/6/2019 9:30 AM										
Departed Site	9/6/2019 7:00 PM										
Returned to Office	9/6/2019 7:45 PM										

Summary of Daily Operations

9:54 Load and haul out contaminated soil; load in and spread clean fill.

Next Steps & Recommendations

1



Site Photos



Excavation- partially filled.



Remaining soil pile



Daily Site Visit Signature

Inspector: Sharlene Harvester

Signature:

ATTACHMENT 4



New Mexico Office of the State Engineer

Active & Inactive Points of Diversion

(with Ownership Information)

(R=POD has been replaced

and no longer serves this file, (quarters are 1=NW 2=NE 3=SW 4=SE)

(acre ft per annum) C=the file is closed) (quarters are smallest to largest) (NAD83 UTM in meters)

	Sub					Well			qqq				
WR File Nbr	basin	Use Dive	rsion Owner	County	POD Number	Tag	Code Grant	Sourc	e 6416 4 Se	c Tws Rng	Х	Υ	Distance
<u>C 01411</u>	С	STK	3 JIMMIE COOKSEY	ED	C 01411			Sha ll d	w 4 4 2 04	25S 28E	586289	3558522*	1124
C 02668	С	STK	0 G A GUNN	ED	<u>C 02668</u>				2 1 2 09	9 25S 28E	585890	3557525*	1603
C 02690	С	STK	0 EVELYN COOKSEY	ED	C 02690				2 3 0	5 25S 28E	583745	3558219*	1719
C 03989	CUB	EXP	0 RUSTLER HILLS II LTD	ED	C 03989 POD1		NON	Sha ll d	w 4 2 2 33	3 24S 28E	586341	3560573	1896
C 03988	CUB	EXP	0 RUSTLER HILLS II LTD	ED	C 03988 POD1	NA	NON	Sha ll d	w 4 4 4 28	3 24S 28E	586303	3561087	2322
C 04025	CUB	EXP	0 SCOTT BRANSON	ED	C 04025 POD1			Sha ll d	w 4 3 3 27	24S 28E	586699	3560964	2422
C 04073	С	PRO	0 MESQUITE SWD INC	ED	C 04025 POD1			Sha ll d	w 4 3 3 27	24S 28E	586699	3560964	2422
<u>C 04074</u>	С	PRO	0 MESQUITE SWD INC	ED	C 04025 POD1			Sha ll d	w 4 3 3 27	7 24S 28E	586699	3560964	2422
<u>C 04075</u>	С	PRO	0 MESQUITE SWD INC	ED	C 04025 POD1			Sha ll d	w 4 3 3 27	7 24S 28E	586699	3560964	2422
C 04222	CUB	EXP	0 VL FRESH WATER LLC	ED	C 04222 POD1	NA		Sha ll d	w 133 27	7 24S 28E	586406	3561228	2494
<u>C 01433</u>	С	PUB	0 NM STATE HWY DEPT.	ED	<u>C 01433</u>				3 4 10	25S 28E	587436	3556238*	3511
<u>C 00423</u>	С	STK	3 C. P. PARDUE & SONS	ED	<u>C 00423</u>			Sha ll d	w 4 1 4 30	24S 28E	582611	3561363*	3556
<u>C 03669</u>	С	SAN	0 CRESTWOOD NEW MEXICO PIPELINES	ED	C 03669				1 2 2 29	9 24S 28E	584389	3562486	3591
			THE ELINEO	ED	C 03669 POD1				1 2 2 29	9 24S 28E	584389	3562486	3591
C 03263	CUB	PLS	3 CLARAMAI R HAYHURST	ED	C 03263 POD1				1 1 1 0	25S 28E	581628	3557501*	3944
<u>C 01264</u>	CUB	EXP	0 GUY A. REED	ED	C 03358 POD1			Sha ll d	w 1 4 1 26	3 24S 28E	588416	3562116	4420
C 03358	С	STK	3 VALERIE BRANSON	ED	C 03358 POD1			Sha ll d	w 1 4 1 26	3 24S 28E	588416	3562116	4420
C 03359	С	PRO	0 CORKY GLENN	ED	C 03358 POD1			Shallo	w 1 4 1 26	3 24S 28E	588416	3562116	4420

*UTM location was derived from PLSS - see Help

(R=POD has been replaced

and no longer serves this file, (quarters are 1=NW 2=NE 3=SW 4=SE)

(NAD83 UTM in meters) C=the file is closed) (quarters are smallest to largest)

Shallow 2 4 1 26 24S 28E

(acre ft per annum) Sub Well qqq WR File Nbr **County POD Number** Υ basin Use Diversion Owner Tag Code Grant Source 6416 4 Sec Tws Rng Х Distance PRO 588416 3562116 C 03376 С 0 RIO TANKS FASLINE INC C 03358 POD1 Shallow 1 4 1 26 24S 28E 4420 C 03391 С **PRO** 0 RIO TANKS FASLINE INC. C 03358 POD1 Shallow 1 4 1 26 24S 28E 588416 3562116 4420 C 03485 С PRO 0 SCOTT BRANSON Shallow 1 4 1 26 24S 28E 588416 ED C 03358 POD1 3562116 4420 C 03486 С **PRO** 0 SCOTT BRANSON ED C 03358 POD1 Shallow 1 4 1 26 24S 28E 588416 3562116 4420 C 03487 PRO 0 SCOTT BRANSON C 03358 POD1 Shallow 1 4 1 26 24S 28E 588416 3562116 4420 С **PRO** 0 CONCHO OIL & GAS C 03742 ED C 03358 POD1 Shallow 1 4 1 26 24S 28E 588416 3562116 4420 C 03743 С PRO 0 CONCHO OIL & GAS ED C 03358 POD1 Shallow 1 4 1 26 24S 28E 588416 3562116 4420 C 03744 PRO 0 CONCHO OIL & GAS C 03358 POD1 Shallow 1 4 1 26 24S 28E 588416 3562116 4420 CUB EXP C 04181 0 SCOTT BRANSON ED C 04181 POD1 NA Shallow 3 2 1 26 24S 28E 588450 3562146 4466 C 04181 POD2 Shallow 3 2 1 26 24S 28E 588393 4473 ED 3562212 C 01265 CUB EXP 0 GUY A. REED ED C 03423 Shallow 2 4 1 26 24S 28E 588786 3561952 4584 PRO **0 NEARBURG PRODUCTING** C 03158 ED C 03423 Shallow 2 4 1 26 24S 28E 588786 3561952 4584 C 03250 С PRO 0 PATTERSON DRILLING C 03423 Shallow 2 4 1 26 24S 28E 588786 4584 ED 3561952 COMPANY C 03315 **PRO** 0 CORKY GLENN ED C 03423 Shallow 2 4 1 26 24S 28E 4584 588786 3561952 C 03423 С STK 3 SCOTT BRANSON ED C 03423 Shallow 2 4 1 26 24S 28E 588786 3561952 4584 С PRO 0 BOBCO PRODUCTION CO C 03425 ED C 03423 Shallow 2 4 1 26 24S 28E 588786 3561952 4584 C 03466 PRO 0 O.G.X. RESOURCES ED C 03423 Shallow 2 4 1 26 24S 28E 588786 3561952 4584 С PRO 0 SCOTT BRANSON Shallow 2 4 1 26 24S 28E C 03473 ED C 03423 588786 3561952 4584 C 03474 С PRO 0 SCOTT BRANSON ED C 03423 Shallow 2 4 1 26 24S 28E 588786 3561952 4584 C 03475 С PRO 0 SCOTT BRANSON ED C 03423 Shallow 2 4 1 26 24S 28E 588786 3561952 4584 С C 03683 **PRO** 0 SCOTT BRANSON ED C 03423 Shallow 2 4 1 26 24S 28E 588786 3561952 4584

С

PRO

0 SCOTT BRANSON

C 03685

ED

C 03423

3561952

4584

588786

(R=POD has been replaced

and no longer serves this file, (quarters are 1=NW 2=NE 3=SW 4=SE)

C=the file is closed)

(quarters are smallest to largest) (NAD83 UTM in meters)

						,	(-1				•	•	
	Sub				Well			qqq	ı				
WR File Nbr	basin Use Diversio	n Owner	County	POD Number	Tag	Code Grant	Source	6416 4	Sec	Tws Rng	Х	Υ	Distance
<u>C 04151</u>	CUB EXP	0 VL FRESH WATER LLC	ED	C 04151 POD1	NA		Sha ll ow	421	26	24S 28E	588584	3562192	4594
<u>C 00394</u>	CUB CLS	0 DEKALB AGRIGULTURAL ASSN.	ED	<u>C 00394</u>		С		4 2	2 21	24S 28E	586116	3563545*	4616
C 04294	CUB MON	0 EMERGENCY ENVIROMENTAL SERV	ED	C 04294 POD1	NA			4 3 3	3 23	24S 28E	588169	3562646	4651
C 04222	CUB EXP	0 VL FRESH WATER LLC	ED	C 04222 POD2	NA		Shallow	1 2 4	22	24S 28E	587707	3563255	4897

Record Count: 44

UTMNAD83 Radius Search (in meters):

(acre ft per annum)

Easting (X): 585274.28 Northing (Y): 3559005.64 Radius: 5000

Sorted by: Distance

*UTM location was derived from PLSS - see Help



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

(A CLW##### in the POD suffix indicates the POD has been replaced & no longer serves a water right file.) (R=POD has been replaced, O=orphaned, C=the file is

closed)

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

(quarters are smallest to largest) (NAD83 UTM in meters)

(In feet)

	POD Sub-		0	Q (n							Donth	Donth	Water
POD Number	Code basin	County		-	-	Sec '	Tws	Rng	Х	Υ	Distance			Column
C 01411	С	ED	4	4	2	04	25S	28E	586289	3558522*	1124	69	35	34
C 02668	С	ED	2	1	2	09	25S	28E	585890	3557525*	1603	150		
C 03989 POD1	CUB	ED	4	2	2	33	24S	28E	586342	3560573	1896	100	70	30
C 03988 POD1	CUB	ED	4	4	4	28	24S	28E	586303	3561087	2322	110	95	15
C 04025 POD1	CUB	ED	4	3	3	27	24S	28E	586700	3560964 🌑	2422	190	90	100
C 04222 POD1	CUB	ED	1	3	3	27	24S	28E	586406	3561228	2494	140	35	105
C 03263 POD1	CUB	ED	1	1	1	07	25S	28E	581628	3557501*	3944	133		
C 03358 POD1	CUB	ED	1	4	1	26	24S	28E	588416	3562116	4420	135		
C 04181 POD1	CUB	ED	3	2	1	26	24S	28E	588450	3562146	4466	280	56	224
C 04181 POD2	С	ED	3	2	1	26	24S	28E	588393	3562212 🌑	4473	80	56	24
C 03423	CUB	ED	2	4	1	26	24S	28E	588786	3561952	4584	126		
C 04151 POD1	CUB	ED	4	2	1	26	24S	28E	588584	3562192	4594	280	65	215
C 04294 POD1	CUB	ED	4	3	3	23	24S	28E	588169	3562646	4651	60		
C 04222 POD2	CUB	ED	1	2	4	22	24S	28E	587707	3563255	4897	100	40	60

Average Depth to Water: 60 feet

DEPTH TO WATER

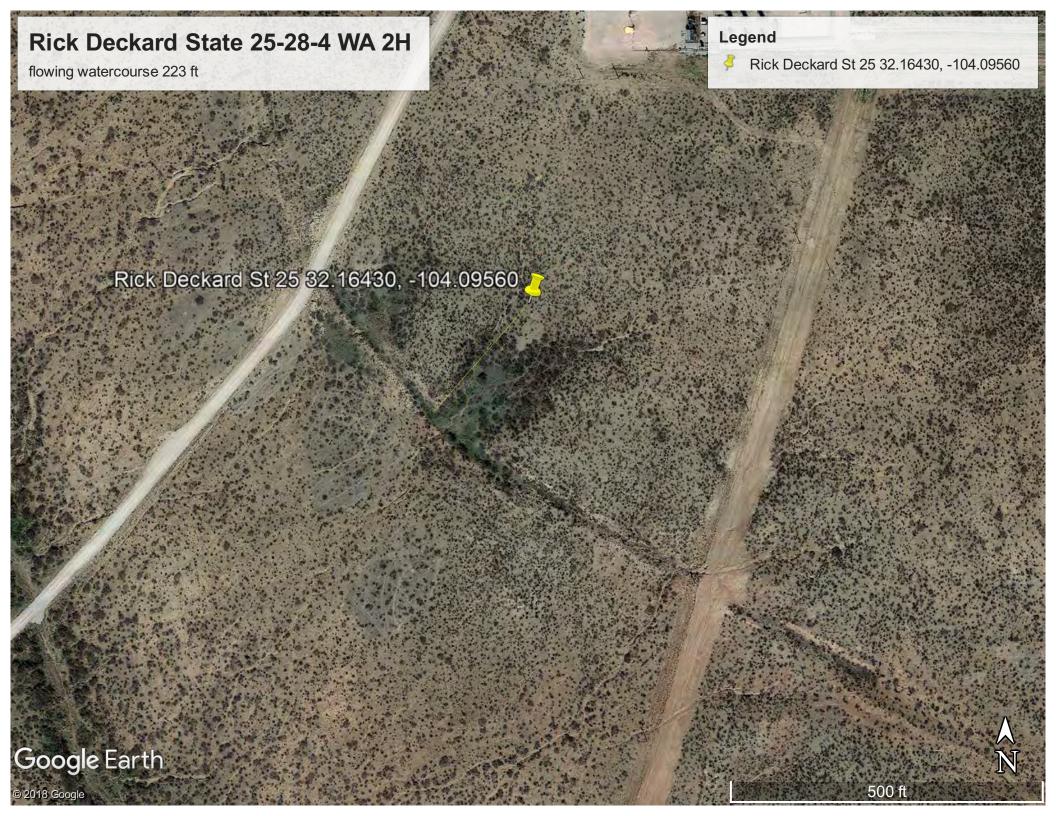
Minimum Depth: 35 feet

Maximum Depth: 95 feet

Record Count: 14

UTMNAD83 Radius Search (in meters):

Easting (X): 585274.28 **Northing (Y):** 3559005.64 **Radius:** 5000



Rick Deckard State 2H 8,381 ft Lake



August 5, 2019

Wetlands

Estuarine and Marine Deepwater

Estuarine and Marine Wetland

Freshwater Emergent Wetland

Freshwater Forested/Shrub Wetland

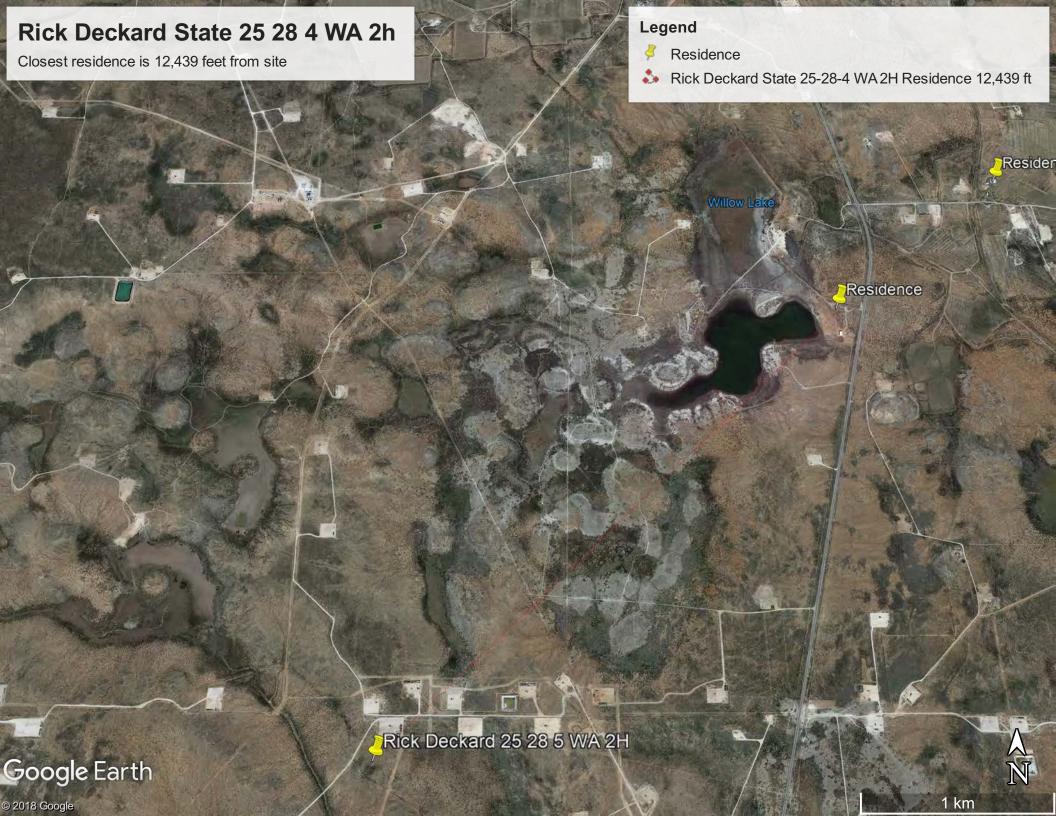
Freshwater Pond

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.





New Mexico Office of the State Engineer Wells with Well Log Information

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

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

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

(quarters are smallest to largest)

(NAD83 UTM in meters)

(in feet)

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	POD Sub-			q q q									Log File	Depth	•		License
POD Number	Code basin C	ounty	Source	6416 4	Sec	Tws R	Rng	Х	Υ	Distance	Start Date	Finish Date	Date	Well	Water	Driller	Number
<u>C 01411</u>	С	ED	Shallow	4 4 2	04	25S 2	.8E 5	86289	3558522*	1124	10/07/1969	10/15/1969	10/20/1969	69	35	WHITE, QUINCE L.	439
C 02668	С	ED		2 1 2	09	25S 2	28E 5	85890	3557525*	1603	11/08/1999	11/08/1999	11/23/1999	150		CONES, RICKEY	399
C 03989 POD1	CUB	ED	Shallow	4 2 2	33	24S 2	28E 5	86342	3560573	1896	01/12/2017	01/13/2017	01/16/2017	100	70	MALEY, JASON	1690
C 03988 POD1	CUB	ED	Shallow	4 4 4	28	24S 2	.8E 5	86303	3561087	2322	12/05/2016	12/20/2016	12/20/2016	110	95	MALEY, JASON	1690
C 04025 POD1	CUB	ED	Shallow	4 3 3	27	24S 2	.8E 5	86700	3560964	2422	04/25/2017	04/26/2017	05/16/2017	190	90	STEWART, JOEL H.	331
C 04222 POD1	CUB	ED	Shallow	1 3 3	27	24S 2	28E 5	86406	3561228	2494	05/27/2018	05/28/2018	07/05/2018	140	35	BRYCE WALLACE	1706
C 00423	С	ED	Shallow	4 1 4	30	24S 2	?8E 5	82611	3561363*	3556			05/29/1953			HOWARD HEMLER	
C 03358 POD1	CUB	ED	Shallow	1 4 1	26	24S 2	?8E 5	88416	3562116	4420	04/01/2014	04/06/2014	04/11/2014	135		RICHARD CARTER	1229
C 04181 POD1	CUB	ED	Shallow	3 2 1	26	24S 2	28E 5	88450	3562146	4466	01/10/2018	01/12/2018	01/31/2018	280	56	WALLACE, BRYCE J.	1706
C 04181 POD2	С	ED	Shallow	3 2 1	26	24S 2	.8E 5	88393	3562212	4473	05/30/2018	06/01/2018	08/15/2018	80	56	WALLACE, BRYCE J.	1706
C 03423	CUB	ED	Shallow	2 4 1	26	24S 2	.8E 5	88786	3561952	4584		12/06/1965	12/07/1965	126		A.M. BRININSTOOL	410
C 04151 POD1	CUB	ED	Shallow	4 2 1	26	24S 2	.8E 5	88584	3562192	4594	01/03/2018	01/06/2018	01/31/2018	280	65	WALLACE, BRYCE J.	1706
C 04294 POD1	CUB	ED		4 3 3	23	24S 2	?8E 5	88169	3562646	4651	12/07/2018	12/08/2018	12/20/2018	60		MANN, TRAVIS	1778
C 04222 POD2	CUB	ED	Sha ll ow	1 2 4	22	24S 2	28E 5	87707	3563255	4897	05/29/2018	05/30/2018	07/05/2018	100	40	BRYCE WALLACE	1706

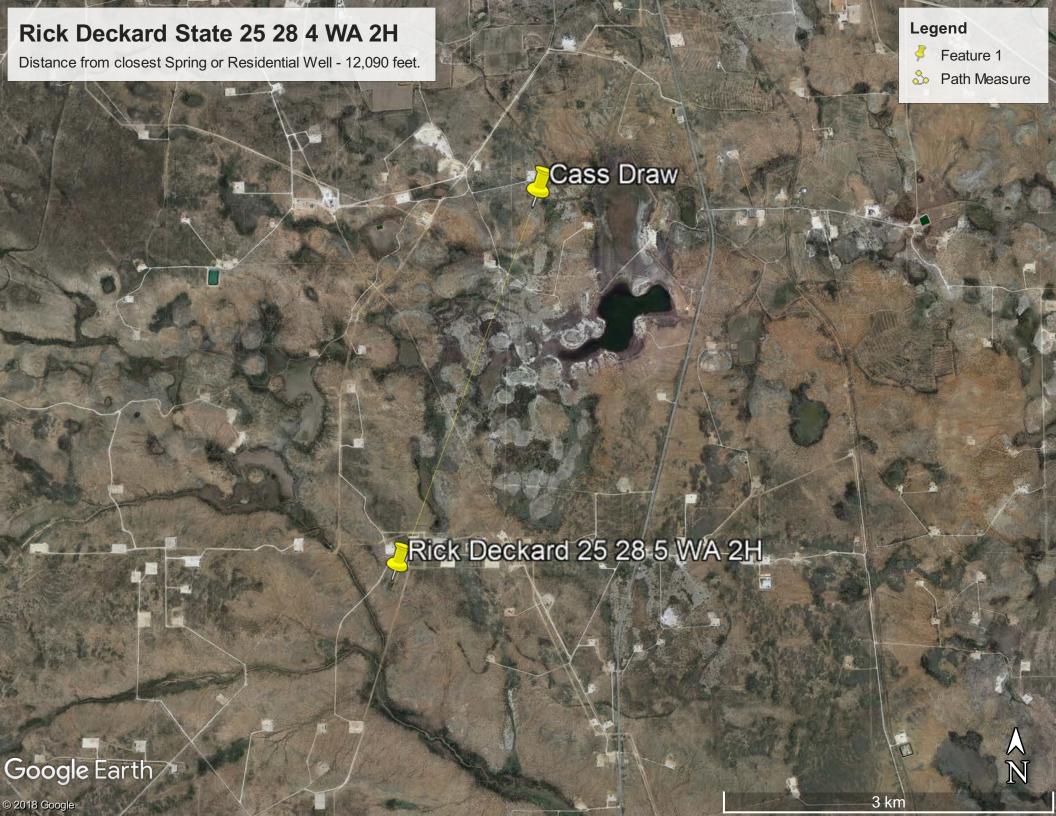
*UTM location was derived from PLSS - see Help

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

Record Count: 14

UTMNAD83 Radius Search (in meters):

Easting (X): 585274.28 **Northing (Y):** 3559005.64 **Radius:** 5000



Rick Deckard State 2H 2,300 ft Wetland



August 5, 2019

Wetlands

Estuarine and Marine Deepwater

Estuarine and Marine Wetland

Freshwater Emergent Wetland

Freshwater Forested/Shrub Wetland

Freshwater Pond

Lake

Other

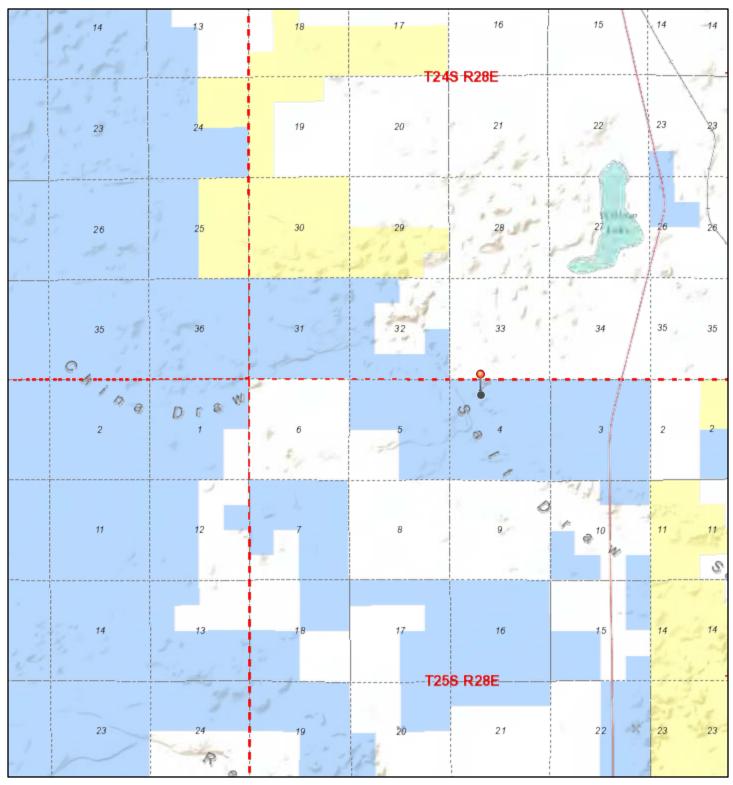
Other

Riverine

r

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.

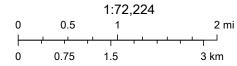
Active Mines in New Mexico



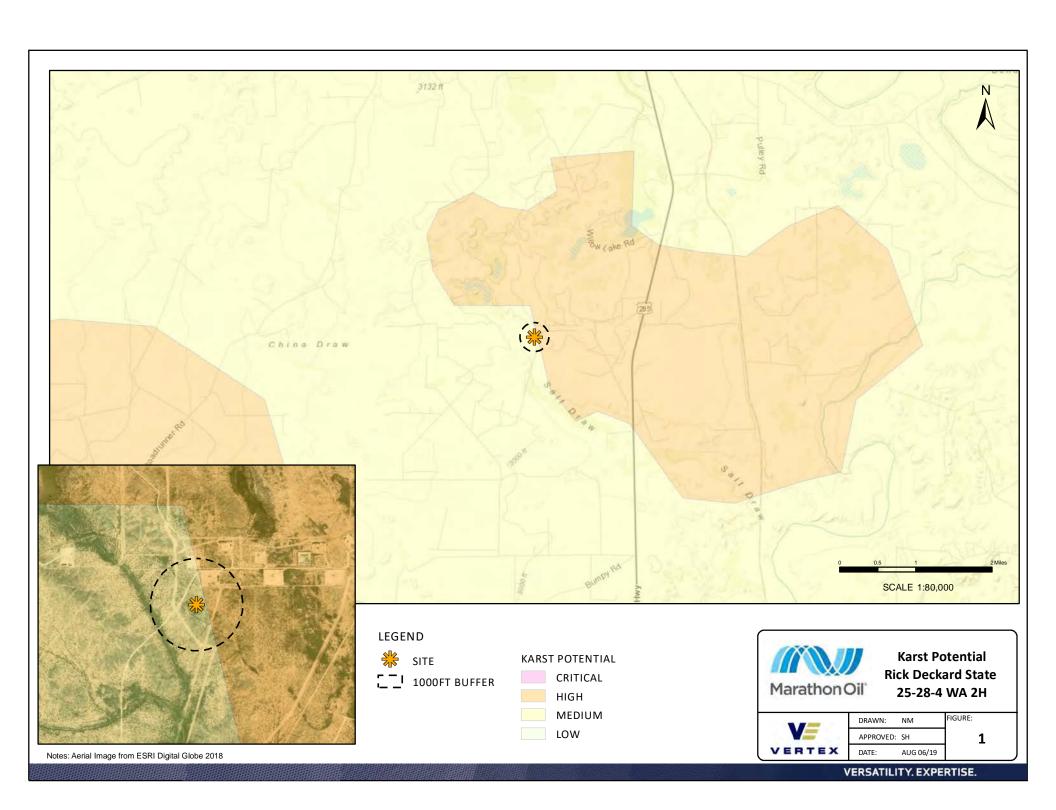
8/12/2019 12:33:34 PM

Registered Mines

- Aggregate, Stone etc.
- Aggregate, Stone etc.



U.S. Bureau of Land Management - New Mexico State Office, Sources: Esri, USGS, NOAA, Sources: Esri, Garmin, USGS, NPS

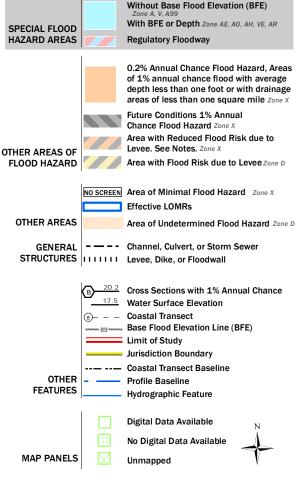


National Flood Hazard Layer FIRMette



Legend

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





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 8/5/2019 at 2:54:07 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.





NRCS

Natural Resources Conservation Service A product of the National Cooperative Soil Survey, a joint effort of the United States Department of Agriculture and other Federal agencies, State agencies including the Agricultural Experiment Stations, and local participants

Custom Soil Resource Report for Eddy Area, New Mexico



Preface

Soil surveys contain information that affects land use planning in survey areas. They highlight soil limitations that affect various land uses and provide information about the properties of the soils in the survey areas. Soil surveys are designed for many different users, including farmers, ranchers, foresters, agronomists, urban planners, community officials, engineers, developers, builders, and home buyers. Also, conservationists, teachers, students, and specialists in recreation, waste disposal, and pollution control can use the surveys to help them understand, protect, or enhance the environment.

Various land use regulations of Federal, State, and local governments may impose special restrictions on land use or land treatment. Soil surveys identify soil properties that are used in making various land use or land treatment decisions. The information is intended to help the land users identify and reduce the effects of soil limitations on various land uses. The landowner or user is responsible for identifying and complying with existing laws and regulations.

Although soil survey information can be used for general farm, local, and wider area planning, onsite investigation is needed to supplement this information in some cases. Examples include soil quality assessments (http://www.nrcs.usda.gov/wps/portal/nrcs/main/soils/health/) and certain conservation and engineering applications. For more detailed information, contact your local USDA Service Center (https://offices.sc.egov.usda.gov/locator/app?agency=nrcs) or your NRCS State Soil Scientist (http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/contactus/?cid=nrcs142p2 053951).

Great differences in soil properties can occur within short distances. Some soils are seasonally wet or subject to flooding. Some are too unstable to be used as a foundation for buildings or roads. Clayey or wet soils are poorly suited to use as septic tank absorption fields. A high water table makes a soil poorly suited to basements or underground installations.

The National Cooperative Soil Survey is a joint effort of the United States Department of Agriculture and other Federal agencies, State agencies including the Agricultural Experiment Stations, and local agencies. The Natural Resources Conservation Service (NRCS) has leadership for the Federal part of the National Cooperative Soil Survey.

Information about soils is updated periodically. Updated information is available through the NRCS Web Soil Survey, the site for official soil survey information.

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How Soil Surveys Are Made

Soil surveys are made to provide information about the soils and miscellaneous areas in a specific area. They include a description of the soils and miscellaneous areas and their location on the landscape and tables that show soil properties and limitations affecting various uses. Soil scientists observed the steepness, length, and shape of the slopes; the general pattern of drainage; the kinds of crops and native plants; and the kinds of bedrock. They observed and described many soil profiles. A soil profile is the sequence of natural layers, or horizons, in a soil. The profile extends from the surface down into the unconsolidated material in which the soil formed or from the surface down to bedrock. The unconsolidated material is devoid of roots and other living organisms and has not been changed by other biological activity.

Currently, soils are mapped according to the boundaries of major land resource areas (MLRAs). MLRAs are geographically associated land resource units that share common characteristics related to physiography, geology, climate, water resources, soils, biological resources, and land uses (USDA, 2006). Soil survey areas typically consist of parts of one or more MLRA.

The soils and miscellaneous areas in a survey area occur in an orderly pattern that is related to the geology, landforms, relief, climate, and natural vegetation of the area. Each kind of soil and miscellaneous area is associated with a particular kind of landform or with a segment of the landform. By observing the soils and miscellaneous areas in the survey area and relating their position to specific segments of the landform, a soil scientist develops a concept, or model, of how they were formed. Thus, during mapping, this model enables the soil scientist to predict with a considerable degree of accuracy the kind of soil or miscellaneous area at a specific location on the landscape.

Commonly, individual soils on the landscape merge into one another as their characteristics gradually change. To construct an accurate soil map, however, soil scientists must determine the boundaries between the soils. They can observe only a limited number of soil profiles. Nevertheless, these observations, supplemented by an understanding of the soil-vegetation-landscape relationship, are sufficient to verify predictions of the kinds of soil in an area and to determine the boundaries.

Soil scientists recorded the characteristics of the soil profiles that they studied. They noted soil color, texture, size and shape of soil aggregates, kind and amount of rock fragments, distribution of plant roots, reaction, and other features that enable them to identify soils. After describing the soils in the survey area and determining their properties, the soil scientists assigned the soils to taxonomic classes (units). Taxonomic classes are concepts. Each taxonomic class has a set of soil characteristics with precisely defined limits. The classes are used as a basis for comparison to classify soils systematically. Soil taxonomy, the system of taxonomic classification used in the United States, is based mainly on the kind and character of soil properties and the arrangement of horizons within the profile. After the soil

Custom Soil Resource Report

scientists classified and named the soils in the survey area, they compared the individual soils with similar soils in the same taxonomic class in other areas so that they could confirm data and assemble additional data based on experience and research.

The objective of soil mapping is not to delineate pure map unit components; the objective is to separate the landscape into landforms or landform segments that have similar use and management requirements. Each map unit is defined by a unique combination of soil components and/or miscellaneous areas in predictable proportions. Some components may be highly contrasting to the other components of the map unit. The presence of minor components in a map unit in no way diminishes the usefulness or accuracy of the data. The delineation of such landforms and landform segments on the map provides sufficient information for the development of resource plans. If intensive use of small areas is planned, onsite investigation is needed to define and locate the soils and miscellaneous areas.

Soil scientists make many field observations in the process of producing a soil map. The frequency of observation is dependent upon several factors, including scale of mapping, intensity of mapping, design of map units, complexity of the landscape, and experience of the soil scientist. Observations are made to test and refine the soil-landscape model and predictions and to verify the classification of the soils at specific locations. Once the soil-landscape model is refined, a significantly smaller number of measurements of individual soil properties are made and recorded. These measurements may include field measurements, such as those for color, depth to bedrock, and texture, and laboratory measurements, such as those for content of sand, silt, clay, salt, and other components. Properties of each soil typically vary from one point to another across the landscape.

Observations for map unit components are aggregated to develop ranges of characteristics for the components. The aggregated values are presented. Direct measurements do not exist for every property presented for every map unit component. Values for some properties are estimated from combinations of other properties.

While a soil survey is in progress, samples of some of the soils in the area generally are collected for laboratory analyses and for engineering tests. Soil scientists interpret the data from these analyses and tests as well as the field-observed characteristics and the soil properties to determine the expected behavior of the soils under different uses. Interpretations for all of the soils are field tested through observation of the soils in different uses and under different levels of management. Some interpretations are modified to fit local conditions, and some new interpretations are developed to meet local needs. Data are assembled from other sources, such as research information, production records, and field experience of specialists. For example, data on crop yields under defined levels of management are assembled from farm records and from field or plot experiments on the same kinds of soil.

Predictions about soil behavior are based not only on soil properties but also on such variables as climate and biological activity. Soil conditions are predictable over long periods of time, but they are not predictable from year to year. For example, soil scientists can predict with a fairly high degree of accuracy that a given soil will have a high water table within certain depths in most years, but they cannot predict that a high water table will always be at a specific level in the soil on a specific date.

After soil scientists located and identified the significant natural bodies of soil in the survey area, they drew the boundaries of these bodies on aerial photographs and

Custom Soil Resource Report

identified each as a specific map unit. Aerial photographs show trees, buildings, fields, roads, and rivers, all of which help in locating boundaries accurately.

Soil Map

The soil map section includes the soil map for the defined area of interest, a list of soil map units on the map and extent of each map unit, and cartographic symbols displayed on the map. Also presented are various metadata about data used to produce the map, and a description of each soil map unit.



MAP LEGEND

Area of Interest (AOI)

Area of Interest (AOI)

Soils

Soil Map Unit Polygons



Soil Map Unit Lines



Soil Map Unit Points

Special Point Features

(o)

Blowout

Borrow Pit

Clay Spot

Closed Depression

Gravelly Spot

Landfill

Gravel Pit

Lava Flow Marsh or swamp

Mine or Quarry

Miscellaneous Water

Perennial Water

Rock Outcrop

Saline Spot

Sandy Spot

Severely Eroded Spot

Sinkhole

Sodic Spot

Slide or Slip

Spoil Area



Stony Spot

Very Stony Spot

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Wet Spot Other

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Special Line Features

Water Features

Streams and Canals

Transportation

Rails

Interstate Highways

US Routes

Major Roads

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Local Roads

Background

Aerial Photography

MAP INFORMATION

The soil surveys that comprise your AOI were mapped at 1:20.000.

Warning: Soil Map may not be valid at this scale.

Enlargement of maps beyond the scale of mapping can cause misunderstanding of the detail of mapping and accuracy of soil line placement. The maps do not show the small areas of contrasting soils that could have been shown at a more detailed scale.

Please rely on the bar scale on each map sheet for map measurements.

Source of Map: Natural Resources Conservation Service Web Soil Survey URL:

Coordinate System: Web Mercator (EPSG:3857)

Maps from the Web Soil Survey are based on the Web Mercator projection, which preserves direction and shape but distorts distance and area. A projection that preserves area, such as the Albers equal-area conic projection, should be used if more accurate calculations of distance or area are required.

This product is generated from the USDA-NRCS certified data as of the version date(s) listed below.

Soil Survey Area: Eddy Area, New Mexico Survey Area Data: Version 14, Sep 12, 2018

Soil map units are labeled (as space allows) for map scales 1:50.000 or larger.

Date(s) aerial images were photographed: Dec 31, 2009—Jun 10. 2017

The orthophoto or other base map on which the soil lines were compiled and digitized probably differs from the background imagery displayed on these maps. As a result, some minor shifting of map unit boundaries may be evident.

Map Unit Legend (Rick Deckard 25 28 4 WA 2H)

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI			
RE	Reagan-Upton association, 0 to 9 percent slopes	1.0	26.2%			
UG	Upton gravelly loam, 0 to 9 percent slopes	2.8	73.8%			
Totals for Area of Interest		3.8	100.0%			

Map Unit Descriptions (Rick Deckard 25 28 4 WA 2H)

The map units delineated on the detailed soil maps in a soil survey represent the soils or miscellaneous areas in the survey area. The map unit descriptions, along with the maps, can be used to determine the composition and properties of a unit.

A map unit delineation on a soil map represents an area dominated by one or more major kinds of soil or miscellaneous areas. A map unit is identified and named according to the taxonomic classification of the dominant soils. Within a taxonomic class there are precisely defined limits for the properties of the soils. On the landscape, however, the soils are natural phenomena, and they have the characteristic variability of all natural phenomena. Thus, the range of some observed properties may extend beyond the limits defined for a taxonomic class. Areas of soils of a single taxonomic class rarely, if ever, can be mapped without including areas of other taxonomic classes. Consequently, every map unit is made up of the soils or miscellaneous areas for which it is named and some minor components that belong to taxonomic classes other than those of the major soils.

Most minor soils have properties similar to those of the dominant soil or soils in the map unit, and thus they do not affect use and management. These are called noncontrasting, or similar, components. They may or may not be mentioned in a particular map unit description. Other minor components, however, have properties and behavioral characteristics divergent enough to affect use or to require different management. These are called contrasting, or dissimilar, components. They generally are in small areas and could not be mapped separately because of the scale used. Some small areas of strongly contrasting soils or miscellaneous areas are identified by a special symbol on the maps. If included in the database for a given area, the contrasting minor components are identified in the map unit descriptions along with some characteristics of each. A few areas of minor components may not have been observed, and consequently they are not mentioned in the descriptions, especially where the pattern was so complex that it was impractical to make enough observations to identify all the soils and miscellaneous areas on the landscape.

The presence of minor components in a map unit in no way diminishes the usefulness or accuracy of the data. The objective of mapping is not to delineate

Custom Soil Resource Report

pure taxonomic classes but rather to separate the landscape into landforms or landform segments that have similar use and management requirements. The delineation of such segments on the map provides sufficient information for the development of resource plans. If intensive use of small areas is planned, however, onsite investigation is needed to define and locate the soils and miscellaneous areas.

An identifying symbol precedes the map unit name in the map unit descriptions. Each description includes general facts about the unit and gives important soil properties and qualities.

Soils that have profiles that are almost alike make up a *soil series*. Except for differences in texture of the surface layer, all the soils of a series have major horizons that are similar in composition, thickness, and arrangement.

Soils of one series can differ in texture of the surface layer, slope, stoniness, salinity, degree of erosion, and other characteristics that affect their use. On the basis of such differences, a soil series is divided into *soil phases*. Most of the areas shown on the detailed soil maps are phases of soil series. The name of a soil phase commonly indicates a feature that affects use or management. For example, Alpha silt loam, 0 to 2 percent slopes, is a phase of the Alpha series.

Some map units are made up of two or more major soils or miscellaneous areas. These map units are complexes, associations, or undifferentiated groups.

A *complex* consists of two or more soils or miscellaneous areas in such an intricate pattern or in such small areas that they cannot be shown separately on the maps. The pattern and proportion of the soils or miscellaneous areas are somewhat similar in all areas. Alpha-Beta complex, 0 to 6 percent slopes, is an example.

An association is made up of two or more geographically associated soils or miscellaneous areas that are shown as one unit on the maps. Because of present or anticipated uses of the map units in the survey area, it was not considered practical or necessary to map the soils or miscellaneous areas separately. The pattern and relative proportion of the soils or miscellaneous areas are somewhat similar. Alpha-Beta association, 0 to 2 percent slopes, is an example.

An *undifferentiated group* is made up of two or more soils or miscellaneous areas that could be mapped individually but are mapped as one unit because similar interpretations can be made for use and management. The pattern and proportion of the soils or miscellaneous areas in a mapped area are not uniform. An area can be made up of only one of the major soils or miscellaneous areas, or it can be made up of all of them. Alpha and Beta soils, 0 to 2 percent slopes, is an example.

Some surveys include *miscellaneous areas*. Such areas have little or no soil material and support little or no vegetation. Rock outcrop is an example.

Eddy Area, New Mexico

RE—Reagan-Upton association, 0 to 9 percent slopes

Map Unit Setting

National map unit symbol: 1w5d Elevation: 1,100 to 5,400 feet

Mean annual precipitation: 6 to 14 inches

Mean annual air temperature: 60 to 64 degrees F

Frost-free period: 180 to 240 days

Farmland classification: Farmland of statewide importance

Map Unit Composition

Reagan and similar soils: 70 percent Upton and similar soils: 25 percent

Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Reagan

Setting

Landform: Alluvial fans, fan remnants Landform position (three-dimensional): Rise

Down-slope shape: Linear, convex

Across-slope shape: Linear

Parent material: Alluvium and/or eolian deposits

Typical profile

H1 - 0 to 8 inches: loam H2 - 8 to 60 inches: loam

Properties and qualities

Slope: 0 to 3 percent

Depth to restrictive feature: More than 80 inches

Natural drainage class: Well drained

Runoff class: Low

Capacity of the most limiting layer to transmit water (Ksat): Moderately high to

high (0.60 to 2.00 in/hr)

Depth to water table: More than 80 inches

Frequency of flooding: None Frequency of ponding: None

Calcium carbonate, maximum in profile: 40 percent

Salinity, maximum in profile: Very slightly saline to moderately saline (2.0 to 8.0

mmhos/cm)

Sodium adsorption ratio, maximum in profile: 1.0

Available water storage in profile: Moderate (about 8.2 inches)

Interpretive groups

Land capability classification (irrigated): 2e Land capability classification (nonirrigated): 6e

Hydrologic Soil Group: B

Ecological site: Loamy (R070DY153NM)

Hydric soil rating: No

Description of Upton

Setting

Landform: Ridges, fans

Landform position (three-dimensional): Side slope, rise

Down-slope shape: Convex Across-slope shape: Convex

Parent material: Residuum weathered from limestone

Typical profile

H1 - 0 to 9 inches: gravelly loam H2 - 9 to 13 inches: gravelly loam H3 - 13 to 21 inches: cemented

H4 - 21 to 60 inches: very gravelly loam

Properties and qualities

Slope: 0 to 9 percent

Depth to restrictive feature: 7 to 20 inches to petrocalcic

Natural drainage class: Well drained

Runoff class: High

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 in profile: 75 percent

Salinity, maximum in profile: Nonsaline to very slightly saline (0.0 to 2.0

mmhos/cm)

Sodium adsorption ratio, maximum in profile: 1.0

Available water storage in profile: Very low (about 1.4 inches)

Interpretive groups

Land capability classification (irrigated): None specified

Land capability classification (nonirrigated): 7s

Hydrologic Soil Group: D

Ecological site: Shallow Loamy (R070DY159NM)

Hydric soil rating: No

Minor Components

Pima

Percent of map unit:

Ecological site: Bottomland (R042XC017NM)

Hydric soil rating: No

Atoka

Percent of map unit:

Ecological site: Loamy (R042XC007NM)

Hydric soil rating: No

UG—Upton gravelly loam, 0 to 9 percent slopes

Map Unit Setting

National map unit symbol: 1w64 Elevation: 1,100 to 4,400 feet

Mean annual precipitation: 7 to 15 inches

Mean annual air temperature: 60 to 70 degrees F

Frost-free period: 200 to 240 days

Farmland classification: Not prime farmland

Map Unit Composition

Upton and similar soils: 100 percent

Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Upton

Setting

Landform: Ridges, fans

Landform position (three-dimensional): Side slope, rise

Down-slope shape: Convex Across-slope shape: Convex

Parent material: Residuum weathered from limestone

Typical profile

H1 - 0 to 9 inches: gravelly loam H2 - 9 to 13 inches: gravelly loam H3 - 13 to 21 inches: cemented

H4 - 21 to 60 inches: very gravelly loam

Properties and qualities

Slope: 0 to 9 percent

Depth to restrictive feature: 7 to 20 inches to petrocalcic

Natural drainage class: Well drained

Runoff class: High

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 in profile: 75 percent

Salinity, maximum in profile: Nonsaline to very slightly saline (0.0 to 2.0

mmhos/cm)

Sodium adsorption ratio, maximum in profile: 1.0

Available water storage in profile: Very low (about 1.4 inches)

Interpretive groups

Land capability classification (irrigated): None specified

Land capability classification (nonirrigated): 7s

Hydrologic Soil Group: D

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Ecological site: Shallow (R042XC025NM)

Hydric soil rating: No

Minor Components

Reagan

Percent of map unit:

Ecological site: Loamy (R042XC007NM)

Hydric soil rating: No

Atoka

Percent of map unit:

Ecological site: Loamy (R042XC007NM)

Hydric soil rating: No

Upton

Percent of map unit:

Ecological site: Shallow (R042XC025NM)

Hydric soil rating: No

Atoka

Percent of map unit:

Ecological site: Loamy (R042XC007NM)

Hydric soil rating: No

References

American Association of State Highway and Transportation Officials (AASHTO). 2004. Standard specifications for transportation materials and methods of sampling and testing. 24th edition.

American Society for Testing and Materials (ASTM). 2005. Standard classification of soils for engineering purposes. ASTM Standard D2487-00.

Cowardin, L.M., V. Carter, F.C. Golet, and E.T. LaRoe. 1979. Classification of wetlands and deep-water habitats of the United States. U.S. Fish and Wildlife Service FWS/OBS-79/31.

Federal Register. July 13, 1994. Changes in hydric soils of the United States.

Federal Register. September 18, 2002. Hydric soils of the United States.

Hurt, G.W., and L.M. Vasilas, editors. Version 6.0, 2006. Field indicators of hydric soils in the United States.

National Research Council. 1995. Wetlands: Characteristics and boundaries.

