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

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

Form C-144
Revised June 6, 2013

For temporary pits, below-grade tanks, and multi-well fluid management pits, submit to the appropriate NMOCD District Office.
For permanent pits submit to the Santa Fe Environmental Bureau office and provide a copy to the appropriate NMOCD District Office.

Pit, Below-Grade Tank, or Proposed Alternative Method Permit or Closure Plan Application

OIL CONS. DIV DIST. 3

NOV 08 2016

15758

Type of action:
- ☐ Below grade tank registration
- ☐ Permit of a pit or proposed alternative method
- ☒ Closure of a pit, below-grade tank, or proposed alternative method
- ☐ Modification to an existing permit/or registration
- ☐ Closure plan only submitted for an existing permitted or non-permitted pit, below-grade tank, or proposed alternative method

Instructions: Please submit one application (Form C-144) per individual pit, below-grade tank or alternative request

Please be advised that approval of this request does not relieve the operator of liability should operations result in pollution of surface water, ground water or the environment. Nor does approval relieve the operator of its responsibility to comply with any other applicable governmental authority's rules, regulations or ordinances.

1.
Operator: Roddy Production Co. OGRID #: 36845
Address: PO Box 2221 Farmington NM 87499-2221
Facility or well name: Chacon Jicarilla Apache D #1
API Number: 30-043-20144 OCD Permit Number:
U/L or Qtr/Qtr A Section 23 Township 23N Range 3W County: Sandoval
Center of Proposed Design: Latitude 36.213883 Longitude -107.120783 NAD: ☐ 1927 ☐ 1983
Surface Owner: ☐ Federal ☐ State ☐ Private ☐ Tribal Trust or Indian Allotment

2.
☐ **Pit:** Subsection F, G or J of 19.15.17.11 NMAC
Temporary: ☐ Drilling ☐ Workover
☐ Permanent ☐ Emergency ☐ Cavitation ☐ P&A ☐ Multi-Well Fluid Management Low Chloride Drilling Fluid ☐ yes ☐ no
☐ Lined ☐ Unlined Liner type: Thickness _____mil ☐ LLDPE ☐ HDPE ☐ PVC ☐ Other _____
☐ String-Reinforced
Liner Seams: ☐ Welded ☐ Factory ☐ Other _____ Volume: _____bbl Dimensions: L_____ x W_____ x D_____

3.
☒ **Below-grade tank:** Subsection I of 19.15.17.11 NMAC
Volume: 60 bbl Type of fluid: Produced Water
Tank Construction material: Fiberglass
☐ Secondary containment with leak detection ☐ Visible sidewalls, liner, 6-inch lift and automatic overflow shut-off
☐ Visible sidewalls and liner ☐ Visible sidewalls only ☐ Other _____
Liner type: Thickness _____mil ☐ HDPE ☐ PVC ☐ Other _____

4.
☐ **Alternative Method:**
Submittal of an exception request is required. Exceptions must be submitted to the Santa Fe Environmental Bureau office for consideration of approval.

5.
Fencing: Subsection D of 19.15.17.11 NMAC *(Applies to permanent pits, temporary pits, and below-grade tanks)*
☐ Chain link, six feet in height, two strands of barbed wire at top *(Required if located within 1000 feet of a permanent residence, school, hospital, institution or church)*
☐ Four foot height, four strands of barbed wire evenly spaced between one and four feet
☐ Alternate. Please specify 4' Hog wire fence

73

6.

Netting: Subsection E of 19.15.17.11 NMAC *(Applies to permanent pits and permanent open top tanks)*

☐ Screen ☐ Netting ☐ Other_____

☐ Monthly inspections (If netting or screening is not physically feasible)

7.

Signs: Subsection C of 19.15.17.11 NMAC

☐ 12"x 24", 2" lettering, providing Operator's name, site location, and emergency telephone numbers

☐ Signed in compliance with 19.15.16.8 NMAC

8.

Variances and Exceptions:

Justifications and/or demonstrations of equivalency are required. Please refer to 19.15.17 NMAC for guidance.

Please check a box if one or more of the following is requested, if not leave blank:

☐ Variance(s): Requests must be submitted to the appropriate division district for consideration of approval.

☐ Exception(s): Requests must be submitted to the Santa Fe Environmental Bureau office for consideration of approval.

9.

Siting Criteria (regarding permitting): 19.15.17.10 NMAC

Instructions: The applicant must demonstrate compliance for each siting criteria below in the application. Recommendations of acceptable source material are provided below. **Siting criteria does not apply to drying pads or above-grade tanks.**

General siting	
Ground water is less than 25 feet below the bottom of a low chloride temporary pit or below-grade tank. - ☐ NM Office of the State Engineer - iWATERS database search; ☐ USGS; ☐ Data obtained from nearby wells	☐ Yes ☐ No ☐ NA
Ground water is less than 50 feet below the bottom of a Temporary pit, permanent pit, or Multi-Well Fluid Management pit . NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No ☐ NA
Within incorporated municipal boundaries or within a defined municipal fresh water well field covered under a municipal ordinance adopted pursuant to NMSA 1978, Section 3-27-3, as amended. **(Does not apply to below grade tanks)** - Written confirmation or verification from the municipality; Written approval obtained from the municipality	☐ Yes ☐ No
Within the area overlying a subsurface mine. **(Does not apply to below grade tanks)** - Written confirmation or verification or map from the NM EMNRD-Mining and Mineral Division	☐ Yes ☐ No
Within an unstable area. **(Does not apply to below grade tanks)** - Engineering measures incorporated into the design; NM Bureau of Geology & Mineral Resources; USGS; NM Geological Society; Topographic map	☐ Yes ☐ No
Within a 100-year floodplain. **(Does not apply to below grade tanks)** - FEMA map	☐ Yes ☐ No
Below Grade Tanks	
Within 100 feet of a continuously flowing watercourse, significant watercourse, lake bed, sinkhole, wetland or playa lake (measured from the ordinary high-water mark). - Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Within 200 horizontal feet of a spring or a fresh water well used for public or livestock consumption;. - NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Temporary Pit using Low Chloride Drilling Fluid (maximum chloride content 15,000 mg/liter)	
Within 100 feet of a continuously flowing watercourse, or any other significant watercourse or within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). (Applies to low chloride temporary pits.) - Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Within 300 feet from a occupied permanent residence, school, hospital, institution, or church in existence at the time of initial application. - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image	☐ Yes ☐ No
Within 200 horizontal feet of a spring or a private, domestic fresh water well used by less than five households for domestic or stock watering purposes, or 300feet of any other fresh water well or spring, in existence at the time of the initial application. NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site	☐ Yes ☐ No

Within 100 feet of a wetland. - US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Temporary Pit Non-low chloride drilling fluid	
Within 300 feet of a continuously flowing watercourse, or any other significant watercourse, or within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). - Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Within 300 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application. - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image	☐ Yes ☐ No
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, or 1000 feet of any other fresh water well or spring, in the existence at the time of the initial application; - NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Within 300 feet of a wetland. - US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Permanent Pit or Multi-Well Fluid Management Pit	
Within 300 feet of a continuously flowing watercourse, or 200 feet of any other significant watercourse, or lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). - Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Within 1000 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application. - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image	☐ Yes ☐ No
Within 500 horizontal feet of a spring or a fresh water well used for domestic or stock watering purposes, in existence at the time of initial application. - NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Within 500 feet of a wetland. - US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No

10.

Temporary Pits, Emergency Pits, and Below-grade Tanks Permit Application Attachment Checklist: Subsection B of 19.15.17.9 NMAC

Instructions: Each of the following items must be attached to the application. Please indicate, by a check mark in the box, that the documents are attached.

☐ Hydrogeologic Report (Below-grade Tanks) - based upon the requirements of Paragraph (4) of Subsection B of 19.15.17.9 NMAC
☐ Hydrogeologic Data (Temporary and Emergency Pits) - based upon the requirements of Paragraph (2) of Subsection B of 19.15.17.9 NMAC
☐ Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC
☐ Design Plan - based upon the appropriate requirements of 19.15.17.11 NMAC
☐ Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC
☐ Closure Plan (Please complete Boxes 14 through 18, if applicable) - based upon the appropriate requirements of Subsection C of 19.15.17.9 NMAC and 19.15.17.13 NMAC

☐ Previously Approved Design (attach copy of design) API Number: _____ or Permit Number: _____

11.

Multi-Well Fluid Management Pit Checklist: Subsection B of 19.15.17.9 NMAC

Instructions: Each of the following items must be attached to the application. Please indicate, by a check mark in the box, that the documents are attached.

☐ Design Plan - based upon the appropriate requirements of 19.15.17.11 NMAC
☐ Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC
☐ A List of wells with approved application for permit to drill associated with the pit.
☐ Closure Plan (Please complete Boxes 14 through 18, if applicable) - based upon the appropriate requirements of Subsection C of 19.15.17.9 NMAC and 19.15.17.13 NMAC
☐ Hydrogeologic Data - based upon the requirements of Paragraph (4) of Subsection B of 19.15.17.9 NMAC
☐ Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC

☐ Previously Approved Design (attach copy of design) API Number: _____ or Permit Number: _____

12.
Permanent Pits Permit Application Checklist: Subsection B of 19.15.17.9 NMAC
Instructions: Each of the following items must be attached to the application. Please indicate, by a check mark in the box, that the documents are attached.

- ☐ Hydrogeologic Report - based upon the requirements of Paragraph (1) of Subsection B of 19.15.17.9 NMAC
- ☐ Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC
- ☐ Climatological Factors Assessment
- ☐ Certified Engineering Design Plans - based upon the appropriate requirements of 19.15.17.11 NMAC
- ☐ Dike Protection and Structural Integrity Design - based upon the appropriate requirements of 19.15.17.11 NMAC
- ☐ Leak Detection Design - based upon the appropriate requirements of 19.15.17.11 NMAC
- ☐ Liner Specifications and Compatibility Assessment - based upon the appropriate requirements of 19.15.17.11 NMAC
- ☐ Quality Control/Quality Assurance Construction and Installation Plan
- ☐ Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC
- ☐ Freeboard and Overtopping Prevention Plan - based upon the appropriate requirements of 19.15.17.11 NMAC
- ☐ Nuisance or Hazardous Odors, including H_2S, Prevention Plan
- ☐ Emergency Response Plan
- ☐ Oil Field Waste Stream Characterization
- ☐ Monitoring and Inspection Plan
- ☐ Erosion Control Plan
- ☐ Closure Plan - based upon the appropriate requirements of Subsection C of 19.15.17.9 NMAC and 19.15.17.13 NMAC

13.
Proposed Closure: 19.15.17.13 NMAC
Instructions: Please complete the applicable boxes, Boxes 14 through 18, in regards to the proposed closure plan.

Type: ☐ Drilling ☐ Workover ☐ Emergency ☐ Cavitation ☐ P&A ☐ Permanent Pit ☐ Below-grade Tank ☐ Multi-well Fluid Management Pit ☐ Alternative

Proposed Closure Method:
- ☐ Waste Excavation and Removal
- ☐ Waste Removal (Closed-loop systems only)
- ☐ On-site Closure Method (Only for temporary pits and closed-loop systems)
  - ☐ In-place Burial ☐ On-site Trench Burial
- ☐ Alternative Closure Method

14.
Waste Excavation and Removal Closure Plan Checklist: (19.15.17.13 NMAC) ***Instructions: Each of the following items must be attached to the closure plan. Please indicate, by a check mark in the box, that the documents are attached.***

- ☐ Protocols and Procedures - based upon the appropriate requirements of 19.15.17.13 NMAC
- ☐ Confirmation Sampling Plan (if applicable) - based upon the appropriate requirements of Subsection C of 19.15.17.13 NMAC
- ☐ Disposal Facility Name and Permit Number (for liquids, drilling fluids and drill cuttings)
- ☐ Soil Backfill and Cover Design Specifications - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC
- ☐ Re-vegetation Plan - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC
- ☐ Site Reclamation Plan - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC

15.
Siting Criteria (regarding on-site closure methods only): 19.15.17.10 NMAC
Instructions: Each siting criteria requires a demonstration of compliance in the closure plan. Recommendations of acceptable source material are provided below. Requests regarding changes to certain siting criteria require justifications and/or demonstrations of equivalency. Please refer to 19.15.17.10 NMAC for guidance.