Soil Survey Division Staff. 1993. Soil survey manual. Soil Conservation Service. U.S. Department of Agriculture Handbook 18. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2 054262

Soil Survey Staff. 1999. Soil taxonomy: A basic system of soil classification for making and interpreting soil surveys. 2nd edition. Natural Resources Conservation Service, U.S. Department of Agriculture Handbook 436. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2 053577

Soil Survey Staff. 2010. Keys to soil taxonomy. 11th edition. U.S. Department of Agriculture, Natural Resources Conservation Service. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2 053580

Tiner, R.W., Jr. 1985. Wetlands of Delaware. U.S. Fish and Wildlife Service and Delaware Department of Natural Resources and Environmental Control, Wetlands Section.

United States Army Corps of Engineers, Environmental Laboratory. 1987. Corps of Engineers wetlands delineation manual. Waterways Experiment Station Technical Report Y-87-1.

United States Department of Agriculture, Natural Resources Conservation Service. National forestry manual. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/home/?cid=nrcs142p2 053374

United States Department of Agriculture, Natural Resources Conservation Service. National range and pasture handbook. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/landuse/rangepasture/?cid=stelprdb1043084

Custom Soil Resource Report

United States Department of Agriculture, Natural Resources Conservation Service. National soil survey handbook, title 430-VI. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/scientists/?cid=nrcs142p2_054242

United States Department of Agriculture, Natural Resources Conservation Service. 2006. Land resource regions and major land resource areas of the United States, the Caribbean, and the Pacific Basin. U.S. Department of Agriculture Handbook 296. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2_053624

United States Department of Agriculture, Soil Conservation Service. 1961. Land capability classification. U.S. Department of Agriculture Handbook 210. http://www.nrcs.usda.gov/Internet/FSE_DOCUMENTS/nrcs142p2_052290.pdf

ATTACHMENT 5

	Rick Deckard 25-28-4 WA #2H Load Tracking								
9/5/2019		9/6/2019		/ /		/ /		/ /	
Waste Manifest #	Yards	Waste Manifest #	Yards	Waste Manifest #	Yards	Waste Manifest #	Yards	Waste Manifest #	Yards
170988	20	170987	20						
170957	20	171026	12						
170958	20	171027	20						
170959	20	171028	12						
170960	20	171029	12						
170961	20	171030	12						1
170962	20	171031	12						1
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170984	20								
170985	20								
170986	20								



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

Company	Man	Contact	Information
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Operator No.			GENERAT	UK	NO.	71020	
operator No.	,			Permit/RRC No.	uno I	1030	
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Water Based Cutting	S	Completion Fluid/	Flow back (Non-Injectable)				
Produced Formation		Produced Water (Non-Injectable) ater/Waste (Non-Injectable)				
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E&P Contaminated Se	oil 10	Truck Washout (ex					
Gas Plant Waste		8	,				
WASTE GENERATION	ON PROCESS:	DRILLING	COMPLETION	.7	DDODUCTION		
- Karamana and Andrews					PRODUCTION	GATHERING LINES	
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Non-Exempt Other	All Holl-exempt E&P w	aste must be analys	sed and be below the threshold lim	its for toxicity (TCL), Ignitability, Corrosivity and Re-	activity.	
Non-Exempt Other				*please select fro	m Non-Exempt Waste List on ba	ack	
QUANTITY				Zechall.	The state with the state of the		
			3 - BARRELS		Y - YARDS	E - EACH	
I hereby certify that th	e above listed material(s), is (are) not a hazardous w	raste as defined by 40 CER Bort 201	1. 1.1		een properly described, classified and	
packaged, and is in pro	oper condition for transportation	according to applic	able regulation	or any applicable s	tate law. That each waste has be	een properly described, classified and	
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L NCNA NON-EXE	261 21-261 24 or	listed bazardous	that does not exceed the minimu	m standards for wa	ste hazardous by characteristics e	established in RCRA regulations, 40 CFR	
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(PLEASE PRINT) *REQUIRED INFORMATION* Name

ompany	Man	Contact	Information
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		A STATE OF THE PARTY OF THE PAR			Phone No	
		GENERAT	OR	NO.	71000	100000
Operator No.			Permit/RRC No.		.71029	
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The state of the s	NON-INJECTABLE WATERS	Amount (place v	olume next to w	aste type in barrels or cut	oic yards)	
Oil Based Cuttings Water Based Muds	Washout Water (Non-Injectable)			OTHER EXCIVIPT WASTES (ty	pe and generation process of the waste)	
Water Based Cuttings	Completion Fluid/Flow back (Nor Produced Water (Non-Injectable	n-Injectable) N				
Produced Formation Solids Tank Bottoms	Gathering Line Water/Waste (No	n-Injectable)				
E&P Contaminated Soil	INTERNAL USE ONLY Truck Washout (exempt waste)					
Gas Plant Waste				1-01	1	
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	V	PRODUCTION	GATHERING LINES	
E TOTAL SECTION OF THE COMMENT	NON-EXEMPT E&P	Waste/Service Iden	tification and Amo	mt		
All non-exempt E&P v	vaste must be analysed and be belo	w the threshold lim	its for toxicity (TCL	P), Ignitability, Corrosivity and	d Reactivity.	
Ton Exempt Ottler			*please select fro	m Non-Exempt Waste List o	n back	
QUANTITY	B - BARRELS			Y - YARDS	5.5100	
I hereby certify that the above listed material(s), is (are packaged, and is in proper condition for transportation	e) not a hazardous waste as definer	hv 40 CER Part 261	Or any applicable	that I was	E - EACH	
The state of the s	a abbucable regulation					
RCRA EXEMPT: Oil field wastes ge	nerated from oil and gas exploration	on and production o	perations and are r	not mixed with non-exempt w	vaste (R360 Accepts certifications on	a per
The state of the s						
			n standards for wa	ste hazardous by characterist	tics established in RCRA regulations, 4 ntation demonstrating the waste as no	40 CFR
	ried. (effect the appropriate items	as provided)	suspaire b, as affici	idea. The following documen	itation demonstrating the waste as no	on-
MSDS Information	RCRA Hazardous	Waste Analysis		Other (Provide Description Be	elow)	
N 99	- War			1. 11		
BANC (SEMINE FOR) HAS HE	+11 15 5 TELL	51-	Cn-19	Xluila	MA	_
(PRINT) AUTHORIZED AGENTS SIGNATURE		DA	TE	Jan	SIGNATURE	_
_	TR	ANSPORT	ER			
Transporter's Name			Priver's Name	Man	1	
Address		-	-	Porde F	16,100	
		-	rint Name			
Phone No.		-	hone No ruck No.	(242)		
hereby certify that the above named material(s) was/w	vere nicked up at the Congretorics			00		
	ore broken up at the Generator 3.5	ite listed above and	delivered without i	ncident to the disposal facilit	y listed below.	
SHIPMENT DATE	DRIVER'S SIGNATURE		DELIVERY	DATE	DRIVER'S SIGNATURE	
TRUCK TIME STAMP	DISP	OSAL FAC	ILITY	RECE	IVING AREA	
IN: OUT:			2.100		IVING AREA	
Site Name/			L	Name/No.		
Permit No. Red Bluff Facility/ STF-065		. Ph	none No.	32-448-4239		
Address 5053 US Highway 285, Orla, TX 79770					V.	
NORM READINGS TAKEN? (Circle One) Chloride	YES NO	J	f YES, was reading	> 50 micro roentgens? (circle	one) YES NO	_
Chemical Analysis (Mg/l)			onductivity mmhos/cm)			
	IAN	IK BOTTO			рН	
Feet	Inches		1419			
nd Gauge			BS&W,	/BBLS Received	BS&W (%)	-
eceived				Free Water		
		L		Total Received		
I hereby certify that the above load material has been	(circle one): ACCEPTED	DENIED	If denied, why?		I.	
1 1 1 1 1 1 -1	7111	1/1		1 MARIN		-
NAME (PRINT)	DATE	TITLE	-	ENIN (11)	SIGNATURE	



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

Company Man Contact Information

THE SAME OF THE SA			Phone No				
	GEI	NERATOR	NO.17100	7			
Operator No.		Permit/RRC No.	als I who O has	1			
Operators Name Marcuthon	0 1	Lease/Well Name & No.	PICK DECK A2025-28	-4 WA 14249			
Address 4/1/5	duell long	County	Eddy				
0 111	4.11	API No.	30-015-453	diefle /			
City, State, Zip	MU 395AD	Rig Name & No.	14				
Phone No. 575 323	Olffred 1	AFE/PO No.	7A.19.02258				
EXEMPT E&P	Waste/Service Identification and Amo	unt (place volume next to w					
Oil Based Cuttings	NON-INJECTABLE WATERS Washout Water (Non-Injectable)		OTHER EXEMPT WASTES (type and generation p	rocess of the waste)			
Water Based Muds Water Based Cuttings	Completion Fluid/Flow back (Non-Injec Produced Water (Non-Injectable)	ctable)		11			
Produced Formation Solids Tank Bottoms	Gathering Line Water/Waste (Non-Inje	ectable)					
E&P Contaminated Soil	INTERNAL USE ONLY Truck Washout (exempt waste)						
Gas Plant Waste							
WASTE GENERATION PROCESS:		OMPLETION 2		RING LINES			
All non-exempt E8	NON-EXEMPT E&P Waste P waste must be analysed and be below the	e/Service Identification and Amo	unt				
Non-Exempt Other	T Waste mast be analysed and be below the		om Non-Exempt Waste List on back				
OLIANTIN'	Ves reproductives		The End of Each				
QUANTITY	B - BARRELS		Y - YARDS	E - EACH			
I hereby certify that the above listed material(s), is packaged, and is in proper condition for transporta	(are) not a hazardous waste as defined by 40 tion according to applicable regulation.	0 CFR Part 261 or any applicable	state law. That each waste has been properly	described, classified and			
		d production operations and are	not mixed with non-exempt waste (R360 Acce	epts certifications on a per			
load basis only)							
RCRA NON-EXEMPT: Oil field waste which is non-hazardous that does not exceed the minimum standards for waste hazardous by characteristics established in RCRA regulations, 40 CFR 261.21-261.24, or listed hazardous waste as defined by 40 CFR, part 261, subpart D, as amended. The following documentation demonstrating the waste as non-							
hazardous is a	ttached. (Check the appropriate items as pro	ovided)	made. The following documentation demonstr	ating the waste as non-			
MSDS Informa	tion RCRA Hazardous Was	te Analysis	Other (Provide Description Below)				
12. 200	The second secon		XA ()				
(PRINT) AUTHORIZED AGENTS SIGNATURE	P MARYETTA	9/5/00) S	SIGNATURE				
	TRAN	NSPORTER		The state of the s			
Transporter's TIR Mane	Market of the mark	Driver's Name	1				
Address	to instituti	Print Name	3110-00 101				
		Phone No.					
Phone No.		Truck No.	# 08				
I hereby certify that the above named material(s) w	as/were picked up at the Generator's site lis	sted above and delivered without	t incident to the disposal facility listed below.				
SHIPMENT DATE							
TRUCK TIME STAM	DRIVER'S SIGNATURE	DELIVER					
IN: OUT:	DISPUS	SAL FACILITY	RECEIVING AR	LEA			
Site Name/			Name/No.				
Permit No. Red Bluff Facility/ STF-065		Phone No.	432-448-4239				
Address 5053 US Highway 285, Orla, TX 7	9770						
NORM READINGS TAKEN? (Circle Or Chloride	e) YES NO	If YES, was reading Conductivity	g > 50 micro roentgens? (circle one) YE	S NO			
Chemical Analysis (Mg/l)		(mmhos/cm)		pH			
	TANK	BOTTOMS					
1st Gauge Feet	Inches	DCG	M/RRIS Passivad	1 (0()			
2nd Gauge		828/	W/BBLS Received BS&W Free Water	/ (%)			
Received			Total Received				
I hereby certify that the above load material has	been (circle one): ACCEPTED	DENIED If denied, why?					
111011	11///		Ī i i i i i i i	111-011			
NAME (PRINT)	DATE	TITLE	SIGNATURE				



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

Company Man Contact Information

SOLUTIONS		Phone No.
	GENERATOR	NO.171028
Operator No.	Permit/RRC No. Lease/Well	
Operators Name Marathon O. 1	Name & No.	1116 DECK ARD 25284 WA HIZHSPLOH
Address 4/1157 duch	Powel County	ENDY
	API No.	30-016-45344
City, State, Zip (a. As bad NU 2)	9220 Rig Name & No.	
Phone No. 579 303 944	AFE/PO No.	TA 10.02258
EXEMPT E&P Waste/Service I	dentification and Amount (place volume next to wa	aste type in barrels or cubic yards)
	ABLE WATERS	OTHER EXEMPT WASTES (type and generation process of the waste)
	ter (Non-Injectable)	
Water Based Cuttings Produced Wa	ater (Non-Injectable)	
Produced Formation Solids Gathering Lin Tank Bottoms INTERNAL US	e Water/Waste (Non-Injectable)	1
	ut (exempt waste)	1 - 1 - 1
Gas Plant Waste WASTE GENERATION PROCESS: DRILLING	COMPLETION	PRODUCTION GATHERING LINES
in a second seco	NON-EXEMPT E&P Waste/Service Identification and Amo	
All non-exempt E&P waste must be a	analysed and be below the threshold limits for toxicity (TCL	
Non-Exempt Other	*please select fro	om Non-Exempt Waste List on back
QUANTITY	B - BARRELS	Y - YARDS E - EACH
I hereby certify that the above listed material(s), is (are) not a hazard	ous waste as defined by 40 CFR Part 261 or any applicable	state law. That each waste has been properly described, classified and
packaged, and is in proper condition for transportation according to		
I A RUBA EXEMPT:	oil and gas exploration and production operations and are	not mixed with non-exempt waste (R360 Accepts certifications on a per
load basis only)	ardous that does not aveged the minimum standards for w	aste hazardous by characteristics established in RCRA regulations, 40 CFR
		ended. The following documentation demonstrating the waste as non-
hazardous is attached. (Check th	ne appropriate items as provided)	
MSDS Information	RCRA Hazardous Waste Analysis	Other (Provide Description Below)
	0/1/00/10	00 000
SOAC (ASTRU DE IL THAR HI	920- 1829/0/2019	Mules
(PRINT) AUTHORIZED AGENTS SIGNATURE	DATE	SIĞNATÜRE
	TRANSPORTER	
Transporter's	Driver's Name	LIVER IN CEC
Name Address	Print Name	A Distriction
	Phone No.	
Phone No.	Truck No.	CF
I hereby certify that the above named material(s) was/were picked u	p at the Generator's site listed above and delivered withou	it incident to the disposal facility listed below.
SHIPMENT DATE DRIVER'S SIGNAT		RY DATE DRIVER'S SIGNATURE
TRUCK TIME STAMP	DISPOSAL FACILITY	RECEIVING AREA
IN:OUT:		Name/No.
Site Name/	Phone No.	
Permit No. Red Bluff Facility/ STF-065	· · · · · · · · · · · · · · · · · · ·	432-448-4239
Address 5053 US Highway 285, Orla, TX 79770	ICVEC II	See Food and Administration Avenue
NORM READINGS TAKEN? (Circle One) Chloride YES	NO If YES, was readir Conductivity	ng > 50 micro roentgens? (circle one) YES NO
Chemical Analysis (Mg/l)	(mmhos/cm)	pH
	TANK BOTTOMS	
Feet	Inches	DOW/DDIS Deserved
1st Gauge 2nd Gauge	BS8	kW/BBLS Received BS&W (%) Free Water
Received		Total Received
	ACCEPTED DELICE MALE LA	
I hereby certify that the above load material has been (circle one)	: ACCEPTED DENIED If denied, why?	
NAME (DEINT)	DATE TITLE	SIGNATURE
NAME (PRINT)	THE THE	SIGNATIONS



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

Company	Man C	ontact l	nformation
---------	-------	----------	------------

			Phone No	
		GENERATOR	No.170987	7
Operator No.		Permit/RRC No.	710301	f
Operators Name Muyuthan ()		Lease/Well Name & No.	WT001V111125281	TMA LUMB
Address 411 S fortistrate Awal Rocal		County	PARIL	The state of the s
As It V	1 0 0	API No.	30-015-+40-4	4
City, State, Zip	11116000	Rig Name & No.	21	<i>D</i>
Phone No.	3 441	AFE/PO No.	1A 19 002-64	
EXEMPT E&P Waste/Service Identification and Amount (place volume next to waste type in barrels or cubic yards) Oil Based Muds NON-INIFCTABLE WASTERS				
Oil Based Cuttings	NON-INJECTABLE WATERS Washout Water (Non-Injectable)		OTHER EXEMPT WASTES (type and generation pro	ocess of the waste)
Water Based Muds Water Based Cuttings	Completion Fluid/Flow back (Non-I Produced Water (Non-Injectable)	Injectable)		
Produced Formation Solids	Gathering Line Water/Waste (Non-	-Injectable)		
Tank Bottoms E&P Contaminated Soil	INTERNAL USE ONLY Truck Washout (exempt waste)			
Gas Plant Waste				
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	PRODUCTION GATHER	ING LINES
NON-EXEMPT E&P Waste/Service Identification and Amount				
All non-exempt E&P waste must be analysed and be below the threshold limits for toxicity (TCLP), Ignitability, Corrosivity and Reactivity. Non-Exempt Other *please select from Non-Exempt Waste Nist on back				
tron Exempt other		*please select fro	om Non-Exempt Waste List on back	
QUANTITY	B - BARRELS		Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (are) not a hazardous waste as defined by 40 CFR Part 261 or any applicable state law. That each waste has been properly described, classified and				
packaged, and is in proper condition for transportation according to applicable regulation. Oil field wastes generated from oil and gas exploration and production operations and are not mixed with non-exempt waste (R360 Accepts certifications on a per				
RCRA EXEMPT: load basis only)				
RCRA NON-EXEMPT: Oil field waste which is non-hazardous that does not exceed the minimum standards for waste hazardous by characteristics established in RCRA regulations, 40 CFR				
261.21-261.24, or listed hazardous waste as defined by 40 CFR, part 261, subpart D, as amended. The following documentation demonstrating the waste as non-hazardous is attached. (Check the appropriate items as provided)				
MSDS Information RCRA Hazardous Waste Analysis Other (Provide Description Below)				
<u></u>				*1-92*-13
KAGE CASIDE PUR STATE HARVESTUR 216/2019 Alse GOTOR				
(PRINT) AUTHORIZED AGENTS SIGNATURE DATE SIGNATURE				
-	TR	ANSPORTER	40 08	
Transporter's Name	40 C / + /) C.	Driver's Name	Intas Cl	
Address	1-1-1	Print Name		
		Phone No.		
Phone No.		Truck No.	0 500	
I hereby certify that the above named material(s) was/were picked up at the Generator's site listed above and delivered without incident to the disposal facility listed below.				
SHIPMENT DATE DRIVER'S SIGNATURE DELIVERY DATE DRIVER'S SIGNATURE				
TRUCK TIME STAM		OSAL FACILITY	RECEIVING ARI	
IN: 1 (1) OUT:	DISF	OSALTACILITI	and the second s	LA
Site Name/		* 1	Name/No.	
Permit No. Red Bluff Facility/ STF-065		Phone No.	432-448-4239	
Address 5053 US Highway 285, Orla, TX	79770			
NORM READINGS TAKEN? (Circle O Chloride	ne) YES NO		g > 50 micro roentgens? (circle one)	s NO
Chemical Analysis (Mg/l)		Conductivity (mmhos/cm)		pH
TANK BOTTOMS				
Feet	Inches			
1st Gauge 2nd Gauge		BS&	W/BBLS Received BS&W Free Water	(%)
Received		3	Total Received	- X
Lhoraby contifushed the chairs lead material has been friedle and a second to the chair of the c				
I hereby certify that the above load material has	s been (circle one): ACCEPTED	DENIED If denied, why?	**	
NAME (PRINT)	DATE	TITLE	SIGNATURE	



(PLEASE PRINT) *REQUIRED INFORMATION* Name ___

			Phone No.	
	GENERA	TOR	NO. 1709	96
Operator No.		Permit/RRC No.	7100	00
Operators Name Many thou	0,7	Lease/Well Name & No.	1 k Decken 29 2	284 UM 1112NO
Address 4///	ingel Dord	County	Foldy	
		API No.	21-119-453	Light
City, State, Zip	Nar 89220	Rig Name & No.		
Phone No. 5 15 32 3	3441	AFE/PO No.	TA 19.0220	58
EXEMPT E&P W	aste/Service Identification and Amount (place	e volume next to wa	THE RESIDENCE OF THE PARTY OF T	
Oil Based Cuttings	NON-INJECTABLE WATERS Washout Water (Non-Injectable)		OTHER EXEMPT WASTES (type and generat	ion process of the waste)
Water Based Muds Water Based Cuttings	Completion Fluid/Flow back (Non-Injectable) Produced Water (Non-Injectable)		1 1 1 mo	
Produced Formation Solids	Gathering Line Water/Waste (Non-Injectable)		12011-1 Xx 11	THE STREET
Tank Bottoms E&P Contaminated Soil	INTERNAL USE ONLY Truck Washout (exempt waste)			
Gas Plant Waste				J.
WASTE GENERATION PROCESS:	DRILLING COMPLETIC	ON L	PRODUCTION GA	THERING LINES
All non-exempt F&P	NON-EXEMPT E&P Waste/Service I waste must be analysed and be below the threshold			
Non-Exempt Other	waste must be analysed and be below the threshold	The second second	m Non-Exempt Waste List on back	
	10		A STATE OF THE STA	
QUANTITY	B - BARRELS		Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (a packaged, and is in proper condition for transportation		261 or any applicable	state law. That each waste has been prop	erly described, classified and
2 27 21 2 2 2	generated from oil and gas exploration and production	on operations and are	not mixed with non-exempt waste (R360 /	Accepts certifications cn a per
load basis only)				A 9
	hich is non-hazardous that does not exceed the min or listed hazardous waste as defined by 40 CFR, part			
	iched. (Check-the appropriate items as provided)		A CONTRACTOR OF THE CONTRACTOR	short define waste de Holl
MSDS Information	on RCRA Hazardous Waste Analysis	5	Other (Provide Description Below)	/
1000		-	1/5	
(PRINT) AUTHORIZED AGENTS SIGNATURE	20 HARVESTK 9/	5/20/C	Auchor	21/
(PAINT) ACTIONIZED AGENTS SIGNATURE	TRANSPO		SIGNATURE	
Transporter's	TRANSPO	KIEK	01111	
Name	SING LIC	Driver's Name	Meliento Medina	GALG
Address 00 150 × 11 /	holi MALLIN	Print Name	hoberto priedino	(
-		Phone No.	27	
Phone No.	*	Truck No.	(2)	
I hereby certify that the above named material(s) was	/were picked up at the Generator's site listed above	and delivered withou	incident to the disposal facility listed bel	ow.
SHIPMENT DATE	DRIVER'S SIGNATURE	DELIVER	Y DATE DRIV	VER'S SIGNATURE
TRUCK TIME STAMP	DISPOSAL F	ACILITY	RECEIVING	AREA
IN: 9'48 7 OUT:			Name/No.	TS
Site Name/		Phone No.	100 DE 1	
Permit No. Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 793	770	Andre Ho.	432-448-4239	
NORM READINGS TAKEN? (Circle One		If YES, was readin	g > 50 micro roentgens? (circle one)	YES NO
Chloride	113	Conductivity	g > 50 miles roungens. (entire one)	
Chemical Analysis (Mg/l)	TANKEROL	(mmhos/cm)		рН
Feet	TANK BOT	IOIVIS		
1st Gauge		BS&		3S&W (%)
2nd Gauge			Free Water Total Received	
Received		1 2	, stai neceived	
I hereby certify that the above load material has b		If denied, why?	- 1 W	-
Jorge (7905	4-0-19	PIPAPE	1 1	
NAME (PRINT)	DATE	TITLE	SIGNATURE	



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

Company	/ Man Contact	Information
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			A REAL PROPERTY AND ADDRESS OF THE PARTY AND A			
		GEI	NERATOR		NO.9 79	000
Operator No.	1-40		Permit/RRC	No.	NO.171	ULO
Operators Name	thin () /		Lease/Well	77 1/2 T		
Address 4111		- A	Name & No	101016 1	ECK and 26	- 5-4 MAH AHEAT 6
Address	3 Jawell Ro	DINA	County	Fd.	14	
() IX	Love of the second		API No.	30-	U15-453	411
City, State, Zip	1200 HM 995	120	Rig Name 8	No.		
Phone No.	323 91/41		AFE/PO No.	-	10.0226	7
	YEMPT E&P Wasto/Sorvice Id					
Oil Based Muds	XEMPT E&P Waste/Service Id	REPURCATION and Amo	unt (place volume next	to waste type in b	arrels or cubic yards	
Oil Based Cuttings		er (Non-Injectable)		OTHER EXEM	PT WASTES (type and gen	eration process of the waste)
Water Based Muds		uid/Flow back (Non-Injec	table)	_		
Water Based Cuttings Produced Formation Solids	Produced Wat	er (Non-Injectable)	and the same of th			
Tank Bottoms	Gathering Line	Water/Waste (Non-Inje	ctable)			
E&P Contaminated Soil		t (exempt waste)			JY10 (3	
Gas Plant Waste	-tage	, , , , , , , , , , , , , , , , , , , ,				
WASTE GENERATION PROCESS:	DRILLING	СО	MPLETION	PRODUCTIO	N D	GATHERING LINES
	•					GATTIERING LINES
All r	non-exempt E&P waste must be an	NON-EXEMPT E&P Waste	e/Service Identification an	Amount		With the state of
Non-Exempt Other		larysed and be below the				ity.
The Exempt of the I			*please sei	ect from Non-Exemp	t Waste List on back	
QUANTITY		B - BARRELS		40-12	V VADDC	
					Y - YARDS	E - EACH
I hereby certify that the above listed	material(s), is (are) not a hazardo	us waste as defined by 40	0 CFR Part 261 or any appl	cable state law. Tha	each waste has been p	properly described, classified and
packaged, and is in proper condition	for transportation according to ap	oplicable regulation.				
RCRA EXEMPT:	Oil field wastes generated from oi	l and gas exploration and	d production operations ar	d are not mixed with	non-exempt waste (R3	60 Accepts certifications on a per
	load basis only)					
RCRA NON-EXEMPT:	Oil field waste which is non-hazard	dous that does not excee	ed the minimum standards	for waste hazardous	by characteristics estab	lished in RCRA regulations, 40 CFR
	261.21-261.24, or listed hazardous hazardous is attached. (Check the	s waste as defined by 40	CFR, part 261, subpart D,	is amended. The follo	wing documentation de	emonstrating the waste as non-
	Secretarian and the secret					
	MSDS Information	RCRA Hazardous Was	te Analysis	Other (Provide	Description Below)	
¥				11 19	11-60	
KAAC CASTRA	TER MAI MAI	5 MISKUT	9/010/16	XVa	1,001	
(PRINT) AUTHORIZED AGENTS SIGN		5 AUSAW	9)5/20/E	Sla	SIGNATI	URE
(PRINT) AUTHORIZED AGENTS SIGN		TOAR		_ Sh	SIGNATI	URE
		TRAN	DATE		SIGNATI	URE
Transporter's		TRAN			SIGNATI	URE STORE
Transporter's Name		TRAN	NSPORTER Driver's Nam	e Jyvo	SIGNATI	URE N. M. C. C.
Transporter's		TRAN	NSPORTER Driver's Name	Sla e	SIGNATI	URE OX
Transporter's Name Address		TRAN	NSPORTER Driver's Nam	Sla e y vo	SIGNATI	URE V. A. C. C. C.
Transporter's Name		TRAN	NSPORTER Driver's Name	Sla e Ayyo	SIGNATI	URE N. A. C. C. C.
Transporter's Name Address Phone No.	NATURE	Kround	Driver's Name Print Name Phone No. Truck No.	69	ptir	dota
Transporter's Name Address	NATURE	Kround	Driver's Name Print Name Phone No. Truck No.	69	ptir	dota
Transporter's Name Address Phone No.	NATURE	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. sted above and delivered v	69	e disposal facility listed	dota
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE	d material(s) was/were picked up a	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. sted above and delivered v	(ithout incident to the	e disposal facility listed	below. DRIVER'S SIGNATURE
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN	d material(s) was/were picked up a	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. sted above and delivered v	vithout incident to the	e disposal facility listed	below. DRIVER'S SIGNATURE
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN	d material(s) was/were picked up a	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. sted above and delivered v	vithout incident to the	e disposal facility listed	below. DRIVER'S SIGNATURE
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIM IN: Site Name/	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT:	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. sted above and delivered v	vithout incident to the	e disposal facility listed	below. DRIVER'S SIGNATURE
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIM IN: Site Name/ Permit No. Red Bluff Facility	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT:	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. sted above and delivered v	vithout incident to the	e disposal facility listed	below. DRIVER'S SIGNATURE
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN IN: Site Name/ Permit No. Red Bluff Facility	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT:	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. sted above and delivered v	Vithout incident to the DELIVERY DATE	e disposal facility listed	below. DRIVER'S SIGNATURE
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN IN: Site Name/ Permit No. Address Red Bluff Facility S053 US Highway 2000 NORM READINGS TAK	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. sted above and delivered v	DELIVERY DATE Na 432-448-4239	e disposal facility listed	below. DRIVER'S SIGNATURE G AREA
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIM IN: Site Name/ Permit No. Address NORM READINGS TAN Chloride	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. Sted above and delivered v Phone No. If YES, was Conductivity	DELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No.	below. DRIVER'S SIGNATURE
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN IN: Site Name/ Permit No. Address Red Bluff Facility S053 US Highway 2000 NORM READINGS TAK	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770	at the Generator's site lis DISPOS	Driver's Name Print Name Phone No. Truck No. sted above and delivered v Phone No. If YES, was Conductivity (mmhos/cr	DELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No.	below. DRIVER'S SIGNATURE G AREA
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIM IN: Site Name/ Permit No. Address NORM READINGS TAN Chloride	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770	at the Generator's site lis	Driver's Name Print Name Phone No. Truck No. sted above and delivered v Phone No. If YES, was Conductivity (mmhos/cr	DELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No.	below. DRIVER'S SIGNATURE G AREA YES NO
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIM IN: Site Name/ Permit No. Address NORM READINGS TAN Chloride	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770 KEN? (Circle One) YES	at the Generator's site lis DISPOS	Driver's Name Print Name Phone No. Truck No. sted above and delivered v Phone No. If YES, was Conductivity (mmhos/cr	DELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No.	below. DRIVER'S SIGNATURE G AREA YES NO
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN IN: Site Name/ Permit No. Address SO53 US Highway 3 NORM READINGS TAN Chloride Chemical Analysis (Mg/l) Fee 1st Gauge	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770 KEN? (Circle One) YES	at the Generator's site lis DISPOS NO	Driver's Name Print Name Phone No. Truck No. sted above and delivered v Phone No. If YES, was Conductivity (mmhos/cr	Vithout incident to the DELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No	below. DRIVER'S SIGNATURE G AREA YES NO
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN IN: Red Bluff Facility NORM READINGS TAK Chloride Chemical Analysis (Mg/I) Fee 1st Gauge 2nd Gauge	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770 KEN? (Circle One) YES	at the Generator's site lis DISPOS NO	Driver's Name Print Name Phone No. Truck No. sted above and delivered v Phone No. If YES, was Conductivity (mmhos/cr	Vithout incident to the DELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No	below. DRIVER'S SIGNATURE G AREA YES NO PH
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN IN: Site Name/ Permit No. Address SO53 US Highway 3 NORM READINGS TAN Chloride Chemical Analysis (Mg/l) Fee 1st Gauge	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770 KEN? (Circle One) YES	at the Generator's site lis DISPOS NO	Driver's Name Print Name Phone No. Truck No. sted above and delivered v Phone No. If YES, was Conductivity (mmhos/cr	Vithout incident to the DELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No	below. DRIVER'S SIGNATURE G AREA YES NO PH
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN IN: Red Bluff Facility NORM READINGS TAK Chloride Chemical Analysis (Mg/I) Fee 1st Gauge 2nd Gauge Received	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770 (EN? (Circle One) YES	at the Generator's site lis E DISPOS NO TANK nches	Driver's Name Print Name Phone No. Truck No. sted above and delivered v CAL FACILITY Phone No. If YES, was Conductivity (mmhos/cr	PERIODELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No	below. DRIVER'S SIGNATURE G AREA YES NO PH
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN IN: Red Bluff Facility NORM READINGS TAK Chloride Chemical Analysis (Mg/I) Fee 1st Gauge 2nd Gauge	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770 (EN? (Circle One) YES	at the Generator's site lis E DISPOS NO TANK nches	Driver's Name Print Name Phone No. Truck No. sted above and delivered v Phone No. If YES, was Conductivity (mmhos/cr	PERIODELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No	below. DRIVER'S SIGNATURE G AREA YES NO PH
Transporter's Name Address Phone No. I hereby certify that the above named SHIPMENT DATE TRUCK TIN IN: Red Bluff Facility NORM READINGS TAK Chloride Chemical Analysis (Mg/I) Fee 1st Gauge 2nd Gauge Received	d material(s) was/were picked up a DRIVER'S SIGNATURE ME STAMP OUT: y/ STF-065 285, Orla, TX 79770 (EN? (Circle One) YES	at the Generator's site lis E DISPOS NO TANK nches	Driver's Name Print Name Phone No. Truck No. sted above and delivered v CAL FACILITY Phone No. If YES, was Conductivity (mmhos/cr	PERIODELIVERY DATE Na 432-448-4239 reading > 50 micro ro	RECEIVIN me/No	below. DRIVER'S SIGNATURE G AREA YES NO PH

(PLEASE PRINT) *REQUIRED INFORMATION* Name_

				Phon	e No
		GENERAT	OR	NO. 7 7	1005
Operator No.		a ya u	Permit/RRC No.	ola / E	7303
Operators Name May 1	wn 0,1		Name & No.	CIEDRILANDO 24	5284 WA 143115
Address 4/1/	57, douch love	<u> </u>	County	Edilia	
C. 11 \s	1 14 0000		API No.	30-015-41	6344
City, State, Zip	223 OCICI	2	Rig Name & No.	10 10 000	prime play
Phone No.			AFE/PO No.	JA 17-022	78
Oil Based Muds	IPT E&P Waste/Service Identificat		olume next to wa	aste type in barrels or cubic yar OTHER EXEMPT WASTES (type and g	
Oil Based Cuttings Water Based Muds	Washout Water (Non-In	jectable)		The second secon	THE PERSON NAMED IN COLUMN TWO IS NOT THE OWNER.
Water Based Cuttings	Completion Fluid/Flow b			Belly Du	
Produced Formation Solids Tank Bottoms	Gathering Line Water/W INTERNAL USE ONLY	/aste (Non-Injectable)		The	
E&P Contaminated Soil	Truck Washout (exempt	waste)			
Gas Plant Waste WASTE GENERATION PROCESS:	DRILLING	COMPLETION		PROPUCTION	CATHERING HINES
WASTE GENERATION PROCESS.				PRODUCTION	GATHERING LINES
All non-e	NON-EXEI xempt E&P waste must be analysed an	MPT E&P Waste/Service Ide ad be below the threshold lir			tivity.
Non-Exempt Other			The same of the sa	m Non-Exempt Waste List on back	
QUANTITY	B - BAI	RRELS	100	Y - YARDS	E - EACH
I hereby certify that the above listed mate			1 or any applicable	state law. That each waste has bee	n properly described, classified and
packaged, and is in proper condition for t	ransportation according to applicable r eld wastes generated from oil and gas		onerations and are	not mixed with non-exempt waste (R360 Accents certifications on a per
I NCNA EXEIVIPT.	basis only)	exploration and production	operations and are i	iot mixed with hom-exempt waste (1300 Accepts certifications on a per
RCRA NON-EXEMPT: Oil fi	eld waste which is non-hazardous that	does not exceed the minim	um standards for wa	ste hazardous by characteristics est	tablished in RCRA regulations, 40 CFR
	21-261.24, or listed hazardous waste as rdous is attached. (Check the appropria		1, suppart D, as ame	nded. The following documentation	demonstrating the waste as non-
☐ MSD	S Information RCRA I	Hazardous Waste Analysis		Other (Provide Description Below)	
				0000	1
(PRINT) AUTHORIZED AGENTS SIGNATUR	GR STAR UA	7 V8572 91	15/2019 DATE	Strutt	VATURE
		TRANSPOR	TER		
Transporter's Typ Transporter's	c On s		Driver's Name	x te	
Name Address	1031		Print Name	1650-5	
1 malen	N M XX2	160	Phone No.		
Phone No.			Truck No.	#3	
I hereby certify that the above named ma	terial(s) was/were picked up at the Ge	nerator's site listed above a	nd delivered without	incident to the disposal facility liste	ed below.
9-5-14	11.1.		9-5-1	9 17	
SHIPMENT DATE	DRIVER'S SIGNATURE		DELIVER		DRIVER'S SIGNATURE
IN: 8 5627 OU	COLUMN TO THE COURT	DISPOSAL FA	CILITY	Name/No.	NG AREA
Site Name/ Permit No. Red Bluff Facility/ S	TF-065	2 4	Phone No.	432-448-4239	Tegy Sec
Address 5053 US Highway 285,	Orla, TX 79770				W. Walley
NORM READINGS TAKEN? Chloride	(Circle One) YES	NO	Conductivity	g > 50 micro roentgens? (circle one	9
Chemical Analysis (Mg/l)			(mmhos/cm)	w	рН
Feet	Inches	TANK BOTT	CIVIS	0 - 10 x	
1st Gauge	mones		BS&	W/BBLS Received	BS&W (%)
2nd Gauge Received				Free Water Total Received	
				V-W	
I hereby certify that the above load ma	aterial has been (circle one): ACC	CEPTED DENIED	If denied, why?		
Joing long	9.5.19	1110	11	# //	des vers
NAME (PRINT)	DATE		TITLE	SIGN	NATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name_____

Company	Man (Contact	Info	ormation
---------	-------	---------	------	----------

solutions		Phone No.
	GENERATOR	NO.170983
Operator No.	Permit/RR Lease/Wel	CNo.
Operators Name Mayathon Or	Name & N	The state of the s
Address 4/11 57 duels	Poce of County API No.	30-016-416344
City, State, Zip Carl Shad Sun 5	39220 Rig Name	₹ No.
Phone No. 575 323 944	AFE/PO No	7A10.02258
	ervice Identification and Amount (place volume nex	
	INJECTABLE WATERS out Water (Non-Injectable)	OTHER EXEMPT WASTES (type and generation process of the waste)
Water Based Muds Comp	pletion Fluid/Flow back (Non-Injectable) uced Water (Non-Injectable)	
Produced Formation Solids Gathe	ering Line Water/Waste (Non-Injectable)	- Velly your
The state of the s	RNAL USE ONLY Washout (exempt waste)	But and the second state of the second
Gas Plant Waste		CATUEDING LINES
WASTE GENERATION PROCESS: DRILL		PRODUCTION GATHERING LINES
All non-exempt F&P waste n	NON-EXEMPT E&P Waste/Service Identification a nust be analysed and be below the threshold limits for toxi	
Non-Exempt Other		elect from Non-Exempt Waste List on back
QUANTITY	B - BARRELS	Y - YARDS E - EACH
I hereby certify that the above listed material(s), is (are) not a	a hazardous waste as defined by 40 CFR Part 261 or any ap	plicable state law. That each waste has been properly described, classified and
packaged, and is in proper condition for transportation accor	rding to applicable regulation.	and are not mixed with non-exempt waste (R360 Accepts certifications on a per
RCRA EXEMPT: Oil field wastes generate load basis only)	ed from oil and gas exploration and production operations	and are not mixed with non-exempt waste (1500 Accepts certained on a per
RCRA NON-EXEMPT: Oil field waste which is r	non-hazardous that does not exceed the minimum standar	ds for waste hazardous by characteristics established in RCRA regulations, 40 CFR
	hazardous waste as defined by 40 CFR, part 261, subpart L Check the appropriate items as provided)	o, as amended. The following documentation demonstrating the waste as non-
MSDS Information	RCRA Hazardous Waste Analysis	Other (Provide Description Below)
	57 1	A A A A A A
CASTRO PER SHAR	HARRIS RIQ 9/5/2019	MULLUL
(PRINT) AUTHORIZED AGENTS SIGNATURE	TRANSPORTER	SIGNATURE
Transporter's	TRANSPORTER	77
Name	Driver's N	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
Address	Print Nam Phone No	
Phone No.	Truck No.	87%
I hereby certify that the above named material(s) was/were		d without incident to the disposal facility listed below.
9.5.19 V TO=	Lin Tobergo G.	211 - The Me Me and I was
The state of the s	R'S SIGNATURE	DELIVERY DATE DRIVER'S SIGNATURE RECEIVING AREA
TRUCK TIME STAMP	DISPOSAL FACILITY	Name/No.
Site Name/	Phone No	432-448-4239
Address 5053 US Highway 285, Orla, TX 79770		
NORM READINGS TAKEN? (Circle One)	125	as reading > 50 micro roentgens? (circle one) YES NO
Chloride Chemical Analysis (Mg/l)	Conductive (mmhos	
	TANK BOTTOMS	The second secon
Feet	Inches	BS&W/BBLS Received BS&W (%)
1st Gauge 2nd Gauge	The state of the s	Free Water
Received		Total Received
I hereby certify that the above load material has been (ci	rcle one): ACCEPTED DENIED If deni	ed, why?
Later Grace	9-5-19 Teletal	4 1/
NAME (PRINT)	DATE TITLE	SIGNATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

				Phone	
	(= () = (GENERATOR		NO a TO	004
				NO.170	984
Operator No.		Per	mit/RRC No.		
1. 1.	A	Lea	ise/Well	x - X	
Operators Name	0.1	Nar	me & No.	ACH DECKARIO 25	374 WA 1021 5
Address 4/11 37 7/14	well promet	Cou	unty	Was all mothers	
Address	the first total	Cot	rity	- CAUCY	-
	- One	API	No.	11 UB- 45X	of but
City, State, Zip	IM 88220	Dig	Name & No.		
City, State, 2ip		Mg	ivallie & ivo.		at 3
Phone No.	94/4/1	AFE	E/PO No.	12/6.11/20	Ď
EVEN ADTER D. V.	Variable of the second	1.0			
No. of the last of	vaste/Service Identification and	I Amount (place volur	ne next to wa	ste type in barrels or cubic yards	
Oil Based Muds	NON-INJECTABLE WATERS			OTHER EXEMPT WASTES (type and gene	eration process of the waste)
Oil Based Cuttings	Washout Water (Non-Injectable)			
Water Based Muds	Completion Fluid/Flow back (No	n-Injectable)		7	
Water Based Cuttings	Produced Water (Non-Injectable	a)		(1 it to))
Produced Formation Solids	Gathering Line Water/Waste (N	on-Injectable)		Contet Dum.	*
Tank Bottoms	INTERNAL USE ONLY			1/0	
E&P Contaminated Soil	Truck Washout (exempt waste)				
Gas Plant Waste					
	1 ppulling	T COLUMN STICK			
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	1	PRODUCTION (GATHERING LINES
	uou everence.				
		P Waste/Service Identific			
All non-exempt E&F	waste must be analysed and be be	low the threshold limits f	or toxicity (TCL	P), Ignitability, Corrosivity and Reactivi	ty.
Non-Exempt Other	*	*p	lease select fro	m Non-Exempt Waste List on back	· · · · · · · · · · · · · · · · · · ·
					100
QUANTITY	B - BARRELS			Z & V VARDS	E FACIL
QUANTITY	B - BARKELS			CO Y-YARDS	E - EACH
I hereby certify that the above listed material(s), is (are) not a hazardous waste as defin	ad by 40 CEP Part 261 or	any applicable	state law. That each waste has been n	roporty described electified and
			any applicable s	state law. That each waste has been p	roperly described, classified and
packaged, and is in proper condition for transportati	on according to applicable regulation	m.			
RCRA EXEMPT: Oil field wastes	generated from oil and gas explora-	tion and production oper	ations and are r	not mixed with non-exempt waste (R3	60 Accepts certifications on a per
load basis only)					
Oil field waste	ubich is non hazardaus that dans no	at avecad the valuinaries of	toudoudo fou	aka bananda sa bisabanaka daka asaba	listed in DCDA available at 40 CCD
				ste hazardous by characteristics estab	
			opart D, as ame	nded. The following documentation de	emonstrating the waste as non-
hazardous is att	tached. (Check the appropriate item	s as provided)			4
MSDS Informat	ion RCRA Hazardo	us Waste Analysis		Other (Provide Description Below)	
		as waste marysis		A Description Below,	
				B T	
	1	1/1		VI (IAM)	2
SAAC (AS THO VERL)	NA 1151 17 860	1 01917	-6) (MINTER	7 1
(PRINT) AUTHORIZED AGENTS SIGNATURE	127 41	DATE		SIGNATI	URE
				and the second s	
	A STATE OF THE STA	RANSPORTE	R		1
Transporter's	112 - 5		The same of the sa		
Name IVE IVECTSE	214/12/	Driv	ver's Name	160000	1-10120010 T
VICTOR 1	111				1100
Address		Prin	nt Name		
		Pho	ne No.		
A CONTRACTOR OF THE CONTRACTOR				all description	
Phone No.	1				
			ck No.	5	1
I hereby certify that the above named material(s) wa	is/were nicked up at the Generator'		Section 1	incident to the disposal facility listed	holow
I hereby certify that the above named material(s) wa	s/were picked up at the Generator		Section 1	incident to the disposal facility listed	below.
I hereby certify that the above named material(s) was	as/were picked up at the Generator'		Section 1	incident to the disposal facility listed	below. Jule 2000
I hereby certify that the above named material(s) was	DRIVER'S SIGNATURE		Section 1	9 XJac	below. below.
9-5 19 SHIPMENT DATE	DRIVER'S SIGNATURE	s site listed above and de	elivered without	9 X Jac	DRIVER'S SIGNATURE
9-5 19 1	DRIVER'S SIGNATURE		elivered without	9 XJac	DRIVER'S SIGNATURE
SHIPMENT DATE TRUCK TIME STAMI	DRIVER'S SIGNATURE	s site listed above and de	elivered without	Y DATE RECEIVIN	DRIVER'S SIGNATURE
9-5 19 SHIPMENT DATE	DRIVER'S SIGNATURE	s site listed above and de	elivered without	9 X Jac	DRIVER'S SIGNATURE
SHIPMENT DATE TRUCK TIME STAMI IN: OUT:	DRIVER'S SIGNATURE	POSAL FACIL	elivered without	Y DATE RECEIVIN	DRIVER'S SIGNATURE
SHIPMENT DATE TRUCK TIME STAMI IN: OUT: Site Name/	DRIVER'S SIGNATURE	POSAL FACIL	elivered without	RECEIVIN Name/No.	DRIVER'S SIGNATURE
SHIPMENT DATE TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Red Bluff Facility/ STF-065	DRIVER'S SIGNATURE DIS	POSAL FACIL	elivered without	Y DATE RECEIVIN	DRIVER'S SIGNATURE
SHIPMENT DATE TRUCK TIME STAMI IN: OUT: Site Name/	DRIVER'S SIGNATURE DIS	POSAL FACIL	elivered without	RECEIVIN Name/No.	DRIVER'S SIGNATURE
SHIPMENT DATE TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Red Bluff Facility/ STF-065	DRIVER'S SIGNATURE DIS	POSAL FACIL Pho	DELIVERY JITY one No.	RECEIVIN Name/No.	DRIVER'S SIGNATURE G AREA
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 79	DRIVER'S SIGNATURE DIS	POSAL FACIL Pho	DELIVERY ITY THE No.	RECEIVIN Name/No.	DRIVER'S SIGNATURE
SHIPMENT DATE TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 79 NORM READINGS TAKEN? (Circle One Chloride	DRIVER'S SIGNATURE DIS	POSAL FACIL Pho	DELIVERY ITY THE NO. YES, was reading ductivity	RECEIVIN Name/No.	DRIVER'S SIGNATURE G AREA YES NO
SHIPMENT DATE TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 79 NORM READINGS TAKEN? (Circle One	DRIVER'S SIGNATURE P DIS D770 P YES NO	POSAL FACIL Pho If Y Con (m	DELIVER THE No. YES, was reading ductivity amhos/cm)	RECEIVIN Name/No.	DRIVER'S SIGNATURE G AREA
SHIPMENT DATE TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 79 NORM READINGS TAKEN? (Circle One Chloride	DRIVER'S SIGNATURE P DIS D770 P YES NO	POSAL FACIL Pho	DELIVER THE No. YES, was reading ductivity amhos/cm)	RECEIVIN Name/No.	DRIVER'S SIGNATURE G AREA YES NO
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 S053 US Highway 285, Orla, TX 79 NORM READINGS TAKEN? (Circle One Chloride Chemical Analysis (Mg/l)	DRIVER'S SIGNATURE P DIS P P P P P P P P P P P P P	POSAL FACIL Pho If Y Con (m	DELIVER THE No. YES, was reading ductivity amhos/cm)	RECEIVIN Name/No.	DRIVER'S SIGNATURE G AREA YES NO
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 79 NORM READINGS TAKEN? (Circle One Chloride Chemical Analysis (Mg/l) Feet	DRIVER'S SIGNATURE P DIS D770 P YES NO	POSAL FACIL Pho If Y Con (m	DELIVER TYS, was reading ductivity nmhos/cm)	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one)	PES (NO pH
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address	DRIVER'S SIGNATURE P DIS P P P P P P P P P P P P P	POSAL FACIL Pho If Y Con (m	DELIVER TYS, was reading ductivity nmhos/cm)	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one)	DRIVER'S SIGNATURE G AREA YES NO
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address	DRIVER'S SIGNATURE P DIS P P P P P P P P P P P P P	POSAL FACIL Pho If Y Con (m	DELIVER TYS, was reading ductivity nmhos/cm)	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one) W/BBLS Received Free Water	PES (NO pH
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address	DRIVER'S SIGNATURE P DIS 9770 e) YES NO	POSAL FACIL Pho If Y Con (m	DELIVER TYS, was reading ductivity nmhos/cm)	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one)	PES (NO pH
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address	DRIVER'S SIGNATURE P DIS 9770 e) YES NO	POSAL FACIL Pho If Y Con (m	DELIVER TYS, was reading ductivity nmhos/cm)	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one) W/BBLS Received Free Water	PES (NO pH
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address	DRIVER'S SIGNATURE P DIS DIS DIS DIS DIS DIS DIS	POSAL FACIL Pho If Y Con (m	DELIVERY LITY THE No. YES, was reading ductivity namhos/cm) BS&4	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one) W/BBLS Received Free Water	PES (NO pH
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address	DRIVER'S SIGNATURE P DIS DIS DIS DIS DIS DIS DIS	POSAL FACIL Pho If Y Con (m	DELIVERY JES, was reading ductivity nmhos/cm) BS&v	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one) W/BBLS Received Free Water	PES (NO pH
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address	DRIVER'S SIGNATURE P DIS DIS DIS DIS DIS DIS DIS	POSAL FACIL Pho If Y Con (m	DELIVERY JES, was reading ductivity nmhos/cm) BS&v	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one) W/BBLS Received Free Water	PES (NO pH
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address	DRIVER'S SIGNATURE P DIS P DIS P DIS P DIS ACCEPTED G G G G G G G G G G G G G G G G G G	POSAL FACIL Pho If Y Con (m) DENIED If	DELIVERY JES, was reading ductivity nmhos/cm) BS&v	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one) W/BBLS Received Free Water Total Received	YES (NO pH
TRUCK TIME STAMI IN: OUT: Site Name/ Permit No. Address	DRIVER'S SIGNATURE DIS DIS DIS DIS DIS DIS DIS DI	POSAL FACIL Pho If Y Con (m	DELIVERY JES, was reading ductivity nmhos/cm) BS&v	RECEIVIN Name/No. 432-448-4239 g > 50 micro roentgens? (circle one) W/BBLS Received Free Water	YES (NO pH



TEXAS NON-HAZARDOUS OILFIELD WASTE MANIFEST Company Man Contact Information

(PLEASE PRINT)	*REQUIRED INFORMATION*	Name	
(I ELASE I MINT)		Phone No.	