Ground water is less than 25 feet below the bottom of the buried waste. - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No ☐ NA
Ground water is between 25-50 feet below the bottom of the buried waste - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No ☐ NA
Ground water is more than 100 feet below the bottom of the buried waste. - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No ☐ NA
Within 100 feet of a continuously flowing watercourse, or 200 feet of any other significant watercourse, lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). - Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Within 300 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application. - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image	☐ Yes ☐ No
Within 300 horizontal feet of a private, domestic fresh water well or spring used for domestic or stock watering purposes, in existence at the time of initial application. - NM Office of the State Engineer - iWATERS database; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Written confirmation or verification from the municipality; Written approval obtained from the municipality	☐ Yes ☐ No
Within 300 feet of a wetland. US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	☐ Yes ☐ No
Within incorporated municipal boundaries or within a defined municipal fresh water well field covered under a municipal ordinance	

adopted pursuant to NMSA 1978, Section 3-27-3, as amended. - Written confirmation or verification from the municipality; Written approval obtained from the municipality	☐ Yes ☐ No
Within the area overlying a subsurface mine. - Written confirmation or verification or map from the NM EMNRD-Mining and Mineral Division	☐ Yes ☐ No
Within an unstable area. - Engineering measures incorporated into the design; NM Bureau of Geology & Mineral Resources; USGS; NM Geological Society; Topographic map	☐ Yes ☐ No
Within a 100-year floodplain. - FEMA map	☐ Yes ☐ No

16.
On-Site Closure Plan Checklist: (19.15.17.13 NMAC) ***Instructions: Each of the following items must be attached to the closure plan. Please indicate, by a check mark in the box, that the documents are attached.***

- ☐ Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC
- ☐ Proof of Surface Owner Notice - based upon the appropriate requirements of Subsection E of 19.15.17.13 NMAC
- ☐ Construction/Design Plan of Burial Trench (if applicable) based upon the appropriate requirements of Subsection K of 19.15.17.11 NMAC
- ☐ Construction/Design Plan of Temporary Pit (for in-place burial of a drying pad) - based upon the appropriate requirements of 19.15.17.11 NMAC
- ☐ Protocols and Procedures - based upon the appropriate requirements of 19.15.17.13 NMAC
- ☐ Confirmation Sampling Plan (if applicable) - based upon the appropriate requirements of 19.15.17.13 NMAC
- ☐ Waste Material Sampling Plan - based upon the appropriate requirements of 19.15.17.13 NMAC
- ☐ Disposal Facility Name and Permit Number (for liquids, drilling fluids and drill cuttings or in case on-site closure standards cannot be achieved)
- ☐ Soil Cover Design - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC
- ☐ Re-vegetation Plan - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC
- ☐ Site Reclamation Plan - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC

17.
Operator Application Certification:

I hereby certify that the information submitted with this application is true, accurate and complete to the best of my knowledge and belief.

Name (Print): _____ Title: _____

Signature: _____ Date: _____

e-mail address: _____ Telephone: _____

18.
OCD Approval: ☐ Permit Application (including closure plan) ☑ Closure Plan (only) ☐ OCD Conditions (see attachment)

OCD Representative Signature: _____ **Approval Date:** 4/19/2017

Title: Environmental Specialist **OCD Permit Number:** _____

19.
Closure Report (required within 60 days of closure completion): 19.15.17.13 NMAC

Instructions: Operators are required to obtain an approved closure plan prior to implementing any closure activities and submitting the closure report. The closure report is required to be submitted to the division within 60 days of the completion of the closure activities. Please do not complete this section of the form until an approved closure plan has been obtained and the closure activities have been completed.

☑ **Closure Completion Date:** 9/12/2016

20.
Closure Method:

☑ Waste Excavation and Removal ☐ On-Site Closure Method ☐ Alternative Closure Method ☐ Waste Removal (Closed-loop systems only)

☐ If different from approved plan, please explain.

21.
Closure Report Attachment Checklist: ***Instructions: Each of the following items must be attached to the closure report. Please indicate, by a check mark in the box, that the documents are attached.***

- ☑ Proof of Closure Notice (surface owner and division)
- ☐ Proof of Deed Notice (required for on-site closure for private land only)
- ☐ Plot Plan (for on-site closures and temporary pits)
- ☑ Confirmation Sampling Analytical Results (if applicable)
- ☐ Waste Material Sampling Analytical Results (required for on-site closure)
- ☑ Disposal Facility Name and Permit Number
- ☑ Soil Backfilling and Cover Installation
- ☑ Re-vegetation Application Rates and Seeding Technique
- ☑ Site Reclamation (Photo Documentation)

On-site Closure Location: Latitude 36.213883 Longitude -107.120783 NAD: ☐ 1927 ☐ 1983

22.

Operator Closure Certification:

I hereby certify that the information and attachments submitted with this closure report is true, accurate and complete to the best of my knowledge and belief. I also certify that the closure complies with all applicable closure requirements and conditions specified in the approved closure plan.

Name (Print): Jeremy Divine Title: Foreman

Signature: Jeremy Divine Date: 11/8/2016

e-mail address: jdivine@crownquest.com Telephone: 432 557 6778

CROWNQUEST

CROWNQUEST OPERATING, LLC

August 10, 2016

Attn: Guillermo DeHererra

P.O. Box 146, #6 Dulce Rock Drive

Dulce, NM 87528

RE: Chacon Jicarilla Apache D#1 BGT Closure

Dear Guillermo,

This is Roddy Productions notification of our intent to close the Below Grade Tank on the Chacon Jicarilla Apache D#1 API# 30-043-21044, UL-A, S-23, T23N, R3W. Included is the closure plan, lab analysis and approval from Mr. Hobson Sandoval the Jicarilla Apache Nation EPO. It is our intent to close the BGT in the last two weeks of August 2016. Roddy Production will notify Jason Sandoval 48 hours before operations begin. Let me know if you have any questions.

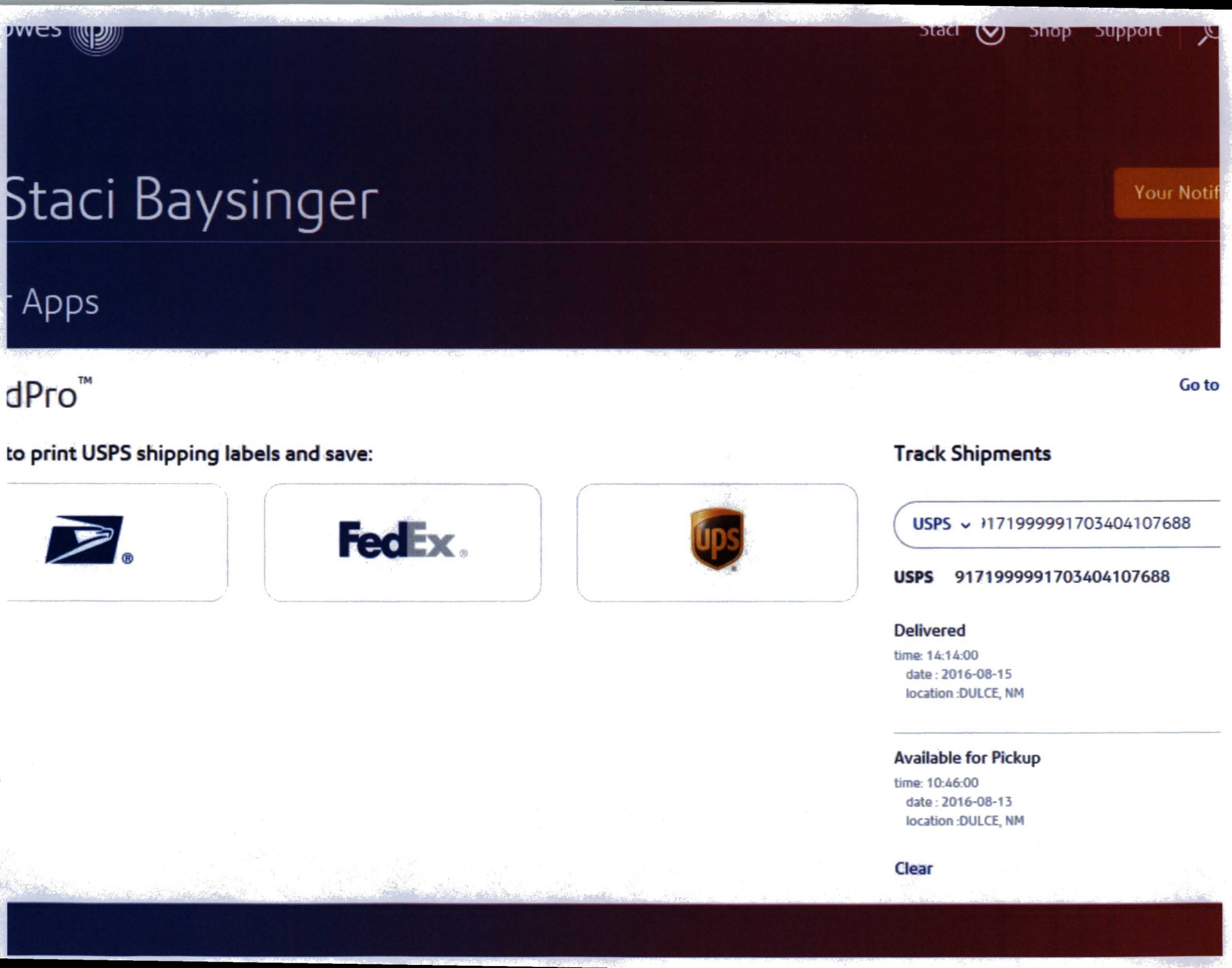
Sincerely,

Jeremy Divine

Jeremy Divine

Roddy Production/CrownQuest Operating

432 557 6778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to print USPS shipping labels and save:
FedEx
Track Shipments
USPS
)1719999917034041076 88
USPS 9171999991703404107688
Delivered
time: 14:14:00
date : 2016-08-15
location :DULCE, NM
Available for Pickup
time: 10:46:00
date : 2016-08-13
location :DULCE, NM
Clear

Jeremy Divine

From: Trey Tixier
Sent: Thursday, August 04, 2016 12:04 PM
To: Jeremy Divine
Subject: Fwd: Chacon Jicarilla D#1

Sent from my iPhone

Begin forwarded message:

> **From:** Hobson Sandoval <hsandoval_99@yahoo.com>
> **Date:** August 4, 2016 at 11:54:05 AM MDT
> **To:** "ttixier@crownquest.com" <ttixier@crownquest.com>
> **Cc:** Cordell Tecube <cltecube@yahoo.com>, Jason Sandoval <jasonsandoval@jicarillaoga.com>, Orson Harrison <orsonharrison@jicarillaoga.com>, "guillermo.deherera@jicarillaoga.com" <guillermo.deherera@jicarillaoga.com>
> **Subject: Chacon Jicarilla D#1**
> **Reply-To:** Hobson Sandoval <hsandoval_99@yahoo.com>
>
> The labs are good for this site; they are ND for BGT. So, go ahead and back fill the below grade tank (BGT)
>
> Sent from Yahoo Mail on Android

Jeremy Divine

From: Jeremy Divine
Sent: Monday, August 15, 2016 10:58 AM
To: jasonsandoval@jicarillaoga.com; Guillermo (guillermo.deherrera@jicarillaoga.com); 'Hobson Sandoval'; alfredvigil@jicarillaoga.com; 'rswitzer@blm.gov'; Reuben Perea; Bryce Hammond, BLM Supervisor; 'Sandoval, Kurt'; Smith, Cory, EMNRD; Annette Torivio (annettetorivio@jicarillaoga.com)
Cc: Trey Tixier
Subject: 48 hour notice to start reclamation of Chacon Jicarilla Apache D#1 30-043-20144 UL-A, S-23, T23N, R3W

All,

We are going to start reclamation on Roddy Production Chacon Jicarilla Apache D#1 in 48 hours. During this process the BGT will also be closed and reclaimed. Please let me know if you have any questions.

Thanks

Jeremy Divine
Cell. 432 557 6778
Jdivine@crownquest.com
4001 N. Butler, Building 7101
Farmington, NM 87499
CrownQuest Operating
Roddy Production Co.

Jeremy Divine

From: Jeremy Divine
Sent: Friday, August 26, 2016 2:16 PM
To: Guillermo (guillermo.deherrera@jicarillaoga.com); jasonsandoval@jicarillaoga.com; alfredvigil@jicarillaoga.com; 'rswitzer@blm.gov'; Reuben Perea; Bryce Hammond, BLM Supervisor; 'Sandoval, Kurt'; 'Hobson Sandoval'; Annette Torivio (annettetorivio@jicarillaoga.com)
Cc: Trey Tixier
Subject: Roddy Production 48 hour notice to start seeding operations

All,

Roddy Production will start seeding operations on the following locations starting next week. Below is the seed mix and volume to be used. Please let Trey Tixier or I know if you have any questions.