	GEN	ERATOR	NO.4 709	981
Operator No.		Permit/RRC No. Lease/Well	alo I W	of ola
Operators Name Manthon	0,1	Name & No.	ite Preferent =	5 DE THAINAR
Address 4111 5 7 1 1	usellead	County	30-016-46	3011
On 11 hard	111 98990	API No. Rig Name & No.	20 12 3 12	
Phone No.	9/6/1	AFE/PO No.	TA 19 0225	P - Day
	aste/Service Identification and Amour	nt (place volume next to wa	ste type in barrels or cubic yards	
Oil Based Muds Oil Based Cuttings	NON-INJECTABLE WATERS Washout Water (Non-Injectable)		OTHER EXEMPT WASTES (type and gen	eration process of the waste)
Water Based Muds	Completion Fluid/Flow back (Non-Injecta Produced Water (Non-Injectable)	ble)	0 11 11 1000	-00.00000000000000000000000000000000000
Produced Formation Solids	Gathering Line Water/Waste (Non-Injecta	able)	Dell'I you	
Tank Bottoms E&P Contaminated Soil	Truck Washout (exempt waste)			a principality
Gas Plant Waste	DRILLING COA	APLETION	PRODUCTION	GATHERING LINES
WASTE GENERATION PROCESS:		Service Identification and Amor		
All non-exempt E&P v	NON-EXEMPT E&P Waste/ waste must be analysed and be below the t	hreshold limits for toxicity (TCL	P), Ignitability, Corrosivity and Reactiv	ity.
Non-Exempt Other		*please select fro	m Non-Exempt Waste List on back	
QUANTITY	B - BARRELS	O'SET STORY	Y-YARDS O	E - EACH
I hereby certify that the above listed material(s), is (ar	e) not a hazardous waste as defined by 40	CFR Part 261 or any applicable	state law. That each waste has been	properly described, classified and
packaged, and is in proper condition for transportatio	n according to applicable regulation. enerated from oil and gas exploration and	production operations and are	not mixed with non-exempt waste (R:	360 Accepts certifications on a per
RCRA EXEMPT: load basis only)				
RCRA NON-EXEMPT: Oil field waste wi	hich is non-hazardous that does not exceed or listed hazardous waste as defined by 40 C	the minimum standards for wa	aste hazardous by characteristics esta ended. The following documentation of	blished in RCRA regulations, 40 CFR lemonstrating the waste as non-
hazardous is atta	ched. (Check the appropriate items as prov	vided)	1	
MSDS Information	n RCRA Hazardous Wast	e Analysis	Other (Provide Description Below)	
		21 1	1 11 6	12
(PRINT) AUTHORIZED AGENTS SIGNATURE	HAR HARVESTR -	9/5/20/9 DATE	SIGNA	TURE
	TRAN	SPORTER		,
Transporter's	of track BIDE	Driver's Name	throntoext 5	Ame
Name Address	CATACAT (19)	Print Name	MATTER STREET	
Audiess		Phone No.	68%	
Phone No.		Truck No.	06	
I hereby certify that the above named material(s) was	s/were picked up at the Generator's site lis	ted above and delivered withou	it incident to the disposal facility lister	d below.
SHIPMENT DATE	DRIVER'S SIGNATURE	DELIVE	RYDATE	DRIVER'S SIGNATURE
TRUCK TIME STAMP	DISPOS	AL FACILITY	RECEIVI	NG AREA
IN: 7.7310 OUT:			Name/No.	
Site Name/		Phone No.	432-448-4239	
Permit No. Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79	770	Seat of	432-440-4233	
NORM READINGS TAKEN? (Circle One	1)		ng > 50 micro roentgens? (circle one)	YES
Chloride Chemical Analysis (Mg/l)		Conductivity (mmhos/cm)		pH
	TANK	BOTTOMS		The state of the s
Feet	Inches	n DC	&W/BBLS Received	BS&W (%)
1st Gauge 2nd Gauge		ВЗС	Free Water	BOOK (CO)
Received		ADVIOLETE A	Total Received	N 11
I hereby certify that the above load material has b	peen (circle one): ACCEPTED	DENIED If denied, why	1 10 10 min	
Jaly Guir	9-5-14	Received	411	
NAME (PRINT)	DATE	TITLE	SIGN	ATURE



TEXAS NON-HAZARDOUS OILFIELD WASTE MANIFEST Company Man Contact Information

(PLEASE PRINT) *REQUIRED INFORMATION* Name____

SOLUTIONS			Phone	No
	GE	NERATOR	NO.170	979
Operator No.	The state of the s	Permit/RRC No.	210	313
Operators Name Awaratha	n 0,1	Lease/Well Name & No.	ick Derkant 2	5084WA11121
Address 4/11 5 7 6	well Docket	County	Soldy	57
	1111 000000	API No.	30-119-49	344
City, State, Zip	VM 88220	Rig Name & No.	10 000	<u></u>
Phone No.	3447	AFE/PO No.	740000	
EXEMPT E&P W	aste/Service Identification and Am NON-INJECTABLE WATERS	ount (place volume next to wa	oste type in barrels or cubic yard OTHER EXEMPT WASTES (type and ge	
Oil Based Cuttings	Washout Water (Non-Injectable)			
Water Based Muds Water Based Cuttings	Completion Fluid/Flow back (Non-Inje Produced Water (Non-Injectable)	ectable))
Produced Formation Solids Tank Bottoms	Gathering Line Water/Waste (Non-Inj	jectable)	Colly Dum	
E&P Contaminated Soil	Truck Washout (exempt waste)		У	
Gas Plant Waste WASTE GENERATION PROCESS:	DRILLING C	COMPLETION	PRODUCTION	GATHERING LINES
WASTE GENERA NON PROCESS.		•		GATTERING EINES
All non-exempt E&P	waste must be analysed and be below the	ste/Service Identification and Amo he threshold limits for toxicity (TCL		vity.
Non-Exempt Other		*please select fro	m Non-Exempt Waste List on back	
QUANTITY	B - BARRELS	×	Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (a		40 CFR Part 261 or any applicable	state law. That each waste has been	properly described, classified and
packaged, and is in proper condition for transportation		and production operations and are	not mixed with non-exempt waste (R	360 Accents certifications on a ner
RCRA EXEMPT: load basis only)	enerated from oil and gas exploration a	ind production operations and are	not mixed with non-exempt waste (N	300 Accepts certifications of a per
	hich is non-hazardous that does not exc			
	r listed hazardous waste as defined by 4 sched. (Check the appropriate items as p		ended. The following documentation	demonstrating the waste as non-
MSDS Information			Other (Provide Description Below)	
			000	
PACCASRO RIQ SHAR	HARVESTER	9/5/2019	Alle (18	21
(PRINT) AUTHORIZED AGENTS SIGNATURE		DATE	SIGN.	ATURE V
	TRA	NSPORTER	0	
Transporter's KIKAIZ I/	<u> </u>	Driver's Name	Kamiyo Flo	DYS
Address 215 F TORE	156	Print Name		
2011291000	UM 88260	Phone No.	575 605 16	, 90
Phone No.	2	Truck No.		78.7
I hereby certify that the above named material(s) was	/were picked up at the Generator's site	listed above and delivered withou	it incident to the disposal facility liste	d below.
SHIPMENT DATE	DRIVER'S SIGNATURE	DELIVE	RY DATE	DRIVER'S SIGNATURE
TRUCK TIME STAMP	DISPO	SAL FACILITY	RECEIVII	NG AREA
IN: 6 55 / OUT:			Name/No.	
Site Name/ Permit No. Red Bluff Facility/ STF-065		Phone No.	432-448-4239	
Permit No. Address 5053 US Highway 285, Orla, TX 79	770		432-440-4233	
NORM READINGS TAKEN? (Circle One		If YES, was reading	ng > 50 micro roentgens? (circle one)	YES NO
Chloride Chemical Analysis (Mg/l)		Conductivity (mmhos/cm)		pH
	TAN	KBOTTOMS		
Feet	Inches		-	
1st Gauge 2nd Gauge		BS8	kW/BBLS Received Free Water	BS&W (%)
Received			Total Received	
I hereby certify that the above load material has b	een (circle one): ACCEPTED	DENIED If denied, why?		=-
The control of the co	9.5-19	The contract of the contract o		
NAME (PRINT)	DATE	TITLE	SIGN	ATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

ocurous -		Phone No
	GENERATOR	NO.170978
Operator No.	Permit/RRC No.	710310
Operators Name May to on 0, 1	Lease/Well Name & No.	ich Deckard 25 204 WA 1117451
Address 4111 57 dwell 1	County	FNDY
42	API No.	30-015-4-5244
City, State, Zip Carly hales, Nu	89 226 Rig Name & No.	All the second of the second o
Phone No. 544 323 944	AFE/PO No.	TA 1.0. 02250
EXEMPT E&P Waste/Service	Identification and Amount (place volume next to wa	aste type in barrels or cubic yards)
Oil Based Muds NON-INJECT	ABLE WATERS	OTHER EXEMPT WASTES (type and generation process of the waste)
	ater (Non-Injectable) Fluid/Flow back (Non-Injectable)	0 - 1
Described and the second of th	ater (Non-Injectable)	Calle Was
Tank Bottoms Gathering Life	ne Water/Waste (Non-Injectable) SE ONLY	Ve do
E&P Contaminated Soil Gas Plant Waste Truck Washo	out (exempt waste)	
WASTE GENERATION PROCESS: DRILLING	COMPLETION	DDODUCTION CATUEDING INTE
DILLING		PRODUCTION GATHERING LINES
All non-exempt E&P waste must be	NON-EXEMPT E&P Waste/Service Identification and Amo analysed and be below the threshold limits for toxicity (TCL	
Non-Exempt Other		m Non-Exempt Waste List on back
	The state of the s	
QUANTITY	B - BARRELS	Y - YARDS E - EACH
I hereby certify that the above listed material(s), is (are) not a hazard packaged, and is in proper condition for transportation according to	lous waste as defined by 40 CFR Part 261 or any applicable	state law. That each waste has been properly described, classified and
Oil field wastes generated from		not mixed with non-exempt waste (R360 Accepts certifications on a per
RCRA EXEMPT: load basis only)		The state of the second waste (1550 Accepts certifications of a per
RCRA NON-EXEMPT: Oil field waste which is non-haza	ardous that does not exceed the minimum standards for wa	aste hazardous by characteristics established in RCRA regulations, 40 CFR
261.21-261.24, or listed hazardo hazardous is attached. (Check th	ous waste as defined by 40 CFR, part 261, subpart D, as ame ne appropriate items as provided)	ended. The following documentation demonstrating the waste as non-
MSDS Information	RCRA Hazardous Waste Analysis	Other (Provide Description Below)
		1 15
SAME COSTON TO SURA 1	A 130 9/5/01	1 1 70
(PRINT) AUTHORIZED AGENTS SIGNATURE	DATE	SIGNATURE
	TRANSPORTER	The state of the s
Transporter's		Α. Λ
	Driver's Name	Sixu All
Address	Print Name	
Phone No.	Phone No. Truck No.	N on 9
I hereby certify that the above named material(s) was/were picked u	^	AND ADDRESS OF THE PROPERTY OF
SHIPMENT DATE DRIVER'S SIGNATI	URE GELIVER	Y DATE DRIVER'S SIGNATURE
TRUCK TIME STAMP	DISPOSAL FACILITY	RECEIVING AREA
IN: 6 5517 OUT:		Name/No.
Site Name/		
Permit No. Red Bluff Facility/ STF-065	Phone No.	432-448-4239
Address 5053 US Highway 285, Orla, TX 79770		
NORM READINGS TAKEN? (Circle One) Chloride YES	NO If YES, was reading Conductivity	g > 50 micro roentgens? (circle one) YES NO
Chemical Analysis (Mg/l)	(mmhos/cm)	рН
	TANK BOTTOMS	
Feet	Inches State	
1st Gauge	BS&	W/BBLS Received BS&W (%)
2nd Gauge Received	12	Free Water Total Received
I hereby certify that the above load material has been (circle one):	=/	7 1
Jan 1400 9-5	14 / Ciciser	7//
NAME (PRINT)	DATE	SIGNATURE



TEXAS NON-HAZARDOUS OILFIELD WASTE MANIFEST Company Man Contact Information

(PLEASE PRINT) *REQUIRED INFORMATION* Name __

NVIBONMENTAL	(FEEDEL MINT)	Phone No
•	GENERATOR	NO.170977
Operator No.	Permit/RRC No.	210011
and Maratzar O	Lease/Well Name & No.	OF TRIVARD 2520 4 DIA 1+20 1/4/
Operators Name Address Address Address	Lell Road County	Eddy
Address	API No.	3,0-015-45344
City, State, Zip Carbbad	MM 89220 Rig Name & No.	2000 4 0
Phone No. 575 323 91	AFE/PO No.	TA:19.02268
EXEMPT E&P Waste	e/Service Identification and Amount (place volume next to wa	
	ION-INJECTABLE WATERS Vashout Water (Non-Injectable)	OTHER EXEMPT WASTES (type and generation process of the waste)
Water Based Muds C	Completion Fluid/Flow back (Non-Injectable)	
	roduced Water (Non-Injectable) Sathering Line Water/Waste (Non-Injectable)	Scll 1 1 mg
	NTERNAL USE ONLY	90
	ruck Washout (exempt waste)	The second secon
Gas Plant Waste WASTE GENERATION PROCESS: D	RILLING COMPLETION	PRODUCTION GATHERING LINES
WASTE SEITERATION THOUSAND	NON-EXEMPT E&P Waste/Service Identification and Amou	unt .
All non-exempt E&P was	ste must be analysed and be below the threshold limits for toxicity (TCLI	
Non-Exempt Other	*please select fro	m Non-Exempt Waste List on back
QUANTITY	B - BARRELS	Y - YARDS E - EACH
	not a hazardous waste as defined by 40 CFR Part 261 or any applicable :	state law. That each waste has been properly described, classified and
packaged, and is in proper condition for transportation a	ccording to applicable regulation.	
RCRA EXEMPT: Oil field wastes gene load basis only)	erated from oil and gas exploration and production operations and are	not mixed with non-exempt waste (R360 Accepts certifications on a per
DCRA NON-EXEMPT: Oil field waste which	n is non-hazardous that does not exceed the minimum standards for wa	aste hazardous by characteristics established in RCRA regulations, 40 CFR
261.21-261.24, or lis	sted hazardous waste as defined by 40 CFR, part 261, subpart D, as ame ed. (Check the appropriate items as provided)	ended. The following documentation demonstrating the waste as non-
MSDS Information	RCRA Hazardous Waste Analysis	Other (Provide Description Below)
		0/0/1
0 0 1000 0 - 1	lander of shore	Mulbert
(PRINT) AUTHORIZED AGENTS SIGNATURE	DATE	SIGNATURE
Name of the second seco	TRANSPORTER	at the same of the
Transporter's	Driver's Name	
Name JAR Hendox	CA -	a11/83 ().
Address	Print Name	
4	Phone No.	7) /
Phone No.	Truck No.	06
I hereby certify that the above named material(s) was/w	rere picked up at the Generator's site listed above and delivered withou	t incident to the disposal facility listed below.
SHIPMENT DATE	DRIVER'S SIGNATURE DELIVER	RY DATE DRIVER'S SIGNATURE
TRUCK TIME STAMP	DISPOSAL FACILITY	RECEIVING AREA
IN: 6 201 OUT:		Name/No.
Site Name/	Phone No.	the second second second second
Permit No. Red Bluff Facility/ STF-065	SHOW THE PROPERTY OF THE PROPE	432-448-4239
Address 5053 US Highway 285, Orla, TX 79770		ng > 50 micro roentgens? (circle one) YES NO
NORM READINGS TAKEN? (Circle One) Chloride	Conductivity	
Chemical Analysis (Mg/l)	(mmhos/cm)	рН
	TANK BOTTOMS	years + makes and a second
1st Gauge Feet	Inches BS8	&W/BBLS Received BS&W (%)
2nd Gauge	Taring all the state of the sta	Free Water
Received	450	Total Received
I hereby certify that the above load material has bee	n (circle one): ACCEPTED DENIED If denied, why?	A STATE OF THE STA
Tarada	9.5.19 Recons	4/1
NAME (PRINT)	DATE TITLE	SIGNATURE
		1



(PLEASE PRINT)

REQUIRED INFORMATION Name

Solutions		Phone No
	GENERATOR	NO.170982
Operator No.	Permit/RRC No Lease/Well	1963 # NEW YOR GOOD
Operators Name Marathon O	Name & No.	QUEL DECK AND 25284 WAY 250
Address 4/1/1 5 7 1/14/60	P County	Edili
Audiess	API No.	30-015-45366
CONTRACTOR OF MAN	9.52.20 Rig Name & No.	Continue of the second of the
City, State, Zip	AFE/PO No.	To 19 09268
Phone No.		11.17.1288.19
	ce Identification and Amount (place volume next to	
	ECTABLE WATERS Water (Non-Injectable)	OTHER EXEMPT WASTES (type and generation process of the waste)
	ion Fluid/Flow back (Non-Injectable)	1
	d Water (Non-Injectable)	() () () () () () () () () ()
Posterior and the contract of	g Line Water/Waste (Non-Injectable) LUSE ONLY	- // // // // // // // // // // // // //
The state of the s	ashout (exempt waste)	
Gas Plant Waste		
WASTE GENERATION PROCESS: DRILLING	G COMPLETION	PRODUCTION GATHERING LINES
All you grownt EV.D. worth must	NON-EXEMPT E&P Waste/Service Identification and A be analysed and be below the threshold limits for toxicity	
Non-Exempt Other		t from Non-Exempt Waste List on back
	B - BARRELS	Y - YARDS E - EACH
QUANTITY	The state of the s	ble state law. That each waste has been properly described, classified and
packaged, and is in proper condition for transportation according	g to applicable regulation.	
load basis only)	- V	are not mixed with non-exempt waste (R360 Accepts certifications on a per
RCRA NON-EXEMPT: Oil field waste which is non-	-hazardous that does not exceed the minimum standards fo	or waste hazardous by characteristics established in RCRA regulations, 40 CFR
	cardous waste as defined by 40 CFR, part 261, subpart D, as lock the appropriate items as provided)	amended. The following documentation demonstrating the waste as non-
MSDS Information	RCRA Hazardous Waste Analysis	Other (Provide Description Below)
WISSS MINIMATON		
	of all land	
(PRINT) AUTHORIZED AGEN'S SIGNATURE	HAZUC STE SISSOCIES	SIGNATURE
(I a control of the	TRANSPORTER	NAME OF THE PERSON OF THE PERS
Transporter's	Driver's Name	Park Royal R
Name Sold Care		
Address	Print Name	Maria Professione
	Phone No.	2 15
Phone No.	Truck No.	. I V
I hereby certify that the above named material(s) was/were pick	ked up at the Generator's site listed above and delivered wi	thout incident to the disposal facility listed below.
9-5-19 (N) 30	B 5 Crown 9-5	DRIVER'S SIGNATURE
SHIPMENT DATE DRIVER'S S		LIVERT DATE
TRUCK TIME STAMP	DISPOSAL FACILITY	RECEIVING AREA
IN: 7 444 OUT:		Name/No.
Site Name/ Red Bluff Facility/ STF-065	Phone No.	432-448-4239
Address 5053 US Highway 285, Orla, TX 79770		
	ES NO If YES, was re	eading > 50 micro roentgens? (circle one) YES NO
Chloride Chemical Analysis (Mg/I)	Conductivity (mmhos/cm	рН
Citemen Analysis (Mg/I)	TANK BOTTOMS	and the same
Feet	Inches	poguriori
1st Gauge		BS&W/BBLS Received BS&W (%)
2nd Gauge		Total Received
Received	\mathcal{H}_{22}	A
I hereby certify that the above load material has been (circle	e one): ACCEPTED DENIED If denied, v	why?
1 have	9.516 9 (100/116)	1 4 1-
NAME (PRINT)	DATE TITLE	SIGNATURE
(PAIVE (PRINT)	30000	



Company	Man	Contact	In	forn	na	tio	1
---------	-----	---------	----	------	----	-----	---

TVERONASETTAL SOLUTIONS		(PLEASE PRINT)	*REQUIRE		Name Phone No.	
		GENERATO	R	NAC AND ADDRESS OF THE PARTY OF		172 200
Operator No.			ermit/RRC No.		70980	W=
Operator No.	7 7 maren	Le	ease/Well	T. Nathanto	5284 WA TA	Pro HELL
Operators Name	rest Oct	ANY MARKET SEAL	ame & No. /C/	GLORIS &	- 3 - 4 0 7 WARF 11)	1 11 M (2)
Address 4// 57, G/A	es real	PARTY OF THE STATE	ounty Pl No.	30-016-	45344	
City, State, Zip	NU8822) Ri	ig Name & No.		ACIMANO E POST	
Phone No. 575 323	ALL!	- Name Ishira A	FE/PO No.	TA 12 03	2258	
EXEMPT E&P Wa	ste/Service Identification an	d Amount (place volu				
Oil Based Muds	NON-INJECTABLE WATERS Washout Water (Non-Injectable		0	THER EXEMPT WASTES (typ	oe and generation process of the	waste)
Oil Based Cuttings Water Based Muds	Completion Fluid/Flow back (N	on-Injectable)		0 1	1 has	
Water Based Cuttings Produced Formation Solids	Produced Water (Non-Injectab Gathering Line Water/Waste (N			Bell-1 Du	79 / 7	and the state of
Tank Bottoms	INTERNAL USE ONLY		E .			
E&P Contaminated Soil Gas Plant Waste	Truck Washout (exempt waste)	nge - min reg		188	attal as not	
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	o∠ P	RODUCTION	GATHERING LINI	ES
All your avancet EV.D.v.	NON-EXEMPT E8 vaste must be analysed and be b	&P Waste/Service Identi			d Reactivity.	
Non-Exempt Other	raste mast be analysed and be a	With the second section of the second		Non-Exempt Waste List		
QUANTITY	B - BARRELS			Y - YARDS	17584)	E - EACH
I hereby certify that the above listed material(s), is (ar			or any applicable st	ate law. That each waste h	as been properly described	, classified and
packaged, and is in proper condition for transportation Oil field wastes go	n according to applicable regulat enerated from oil and gas explor	ion. ation and production op	erations and are no	ot mixed with non-exempt	waste (R360 Accepts certific	cations on a per
RCRA EXEMPT: load basis only)				F aut Wall sky	SHIP - FAREN	10.555
RCRA NON-EXEMPT: Oil field waste wh	nich is non-hazardous that does r r listed hazardous waste as defin	not exceed the minimum ed by 40 CFR, part 261.	n standards for wast subpart D. as amen	te hazardous by characteris ded. The following docume	stics established in RCRA regentation demonstrating the	waste as non-
	ched. (Check the appropriate iter					
MSDS Informatio	n RCRA Hazard	lous Waste Analysis		ther (Provide Description I	Below)	
				1//		<u> </u>
SAAC CASTAL PER SU	on HANUESTA	9/5	BUS.	HI.	14-th	V 26:
(PRINT) AUTHORIZED AGENTS SIGNATURE		DAT	TE	51-00	SIGNATURE	
		FRANSPORT	ER			
Transporter's	6	D	river's Name	Moises Go	nealer	
Address 2000 Ha M = 540		P	rint Name		The same	
200 Mar Ser Ser Ser Ser Ser Ser Ser Ser Ser Se		Р	hone No.			
Phone No. 575 631 616	()		ruck No.			
I hereby certify that the above named material(s) was	/were picked up at the Generato	or's site listed above and	delivered without i	ncident to the disposal fac	ility listed below.	f.
	ANUSCIS NOVITURE		DELIVERY	DATE AND THE	DRIVER'S SIGNATURE	107
SHIPMENT DATE TRUICK TIME STAND	DRIVER'S SIGNATURE	SPOSAL FAC		509300	CEIVING AREA	
TRUCK TIME STAMP IN: 7:053 OUT:	Dis	SPUSAL FAC		Name/No.	F3	
Site Name/		P	hone No.		+6	
Permit No. Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 797			4	32-448-4239		801
NORM READINGS TAKEN? (Circle One)				> 50 micro roentgens? (cir	cle one) YES	NO
Chloride Chemical Analysis (Mg/l)			Conductivity (mmhos/cm)		-	рН
		ANK BOTTO	IMS	+ 918		W.
Tet Gauge	Inches	The second second	BS&W	V/BBLS Received	BS&W (%)	
1st Gauge 2nd Gauge		- V-19 - V-19	2000	Free Water	7	
Received				Total Received		
I hereby certify that the above load material has be	een (circle one): ACCEPTE	D DENIED	If denied, why?	1 1 1 1	THE PERSON NAMED IN COLUMN TWO	
Joseph Canal Control of the Control	4-5.19	There	17	1 91		
NAME (PRINT)	DATE	- C C C C TIT	LE	1	SIGNATURE	100



(PLEASE PRINT)

REQUIRED INFORMATION Name_

SOLUTIONS	A. C.		Phone No	DATE OF THE PARTY
	GE	NERATOR	NO.17097	5
Operator No.	(*)	Permit/RRC No.	21001	
Operators Name Marciton	007	Lease/Well Name & No.	CLE DECLARDOS 28 5	1 WA 1 H 2 H 5 H 60
Address 4/1/1 5 / //	millerand	County	EBBU	
Address		API No.	30-015-4574	
City, State, Zip	NII 88226	Rig Name & No.		and the second s
Phone No.	5 9441	AFE/PO No.	TA 10 02259	III. It a
	Waste/Service Identification and Am		aste type in barrels or cubic yards)	
Oil Based Muds	NON-INJECTABLE WATERS	Journe (prace: voidine inexe to ve	OTHER EXEMPT WASTES (type and generation p	rocess of the waste)
Oil Based Cuttings	Washout Water (Non-Injectable)		Proposition of the second of the second	
Water Based Muds Water Based Cuttings	Produced Water (Non-Injectable)	ectable)	ADVISE AVI	-
Produced Formation Solids	Gathering Line Water/Waste (Non-In	jectable)		
Tank Bottoms E&P Contaminated Soil	Truck Washout (exempt waste)		the second second	
Gas Plant Waste	Truck viasilout (exempe tracts)			
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	PRODUCTION GATHE	RING LINES
	NON-EXEMPT E&P Wa	este/Service Identification and Amo		ecoli XIII. PW II
Non-Exempt Other	P waste must be analysed and be below to		om Non-Exempt Waste List on back	
	D. DADDELS		Y - YARDS	E - EACH
QUANTITY	B - BARRELS	to CER R. + 2C1		described classified and
I hereby certify that the above listed material(s), is packaged, and is in proper condition for transporta	(are) not a hazardous waste as defined by tion according to applicable regulation.	y 40 CFR Part 261 or any applicable	State law. That each waste has been properly	, described, classified and
Oil field waste	s generated from oil and gas exploration	and production operations and are	not mixed with non-exempt waste (R360 Acco	epts certifications on a per
RCRA EXEMPT: load basis only			the state of the s	in PCPA regulations 40 CER
RCRA NON-EXEMPT: Oil field waste	which is non-hazardous that does not ex-	40 CFR, part 261, subpart D, as am-	aste hazardous by characteristics established ended. The following documentation demonst	trating the waste as non-
hazardous is a	ttached. (Check the appropriate items as	provided)		
MSDS Informa	ation RCRA Hazardous W	Vaste Analysis	Other (Provide Description Below)	
			1/0/1	*
ISAAR CASTRO PETZ SLY	THE HARUESTELL	9/5/2010	SIGNATURE	2
(PRINT) AUTHORIZED AGENTS SIGNATURE		DATE	SIGNATURE	7
	1 TRA	ANSPORTER		
Transporter's I Mod S T R	CKING INDS	Driver's Name	Poly to alid as how	1.10
Name Address OO COA 117	10005 PALES 2H	Print Name	the total of the	
		Phone No.	rot	
Phone No.		Truck No.	T 6	
I hereby certify that the above named material(s)	was/were picked up at the Generator's sit	te listed above and delivered witho	ut incident to the disposal facility listed below	
				S SIGNATURE
SHIPMENT DATE	DRIVER'S SIGNATURE		RECEIVING A	
TRUCK TIME STAN	IP DISPO	OSAL FACILITY		INLA
IN: OUT:			Name/No.	
Site Name/ Red Bluff Facility/ STF-065		Phone No.	432-448-4239	4
Permit No. Address 5053 US Highway 285, Orla, TX	79770			
NORM READINGS TAKEN? (Circle C	water water	If YES, was read	ing > 50 micro roentgens? (circle one)	YES NO
Chloride	Medical Control	Conductivity (mmhos/cm)		рН
Chemical Analysis (Mg/l)	TAN	IK BOTTOMS		
Feet	Inches			
1st Gauge		BS	&W/BBLS Received BS8	&W (%)
2nd Gauge Received			Total Received	
I hereby certify that the above load material ha	as been (circle one): ACCEPTED	DENIED If denied, why	r taller to be 1	-
11/11/11/10/11/11/12	(1)11		SIGNATURE	100
NAME (PRINT)	DATE	TITLE	SIGNATURE	



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

SOLUTIONS			Phone	
	GE	NERATOR	NO.1700	973
Operator No.		Permit/RRC No.	410.	
Operators Name May 4 than O	A CONTRACTOR	Lease/Well Name & No.	CICLE DELVAS 25:	084 WA IH 211194 (1)
Address 4/11 5 7 August	Pead	County	Eddy	2/44
A / 1	0000	API No.	30-016-49	344
City, State, Zip	80230	Rig Name & No. AFE/PO No.	TA 19.002	59
Phone No. 915 305			waste type in barrels or cubic yards	
	Te/Service Identification and Amo	ount (place volume next to	OTHER EXEMPT WASTES (type and gen	eration process of the waste)
Oil Based Cuttings	Washout Water (Non-Injectable) Completion Fluid/Flow back (Non-Inje	ctable)	We Think the second sec	
Water Based Cuttings	Produced Water (Non-Injectable)	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Andrew Street	a ming opening the
	Gathering Line Water/Waste (Non-Injo NTERNAL USE ONLY	ectable)		
E&P Contaminated Soil	Fruck Washout (exempt waste)			d m - h
Gas Plant Waste WASTE GENERATION PROCESS:	DRILLING C	OMPLETION	PRODUCTION	GATHERING LINES
	NON-EXEMPT E&P Was	te/Service Identification and Ar	mount	
All non-exempt E&P wa	ste must be analysed and be below th	e threshold limits for toxicity (1	CLP), Ignitability, Corrosivity and Reactiv	ity.
Non-Exempt Other		*please select	from Non-Exempt Waste List on back	
QUANTITY	B - BARRELS	Service Management Company	Y-YARDS ZO	E - EACH
I hereby certify that the above listed material(s), is (are)	not a hazardous waste as defined by	40 CFR Part 261 or any applicat	ole state law. That each waste has been	properly described, classified and
packaged, and is in proper condition for transportation	according to applicable regulation. A perated from oil and gas exploration a	nd production operations and a	re not mixed with non-exempt waste (R	360 Accepts certifications on a per
RCRA EXEMPT: load basis only)				
RCRA NON-EXEMPT: Oil field waste which	h is non-hazardous that does not exclined by 4	eed the minimum standards for	waste hazardous by characteristics esta mended. The following documentation of	blished in RCRA regulations, 40 CFR demonstrating the waste as non-
	ed. (Check the appropriate items as p			
MSDS Information	RCRA Hazardous W	aste Analysis	Other (Provide Description Below)	
	N T	512 1	VIII	4
(PRINT) AUTHORIZED AGENTS SIGNATURE	MARING STOLL	9 (5) (901 (7)	SIGNA	TURE
(PRINT) AUTHORIZED AGERTS SIGNATURE	TRA	NSPORTER		
Transporter's	POS	Driver's Name		
Name 186 Transport		Print Name	(Caralle V	
Address	KA 52260	Phone No.		die sylve s
Phone No.	3044	Truck No.	#3	Con Coral 4
I hereby certify that the above named material(s) was/v	vere picked up at the Generator's site	listed above and delivered with	nout incident to the disposal facility listed	d below.
	344			DRIVER'S SIGNATURE
SHIPMENT DATE	DRIVER'S SIGNATURE		RECEIVIN	
TRUCK TIME STAMP	DISPU	SAL FACILITY	Name/No.	IO AILLA
IN:OZYM_OUT:			Traine/140.	
Permit No. Red Bluff Facility/ STF-065	The second second	Phone No.	432-448-4239	
Address 5053 US Highway 285, Orla, TX 7977	0			
NORM READINGS TAKEN? (Circle One) Chloride	YES NO	If YES, was rea	ading > 50 micro roentgens? (circle one)	YES NO
Chemical Analysis (Mg/l)		(mmhos/cm)		pH
		KBOTTOMS		
1st Gauge Feet	Inches	The state of the s	BS&W/BBLS Received	BS&W (%)
2nd Gauge			Free Water Total Received	
Received		A STATE OF THE STA	Total Neceived	
I hereby certify that the above load material has been	en (circle one): ACCEPTED	DENIED If denied, w	hy?	1-
V VIII VIVILLE	11-11	+ (_ MANUALING	
NAME (PRINT)	DATE	TITLE	SIGN	ATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name

	CENTER			me No
Oncords N	GENER	ATOR	NO.17	0070
Operator No.		Permit/RRC No.	cortice /	UJIL
Operators Name	0.)	Lease/Well		
Address (III) 57.76	1116/1 3 4 4	Name & No.	1715 PO 1 6 1 (3)	5294 NO HOHSI
- H - 3 1-66	will a cont	County	Seldy.	
constant Control of a		API No.	30-616-6	452611
City, State, Zip	IN 88220	Rig Name & No.		2 46
Phone No.	94/4/1	AFE/PO No.	JA 12.62	320
EXEMPT F&P V	Vaste/Service Identification and A		11-12-12	×58
	Vaste/Service Identification and Amount (pla NON-INJECTABLE WATERS	ce volume next to w	aste type in barrels or cubic ya	rds)
Oil Based Cuttings	Washout Water (Non-Injectable)		OTHER EXEMPT WASTES (type and	generation process of the waste)
Water Based Muds Water Based Cuttings	Completion Fluid/Flow back (Non-Injectable)			
Produced Formation Solids	Produced Water (Non-Injectable)			
Tank Bottoms	Gathering Line Water/Waste (Non-Injectable) INTERNAL USE ONLY			
E&P Contaminated Soil	Truck Washout (exempt waste)			
Gas Plant Waste				
WASTE GENERATION PROCESS:	DRILLING COMPLETI	ON 7	PRODUCTION	CATHERING
	NON EVENOT PROW (5		A CONTRACTOR OF THE PROPERTY O	GATHERING LINES
All non-exempt E&P	NON-EXEMPT E&P Waste/Service waste must be analysed and be below the threshol	Identification and Amo	unt	
Non-Exempt Other	The De Delow die direction			
		*please select from	m Non-Exempt Waste List on bac	k
QUANTITY	B - BARRELS		14 (400 pt 200 pt	The state of the s
I hereby certify that the above listed material(s) is to			Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (a packaged, and is in proper condition for transportation	re) not a hazardous waste as defined by 40 CFR Par	t 261 or any applicable s	tate law. That each waste has bee	n properly described, classified and
RCRA EXEMPT: load basis only)	generated from oil and gas exploration and producti	ion operations and are r	ot mixed with non-exempt waste (R360 Accepts certifications on a per
The state of the s				
261.21-261.24 o	hich is non-hazardous that does not exceed the min	imum standards for was	ste hazardous by characteristics es	tablished in RCRA regulations, 40 CFR
	or listed hazardous waste as defined by 40 CFR, part iched. (Check the appropriate items as provided)	261, subpart D, as amer	nded. The following documentation	demonstrating the waste as non-
MSDS Information			A. A.	
	incha Hazardous Waste Analysi	s 📋 (Other (Provide Description Below)	1
- 40			1/1/1/	11
SOUL PASTRUMENT	HAD PARISTO IN	5/0/1/2	Allest	
(PRINT) AUTHORIZED AGENTS SIGNATURE	144 14 14 14 14 14 14 14 14 14 14 14 14	DATE	SIGN	JATURE
	TRANSPO	DTED	Joh	ATORE
Transporter's	TRANSPO	NIEK	- management -	1
Name It / Van Day	1 BUS	Driver's Name	Translat 1	tour
Address		Print Name	Jacoba V	C C G G C
		~		₹
Phone No.		Phone No.	grants	- Jan
househir and the state of the s		Truck No.		
hereby certify that the above named material(s) was,	were picked up at the Generator's site listed above	and delivered without i	ncident to the disposal facility liste	d below
SHIPMENT DATE	DRIVER'S SIGNATURE	DELIVERY D	DATE	DRIVER'S SIGNATURE
TRUCK TIME STAMP	DISPOSAL FA	ACILITY	RECEIVIN	The state of the s
N: OUT:		.oraci i		NO AREA
ite Name/	-		Name/No.	
ermit No. Red Bluff Facility/ STF-065		Phone No.		
ddress 5053 US Highway 285, Orla, TX 7977	70	43	32-448-4239	(#F
NORM READINGS TAKEN? (Circle One) Chloride	YES NO	If YES, was reading >	50 micro roentgens? (circle one)	YES NO
hemical Analysis (Mg/I)		Conductivity		
		(mmhos/cm)		рН
	TANK BOTT	OMS		
st Gauge Feet	Inches			
nd Gauge		BS&W/	BBLS Received	BS&W (%)
eceived	200		Free Water	
			Total Received	
I hereby certify that the above load material has bee	n (circle one): ACCEPTED DENIED	If donied who		
1 / Carl Marillat	O SENIED	If denied, why?	1 1	
MALE PROPERTY OF THE PARTY OF T	-13/1/66		MARKETT)
NAME (PRINT)	DATE	TITLE		



(PLEASE PRINT) *REQUIRED INFORMATION* Name _

DSSAW STATE OF THE STATE OF		NA CONTRACTOR OF THE CONTRACTO	W Supers Supers and Property and Supers			Phone No.	
			GENERA	TOR	NO.	170976	
Operator No.				Permit/RRC No.		710510	
Operators Name	elaratho.	001		Lease/Well Name & No.	PICK DACK ADT	5 25 28 4 4 A 14 2 A	n I
Address	1/11571	Tuest porock		County	FOLSY	2 2 2 3 7 1 10 1 10 10	E (
				API No.	30-015 -	453661	
City, State, Zip	ard Dud,	XI4 35220		Rig Name & No.			
Phone No.	75 323	4141		AFE/PO No.	JA. 14.	02259	
	EXEMPT E&P W	aste/Service Identification	and Amount (place	e volume next to w	vaste type in barrels or c	ubic vards)	
Oil Based Muds Oil Based Cuttings		NON-INJECTABLE WATERS				(type and generation process of the waste)	Name (Constitution)
Water Based Muds		Washout Water (Non-Inject Completion Fluid/Flow back		× yı			
Water Based Cuttings Produced Formation Soli	4-	Produced Water (Non-Inject	able)				
Tank Bottoms	15	Gathering Line Water/Waste INTERNAL USE ONLY	(Non-Injectable)				
E&P Contaminated Soil	20	Truck Washout (exempt was	te)				
Gas Plant Waste WASTE GENERATION I	PROCESS:	DDILLING					
WOTE GENERATION	NOCESS.	DRILLING	COMPLETION	- W-10	PRODUCTION	GATHERING LINES	
	All non-exempt E&P	NON-EXEMPT waste must be analysed and be	E&P Waste/Service	dentification and Amo	ount		
Non-Exempt Other		reace in as established that you all the sec	below the threshold		P), Ignitability, Corrosivity and Non-Exempt Waste List		(1) (1)
OHANTITY				pieuse select jit	om won-Exempt waste List	: On back	
QUANTITY		B - BARREL			Y - YARI	E LACIT	
I hereby certify that the at	ove listed material(s), is (ar	e) not a hazardous waste as de n according to applicable regul	fined by 40 CFR Part	261 or any applicable	state law. That each waste	has been properly described, classified	and
	serial di la disportatio	raccording to applicable regul	ation.				
RCRA EXEMPT:	load basis only)	- North off and Bas expit	ration and production	on operations and are	not mixed with non-exemp	t waste (R360 Accepts certifications on a	per
RCRA NON-EXEMP	T: Oil field waste wh	nich is non-hazardous that does	not exceed the mini	mum standards for wa	aste hazardous by character	ristics established in RCRA regulations, 4	U CEB
	.,	moter mazar dous waste as dell	HEU DY 40 CFK, Dart	261, subpart D, as ame	ended. The following docum	nentation demonstrating the waste as no	on-
	MSDS Informatio	ched. (Check the appropriate it	ems as provided)			(642)	
	Meso informatio	L NCKA Hazar	dous Waste Analysis		Other (Provide Description	Below)	
1 -		e n		1	- N		h. atri
(PRINT) AUTHORIZED	AGENTS SIGNATURE	MAR HARVE	STER_ 2/	5/2009	111	lif "	
COST TO SALES				DATE		SIGNATURE	
Transporter's			TRANSPO	RTER			
Name	11	1 37	T. Carlo	Driver's Name			
Address		to all s		Print Name	1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1		
				Phone No.			
Phone No.				Truck No.			
hereby certify that the abo	ve named material(s) was/	were picked up at the Generato	r's site listed above	and delivered without	incident to the disposal for	100.00.1.11.1	
·				and a without	meident to the disposal fac	lity listed below.	
SHIPMENT DATE	IV TID AT CTABAS	DRIVER'S SIGNATURE		DELIVERY	DATE	DRIVER'S SIGNATURE	
	CK TIME STAMP	DIS	SPOSAL FA	CILITY	REC	CEIVING AREA	
N:	OUT:				Name/No.		
ite Name/ ermit No. Red Bluf	f Facility/ STF-065			Dhana N			
4.4	lighway 285, Orla, TX 79770	1		Phone No.	32-448-4239		
	INGS TAKEN? (Circle One)			1900			
Chloride hemical Analysis (Mg/I)	and the same of the	YES NO		If YES, was reading Conductivity	> 50 micro roentgens? (circ	cle one) YES NO	
Terrical Arialysis (IVIB/I)				(mmhos/cm)		Hq	
	e c		ANK BOTT	OIVIS			
st Gauge	Feet	Inches	_				
nd Gauge			-	BS&W	/BBLS Received Free Water	BS&W (%)	
eceived					Total Received	# **	
I hereby certify that the al	bove load material has beer	(circle one):					
7	maxima nas beer	(circle one): ACCEPTED	DENIED	If denied, why?			
NAME (PR	INT)	DATE	1/				
		DATE	T	ITLE	1-1	SIGNATURE	40