Amerada Jicarilla #2 30-039-22448, Contract #167
Amerada Jicarilla #4 30-039-22585, Contract #167
Chacon Jicarilla Apache D#1 30-043-20144, Contract #413
Chacon Jicarilla Apache D#110 30-043-20433, Contract #55A

The seed mixture and application rates for the Jicarilla Apache Nation (south reservation blend <12" Precip) Vegetative Community will be as follows:

Species	**Variety**	**Pound/Acre (PLS)**
Blue Grama	Hachita	.6
Galleta	Viva	.8
Indian Rice Grass	Paloma or Nezpar	1.1
Western Wheatgrass	Arriba or Barton	3.2
Pubescent Wheatgrass	Luna	2.1
Crested Wheatgrass	Ephraim or Hycrest	1.5
Blue Flax	Appar	.3
Palmar Penstemon	Cedar	1.0
		Total: 10.6

Jeremy Divine
Cell. 432 557 6778
Jdivine@crownquest.com
4001 N. Butler, Building 7101
Farmington, NM 87499
CrownQuest Operating
Roddy Production Co.

District I
1625 N. French Dr., Hobbs, NM 88240
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1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy Minerals and Natural Resources

Oil Conservation Division
1220 South St. Francis Dr.
Santa Fe, NM 87505

Form C-141
Revised August 8, 2011

Submit 1 Copy to appropriate District Office in accordance with 19.15.29 NMAC.

Release Notification and Corrective Action

OPERATOR

☐ Initial Report ☑ Final Report

Name of Company: Roddy Production Co.	Contact: Jeremy Divine
Address: PO Box 2221	Telephone No. 432 557 6778
Facility Name: Chacon Jicarilla Apache D#1	Facility Type: Oil Well/BGT Closure

Surface Owner: Jicarilla Apache	Mineral Owner: Jicarilla Apache	API No. 30-043 20144

LOCATION OF RELEASE

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
A	23	23N	3W	875	North	1140	East	Sandoval

Latitude 36.213883 **Longitude** -107.120783

NATURE OF RELEASE

Type of Release: N/A	Volume of Release: N/A	Volume Recovered
Source of Release: N/A	Date and Hour of Occurrence	Date and Hour of Discovery
Was Immediate Notice Given? ☐ Yes ☐ No ☐ Not Required	If YES, To Whom?	
By Whom?	Date and Hour	
Was a Watercourse Reached? ☐ Yes ☐ No	If YES, Volume Impacting the Watercourse.	

If a Watercourse was Impacted, Describe Fully.*

Describe Cause of Problem and Remedial Action Taken.*

BGT closure. BGT was pulled and Envirotech took one 5 point composite sample from the bottom of the tank. Field analysis results were 144 TPH. Samples were taken in a 4 oz. glass jar under chain of custody to Envirotech's analytical laboratory to be analyzed for TPH, benzene, BTEX and chlorides on July 21 2016. (see attached field analysis and photographs)

Describe Area Affected and Cleanup Action Taken.*

Area affected 20' x 25' x 3.5' deep. Lab results showed no detection on TPH, benzene and BTEX. Chlorides 49.7 mg/kg. (See attached lab analysis and photos). After receiving approval to backfill from NMOCD, Jicarilla Apache EPO and BLM, area was backfilled, recontoured and seeded using Jicarilla Apache approved seed and method. Work was complete on 9/12/2016.

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

Signature: Jeremy Divine	OIL CONSERVATION DIVISION	
Printed Name: Jeremy Divine	Approved by Environmental Specialist:	
Title: Foreman	Approval Date:	Expiration Date:
E-mail Address: jdivine@crownquest.com	Conditions of Approval:	Attached ☐
Date: 11/8/2016 Phone:432 557 6778		

* Attach Additional Sheets If Necessary

envirotech

September 23, 2016

Project Number 07151-0019

Mr. Jeremy Divine
CrownQuest Operating
Post Office Box 2221
Farmington, New Mexico 87401

Phone: (505) 325-5750
Cell: (432) 557-6778

RE: BGT CLOSURE DOCUMENTATION AND CONFIRMATION SAMPLING FOR THE CHACON JICARILLA APACHE D #1 WELL SITE, SANDOVAL COUNTY, NEW MEXICO

Dear Mr. Divine:

Enclosed please find the *Field Notes*, *Summary of Analytical Results*, and *Analytical Results* for confirmation sampling activities performed at the Chacon Jicarilla Apache D #1 well site located in Section 23, Township 23 North, Range 3 West, Sandoval County, New Mexico. Based on the direction of Jicarilla Oil and Gas Administration Representative, Mr. Hobson Sandoval, the regulatory standards for the site were determined to be in accordance with the New Mexico Oil and Gas Conservation Division (NMOCD) and Bureau of Land Management (BLM) risk ranking criteria. Based on the horizontal distance to surface water being less than 200 feet from the location, a depth to groundwater greater than 100 feet, and the well site not being located within a well head protection area, the regulatory standards were determined to be 100 parts per million (ppm) total petroleum hydrocarbons (TPH) Gasoline Range Organics (GRO) and Diesel Range Organics (DRO), 100 ppm organic vapors, 10 ppm benzene, and 50 ppm BTEX.

On July 7, 2016, Envirotech personnel preformed site assessment activities for three (3) areas within the well site: *Pump Jack, P&A Marker,* and *Above-ground Storage Tank (AST).* Additionally, the BLM requested that used motor oil impacted soil around the pump jack pad be removed. Envirotech personnel collected one (1) composite soil sample from the area of used oil impacted soil for waste profiling and disposal purposes. The sample was collected into a four (4) ounce glass jar, capped headspace free, and transported on ice, under chain of custody to Envirotech's Analytical Laboratory to be analyzed for Toxicity Characteristics Leaching Procedure (TCLP) Resource and Conservation Recovery Act (RCRA) metals using USEPA Method 6010C. The sample returned results below the regulatory standards and can therefore be accepted into Envirotech's NMOCD permitted Landfarm #2; see enclosed ***Analytical Results***.

On July 21, 2016, Envirotech personnel returned to the site. The areas of concern, *Pump Jack, P&A Marker* and *AST,* were excavated approximately six (6) to 12 inches below ground surface (BGS). One (1) five (5) point composite sample was collected from each location and screened in the field for organic vapors using a photoionization detector (PID) and for TPH using USEPA Method 418.1; see enclosed ***Field Notes***. All three (3) areas, *Pump Jack, P&A Marker* and *AST,* returned results above the regulatory standard of 100 ppm for TPH, but below the regulatory standard for organic vapors; see enclosed ***Field Notes***.

Envirotech also collected a sample from beneath the former below grade tank (BGT) for closure. The regulatory standard was determined to be in accordance with the New Mexico Administrative Code (NMAC) Closure Criteria for Soils Beneath Below-grade Tanks, Drying Pads associated with Closed-loop systems and Pits where contents are removed. The regulatory standard was determined to be 2,500 mg/kg TPH using USEPA Method 418.1, 1,000 mg/kg GRO and DRO using USEPA Method 8015D, 10 mg/kg Benzene, 50 mg/kg BTEX using USEPA Method 8021B, and 20,000 mg/kg Chlorides using USEPA Method 300.

BGT

One (1) five (5) point composite sample was collected and screened in the field for organic vapors using a PID and TPH using USEPA Method 418.1. The sample returned results below the regulatory standards for TPH and organic vapors; see enclosed ***Field Notes***. The sample was placed into a four (4) ounce glass jar, capped headspace free, and transferred on ice, under chain of custody to Envirotech's Analytical Laboratory to be analyzed for TPH using USEPA Method 8015D and USEPA Method 418.1, for benzene and total BTEX using USEPA Method 8021B, and for chlorides using USEPA Method 300. The sample returned results below the regulatory standards for all constituents analyzed; see enclosed ***Table 1, Summary of Analytical Results*** and ***Analytical Results***.

Pump Jack

The area beneath the former pump jack pad was excavated an additional 12 inches BGS. One (1) five (5) point composite soil sample was collected and screened in the field for organic vapors and TPH. The sample returned results above the regulatory standard for TPH, but below the regulatory standard for organic vapors; see enclosed ***Field Notes***. The sample was placed into a four (4) ounce glass jar, capped headspace free, and transported on ice, under chain of custody to Envirotech's Analytical Laboratory to be analyzed for TPH using USEPA Method 8015D and for benzene and total BTEX using USEPA Method 8021B. The sample returned results below the regulatory standard for TPH, and for benzene and total BTEX; see enclosed ***Table 2, Summary of Analytical Results*** and ***Analytical Results***.

P&A Marker

The area around the P&A Marker was excavated an additional 12 inches BGS and the area was expanded horizontally an additional five (5) feet. One (1) five (5) point composite sample was collected and screened in the field for organic vapors and TPH. The sample returned results above the regulatory standard for TPH, but below the regulatory standard for organic vapors; see enclosed ***Field Notes***. The sample was placed into a four (4) ounce glass jar, capped headspace free, and transported on ice, under chain of custody to Envirotech's Analytical Laboratory to be analyzed for TPH using USEPA Method 8015D and for benzene and total BTEX using USEPA Method 8021B. The sample returned results above the regulatory standard for TPH, but below the regulatory standard for benzene and total BTEX; see enclosed ***Table 2, Summary of Analytical Results*** and ***Analytical Results***. Envirotech recommended further excavation and resampling for closure.

AST

The area beneath the former AST was excavated an additional 12 inches BGS. One (1) five (5) point composite soil sample was collected and screened in the field for organic vapors and TPH. The sample returned results above the regulatory standard for TPH, but below the regulatory standard for organic

vapors; see enclosed ***Field Notes***. The sample was placed into a four (4) ounce glass jar, capped headspace free, and transported on ice, under chain of custody to Envirotech's Analytical Laboratory to be analyzed for TPH using USEPA Method 8015D and for benzene and total BTEX using USEPA Method 8021B. The sample returned results slightly above the regulatory standard for TPH, but below the regulatory standard for benzene and total BTEX; see enclosed ***Table 2, Summary of Analytical Results*** and ***Analytical Results***. Jicarilla Oil and Gas Administration (JOGA) representative Mr. Hopson Sandoval and New Mexico Oil Conservation Division (NMOCD) representative Mr. Cory Smith recommended *No Further Action* in regards to this area.

On August 3, 2016, Envirotech personnel returned to the above mentioned site to perform further sampling activities. The area surrounding the P&A marker was excavated an additional 12 inches BGS. One (1) five (5) point composite soil sample was collected and screened for organic vapors and TPH in the field. The sample returned a result above the regulatory standard for TPH, but below the regulatory standard for organic vapors; see enclosed ***Field Notes***. Envirotech recommended further excavation. The area surrounding the P&A marker was excavated an additional 24 inches BGS. One (1) five (5) point composite soil sample was collected from the bottom of the excavation and screened for TPH and organic vapors. The sample returned a result above the regulatory standard for TPH, but below the regulatory standard for organic vapor; see enclosed ***Field Notes***. Envirotech personnel recommended submitting the sample for lab analysis for closure. Additionally, one (1) composite sample was collected from the walls of the excavation. The wall sample was screened in the field for TPH and organic vapors. The sample returned a result slightly above the regulatory standard for TPH, but below the regulatory standard for organic vapors; see enclosed ***Field Notes***. Both samples were place into separate four (4) ounce glass jars, capped headspace free, and transported on ice, under chain of custody to Envirotech's Analytical Laboratory to be analyzed for TPH using USEPA Method 8015D and benzene and total BTEX using USEPA Method 8021B. Both samples returned results below the regulatory standards for all constituents analyzed; see enclosed ***Analytical Results***. Envirotech recommends *No Further Action* in regards to this project.

We appreciate the opportunity to be of service. Should you have any questions or require additional information, please contact our office at (505) 632-0615.

Respectfully submitted,
ENVIROTECH, INC.

Isaac Garcia
Environmental Field Technician
igarcia@envirotech-inc.com

Enclosure(s): Field Notes
Summary of Analytical Results
Analytical Results

Cc: Client File Number 07151

CLIENT: Crouch Quest
CLIENT/JOB #: 07151-0019
START DATE: 7/21/16
FINISH DATE: 7/21/16
Page # 1 of 2

envirotech
(505) 632-0615 (800) 362-1879
5796 U.S. Hwy 64, Farmington, NM 87401

Environmental Specialist: E. Garcia
C.O.C. No:
LAT 36.213832
LONG -107.121069

FIELD REPORT: BELOW GROUND TANK VERIFICATION

LOCATION NAME: Chacon Jicarilla Apache WELL #: D# 1 Temp Pit: PERM Pit:
QUAD/UNIT: SEC: TWP: RNG: PM:
QTR/FOOTAGE: CNTY: Sandoval ST: New Mexico