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

Company	Man	Contact	Informatio	r
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		SENERATOR	155	NO a	
Operator No.				1 10.1	70974
Operation No.	and the same	Perr	nit/RRC No. e/Well	614	. 9917
Operators Name	,(1)		e & No.	Diru Dellea	2x 25 20 2/ 11/2 11/20
Address 4/1/5	well Zone	Cour	tv	GARA	21) 25284 WAIIIZH
27 2 14		APLI	17	20-610	115000
City, State, Zip	VM 99220			De Offing -	967-344
Phone No.	96/4/		ame & No.	ak a day	
EVEMPT ES DAG			PO No.	14/2.0	1253
Oil Based Muds	ste/Service Identification and A	Amount (place volum	next to w	aste type in barrels or cubic	yards)
Oil Based Cuttings	NON-INJECTABLE WATERS Washout Water (Non-Injectable)			OTHER EXEMPT WASTES (type	and generation process of the waste)
Water Based Muds	Completion Fluid/Flow back (Non-	Injectable) —			
Water Based Cuttings Produced Formation Solids	Produced Water (Non-Injectable)		-		
Tank Bottoms	Gathering Line Water/Waste (Non-	-Injectable)			
E&P Contaminated Soil	Truck Washout (exempt waste)				
Gas Plant Waste	(exempt waste)	-	-		
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	V	PRODUCTION	
		THE STATE OF THE S	اعدا	LANGE CONTRACTOR AND	GATHERING LINES
All non-exempt E&P wa	NON-EXEMPT E&P W	Vaste/Service Identificat	on and Amo	unt	
Non-Exempt Other	aste must be analysed and be below	the threshold limits for	toxicity (TCL	P), Ignitability, Corrosivity and R	eactivity.
		*ple	se select fro	т Non-Exempt Waste List on I	back
QUANTITY	B - BARRELS		- 10,00	V. VARDS	
I hereby certify that the above listed material(s) is (are)	not a hazardous wests as 4-5 L	40.000		Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (are) packaged, and is in proper condition for transportation	according to applicable regulation	by 40 CFR Part 261 or an	applicable	state law. That each waste has I	peen properly described, classified and
RCRA EXEMPT: Oil field wastes gen load basis only)	oracea from on and gas exploration	and production operati	ons and are	not mixed with non-exempt was	te (R360 Accepts certifications on a per
RCRA NON-EXEMPT: Oil field waste which	th is non-hazardous that does not ex	vogad the minimum at-	des de C		
			rt D. as amo	ste hazardous by characteristics	established in RCRA regulations, 40 CFR tion demonstrating the waste as non-
hazardous is attach	ed. (Check the appropriate items as	provided)	t D, as affie	inded. The following documenta-	tion demonstrating the waste as non-
MSDS Information	RCRA Hazardous V	Waste Analysis		Other (Provide Description Belo	iā
				outer (i tovide bescription belo	w)
3	11	121		00	111
(PRINT) AUTHORIZED AGENTS SIGNATURE	12 HARVESTER	9/9/20	110	1810101	(1 C/)
		DATE			SIGNATURE
Transmentants	TRA	ANSPORTER			
Transporter's Name	1 #	Driver's	Namo		
Address			_	10 10 -	and the same of th
		Print N	me	Co.	
Dhewa Na		Phone	lo.	17.013	11.5
Phone No.		Truck N		P	
I hereby certify that the above named material(s) was/we	ere picked up at the Generator's site	e listed above and delive	ed without	incident to the disposal facility li	stad balance
The second secon			ou minoue	incident to the disposal facility if	sted below.
SHIPMENT DATE D	PRIVER'S SIGNATURE	-	DELIVERY	DATE	DRIVER'S SIGNATURE
TRUCK TIME STAMP	DISDC				
INI AMA		SAL FACILITY	V	DECEIV	/INC ADEA
IN:I TVV OUT.	DISPL	SAL FACILIT	Y		/ING AREA
100 M 20 M	DISPE	SAL FACILIT	Year	RECEI\ Name/No.	/ING AREA
Site Name/	DISPC			Name/No.	/ING AREA
Permit No. Red Bluff Facility/ STF-065	DISPC	Phone N			/ING AREA
Red Bluff Facility/ STF-065 Address S053 US Highway 285, Orla, TX 79770				Name/No.	/ING AREA
Site Name/ Permit No. Red Bluff Facility/ STF-065	YES NO	Phone N	o. 4	Name/No.	
Red Bluff Facility/ STF-065 Address S053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One)		Phone N If YES, Conduct	o. 4	Name/No.	ne) YES NO
Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One) Chloride	YES NO	Phone N If YES, Conduct (mmho	o. 4	Name/No.	
Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/l)	YES NO	Phone N If YES, Conduct	o. 4	Name/No.	ne) YES NO
Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/l) Feet	YES NO	Phone N If YES, Conduct (mmho	o. 4 was reading vity s/cm)	Name/No. 32-448-4239 > 50 micro roentgens? (circle or	ne) YES NOpH
Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/l) Feet st Gauge and Gauge	YES NO	Phone N If YES, Conduct (mmho	o. 4 was reading vity s/cm)	Name/No. 32-448-4239 > 50 micro roentgens? (circle or	ne) YES NO
Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/l) Feet st Gauge and Gauge	YES NO	Phone N If YES, Conduct (mmho	o. 4 was reading vity s/cm)	Name/No. 32-448-4239 > 50 micro roentgens? (circle or	ne) YES NOpH
Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/l) Feet st Gauge and Gauge deceived	YES NO	Phone N If YES, Conduct (mmho	o. 4 was reading vity s/cm)	Name/No. 32-448-4239 > 50 micro roentgens? (circle or	ne) YES NOpH
Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/l) Feet st Gauge	YES NO	Phone N If YES, Conduct (mmhr	o. 4 was reading vity s/cm)	Name/No. 32-448-4239 > 50 micro roentgens? (circle or	ne) YES NOpH
Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/l) Feet st Gauge and Gauge deceived	YES NO	Phone N If YES, Conduct (mmhr	o. 4 was reading vity s/cm) BS&W	Name/No. 32-448-4239 > 50 micro roentgens? (circle or	ne) YES NOpH
Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79770 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/l) Feet st Gauge and Gauge deceived	YES NO	Phone N If YES, Conduct (mmhr	o. 4 was reading vity s/cm) BS&W	Name/No. 32-448-4239 > 50 micro roentgens? (circle or // BBLS Received Free Water Total Received	ne) YES NOpH



(PLEASE PRINT) *REQUIRED INFORMATION* Name

Compan	y Man	Contact	Information
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		1	CENTEDA	TOD		The second secon
O		L	GENERA	IUR	NO.	.70970
Operator No.				Permit/RRC No.	eal	. 19310
Operators Name	alhon 1	01		Lease/Well Name & No.	ICE DECIENT	0.525
Address <u>4///</u>	57,04	11/1 10	Carl.	County	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	23 21 - YN 1 1 1 346
				3	- 5 - 6 × 1 × 1 × 5	1120112
City, State, Zip	1 / trait	SI MA	5077/	API No.	-96 (16)-	453111
Phone No.	3 2 2 3	9/1/15		Rig Name & No.	5 3 10	7 2 2 6
		7-7211		AFE/PO No.		1768
Oil Based Muds	EXEMPT E&P Wa	ste/Service Identi	fication and Amount (place	volume next to w	aste type in barrels or cub	ic yards)
Oil Based Cuttings		NON-INJECTABLE V Washout Water (No	/ATERS		OTHER EXEMPT WASTES (type	oe and generation process of the waste)
Water Based Muds		Completion Fluid/F	ow back (Non-Injectable)			
Water Based Cuttings Produced Formation Solids		Produced Water (N	on-Injectable)	19		
Tank Bottoms			er/Waste (Non-Injectable)			
E&P Contaminated Soil	011	Truck Washout (exe				
Gas Plant Waste			impervaste)	-		
WASTE GENERATION PROCES	SS:	DRILLING	COMPLETIO	N [PRODUCTION	GATHERING LINES
BEST MALAN		NON	EXEMPT E&P Waste/Service Id	7		GATTERING LINES
A CONTRACTOR	Il non-exempt E&P w	aste must be analyse	d and be below the threshold	lentification and Amo limits for toxicity (TC)	unt P) Ignitability Correctvity and	I Decario
Non-Exempt Other					m Non-Exempt Waste List o	
And Was Services				picuse select fro	m Non-Exempt Waste List o	п раск
QUANTITY		В	BARRELS		Y - YARDS	DO E - EACH
I hereby certify that the above list	ed material(s), is (are)) not a hazardous wa	ste as defined by 40 CFR Part	261 or any applicable	state law. That each west- ha	as been properly described, classified and
packaged, and is in proper condition	on for transportation	according to applica	ble regulation.	or of any applicable	state law. That each waste na	as been properly described, classified and
RCRA EXEMPT:	Oil field wastes ger	nerated from oil and	gas exploration and productio	n operations and are	not mixed with non-exempt w	raste (R360 Accepts certifications on a per
\=	lodd basis Offiy)	T.				
RCRA NON-EXEMPT:	Oil field waste which	ch is non-hazardous	hat does not exceed the minir	num standards for wa	ste hazardous by characterist	ics established in RCRA regulations, 40 CFR
Andrew Control	201.21-201.24, 011	isted Hazardous was	te as defined by 40 CFR, part 2	61, subpart D, as ame	nded. The following documen	itation demonstrating the waste as non-
24	MSDS Information	ieu. (Check the appro	opriate items as provided)			
] M3D3 Information	RC	RA Hazardous Waste Analysis	(·	Other (Provide Description Be	elow)
	?				1111	
I MY MSTIRE H	EL)HM	Harrys 31	a 916	12016	XVIIII	
(PRINT) AUTHORIZED AGENTS S	SIGNATURE			DATE	14110	SIGNATURE
			The second secon			
		The second secon	TRANSPOR	RTER	/	
Transporter's	- 1	1 10	TRANSPOR	RTER	11 , 1	/
Name Coold	Good.	Just 18	TRANSPOR	Driver's Name	Alumberto	apria
	Sped	FLOORS / B	TRANSPOR		Humberto	Arra
Name Coold	Speed.	Thorns / B	TRANSPOR	Driver's Name	Aumberlo	Arra
Name Coold	Sped	HOOKS/B	TRANSPOR	Driver's Name Print Name Phone No.	Humberto	Arrow
Name Address Phone No.	red material(s) was/w	fooks / B	05	Driver's Name Print Name Phone No. Truck No.	Humberlio OG	Arrow
Name Address	ned material(s) was/w	rere picked up at the	05	Driver's Name Print Name Phone No. Truck No.	Aum los 1 lo	y listed below.
Name Address Phone No.		ere picked up at the	05	Driver's Name Print Name Phone No. Truck No. and delivered without		
Name Address Phone No. I hereby certify that the above nam SHIPMENT DATE			Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. and delivered without	DATE	DRIVER'S SIGNATURE
Phone No. I hereby certify that the above nam SHIPMENT DATE TRUCK TII	ME STAMP		05	Driver's Name Print Name Phone No. Truck No. and delivered without	DATE	
Name Address Phone No. I hereby certify that the above nam SHIPMENT DATE TRUCK TII			Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. and delivered without	DATE	DRIVER'S SIGNATURE
Name Address Phone No. I hereby certify that the above name SHIPMENT DATE TRUCK TII IN: Site Name/	ME STAMP OUT:		Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. Ind delivered without DELIVERY	DATE	DRIVER'S SIGNATURE
Name Address Phone No. I hereby certify that the above name of the second of the sec	ME STAMP OUT:		Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. and delivered without CILITY Phone No.	DATE	DRIVER'S SIGNATURE
Name Address Phone No. I hereby certify that the above name of the second of the sec	ME STAMP OUT:	DRIVER'S SIGNATURE	Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. Ind delivered without DELIVERY Phone No. 4	RECE Name/No.	DRIVER'S SIGNATURE
Name Address Phone No. I hereby certify that the above name of the second of the sec	ME STAMP OUT:		Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. and delivered without CILITY Phone No. 4	RECE Name/No.	DRIVER'S SIGNATURE
Name Address Phone No. I hereby certify that the above name of the second of the sec	ME STAMP OUT:	DRIVER'S SIGNATURE	Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. Ind delivered without DELIVERY CILITY Phone No. If YES, was reading Conductivity	RECE Name/No.	DRIVER'S SIGNATURE EIVING AREA one) YES NO
Name Address Phone No. I hereby certify that the above name SHIPMENT DATE TRUCK TII IN: Site Name/ Permit No. Address Red Bluff Facili 5053 US Highway NORM READINGS TA	ME STAMP OUT:	DRIVER'S SIGNATURE	Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. and delivered without CILITY Phone No. If YES, was reading Conductivity (mmhos/cm)	RECE Name/No.	DRIVER'S SIGNATURE
Phone No. I hereby certify that the above name SHIPMENT DATE TRUCK TILL IN: Site Name/ Permit No. Address NORM READINGS TA Chloride Chemical Analysis (Mg/l)	ME STAMP OUT:	YES	Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. and delivered without CILITY Phone No. If YES, was reading Conductivity (mmhos/cm)	RECE Name/No.	DRIVER'S SIGNATURE EIVING AREA one) YES NO
Phone No. I hereby certify that the above name SHIPMENT DATE TRUCK TILL TRUCK TILL TRUCK TILL Site Name/ Permit No. Address Red Bluff Facilit So53 US Highway NORM READINGS TA Chloride Chemical Analysis (Mg/I)	ME STAMP OUT:	DRIVER'S SIGNATURE	Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. Ind delivered without DELIVERY CILITY Phone No. If YES, was reading Conductivity (mmhos/cm) OMS	Name/No. 32-448-4239 > 50 micro roentgens? (circle	ORIVER'S SIGNATURE EIVING AREA ONE) YES NO PH
Name Address Phone No. I hereby certify that the above name of the second of the sec	ME STAMP OUT:	YES	Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. Ind delivered without DELIVERY CILITY Phone No. If YES, was reading Conductivity (mmhos/cm) OMS	RECE Name/No.	DRIVER'S SIGNATURE EIVING AREA one) YES NO
Name Address Phone No. I hereby certify that the above name of the second of the sec	ME STAMP OUT:	YES	Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. Ind delivered without DELIVERY CILITY Phone No. If YES, was reading Conductivity (mmhos/cm) OMS	Name/No. 32-448-4239 > 50 micro roentgens? (circle	ORIVER'S SIGNATURE EIVING AREA ONE) YES NO PH
Phone No. I hereby certify that the above name SHIPMENT DATE TRUCK TILL TRUCK TILL TRUCK TILL TRUCK TILL Site Name/ Permit No. Address Red Bluff Facilit 5053 US Highway NORM READINGS TA Chloride Chemical Analysis (Mg/I) Let Gauge Received	ME STAMP OUT: ity/ STF-065 / 285, Orla, TX 79770 AKEN? (Circle One)	YES Inches	Generator's site listed above a DISPOSAL FA NO TANK BOTT	Driver's Name Print Name Phone No. Truck No. Ind delivered without DELIVERY CILITY Phone No. If YES, was reading Conductivity (mmhos/cm) OMS	Name/No. 32-448-4239 > 50 micro roentgens? (circle	ORIVER'S SIGNATURE EIVING AREA ONE) YES NO PH
Name Address Phone No. I hereby certify that the above name of the second of the sec	ME STAMP OUT: ity/ STF-065 / 285, Orla, TX 79770 AKEN? (Circle One)	YES Inches	Generator's site listed above a	Driver's Name Print Name Phone No. Truck No. Ind delivered without DELIVERY CILITY Phone No. If YES, was reading Conductivity (mmhos/cm) OMS	Name/No. 32-448-4239 > 50 micro roentgens? (circle	ORIVER'S SIGNATURE EIVING AREA ONE) YES NO PH
Phone No. I hereby certify that the above name SHIPMENT DATE TRUCK TILL TRUCK TILL TRUCK TILL TRUCK TILL Site Name/ Permit No. Address Red Bluff Facilit 5053 US Highway NORM READINGS TA Chloride Chemical Analysis (Mg/I) Let Gauge Received	ME STAMP OUT: ity/ STF-065 / 285, Orla, TX 79770 AKEN? (Circle One)	YES Inches	Generator's site listed above a DISPOSAL FA NO TANK BOTT	Print Name Print Name Phone No. Truck No. Ind delivered without DELIVERY CILITY Phone No. If YES, was reading Conductivity (mmhos/cm) OIVIS BS&W	Name/No. 32-448-4239 > 50 micro roentgens? (circle	ORIVER'S SIGNATURE EIVING AREA ONE) YES NO PH



Company Man Contact Information	Compa	iny Mar	Contact	Inform	atio
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R36		TEXAS NON-HAZA	RDOUS OILFIELD WASTE MA (PLEASE PRINT) *REQU	Anifest J <mark>ired information*</mark>	
Operator No.	The second secon		GENERATOR	NO.	Phone No
Operator No.	01. 1-	A 1	Permit/RRC No. Lease/Well		TIGALT
Operators Nam	ne Addrest hor	U.I	Name & No.	RICK DERAP	N 25284 WALLOW
Address	4/// 2/	Twee Koak	County	Eddly	- Pariznan
City, State, Zip	Cardaland	MAI SEDE	API No.	30-015	- 45344
Phone No.	576-373	- 9CIEII	Rig Name & No.	TA 10	
	EXEMPT E&D W	Jacto/Comico Idonati - a	AFE/PO No.	10.10.	02259
Oil Based Mud		aste/Service Identification and A	Amount (place volume next to v	waste type in barrels or c	ubic yards)
Oil Based Cutti Water Based N		Washout Water (Non-Injectable)		OTHER EXEMPT WASTES	type and generation process of the waste)
Water Based C Produced Form		Completion Fluid/Flow back (Non-I Produced Water (Non-Injectable)	2 2		
Tank Bottoms	A TOTAL CONTROL OF THE PARTY OF	Gathering Line Water/Waste (Non- INTERNAL USE ONLY	-Injectable)		
E&P Contamina Gas Plant Wast		Truck Washout (exempt waste)	Michigan Michigan Control of the Con		
The same of the sa	RATION PROCESS:	DRILLING	COMPLETION		
			Vaste/Service Identification and Am	PRODUCTION	GATHERING LINES
	All non-exempt E&P	waste must be analysed and be below	vaste/Service Identification and Amovited the threshold limits for toxicity (TC	ount CLP), Ignitability, Corrosivity a	nd Reactivity.
Non-Exempt Otl	ner			om Non-Exempt Waste List	
QUANTITY		B - BARRELS		Y - YARD	
I hereby certify	that the above listed material(s), is (ar	e) not a hazardous waste as defined l	by 40 CFR Part 261 or any applicable	state law. That each waste	has been properly described, classified and
A	The District of the Control Control of Contr	and to applicable regulation.			
RCRA EX	load basis only)	and gas exploration	rand production operations and are	not mixed with non-exempt	waste (R360 Accepts certifications on a per
RCRA NO	ON-EXEMPT: Oil field waste wh	nich is non-hazardous that does not e	xceed the minimum standards for w	vaste hazardous by character	istics established in RCRA regulations, 40 CFR
		r listed hazardous waste as defined by ched. (Check the appropriate items as	40 CFR, Dari ZDL, Suppart I) as am	ended. The following docum	entation demonstrating the waste as non-
1 - "	MSDS Informatio			Other (Provide Description	Below
			pi:	0	- 1
SAACI	CASTROPORS	HAZ HADIET	- 9/5/2015	M	1110
(PRINT	AUTHORIZED AGENTS SIGNATURE		DATE	tell	SIGNATURE
		TR/	ANSPORTER		
Transporter's Name	IN TRUCKIN	6 1 FDS	Driver's Name	No to La	27. 15 / 20
Address	Dura leminate de	1142	Print Name		3/6/16
			Phone No.		
hone No.	50 60 61 61		Truck No.	***	
hereby certify th	hat the above named material(s) was/	were picked up at the Generator's sit	e listed above and delivered withou	t incident to the disposal fac	ility listed below.
	ENT DATE		6	J.e	1 - 1 April 4
	TRUCK TIME STAMP	DRIVER'S SIGNATURE	DSAL FACILITY		DRIVER'S SIGNATURE
N: / 1	12PM OUT:	DISPO	JOAL FACILITY		CEIVING AREA
ite Name/				Name/No.	
ermit No.	Red Bluff Facility/ STF-065		Phone No.	432-448-4239	
address	5053 US Highway 285, Orla, TX 7977	0			
N	ORM READINGS TAKEN? (Circle One) Chloride	YES NO	If YES, was reading	g > 50 micro roentgens? (cire	cle one) YES NO
hemical Analysis			Conductivity (mmhos/cm)		На
		TAN	KBOTTOMS		
st Causa	Feet	Inches			*
st Gauge nd Gauge			BS&V	W/BBLS Received	BS&W (%)
eceived			1	Free Water Total Received	
I hereby certify	y that the above load material has bee	in (circle anal)	DENIED		
1 - CIVI	A V V V V V V V V V V V V V V V V V V V	en (circle one): ACCEPTED	DENIED If denied, why?	MARIONA	11.
1 111	NAME (PRINT)	DATE	TITLE	1111111111111111	SIGNATURE
			227.199.7		SIGNATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

		CENE	NATOR	A STATE OF THE STA	FHORE NO.
		GENER	KATOR	NO.	70000
Operator No.			Permit/RRC No.		70969
111			Lease/Well		
Operators Name	KAIMON CIT		Name & No.	I FR LENDARD S	THE OF MANY AND THE
Address 4////	S THURST	77 - /		- 111 (1 3	15 25 4 WA 11 24 5/
20-000-00-00-00-00-00-00-00-00-00-00-00-	3	2	County	8777	
26.00			API No.	30-016-1	15344
City, State, Zip	VI LACUET ON MI S	\$ 500,		11200	7 344
Phone No.	233 60011	26-	Rig Name & No.		
Thore ivo.	32 2001		AFE/PO No.	TA 19 02	258
	EXEMPT F&P Waste/Service Id	Instification and A	,		
Oil Based Muds	EXEMPT E&P Waste/Service Id	lenuncation and Amount (p	lace volume next to w	aste type in barrels or cubi	c yards)
Oil Based Cuttings	- INDIGETA	DLE WAIERS		OTHER EXEMPT WASTES (type	e and generation process of the waste)
Water Based Muds	Washout Wat	er (Non-Injectable)			The selection process of the waste)
Water Based Cuttings	Completion FI	uid/Flow back (Non-Injectable)			
Produced Formation Solids	Produced Wat	er (Non-Injectable)			
Tank Bottoms	Gathering Line	Water/Waste (Non-Injectable)			
E&P Contaminated Soil	INTERNAL USE				
Gas Plant Waste	Truck Washou	t (exempt waste)		1	
The state of the s					
WASTE GENERATION PROCESS	S: DRILLING	COMPLE	TION	PRODUCTION	
		THE PARTY OF THE P			GATHERING LINES
		NON-EXEMPT E&P Waste/Servi	ce Identification and Amo	unt	
All	non-exempt E&P waste must be an	alysed and be below the thresh	old limits for toxicity (TCL	P). Ignitability Corresivity and	Popotivity
Non-Exempt Other					
	A CONTROL OF THE PARTY OF THE P		*please select fro	m Non-Exempt Waste List on	back
QUANTITY		D. DADDELG		- W. S. W.	
	man,	B - BARRELS		Y - YARDS	E - EACH
I hereby certify that the above liste	d material(s), is (are) not a hazardo	Is waste as defined by 40 CEP D	ort 261 or		s been properly described, classified and
packaged, and is in proper condition	for transportation according to an	plicable regulation	art 201 or any applicable s	state law. That each waste has	been properly described, classified and
		Fire a contraction.			
RCRA EXEMPT:	Oil field wastes generated from oil	and gas exploration and produ	ction operations and are r	not mixed with non-exempt wa	aste (R360 Accepts certifications on a per
RCRA NON-EXEMPT:	Oil field waste which is non-hazard	lous that does not exceed the n	ninimum standards for wa	sto bazardous bu share - + - : !!	cs established in RCRA regulations, 40 CFR
	261.21-261.24, or listed hazardous	waste as defined by 40 CER na	ert 261 subport D os amer	ate data to the characterism	cs established in RCRA regulations, 40 CFR ation demonstrating the waste as non-
	hazardous is attached. (Check the	appropriate items as provided)	at 201, subpart D, as affici	nded. The following document	ation demonstrating the waste as non-
	MSDS Information	-			
	Wisbs information	RCRA Hazardous Waste Analy	/sis	Other (Provide Description Bel	low)
×				1 1	
Carl Para	F 17		1 1	11 11	(11)
AC (NSGOD	7 Rm JAPIOZ MAR V	5 3/m 71	5/20/5	111111	LA
(PRINT) AUTHORIZED AGENTS SIG	SNATURE		DATE	a fill the	SIGNATURE
	All variety was talled a second was	TOANCO			SOLVIOLE
	/	TRANSPO	ORTER		
Transporter's	0 11 - 10	A January			- ;
Name	16 16 6 11	() -	Driver's Name	Cr 27 2 16 1	17
Address / / 5 /	1 3 C S S S S S S S S S S S S S S S S S S		Delet No.		263
		- / 1	Print Name		
2011711	610 211 30 =	- (), 3	Phone No.		
Phone No.			Truck No.		
horoby cartify that the - I	Towns and Market				
hereby certify that the above name	d material(s) was/were picked up a	t the Generator's site listed abo	ve and delivered without i	incident to the disposal facility	listed below.
1 -17	118212				
SHIPMENT DATE	DRIVER'S SIGNATURE	120	DELIVERY	DATE	200210000000000000000000000000000000000
TRUCK TIN	AE CTANAD	BISBASHI	1/2.V.2.V.18.00.0		DRIVER'S SIGNATURE
= 1 \ 1 \ 1 \ 1 \ 1 \ A	IL STAIVIP	DISPOSALI	-ACILITY	RECEI	VING AREA
N: / C ()	OUT:				
27 2		4		Name/No.	
ite Name/	/ STE OCE		Discover at the		
ermit No. Red Bluff Facilit	y/ 31r-065		Phone No.	32-448-4239	
ddress 5053 US Highway	285, Orla, TX 79770				
NORM READINGS TAI	(EN3 (Ginala On a)	Water State of the			
Chloride	(EN? (Circle One) YES	NO	If YES, was reading	> 50 micro roentgens? (circle o	one) YES NO
hemical Analysis (Mg/I)			Conductivity		
(116/1)		- 1-	(mmhos/cm)		рН
		TANK BOT	TOMS		
Fee	at .		10M9		
st Gauge	Inc	hes			
			BS&W	/BBLS Received	BS&W (%)
nd Gauge				Free Water	
eceived				Total Received	
I hereby certify that the above load	d material has been (circle one):	ACCEPTED DENIED	If denied why?		
I hereby certify that the above load	d material has been (circle one):	ACCEPTED DENIED	If denied, why?		i e
I hereby certify that the above load	d material has been (circle one):	ACCEPTED DENIED	If denied, why?	1. Nach	
I hereby certify that the above load	d material has been (circle one):	019 101	If denied, why?	- 1 1/V/aC/1	SIGNATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name

			CRIEDATA			
Operator No.			ENERATO	JK	NO.47	0966
operator No.				Permit/RRC No.	- L	0300
Operators Name	wathen O.	/-		Lease/Well	The Market of the Control of the Con	
Address (1)11	57 /////	1 0 cm . C		Name & No.	CK POCKERS	15-20-4 AJA 1121 G
TT	The stanta	i more		County	825BC/	
City, State, Zip	11/2/11	1517 - 27	3	API No.	30-016,-	45344
	CORPER MAIN	10000	1	Rig Name & No.		
Phone No.	5 525 Hby	14/	,	AFE/PO No.	701-002	EL ES
	EXEMPT E&P Waste/Serv	rice Identification and A	mount (place yo	lumo povt to ve	aste type in barrels or cubic y	
Oil Based Muds	NON-INJ	ECTABLE WATERS	mount (place vo	iume next to wa	or type in barrels or cubic y	rards)
Oil Based Cuttings Water Based Muds	Washou	t Water (Non-Injectable)			OTHER EXEMPT WASTES (type ar	nd generation process of the waste)
Water Based Cuttings	Complet	ion Fluid/Flow back (Non-Ir	njectable)			
Produced Formation Solids	Gatherin	d Water (Non-Injectable) ng Line Water/Waste (Non-I	Injectable)			
Tank Bottoms	INTERNA	IL USE ONLY	injectable)			
E&P Contaminated Soil Gas Plant Waste	Truck Wa	ashout (exempt waste)	_			
WASTE GENERATION PROCE		The second second				
WASTE GENERATION PROCE	SS: DRILLIN	G	COMPLETION	-36	PRODUCTION	GATHERING LINES
		NON-EXEMPT E&P W	aste/Service Identi	fication and Asses		
	All non-exempt E&P waste must	be analysed and be below	the threshold limit	s for toxicity (TCL)	int), Ignitability, Corrosivity and Re	-0.8
Non-Exempt Other				*nlease select from	n Non-Exempt Waste List on bo	activity.
		The second second		picuse select from	n Non-Exempt Waste List on bo	ick
QUANTITY		B - BARRELS			Y - YARDS	E - EACH
I hereby certify that the above list	ed material(s), is (are) not a ha	zardous waste as defined by	v 40 CFR Part 261 c	or any applicable of	tota la sa Tira da la sa da l	een properly described, classified and
packaged, and is in proper conditi	on for transportation according	to applicable regulation.	y 40 CINT art 201 C	ariy applicable s	tate law. That each waste has be	een properly described, classified and
RCRA EXEMPT:	Oil field wastes generated fr	om oil and gas exploration :	and production on	erations and are n	at mixed with many	(R360 Accepts certifications on a per
T T	load basis only)	9	and production op	crations and are in	of mixed with non-exempt waste	(R360 Accepts certifications on a per
RCRA NON-EXEMPT:	Oil field waste which is non-l	nazardous that does not exc	ceed the minimum	standards for was	te hazardous hu share et al-ti-	established in RCRA regulations, 40 CFR
				ubpart D, as amen	ded. The following documentation	established in RCRA regulations, 40 CFR on demonstrating the waste as non-
	-	k the appropriate items as I	provided)		and the temporary decamentation	on demonstrating the waste as non-
	MSDS Information	RCRA Hazardous W	aste Analysis		Other (Provide Description Below	
					Julier (Provide Description Relow	1
	2000				other (Provide Description Below	7.
Cour Course W	I	1 -	(1/=		other (Provide Description Below	R-1-
(PRINT) AUTHORIZED AGENTS	SIGNATURE	1902 UES 1900	2/5/	2012	Annual (Frovide Description Below	
(PRINT) AUTHORIZED AGENTS	IGNATURE /	Janues 1500	9/5) DATE	2019	Muli	SAATURE)/
	SIGNATURE	TRA	2/5/	2019	Muli	SI
Transporter's Two	M	1.75	DATE	ER	Mull	SI
Fransporter's	SIGNATURE /	TRA	DATE	2019	Muli	SI
(PRINT) AUTHORIZED AGENTS : Transporter's Name Address	M	1.75	DATE	ER	Mull	SI
Transporter's \\ Name \\ Address \\	M	1.75	DATE	ER iver's Name	Mull	SI
Transporter's \\ Name \\ Address \\	M	1.75	Dri Pri	ER iver's Name int Name one No.	Mull	SI
Fransporter's Name Address	Munderen T	wer my f	DATE NSPORTI	ER ver's Name nt Name one No.	Jane 1	SNATURE)
Transporter's \\ Name \\ Address \\	Munderen T	wer my f	DATE NSPORTI	ER ver's Name nt Name one No.	Jane 1	SNATURE)
Fransporter's Name Address	Munderen T	d up at the Generator's site	DATE NSPORTI	ER iver's Name int Name one No. ick No. elivered without in	Sincident to the disposal facility list	SNATURE)
Phone No. hereby certify that the above name	ned material(s) was/were picked	d up at the Generator's site	DATE NSPORTI Pri Phi Tru listed above and december 1	ER iver's Name int Name one No. lick No. elivered without in	Sincident to the disposal facility list	SNATURE DRIVER'S SIGNATURE
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TI	ned material(s) was/were picked DRIVER'S SIGN ME STAMP	d up at the Generator's site	DATE NSPORTI	ER iver's Name int Name one No. lick No. elivered without in	Sincident to the disposal facility list	SNATURE)
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TIL	ned material(s) was/were picked	d up at the Generator's site	DATE NSPORTI Pri Phi Tru listed above and december 1	ER iver's Name int Name one No. lick No. elivered without in	ncident to the disposal facility list RECEIV	SNATURE DRIVER'S SIGNATURE
Fransporter's Name Address Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TIL	ned material(s) was/were picked DRIVER'S SIGN ME STAMP OUT:	d up at the Generator's site	DATE NSPORTI	ER iver's Name int Name one No. ick No. elivered without in	Sincident to the disposal facility list	SNATURE DRIVER'S SIGNATURE
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. Red Bluff Facili	DRIVER'S SIGN ME STAMP OUT:	d up at the Generator's site	DATE NSPORTI	ER iver's Name int Name one No. lock No. elivered without in	ncident to the disposal facility list RECEIV	SNATURE DRIVER'S SIGNATURE
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. Red Bluff Facili	ned material(s) was/were picked DRIVER'S SIGN ME STAMP OUT:	d up at the Generator's site	DATE NSPORTI	ER iver's Name int Name one No. lock No. elivered without in	ncident to the disposal facility list RECEIV Name/No.	SNATURE DRIVER'S SIGNATURE
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA	DRIVER'S SIGN ME STAMP OUT: ity/ STF-065 / 285, Orla, TX 79770	d up at the Generator's site	DATE NSPORTI Pri Pho Tru listed above and de	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43	ncident to the disposal facility list RECEIV Name/No.	ced below. DRIVER'S SIGNATURE ING AREA
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA Chloride	DRIVER'S SIGN ME STAMP OUT: Sty/ STF-065	d up at the Generator's site DISPO	DATE NSPORTI Pri Pho Tru listed above and di SAL FACII Pho If You have a price of the pr	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43	ncident to the disposal facility list RECEIV Name/No.	red below. DRIVER'S SIGNATURE ING AREA
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA	DRIVER'S SIGN ME STAMP OUT: Sty/ STF-065	d up at the Generator's site DISPO NO	DATE NSPORTI Pri Pho Tru listed above and di SAL FACII Pho Con (m	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43	ncident to the disposal facility list RECEIV Name/No.	ced below. DRIVER'S SIGNATURE ING AREA
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA Chloride	DRIVER'S SIGN ME STAMP OUT: Sty/ STF-065	d up at the Generator's site DISPO	DATE NSPORTI Pri Pho Tru listed above and di SAL FACII Pho Con (m	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43 YES, was reading > iductivity imhos/cm)	ncident to the disposal facility list RECEIV Name/No.	red below. DRIVER'S SIGNATURE ING AREA
Fransporter's Name Address Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA Chloride hemical Analysis (Mg/I) Fee	DRIVER'S SIGN ME STAMP OUT: Sty/ STF-065	d up at the Generator's site DISPO NO	DATE NSPORTI Pri Pho Tru listed above and di SAL FACII Pho Con (m	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43 YES, was reading > iductivity imhos/cm)	ncident to the disposal facility list RECEIV Name/No.	red below. DRIVER'S SIGNATURE ING AREA
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA Chloride hemical Analysis (Mg/I) set Gauge	DRIVER'S SIGN ME STAMP OUT: ity/ STF-065 (285, Orla, TX 79770 KKEN? (Circle One) YES	d up at the Generator's site NO TANK	DATE NSPORTI Pri Pho Tru listed above and di SAL FACII Pho Con (m	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43 YES, was reading > iductivity inhos/cm)	ncident to the disposal facility list RECEIV Name/No.	ced below. DRIVER'S SIGNATURE ING AREA O YES NO pH
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA Chloride hemical Analysis (Mg/I) st Gauge and Gauge	DRIVER'S SIGN ME STAMP OUT: ity/ STF-065 (285, Orla, TX 79770 KKEN? (Circle One) YES	d up at the Generator's site NO TANK	DATE NSPORTI Pri Pho Tru listed above and di SAL FACII Pho Con (m	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43 YES, was reading > iductivity onhos/cm)	RECEIVINAME/No. 2-448-4239 50 micro roentgens? (circle one	red below. DRIVER'S SIGNATURE ING AREA
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA Chloride hemical Analysis (Mg/I) st Gauge and Gauge	DRIVER'S SIGN ME STAMP OUT: ity/ STF-065 (285, Orla, TX 79770 KKEN? (Circle One) YES	d up at the Generator's site NO TANK	DATE NSPORTI Pri Pho Tru listed above and di SAL FACII Pho Con (m	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43 YES, was reading > iductivity onhos/cm)	RECEIV Name/No. 2-448-4239 50 micro roentgens? (circle one	ced below. DRIVER'S SIGNATURE ING AREA O YES NO pH
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA Chloride hemical Analysis (Mg/I) st Gauge and Gauge erecived	DRIVER'S SIGN ME STAMP OUT: Sty/ STF-065 (AKEN? (Circle One) PES PER PER PER PER PER PER PER	d up at the Generator's site NO TANK Inches	DATE NSPORTI Pri Pho Tru listed above and de SAL FACI Pho Con (m) BOTTON	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43 YES, was reading > iductivity onhos/cm) BS&W/	RECEIVINAME/No. 2-448-4239 50 micro roentgens? (circle one	ced below. DRIVER'S SIGNATURE ING AREA O YES NO pH
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA Chloride hemical Analysis (Mg/I) st Gauge and Gauge	DRIVER'S SIGN ME STAMP OUT: Sty/ STF-065 (AKEN? (Circle One) PES PER PER PER PER PER PER PER	d up at the Generator's site NO TANK Inches	DATE NSPORTI Pri Pho Tru listed above and de SAL FACI Pho Con (m) BOTTON	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43 YES, was reading > iductivity onhos/cm)	RECEIVINAME/No. 2-448-4239 50 micro roentgens? (circle one	ced below. DRIVER'S SIGNATURE ING AREA O YES NO pH
Phone No. hereby certify that the above name SHIPMENT DATE TRUCK TII N: ite Name/ ermit No. ddress NORM READINGS TA Chloride hemical Analysis (Mg/I) st Gauge and Gauge erecived	DRIVER'S SIGN ME STAMP OUT: Sty/ STF-065 (AKEN? (Circle One) PES PER PER PER PER PER PER PER	d up at the Generator's site NO TANK Inches	DATE NSPORTI Pri Pho Tru listed above and de SAL FACI Pho Con (m) BOTTON	ER iver's Name int Name one No. ick No. elivered without in DELIVERY D LITY one No. 43 YES, was reading > iductivity onhos/cm) BS&W/	RECEIVINAME/No. 2-448-4239 50 micro roentgens? (circle one	ced below. DRIVER'S SIGNATURE ING AREA O YES NO pH



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

			C	ENERAT	TOR		THORE NO.
Oparatas Na			U	EINEKA	UK	NO.	.70967
Operator No.					Permit/RRC No.	all	. 10301
Operators Name	chan 1	7 /			Lease/Well	2 \	e Sabrie territorio worse
Address 4///	< 7700	(M)	. (Name & No. /	CIEDECIAN.	25 25 -26 -4 MA 11 X151
	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	ex the com			County	& DD4	
City, State, Zip	1-1-11	JAL ON	20		API No.	30-015-	45344
The state of the s	3-1-	NU 88:	120		Rig Name & No.	-	
Phone No.	7 323	Still			AFE/PO No.	TA 19.00	2250
	EXEMPT E&P W	aste/Service Iden	tification and Ar	mount (place	volume peyt to	vaste type in barrels or cul	
Oil Based Muds		NON-INJECTABLE	WATERS	The same (proces	volume next to t	OTHER EVENDT WASTES OF CUI	oic yards)
Oil Based Cuttings		Washout Water (I	Von-Injectable)		THE PROPERTY OF THE PARTY OF TH	OTHER EXCIMINATIVASTES (BY	pe and generation process of the waste)
Water Based Muds Water Based Cuttings	-	Completion Fluid/	Flow back (Non-In	njectable)	P. 1		
Produced Formation Solids	-	Produced Water (Gathering Line Wa	Non-Injectable)				
Tank Bottoms		INTERNAL USE ON	ILY	injectable)		na.	
E&P Contaminated Soil	20	Truck Washout (e:					
Gas Plant Waste				min on the second			and the second
WASTE GENERATION PROCES	S:	DRILLING		COMPLETION		PRODUCTION	GATHERING LINES
		NOI	V-EXEMPT E&P.W	aste/Service Ide	entification and Am		
Al	non-exempt E&P v	waste must be analy	sed and be below	the threshold li	mits for toxicity (To	Dunt LP), Ignitability, Corrosivity an	d Popethylty
Non-Exempt Other						om Non-Exempt Waste List	
			1000		picase select ji	om Won-Exempt waste List o	on back
QUANTITY		E	3 - BARRELS			Y - YARDS	E - EACH
I hereby certify that the above liste	d material(s), is (are	e) not a hazardous w	vaste as defined by	v 40 CER Part 20	il or any applicable		as been properly described, classified and
packaged, and is in proper conditio	n for transportation	according to applic	able regulation.	y 40 CFR Part 20	or or any applicable	state law. That each waste h	as been properly described, classified and
				and production	operations and ass	man military and the	vaste (R360 Accepts certifications on a per
RCRA EXEMPT:	load basis only)		- Bas subjection	and production	operations and are	not mixed with non-exempt v	vaste (R360 Accepts certifications on a per
RCRA NON-EXEMPT:	Oil field waste wh	ich is non-hazardou	s that does not ex	ceed the minim	um standards for w	acto bazandena ku akana i	tics established in RCRA regulations, 40 CFR
	261.21-261.24, or	listed hazardous wa	iste as defined by	40 CFR, part 26	1. subpart D. as am	ended. The following document	tics established in RCRA regulations, 40 CFR ntation demonstrating the waste as non-
	hazardous is attac	hed. (Check the app	ropriate items as	provided)	a, suspaire B, as air	ended. The following docume	itation demonstrating the waste as non-
	MSDS Information		CRA Hazardous W			Other (Provide Description B	alow
					7	//	1
	D	1-		1			
(PRINT) AUTHORIZED AGENTS SI	(C) 479777	Homevest	30	9/4	5/2019	Allel	CA /
(FRINTY ACTIONIZED AGENTS SI	GNATURE				DATÉ		SIGNATURE
			TRA	NSPOR	TER		4
Transporter's		, lea	77 TV				
Name <u>Sold And</u>		a d	12 11/2		Driver's Name	7 - 11:	43D 1979
Address					Print Name	pel.	
					Phone No.		***
Phone No.					Truck No.		
hereby certify that the above name	ed material(s) was h	word picked up at th	o Consustantantanta	Part I			-
hereby certify that the above name	a material(s) was/	were picked up at th	e Generator's site	listed above ar	id delivered withou	t incident to the disposal facili	ty listed below.
SHIPMENT DATE	-	DRIVER'S SIGNATURE				violet and a second	
	AE CTANAD	SHIVER'S SIGNATORE	DIGOS		DELIVE		DRIVER'S SIGNATURE
2 130 1	ME STAMP		DISPO	SAL FA	CILITY	RECE	IVING AREA
N:	OUT:			J		Name/No.	
iite Name/				-		rtaille/ rto.	
Permit No. Red Bluff Facilit	ty/ STF-065			1 30	Phone No.	432-448-4239	
Address 5053 US Highway	285, Orla, TX 79770	0					- 10
NORM READINGS TA	KEN? (Circle One)	YES	NO		IF VEC was yet die	50	TOTAL MANAGEMENT OF THE PARTY O
Chloride	,	. 23	110		Conductivity	g > 50 micro roentgens? (circle	e one) YES NO
hemical Analysis (Mg/I)					(mmhos/cm)		рН
			TANK	КВОТТО	DMS	2 × *	4
Fe	et	Inches			24010		
st Gauge		mene	2	Ī	828	W/BBLS Received	DCG/W/0/
nd Gauge			/		550	Free Water	BS&W (%)
eceived						Total Received	
					Note that the		
I hereby certify that the above loa	id material has been	n (circle one):	ACCEPTED	DENIED	If denied, why?	A su	
11/11/11/11/11/11	3 1 1 1 1 1 1 1	1 60	11. 1	1 101			
	111111	1 /	1	P. 171		VIALIGUELLE	
NAME (PRINT)	111111	DATE		P.C.	TLE	MAMAGULIAL	SIGNATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name _

Compan	Man Contact	Informatio
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		OFFICE		ASSESSED TO A STATE OF THE STAT	THORE NO.	
0		GENER	ATOR	NO.	700CE	
Operator No.			Permit/RRC No.	040	70965	
Operators Name	2 thom 0 1		Lease/Well	many and	EN 25 28 5 WAL	
Address 6/1/1	S 7 11 11012 6	" ore of	Name & No.	Service Com	C1) 4) 20 4 11 4 11 11	3119
-			County	70 70	Francisco Company	- 6
City, State, Zip	1-bad Nas 8	9270	API No.	50 - 016-	Com Solled	
Phone No. 596	322 9461	THE WAY	Rig Name & No.	= 0 ()		
			AFE/PO No.	TA 19-02:		
Oil Based Muds	EMPT E&P Waste/Service Ident	ification and Amount (pla	ace volume next to w	aste type in barrels or cub	ic yards)	
Oil Based Cuttings	NON-INJECTABLE Washout Water (N	WATERS		OTHER EXEMPT WASTES (type	pe and generation process of the waste)	
Water Based Muds	Completion Fluid/	Flow back (Non-Injectable)	S724			
Water Based Cuttings Produced Formation Solids	Produced Water (I	Non-Injectable)				
Tank Bottoms	INTERNAL USE ON	ter/Waste (Non-Injectable)				
E&P Contaminated Soil	Truck Washout (ex					
Gas Plant Waste	35 A. 44	West College	10-20			
WASTE GENERATION PROCESS:	DRILLING	COMPLET	ION	PRODUCTION	GATHERING LINES	
	NON	I-EXEMPT E&P Waste/Service	e Identification and Amo	unt		
All no	n-exempt E&P waste must be analys	ed and be below the thresho	ld limits for toxicity (TCL	.P), Ignitability, Corrosivity and	Reactivity.	
Non-Exempt Other				m Non-Exempt Waste List o		
QUANTITY						TARREST TO STORY
		- BARRELS		Y - YARDS	E - EACH	112-31-11
I hereby certify that the above listed mpackaged, and is in proper condition for	naterial(s), is (are) not a hazardous w	aste as defined by 40 CFR Pa	rt 261 or any applicable	state law. That each waste ha	s been properly described, classific	ed and
	and the state of according to applica	able regulation.				
RCRA EXEMPT:	il field wastes generated from oil and ad basis only)	d gas exploration and produc	tion operations and are	not mixed with non-exempt w	aste (R360 Accepts certifications o	n a per
3 <u>2-0-0</u>	ad basis office					
26	il field waste which is non-hazardous	that does not exceed the mi	nimum standards for wa	aste hazardous by characterist	ics established in RCRA regulations	, 40 CFR
ha	51.21-261.24, or listed hazardous wa azardous is attached. (Check the app	ropriate items as provided)	t 261, subpart D, as ame	ended. The following documen	tation demonstrating the waste as	non-
		CRA Hazardous Waste Analys	sis .	Other (Provide Description Be	Larry	
				Other (Frovide Description Be	now)	
con la maria	C = 11	W ==	1 - 1	1//		
(PRINT) AUTHORIZED AGENTS SIGNAT	SAMTO MANZUE	17-12 J	15/000	+ ACI	A K	
			DATE	2 4	SIGNATURE	
		TRANSPO	DRTER	01		
Transporter's Name	T2 15/Carl 1/1	LUNC	Driver's Name	Kleda al		
Address DO DO	X THE		12	THE THE	and Millia	
101616	1 60011	1	Print Name	KICLE to 1/80	1-11-6	
Phone No.	AW EDSAI	1	Phone No.	0.5		140
A CONTRACTOR OF THE PROPERTY O			Truck No.	0.5		
I hereby certify that the above named n	naterial(s) was/were picked up at the	e Generator's site listed abov	e and delivered without	incident to the disposal facilit	y listed below.	
SHIPMENT DATE	DRIVER'S SIGNATURE		DELIVERY	/ DATE	DRIVER'S SIGNATURE	-
TRUCK TIME	Table 1	DISPOSAL F	ACILITY	RECE	IVING AREA	
IN: O	UT:			Name/No.		
Site Name/			-	Nullic, No.		
Permit No. Red Bluff Facility/	STF-065		Phone No.	132-448-4239		
Address 5053 US Highway 285	5, Orla, TX 79770		- manufacture of the	NAME OF BUILDING	The state of the s	Service de
NORM READINGS TAKEN	N? (Circle One) YES	NO	If YES, was reading	; > 50 micro roentgens? (circle	one) YES NO	
Chloride Chemical Analysis (Mg/l)			Conductivity	, are more reality and the control	one) 123 NC	1
enemical Analysis (ivig/I)			(mmhos/cm)		рН	
		TANK BOT	TOMS			
Feet Feet	Inches					
1st Gauge			BS&V	V/BBLS Received	BS&W (%)	
Received		-		Free Water Total Received		
				. Star Necelveu		
I hereby certify that the above load m	naterial has been (circle one):	ACCEPTED DENIED	If denied, why?			
VIIIIIIIIIIII	1 006	10		(1/1\/\\\ 1		
NAME (PRINT)	DATE	1.7.1	TITLE	I WINT	WIND CONTROL	
VANDOS VI. STORT COMPAN	DAIL		HILE		SIGNATURE	



(PLEASE PRINT) *REQUIRED INFORMATION* Name_

				Pho	one No.
		GENERAT	OR	NO.17	0004
Operator No.		<u> </u>	Permit/RRC No.	4/	U304
Operators Name Itary Pop	0.7		Lease/Well	Dien Kruis	S. Mercey 27
Address 2//// 5 7 7	Mutall Pourl		Name & No.	IN DYCKEDS	Darrate 4 th 14 30 th
	The second	-	County	TADY	Y = 1
City, State, Zip	ALAN CARRON	-	API No.	1 30 615 4	534/L
Phone No. 575 333	Gerell 1		Rig Name & No.	To vol on	
EVEMOTERAL			AFE/PO No.	TA. 19.025	458
Oil Based Muds	NON-INJECTABLE WATERS	nd Amount (place v	olume next to wa	aste type in barrels or cubic ya	irds) (17)
Oil Based Cuttings	Washout Water (Non-Injectab	le)	Ollin SPS (Color)	OTHER EXEMPT WASTES (type and	generation process of the waste)
Water Based Muds Water Based Cuttings	Completion Fluid/Flow back (N	lon-Injectable)			
Produced Formation Solids	Produced Water (Non-Injectab Gathering Line Water/Waste (I	Non-Injectable)		Comments of the last of the la	
Tank Bottoms E&P Contaminated Soil	INTERNAL USE ONLY				
Gas Plant Waste	Truck Washout (exempt waste)			
WASTE GENERATION PROCESS:	DRILLING	COMPLETION			A Company of the Comp
				PRODUCTION	GATHERING LINES
All non-exempt F&P	NON-EXEMPT E8	&P Waste/Service Iden	tification and Amou	unt	
Non-Exempt Other	wester must be allarysed and be of	elow the threshold lim		P), Ignitability, Corrosivity and Rea	
			*please select from	m Non-Exempt Waste List on bac	rk .
QUANTITY	B - BARRELS		A Section 1	Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (a packaged, and is in proper condition for transportation	re) not a hazardous waste as defir	ned by 40 CFR Part 261	or any applicable s	state law. That each waste has her	
and the state of t	are according to applicable regulati	OII.			
RCRA EXEMPT: Oil field wastes g	generated from oil and gas explora	ation and production o	perations and are r	not mixed with non-exempt waste	(R360 Accepts certifications on a per
RCRA NON-EXEMPT: Oil field waste w 261.21-261,24, c	nich is non-hazardous that does no or listed hazardous waste as define	ot exceed the minimum	n standards for was	ste hazardous by characteristics es	stablished in RCRA regulations, 40 CFR
hazardous is atta	ached. (Check the appropriate item	ns as provided)	subpart D, as affici	nded. The following documentatio	n demonstrating the waste as non-
MSDS Information	n RCRA Hazardo	ous Waste Analysis		Other (Provide Description Below)	
	The second second	Med and the		1 / 1	10
SAAC CASIED PED COM	no thousand on the	9/	10mm	My Vi	1/1
(PRINT) AUTHORIZED AGENTS SIGNATURE	HE THUNK IN	DA	TE .	and the same	NATURE
		RANSPORT	(FD)	310	MATORE
Transporter's		MANJEONI	EN		
Name	15-		Driver's Name	Lace	
Address	/	F	Print Name	112	
		F	hone No.		THE SECOND SECOND
Phone No.			ruck No.		-141
hereby certify that the above named material(s) was,	/were picked up at the Generator'	s site listed above and	delivered without i	incident to the disposal facility liste	ed below.
					34 3504,
SHIPMENT DATE	DRIVER'S SIGNATURE		DELIVERY	DATE	DRIVER'S SIGNATURE
TRUCK TIME STAMP	DIS	POSAL FAC	ILITY	RECEIVI	NG AREA
N: 11-36th OUT:				Name/No.	1
Site Name/			_ L	rame/140.	WH 1/2
Permit No. Red Bluff Facility/ STF-065		P	hone No.	32-448-4239	
5053 US Highway 285, Orla, TX 797	70				
NORM READINGS TAKEN? (Circle One)	YES NO		If YES, was reading	> 50 micro roentgens? (circle one)	YES NO
Chloride Chemical Analysis (Mg/l)		C	onductivity (mmhos/cm)		
		NK BOTTO			рН
Feet	Inches	INK BUTTU	IAI2		
st Gauge	inches		RS&\M	//BBLS Received	DCG/M/(0/)
nd Gauge	105		DOGW	Free Water	BS&W (%)
eceived			7	Total Received	
I hereby certify that the above load material has bee	en (circle one):	DELUGATE AL	(Proportion to the same		
The above load flaterial has bee	en (circle one): ACCEPTED	DENIED	If denied, why?	*(* · · · · · · · · · · · · · · · · · ·	
and the second	- 17-1	101	di Para	1 1 1 dy at he is	
NAME (PRINT)	DATE	TITL		SIGNA	ATURE



R369 EWIRDMENTAL SOLUTIONS	(PLEAS		RED INFORMATION* Nar	
	GENE	RATOR	CAN THE RESIDENCE OF STREET, S	one No.
Operator No.	State of the state	Permit/RRC No.	1/	0968
Operators Name Mark Mark	· C. /	Lease/Well Name & No.	CR DELLAS	2 × 11 4 1 1 1 1 1 2 × 2 × 2 × 2 × 2 × 2 × 2 × 2
Address <u>4111</u> 5 7 d	well Ford	County	GA MU	17 X827 WA 111 24 51
A		API No.	Bu 015	45244
City, State, Zip	VAI 8822CI	Rig Name & No.		
Phone No	3441	AFE/PO No.	TA 19.022	258
EXEMPT E&P W	aste/Service Identification and Amount (place volume next to wa	ste type in barrels or cubic va	rds)
Oil Based Muds Oil Based Cuttings	NON-INJECTABLE WATERS Washout Water (Non-Injectable)		OTHER EXEMPT WASTES (type and	generation process of the waste)
Water Based Muds	Completion Fluid/Flow back (Non-Injectable)			
Water Based Cuttings Produced Formation Solids	Produced Water (Non-Injectable)			
Tank Bottoms	Gathering Line Water/Waste (Non-Injectable INTERNAL USE ONLY)		
E&P Contaminated Soil Gas Plant Waste	Truck Washout (exempt waste)			
WASTE GENERATION PROCESS:	DRILLING COMPL	ETION 7	PRODUCTION	
	NON-EXEMPT E&P Waste/Serv	ice Identification and Amou		GATHERING LINES
All non-exempt E&P Non-Exempt Other	waste must be analysed and be below the thres	hold limits for toxicity (TCLP), Ignitability, Corrosivity and Rea	
		*please select from	n Non-Exempt Waste List on bad	k university
QUANTITY	B - BARRELS		Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (ar packaged, and is in proper condition for transportatio	e) not a hazardous waste as defined by 40 CFR	Part 261 or any applicable s	tate law. That each waste has bee	en properly described, classified and
RCRA EXEMPT: Oil field wastes g	enerated from oil and gas exploration and prod	uction operations and are n	ot mixed with non-exempt waste	(R360 Accents certifications on a new
RCRA NON-EXEMPT: Oil field waste wh	nich is non-hazardous that does not exceed the	minimum standards for was	te hazardous by characteristics es	tablished in RCRA regulations, 40 CFR
201.21 201.24, 0	r listed hazardous waste as defined by 40 CFR, p ched. (Check the appropriate items as provided)	art 261, subpart D. as amen	ded. The following documentatio	n demonstrating the waste as non-
MSDS Informatio			Other (Provide Description Below)	
The state of the s			1 Person	
APRICASTRUTES SUM	o Manuel 1777 a	1= 10010	11. 11. 1	10
(PRINT) AUTHORIZED AGENTS SIGNATURE	C (110, V = 3) W	DATE	SIG	NATURE
The state of the s	TRANSP	ORTER		
ransporter's	IMANSI			
Name 2 A R MEN	0070 /3.05	Driver's Name	Tailos ()	
Address		Print Name		
de a se No		Phone No.		
hone No.		Truck No.	06	
hereby certify that the above named material(s) was/	were picked up at the Generator's site listed ab	ove and delivered without i	ncident to the disposal facility list	ed below.
SHIPMENT DATE	DRIVER'S SIGNATURE	DELLUSIONS		
TRUCK TIME STAMP	DISPOSAL	DELIVERY E	AND THE RESERVE OF THE PERSON	DRIVER'S SIGNATURE
/ /2 / / / / / / / / / / / / / / / / /	DISPUSAL	FACILITY		NG AREA
		the state of the s	Name/No.	
ite Name/ ermit No. Red Bluff Facility/ STF-065		Phone No.		
ddress 5053 US Highway 285, Orla, TX 7977	20	43	32-448-4239	
NORM READINGS TAKEN? (Circle One)	YES NO	If VES was reading a	F0	
Chloride hemical Analysis (Mg/I)	NO.	Conductivity	> 50 micro roentgens? (circle one	YES NO
Terrical Analysis (Mg/I)		(mmhos/cm)		рН
	TANKBO	TTOMS		
st Gauge Feet	Inches	Dealth	(00100) 1	
nd Gauge		BS&W,	/BBLS Received Free Water	BS&W (%)
eceived			Total Received	
I hereby certify that the above load material has bee	an (circle ane):	3000 3 10 3 10		
ANTO NAME OF THE PARTY OF THE P	en (circle one): ACCEPTED DENIEL	If denied, why?	MANAS MALON	y
NAME (PRINT)	DATE	TITLE	HILMANY	A-110
Company Angle Colored	The state of the s	111 March	SIGN	ATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name

		SEMERATAS		ie No.
Operator No.		GENERATOR Pormit/PRC No.	NO.170	0962
Operators Name May Thon	12.7	Permit/RRC No. Lease/Well		
Address 4/// \$ ////	stell frait	Name & No.	CHENROLARD 25 28	9 149 111 24 5/16
	THE FERMINE	County API No.	30-0151/4	2/2/
City, State, Zip	VM 88220	Rig Name & No.	20 013-17	2 hall of
Phone No. 575 323	944)	AFE/PO No.	TA 1 = 2.	255
EXEMPT E&P Wa	ste/Service Identification and	Amount (place volume next to v	waste type in barrels or cubic yar	rds)
Oil Based Cuttings	NON-INJECTABLE WATERS Washout Water (Non-Injectable)		OTHER EXEMPT WASTES (type and a	generation process of the waste)
Water Based Muds Water Based Cuttings	Completion Fluid/Flow back (Non- Produced Water (Non-Injectable)	Injectable)		
Produced Formation Solids Tank Bottoms	Gathering Line Water/Waste (Nor INTERNAL USE ONLY	-Injectable)		
E&P Contaminated Soil Gas Plant Waste	Truck Washout (exempt waste)	<u> </u>		
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	PRODUCTION	CATHERING LINES
		Naste/Service Identification and Am		GATHERING LINES
All non-exempt E&P w	aste must be analysed and be below	w the threshold limits for toxicity (TC	ount CLP), Ignitability, Corrosivity and Reac	tivity.
Non-Exempt Other		*please select fi	rom Non-Exempt Waste List on back	
QUANTITY	B - BARRELS	10.59	Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (are packaged, and is in proper condition for transportation	not a hazardous waste as defined	by 40 CFR Part 261 or any applicable	e state law. That each waste has bee	n properly described, classified and
RCRA EXEMPT: Oil field wastes ge			e not mixed with non-exempt waste (R360 Accepts certifications on a per
load basis only)				
201.21-201.24, 01	listed nazardous waste as defined b	y 40 CFR, part 261, subpart D. as am	vaste hazardous by characteristics est lended. The following documentation	rablished in RCRA regulations, 40 CFR
hazardous is attact MSDS Information	ned. (Check the appropriate items a	s provided)		
	i incha Hazardous	waste Allalysis	Other (Provide Description Below)	
Spollonspor Fro Spare	162 15 8-50-6	9/6/2014	At Old	
(PRINT) AUTHORIZED AGENTS SIGNATURE	1-4-150 miles	DATE	SIGN	IATURE
Transporter's	TR	ANSPORTER		
Name 1882 Transport	C / BUS	Driver's Name	Earl C	
Address	1	Print Name		
Phone No.	M 18+266	Phone No.		
hereby certify that the above named material(s) was/v	vere nicked up at the Congrator's si	Truck No.		20.2
	vere pieced up at the Generator 5.51	te listed above and delivered withou	it incident to the disposal facility liste	d below.
	DRIVER'S SIGNATURE	DELIVE	RY DATE	DRIVER'S SIGNATURE
TRUCK TIME STAMP	DISPO	DSAL FACILITY	RECEIVII	NG AREA
IN: OUT:			Name/No.	
Permit No. Red Bluff Facility/ STF-065		Phone No.	432-448-4239	
Address 5053 US Highway 285, Orla, TX 79770				
NORM READINGS TAKEN? (Circle One) Chloride	YES NO	If YES, was readir Conductivity	ng > 50 micro roentgens? (circle one)	YES NO
Chemical Analysis (Mg/I)	Constant Tours	(mmhos/cm)		рН
Feet		K BOTTOMS		
Ist Gauge	Inches	BS&	W/BBLS Received	BS&W (%)
2nd Gauge Received			Free Water	N.V.
			Total Received	
I hereby certify that the above load material has been				
	(circle one): ACCEPTED	DENIED If denied, why?		
NAME (PRINT)	(circle one): ACCEPTED	DENIED If denied, why?	WILL WIND SIGNA	



(PLEASE PRINT) *REQUIRED INFORMATION* Name

SOLUTIONS				Pho	one No
	or .	GENERAT		NO.17	0963
Operator No.	1 0		Permit/RRC No. Lease/Well	Parts 8	0 4 6 6
Operators Name	hen Oil	2 Unio 3	Name & No.	CIE DECKARISZ	5284 WA HAZH SI
Address 4///	2 THING RO	CELL THE THE	County	8004	12-21119 III 3
City, State, Zip	Dad 114 993	100.	API No.	30-015-6	10 344
Phone No.	322 9441	art obey and he to	Rig Name & No. AFE/PO No.	TA 19-102	258
EXE	EMPT E&P Waste/Service Ident	ification and Amount (place		te type in barrels or cubic y	ards)
Oil Based Muds	NON-INJECTABLE	WATERS		OTHER EXEMPT WASTES (type and	ATTENDED TO THE PARTY OF THE PA
Oil Based Cuttings Water Based Muds	Washout Water (N	lon-Injectable) Flow back (Non-Injectable)	11.7		
Water Based Cuttings Produced Formation Solids	Produced Water (I	Non-Injectable) ater/Waste (Non-Injectable)			
Tank Bottoms E&P Contaminated Soil	INTERNAL USE ON	LYTHING HOLD			
Gas Plant Waste	Truck Washout (e)	kempt waste)	indunt is a name it		- madamatica pr
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	P	RODUCTION	GATHERING LINES
All nor	NOI n-exempt E&P waste must be analys	N-EXEMPT E&P Waste/Service Ide sed and be below the threshold li			activity.
Non-Exempt Other			*please select from	Non-Exempt Waste List on ba	ıck
QUANTITY		3 - BARRELS		Y - YARDS	E - EACH
I hereby certify that the above listed m packaged, and is in proper condition fo	aterial(s), is (are) not a hazardous war transportation according to applic	vaste as defined by 40 CFR Part 20 cable regulation.	61 or any applicable sta	ate law. That each waste has be	een properly described, classified and
RCRA EXEMPT: Oi			operations and are no	t mixed with non-exempt waste	e (R360 Accepts certifications on a per
RCRA NON-EXEMPT: Oi	l field waste which is non-hazardou	s that does not exceed the minim	um standards for wast	e hazardous by characteristics	established in RCRA regulations, 40 CFR
	51.21-261.24, or listed hazardous was zardous is attached. (Check the app		1, subpart D, as amend	ded. The following documentati	ion demonstrating the waste as non-
		RCRA Hazardous Waste Analysis		ther (Provide Description Below	v)
				1	
SAACLASTRO	RUZ SHAZ /	MRUSTA 9/	1000	Mr. CE	
(PRINT) AUTHORIZED AGENTS SIGNAT	rure 1		DATE	SI THE SI	SIGNATURE
Transporter's		TRANSPOR	RTER	3	1.
Name	(ransport)	BDS	Driver's Name	Jacob- V	Clazquez
Address 1.0.	30x 1031	J = 310	Print Name		
Phone No. 5 75	the History	18026	Phone No. Truck No.		
I hereby certify that the above named n	naterial(s) was/were picked up at t	ne Generator's site listed above a	THE RESIDENCE OF THE PARTY OF T	ocident to the disposal facility li	sted below
		300000000000000000000000000000000000000	na denvered Without I	icident to the disposal facility is	sted below.
SHIPMENT DATE	DRIVER'S SIGNATURE		DELIVERY D		DRIVER'S SIGNATURE
TRUCK TIME	STAMP UT:	DISPOSAL FA	CILITY	RECEIV Name/No.	/ING AREA
Site Name/ Permit No. Red Bluff Facility/	CTF OCF		Phone No.		
Permit No. Red Bluff Facility/ Address 5053 US Highway 28			43	32-448-4239	
NORM READINGS TAKE	Total Company	NO	If YES, was reading	> 50 micro roentgens? (circle on	ne) YES NO
Chloride Chemical Analysis (Mg/l)			Conductivity (mmhos/cm)	, and the second	рн
/ → N(ac			OMS		The state of the state of the state of
1st Gauge Feet	Inche	es	BS&W	/BBLS Received	BS&W (%)
2nd Gauge				Free Water	DOG 17 (70)
Received			71 22	Total Received	
I hereby certify that the above load r	material has been (circle one):	ACCEPTED DENIED	If denied, why?		III chart of the Wall
TICHTYNIA	1 75	101		MANUL	
NAME (PRINT)	DATE		TITLE	I2	IGNATURE



(PLEASE PRINT)

REQUIRED INFORMATION Name_

SOLUTIONS		Phone No
	GENERATOR	NO.170959
Operator No.	Permit/RRC No. Lease/Well	21000
Operators Name Albun Book Col	Name & No.	PICK DECKATED 2500 DWA WIS
Address 4/11/57 Mark 1/R.	County	8 PM
	API No.	30-116-113344
City, State, Zip	Rig Name & No.	
Phone No. 675 323 344/	AFE/PO No.	TA 18 02256
	entification and Amount (place volume next to w	vaste type in barrels or cubic yards)
Oil Based Muds Oil Based Cuttings NON-INJECTAB Washout Wate	LE WATERS r (Non-Injectable)	OTHER EXEMPT WASTES (type and generation process of the waste)
Water Based Muds Completion Flu	id/Flow back (Non-Injectable)	
The state of the s	er (Non-Injectable) Water/Waste (Non-Injectable)	Ph
Tank Bottoms INTERNAL USE	ONLY	
E&P Contaminated Soil Truck Washout Gas Plant Waste	(exempt waste)	
WASTE GENERATION PROCESS: DRILLING	COMPLETION -	PRODUCTION GATHERING LINES
	NON-EXEMPT E&P Waste/Service Identification and Amo	ount
All non-exempt E&P waste must be an Non-Exempt Other	alysed and be below the threshold limits for toxicity (TC	
Non-Exempt other	*please select fr	om Non-Exempt Waste List on back
QUANTITY	B - BARRELS	Y-YARDS 2 0 E-EACH
I hereby certify that the above listed material(s), is (are) not a hazardou packaged, and is in proper condition for transportation according to app	s waste as defined by 40 CFR Part 261 or any applicable	e state law. That each waste has been properly described, classified and
Oil field wastes generated from oil		e not mixed with non-exempt waste (R360 Accepts certifications on a per
RCRA EXEMPT: load basis only)	and graduated and are	4 A Per
RCRA NON-EXEMPT: Oil field waste which is non-hazard	ous that does not exceed the minimum standards for w	vaste hazardous by characteristics established in RCRA regulations, 40 CFR
261.21-261.24, or listed hazardous hazardous is attached. (Check the	waste as defined by 40 CFR, part 261, subpart D, as am	ended. The following documentation demonstrating the waste as non-
MSDS Information	RCRA Hazardous Waste Analysis	Other (Provide Description Below)
	4	U. a. t.
LEGAR CASTON & Store He	15 m 9/5/5010	26.661180-1
(PRINT) AUTHORIZED AGENTS SIGNATURE	DATE	SIGNATURE
4	TRANSPORTER	
Transporter's	Driver's Name	
Name Address	New Late	Jillseckson alel
	Print Name Phone No.	
Phone No. 5 23 6 1 6 061	Truck No.	
I hereby certify that the above named material(s) was/were picked up at	THE VALUE OF COLUMN TO SERVICE	thingidant to the dispersal Carilla Para dispersal
The second secon	. the deficition 3 site listed above and delivered without	Accepted to the disposal facility listed below.
SHIPMENT DATE DRIVER'S SIGNATURE	DELIVER	
TRUCK TIME STAMP	DISPOSAL FACILITY	RECEIVING AREA
IN: OUT:		Name/No.
Site Name/	Phone No.	
Permit No. Red Bluff Facility/ STF-065 Address 5053 US Highway 285 Orla TX 79770	Filotie No.	432-448-4239
3555 05 Highway 265, OHA, 17 75770	NO KATELONIA	
Chloride	NO If YES, was readin Conductivity	g > 50 micro roentgens? (circle one) YES NO
Chemical Analysis (Mg/I)		Н
Feet Inc	TANK BOTTOMS	- N. + 100
Feet Inc. 1st Gauge	ches BS&	W/BBLS Received BS&W (%)
2nd Gauge	500	W/BBLS Received BS&W (%) Free Water
Received		Total Received
I hereby certify that the above load material has been (circle one):	ACCEPTED DENIED If denied, why?	
1/11/1/1/1/1/1/1/1/1/1/1/1/1/1/1/1/1/1/1	-1-7 1 (A TRANSPORT
NAME (PRINT) DA	ATE TITLE	SIGNATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name

				P	Phone No
Operator No.		GENERAT	OR	NO.9	70960
	7 T	 -	Permit/RRC No. Lease/Well	alls	10300
Operators Name Address Address	Children Comment		Constitution of the Consti	(WK DOCKAR)	25,25 4 LIA 14 30 0
-	THE CE PARTE	<u> </u>	API No.	30:016-6	16,2611
City, State, Zip Carls bad	NM 5822	1.1	Rig Name & No.		2.4.4.4
Phone No. 575 32	3 9441	 2 3	AFE/PO No.	IA 1000	2258
EXEMPT E&P \	Naste/Service Identification a	ind Amount (place)	olume next to wa	aste type in barrels or cubic	yards)
Oil Based Cuttings Water Based Muds	NON-INJECTABLE WATERS Washout Water (Non-Injectal			OTHER EXEMPT WASTES (type	and generation process of the waste)
Water Based Cuttings	Completion Fluid/Flow back (I Produced Water (Non-Injecta	ble)			
Produced Formation Solids Tank Bottoms	Gathering Line Water/Waste	(Non-Injectable)			
E&P Contaminated Soil Gas Plant Waste	Truck Washout (exempt waste	e)			
WASTE GENERATION PROCESS:	DRILLING	COMPLETION		PRODUCTION	GATHERING LINES
	NON-EXEMPT E	&P Waste/Service Ide	ntification and Amo	unt	
All non-exempt E&I Non-Exempt Other	waste must be analysed and be by	below the threshold lin			A CONTRACTOR OF THE PROPERTY O
			*please select fro	m Non-Exempt Waste List on	back
QUANTITY	B - BARRELS			Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (packaged, and is in proper condition for transportation)	are) not a hazardous waste as defi on according to applicable regula	ined by 40 CFR Part 26 tion.	1 or any applicable s	state law. That each waste has	been properly described, classified and
RCRA EXEMPT: Oil field wastes	generated from oil and gas explor		operations and are r	not mixed with non-exempt was	ste (R360 Accepts certifications on a per
load basis offly)					s established in RCRA regulations, 40 CFR
261.21-261.24,	or listed hazardous waste as defin	ned by 40 CFR, part 26:	In standards for wa L, subpart D, as ame	nded. The following documenta	is established in RCRA regulations, 40 CFR ation demonstrating the waste as non-
nazardous is att	ached. (Check the appropriate ite	ms as próvided) dous Waste Analysis		Other (Bradida Bassistian B. I	
		Jour Waste Allalysis		Other (Provide Description Belo	JW)
(PRINT) AUTHORIZED AGENTS SIGNATURE	TAR HARUSS	Frz 9/9	5/2019 DATE	Shulo	uft ?
	Carried St.	TRANSPOR'			SIGNATURE
Transporter's	to me	MANSPOR		11	/
Address	CRECORS IL	- mary	Driver's Name Print Name	Humbert S	Anre
+ 06			Phone No.		
Phone No.			Truck No.	06	
I hereby certify that the above named material(s) wa	s/were picked up at the Generato	r's site listed above an	d delivered without	incident to the disposal facility	listed below.
SHIPMENT DATE	DRIVER'S SIGNATURE		DELIVERY	DATE	DRIVER'S SIGNATURE
TRUCK TIME STAME	DIS	SPOSAL FAC			VING AREA
IN:OUT:				Name/No.	
Site Name/ Permit No. Red Bluff Facility/ STF-065			Phone No.		
Permit No. Red Bluff Facility/ STF-065 Address 5053 US Highway 285, Orla, TX 79	770	_	4	132-448-4239	
NORM READINGS TAKEN? (Circle One	No. of the second		If YES, was reading	> 50 micro roentgens? (circle c	one) YES NO
Chloride Chemical Analysis (Mg/l)			Conductivity (mmhos/cm)		рН
		ANK BOTTO			
Feet 1st Gauge	Inches			W/00/00	
2nd Gauge			BS&W	V/BBLS Received Free Water	BS&W (%)
Received				Total Received	
I hereby certify that the above load material has b	een (circle one): ACCEPTED	DENIED	If denied, why?		
- 1/2) (1 1/14/11 B	0519	#16		1 WALL	(
NAME (PRINT)	DATE	TI	TLE	1111	SIGNATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name

Operator No.			The state of the s	THE RESIDENCE OF THE PARTY OF T	No. 100 April 10							
	- " walk - = "u il	GENERAT		NO.	170958							
110 . 6	7 1		Permit/RRC No. Lease/Well		***************************************							
Operators Name Address	alle I and		Name & No.	RICK DECKARD	33261 WA 14214	1/ 6						
	MICH DOLL		County	2000	-45341							
City, State, Zip	NM 35220		API No. Rig Name & No.	30 - 115	-6/62 586/	rana .						
Phone No.	92/11		AFE/PO No.	TA 19	1770							
EXEMPT E&P W	aste/Service Identification and	Amount (place v	olume next to w									
Oil Based Cuttings	NON-INJECTABLE WATERS Washout Water (Non-Injectable)			OTHER EXEMPT WASTES (type and generation process of the waste)							
Water Based Muds Water Based Cuttings	Completion Fluid/Flow back (Non Produced Water (Non-Injectable)	-Injectable)										
Produced Formation Solids Tank Bottoms	Gathering Line Water/Waste (No	n-Injectable)										
E&P Contaminated Soil	INTERNAL USE ONLY Truck Washout (exempt waste)											
Gas Plant Waste WASTE GENERATION PROCESS:	DRILLING	1 0000000000000000000000000000000000000		Market State								
Total Control of the	DRILLING	COMPLETION		PRODUCTION	GATHERING LINES	-						
All non-exempt E&P v	NON-EXEMPT E&P vaste must be analysed and be belo	Waste/Service Idea w the threshold lin	ntification and Amo	unt P), Ignitability, Corrosivity a	nd Reactivity							
Non-Exempt Other				m Non-Exempt Waste List								
QUANTITY	B - BARRELS			Y - YARD	S E - EACH							
I hereby certify that the above listed material(s), is (are packaged, and is in proper condition for transportation	e) not a hazardous waste as defined	by 40 CFR Part 26	1 or any applicable s			nd						
1 pro	according to applicable regulation.	C.										
RCRA EXEMPT: load basis only)	merated from oil and gas exploration	n and production of	operations and are r	not mixed with non-exempt	waste (R360 Accepts certifications on a p	per						
RCRA NON-EXEMPT: Oil field waste wh	ich is non-hazardous that does not	exceed the minimu	m standards for wa	ste hazardous by characteri	istics established in RCRA regulations, 40	CFR						
201.21 201.24, 01	hed. (Check the appropriate items a	by 40 CFR, part 261	, subpart D, as ame	nded. The following docume	entation demonstrating the waste as non	j=						
MSDS Information	RCRA Hazardous	Waste Analysis		Other (Provide Description	Below)							
)		100							
(PRINT) AUTHORIZED AGENTS SIGNATURE	H47 100 17 000	The Course Per Sun HATTING SIE 12110 MILLEY										
(PRINT) AUTHORIZED AGENTS SIGNATURE DATE SIGNATURE												
	TR			JUL	SIGNATURE	_						
Transporter's	TR	ANSPOR	TER	JUL	SIGNATURE							
	doza ED	ANSPOR	TER Driver's Name	Jun 1	SIGNATURE							
Transporter's James Man	doza ED	ANSPOR	TER	Jun 1	SIGNATURE							
Transporter's Name Address SR Manda Ca	doza JEDS	ANSPOR	Driver's Name Print Name Phone No. Truck No.	Jun 1	Minder,							
Transporter's Name Address Address	doza JEDS	ANSPOR	Driver's Name Print Name Phone No. Truck No.	incident to the disposal faci	Minder,							
Transporter's Name Address SR Manda Ca	doza JEDS	ANSPOR	Driver's Name Print Name Phone No. Truck No.		Menden							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/A	vere picked up at the Generator's si	ANSPORT	Driver's Name Print Name Phone No. Truck No. d delivered without	DATE	ility listed below. DRIVER'S SIGNATURE							
Phone No. hereby certify that the above named material(s) was/s	vere picked up at the Generator's si	ANSPOR	Driver's Name Print Name Phone No. Truck No. d delivered without	DATE	Menden							
Phone No. hereby certify that the above named material(s) was/s SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/	vere picked up at the Generator's si	ANSPORT	Driver's Name Print Name Phone No. Truck No. d delivered without DELIVERY	DATE	ility listed below. DRIVER'S SIGNATURE							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/N SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/ Permit No. Red Bluff Facility/ STF-065	vere picked up at the Generator's si	ANSPORT	Driver's Name Print Name Phone No. Truck No. d delivered without DELIVERY	DATE	ility listed below. DRIVER'S SIGNATURE							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/A SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/	vere picked up at the Generator's signature DISP	ANSPORT	Driver's Name Print Name Phone No. Truck No. d delivered without DELIVERY Phone No. 4	Name/No.	Ility listed below. DRIVER'S SIGNATURE CEIVING AREA							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/s SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 79776 NORM READINGS TAKEN? (Circle One) Chloride	vere picked up at the Generator's si	ANSPORT	Driver's Name Print Name Phone No. Truck No. d delivered without DELIVERY Phone No. If YES, was reading conductivity	REC Name/No.	DRIVER'S SIGNATURE CEIVING AREA							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/A SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 79776 NORM READINGS TAKEN? (Circle One)	vere picked up at the Generator's signature DISP YES NO	ANSPORT	Driver's Name Print Name Phone No. Truck No. d delivered without DELIVERY Phone No. If YES, was reading Conductivity (mmhos/cm)	Name/No.	Ility listed below. DRIVER'S SIGNATURE CEIVING AREA							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/A SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 S053 US Highway 285, Orla, TX 79776 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/I) Feet	vere picked up at the Generator's signature DISP YES NO	ANSPORT	Driver's Name Print Name Phone No. Truck No. d delivered without DELIVERY Phone No. If YES, was reading conductivity	Name/No.	DRIVER'S SIGNATURE CEIVING AREA							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/A SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 S053 US Highway 285, Orla, TX 7977 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/I)	vere picked up at the Generator's si DRIVER'S SIGNATURE DISPO YES NO	ANSPORT	Driver's Name Print Name Print Name Phone No. Truck No. d delivered without DELIVERY Phone No. 4 If YES, was reading conductivity (mmhos/cm)	Name/No. 32-448-4239 > 50 micro roentgens? (circ	DRIVER'S SIGNATURE CEIVING AREA							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/A SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 79776 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/I) Feet	vere picked up at the Generator's si DRIVER'S SIGNATURE DISPO YES NO	ANSPORT	Driver's Name Print Name Print Name Phone No. Truck No. d delivered without DELIVERY Phone No. 4 If YES, was reading conductivity (mmhos/cm)	Name/No. 32-448-4239 > 50 micro roentgens? (circ	DRIVER'S SIGNATURE SEIVING AREA Sle one) YES NO							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/A SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 7977 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/I) Feet st Gauge Ind Ga	vere picked up at the Generator's signature DISPO YES NO Inches	ANSPORT	Driver's Name Print Name Print Name Phone No. Truck No. Id delivered without DELIVERY Phone No. 4 If YES, was reading Conductivity (mmhos/cm) DIMS BS&W	Name/No. 32-448-4239 > 50 micro roentgens? (circo	DRIVER'S SIGNATURE SEIVING AREA Sle one) YES NO							
Transporter's Name Address Phone No. hereby certify that the above named material(s) was/A SHIPMENT DATE TRUCK TIME STAMP OUT: Site Name/ Permit No. Address Red Bluff Facility/ STF-065 5053 US Highway 285, Orla, TX 79776 NORM READINGS TAKEN? (Circle One) Chloride Chemical Analysis (Mg/l) Feet st Gauge Ind Gauge Ind Gauge	vere picked up at the Generator's signature DISPO YES NO Inches	ANSPORT	Driver's Name Print Name Print Name Phone No. Truck No. d delivered without DELIVERY Phone No. 4 If YES, was reading conductivity (mmhos/cm)	Name/No. 32-448-4239 > 50 micro roentgens? (circo	DRIVER'S SIGNATURE SEIVING AREA Sle one) YES NO							



(PLEASE PRINT)

REQUIRED INFORMATION Name_

		6	Ph	one No
The state of the s	G	ENERATOR	NO.4 7	0057
Operator No.	<u></u>	Permit/RRC No.	de l	ICEU
Operators Name	201	Lease/Well Name & No.	I'll berly	NOCOCIO ALL
Address 2//// 5 7	Muil 1 Road	County	So de l'il	DROXE GIVATION
	1 1000	API No.	30-01	Costro
City, State, Zip	NM BERRO	Rig Name & No.		77577
Phone No. 575 327	3 9441	AFE/PO No.	TA 19 1	22-2
EXEMPT E&P W	aste/Service Identification and Ar		asta tuna in harrala av authini	2-23
Oll Based Muds	NON-INJECTABLE WATERS	mount (place volume next to wa	OTHER EXEMPT WASTES (type ar	
Oil Based Cuttings Water Based Muds	Washout Water (Non-Injectable)			in generation process dirtie waste)
Water Based Cuttings	Completion Fluid/Flow back (Non-In Produced Water (Non-Injectable)	njectable)		
Produced Formation Solids Tank Bottoms	Gathering Line Water/Waste (Non-I	njectable)		
E&P Contaminated Soil	INTERNAL USE ONLY Truck Washout (exempt waste)			
Gas Plant Waste	Track (trashout (exempt waste)			
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	PRODUCTION	GATHERING LINES
	NON-EXEMPT E&P W	aste/Service Identification and Amo	unt	
All non-exempt E&P v	waste must be analysed and be below	the threshold limits for toxicity (TCL	P), Ignitability, Corrosivity and Re	activity.
Non-Exempt Other		*please select fro	m Non-Exempt Waste List on be	ack
QUANTITY	B - BARRELS	The state of the s	Y-YARDS	E-EACH
I hereby certify that the above listed material(s), is (an packaged, and is in proper condition for transportation	e) not a hazardous waste as defined by	y 40 CFR Part 261 or any applicable	state law. That each waste has b	een properly described, classified and
RCRA EXEMPT: Oil field wastes ge		and production operations and are i	not mixed with non-exempt wast	e (R360 Accepts certifications on a per
load basis only)				
RCRA NON-EXEMPT: Oil field waste wh	nich is non-hazardous that does not ex r listed hazardous waste as defined by	ceed the minimum standards for wa	ste hazardous by characteristics	established in RCRA regulations, 40 CFR
hazardous is attac	ched. (Check the appropriate items as	provided)	nded. The following documentati	ion demonstrating the waste as non-
MSDS Information		C AND C	Other (Provide Description Below	v)
			1/	1
SAN (ACTOO PED COM	m HARLICITED	9/6/2019	Ment	160
(PRINT) AUTHORIZED AGENTS SIGNATURE	the the way to be	DATE		IGNATURE.
	/ TRA	ANSPORTER		
Transporter's	11 1000 -			> + 1
Name (a) / (b) (b)	10/10/5	Driver's Name	708 K	00010 87
Address	1	Print Name		1
<u> </u>	1	Phone No.		
Phone No.		Truck No.		
hereby certify that the above named material(s) was/	were picked up at the Generator's site	e listed above and delivered without	incident to the disposal facility li	sted below.
SHIPMENT DATE	DRIVER'S SIGNATURE	DELIVERY	VDATE.	U TOTAL CONTROL OF THE CONTROL OF TH
TRUCK TIME STAMP	The state of the s	The state of the s		DRIVER'S SIGNATURE
1 1 Property April 1	DISPC	SAL FACILITY		/ING AREA
			Name/No.	
Red Bluff Facility/ STF-065		Phone No.	132-448-4239	
Address 5053 US Highway 285, Orla, TX 7977	70			(1950) (1950)
NORM READINGS TAKEN? (Circle One)	YES NO	If YES, was reading	> 50 micro roentgens? (circle on	ne) YES NO
Chemical Analysis (Mg/l)		Conductivity		
,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	- AIN	(mmhos/cm)		pH
Feet	Inches	K DOT TOIVIS	u au w	
st Gauge	inches	BS&V	V/BBLS Received	BS&W (%)
and Gauge			Free Water	
Received			Total Received	
I hereby certify that the above load material has bee	en (circle one): ACCEPTED	DENIED If denied, why?		
Davidan and	015101	The Color	1 David	HARL
NAME (PRINT)	DATE	V 3-71 (1)111000	A ANTICAL



(PLEASE PRINT) *REQUIRED INFORMATION* Name _

		The second second		Marie Control	The state of the s	none No
		G	ENERATOR	1	NO.4	70004
Operator No.			Per	mit/RRC No.	1	70961
Operators Names 11	12 12 1			se/Well	-	
Operators Name	thon UI	370	Na	ne & No.	INC US CRATE	525284 MA 14245H
Address	S TAMMAR	onel	Cou	unty	7 DIG TO	was was the "house of
V-			API	No.	30-019-4	C 2211
City, State, Zip	(board of has	09220			70.01-3-7	To the
Phone No.	200 9111	1		Name & No.		
	3 34 3 34 4 7 1			PO No.		2298
E	XEMPT E&P Waste/Service Iden	ntification and A	mount (place volur	ne next to w	aste type in barrels or cubi	e vards)
Oli based Muds	NON-INJECTABLE	WATERS				and generation process of the waste)
Oil Based Cuttings	Washout Water (7	and serieration process of the waste)
Water Based Muds Water Based Cuttings		/Flow back (Non-Ir	njectable)	10000		
Produced Formation Solids	Produced Water	(Non-Injectable) /ater/Waste (Non-I	Injectable)			
Tank Bottoms	INTERNAL USE OF		injectable)			
E&P Contaminated Soil	Truck Washout (e	THE RESERVE THE PERSON NAMED IN COLUMN TWO IS NOT THE OWNER.				
Gas Plant Waste						
WASTE GENERATION PROCESS:	DRILLING	1 THE LOCAL PROPERTY.	COMPLETION	7	PRODUCTION	GATHERING LINES
			-			
Alla	NO	ON-EXEMPT E&P W	aste/Service Identific	ation and Amo	unt	
Non-Exempt Other	on-exempt E&P waste must be analy	ysed and be below	the threshold limits f	or toxicity (TCL	P), Ignitability, Corrosivity and	Reactivity.
Non-Exempt Other	New York Control of the Control of t		*p	lease select fro	m Non-Exempt Waste List on	back
QUANTITY		0. 0.0000				The state of the s
QUANTITY		B - BARRELS			Y - YARDS	E - EACH
I hereby certify that the above listed	material(s), is (are) not a hazardous	waste as defined b	y 40 CFR Part 261 or	any applicable	state law. That each waste has	s been properly described, classified and
packaged, and is in proper condition	for transportation according to appli	icable regulation.			state favi. That each waste has	s been properly described, classified and
			and production opera	ations and are	not mixed with non-exempt wa	aste (R360 Accepts certifications on a per
RCRA EXEMPT:	load basis only)				not mixed if the non-exempt we	aste (noto Accepts certifications of a per
RCRA NON-EXEMPT:	Oil field waste which is non-hazardor	us that does not ex	ceed the minimum st	andards for wa	aste hazardo is by characteristi	cs established in RCRA regulations, 40 CFR
	261.21-261.24, or listed hazardous w	vaste as defined by	40 CFR, part 261, sub	part D. as ame	ended. The following document	tation demonstrating the waste as non-
	hazardous is attached. (Check the ap	propriate items as	provided)	p=1,1=7,00 01110	macar the renowing accamen	definitions rating the waste as non-
	COLUMN CO.	RCRA Hazardous V			Other (Prov de Description Be	low)
					/)	iow)
	-				1/1	
SAM COSTO O PG.	2 Sugar Harrie	1	9/5/	2010	Ment	
(PRINT) AUTHORIZED AGENTS SIGN	JATURE	21 3-	DATE		Much	SIGNATURE
	A 750 -	TD	ANSPORTE			
Transported 1 (1)	1	LIM	ANSFURIE		, ,	20
Transporter's Name	MIENDOZO	1/	Driv	er's Name	7 /	· ·
Address		-	Dulas	Name		Y II
Addiess .		-/		Name		
_		/	Pho	ne No.		
Phone No.		/	Truc	k No.	06	
I hereby certify that the above name	material(s) was/were picked up at	the Generator's sit	e listed above and de	livered without	t incident to the disposal facilit	v listed below
	, , , , , , , , , , , , , , , , , , , ,				t modern to the disposal facility	y nated action.
SHIPMENT DATE	DRIVER'S SIGNATURE		-	DELIVER	V DATE	DRIVER'S SIGNATURE
		DICO	SCAL FACU			THE RESIDENCE OF THE PROPERTY
TRUCK TIM	car office	DISEC	DSAL FACIL	IIY	RECE	IVING AREA
IN: 11 DZA	OUT:				Name/No.	
Site Name/	1 110					
Permit No. Red Bluff Facility	v/ STF-065		Pho	ne No.	432-448-4239	
* 11					432-440-4233	(F)
	285, Orla, TX 79770			Single Market		
NORM READINGS TAI	KEN? (Circle One) YES	NO			g > 50 micro roentgens? (circle	one) YES NO
Chloride Chemical Analysis (Mg/l)				ductivity mhos/cm)		nH.
(INSTANCE)				The Control of the Co		
		IAN	K BOTTON	15		
Fee	et Inch	nes				
1st Gauge		a maybe to d	2	BS&	W/BBLS Received	BS&W (%)
2nd Gauge		-10-1			Free Water	
Received					Total Received	
I hereby certify that the above loa	d material has been (circle one):	ACCEPTED	DENIED If	denied, why?	- Value	0
1 KILL MOULT	it i		100		MORVAIL	+ 60
NAME (PRINT)	DAT	TE	TITLE		4 4 4 4 4 4	SIGNATURE



(PLEASE PRINT) *REQUIRED INFORMATION* Name

Company	Man Contact Informatio
---------	------------------------

	Self-man (1)	CENTER ASSE		Pho	ne No
Operator No.		GENERATO	Killer	NO.17	0000
Operator No.			rmit/RRC No.	Carling II	UJ05
Operators Name Add an Thom	7 /		ase/Well ime & No.	D. V. Drawn	S A-AN II LIA
Address 4/1/1 5 TAA	sell boars		unty	FILE TREETING	D 2524 4 NA CCR
			170	Eddle L	1
City, State, Zip Carlabyid	VM 88220		I No.	30-615-4	any Shiff
Phone No. 575 323	94/4/		Name & No.	- A 6 C)	0 = 24
EVEN ADTER OF THE			E/PO No.	TA.019,0	2258
Oil Based Muds	ste/Service Identification and	Amount (place volu	me next to w	aste type in barrels or cubic yar	ds)
Oil Based Cuttings	NON-INJECTABLE WATERS Washout Water (Non-Injectable)			OTHER EXEMPT WASTES (type and	generation process of the waste)
Water Based Muds	Completion Fluid/Flow back (Non	-Injectable)			10
Water Based Cuttings Produced Formation Solids	Produced Water (Non-Injectable)				
Tank Bottoms	Gathering Line Water/Waste (No. INTERNAL USE ONLY	n-Injectable)		4	
E&P Contaminated Soil	Truck Washout (exempt waste)		***		
Gas Plant Waste					
WASTE GENERATION PROCESS:	DRILLING	COMPLETION	7	PRODUCTION	GATHERING LINES
	NON-EXEMPT E&P	Waste/Service Identific	ation and Amor		
All non-exempt E&P wa	aste must be analysed and be belo	w the threshold limits f	or toxicity (TCL)	unt P), Ignitability, Corrosivity and React	Swifty
Non-Exempt Other		*p	lease select fro	m Non-Exempt Waste List on back	State A
QUANTITY				The state waste list on back	A STATE OF THE STA
	B - BARRELS			Y - YARDS	E - EACH
I hereby certify that the above listed material(s), is (are) packaged, and is in proper condition for transportation	not a hazardous waste as defined	by 40 CFR Part 261 or a	any applicable s	tate law. That each waste has been	properly described elegatical and
4 7 77	B Ferredore regulation.				A
RCRA EXEMPT: Oil field wastes gen	nerated from oil and gas exploratio	n and production opera	ations and are r	ot mixed with non-exempt waste (F	R360 Accepts certifications on a per
-0.00					
261.21-261.24. or li	in is non-nazardous that does not existed hazardous waste as defined h	exceed the minimum st	andards for was	ste hazardous by characteristics est	ablished in RCRA regulations, 40 CFR
	ed. (Check the appropriate items a		part D, as amer	nded. The following documentation	demonstrating the waste as non-
MSDS Information	RCRA Hazardous			Other (Burnish B	
		Traste / marysis		Other (Provide Description Below)	
0 - 10-	1		1	- W (/ / /	<u> </u>
(PRINT) AUTHORIZED AGENTS SIGNATURE	1992 ADAGA	TR 9/10	13019	Anold 1	
, and the second		DATE		SIGN	ATURE
	TR	ANSPORTE	3		
Transporter's KIKNR 11C	IPAC	Date		7	
Address 2/5 F Enviol	41-1100	- Drive	er's Name	19.11 4 //01	(6)
10.1.1.11.11.22 11	1 2/	Print	Name _		
Phone No. 572 / 25 //	4 38 60	Phon	e No.		
2 12 103 10	70	Truck		2	
hereby certify that the above named material(s) was/we	ere picked up at the Generator's si	te listed above and deli	vered without i	ncident to the disposal facility lister	below
200	The state of the s			See the Description Process and III (
	RIVER'S SIGNATURE		DELIVERY (DATE	DRIVER'S SIGNATURE
TRUCK TIME STAMP	DISPO	DSAL FACILI	TY	RECEIVIN	IG AREA
N: The OUT:				Name/No.	, o / INE/
ite Name/			L	ivaine/ivo.	
ermit No. Red Bluff Facility/ STF-065		Phone	No. 43	32-448-4239	
ddress 5053 US Highway 285, Orla, TX 79770			-	110 1200	
NORM READINGS TAKEN? (Circle One)	YES NO	If VE	S was roading a	F0	
Chloride	110	Condu	ictivity	> 50 micro roentgens? (circle one)	YES NO
hemical Analysis (Mg/I)		(mm	hos/cm)		рН
	TAN	K BOTTOM	S		
Feet	Inches				
nd Gauge			BS&W/	/BBLS Received	BS&W (%)
eceived				Free Water	The state of the s
MACOUNTED TO THE PARTY OF THE P				Total Received	
I hereby certify that the above load material has been (circle one): ACCEPTED	DENIED If de	aniad why?		
VIVIVIO DALLAMA	1510	JENIED IT OF	enied, why?		
NAME (PRINT)	1211	((11/4/11/1	6
IAMINE (LIVINI)	DATE	TITLE		SIGNATI	

ATTACHMENT 6

Table 3. Soil Characterization - Salinity and Petroleum Hydrocarbon Parameters

Client Name: Marathon Oil Permian LLC

Site Name: Rick Declard 25 28 4
Project #: 19E-00614-011
Lab Report(s): 1908B23, 1908F01

							Table 3	. Soil Ana	lysis								
	Sample Descrip	otion	Fi	ield Screeni	ng	Petroleum Hydrocarbons											
				ag					Volatile				Inorganic				
Sample ID	Depth (ft)	Sample Date	(9) Volatile Organic Compounds (PID)	Extractable Organic Compounds (PetroFlag	Quantab Result (High/Low)	Benzene (mg/kg)	(mg/kg)	(8 Ethylbenzene	(wm/kg) Xylenes (o&m)	(d) sana) x/lenes (b) (mg/kg)	(Total) (Yylenes (Total)	(sk) (sk) (sk) (sk) (sk) (sk) (sk) (sk)	ন (GRO) পুৰ জি জি	교 제 Diesel Range Organics (DRO)	3 Motor Oil Range Organics (MRO) (da (MRO)	3 Total Petroleum Hydrocarbons (TPH)	(Eg/kg)
BG19-01	0	2018-08-19	0.4	12	32	ND	ND	ND			ND	ND	ND	ND	ND	ND	ND
BG19-01	1	2019-08-19	1.1	23	32	ND	ND	ND	} }	├ ├	ND	ND	ND	ND	ND	ND	ND
BG19-01	2	2019-08-19	1.2	27	0	ND	ND	ND	 	<u> </u>	ND	ND	ND	ND	ND	ND	ND
Base 19-01	0.5	2019-08-19	0.5	3	241	ND	ND	ND			ND	ND	ND	ND	ND	ND	120.0
Base 19-02	0.5	2019-08-19	0.9	22	436	ND	ND	ND			ND	ND	ND	ND	ND	ND	980.0
Base 19-02	1	2019-08-24	0.0	0	32	ND	ND	ND	i	† ! !	ND	ND	ND	ND	ND	ND	ND
Base 19-03	0.5	2019-08-19	0.8	21	337	ND	ND	ND			ND	ND	ND	ND	ND	ND	700.0
Base 19-03	1	2019-08-24				ND	ND	ND	! !	<u> </u>	ND	ND	ND	ND	ND	ND	ND
Base 19-04	0.5	2019-08-19	1.5	59	241	ND	ND	ND			ND	ND	ND	ND	ND	ND	150.0
Base 19-05	0.5	2019-08-19	0.7	47	316	ND	ND	ND	İ	İ	ND	ND	ND	ND	ND	ND	330.0
Base 19-06	0.5	2019-08-19	0.3	42	600	ND	ND	ND	i i	i i	ND	ND	ND	ND	ND	ND	220.0
Base 19-07	0.5	2019-08-19	5.5	72	600	ND	ND	ND			ND	ND	ND	ND	ND	ND	340.0
Base 19-08	0.5	2019-08-19	0.8	85	600	ND	ND	ND	<u>.</u> !	!	ND	ND	ND	ND	ND	ND	330.0
Base 19-09	0.5	2019-08-19	0.0	36	600	ND	ND	ND	i !	i !	ND	ND	ND	ND	ND	ND	100.0
Base 19-10	0.5	2019-08-19	1.3	40	600	ND	ND	ND			ND	ND	ND	ND	ND	ND	240.0
Base 19-11	1	2019-08-19	0.9	33	600	ND	ND	ND			ND	ND	ND	ND	ND	ND	570.0
Base 19-12	1	2019-08-19	2.1	58	600	ND	ND	ND	ŀ	ŀ	ND	ND	ND	ND	ND	ND	760.0
Base 19-12	1.5	2019-08-24	0.0	0	172	ND	ND	ND			ND	ND	ND	ND	ND	ND	ND
Base 19-13	1	2019-08-19	1.5	42	600	ND	ND	ND		ł T	ND	ND	ND	ND	ND	ND	450.0
Base 19-14	1	2019-08-19	1.1	65	600	ND	ND	ND	i !	i !	ND	ND	ND	ND	ND	ND	830.0
Base 19-14	1.5	2019-08-24	0.0	0	219	ND	ND	ND	! !	! !	ND	ND	ND	ND	ND	ND	270.0
Base 19-15	1	2019-08-19	0.9	63	600	ND	ND	ND	! !		ND	ND	ND	ND	ND	ND	630.0
Base 19-15	1.5	2019-08-24	0.0	0	393	ND	ND	ND			ND	ND	ND	ND	ND	ND	ND
Base 19-16	1	2019-08-19	0.4	60	600	ND	ND	ND	i !	i I	ND	ND	ND	ND	ND	ND	700.0
Base 19-16	1.5	2019-08-24	0.0	0	0	ND	ND	ND	! !	! !	ND	ND	ND	ND	ND	ND	ND
Base 19-17	1	2019-08-19	1.5	50	600	ND	ND	ND			ND	ND	ND	ND	ND	ND	820.0



Table 3. Soil Analysis																	
	Sample Descri	otion	Fi	ield Screeni	ng	Petroleum Hydrocarbons											
lag,						Volatile								Extractable			
Sample ID	Depth (ft)	Sample Date	(PID)	Extractable Organic Compounds (PetroFlag	Quantab Result (High/Low)	Benzene	Toluene	Ethylbenzene (8)/80	(kg /k/s) (kgm)	(d) xylenes (b)	(mg/s/kylenes (Total)	(%) BTEX (Total)	ন জুন জুন জুন জুন	Diesel Range Organics (DRO)	Motor Oil Range Organics (MRO)	Total Petroleum Hydrocarbons (TPH)	(mg/kg)
- 40.47		2040.00.24	0.0	(ppiii)	(*/-) 88	(mg/kg) ND	(mg/kg) ND	ND	(1118/118)	(IIIg/Ng/	ND	(IIIg/Ng) ND	ND	ND	ND	(mg/kg) ND	110.0
Base 19-17 Base 19-18	2	2019-08-24						i	<u> </u>	<u> </u>	<u> </u>				i	i	4,200.0
Base 19-18	0.5	2019-08-19 2019-08-24	0.4 0.0	50 0	600 219	ND ND	ND ND	ND ND	<u>.</u> !	<u>.</u>	ND ND	ND ND	ND ND	ND ND	ND ND	ND ND	4,200.0 280.0
Base 19-18	3	2019-08-24							!		ND ND	ND	ND	ND ND		ND ND	
Base 19-19	3.5	2019-08-19	0.5 0.0	88 0	600 295	ND ND	ND ND	ND ND	 	 	ND ND	ND ND	ND ND	ND ND	ND ND	ND ND	1,800.0 320.0
Base 19-19	0.5	2019-08-24	0.3	58	600	ND	ND	ND ND	<u> </u>	!	ND	ND	ND	32	ND	32	3,100.0
Base 19-20	1	2019-08-19	0.0	0	317	ND ND	ND ND	ND ND	 	 	ND ND	ND	ND	ND	ND ND	ND	160.0
Base 19-21	0.5	2019-08-24	0.4	38	600	ND	ND	ND			ND	ND	ND	ND	ND	ND	870.0
Base 19-21	1	2019-08-19	0.0	0	38	ND	ND	ND	 	<u> </u> 	ND	ND	ND	ND	ND	ND	ND
Base 19-22	0.5	2019-08-19	0.3	66	600	ND	ND	ND	<u> </u> 	<u> </u> 	ND	ND	ND	ND	ND	ND	150.0

Bold and Shaded indicates exceedance outside of applied action level. Additional remediation was completed.