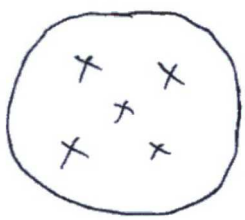
Excavation Approx: Feet X 15 Feet X 15 Feet Deep 4' Cubic Yardage:
Disposal Facility: TNT Landfarm Remediation Method: E N/A
Land Owner: Jicarilla Apache API: Pit Volume: 90 BBL
Construction Material: Fiberglass Double Walled, With Leak Detection:

	Temporary Pit Groundwater < or = 50 feet deep	Chloride 600mg/kg, TPH 100 mg/kg, BTEX 50 mg/kg, Benzene 10 mg/kg
	Temporary Pit Groundwater 51-100 feet deep	Chloride 10,000 mg/kg, TPH 2,500 mg/kg, GRO+DRO 1,000 mg/kg, BTEX 50 mg/kg, Benzene 10 mg/kg
X	Temporary Pit Groundwater > or = 100 feet deep	Chloride 20,000 mg/kg, TPH 2,500 mg/kg, GRO+DRO 1,000 mg/kg, BTEX 50 mg/kg, Benzene 10 mg/kg
	Permanent Pit Or BGT	?

FIELD 418.1 ANLAYSIS

SAMPLE DESCRIPTION	TIME	SAMPLE ID	LAB #	WEIGHT	mL FREON	DILUTION	READING	CALC. (mg/kg)
BGT Comp.	11:46			5	20	4	36	144

PERIMETER



FIELD CHLORIDES RESULTS

SAMPLE ID	READING	CALC. (mg/kg)

PID RESULTS

SAMPLE ID	RESULTS (mg/kdg)
BGT	1.3

PROFILE

LAB SAMPLES

SAMPLE ID	ANALYSIS	US EPA
	BENZENE	8021B/8015M
	BTEX	8021B/80260B
	GRO & DRO	8015M
	CHLORIDES	EPA300
	TPH	418.1

NOTES:

WO #: Who ordered/Site Rep.:

Analyst Signature

7/21/16
Date

Oscar Garcia
Printed Name

Pit Closure Verification 2015

CLIENT:	Crown Quest	**Envmtl. Spclst:**	J. Garcia
CLIENT/JOB #:	07151-0019	**C.O.C. No:**	
START DATE:	7/21/16	**LAT**	36.213852
FINISH DATE:	7/21/16	**LONG**	-107.121069
Page #	2 of 2		

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(505) 632-0615 (800) 362-1879
5796 U.S. Hwy 64, Farmington, NM 87401

Field Report: Spill Closure Verification

NMOCD Ranking: 20 **Depth to GW:** > 100' **WH Protection Area:** (No) Yes

NMOCD TPH Closure Std.: 100 **Distance to SW:** < 200'

LOCATION: Name: Chacon Jicarilla Apache Well #: D # 1 API:

County: Sandoval State: New Mexico

Cause of Release: Leaking Equipment Material Released: Unknown Amt. Released: Unknown

QUAD/UNIT: _____ SEC: 15 TWP: 23N RNG: 3W PM: _____

Wellhead Lat/Long: Land Jurisdiction: QTR Footage:

Spill Located Approximately: Various FT. FROM P+A Marker

Excavation Approx: N/A FT. X N/A FT. X N/A FT. Cubic Yardage: N/A

Disposal Facility: TNT Land Farm Remediaton Method: Excavation

Land Use: Lease: Land Owner: Jicarilla

FIELD 418.1 ANLAYSIS

SAMPLE DESCRIPITION	TIME	SAMPLE I.D.	WEIGHT (g)	mL FREON	DILUTION	READING	CALC. ppm
200 std	11:07		—	—	—	181	
P+A marker	11:35		5	20	4	786	3144
Pump Jack	11:38		5	20	4	81	324
AST	11:42		5	20	4	174	696
P+A marker +1'	12:22		5	20	4	103	412
AST +1'	12:54		5	20	4	118	472

OVM Results

Sample ID	Field Headspace PID (ppm)	Sample ID	Field Headspace PID (ppm)	
P+A marker	134			
Pump Jack	1.8			
AST	1.2			
P+A Marker +1'	1.6			
AST +1'	1.4			

Lab Testing

Sample ID	Analysis Type	Time

Chacon Jicarilla Apache D #1 8/3/16

Discription	Time	Reading	OVM
200 standard	1:02	204	
P&A Marker + 12"	1:08	348x4 = 1392	4.1
P&A Marker + 4.5'	2:37	79x4 = 316	0.0
Walls	2:55	30x4 = 120	0.0

Table 1, Summary of Analytical Results
CrownQuest Operating
Chacon Jicarilla Apache D #1
BGT Closure Report
Project Number 07151-0019

Date	Sample Description	Sample Number	Method 300.0 Chlorides (mg/kg)	USEPA Method 418.1 TPH (mg/kg)	USEPA Method 8015 TPH (GRO+DRO) (mg/kg)	USEPA Method 8021	
						Benzene (mg/kg)	BTEX (mg/kg)
NA	New Mexico Administrative Code Standards	NA	20,000	2,500	1,000	10	50
7/21/2016	BGT	1	49.7	ND	ND	ND	ND

*Values in **BOLD** above regulatory limits *NS - Parameter not sampled *ND - Parameter not detected

Table 2, Summary of Analytical Results
CrownQuest Operating
Chacon Jicarilla Apache D #1
Confirmation Sampling Report
Project Number 07151-0019

Date	Sample Description	Sample Number	PID OV (mg/kg)	USEPA Method 418.1 TPH (mg/kg)	USEPA Method 8015 TPH (GRO+DRO) (mg/kg)	USEPA Method 8021	
						Benzene (mg/kg)	BTEX (mg/kg)
NA	New Mexico Oil Conservation Division Standards	NA	100	100	100	10	50
7/21/2016	P&A Marker	1	**134**	**3,144**	NS	NS	NS
7/21/2016	Pump Jack	2	1.8	**324**	67.1	ND	ND
7/21/2016	AST	3	1.2	**696**	NS	NS	NS
7/21/2016	P&A Marker+1'	4	1.6	**412**	**566**	ND	ND
7/21/2016	AST+1'	5	1.4	**472**	**119**	ND	ND
8/3/2016	P&A Marker+12"	6	4.1	**1,392**	NS	NS	NS
8/3/2016	P&A Marker+4.5'	7	0	**316**	63.8	ND	ND
8/3/2016	Walls	8	0	**120**	ND	ND	ND

*Values in **BOLD** above regulatory limits
*Closure Sample

*NS - Parameter not sampled *ND - Parameter not detected

envirotech

EPA METHOD 418.1 TOTAL PETROLEUM HYDROCARBONS

Client:	CrownQuest Operating	Project #:	07151-0019
Sample No.:	1	Date Reported:	9/23/2016
Sample ID:	P&A Marker	Date Sampled:	7/21/2016
Sample Matrix:	Soil	Date Analyzed:	7/21/2016
Preservative:	Cool	Analysis Needed:	TPH-418.1
Condition:	Cool and Intact		

Parameter	Concentration (mg/kg)	Det. Limit (mg/kg)
Total Petroleum Hydrocarbons	**3,140**	**5.0**

ND = Parameter not detected at the stated detection limit.