ATTACHMENT 7

Sharlene Harvester

From: Dennis Williams

Sent: September 23, 2019 12:19 PM

To: Sharlene Harvester Cc: Kathlene Meadows

Subject: FW: Marathon Oil Company - Rick Deckard State 25-28-4 WA #2H - RP Not Yet

Assigned - Final Confirmatory Sampling

From: Dhugal Hanton < DHanton@vertex.ca>

Sent: August 17, 2019 9:59 AM

To: icastro@marathonoil.com; mike.bratcher@state.nm.us; robert.hamlet@state.nm.us; victoria.venegas@state.nm.us

Cc: Johnson, Misti M. (MRO) <mjohnson4@marathonoil.com>; Dennis Williams <DWilliams@vertex.ca>

Subject: Marathon Oil Company - Rick Deckard State 25-28-4 WA #2H - RP Not Yet Assigned - Final Confirmatory

Sampling

Good Morning All,

Please accept this notification that Vertex Resource Services will be completing final confirmatory sampling on the above mentioned location on Monday, August 19th at approximately 10:30am. Jason Crabtree will be on site for Vertex to complete the work. If you have any questions or concerns, please do not hesitate to contact me.

Cheers, Dhuga

Dhugal Hanton B.Sc., P.Ag., SR/WA, P.Biol.

Vice President, US Operations

Vertex Resource Services Inc. 7223 Empire Central Drive, Houston, TX 77040

O 832-535-1585 Ext. 700 C 832-588-0674

From: Castro, Isaac (MRO) [mailto:icastro@marathonoil.com]

Sent: August 1, 2019 6:06 PM

To: mike.bratcher@state.nm.us; robert.hamlet@state.nm.us; victoria.venegas@state.nm.us

Cc: Johnson, Misti M. (MRO) <<u>mjohnson4@marathonoil.com</u>>; Dhugal Hanton <<u>DHanton@vertex.ca</u>>; Dennis Williams

<<u>DWilliams@vertex.ca</u>>

Subject: Marathon Oil Company - 24 hour notification - Rick Deckard State 25-28-4 WA #2H

Good afternoon,

Yesterday at 4:30 pm, the Operator reported a small leak from an AST tank. Approximately 18.31 bbls of produced water was released the ground. A vac truck was immediately dispatched and recovered 15 bbls of fluids.

A C141 will be submitted shortly.

Thank you,

Isaac Castro Advanced Environmental Technician Marathon Oil Company - Permian Asset 4111 S. Tidwell Road Carlsbad, NM 88220

Cell: (575) 988-0561 Email: icastro@marathonoil.com



ATTACHMENT 8

Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: BG19-01 0'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:00:00 AM

 Lab ID:
 1908B23-001
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORG	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.4	mg/Kg	1	8/21/2019 9:37:40 AM
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/21/2019 9:37:40 AM
Surr: DNOP	90.3	70-130	%Rec	1	8/21/2019 9:37:40 AM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 11:58:00 AM
Surr: BFB	90.1	77.4-118	%Rec	1	8/21/2019 11:58:00 AM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 11:58:00 AM
Toluene	ND	0.048	mg/Kg	1	8/21/2019 11:58:00 AM
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 11:58:00 AM
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 11:58:00 AM
Surr: 4-Bromofluorobenzene	91.6	80-120	%Rec	1	8/21/2019 11:58:00 AM
EPA METHOD 300.0: ANIONS					Analyst: CJS
Chloride	ND	59	mg/Kg	20	8/21/2019 10:37:03 PM

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: BG19-01 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:05:00 AM

 Lab ID:
 1908B23-002
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	ual Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE OR	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.4	mg/Kg	1	8/21/2019 10:49:45 AM
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/21/2019 10:49:45 AM
Surr: DNOP	91.2	70-130	%Rec	1	8/21/2019 10:49:45 AM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 1:31:49 PM
Surr: BFB	90.2	77.4-118	%Rec	1	8/21/2019 1:31:49 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 1:31:49 PM
Toluene	ND	0.048	mg/Kg	1	8/21/2019 1:31:49 PM
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 1:31:49 PM
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 1:31:49 PM
Surr: 4-Bromofluorobenzene	91.1	80-120	%Rec	1	8/21/2019 1:31:49 PM
EPA METHOD 300.0: ANIONS					Analyst: CJS
Chloride	ND	60	mg/Kg	20	8/21/2019 10:49:28 PM

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: BG19-01 2'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:10:00 AM

 Lab ID:
 1908B23-003
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE OR	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.1	mg/Kg	1	8/21/2019 11:13:54 AM
Motor Oil Range Organics (MRO)	ND	45	mg/Kg	1	8/21/2019 11:13:54 AM
Surr: DNOP	92.1	70-130	%Rec	1	8/21/2019 11:13:54 AM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.9	mg/Kg	1	8/21/2019 2:42:24 PM
Surr: BFB	91.3	77.4-118	%Rec	1	8/21/2019 2:42:24 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 2:42:24 PM
Toluene	ND	0.049	mg/Kg	1	8/21/2019 2:42:24 PM
Ethylbenzene	ND	0.049	mg/Kg	1	8/21/2019 2:42:24 PM
Xylenes, Total	ND	0.098	mg/Kg	1	8/21/2019 2:42:24 PM
Surr: 4-Bromofluorobenzene	92.2	80-120	%Rec	1	8/21/2019 2:42:24 PM
EPA METHOD 300.0: ANIONS					Analyst: CJS
Chloride	ND	60	mg/Kg	20	8/21/2019 11:51:31 PM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-01 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:15:00 AM

 Lab ID:
 1908B23-004
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORG	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.2	mg/Kg	1	8/21/2019 11:38:00 AM
Motor Oil Range Organics (MRO)	ND	46	mg/Kg	1	8/21/2019 11:38:00 AM
Surr: DNOP	93.9	70-130	%Rec	1	8/21/2019 11:38:00 AM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	5.0	mg/Kg	1	8/21/2019 3:05:59 PM
Surr: BFB	95.9	77.4-118	%Rec	1	8/21/2019 3:05:59 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.025	mg/Kg	1	8/21/2019 3:05:59 PM
Toluene	ND	0.050	mg/Kg	1	8/21/2019 3:05:59 PM
Ethylbenzene	ND	0.050	mg/Kg	1	8/21/2019 3:05:59 PM
Xylenes, Total	ND	0.10	mg/Kg	1	8/21/2019 3:05:59 PM
Surr: 4-Bromofluorobenzene	97.2	80-120	%Rec	1	8/21/2019 3:05:59 PM
EPA METHOD 300.0: ANIONS					Analyst: CJS
Chloride	120	60	mg/Kg	20	8/22/2019 12:03:56 AM

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base 19-02 0.5

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:20:00 AM

 Lab ID:
 1908B23-005
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) 8/21/2019 12:02:09 PM ND 9.7 mg/Kg 1 Motor Oil Range Organics (MRO) ND 49 mg/Kg 1 8/21/2019 12:02:09 PM Surr: DNOP 93.8 70-130 %Rec 1 8/21/2019 12:02:09 PM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 3:29:32 PM 5.0 mg/Kg 1 Surr: BFB 91.3 77.4-118 %Rec 1 8/21/2019 3:29:32 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 8/21/2019 3:29:32 PM 0.025 mg/Kg 1 Toluene 0.050 ND mg/Kg 1 8/21/2019 3:29:32 PM Ethylbenzene ND 0.050 mg/Kg 1 8/21/2019 3:29:32 PM Xylenes, Total ND 0.10 mg/Kg 1 8/21/2019 3:29:32 PM %Rec 8/21/2019 3:29:32 PM Surr: 4-Bromofluorobenzene 91.8 80-120 1 Analyst: CJS **EPA METHOD 300.0: ANIONS** Chloride 980 60 8/22/2019 12:16:20 AM ma/Ka 20

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
 S Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-03 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:25:00 AM

 Lab ID:
 1908B23-006
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE O	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.2	mg/Kg	1	8/21/2019 12:26:10 PM
Motor Oil Range Organics (MRO)	ND	46	mg/Kg	1	8/21/2019 12:26:10 PM
Surr: DNOP	95.0	70-130	%Rec	1	8/21/2019 12:26:10 PM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	5.0	mg/Kg	1	8/21/2019 5:03:29 PM
Surr: BFB	93.6	77.4-118	%Rec	1	8/21/2019 5:03:29 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.025	mg/Kg	1	8/21/2019 5:03:29 PM
Toluene	ND	0.050	mg/Kg	1	8/21/2019 5:03:29 PM
Ethylbenzene	ND	0.050	mg/Kg	1	8/21/2019 5:03:29 PM
Xylenes, Total	ND	0.10	mg/Kg	1	8/21/2019 5:03:29 PM
Surr: 4-Bromofluorobenzene	94.5	80-120	%Rec	1	8/21/2019 5:03:29 PM
EPA METHOD 300.0: ANIONS					Analyst: CJS
Chloride	700	60	mg/Kg	20	8/22/2019 12:28:44 AM

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
 S Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base 19-04 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:30:00 AM

 Lab ID:
 1908B23-007
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.0 mg/Kg 1 8/21/2019 12:50:06 PM Motor Oil Range Organics (MRO) ND 45 mg/Kg 1 8/21/2019 12:50:06 PM Surr: DNOP 96.0 70-130 %Rec 1 8/21/2019 12:50:06 PM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 5:26:56 PM 4.8 mg/Kg 1 Surr: BFB 97.8 77.4-118 %Rec 1 8/21/2019 5:26:56 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 0.024 mg/Kg 8/21/2019 5:26:56 PM 1 Toluene ND 0.048 mg/Kg 1 8/21/2019 5:26:56 PM Ethylbenzene ND 0.048 mg/Kg 1 8/21/2019 5:26:56 PM Xylenes, Total ND 0.097 mg/Kg 1 8/21/2019 5:26:56 PM %Rec 8/21/2019 5:26:56 PM Surr: 4-Bromofluorobenzene 98.9 80-120 1 Analyst: CJS **EPA METHOD 300.0: ANIONS** Chloride 150 60 8/22/2019 12:41:09 AM ma/Ka 20

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd. **Client Sample ID:** Base 19-05 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:35:00 AM

 Lab ID:
 1908B23-008
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.4 mg/Kg 1 8/21/2019 1:14:05 PM Motor Oil Range Organics (MRO) 8/21/2019 1:14:05 PM ND 47 mg/Kg 1 Surr: DNOP 94.2 70-130 %Rec 1 8/21/2019 1:14:05 PM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 5:50:23 PM 4.8 mg/Kg 1 Surr: BFB 90.8 77.4-118 %Rec 1 8/21/2019 5:50:23 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 8/21/2019 5:50:23 PM 0.024 mg/Kg 1 Toluene 0.048 ND mg/Kg 1 8/21/2019 5:50:23 PM Ethylbenzene ND 0.048 mg/Kg 1 8/21/2019 5:50:23 PM Xylenes, Total ND 0.095 mg/Kg 1 8/21/2019 5:50:23 PM %Rec 8/21/2019 5:50:23 PM Surr: 4-Bromofluorobenzene 91.9 80-120 1 Analyst: CJS **EPA METHOD 300.0: ANIONS** Chloride 330 60 8/22/2019 12:53:33 AM ma/Ka 20

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd. **Client Sample ID:** Base 19-06 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:40:00 AM

 Lab ID:
 1908B23-009
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) 8/21/2019 1:38:05 PM ND 9.8 mg/Kg 1 Motor Oil Range Organics (MRO) ND 49 mg/Kg 1 8/21/2019 1:38:05 PM Surr: DNOP 94.8 70-130 %Rec 1 8/21/2019 1:38:05 PM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 6:13:56 PM 4.8 mg/Kg 1 Surr: BFB 88.8 77.4-118 %Rec 1 8/21/2019 6:13:56 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 8/21/2019 6:13:56 PM 0.024 mg/Kg 1 Toluene 0.048 ND mg/Kg 1 8/21/2019 6:13:56 PM

ND

ND

89.4

220

0.048

0.096

80-120

60

mg/Kg

mg/Kg

%Rec

ma/Ka

1

1

1

20

8/21/2019 6:13:56 PM

8/21/2019 6:13:56 PM

8/21/2019 6:13:56 PM

8/22/2019 1:05:57 AM

Analyst: CJS

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

Qualifiers:

Ethylbenzene

Xylenes, Total

Chloride

Surr: 4-Bromofluorobenzene

EPA METHOD 300.0: ANIONS

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

8/22/2019 1:18:21 AM

Hall Environmental Analysis Laboratory, Inc.

Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-07 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:45:00 AM

 Lab ID:
 1908B23-010
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.7 mg/Kg 1 8/21/2019 2:02:07 PM Motor Oil Range Organics (MRO) 8/21/2019 2:02:07 PM ND 48 mg/Kg 1 Surr: DNOP 97.8 70-130 %Rec 1 8/21/2019 2:02:07 PM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 6:37:31 PM 4.8 mg/Kg 1 Surr: BFB 89.9 77.4-118 %Rec 1 8/21/2019 6:37:31 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB 8/21/2019 6:37:31 PM Benzene ND 0.024 mg/Kg 1 Toluene 0.048 ND mg/Kg 1 8/21/2019 6:37:31 PM Ethylbenzene ND 0.048 mg/Kg 1 8/21/2019 6:37:31 PM Xylenes, Total ND 0.096 mg/Kg 1 8/21/2019 6:37:31 PM %Rec 8/21/2019 6:37:31 PM Surr: 4-Bromofluorobenzene 90.9 80-120 1 Analyst: CJS **EPA METHOD 300.0: ANIONS**

340

59

ma/Ka

20

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

Qualifiers:

Chloride

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- QL Practical Quanitative Limit
 S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-08 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:50:00 AM

 Lab ID:
 1908B23-011
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE C	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.8	mg/Kg	1	8/21/2019 2:26:12 PM
Motor Oil Range Organics (MRO)	ND	49	mg/Kg	1	8/21/2019 2:26:12 PM
Surr: DNOP	96.3	70-130	%Rec	1	8/21/2019 2:26:12 PM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.7	mg/Kg	1	8/21/2019 7:01:03 PM
Surr: BFB	90.0	77.4-118	%Rec	1	8/21/2019 7:01:03 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 7:01:03 PM
Toluene	ND	0.047	mg/Kg	1	8/21/2019 7:01:03 PM
Ethylbenzene	ND	0.047	mg/Kg	1	8/21/2019 7:01:03 PM
Xylenes, Total	ND	0.095	mg/Kg	1	8/21/2019 7:01:03 PM
Surr: 4-Bromofluorobenzene	90.5	80-120	%Rec	1	8/21/2019 7:01:03 PM
EPA METHOD 300.0: ANIONS					Analyst: CJS
Chloride	330	60	mg/Kg	20	8/22/2019 1:55:34 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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8/22/2019 2:07:59 AM

Hall Environmental Analysis Laboratory, Inc.

Date Reported:

CLIENT: Vertex Resource Group Ltd. **Client Sample ID:** Base 19-09 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:55:00 AM

 Lab ID:
 1908B23-012
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) 8/21/2019 2:50:12 PM ND 10 mg/Kg 1 Motor Oil Range Organics (MRO) 8/21/2019 2:50:12 PM ND 50 mg/Kg 1 Surr: DNOP 96.3 70-130 %Rec 1 8/21/2019 2:50:12 PM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 7:24:33 PM 4.9 mg/Kg 1 Surr: BFB 95.1 77.4-118 %Rec 1 8/21/2019 7:24:33 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 8/21/2019 7:24:33 PM 0.024 mg/Kg 1 Toluene 0.049 ND mg/Kg 1 8/21/2019 7:24:33 PM Ethylbenzene ND 0.049 mg/Kg 1 8/21/2019 7:24:33 PM Xylenes, Total ND 0.098 mg/Kg 1 8/21/2019 7:24:33 PM %Rec 8/21/2019 7:24:33 PM Surr: 4-Bromofluorobenzene 96.1 80-120 1 Analyst: CJS **EPA METHOD 300.0: ANIONS**

100

60

ma/Ka

20

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

Qualifiers:

Chloride

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-10 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:00:00 AM

 Lab ID:
 1908B23-013
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE O	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.9	mg/Kg	1	8/21/2019 3:14:10 PM
Motor Oil Range Organics (MRO)	ND	49	mg/Kg	1	8/21/2019 3:14:10 PM
Surr: DNOP	97.3	70-130	%Rec	1	8/21/2019 3:14:10 PM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 7:48:02 PM
Surr: BFB	90.1	77.4-118	%Rec	1	8/21/2019 7:48:02 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 7:48:02 PM
Toluene	ND	0.048	mg/Kg	1	8/21/2019 7:48:02 PM
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 7:48:02 PM
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 7:48:02 PM
Surr: 4-Bromofluorobenzene	90.3	80-120	%Rec	1	8/21/2019 7:48:02 PM
EPA METHOD 300.0: ANIONS					Analyst: CJS
Chloride	240	60	mg/Kg	20	8/22/2019 2:45:13 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-11 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:05:00 AM

 Lab ID:
 1908B23-014
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE C	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.4	mg/Kg	1	8/21/2019 3:38:12 PM
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/21/2019 3:38:12 PM
Surr: DNOP	97.8	70-130	%Rec	1	8/21/2019 3:38:12 PM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 8:11:26 PM
Surr: BFB	87.7	77.4-118	%Rec	1	8/21/2019 8:11:26 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 8:11:26 PM
Toluene	ND	0.048	mg/Kg	1	8/21/2019 8:11:26 PM
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 8:11:26 PM
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 8:11:26 PM
Surr: 4-Bromofluorobenzene	88.4	80-120	%Rec	1	8/21/2019 8:11:26 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	570	60	mg/Kg	20	8/22/2019 9:44:56 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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8/22/2019 9:57:17 AM

Hall Environmental Analysis Laboratory, Inc.

Date Reported:

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base 19-12 1.0'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:10:00 AM

 Lab ID:
 1908B23-015
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.5 mg/Kg 1 8/21/2019 4:02:20 PM Motor Oil Range Organics (MRO) 8/21/2019 4:02:20 PM ND 48 mg/Kg 1 Surr: DNOP 99.0 70-130 %Rec 1 8/21/2019 4:02:20 PM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 8:34:51 PM 5.0 mg/Kg 1 Surr: BFB 88.3 77.4-118 %Rec 1 8/21/2019 8:34:51 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 0.025 mg/Kg 8/21/2019 8:34:51 PM 1 Toluene 0.050 ND mg/Kg 1 8/21/2019 8:34:51 PM Ethylbenzene ND 0.050 mg/Kg 1 8/21/2019 8:34:51 PM Xylenes, Total ND 0.10 mg/Kg 1 8/21/2019 8:34:51 PM 8/21/2019 8:34:51 PM %Rec Surr: 4-Bromofluorobenzene 89.0 80-120 1 **EPA METHOD 300.0: ANIONS** Analyst: CAS

760

60

ma/Ka

20

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

Qualifiers:

Chloride

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-13 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:15:00 AM

 Lab ID:
 1908B23-016
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORG	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.2	mg/Kg	1	8/21/2019 4:26:25 PM
Motor Oil Range Organics (MRO)	ND	46	mg/Kg	1	8/21/2019 4:26:25 PM
Surr: DNOP	99.7	70-130	%Rec	1	8/21/2019 4:26:25 PM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.9	mg/Kg	1	8/21/2019 10:08:18 PM
Surr: BFB	89.4	77.4-118	%Rec	1	8/21/2019 10:08:18 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.025	mg/Kg	1	8/21/2019 10:08:18 PM
Toluene	ND	0.049	mg/Kg	1	8/21/2019 10:08:18 PM
Ethylbenzene	ND	0.049	mg/Kg	1	8/21/2019 10:08:18 PM
Xylenes, Total	ND	0.098	mg/Kg	1	8/21/2019 10:08:18 PM
Surr: 4-Bromofluorobenzene	91.1	80-120	%Rec	1	8/21/2019 10:08:18 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	450	60	mg/Kg	20	8/22/2019 10:34:20 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-14 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:20:00 AM

 Lab ID:
 1908B23-017
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE OF	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.6	mg/Kg	1	8/21/2019 4:50:33 PM
Motor Oil Range Organics (MRO)	ND	48	mg/Kg	1	8/21/2019 4:50:33 PM
Surr: DNOP	94.7	70-130	%Rec	1	8/21/2019 4:50:33 PM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 10:32:10 PM
Surr: BFB	98.1	77.4-118	%Rec	1	8/21/2019 10:32:10 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 10:32:10 PM
Toluene	ND	0.048	mg/Kg	1	8/21/2019 10:32:10 PM
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 10:32:10 PM
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 10:32:10 PM
Surr: 4-Bromofluorobenzene	99.5	80-120	%Rec	1	8/21/2019 10:32:10 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	830	60	mg/Kg	20	8/22/2019 11:11:21 AM

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-15 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:25:00 AM

 Lab ID:
 1908B23-018
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE OR	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.9	mg/Kg	1	8/21/2019 5:14:36 PM
Motor Oil Range Organics (MRO)	ND	50	mg/Kg	1	8/21/2019 5:14:36 PM
Surr: DNOP	97.3	70-130	%Rec	1	8/21/2019 5:14:36 PM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.6	mg/Kg	1	8/21/2019 10:55:45 PM
Surr: BFB	99.9	77.4-118	%Rec	1	8/21/2019 10:55:45 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.023	mg/Kg	1	8/21/2019 10:55:45 PM
Toluene	ND	0.046	mg/Kg	1	8/21/2019 10:55:45 PM
Ethylbenzene	ND	0.046	mg/Kg	1	8/21/2019 10:55:45 PM
Xylenes, Total	ND	0.092	mg/Kg	1	8/21/2019 10:55:45 PM
Surr: 4-Bromofluorobenzene	101	80-120	%Rec	1	8/21/2019 10:55:45 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	630	60	mg/Kg	20	8/22/2019 11:23:42 AM

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-16 0.5'

Project: Rick Declard 25 28 4 **Collection Date:** 8/19/2019 11:30:00 AM

Lab ID: 1908B23-019 Matrix: SOIL Received Date: 8/20/2019 8:55:00 AM Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) 8/21/2019 5:38:51 PM ND 9.6 mg/Kg 1 Motor Oil Range Organics (MRO) 8/21/2019 5:38:51 PM ND 48 mg/Kg 1 Surr: DNOP 92.4 70-130 %Rec 1 8/21/2019 5:38:51 PM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 11:19:14 PM 4.7 mg/Kg 1 Surr: BFB 94.1 77.4-118 %Rec 1 8/21/2019 11:19:14 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 0.024 mg/Kg 8/21/2019 11:19:14 PM 1 Toluene ND 0.047 mg/Kg 1 8/21/2019 11:19:14 PM Ethylbenzene ND 0.047 mg/Kg 1 8/21/2019 11:19:14 PM Xylenes, Total ND 0.094 mg/Kg 1 8/21/2019 11:19:14 PM %Rec Surr: 4-Bromofluorobenzene 94.5 80-120 1 8/21/2019 11:19:14 PM Analyst: CAS **EPA METHOD 300.0: ANIONS** Chloride 700 60 8/22/2019 11:36:03 AM ma/Ka 20

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-17 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:35:00 AM

 Lab ID:
 1908B23-020
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE OF	Analyst: TOM				
Diesel Range Organics (DRO)	ND	9.5	mg/Kg	1	8/21/2019 6:03:02 PM
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/21/2019 6:03:02 PM
Surr: DNOP	94.7	70-130	%Rec	1	8/21/2019 6:03:02 PM
EPA METHOD 8015D: GASOLINE RANGE					Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.7	mg/Kg	1	8/21/2019 11:42:44 PM
Surr: BFB	92.5	77.4-118	%Rec	1	8/21/2019 11:42:44 PM
EPA METHOD 8021B: VOLATILES					Analyst: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 11:42:44 PM
Toluene	ND	0.047	mg/Kg	1	8/21/2019 11:42:44 PM
Ethylbenzene	ND	0.047	mg/Kg	1	8/21/2019 11:42:44 PM
Xylenes, Total	ND	0.095	mg/Kg	1	8/21/2019 11:42:44 PM
Surr: 4-Bromofluorobenzene	92.8	80-120	%Rec	1	8/21/2019 11:42:44 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	820	60	mg/Kg	20	8/22/2019 11:48:24 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported:

CLIENT: Vertex Resource Group Ltd. **Client Sample ID:** Base 19-18 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:40:00 AM

 Lab ID:
 1908B23-021
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.7 mg/Kg 1 8/22/2019 9:15:04 AM Motor Oil Range Organics (MRO) 8/22/2019 9:15:04 AM ND 48 mg/Kg 1 Surr: DNOP 77.7 70-130 %Rec 1 8/22/2019 9:15:04 AM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 10:14:46 AM 4.7 mg/Kg 1 Surr: BFB 99.0 77.4-118 %Rec 1 8/21/2019 10:14:46 AM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 0.024 mg/Kg 8/21/2019 10:14:46 AM 1 Toluene ND 0.047 mg/Kg 1 8/21/2019 10:14:46 AM Ethylbenzene ND 0.047 mg/Kg 1 8/21/2019 10:14:46 AM Xylenes, Total ND 0.095 mg/Kg 1 8/21/2019 10:14:46 AM %Rec Surr: 4-Bromofluorobenzene 89.7 80-120 1 8/21/2019 10:14:46 AM Analyst: CAS **EPA METHOD 300.0: ANIONS** Chloride 3500 60 20 8/22/2019 12:00:45 PM Ε mg/Kg

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-19 3'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:45:00 AM

 Lab ID:
 1908B23-022
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 8.7 mg/Kg 1 8/22/2019 9:39:00 AM Motor Oil Range Organics (MRO) ND 8/22/2019 9:39:00 AM 44 mg/Kg 1 Surr: DNOP 105 70-130 %Rec 1 8/22/2019 9:39:00 AM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 11:23:20 AM 4.8 mg/Kg 1 Surr: BFB 96.3 77.4-118 %Rec 1 8/21/2019 11:23:20 AM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 0.024 mg/Kg 8/21/2019 11:23:20 AM 1 Toluene ND 0.048 mg/Kg 1 8/21/2019 11:23:20 AM Ethylbenzene ND 0.048 mg/Kg 1 8/21/2019 11:23:20 AM Xylenes, Total ND 0.097 mg/Kg 1 8/21/2019 11:23:20 AM %Rec Surr: 4-Bromofluorobenzene 92.4 80-120 1 8/21/2019 11:23:20 AM Analyst: CAS **EPA METHOD 300.0: ANIONS** Chloride 1800 60 8/22/2019 12:13:06 PM ma/Ka 20

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported:

CLIENT: Vertex Resource Group Ltd. **Client Sample ID:** Base 19-20 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:50:00 AM

 Lab ID:
 1908B23-023
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) 8/22/2019 10:02:52 AM 32 9.7 mg/Kg 1 Motor Oil Range Organics (MRO) ND 49 mg/Kg 1 8/22/2019 10:02:52 AM Surr: DNOP 105 70-130 %Rec 1 8/22/2019 10:02:52 AM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 12:31:48 PM 4.7 mg/Kg 1 Surr: BFB 98.2 77.4-118 %Rec 1 8/21/2019 12:31:48 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 8/21/2019 12:31:48 PM 0.023 mg/Kg 1 Toluene ND 0.047 mg/Kg 1 8/21/2019 12:31:48 PM Ethylbenzene ND 0.047 mg/Kg 1 8/21/2019 12:31:48 PM Xylenes, Total ND 0.094 mg/Kg 1 8/21/2019 12:31:48 PM %Rec Surr: 4-Bromofluorobenzene 92.6 80-120 1 8/21/2019 12:31:48 PM Analyst: CAS **EPA METHOD 300.0: ANIONS** Chloride 2800 60 20 8/22/2019 12:25:26 PM Ε mg/Kg

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

enorting Limit Page 23 of 0

8/22/2019 12:37:46 PM

Hall Environmental Analysis Laboratory, Inc.

Date Reported:

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base 19-21 0.5

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:55:00 AM

 Lab ID:
 1908B23-024
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Qual Units** DF **Date Analyzed** Analyses **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.5 mg/Kg 1 8/22/2019 10:26:49 AM Motor Oil Range Organics (MRO) ND 48 mg/Kg 1 8/22/2019 10:26:49 AM Surr: DNOP 100 70-130 %Rec 1 8/22/2019 10:26:49 AM **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB Gasoline Range Organics (GRO) ND 8/21/2019 12:54:41 PM 4.9 mg/Kg 1 Surr: BFB 97.4 77.4-118 %Rec 1 8/21/2019 12:54:41 PM **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 0.025 mg/Kg 8/21/2019 12:54:41 PM 1 Toluene 0.049 8/21/2019 12:54:41 PM ND mg/Kg 1 Ethylbenzene ND 0.049 mg/Kg 1 8/21/2019 12:54:41 PM Xylenes, Total ND 0.098 mg/Kg 1 8/21/2019 12:54:41 PM %Rec Surr: 4-Bromofluorobenzene 90.8 80-120 1 8/21/2019 12:54:41 PM Analyst: CAS **EPA METHOD 300.0: ANIONS**

870

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ma/Ka

20

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

Qualifiers:

Chloride

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported:

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-22 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 12:00:00 PM

 Lab ID:
 1908B23-025
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE O	RGANICS					Analyst: TOM
Diesel Range Organics (DRO)	ND	9.4		mg/Kg	1	8/22/2019 10:50:50 AM
Motor Oil Range Organics (MRO)	ND	47		mg/Kg	1	8/22/2019 10:50:50 AM
Surr: DNOP	48.4	70-130	S	%Rec	1	8/22/2019 10:50:50 AM
EPA METHOD 8015D: GASOLINE RANGE						Analyst: NSB
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	8/21/2019 1:17:34 PM
Surr: BFB	98.3	77.4-118		%Rec	1	8/21/2019 1:17:34 PM
EPA METHOD 8021B: VOLATILES						Analyst: NSB
Benzene	ND	0.024		mg/Kg	1	8/21/2019 1:17:34 PM
Toluene	ND	0.048		mg/Kg	1	8/21/2019 1:17:34 PM
Ethylbenzene	ND	0.048		mg/Kg	1	8/21/2019 1:17:34 PM
Xylenes, Total	ND	0.097		mg/Kg	1	8/21/2019 1:17:34 PM
Surr: 4-Bromofluorobenzene	91.4	80-120		%Rec	1	8/21/2019 1:17:34 PM
EPA METHOD 300.0: ANIONS						Analyst: CAS
Chloride	150	60		mg/Kg	20	8/22/2019 12:50:07 PM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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

August 26, 2019

Dennis Williams
Vertex Resource Group Ltd.
213 S. Mesa St
Carlsbad, NM 88220
TEL:
FAX:

RE: Rick Declard 25 28 4 OrderNo.: 1908B23

Dear Dennis Williams:

Hall Environmental Analysis Laboratory received 25 sample(s) on 8/20/2019 for the analyses presented in the following report.

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

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

ADHS Cert #AZ0682 -- NMED-DWB Cert #NM9425 -- NMED-Micro Cert #NM0901

Sincerely,

Andy Freeman

Laboratory Manager

andyl

4901 Hawkins NE

Albuquerque, NM 87109

Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: BG19-01 0'

Rick Declard 25 28 4 **Collection Date: 8/19/2019 10:00:00 AM Project:** Lab ID: 1908B23-001 Matrix: SOIL **Received Date: 8/20/2019 8:55:00 AM**

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst:	CJS
Chloride	ND	59	mg/Kg	20	8/21/2019 10:37:03 PM	46952
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst:	TOM
Diesel Range Organics (DRO)	ND	9.4	mg/Kg	1	8/21/2019 9:37:40 AM	46939
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/21/2019 9:37:40 AM	46939
Surr: DNOP	90.3	70-130	%Rec	1	8/21/2019 9:37:40 AM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst:	NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 11:58:00 AM	46922
Surr: BFB	90.1	77.4-118	%Rec	1	8/21/2019 11:58:00 AM	46922
EPA METHOD 8021B: VOLATILES					Analyst:	NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 11:58:00 AM	46922
Toluene	ND	0.048	mg/Kg	1	8/21/2019 11:58:00 AM	46922
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 11:58:00 AM	46922
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 11:58:00 AM	46922
Surr: 4-Bromofluorobenzene	91.6	80-120	%Rec	1	8/21/2019 11:58:00 AM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- % Recovery outside of range due to dilution or matrix

- Analyte detected in the associated Method Blank
- Е Value above quantitation range
- Analyte detected below quantitation limits
- Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: BG19-01 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:05:00 AM

 Lab ID:
 1908B23-002
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst:	CJS
Chloride	ND	60	mg/Kg	20	8/21/2019 10:49:28 PM	46952
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst:	TOM
Diesel Range Organics (DRO)	ND	9.4	mg/Kg	1	8/21/2019 10:49:45 AM	46939
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/21/2019 10:49:45 AM	46939
Surr: DNOP	91.2	70-130	%Rec	1	8/21/2019 10:49:45 AM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst:	NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 1:31:49 PM	46922
Surr: BFB	90.2	77.4-118	%Rec	1	8/21/2019 1:31:49 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst:	NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 1:31:49 PM	46922
Toluene	ND	0.048	mg/Kg	1	8/21/2019 1:31:49 PM	46922
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 1:31:49 PM	46922
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 1:31:49 PM	46922
Surr: 4-Bromofluorobenzene	91.1	80-120	%Rec	1	8/21/2019 1:31:49 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: BG19-01 2'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:10:00 AM

 Lab ID:
 1908B23-003
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Oual Units DF** Date Analyzed **Batch Analyses EPA METHOD 300.0: ANIONS** Analyst: CJS Chloride ND 60 mg/Kg 20 8/21/2019 11:51:31 PM 46952 **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.1 mg/Kg 8/21/2019 11:13:54 AM 46939 Motor Oil Range Organics (MRO) ND 8/21/2019 11:13:54 AM 46939 45 mg/Kg 1 Surr: DNOP 92.1 %Rec 8/21/2019 11:13:54 AM 46939 70-130 **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB ND 8/21/2019 2:42:24 PM Gasoline Range Organics (GRO) 4.9 46922 mg/Kg Surr: BFB 91.3 77.4-118 %Rec 8/21/2019 2:42:24 PM 46922 **EPA METHOD 8021B: VOLATILES** Analyst: NSB ND 0.024 8/21/2019 2:42:24 PM 46922 Benzene mg/Kg Toluene ND 0.049 mg/Kg 8/21/2019 2:42:24 PM 46922 Ethylbenzene ND 0.049 mg/Kg 1 8/21/2019 2:42:24 PM 46922 Xylenes, Total ND 0.098 mg/Kg 8/21/2019 2:42:24 PM 46922 Surr: 4-Bromofluorobenzene 92.2 8/21/2019 2:42:24 PM 46922 80-120 %Rec

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-01 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:15:00 AM

 Lab ID:
 1908B23-004
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	: CJS
Chloride	120	60	mg/Kg	20	8/22/2019 12:03:56 AM	46952
EPA METHOD 8015M/D: DIESEL RANGE ORG	ANICS				Analyst	TOM
Diesel Range Organics (DRO)	ND	9.2	mg/Kg	1	8/21/2019 11:38:00 AM	46939
Motor Oil Range Organics (MRO)	ND	46	mg/Kg	1	8/21/2019 11:38:00 AM	46939
Surr: DNOP	93.9	70-130	%Rec	1	8/21/2019 11:38:00 AM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	: NSB
Gasoline Range Organics (GRO)	ND	5.0	mg/Kg	1	8/21/2019 3:05:59 PM	46922
Surr: BFB	95.9	77.4-118	%Rec	1	8/21/2019 3:05:59 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	: NSB
Benzene	ND	0.025	mg/Kg	1	8/21/2019 3:05:59 PM	46922
Toluene	ND	0.050	mg/Kg	1	8/21/2019 3:05:59 PM	46922
Ethylbenzene	ND	0.050	mg/Kg	1	8/21/2019 3:05:59 PM	46922
Xylenes, Total	ND	0.10	mg/Kg	1	8/21/2019 3:05:59 PM	46922
Surr: 4-Bromofluorobenzene	97.2	80-120	%Rec	1	8/21/2019 3:05:59 PM	46922

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

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit
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Lab Order 1908B23

Hall Environmental Analysis Laboratory, Inc.

Date Reported: 8/26/2019

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-02 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:20:00 AM

 Lab ID:
 1908B23-005
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	CJS
Chloride	980	60	mg/Kg	20	8/22/2019 12:16:20 AM	46952
EPA METHOD 8015M/D: DIESEL RANGE ORG	GANICS				Analyst	TOM
Diesel Range Organics (DRO)	ND	9.7	mg/Kg	1	8/21/2019 12:02:09 PM	46939
Motor Oil Range Organics (MRO)	ND	49	mg/Kg	1	8/21/2019 12:02:09 PM	46939
Surr: DNOP	93.8	70-130	%Rec	1	8/21/2019 12:02:09 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	NSB
Gasoline Range Organics (GRO)	ND	5.0	mg/Kg	1	8/21/2019 3:29:32 PM	46922
Surr: BFB	91.3	77.4-118	%Rec	1	8/21/2019 3:29:32 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	NSB
Benzene	ND	0.025	mg/Kg	1	8/21/2019 3:29:32 PM	46922
Toluene	ND	0.050	mg/Kg	1	8/21/2019 3:29:32 PM	46922
Ethylbenzene	ND	0.050	mg/Kg	1	8/21/2019 3:29:32 PM	46922
Xylenes, Total	ND	0.10	mg/Kg	1	8/21/2019 3:29:32 PM	46922
Surr: 4-Bromofluorobenzene	91.8	80-120	%Rec	1	8/21/2019 3:29:32 PM	46922

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

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base 19-03 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:25:00 AM

 Lab ID:
 1908B23-006
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Oual Units DF** Date Analyzed **Batch Analyses EPA METHOD 300.0: ANIONS** Analyst: CJS Chloride 700 60 mg/Kg 20 8/22/2019 12:28:44 AM 46952 **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.2 mg/Kg 8/21/2019 12:26:10 PM 46939 Motor Oil Range Organics (MRO) ND 8/21/2019 12:26:10 PM 46939 46 mg/Kg 1 Surr: DNOP 95.0 %Rec 8/21/2019 12:26:10 PM 46939 70-130 **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB 8/21/2019 5:03:29 PM Gasoline Range Organics (GRO) ND 5.0 46922 mg/Kg Surr: BFB 93.6 77.4-118 %Rec 8/21/2019 5:03:29 PM 46922 **EPA METHOD 8021B: VOLATILES** Analyst: NSB Benzene ND 0.025 8/21/2019 5:03:29 PM 46922 mg/Kg Toluene ND 0.050 mg/Kg 8/21/2019 5:03:29 PM 46922 Ethylbenzene ND 0.050 mg/Kg 1 8/21/2019 5:03:29 PM 46922 Xylenes, Total ND 0.10 mg/Kg 8/21/2019 5:03:29 PM 46922 Surr: 4-Bromofluorobenzene 46922 94.5 80-120 %Rec 8/21/2019 5:03:29 PM

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

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-04 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:30:00 AM

 Lab ID:
 1908B23-007
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Oual Units DF** Date Analyzed **Batch Analyses EPA METHOD 300.0: ANIONS** Analyst: CJS Chloride 150 60 mg/Kg 20 8/22/2019 12:41:09 AM 46952 **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.0 mg/Kg 8/21/2019 12:50:06 PM 46939 Motor Oil Range Organics (MRO) ND 8/21/2019 12:50:06 PM 46939 45 mg/Kg 1 Surr: DNOP 96.0 %Rec 8/21/2019 12:50:06 PM 46939 70-130 **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB ND 8/21/2019 5:26:56 PM Gasoline Range Organics (GRO) 4.8 46922 mg/Kg 1 Surr: BFB 97.8 77.4-118 %Rec 8/21/2019 5:26:56 PM 46922 **EPA METHOD 8021B: VOLATILES** Analyst: NSB ND Benzene 0.024 8/21/2019 5:26:56 PM 46922 mg/Kg Toluene ND 0.048 mg/Kg 8/21/2019 5:26:56 PM 46922 Ethylbenzene ND 0.048 mg/Kg 1 8/21/2019 5:26:56 PM 46922 Xylenes, Total ND 0.097 mg/Kg 8/21/2019 5:26:56 PM 46922 46922 Surr: 4-Bromofluorobenzene 98.9 80-120 %Rec 8/21/2019 5:26:56 PM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Hall Environmental Analysis Laboratory, Inc.

Date Reported: 8/26/2019

CLIENT: Vertex Resource Group Ltd. **Client Sample ID:** Base 19-05 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:35:00 AM

 Lab ID:
 1908B23-008
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst:	CJS
Chloride	330	60	mg/Kg	20	8/22/2019 12:53:33 AM	46952
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst:	TOM
Diesel Range Organics (DRO)	ND	9.4	mg/Kg	1	8/21/2019 1:14:05 PM	46939
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/21/2019 1:14:05 PM	46939
Surr: DNOP	94.2	70-130	%Rec	1	8/21/2019 1:14:05 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst:	NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 5:50:23 PM	46922
Surr: BFB	90.8	77.4-118	%Rec	1	8/21/2019 5:50:23 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst:	NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 5:50:23 PM	46922
Toluene	ND	0.048	mg/Kg	1	8/21/2019 5:50:23 PM	46922
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 5:50:23 PM	46922
Xylenes, Total	ND	0.095	mg/Kg	1	8/21/2019 5:50:23 PM	46922
Surr: 4-Bromofluorobenzene	91.9	80-120	%Rec	1	8/21/2019 5:50:23 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

pole pH Not In Range Page 8 of 32

Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-06 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:40:00 AM

 Lab ID:
 1908B23-009
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	: CJS
Chloride	220	60	mg/Kg	20	8/22/2019 1:05:57 AM	46952
EPA METHOD 8015M/D: DIESEL RANGE ORG	ANICS				Analyst	TOM
Diesel Range Organics (DRO)	ND	9.8	mg/Kg	1	8/21/2019 1:38:05 PM	46939
Motor Oil Range Organics (MRO)	ND	49	mg/Kg	1	8/21/2019 1:38:05 PM	46939
Surr: DNOP	94.8	70-130	%Rec	1	8/21/2019 1:38:05 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 6:13:56 PM	46922
Surr: BFB	88.8	77.4-118	%Rec	1	8/21/2019 6:13:56 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 6:13:56 PM	46922
Toluene	ND	0.048	mg/Kg	1	8/21/2019 6:13:56 PM	46922
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 6:13:56 PM	46922
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 6:13:56 PM	46922
Surr: 4-Bromofluorobenzene	89.4	80-120	%Rec	1	8/21/2019 6:13:56 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-07 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:45:00 AM

 Lab ID:
 1908B23-010
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	: CJS
Chloride	340	59	mg/Kg	20	8/22/2019 1:18:21 AM	46952
EPA METHOD 8015M/D: DIESEL RANGE ORG	ANICS				Analyst	: TOM
Diesel Range Organics (DRO)	ND	9.7	mg/Kg	1	8/21/2019 2:02:07 PM	46939
Motor Oil Range Organics (MRO)	ND	48	mg/Kg	1	8/21/2019 2:02:07 PM	46939
Surr: DNOP	97.8	70-130	%Rec	1	8/21/2019 2:02:07 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 6:37:31 PM	46922
Surr: BFB	89.9	77.4-118	%Rec	1	8/21/2019 6:37:31 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 6:37:31 PM	46922
Toluene	ND	0.048	mg/Kg	1	8/21/2019 6:37:31 PM	46922
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 6:37:31 PM	46922
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 6:37:31 PM	46922
Surr: 4-Bromofluorobenzene	90.9	80-120	%Rec	1	8/21/2019 6:37:31 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-08 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:50:00 AM

 Lab ID:
 1908B23-011
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	: CJS
Chloride	330	60	mg/Kg	20	8/22/2019 1:55:34 AM	46952
EPA METHOD 8015M/D: DIESEL RANGE ORG	ANICS				Analyst	: TOM
Diesel Range Organics (DRO)	ND	9.8	mg/Kg	1	8/21/2019 2:26:12 PM	46939
Motor Oil Range Organics (MRO)	ND	49	mg/Kg	1	8/21/2019 2:26:12 PM	46939
Surr: DNOP	96.3	70-130	%Rec	1	8/21/2019 2:26:12 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	: NSB
Gasoline Range Organics (GRO)	ND	4.7	mg/Kg	1	8/21/2019 7:01:03 PM	46922
Surr: BFB	90.0	77.4-118	%Rec	1	8/21/2019 7:01:03 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 7:01:03 PM	46922
Toluene	ND	0.047	mg/Kg	1	8/21/2019 7:01:03 PM	46922
Ethylbenzene	ND	0.047	mg/Kg	1	8/21/2019 7:01:03 PM	46922
Xylenes, Total	ND	0.095	mg/Kg	1	8/21/2019 7:01:03 PM	46922
Surr: 4-Bromofluorobenzene	90.5	80-120	%Rec	1	8/21/2019 7:01:03 PM	46922

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

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Hall Environmental Analysis Laboratory, Inc.

Date Reported: 8/26/2019

CLIENT: Vertex Resource Group Ltd. **Client Sample ID:** Base 19-09 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 10:55:00 AM

 Lab ID:
 1908B23-012
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	CJS
Chloride	100	60	mg/Kg	20	8/22/2019 2:07:59 AM	46952
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst	TOM
Diesel Range Organics (DRO)	ND	10	mg/Kg	1	8/21/2019 2:50:12 PM	46939
Motor Oil Range Organics (MRO)	ND	50	mg/Kg	1	8/21/2019 2:50:12 PM	46939
Surr: DNOP	96.3	70-130	%Rec	1	8/21/2019 2:50:12 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	NSB
Gasoline Range Organics (GRO)	ND	4.9	mg/Kg	1	8/21/2019 7:24:33 PM	46922
Surr: BFB	95.1	77.4-118	%Rec	1	8/21/2019 7:24:33 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 7:24:33 PM	46922
Toluene	ND	0.049	mg/Kg	1	8/21/2019 7:24:33 PM	46922
Ethylbenzene	ND	0.049	mg/Kg	1	8/21/2019 7:24:33 PM	46922
Xylenes, Total	ND	0.098	mg/Kg	1	8/21/2019 7:24:33 PM	46922
Surr: 4-Bromofluorobenzene	96.1	80-120	%Rec	1	8/21/2019 7:24:33 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Hall Environmental Analysis Laboratory, Inc.

Date Reported: 8/26/2019

CLIENT: Vertex Resource Group Ltd. **Client Sample ID:** Base 19-10 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:00:00 AM

 Lab ID:
 1908B23-013
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Oual Units DF** Date Analyzed **Batch Analyses EPA METHOD 300.0: ANIONS** Analyst: CJS Chloride 240 60 mg/Kg 20 8/22/2019 2:45:13 AM 46952 **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.9 mg/Kg 8/21/2019 3:14:10 PM Motor Oil Range Organics (MRO) ND 46939 49 mg/Kg 1 8/21/2019 3:14:10 PM Surr: DNOP 97.3 %Rec 8/21/2019 3:14:10 PM 46939 70-130 **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB 8/21/2019 7:48:02 PM Gasoline Range Organics (GRO) ND 4.8 46922 mg/Kg Surr: BFB 90.1 77.4-118 %Rec 8/21/2019 7:48:02 PM 46922 **EPA METHOD 8021B: VOLATILES** Analyst: NSB ND Benzene 0.024 8/21/2019 7:48:02 PM 46922 mg/Kg Toluene ND 0.048 mg/Kg 8/21/2019 7:48:02 PM 46922 Ethylbenzene ND 0.048 mg/Kg 1 8/21/2019 7:48:02 PM 46922 Xylenes, Total ND 0.096 mg/Kg 8/21/2019 7:48:02 PM 46922 Surr: 4-Bromofluorobenzene 8/21/2019 7:48:02 PM 46922 90.3 80-120 %Rec

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

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-11 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:05:00 AM

 Lab ID:
 1908B23-014
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	CAS
Chloride	570	60	mg/Kg	20	8/22/2019 9:44:56 AM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORGA	ANICS				Analyst	: TOM
Diesel Range Organics (DRO)	ND	9.4	mg/Kg	1	8/21/2019 3:38:12 PM	46939
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/21/2019 3:38:12 PM	46939
Surr: DNOP	97.8	70-130	%Rec	1	8/21/2019 3:38:12 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	: NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 8:11:26 PM	46922
Surr: BFB	87.7	77.4-118	%Rec	1	8/21/2019 8:11:26 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	: NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 8:11:26 PM	46922
Toluene	ND	0.048	mg/Kg	1	8/21/2019 8:11:26 PM	46922
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 8:11:26 PM	46922
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 8:11:26 PM	46922
Surr: 4-Bromofluorobenzene	88.4	80-120	%Rec	1	8/21/2019 8:11:26 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base 19-12 1.0'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:10:00 AM

 Lab ID:
 1908B23-015
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	CAS
Chloride	760	60	mg/Kg	20	8/22/2019 9:57:17 AM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORG	ANICS				Analyst	TOM
Diesel Range Organics (DRO)	ND	9.5	mg/Kg	1	8/21/2019 4:02:20 PM	46939
Motor Oil Range Organics (MRO)	ND	48	mg/Kg	1	8/21/2019 4:02:20 PM	46939
Surr: DNOP	99.0	70-130	%Rec	1	8/21/2019 4:02:20 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	NSB
Gasoline Range Organics (GRO)	ND	5.0	mg/Kg	1	8/21/2019 8:34:51 PM	46922
Surr: BFB	88.3	77.4-118	%Rec	1	8/21/2019 8:34:51 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	NSB
Benzene	ND	0.025	mg/Kg	1	8/21/2019 8:34:51 PM	46922
Toluene	ND	0.050	mg/Kg	1	8/21/2019 8:34:51 PM	46922
Ethylbenzene	ND	0.050	mg/Kg	1	8/21/2019 8:34:51 PM	46922
Xylenes, Total	ND	0.10	mg/Kg	1	8/21/2019 8:34:51 PM	46922
Surr: 4-Bromofluorobenzene	89.0	80-120	%Rec	1	8/21/2019 8:34:51 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-13 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:15:00 AM

 Lab ID:
 1908B23-016
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst:	CAS
Chloride	450	60	mg/Kg	20	8/22/2019 10:34:20 AM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst:	TOM
Diesel Range Organics (DRO)	ND	9.2	mg/Kg	1	8/21/2019 4:26:25 PM	46939
Motor Oil Range Organics (MRO)	ND	46	mg/Kg	1	8/21/2019 4:26:25 PM	46939
Surr: DNOP	99.7	70-130	%Rec	1	8/21/2019 4:26:25 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst:	NSB
Gasoline Range Organics (GRO)	ND	4.9	mg/Kg	1	8/21/2019 10:08:18 PM	46922
Surr: BFB	89.4	77.4-118	%Rec	1	8/21/2019 10:08:18 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst:	NSB
Benzene	ND	0.025	mg/Kg	1	8/21/2019 10:08:18 PM	46922
Toluene	ND	0.049	mg/Kg	1	8/21/2019 10:08:18 PM	46922
Ethylbenzene	ND	0.049	mg/Kg	1	8/21/2019 10:08:18 PM	46922
Xylenes, Total	ND	0.098	mg/Kg	1	8/21/2019 10:08:18 PM	46922
Surr: 4-Bromofluorobenzene	91.1	80-120	%Rec	1	8/21/2019 10:08:18 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-14 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:20:00 AM

 Lab ID:
 1908B23-017
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst:	CAS
Chloride	830	60	mg/Kg	20	8/22/2019 11:11:21 AM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst:	TOM
Diesel Range Organics (DRO)	ND	9.6	mg/Kg	1	8/21/2019 4:50:33 PM	46939
Motor Oil Range Organics (MRO)	ND	48	mg/Kg	1	8/21/2019 4:50:33 PM	46939
Surr: DNOP	94.7	70-130	%Rec	1	8/21/2019 4:50:33 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst:	NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 10:32:10 PM	46922
Surr: BFB	98.1	77.4-118	%Rec	1	8/21/2019 10:32:10 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst:	NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 10:32:10 PM	46922
Toluene	ND	0.048	mg/Kg	1	8/21/2019 10:32:10 PM	46922
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 10:32:10 PM	46922
Xylenes, Total	ND	0.096	mg/Kg	1	8/21/2019 10:32:10 PM	46922
Surr: 4-Bromofluorobenzene	99.5	80-120	%Rec	1	8/21/2019 10:32:10 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Hall Environmental Analysis Laboratory, Inc.

Date Reported: 8/26/2019

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-15 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:25:00 AM

 Lab ID:
 1908B23-018
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	CAS
Chloride	630	60	mg/Kg	20	8/22/2019 11:23:42 AM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORG	ANICS				Analyst	том
Diesel Range Organics (DRO)	ND	9.9	mg/Kg	1	8/21/2019 5:14:36 PM	46939
Motor Oil Range Organics (MRO)	ND	50	mg/Kg	1	8/21/2019 5:14:36 PM	46939
Surr: DNOP	97.3	70-130	%Rec	1	8/21/2019 5:14:36 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	NSB
Gasoline Range Organics (GRO)	ND	4.6	mg/Kg	1	8/21/2019 10:55:45 PM	46922
Surr: BFB	99.9	77.4-118	%Rec	1	8/21/2019 10:55:45 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	NSB
Benzene	ND	0.023	mg/Kg	1	8/21/2019 10:55:45 PM	46922
Toluene	ND	0.046	mg/Kg	1	8/21/2019 10:55:45 PM	46922
Ethylbenzene	ND	0.046	mg/Kg	1	8/21/2019 10:55:45 PM	46922
Xylenes, Total	ND	0.092	mg/Kg	1	8/21/2019 10:55:45 PM	46922
Surr: 4-Bromofluorobenzene	101	80-120	%Rec	1	8/21/2019 10:55:45 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Hall Environmental Analysis Laboratory, Inc.

Date Reported: 8/26/2019

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-16 0.5'

Project: Rick Declard 25 28 4 **Collection Date:** 8/19/2019 11:30:00 AM

Lab ID: 1908B23-019 **Matrix:** SOIL **Received Date:** 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	CAS
Chloride	700	60	mg/Kg	20	8/22/2019 11:36:03 AM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORG	ANICS				Analyst	том
Diesel Range Organics (DRO)	ND	9.6	mg/Kg	1	8/21/2019 5:38:51 PM	46939
Motor Oil Range Organics (MRO)	ND	48	mg/Kg	1	8/21/2019 5:38:51 PM	46939
Surr: DNOP	92.4	70-130	%Rec	1	8/21/2019 5:38:51 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst	NSB
Gasoline Range Organics (GRO)	ND	4.7	mg/Kg	1	8/21/2019 11:19:14 PM	46922
Surr: BFB	94.1	77.4-118	%Rec	1	8/21/2019 11:19:14 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst	NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 11:19:14 PM	46922
Toluene	ND	0.047	mg/Kg	1	8/21/2019 11:19:14 PM	46922
Ethylbenzene	ND	0.047	mg/Kg	1	8/21/2019 11:19:14 PM	46922
Xylenes, Total	ND	0.094	mg/Kg	1	8/21/2019 11:19:14 PM	46922
Surr: 4-Bromofluorobenzene	94.5	80-120	%Rec	1	8/21/2019 11:19:14 PM	46922

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-17 1'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:35:00 AM

 Lab ID:
 1908B23-020
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst:	CAS
Chloride	820	60	mg/Kg	20	8/22/2019 11:48:24 AM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst:	TOM
Diesel Range Organics (DRO)	ND	9.5	mg/Kg	1	8/21/2019 6:03:02 PM	46939
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/21/2019 6:03:02 PM	46939
Surr: DNOP	94.7	70-130	%Rec	1	8/21/2019 6:03:02 PM	46939
EPA METHOD 8015D: GASOLINE RANGE					Analyst:	NSB
Gasoline Range Organics (GRO)	ND	4.7	mg/Kg	1	8/21/2019 11:42:44 PM	46922
Surr: BFB	92.5	77.4-118	%Rec	1	8/21/2019 11:42:44 PM	46922
EPA METHOD 8021B: VOLATILES					Analyst:	NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 11:42:44 PM	46922
Toluene	ND	0.047	mg/Kg	1	8/21/2019 11:42:44 PM	46922
Ethylbenzene	ND	0.047	mg/Kg	1	8/21/2019 11:42:44 PM	46922
Xylenes, Total	ND	0.095	mg/Kg	1	8/21/2019 11:42:44 PM	46922
Surr: 4-Bromofluorobenzene	92.8	80-120	%Rec	1	8/21/2019 11:42:44 PM	46922

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

Qualifiers:

- * Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base 19-18 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:40:00 AM

 Lab ID:
 1908B23-021
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Result **RL Oual Units DF** Date Analyzed **Batch Analyses EPA METHOD 300.0: ANIONS** Analyst: CAS Chloride 4200 150 mg/Kg 50 8/23/2019 3:45:52 PM 46964 **EPA METHOD 8015M/D: DIESEL RANGE ORGANICS** Analyst: TOM Diesel Range Organics (DRO) ND 9.7 mg/Kg 8/22/2019 9:15:04 AM 46940 Motor Oil Range Organics (MRO) ND 48 mg/Kg 1 8/22/2019 9:15:04 AM 46940 Surr: DNOP 77.7 %Rec 8/22/2019 9:15:04 AM 46940 70-130 **EPA METHOD 8015D: GASOLINE RANGE** Analyst: NSB 8/21/2019 10:14:46 AM 46923 Gasoline Range Organics (GRO) ND 4.7 mg/Kg Surr: BFB 99.0 77.4-118 %Rec 8/21/2019 10:14:46 AM 46923 **EPA METHOD 8021B: VOLATILES** Analyst: NSB ND Benzene 0.024 8/21/2019 10:14:46 AM 46923 mg/Kg Toluene ND 0.047 mg/Kg 8/21/2019 10:14:46 AM 46923 Ethylbenzene ND 0.047 mg/Kg 8/21/2019 10:14:46 AM 46923 Xylenes, Total ND 0.095 mg/Kg 8/21/2019 10:14:46 AM 46923 Surr: 4-Bromofluorobenzene 8/21/2019 10:14:46 AM 46923 89.7 80-120 %Rec

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order **1908B23**

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-19 3'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 11:45:00 AM

 Lab ID:
 1908B23-022
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	CAS
Chloride	1800	60	mg/Kg	20	8/22/2019 12:13:06 PM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORG	ANICS				Analyst	TOM
Diesel Range Organics (DRO)	ND	8.7	mg/Kg	1	8/22/2019 9:39:00 AM	46940
Motor Oil Range Organics (MRO)	ND	44	mg/Kg	1	8/22/2019 9:39:00 AM	46940
Surr: DNOP	105	70-130	%Rec	1	8/22/2019 9:39:00 AM	46940
EPA METHOD 8015D: GASOLINE RANGE					Analyst	NSB
Gasoline Range Organics (GRO)	ND	4.8	mg/Kg	1	8/21/2019 11:23:20 AM	46923
Surr: BFB	96.3	77.4-118	%Rec	1	8/21/2019 11:23:20 AM	46923
EPA METHOD 8021B: VOLATILES					Analyst	NSB
Benzene	ND	0.024	mg/Kg	1	8/21/2019 11:23:20 AM	46923
Toluene	ND	0.048	mg/Kg	1	8/21/2019 11:23:20 AM	46923
Ethylbenzene	ND	0.048	mg/Kg	1	8/21/2019 11:23:20 AM	46923
Xylenes, Total	ND	0.097	mg/Kg	1	8/21/2019 11:23:20 AM	46923
Surr: 4-Bromofluorobenzene	92.4	80-120	%Rec	1	8/21/2019 11:23:20 AM	46923

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base 19-20 0.5'

Project: Rick Declard 25 28 4 **Collection Date:** 8/19/2019 11:50:00 AM

Lab ID: 1908B23-023 **Matrix:** SOIL **Received Date:** 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst	CAS
Chloride	3100	150	mg/Kg	50	8/23/2019 3:58:17 PM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst	TOM
Diesel Range Organics (DRO)	32	9.7	mg/Kg	1	8/22/2019 10:02:52 AM	46940
Motor Oil Range Organics (MRO)	ND	49	mg/Kg	1	8/22/2019 10:02:52 AM	46940
Surr: DNOP	105	70-130	%Rec	1	8/22/2019 10:02:52 AM	46940
EPA METHOD 8015D: GASOLINE RANGE					Analyst	NSB
Gasoline Range Organics (GRO)	ND	4.7	mg/Kg	1	8/21/2019 12:31:48 PM	46923
Surr: BFB	98.2	77.4-118	%Rec	1	8/21/2019 12:31:48 PM	46923
EPA METHOD 8021B: VOLATILES					Analyst	NSB
Benzene	ND	0.023	mg/Kg	1	8/21/2019 12:31:48 PM	46923
Toluene	ND	0.047	mg/Kg	1	8/21/2019 12:31:48 PM	46923
Ethylbenzene	ND	0.047	mg/Kg	1	8/21/2019 12:31:48 PM	46923
Xylenes, Total	ND	0.094	mg/Kg	1	8/21/2019 12:31:48 PM	46923
Surr: 4-Bromofluorobenzene	92.6	80-120	%Rec	1	8/21/2019 12:31:48 PM	46923

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base 19-21 0.5'

Project: Rick Declard 25 28 4 **Collection Date:** 8/19/2019 11:55:00 AM

Lab ID: 1908B23-024 **Matrix:** SOIL **Received Date:** 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS					Analyst:	CAS
Chloride	870	60	mg/Kg	20	8/22/2019 12:37:46 PM	46964
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst	TOM
Diesel Range Organics (DRO)	ND	9.5	mg/Kg	1	8/22/2019 10:26:49 AM	46940
Motor Oil Range Organics (MRO)	ND	48	mg/Kg	1	8/22/2019 10:26:49 AM	46940
Surr: DNOP	100	70-130	%Rec	1	8/22/2019 10:26:49 AM	46940
EPA METHOD 8015D: GASOLINE RANGE					Analyst	NSB
Gasoline Range Organics (GRO)	ND	4.9	mg/Kg	1	8/21/2019 12:54:41 PM	46923
Surr: BFB	97.4	77.4-118	%Rec	1	8/21/2019 12:54:41 PM	46923
EPA METHOD 8021B: VOLATILES					Analyst:	NSB
Benzene	ND	0.025	mg/Kg	1	8/21/2019 12:54:41 PM	46923
Toluene	ND	0.049	mg/Kg	1	8/21/2019 12:54:41 PM	46923
Ethylbenzene	ND	0.049	mg/Kg	1	8/21/2019 12:54:41 PM	46923
Xylenes, Total	ND	0.098	mg/Kg	1	8/21/2019 12:54:41 PM	46923
Surr: 4-Bromofluorobenzene	90.8	80-120	%Rec	1	8/21/2019 12:54:41 PM	46923

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order 1908B23

Date Reported: 8/26/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base 19-22 0.5'

 Project:
 Rick Declard 25 28 4
 Collection Date: 8/19/2019 12:00:00 PM

 Lab ID:
 1908B23-025
 Matrix: SOIL
 Received Date: 8/20/2019 8:55:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 300.0: ANIONS						Analyst:	CAS
Chloride	150	60		mg/Kg	20	8/22/2019 12:50:07 PM	46964
EPA METHOD 8015M/D: DIESEL RANGE OR	GANICS					Analyst:	TOM
Diesel Range Organics (DRO)	ND	9.4		mg/Kg	1	8/22/2019 10:50:50 AM	46940
Motor Oil Range Organics (MRO)	ND	47		mg/Kg	1	8/22/2019 10:50:50 AM	46940
Surr: DNOP	48.4	70-130	S	%Rec	1	8/22/2019 10:50:50 AM	46940
EPA METHOD 8015D: GASOLINE RANGE						Analyst:	NSB
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	8/21/2019 1:17:34 PM	46923
Surr: BFB	98.3	77.4-118		%Rec	1	8/21/2019 1:17:34 PM	46923
EPA METHOD 8021B: VOLATILES						Analyst:	NSB
Benzene	ND	0.024		mg/Kg	1	8/21/2019 1:17:34 PM	46923
Toluene	ND	0.048		mg/Kg	1	8/21/2019 1:17:34 PM	46923
Ethylbenzene	ND	0.048		mg/Kg	1	8/21/2019 1:17:34 PM	46923
Xylenes, Total	ND	0.097		mg/Kg	1	8/21/2019 1:17:34 PM	46923
Surr: 4-Bromofluorobenzene	91.4	80-120		%Rec	1	8/21/2019 1:17:34 PM	46923

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Hall Environmental Analysis Laboratory, Inc.

WO#: **1908B23**

26-Aug-19

Client: Vertex Resource Group Ltd.

Project: Rick Declard 25 28 4

Sample ID: MB-46952 SampType: mblk TestCode: EPA Method 300.0: Anions

Client ID: **PBS** Batch ID: **46952** RunNo: **62313**

Prep Date: 8/21/2019 Analysis Date: 8/21/2019 SeqNo: 2117488 Units: mg/Kg

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

Chloride ND 1.5

Sample ID: LCS-46952 SampType: Ics TestCode: EPA Method 300.0: Anions

Client ID: **LCSS** Batch ID: **46952** RunNo: **62313**

Prep Date: 8/21/2019 Analysis Date: 8/21/2019 SeqNo: 2117489 Units: mg/Kg

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

Chloride 15 1.5 15.00 0 97.2 90 110

Sample ID: MB-46964 SampType: MBLK TestCode: EPA Method 300.0: Anions

Client ID: PBS Batch ID: 46964 RunNo: 62353

Prep Date: **8/21/2019** Analysis Date: **8/22/2019** SeqNo: **2119648** Units: **mg/Kg**

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

Chloride ND 1.5

Sample ID: LCS-46964 SampType: LCS TestCode: EPA Method 300.0: Anions

Client ID: LCSS Batch ID: 46964 RunNo: 62353

Prep Date: 8/21/2019 Analysis Date: 8/22/2019 SeqNo: 2119649 Units: mg/Kg

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

Chloride 14 1.5 15.00 0 94.6 90 110

Qualifiers:

* Value exceeds Maximum Contaminant Level

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Limit

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Client:

Hall Environmental Analysis Laboratory, Inc.

Vertex Resource Group Ltd.

WO#: **1908B23**

26-Aug-19

	clard 25 28	•								
Sample ID: MB-46939	SampT	ype: Mi	BLK	Tes	tCode: El	PA Method	8015M/D: Die	esel Rang	e Organics	
Client ID: PBS	Batch	ID: 46	939	F	RunNo: 6	2299				
Prep Date: 8/21/2019	Analysis Da	ate: 8/	/21/2019	9	SeqNo: 2	117026	Units: mg/k	(g		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	ND	10								
Motor Oil Range Organics (MRO)	ND	50	40.00		00.0	70	100			
Surr: DNOP	9.3		10.00		93.3	70	130			
Sample ID: LCS-46939	SampT	ype: LC	s	Tes	tCode: El	PA Method	8015M/D: Die	esel Rang	e Organics	
Client ID: LCSS	Batch	ID: 46	939	F	RunNo: 6	2299				
Prep Date: 8/21/2019	Analysis Da	ate: 8/	/21/2019	9	SeqNo: 2	117027	Units: mg/k	(g		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	43	10	50.00	0	85.9	63.9	124			
Surr: DNOP	4.3		5.000		86.6	70	130			
Sample ID: 1908B23-001AM	S SampT	уре: М	S	Tes	tCode: El	PA Method	8015M/D: Die	esel Rang	e Organics	
Client ID: BG19-01 0'	Batch	ID: 46	939	F	RunNo: 6	2299				
Prep Date: 8/21/2019	Analysis Da	ate: 8/	/21/2019	5	SeqNo: 2	117029	Units: mg/k	ζg		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	43	9.6	47.85	0	88.8	57	142			
Surr: DNOP	4.1		4.785		84.7	70	130			
Sample ID: 1908B23-001AM	SD SampT	уре: М	SD	Tes	tCode: El	PA Method	8015M/D: Die	esel Rang	e Organics	
Client ID: BG19-01 0'	Batch	ID: 46	939	F	RunNo: 6	2299				
Prep Date: 8/21/2019	Analysis Da	ate: 8/	21/2019	5	SeqNo: 2	117030	Units: mg/k	ζg		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	46	9.8	49.02	0	93.1	57	142	7.11	20	
Surr: DNOP	4.1		4.902		84.6	70	130	0	0	
Sample ID: MB-46940	SampT	ype: MI	BLK	Tes	tCode: El	PA Method	8015M/D: Die	esel Rang	e Organics	
Client ID: PBS	Batch	ID: 46	940	F	RunNo: 6	2330				
Prep Date: 8/21/2019	Analysis Da	ate: 8/	/22/2019	9	SeqNo: 2	118181	Units: mg/k	(g		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	ND	10								
Motor Oil Range Organics (MRO)	ND	50								
Surr: DNOP	11		10.00		105	70	130			

Qualifiers:

Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Limit

Hall Environmental Analysis Laboratory, Inc.

WO#: **1908B23**

26-Aug-19

Client: Vertex Resource Group Ltd.

Project: Rick Declard 25 28 4

Sample ID: LCS-46940 SampType: LCS TestCode: EPA Method 8015M/D: Diesel Range Organics

Client ID: LCSS Batch ID: 46940 RunNo: 62330

Prep Date: 8/21/2019 Analysis Date: 8/22/2019 SeqNo: 2118182 Units: mg/Kg

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

 Diesel Range Organics (DRO)
 46
 10
 50.00
 0
 91.5
 63.9
 124

 Surr: DNOP
 4.4
 5.000
 88.6
 70
 130

Qualifiers:

Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Limit

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Client:

Hall Environmental Analysis Laboratory, Inc.

Vertex Resource Group Ltd.

WO#: **1908B23**

26-Aug-19

Project:	Rick Decl	ard 25 28	4								
Sample ID: M	IB-46923	SampTy	ype: MF	BLK	Tes	tCode: El	PA Method	8015D: Gaso	line Rang	e	
Client ID: P	BS	Batch	ID: 46	923	F	tunNo: 6	2310				
Prep Date:	8/20/2019	Analysis Da	ate: 8/	21/2019	S	SeqNo: 2	117223	Units: mg/K	(g		
Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range C	Organics (GRO)	ND	5.0								
Surr: BFB		1000		1000		101	77.4	118			
Sample ID: Lo	CS-46923	SampTy	ype: LC	s	Tes	tCode: El	PA Method	8015D: Gaso	line Rang	е	
Client ID: Lo	css	Batch	ID: 46	923	F	tunNo: 6	2310				
Prep Date:	8/20/2019	Analysis Da	ate: 8/	21/2019	S	SeqNo: 2	117224	Units: mg/K	(g		
Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range C	Organics (GRO)	23	5.0	25.00	0	91.6	80	120			
Surr: BFB		1200		1000		116	77.4	118			
Sample ID: 19	908B23-021AMS	SampTy	ype: M \$	3	Tes	tCode: El	PA Method	8015D: Gaso	line Rang	е	
Client ID: B	ase 19-18 0.5'	Batch	ID: 46	923	F	tunNo: 6	2310				
Prep Date:	8/20/2019	Analysis Da	ate: 8/	21/2019	S	SeqNo: 2	117226	Units: mg/K	(g		
Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range C	Organics (GRO)	25	4.8	24.11	0	104	69.1	142			
Surr: BFB		1100		964.3		118	77.4	118			
Sample ID: 19	908B23-021AMS	SampTy	ype: M \$	SD	Tes	tCode: El	PA Method	8015D: Gaso	line Rang	е	
Client ID: B	ase 19-18 0.5'	Batch	ID: 46	923	F	tunNo: 6	2310				
Prep Date:	8/20/2019	Analysis Da	ate: 8/	21/2019	8	SeqNo: 2	117227	Units: mg/K	(g		
Analyte		Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range C	Organics (GRO)	25	4.9	24.32	0	104	69.1	142	0.910	20	
Surr: BFB		1100		972.8		116	77.4	118	0	0	
			_								
Sample ID: M	IB-46922	SampTy	/pe: ME	BLK	Tes	tCode: El	PA Method	8015D: Gaso	line Rang	е	
Sample ID: M Client ID: P			ype: ME			tCode: El		8015D: Gaso	line Rang	е	
Client ID: P			ID: 46	922	F		2309	8015D: Gaso	_	e	
Client ID: P	BS	Batch	ID: 46	922 21/2019	F	tunNo: 6	2309		_	e RPDLimit	Qual
Client ID: P Prep Date: 4 Analyte Gasoline Range C	BS 8/20/2019	Batch Analysis Da Result ND	ID: 46 : ate: 8 /	922 /21/2019 SPK value	F S	RunNo: 6 2 SeqNo: 2 1 %REC	2309 117309 LowLimit	Units: mg/K HighLimit	(g		Qual
Client ID: Prep Date: 4	BS 8/20/2019	Batch Analysis Da Result	ID: 46 : ate: 8/ PQL	922 21/2019	F S	RunNo: 62 SeqNo: 2	2309 117309	Units: mg/K	(g		Qual
Client ID: P Prep Date: 4 Analyte Gasoline Range C	BS 8/20/2019 Organics (GRO)	Batch Analysis Da Result ND	ID: 46 : 8/ PQL 5.0	922 21/2019 SPK value 1000	SPK Ref Val	RunNo: 6 : SeqNo: 2 : %REC 91.6	2309 117309 LowLimit 77.4	Units: mg/K HighLimit	(g %RPD	RPDLimit	Qual
Client ID: P Prep Date: 4 Analyte Gasoline Range C Surr: BFB	BS 8/20/2019 Organics (GRO)	Batch Analysis Da Result ND 920 SampTy	ID: 46 : 8/ PQL 5.0	922 (21/2019 SPK value 1000	SPK Ref Val	RunNo: 6 : SeqNo: 2 : %REC 91.6	2309 117309 LowLimit 77.4 PA Method	Units: mg/K HighLimit	(g %RPD	RPDLimit	Qual
Client ID: P Prep Date: 4 Analyte Gasoline Range C Surr: BFB Sample ID: L	BS 8/20/2019 Organics (GRO) CS-46922 CSS	Batch Analysis Da Result ND 920 SampTy	PQL 5.0 ype: LC	922 /21/2019 SPK value 1000 SS 922	SPK Ref Val Tes	8unNo: 6: 6eqNo: 2: %REC 91.6	2309 117309 LowLimit 77.4 PA Method 2309	Units: mg/K HighLimit	(g %RPD	RPDLimit	Qual

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Hall Environmental Analysis Laboratory, Inc.

WO#: **1908B23**

26-Aug-19

Client: Vertex Resource Group Ltd.

Project: Rick Declard 25 28 4

Sample ID: LCS-46922 SampType: LCS TestCode: EPA Method 8015D: Gasoline Range

Client ID: LCSS Batch ID: 46922 RunNo: 62309

Prep Date: 8/20/2019 Analysis Date: 8/21/2019 SeqNo: 2117310 Units: mg/Kg

PQL SPK value SPK Ref Val %REC HighLimit %RPD **RPDLimit** Analyte Result LowLimit Qual 0 Gasoline Range Organics (GRO) 22 5.0 25.00 88.1 80 120

Surr: BFB 1000 1000 100 77.4 118

Sample ID: 1908B23-001AMS SampType: MS TestCode: EPA Method 8015D: Gasoline Range

Client ID: **BG19-01 0'** Batch ID: **46922** RunNo: **62309**

Prep Date: 8/20/2019 Analysis Date: 8/21/2019 SeqNo: 2117312 Units: mg/Kg

Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Gasoline Range Organics (GRO) 4.6 23.21 0 92.5 69.1 142

77.4

118

103

Sample ID: 1908B23-001AMSD SampType: MSD TestCode: EPA Method 8015D: Gasoline Range

928.5

Client ID: **BG19-01 0'** Batch ID: **46922** RunNo: **62309**

950

Prep Date: 8/20/2019 Analysis Date: 8/21/2019 SeqNo: 2117313 Units: mg/Kg

SPK value SPK Ref Val %REC %RPD **RPDLimit** Result PQL LowLimit HighLimit Qual Analyte Gasoline Range Organics (GRO) 22 4.7 23.65 0 91.7 69.1 142 1.05 20 Surr: BFB 1000 946.1 107 77.4 0 0 118

Qualifiers:

Surr: BFB

Value exceeds Maximum Contaminant Level

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quantitative Limit

S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Limit

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Hall Environmental Analysis Laboratory, Inc.

WO#: **1908B23**

26-Aug-19

Client: Vertex Resource Group Ltd.

Project: Rick Declard 25 28 4

Sample ID: MB-46923 SampType: MBLK TestCode: EPA Method 8021B: Volatiles Client ID: PBS Batch ID: 46923 RunNo: 62310 Prep Date: 8/20/2019 Analysis Date: 8/21/2019 SeqNo: 2117256 Units: mq/Kq PQL SPK value SPK Ref Val %REC %RPD **RPDLimit** Analyte LowLimit HighLimit Qual Benzene ND 0.025 Toluene ND 0.050 ND 0.050 Ethylbenzene Xylenes, Total ND 0.10 Surr: 4-Bromofluorobenzene 0.95 1.000 94.9 80 120

Sample ID: LCS-46923 SampType: LCS TestCode: EPA Method 8021B: Volatiles Client ID: LCSS Batch ID: 46923 RunNo: 62310 Analysis Date: 8/21/2019 SeqNo: 2117257 Prep Date: 8/20/2019 Units: mg/Kg PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual 0.025 1.000 0.95 n 95.3 80 120 Benzene Toluene 0.96 0.050 1.000 0 96.5 80 120 0.99 0 98.6 80 0.050 1.000 120 Ethylbenzene 0 97.9 Xylenes, Total 2.9 0.10 3.000 80 120 Surr: 4-Bromofluorobenzene 1.0 1.000 103 80 120

Sample ID: 1908B23-022AMS SampType: MS TestCode: EPA Method 8021B: Volatiles Client ID: Base 19-19 3' Batch ID: 46923 RunNo: 62310 Prep Date: 8/20/2019 Analysis Date: 8/21/2019 SeqNo: 2117260 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual 101 76 0.97 0.024 0.9588 123 Benzene O Toluene 0.048 0.9588 0 104 80.3 127 1.0 0.9588 0 108 80.2 131 Ethylbenzene 1.0 0.048 Xylenes, Total 3.1 0.096 2.876 0 107 78 133 Surr: 4-Bromofluorobenzene 0.9588 99.2 80 0.95 120

TestCode: EPA Method 8021B: Volatiles Sample ID: 1908B23-022AMSD SampType: MSD Client ID: Base 19-19 3' Batch ID: 46923 RunNo: 62310 Prep Date: 8/20/2019 Analysis Date: 8/21/2019 SeqNo: 2117261 Units: mg/Kg SPK value SPK Ref Val %REC **RPDLimit** Analyte Result PQL LowLimit HighLimit %RPD Qual 0.96 0.024 0.9737 0 98.9 76 123 0.264 20 Benzene Toluene 0.99 0.049 0.9737 0 102 80.3 127 0.593 20 Ethylbenzene 1.0 0.049 0.9737 0 106 80.2 131 0.234 20 Xylenes, Total 3.1 0.097 2.921 0 105 78 133 0.238 20 Surr: 4-Bromofluorobenzene 0.99 0.9737 102 80 120 0 0

Qualifiers:

- Value exceeds Maximum Contaminant Level
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Hall Environmental Analysis Laboratory, Inc.

WO#: **1908B23**

26-Aug-19

Client: Vertex Resource Group Ltd.

Project: Rick Declard 25 28 4

Sample ID: MB-46922 SampType: MBLK TestCode: EPA Method 8021B: Volatiles Client ID: PBS Batch ID: 46922 RunNo: 62309 Prep Date: 8/20/2019 Analysis Date: 8/21/2019 SeqNo: 2117349 Units: mq/Kq PQL SPK value SPK Ref Val %REC %RPD **RPDLimit** Analyte LowLimit HighLimit Qual Benzene ND 0.025 Toluene ND 0.050 ND 0.050 Ethylbenzene Xylenes, Total ND 0.10 Surr: 4-Bromofluorobenzene 0.94 1.000 93.6 80 120

Sample ID: LCS-46922 SampType: LCS TestCode: EPA Method 8021B: Volatiles Client ID: LCSS Batch ID: 46922 RunNo: 62309 Analysis Date: 8/21/2019 SeqNo: 2117350 Prep Date: 8/20/2019 Units: mg/Kg PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual 0.025 1.000 94.8 0.95 n 80 120 Benzene Toluene 0.98 0.050 1.000 0 97.6 80 120 0 97.9 80 0.98 0.050 1.000 120 Ethylbenzene 0 99.4 Xylenes, Total 3.0 0.10 3.000 80 120 0.93 Surr: 4-Bromofluorobenzene 1.000 93.3 80 120

Sample ID: 1908B23-002AMS SampType: MS TestCode: EPA Method 8021B: Volatiles Client ID: BG19-01 1' Batch ID: 46922 RunNo: 62309 Prep Date: 8/20/2019 Analysis Date: 8/21/2019 SeqNo: 2117353 Units: mg/Kg Analyte Result PQL SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual 101 76 0.97 0.024 0.9643 n 123 Benzene Toluene 0.048 0.9643 0.009213 105 80.3 127 1.0 0 106 80.2 Ethylbenzene 1.0 0.048 0.9643 131 Xylenes, Total 3.1 0.096 2.893 0 107 78 133 Surr: 4-Bromofluorobenzene 0.9643 80 0.91 94.2 120

TestCode: EPA Method 8021B: Volatiles Sample ID: 1908B23-002AMSD SampType: MSD Client ID: BG19-01 1' Batch ID: 46922 RunNo: 62309 Prep Date: 8/20/2019 Analysis Date: 8/21/2019 SeqNo: 2117354 Units: mg/Kg SPK value SPK Ref Val %REC **RPDLimit** Analyte Result PQL LowLimit HighLimit %RPD Qual 0.98 0.024 0.9533 0 102 76 123 0.265 20 Benzene Toluene 1.0 0.048 0.9533 0.009213 106 80.3 127 0.264 20 Ethylbenzene 1.0 0.048 0.9533 0 107 80.2 131 0.353 20 Xylenes, Total 3.1 0.095 2.860 0 108 78 133 0.711 20 Surr: 4-Bromofluorobenzene 0.88 0.9533 92.4 80 120 0 0

Qualifiers:

- * Value exceeds Maximum Contaminant Level
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Hall Environmental Analysis Laboratory 4901 Hawkins NE Albuquerque, NM 87109

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

Sample Log-In Check List

Client Name: VERTEX CAR	LSBAD Work Order Nur	mber: 1908B23		RcptNo: 1	
Received By: Daniel M					
Completed By: Yazmine Gar	duno 8/20/2019/10:10:2	28 AM	Africaire leffodoite		
Chain of Custody					
1. Is Chain of Custody complete	?	Yes 🗸	No 🗌	Not Present	
2. How was the sample delivered	1?	Courier			
Log In 3. Was an attempt made to cool	the samples?	Yes 🗹	No 🗌	NA 🗆	
4. Were all samples received at a	a temperature of >0° C to 6.0°C	Yes 🗸	No 🗆	na 🗆	
5. Sample(s) in proper container	(s)?	Yes 🗹	No 🗌		
6. Sufficient sample volume for in	dicated test(s)?	Yes 🗹	No 🗌		
7. Are samples (except VOA and	ONG) properly preserved?	Yes 🗸	No 🗌		
8. Was preservative added to bot	tles?	Yes	No 🗹	NA \square	
9. VOA vials have zero headspac	e?	Yes	No 🗌 N	No VOA Vials 🗸	
10, Were any sample containers r	eceived broken?	Yes		of preserved	
11. Does paperwork match bottle I (Note discrepancies on chain o		Yes 🗹		oottles checked for pH: (<2 or = 12	2 unless noted)
12. Are matrices correctly identified	d on Chain of Custody?	Yes 🗹	No 🗆	Adjusted?	
13. Is it clear what analyses were r	•	Yes 🗹	No 🗆		
 Were all holding times able to I (If πο, notify customer for authority) 		Yes 🗹	.No 🗆	Checked by: DAL	8/20/19
Special Handling (if applic	able)				
15. Was client notified of all discre	pancies with this order?	Yes	No 🗆	NA 🗹	
Person Notified: By Whom: Regarding: Client Instructions:	Date Via:	eMail P	hone Fax	In Person	
16. Additional remarks:					
17. Cooler Information Cooler No Temp °C C 1 4.8 Go 2 3.4 Go 3 4.2 Go	od	Seal Date	Signed By		

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	Chain	Of-C	sord	Turn-Around	Time:	2-70				•	Ī		ָ בַּ			ŀ	
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213	14	Men 59	Steel Gulsbed Nm	Project #:				T e	05-34	Tel. 505-345-3975		Fax 5	05-345	505-345-4107	<u> </u>		
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email	email or Fax#:	elwill.	CE	Project Manager:	l,						[†] O5		(Ju		_		
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	Chain-of-Custody Record	group			Carlsbad, nm	1137	email or Fax#: dw///ours/QVcr?rk,	QA/QC Package: Perminant Vertorion	☐ Level 4 (Full Validation)	☐ Az Compliance ☐ Other			Sample Name	Base 19-10	Base 19-11	Besc 19-12	Basc 19-13	Base 19-14	Base 19-15	Base 19-16	Bese 19-17	Bese 19-18	Base 18-18	Base Mezo	Base 19-21	Time: Relinquished by: 12. Sp. Austra Harris	. Kay Be		if necessary, samples submitted to Hall Environmental may be subcontracted to other accredited laboratories.
	-of-C	Client: Vertex Restorex	0.1	 	5 6	198 5	Lw1110	Permia			1 11		Motric	501/								_			~	Relinquished by:	Relinquished by	1	, samples sub
	hain	Vertex	Nasoznan	Mailing Address:	213 5 mcsa	Phone #: 575	or Fax#:	Package:	ndard	Accreditation:	□ EDD (Type)		<u> </u>		50:11	11:10	11:15	11:20	52:11	11.30	11:95	11.40	54:13	11.50			Time:		If necessary
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	HAI ENVIDONMENTAL	ANALYSTS LABORATORY	The state of the s	4901 Hawkins NE - Albuqueraue, NM 87109	Tel. 505-345-3975 Fax 505-345-4107	Analysis Kequest	SIWS	0 / DRG 1/8082 H 04.1) 3/1 82703 1 (sON H	GPG sebi 10 or tals tals	TEX MT PH; 8015D(081 Pestic AHs by 83 CRA 8 Me 250 (VOA) 270 (Semi- otal Colifor	8							Remarks:	3.9+0.3=42°C	This serves as notice of this possibility. Any sub-contracted data will be clearly notated on the analytical report.
Tim-Around Time.	The /	☐ Standard ■ Rush	Project Name:	Rick duckerd 25 28 4	48220 Project#:		Project Manager: Usnnis Williams	Sampler: Austra Harris	S: S	(including CE): Rupucko								Williams Oute Time	Keceived by: Via: Date lime $ U $	⊢ −
	-or-custody Record	Vertex Resource groop	n 011	Mailing Address:	5 carlsbad NM	FIIOTIE#, 2 / 56/ //5/	Email or Fax#: <u>duillanga Verter, Ca</u> F QA/QC Package: Reminn のVerter, C 中 E Standard	n:	ype)	Matrix Sample Name	9 12:00 5011 Base 19-22 0.5"						i d	HerrisAlf	2	In necessary, samples submitted to Hall Environmental may be subcontracted to other accredited laboratories.



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

September 04, 2019

Dennis Williams
Vertex Resource Group Ltd.
213 S. Mesa St
Carlsbad, NM 88220
TEL:
FAX

RE: Rick Deckard State 25 28 4 WA 2H OrderNo.: 1908F01

Dear Dennis Williams:

Hall Environmental Analysis Laboratory received 11 sample(s) on 8/27/2019 for the analyses presented in the following report.

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

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

ADHS Cert #AZ0682 -- NMED-DWB Cert #NM9425 -- NMED-Micro Cert #NM0901

Sincerely,

Andy Freeman

Laboratory Manager

andyl

4901 Hawkins NE

Albuquerque, NM 87109

Date Reported: 9/4/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-02 1.0'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 9:00:00 AM

 Lab ID: 1908F01-001
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst: BRM
Diesel Range Organics (DRO)	ND	9.6	mg/Kg	1	8/27/2019 2:26:38 PM
Motor Oil Range Organics (MRO)	ND	48	mg/Kg	1	8/27/2019 2:26:38 PM
Surr: DNOP	115	70-130	%Rec	1	8/27/2019 2:26:38 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	ND	60	mg/Kg	20	8/27/2019 8:12:17 PM
EPA METHOD 8260B: VOLATILES SHORT LIS	ST				Analyst: RAA
Benzene	ND	0.021	mg/Kg	1	8/27/2019 10:45:23 PM
Toluene	ND	0.042	mg/Kg	1	8/27/2019 10:45:23 PM
Ethylbenzene	ND	0.042	mg/Kg	1	8/27/2019 10:45:23 PM
Xylenes, Total	ND	0.083	mg/Kg	1	8/27/2019 10:45:23 PM
Surr: 1,2-Dichloroethane-d4	97.9	70-130	%Rec	1	8/27/2019 10:45:23 PM
Surr: 4-Bromofluorobenzene	93.6	70-130	%Rec	1	8/27/2019 10:45:23 PM
Surr: Dibromofluoromethane	105	70-130	%Rec	1	8/27/2019 10:45:23 PM
Surr: Toluene-d8	99.8	70-130	%Rec	1	8/27/2019 10:45:23 PM
EPA METHOD 8015D MOD: GASOLINE RANG	E				Analyst: RAA
Gasoline Range Organics (GRO)	ND	4.2	mg/Kg	1	8/27/2019 10:45:23 PM
Surr: BFB	99.4	70-130	%Rec	1	8/27/2019 10:45:23 PM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Date Reported: 9/4/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd.

Client Sample ID: Base19-03 1.0'

Project: Rick Deckard State 25 28 4 WA 2H **Collection Date:** 8/24/2019 9:15:00 AM

Lab ID: 1908F01-002 **Matrix:** MEOH (SOIL) **Received Date:** 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORGA	ANICS				Analyst: BRM
Diesel Range Organics (DRO)	ND	10	mg/Kg	1	8/27/2019 2:51:00 PM
Motor Oil Range Organics (MRO)	ND	50	mg/Kg	1	8/27/2019 2:51:00 PM
Surr: DNOP	104	70-130	%Rec	1	8/27/2019 2:51:00 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	ND	60	mg/Kg	20	8/27/2019 8:49:30 PM
EPA METHOD 8260B: VOLATILES SHORT LIST	Γ				Analyst: RAA
Benzene	ND	0.017	mg/Kg	1	8/28/2019 12:11:59 AM
Toluene	ND	0.034	mg/Kg	1	8/28/2019 12:11:59 AM
Ethylbenzene	ND	0.034	mg/Kg	1	8/28/2019 12:11:59 AM
Xylenes, Total	ND	0.068	mg/Kg	1	8/28/2019 12:11:59 AM
Surr: 1,2-Dichloroethane-d4	97.2	70-130	%Rec	1	8/28/2019 12:11:59 AM
Surr: 4-Bromofluorobenzene	97.8	70-130	%Rec	1	8/28/2019 12:11:59 AM
Surr: Dibromofluoromethane	105	70-130	%Rec	1	8/28/2019 12:11:59 AM
Surr: Toluene-d8	98.8	70-130	%Rec	1	8/28/2019 12:11:59 AM
EPA METHOD 8015D MOD: GASOLINE RANGE	į				Analyst: RAA
Gasoline Range Organics (GRO)	ND	3.4	mg/Kg	1	8/28/2019 12:11:59 AM
Surr: BFB	100	70-130	%Rec	1	8/28/2019 12:11:59 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Page 2 of 17

Date Reported: 9/4/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-12 1.5'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 9:30:00 AM

 Lab ID: 1908F01-003
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS					Analyst: BRM
Diesel Range Organics (DRO)	ND	9.6	mg/Kg	1	8/27/2019 3:15:33 PM
Motor Oil Range Organics (MRO)	ND	48	mg/Kg	1	8/27/2019 3:15:33 PM
Surr: DNOP	103	70-130	%Rec	1	8/27/2019 3:15:33 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	ND	60	mg/Kg	20	8/27/2019 9:01:55 PM
EPA METHOD 8260B: VOLATILES SHORT LIS	ST				Analyst: RAA
Benzene	ND	0.018	mg/Kg	1	8/28/2019 1:38:33 AM
Toluene	ND	0.035	mg/Kg	1	8/28/2019 1:38:33 AM
Ethylbenzene	ND	0.035	mg/Kg	1	8/28/2019 1:38:33 AM
Xylenes, Total	ND	0.070	mg/Kg	1	8/28/2019 1:38:33 AM
Surr: 1,2-Dichloroethane-d4	97.2	70-130	%Rec	1	8/28/2019 1:38:33 AM
Surr: 4-Bromofluorobenzene	96.3	70-130	%Rec	1	8/28/2019 1:38:33 AM
Surr: Dibromofluoromethane	105	70-130	%Rec	1	8/28/2019 1:38:33 AM
Surr: Toluene-d8	101	70-130	%Rec	1	8/28/2019 1:38:33 AM
EPA METHOD 8015D MOD: GASOLINE RANG	E				Analyst: RAA
Gasoline Range Organics (GRO)	ND	3.5	mg/Kg	1	8/28/2019 1:38:33 AM
Surr: BFB	102	70-130	%Rec	1	8/28/2019 1:38:33 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Page 3 of 17

Date Reported: 9/4/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-14 1.5'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 9:45:00 AM

 Lab ID: 1908F01-004
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS					Analyst: BRM
Diesel Range Organics (DRO)	ND	8.5	mg/Kg	1	8/27/2019 3:39:57 PM
Motor Oil Range Organics (MRO)	ND	43	mg/Kg	1	8/27/2019 3:39:57 PM
Surr: DNOP	102	70-130	%Rec	1	8/27/2019 3:39:57 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	270	60	mg/Kg	20	8/27/2019 9:39:08 PM
EPA METHOD 8260B: VOLATILES SHORT LIST	•				Analyst: RAA
Benzene	ND	0.018	mg/Kg	1	8/28/2019 2:07:33 AM
Toluene	ND	0.037	mg/Kg	1	8/28/2019 2:07:33 AM
Ethylbenzene	ND	0.037	mg/Kg	1	8/28/2019 2:07:33 AM
Xylenes, Total	ND	0.073	mg/Kg	1	8/28/2019 2:07:33 AM
Surr: 1,2-Dichloroethane-d4	97.1	70-130	%Rec	1	8/28/2019 2:07:33 AM
Surr: 4-Bromofluorobenzene	95.4	70-130	%Rec	1	8/28/2019 2:07:33 AM
Surr: Dibromofluoromethane	104	70-130	%Rec	1	8/28/2019 2:07:33 AM
Surr: Toluene-d8	96.3	70-130	%Rec	1	8/28/2019 2:07:33 AM
EPA METHOD 8015D MOD: GASOLINE RANGE					Analyst: RAA
Gasoline Range Organics (GRO)	ND	3.7	mg/Kg	1	8/28/2019 2:07:33 AM
Surr: BFB	99.2	70-130	%Rec	1	8/28/2019 2:07:33 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Lab Order **1908F01**Date Reported: **9/4/2019**

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-15 1.5'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 10:00:00 AM

 Lab ID: 1908F01-005
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORGANICS					Analyst: BRM
Diesel Range Organics (DRO)	ND	9.3	mg/Kg	1	8/27/2019 4:04:31 PM
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/27/2019 4:04:31 PM
Surr: DNOP	104	70-130	%Rec	1	8/27/2019 4:04:31 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	ND	60	mg/Kg	20	8/27/2019 9:51:33 PM
EPA METHOD 8260B: VOLATILES SHORT L	IST				Analyst: RAA
Benzene	ND	0.019	mg/Kg	1	8/28/2019 2:36:27 AM
Toluene	ND	0.037	mg/Kg	1	8/28/2019 2:36:27 AM
Ethylbenzene	ND	0.037	mg/Kg	1	8/28/2019 2:36:27 AM
Xylenes, Total	ND	0.074	mg/Kg	1	8/28/2019 2:36:27 AM
Surr: 1,2-Dichloroethane-d4	101	70-130	%Rec	1	8/28/2019 2:36:27 AM
Surr: 4-Bromofluorobenzene	92.1	70-130	%Rec	1	8/28/2019 2:36:27 AM
Surr: Dibromofluoromethane	107	70-130	%Rec	1	8/28/2019 2:36:27 AM
Surr: Toluene-d8	97.6	70-130	%Rec	1	8/28/2019 2:36:27 AM
EPA METHOD 8015D MOD: GASOLINE RAN	GE				Analyst: RAA
Gasoline Range Organics (GRO)	ND	3.7	mg/Kg	1	8/28/2019 2:36:27 AM
Surr: BFB	96.4	70-130	%Rec	1	8/28/2019 2:36:27 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported: 9/4/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-16 1.0'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 10:15:00 AM

 Lab ID: 1908F01-006
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst: BRM
Diesel Range Organics (DRO)	ND	9.4	mg/Kg	1	8/27/2019 4:28:57 PM
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/27/2019 4:28:57 PM
Surr: DNOP	106	70-130	%Rec	1	8/27/2019 4:28:57 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	ND	60	mg/Kg	20	8/27/2019 10:03:58 PM
EPA METHOD 8260B: VOLATILES SHORT LIS	ST				Analyst: RAA
Benzene	ND	0.019	mg/Kg	1	8/28/2019 3:05:19 AM
Toluene	ND	0.038	mg/Kg	1	8/28/2019 3:05:19 AM
Ethylbenzene	ND	0.038	mg/Kg	1	8/28/2019 3:05:19 AM
Xylenes, Total	ND	0.077	mg/Kg	1	8/28/2019 3:05:19 AM
Surr: 1,2-Dichloroethane-d4	97.5	70-130	%Rec	1	8/28/2019 3:05:19 AM
Surr: 4-Bromofluorobenzene	97.3	70-130	%Rec	1	8/28/2019 3:05:19 AM
Surr: Dibromofluoromethane	106	70-130	%Rec	1	8/28/2019 3:05:19 AM
Surr: Toluene-d8	97.6	70-130	%Rec	1	8/28/2019 3:05:19 AM
EPA METHOD 8015D MOD: GASOLINE RANG	E				Analyst: RAA
Gasoline Range Organics (GRO)	ND	3.8	mg/Kg	1	8/28/2019 3:05:19 AM
Surr: BFB	101	70-130	%Rec	1	8/28/2019 3:05:19 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Analytical Report

Lab Order **1908F01**Date Reported: **9/4/2019**

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-17 2.0'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 10:30:00 AM

 Lab ID: 1908F01-007
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst: BRM
Diesel Range Organics (DRO)	ND	9.7	mg/Kg	1	8/27/2019 4:53:31 PM
Motor Oil Range Organics (MRO)	ND	48	mg/Kg	1	8/27/2019 4:53:31 PM
Surr: DNOP	106	70-130	%Rec	1	8/27/2019 4:53:31 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	110	60	mg/Kg	20	8/27/2019 10:16:22 PM
EPA METHOD 8260B: VOLATILES SHORT LIS	ST				Analyst: RAA
Benzene	ND	0.020	mg/Kg	1	8/28/2019 3:34:14 AM
Toluene	ND	0.040	mg/Kg	1	8/28/2019 3:34:14 AM
Ethylbenzene	ND	0.040	mg/Kg	1	8/28/2019 3:34:14 AM
Xylenes, Total	ND	0.081	mg/Kg	1	8/28/2019 3:34:14 AM
Surr: 1,2-Dichloroethane-d4	100	70-130	%Rec	1	8/28/2019 3:34:14 AM
Surr: 4-Bromofluorobenzene	93.0	70-130	%Rec	1	8/28/2019 3:34:14 AM
Surr: Dibromofluoromethane	106	70-130	%Rec	1	8/28/2019 3:34:14 AM
Surr: Toluene-d8	98.2	70-130	%Rec	1	8/28/2019 3:34:14 AM
EPA METHOD 8015D MOD: GASOLINE RANG	E				Analyst: RAA
Gasoline Range Organics (GRO)	ND	4.0	mg/Kg	1	8/28/2019 3:34:14 AM
Surr: BFB	97.4	70-130	%Rec	1	8/28/2019 3:34:14 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Hall Environmental Analysis Laboratory, Inc.

Date Reported: 9/4/2019

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-18 1.0'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 10:45:00 AM

 Lab ID: 1908F01-008
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORG	SANICS				Analyst: BRM
Diesel Range Organics (DRO)	ND	10	mg/Kg	1	8/27/2019 5:18:02 PM
Motor Oil Range Organics (MRO)	ND	50	mg/Kg	1	8/27/2019 5:18:02 PM
Surr: DNOP	103	70-130	%Rec	1	8/27/2019 5:18:02 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	280	59	mg/Kg	20	8/27/2019 10:28:47 PM
EPA METHOD 8260B: VOLATILES SHORT LIS	ST				Analyst: RAA
Benzene	ND	0.022	mg/Kg	1	8/28/2019 4:03:10 AM
Toluene	ND	0.044	mg/Kg	1	8/28/2019 4:03:10 AM
Ethylbenzene	ND	0.044	mg/Kg	1	8/28/2019 4:03:10 AM
Xylenes, Total	ND	0.088	mg/Kg	1	8/28/2019 4:03:10 AM
Surr: 1,2-Dichloroethane-d4	97.5	70-130	%Rec	1	8/28/2019 4:03:10 AM
Surr: 4-Bromofluorobenzene	94.6	70-130	%Rec	1	8/28/2019 4:03:10 AM
Surr: Dibromofluoromethane	104	70-130	%Rec	1	8/28/2019 4:03:10 AM
Surr: Toluene-d8	97.9	70-130	%Rec	1	8/28/2019 4:03:10 AM
EPA METHOD 8015D MOD: GASOLINE RANG	E				Analyst: RAA
Gasoline Range Organics (GRO)	ND	4.4	mg/Kg	1	8/28/2019 4:03:10 AM
Surr: BFB	97.9	70-130	%Rec	1	8/28/2019 4:03:10 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Hall Environmental Analysis Laboratory, Inc.

Date Reported: 9/4/2019

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-19 3.5'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 11:00:00 AM

 Lab ID: 1908F01-009
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORG	GANICS				Analyst: BRM
Diesel Range Organics (DRO)	ND	9.9	mg/Kg	1	8/27/2019 5:42:28 PM
Motor Oil Range Organics (MRO)	ND	49	mg/Kg	1	8/27/2019 5:42:28 PM
Surr: DNOP	111	70-130	%Rec	1	8/27/2019 5:42:28 PM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	320	60	mg/Kg	20	8/27/2019 10:41:11 PM
EPA METHOD 8260B: VOLATILES SHORT LIS	ST				Analyst: RAA
Benzene	ND	0.021	mg/Kg	1	8/28/2019 4:32:08 AM
Toluene	ND	0.042	mg/Kg	1	8/28/2019 4:32:08 AM
Ethylbenzene	ND	0.042	mg/Kg	1	8/28/2019 4:32:08 AM
Xylenes, Total	ND	0.084	mg/Kg	1	8/28/2019 4:32:08 AM
Surr: 1,2-Dichloroethane-d4	98.8	70-130	%Rec	1	8/28/2019 4:32:08 AM
Surr: 4-Bromofluorobenzene	95.4	70-130	%Rec	1	8/28/2019 4:32:08 AM
Surr: Dibromofluoromethane	104	70-130	%Rec	1	8/28/2019 4:32:08 AM
Surr: Toluene-d8	97.2	70-130	%Rec	1	8/28/2019 4:32:08 AM
EPA METHOD 8015D MOD: GASOLINE RANG	SE .				Analyst: RAA
Gasoline Range Organics (GRO)	ND	4.2	mg/Kg	1	8/28/2019 4:32:08 AM
Surr: BFB	99.7	70-130	%Rec	1	8/28/2019 4:32:08 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Hall Environmental Analysis Laboratory, Inc.

Date Reported: 9/4/2019

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-20 1.0'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 11:15:00 AM

 Lab ID: 1908F01-010
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE ORGA	ANICS				Analyst: JME
Diesel Range Organics (DRO)	ND	9.3	mg/Kg	1	8/28/2019 8:58:06 AM
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/28/2019 8:58:06 AM
Surr: DNOP	91.1	70-130	%Rec	1	8/28/2019 8:58:06 AM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	160	60	mg/Kg	20	8/27/2019 11:18:25 PM
EPA METHOD 8260B: VOLATILES SHORT LIS	т				Analyst: RAA
Benzene	ND	0.020	mg/Kg	1	8/28/2019 5:01:03 AM
Toluene	ND	0.041	mg/Kg	1	8/28/2019 5:01:03 AM
Ethylbenzene	ND	0.041	mg/Kg	1	8/28/2019 5:01:03 AM
Xylenes, Total	ND	0.082	mg/Kg	1	8/28/2019 5:01:03 AM
Surr: 1,2-Dichloroethane-d4	102	70-130	%Rec	1	8/28/2019 5:01:03 AM
Surr: 4-Bromofluorobenzene	93.8	70-130	%Rec	1	8/28/2019 5:01:03 AM
Surr: Dibromofluoromethane	107	70-130	%Rec	1	8/28/2019 5:01:03 AM
Surr: Toluene-d8	99.0	70-130	%Rec	1	8/28/2019 5:01:03 AM
EPA METHOD 8015D MOD: GASOLINE RANGE					Analyst: RAA
Gasoline Range Organics (GRO)	ND	4.1	mg/Kg	1	8/28/2019 5:01:03 AM
Surr: BFB	97.1	70-130	%Rec	1	8/28/2019 5:01:03 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Date Reported: 9/4/2019

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Vertex Resource Group Ltd. Client Sample ID: Base19-21 1.0'

Project: Rick Deckard State 25 28 4 WA 2H
 Collection Date: 8/24/2019 11:30:00 AM

 Lab ID: 1908F01-011
 Matrix: MEOH (SOIL)
 Received Date: 8/27/2019 9:15:00 AM

Analyses	Result	RL Qu	al Units	DF	Date Analyzed
EPA METHOD 8015M/D: DIESEL RANGE OR	GANICS				Analyst: JME
Diesel Range Organics (DRO)	ND	9.4	mg/Kg	1	8/28/2019 9:22:08 AM
Motor Oil Range Organics (MRO)	ND	47	mg/Kg	1	8/28/2019 9:22:08 AM
Surr: DNOP	91.9	70-130	%Rec	1	8/28/2019 9:22:08 AM
EPA METHOD 300.0: ANIONS					Analyst: CAS
Chloride	ND	60	mg/Kg	20	8/27/2019 11:30:50 PM
EPA METHOD 8260B: VOLATILES SHORT L	IST				Analyst: RAA
Benzene	ND	0.017	mg/Kg	1	8/28/2019 5:29:49 AM
Toluene	ND	0.035	mg/Kg	1	8/28/2019 5:29:49 AM
Ethylbenzene	ND	0.035	mg/Kg	1	8/28/2019 5:29:49 AM
Xylenes, Total	ND	0.070	mg/Kg	1	8/28/2019 5:29:49 AM
Surr: 1,2-Dichloroethane-d4	99.2	70-130	%Rec	1	8/28/2019 5:29:49 AM
Surr: 4-Bromofluorobenzene	93.8	70-130	%Rec	1	8/28/2019 5:29:49 AM
Surr: Dibromofluoromethane	102	70-130	%Rec	1	8/28/2019 5:29:49 AM
Surr: Toluene-d8	97.6	70-130	%Rec	1	8/28/2019 5:29:49 AM
EPA METHOD 8015D MOD: GASOLINE RAN	GE				Analyst: RAA
Gasoline Range Organics (GRO)	ND	3.5	mg/Kg	1	8/28/2019 5:29:49 AM
Surr: BFB	98.7	70-130	%Rec	1	8/28/2019 5:29:49 AM

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

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- $ND \qquad Not \ Detected \ at \ the \ Reporting \ Limit$
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

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Hall Environmental Analysis Laboratory, Inc.

WO#: **1908F01**

04-Sep-19

Client: Vertex Resource Group Ltd.

Project: Rick Deckard State 25 28 4 WA 2H

Sample ID: MB-47099 SampType: mblk TestCode: EPA Method 300.0: Anions

Client ID: PBS Batch ID: 47099 RunNo: 62447

Prep Date: 8/27/2019 Analysis Date: 8/27/2019 SeqNo: 2124883 Units: mg/Kg

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

Chloride ND 1.5

Sample ID: LCS-47099 SampType: Ics TestCode: EPA Method 300.0: Anions

Client ID: LCSS Batch ID: 47099 RunNo: 62447

Prep Date: 8/27/2019 Analysis Date: 8/27/2019 SeqNo: 2124884 Units: mg/Kg

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

Chloride 14 1.5 15.00 0 94.8 90 110

Qualifiers:

Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Limit

Client:

Hall Environmental Analysis Laboratory, Inc.

Vertex Resource Group Ltd.

WO#: **1908F01**

04-Sep-19

Project: Rick De	eckard State 25 28 4 WA 2H	
Sample ID: MB-47072	SampType: MBLK	TestCode: EPA Method 8015M/D: Diesel Range Organics
Client ID: PBS	Batch ID: 47072	RunNo: 62439
Prep Date: 8/27/2019	Analysis Date: 8/27/2019	SeqNo: 2123214 Units: mg/Kg
Analyte	Result PQL SPK value	e SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual
Diesel Range Organics (DRO)	ND 10	
Motor Oil Range Organics (MRO)	ND 50	
Surr: DNOP	11 10.00	0 106 70 130
Sample ID: LCS-47072	SampType: LCS	TestCode: EPA Method 8015M/D: Diesel Range Organics
Client ID: LCSS	Batch ID: 47072	RunNo: 62439
Prep Date: 8/27/2019	Analysis Date: 8/27/2019	SeqNo: 2123215 Units: mg/Kg
Analyte	Result PQL SPK value	e SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual
Diesel Range Organics (DRO)	44 10 50.00	
Surr: DNOP	4.3 5.000	0 86.7 70 130
Sample ID: MB-47083	SampType: MBLK	TestCode: EPA Method 8015M/D: Diesel Range Organics
Client ID: PBS	Batch ID: 47083	RunNo: 62455
Prep Date: 8/27/2019	Analysis Date: 8/28/2019	SeqNo: 2124830 Units: mg/Kg
Analyte	Result PQL SPK value	e SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual
Diesel Range Organics (DRO)	ND 10	
Motor Oil Range Organics (MRO)	ND 50	
Surr: DNOP	9.5 10.00	0 94.9 70 130
Sample ID: LCS-47083	SampType: LCS	TestCode: EPA Method 8015M/D: Diesel Range Organics
Client ID: LCSS	Batch ID: 47083	RunNo: 62455
Prep Date: 8/27/2019	Analysis Date: 8/28/2019	SeqNo: 2124832 Units: mg/Kg
Analyte	Result PQL SPK value	e SPK Ref Val %REC LowLimit HighLimit %RPD RPDLimit Qual
Diesel Range Organics (DRO)	47 10 50.00	
Surr: DNOP	4.6 5.000	0 91.9 70 130
Sample ID: MB-47096	SampType: MBLK	TestCode: EPA Method 8015M/D: Diesel Range Organics
Client ID: PBS	Batch ID: 47096	RunNo: 62455

Qualifiers:

Analyte

Surr: DNOP

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded

Analysis Date: 8/28/2019

10.00

Result

12

- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit

Prep Date: 8/27/2019

S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

SeqNo: 2126367

117

Units: %Rec

HighLimit

130

70

%RPD

RPDLimit

Qual

- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range

SPK value SPK Ref Val %REC LowLimit

RL Reporting Limit

Hall Environmental Analysis Laboratory, Inc.

WO#: 1908F01

04-Sep-19

Client: Vertex Resource Group Ltd.

Project: Rick Deckard State 25 28 4 WA 2H

Sample ID: LCS-47096 SampType: LCS TestCode: EPA Method 8015M/D: Diesel Range Organics

Client ID: LCSS Batch ID: 47096 RunNo: 62455

Prep Date: 8/27/2019 Analysis Date: 8/28/2019 SeqNo: 2126368 Units: %Rec

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

Surr: DNOP 5.5 5.000 109 70 130

Qualifiers:

Value exceeds Maximum Contaminant Level.

D Sample Diluted Due to Matrix

H Holding times for preparation or analysis exceeded

ND Not Detected at the Reporting Limit

PQL Practical Quanitative Limit

B Analyte detected in the associated Method Blank

E Value above quantitation range

J Analyte detected below quantitation limits

P Sample pH Not In Range

RL Reporting Limit

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Hall Environmental Analysis Laboratory, Inc.

WO#: 1908F01

04-Sep-19

Client: Vertex Resource Group Ltd.

Project: Rick Deckard State 25 28 4 WA 2H

Sample ID: 100ng lcs2	Samp1	Гуре: LC	S	TestCode: EPA Method 8260B: Volatiles Short List							
Client ID: LCSS	Batc	h ID: SL	62453	F	RunNo: 62453						
Prep Date:	Analysis Date: 8/27/2019			SeqNo: 2123755			Units: mg/Kg				
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual	
Benzene	0.96	0.025	1.000	0	95.6	68	135				
Toluene	1.0	0.050	1.000	0	100	70	130				
Surr: 1,2-Dichloroethane-d4	0.48		0.5000		95.2	70	130				
Surr: 4-Bromofluorobenzene	0.48		0.5000		95.1	70	130				
Surr: Dibromofluoromethane	0.50		0.5000		100	70	130				
Surr: Toluene-d8	0.50		0.5000		99.8	70	130				

Sample ID: 1908f01-001a ms	SampT	SampType: MS TestCode: EPA Metho						iles Short	List	
Client ID: Base19-02 1.0'	Batch	ı ID: SL	62453	F	RunNo: 62453					
Prep Date:	Analysis D	analysis Date: 8/27/2019 SeqNo: 2123757				Units: mg/Kg				
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	0.81	0.021	0.8347	0	96.9	57.1	141			
Toluene	0.77	0.042	0.8347	0	91.9	70	130			
Surr: 1,2-Dichloroethane-d4	0.42		0.4174		102	70	130			
Surr: 4-Bromofluorobenzene	0.41		0.4174		98.0	70	130			
Surr: Dibromofluoromethane	0.44		0.4174		106	70	130			
Surr: Toluene-d8	0.41		0.4174		98.1	70	130			

Sample ID: 1908f01-001a msd	SampT	ampType: MSD TestCode: EPA Metho						iles Short	List			
Client ID: Base19-02 1.0'	Batch	n ID: SL	62453	F	RunNo: 62453							
Prep Date:	Analysis D	ate: 8/ 2	27/2019	8	SeqNo: 2123758 Units: mg/				Kg			
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual		
Benzene	0.75	0.021	0.8347	0	89.7	57.1	141	7.70	20			
Toluene	0.75	0.042	0.8347	0	89.4	70	130	2.74	20			
Surr: 1,2-Dichloroethane-d4	0.42		0.4174		101	70	130	0	0			
Surr: 4-Bromofluorobenzene	0.41		0.4174		97.9	70	130	0	0			
Surr: Dibromofluoromethane	0.44		0.4174		105	70	130	0	0			
Surr: Toluene-d8	0.41		0.4174		97.1	70	130	0	0			

Sample ID: rb2	SampType: MBLK			TestCode: EPA Method 8260B: Volatiles Short List							
Client ID: PBS	Batch ID: SL62453		RunNo: 62453								
Prep Date:	Analysis Date: 8/27/2019			8	SeqNo: 2123769			Units: mg/Kg			
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual	
Benzene	ND	0.025									
Toluene	ND	0.050									
Ethylbenzene	ND	0.050									
Xylenes, Total	ND	0.10									

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Page 15 of 17

Hall Environmental Analysis Laboratory, Inc.

WO#: **1908F01**

04-Sep-19

Client: Vertex Resource Group Ltd.

Project: Rick Deckard State 25 28 4 WA 2H

Sample ID: rb2 SampType: MBLK TestCode: EPA Method 8260B: Volatiles Short List Client ID: PBS Batch ID: SL62453 RunNo: 62453 Prep Date: Analysis Date: 8/27/2019 SeqNo: 2123769 Units: mg/Kg Analyte Result SPK value SPK Ref Val %REC LowLimit HighLimit %RPD **RPDLimit** Qual Surr: 1,2-Dichloroethane-d4 0.45 0.5000 91.0 70 130 Surr: 4-Bromofluorobenzene 0.48 0.5000 95.6 70 130 Surr: Dibromofluoromethane 0.48 0.5000 96.7 70 130 Surr: Toluene-d8 0.49 0.5000 97.1 70 130

Qualifiers:

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit

Hall Environmental Analysis Laboratory, Inc.

480

500.0

WO#: **1908F01**

04-Sep-19

Client:	Vertex Resource Group Ltd.
Project:	Rick Deckard State 25 28 4 WA 2H

Project: Rick Dec											
Sample ID: 1908f01-002a ms	SampT	ype: MS	3	Tes	tCode: El	PA Method	8015D Mod:	Gasoline	Range		
Client ID: Base19-03 1.0'	Batch	n ID: GS	662453	F	RunNo: 6 2	2453					
Prep Date:	Analysis D	ate: 8/	28/2019	5	SeqNo: 2123773			Units: mg/Kg			
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual	
Gasoline Range Organics (GRO)	16	3.4	17.07	0	91.4	70	130				
Surr: BFB	340		341.3		100	70	130				
Sample ID: 1908f01-002a msc	s SampT	ype: MS	SD	Tes	tCode: El	PA Method	8015D Mod:	Gasoline	Range		
Client ID: Base19-03 1.0'	Batch	n ID: GS	62453	RunNo: 62453							
Prep Date:	Analysis D	Analysis Date: 8/28/2019			SeqNo: 2123774			Units: mg/Kg			
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual	
Gasoline Range Organics (GRO)	15	3.4	17.07	0	90.4	70	130	1.14	20		
Surr: BFB	350		341.3		103	70	130	0	0		
Sample ID: 2.5ug gro lcs2	SampT	ype: LC	s	TestCode: EPA Method 8015D Mod: Gasoline Range							
Client ID: LCSS	Batch	n ID: GS	62453	RunNo: 62453							
Prep Date:	Analysis D	ate: 8/	27/2019	5	SeqNo: 2	123784	Units: mg/Kg				
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual	
Gasoline Range Organics (GRO)	24	5.0	25.00	0	96.8	70	130				
Surr: BFB	490		500.0		98.2	70	130				
Sample ID: rb2	SampT	ype: ME	BLK	Tes	tCode: El	PA Method	8015D Mod:	Gasoline	Range		
Client ID: PBS	Batch	n ID: GS	662453	F	RunNo: 6	2453					
Prep Date:	Analysis D	ate: 8/	27/2019	SeqNo: 2123785			Units: mg/Kg				
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual	

Qualifiers:

Surr: BFB

- Value exceeds Maximum Contaminant Level.
- D Sample Diluted Due to Matrix
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- PQL Practical Quanitative Limit
- S % Recovery outside of range due to dilution or matrix

B Analyte detected in the associated Method Blank

96.3

70

130

- E Value above quantitation range
- J Analyte detected below quantitation limits
- P Sample pH Not In Range
- RL Reporting Limit



Hall Environmental Analysis Laboratory 4901 Hawkins NE Albuquerque, NM 87109

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

Sample Log-In Check List

Client Name:	VERTEX CA	ARLSBAD	Work	Order Num	ber: 190	8F01			RcptN	lo: 1	
Received By:	Daniel	M.	8/27/20	19 9:15:00	AM						
Completed By:	Michelle G	arcia	8/27/20	19 9:51:18	AM		mi) مللتا	bue)		
Reviewed By:	M		OS	77/19			·		farcia)		
Chain of Cu	stody		,								
1. Is Chain of C		ete?			Yes	✓	No		Not Present		
2. How was the	e sample delive	ered?			<u>Cou</u>	<u>rier</u>					
<u>Log In</u> 3. Was an atter	mpt made to co	oi the cample	n?		Yes		No		NA 🗆		
O. Was all allei	mpi made to ci	ooi trie sample	Sr		res	•	140		INA L		
4. Were all sam	nples received	at a temperatu	re of >0°C1	o 6.0°C	Yes	¥	No		NA 🗆		
5. Sample(s) in	proper contair	ner(s)?			Yes	<u> </u>	No				
6. Sufficient sar	mple volume fo	r indicated tes	t(s)?		Yes	✓	No				
7. Are samples	(except VOA a	nd ONG) prop	erly preserve	:d?	Yes	~	No				
8. Was preserva	ative added to	bottles?			Yes		No	✓	NA 🗌		
9. VOA vials ha	ve zero headsp	ace?			Yes		No		No VOA Vials 🗹		
10, Were any sa	mple container	s received bro	ken?		Yes		No	✓	# of preserved		
11. Does paperw (Note discrep	ork match bott pancies on chai				Yes	✓	No		bottles checked for pH:	op ≥12 ur	nless noted)
2. Are matrices	correctly identi	fied on Chain	of Custody?		Yes	✓	No		Adjusted?		
3. Is it clear wha					Yes	✓	No			~^^	. <i>(</i>
 Were all hold (If no, notify of 	ling times able customer for au				Yes	✓	No		Checked by:	DAD	8/2+//9
Special Hand	ling (if appl	icable)									
15. Was client n	otified of all dis	crepancies wit	th this order?		Yes		No		NA 🗹		
Persor	Notified:	. 25. 10. 4.v 300		Date:							
By Wh	om:			Via:	eMa	ail 🔲	Phone [Fax	☐ In Person		
Regard	ding:										
Client I	Instructions:										
16. Additional re	emarks:									_ _	
17. <u>Cooler Info</u>	rmation										
Cooler No		Condition	Seal Intact	Seal No	Seal Da	ate	Signed I	Ву			
1			es es]		
2			es .		****						
4			es/es								
1-	T		ug.						1		

HALL ENVIRONMENTAL ANALYSIS LABORATORY www.hallenvironmental.com 4901 Hawkins NE - Albuquerque, NM 87109 Tel. 505-345-3975 Fax 505-345-4107	8081 Pesticides/8082 PCB's EDB (Method 504.1) PAHs by 8310 or 8270SIMS RCRA 8 Metals 8260 (VOA) 8270 (Semi-VOA) Total Coliform (Present/Absent)) t t	+ + +	L +	<i>x</i> ×	Date Time Remarks: $5.0 - 0.3 = 4.7$ C Date Time $4.9 - 0.3 = 4.7$ C Date Time $4.9 - 0.3 = 3.4$ ° C $4.9 - 0.3 = 4.7$ C This serves as notice of this possibility. Any sub-contracted data will be clearly notated on the analytical report.
4 F	(SOS1) (OAM \ OAD \ OAD) OBO \ MRG)	12 2	オナド	* * * * * * * * * * * * * * * * * * *	*	Remarks:
Turn-Around Time: 18 hour Standard ARush 24 hour Project Name: Rick Decknrd Stufe 26-28-4 WA #24 Project #: 19E-00614	Project Manager: Denns Williams Awilliams @ Warlet. Ca Sampler: Astyn Milliams On Ice: Astyn Milliam On Ice: Area Brook Coolers: 4 Cooler Templination ori: Republic (CC) Container Preservative HEAL No. Type and # Type	16/23 Jac 16e -001	500- hao-	100- 100- 100-	010-	
ain-of-Custody Record	It (Full Validation)	1-02 1.0'	8-24-19 9:304 Busel9-12 1,5' 8-24-19 9:450 Busel9-15 1,5' 8-24-18 10:004 Busel9-15 1,5'	Basel7-16 Basel9-17 Basel9-18 Basel5-19	16/11:18 Basel 5-20 1.0'	Date: Time: Relinquished by: Austin HIRRIS Received by: Ita: Date: Time: Relinquished by: Received by: Via: Date: Time: Relinquished by: Courlet's Received by: Via: Receive

	nain	-of-C	ustody Rec	ord	Turn-Aroun	d Time:																
Client:	Na	rathe	and the same of th		□ Standar	d Rusi	a **													VT/		
R	11	Verte		170	Project Nan	ne:													KA	TO	RY	
Mailing Ad	ddress	*	MERGICE OF	scop FIL	Rich	Deckard	St-te NA #ZH					ww	v.hal	lenvii	ronr	nent	tal.co	om				
-	-	413	S. Mesh St.	_	25	-28-4	NA #ZH		49	01 H	awk	ins l	NE -	Albu	uque	erqu	e, N	M 87	109			
Corlsba		N/V1 8	8220		Project #:	1E-0061	41		T	el. 50	5-34	15-3	975	F	ax	505-	345	-4107	7			
Phone #:	-	15.36	1-1137										A	naly	sis	Req	uest					
email or F			@Veilez. Co	1	Project Man	ager: Denni	13 Williams	=	0					SO4			nt)					Γ
QA/QC Pa					dw	lliams @V	eder c	(8021)	AR	PCB's		MS					pse					
☐ Standa	ard		☐ Level 4 (Full Va	alidation)	2 111 1	7		S	TPH:8015D(GRO / DRO / MRO)			or 8270SIMS		, PO ₄ ,			(Present/Absent)					
Accreditat			ompliance		Sampler: /		APRIS	TMB'	0	082	<u>E</u> :	827		NO ₂ ,			ese					
□ NELAC		□ Other			On Ice:	☐ Yes	□ No	-	8	8/sa	504	or or	8			OA)	(P					
□ EDD (T	i ype) _		1		# of Coolers Cooler Tem	A CONTRACTOR OF THE SECOND	(00)	MTBE	9)0	8081 Pesticides/8082	EDB (Method 504.1)	PAHs by 8310	RCRA 8 Metals	NO ₃ ,	7	8270 (Semi-VOA)	Total Coliform					
					Cooler Telli	P(Including CF).	(°C)	1	015	Pest	Met	by 8	8	Br,	8260 (VOA)	Sen	HI CO				2000	
					Container	Preservative	HEAL No.	BTEX/	H.8	81	B(Hs	Y. A.	CI, F,	09	0/	tal					
Date Ti	me	Matrix	Sample Name		Type and #	Туре		В	其	80	Ш	4	N.	ਹੰ	82	82	2					
8/18/19 9:	COA	SOIL	Buse19-06	0.5	blows Jat	100		7	7	440				5								
6/18/19 9:	30 K		Base 19-07	0.5	1			+	+					+								
/18/15 9:	45A		B-3619-08	0,5				4	+					+								
8/18/19/19/10	100A		Base 19-09	0.5				+	X					+								
3/18/19/10:	115A		Base19-10	0.5				+	4					+		10000						
8/18/19/10:	30 A		Basel9 -11	1.0				X	4.					+								
3/18/19/10:	15A		Base 19-12	1.0		Į.		4	4					+								
3/18/19/11:	00 A		Base 19-13	1.0				4	4				A.	+								
3/18/19/11/1	151		Base 19-14	1.0'		The state of the s		4	4					+								
18/19/11:	30A		Base 19-15	1.0				+	X					X								
1/18/19 11:	45A	1/	Bosel 9-16	0,5'	1/	W		4	4					X								
1 4 1/11 1 1	of P	V	Buse19-17	1.0	V	V		X	7				3	X								
Date: Time		Relinquished	d by: Ausy fr (1)	ARRIT	Received by:	Via:	Date Time	Rem	arks	S:		7.10										
	200		610		8/11		5/18/19 2702).														
Date: Time	e: 7 F	Relinquished	d by:		Received by:	Via:	Date Time															
1119 19	(4)	211	1/																			
- I	44		Commence of the second	CONTRACTOR OF THE PARTY OF	Ten Timp of the Sa																	

	Chain	1-of-C	ustody Record	Turn-Around	d Time:	£.		<u> </u>		L	A			11/	TD		AIA	4=	NT	AI	
Client	Verlex	Resou	ree Group LTD	□ Standar	d 🛭 Rusi	1													TC		
	N N				e: Rich I							v.hall							7 I C		
Mailin	g Addres	s: 213	5. Mesa St.	75-	28-4 1/	A \$1214		40	04.11									400			
-	ar labor	-	M. 88220	Project #:								VE -		(8)	- 6						
Phone	parent parent	S 2 4	1-1137	- 1	9E-0061	4			el. 50	15-34	5-3	-	-		Requ	_	4107		J(6)	W- ST	
	or Fax#:		in@ Vertex, ca	Project Man	ngor: O	1 .7	Mig			e Koj	21.00									AL WE	المالية
	Package		THE PARTICIO	Project Man	enn	13 Williams	021)	1RO	ွှ		တ		, SO ₄			sent					
	ındard	*	☐ Level 4 (Full Validation)	F1 1.1	Illiams @V	rertex.ca	TMB's (8021)	TPH:8015D(GRO / DRO / MRO)	PCB's		8270SIMS		PO4,			Total Coliform (Present/Absent)		V.			
Accre	ditation:	□ Az Co	ompliance	Sampler:	AUSTIN A	MRRIS .	IAB I	/ DR	8081 Pesticides/8082	£.	8270		NO ₂ ,			eseu					
□ NE		□ Othe	r	On Ice:	☐ Yes	□No	~	8	8/se	EDB (Method 504.1)					8270 (Semi-VOA)	<u>a</u>					
□ ED	D (Type)	-	T	# of Coolers:		// //	TBE	(G)	cide	por	310	leta	2	7)-ic	Dr.m					
				Cooler Temp	(including CF):	(°C)	BTEX / MTBE	1151	est	Meth	PAHs by 8310 or	RCRA 8 Metals	CI, F, Br, NO ₃ ,	8260 (VOA)	Sen	jje Sije					
				Container	Preservative	HEAL No.	E	H.8(81 F	B	H.	RA.	L.	000	0/2	tal					
Date	Time	Matrix	Sample Name	Type and #	Туре		B	(H	80	品	PA	R	ਹੱ	826	82	P					
3/18/19	11:00 P	Soil	Base19-18 0,5"	blass Jai	loe		*	×					+								
3/18/19	3:30P		Buse 19-19 3,0'		The state of the s		4	×					+								
118/1	74:00P	To anticopy de la	Base19-20 0.5				4	X					7								
3/18/14	4:307		Base19-21 6,5				+	X				-	+								
31/18/19	5:00 P	W	Base 19-22 0.5		V		X	X					+								
1		*																			
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ate:		Relinquishe	d by: Ausilar HARRIS	Received by:	Via:	Date Time	Ren	nark	s:												
11919	2200		Att	AM		8/18/19 2200	0														
ate:	Time:	Relinquishe	d by:	Received by:	Via:	Date Time															
1/19	1/1/	21/																			

		i-of-C	ustody Record	Turn-Around						1	AL		E	A II S	/TF	10	BIB	a =			
Client:	Perle	1 Re	source Grove LTD	□ Standard	d 🖟 Rusi	1													NT		
	y	4 / 1	source or out			1151												KA	\TC)K	I
Mailing	Addres	s: 712	- M1	-	Kich U	eckard Stak						w.hal									
/ 1	1 1	43	5. Mesa St.	Project #:	-28-7	WA #2H	-	49	01 H	awk	ins l	VE -	Alb	ouqu	erqu	ie, N	M 87	109			
Coch	3 Donal	NAI	88720	_ FTOJECT #. 6	7E-0061	14		Te	el. 50	5-34	45-3	-	The Real Property lies		Marin St.	PV - (C.5.D)	-4107	7	Samuel Co.		R. Course
Phone		15-36	1-1137	1		-						Α		/sis	Req	uest			NEW L		
	r Fax#:		and Vertexica	Project Mana	VI	1	5	30	(0)		22		SO4			ent)					
	Package	•			PANIS 1	Villiams	(802	/ MF	PCB's		IMS		PO4,			Abs					
☐ Stan	1.1	7-11 / 42 April	□ Level 4 (Full Validation)	-/1		vertex, ra	TMB's (8021)	RO	2 P(8270SIMS		2, P(ent/				=	
Accredi		☐ Az C	ompliance	Sampler: /		PRR1-	ĮΣ	0/0	808	4.1)			NO ₂ ,		3	res					
□ NEL	(Type)	U Otne		On Ice: # of Coolers:	☐ Yes	□ No	1 1	3RC	les/	150	0 0	als			100	n (P				-	
	(1)00)			Cooler Temp		(°C)	MTBE,	TPH:8015D(GRO / DRO / MRO)	8081 Pesticides/8082	EDB (Method 504.1)	PAHs by 8310 or	RCRA 8 Metals	Br, NO ₃ ,	(A)	8270 (Semi-VOA)	Total Coliform (Present/Absent)	-			=	
								801	Pes	(Me	by by	A 8	Br	8260 (VOA)	(Se	Col					
Date	Time	Matrix	Sample Name	Container	Preservative	HEAL No.	BTEX	H	081	BB	AHS	CR.	CI,F,	260	270	otal					
bale !		11		Type and #	Type		T M	Ų	8	Ш		2	0	80	80	F		+	+	-	+
0/17/19	9:00 A	Soil	B619-01 0.0°	Glass Jor	Ice		4	4					4						_		
117/17	9:15 A	and the same	B619-01 1.0'				4	4					4		100				- 20		
Malin	9:30 A	and the same of	B619-01 2,0°				+	4					寸								
117/19	11:00 A	No.	Basel 9-01 0,5				+	4					+								
117/19	11:301	100	Base 19-02 0.5'				+	4					4						5 1		
Plinks	12 cop	article (Illocated)	Buse 19-63 0.5				4	x					4								
3/17/19	12:30 P	Name and American	Base 19-04 0.5'				X	+					+								
117/19	12:459	1	B=5019-05 0.5'	V	V		X	X					X								
						*															
				0.																	
ate:		Relinquishe	ed by: Ausyla HARRIS	Received by:	Via:	Date Time	Rer	nark	s:							- 1					
119/19	2200		Cht	AM		8/18/19 2200															
ate:	Time:	Relinquishe	ed by:	Received by:	Via:	Date Time															
9/9	0710																				
1 1 1							-		_			_					$\overline{}$				

Time: Relinquished by: Via:	is and the first	Time: Relinquished by: Via:	5 12-20 V Busis - 17 I.C. V V	19 11:15/1 N/ Bosel 9-16 65 J/ N/	191124 Exy 19-15 1.6	11164 E 219-14 18	17 11 100 A 1 B-51 19 - 13 1. 5	11 21 - 13 15-61 18 OIL	103A 103A 100 17 - 11 11 11	11 11 16 16 16 16 15 1 1 1 1 1 1 1 1 1 1	16 COM 1 PURITY-DG C.5	5934 R-19-68 65	692x 1 E-3117-67 C.5	199454 Sell Bouts-El OF Bloods 100	Date Time Matrix Sample Name Cooler Temp(including CF): Sample Name Container Type and # Type	EDD (Type) # of Coolers:	□ Other	Accreditation: Az Compliance Sampler:	QA/QC Package: Standard	Project Manager:	Phone #: 57: \$81.487	Project #:	Mailing Address: 213 S /Al-2, 53	Project Name:	
Date Time		Date Time													ve HEAL No.		□ No	115/15	To the Cal	MILE MILES			100 FSH	(0)	
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Chain-of-Custody Record

Turn-Around Time:

HALL ENVIRONMENTAL ANALYSIS LABORATORY

Date: Time: Relinquished by:	Date: Time: Relinquished by: Nestwo KMROS					8/18/195:00P V Base19-22-0.5"	8/10/1941:20A 1 Base/9-21 6.5	8/18/194:00P Buss 19-20 0.5.	6/18/19330P 1 Busil9-19 3,0"	8/18/19 1:00 P Soil Base 17-18 0.5	Date Time Matrix Sample Name	☐ EDD (Type)		n:	QA/QC Package: □ Level 4 (Full Validation)	email or Fax#: Permian @ Mortes, Ca	Phone #: 575-36/-1137	Con/sbook NM, 88220	Mailing Address: 213 S. Mesa St.		Client Verlex Resource Group LTD	Chain-of-Custody Record
Received by:	Received by:					<				Massiai	Cooler Temp(including cF): Container Preserva Type and # Type	# of Coolers:	On Ice:	Sampler: A	dwill	Project Manager:		Project #:	25-28-	Project Name:	□ Standard	Turn-Around Time:
Via:	Via:					<	rest units		ellite (1 hazine	tee	Preservative Type		Yes	A MIS	hams@vertex.ca	ar. Deams	1 10001	41900-30	-4 J/A	Rich D	Rush_	me:
Date Time	Date Time 8/18/19 224										HEAL No.	(08)	□ No	MARIS	often.ca	Mans			421	chard	V.	i.
, sawiinis	Ren					X	4	4	4	K	BTEX / M	TBE	Ξ/	TME	3's (802	21)			7			
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Chain-of-Custody Record

Turn-Around Time:

Date: Time: Relinquished by:	Date: Time: Relinquished by: Nosyur Markers Make 1200					8/17/1917:457 V B-5819-05 0.5"	8/11/1912:30P Base 19-04 0.5"	8/1/1/11/12 Buse 19-63 0.5.	3/17/19 11301 Base 19-02 0.5	3/17/19 11:00 A Basel 9-01 0,5	8/11/1 7:30 A Bb. 19-01 2,0	8/17/179:15 A] Bb/9-01 1.0"	8/17/19 7:00 A Soil B6/9-01 0.0'	Date Time Matrix Sample Name			wne)	Accreditation: Az Compliance Other	4	age:	email or Fax#: Permian & Vertex.ca	Phone # 575-36/- 1/37	Coolstand NM. 88220	Mailing Address: 213 S. Meser St.		Client //or lex Resource Grain LAD	Chain-of-Custody Record
Received by: V	Received by: V			1		~							Glass Jor	Type and # Type		Cooler Temp(including cr):	olere:	On Ice:	dwll	000	Project Manager:	7	Project #:	25-2	Project Name:	□ Standard	Turn-Around Time:
Via:	Via:				1	V	1					**************************************	CC	Type Type		ding CF):		Yes 🗆	hamser ye	W SIM		1.000	12/200-	8.4 W	ich Dec	Rush_	ne:
Date Time	Date Time 18/19 2.2.00												ţ	HEAL NO.	HEAL NO	(°C)		No	etetica	lhoms			,	4 # 24	Kard State	14. vi	- 100
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Turn-Around Time:

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