References: Method 418.1, Petroleum Hydrocarbons, Total Recoverable, Chemical Analysis of Water and Waste, USEPA Storet No. 4551, 1978.

Comments: **Chacon Jicarilla Apache D #1**

Instrument calibrated to 200 ppm standard and zeroed before each sample.

Analyst

Isaac Garcia
Printed

Review

Felipe Aragon, CES
Printed

5796 US Highway 64, Farmington, NM 87401 Ph (505) 632-0615 Fx (505) 632-1865
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EPA METHOD 418.1
TOTAL PETROLEUM
HYDROCARBONS

Client:	CrownQuest Operating	Project #:	07151-0019
Sample No.:	2	Date Reported:	9/23/2016
Sample ID:	Pump Jack	Date Sampled:	7/21/2016
Sample Matrix:	Soil	Date Analyzed:	7/21/2016
Preservative:	Cool	Analysis Needed:	TPH-418.1
Condition:	Cool and Intact		

Parameter	Concentration (mg/kg)	Det. Limit (mg/kg)
Total Petroleum Hydrocarbons	**324**	**5.0**

ND = Parameter not detected at the stated detection limit.

References: Method 418.1, Petroleum Hydrocarbons, Total Recoverable, Chemical Analysis of Water and Waste, USEPA Storet No. 4551, 1978.

Comments: **Chacon Jicarilla Apache D #1**

Instrument calibrated to 200 ppm standard and zeroed before each sample.

Analyst

Isaac Garcia
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Review

Felipe Aragon, CES
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EPA METHOD 418.1 TOTAL PETROLEUM HYDROCARBONS

Client:	CrownQuest Operating	Project #:	07151-0019
Sample No.:	3	Date Reported:	9/23/2016
Sample ID:	AST	Date Sampled:	7/21/2016
Sample Matrix:	Soil	Date Analyzed:	7/21/2016
Preservative:	Cool	Analysis Needed:	TPH-418.1
Condition:	Cool and Intact		

Parameter	Concentration (mg/kg)	Det. Limit (mg/kg)
Total Petroleum Hydrocarbons	**696**	**5.0**

ND = Parameter not detected at the stated detection limit.

References: Method 418.1, Petroleum Hydrocarbons, Total Recoverable, Chemical Analysis of Water and Waste, USEPA Storet No. 4551, 1978.

Comments: **Chacon Jicarilla Apache D #1**

Instrument calibrated to 200 ppm standard and zeroed before each sample.

Analyst

Isaac Garcia
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Review

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EPA METHOD 418.1 TOTAL PETROLEUM HYDROCARBONS

Client:	CrownQuest Operating	Project #:	07151-0019
Sample No.:	4	Date Reported:	9/23/2016
Sample ID:	P&A Marker+1'	Date Sampled:	7/21/2016
Sample Matrix:	Soil	Date Analyzed:	7/21/2016
Preservative:	Cool	Analysis Needed:	TPH-418.1
Condition:	Cool and Intact		

Parameter	Concentration (mg/kg)	Det. Limit (mg/kg)
Total Petroleum Hydrocarbons	**412**	**5.0**

ND = Parameter not detected at the stated detection limit.

References: Method 418.1, Petroleum Hydrocarbons, Total Recoverable, Chemical Analysis of Water and Waste, USEPA Storet No. 4551, 1978.

Comments: **Chacon Jicarilla Apache D #1**

Instrument calibrated to 200 ppm standard and zeroed before each sample.

Analyst

Isaac Garcia
Printed

Review

Felipe Aragon, CES
Printed

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EPA METHOD 418.1
TOTAL PETROLEUM HYDROCARBONS

Client:	CrownQuest Operating	Project #:	07151-0019
Sample No.:	5	Date Reported:	9/23/2016
Sample ID:	AST+1'	Date Sampled:	7/21/2016
Sample Matrix:	Soil	Date Analyzed:	7/21/2016
Preservative:	Cool	Analysis Needed:	TPH-418.1
Condition:	Cool and Intact		

Parameter	Concentration (mg/kg)	Det. Limit (mg/kg)
Total Petroleum Hydrocarbons	**472**	**5.0**

ND = Parameter not detected at the stated detection limit.

References: Method 418.1, Petroleum Hydrocarbons, Total Recoverable, Chemical Analysis of Water and Waste, USEPA Storet No. 4551, 1978.

Comments: **Chacon Jicarilla Apache D #1**

Instrument calibrated to 200 ppm standard and zeroed before each sample.

Analyst

Isaac Garcia
Printed

Review

Felipe Aragon, CES
Printed

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EPA METHOD 418.1 TOTAL PETROLEUM HYDROCARBONS

Client:	CrownQuest Operating	Project #:	07151-0019
Sample No.:	6	Date Reported:	9/23/2016
Sample ID:	BGT Comp	Date Sampled:	7/21/2016
Sample Matrix:	Soil	Date Analyzed:	7/21/2016
Preservative:	Cool	Analysis Needed:	TPH-418.1
Condition:	Cool and Intact		

Parameter	Concentration (mg/kg)	Det. Limit (mg/kg)
Total Petroleum Hydrocarbons	**144**	**5.0**

ND = Parameter not detected at the stated detection limit.

References: Method 418.1, Petroleum Hydrocarbons, Total Recoverable, Chemical Analysis of Water and Waste, USEPA Storet No. 4551, 1978.

Comments: **Chacon Jicarilla Apache D #1**

Instrument calibrated to 200 ppm standard and zeroed before each sample.

Analyst

Isaac Garcia
Printed

Review

Felipe Aragon, CES
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CONTINUOUS CALIBRATION
EPA METHOD 418.1
TOTAL PETROLEUM
HYDROCARBONS

Cal. Date: 21-Jul-16

Parameter	Standard Concentration mg/L	Concentration Reading mg/L
TPH	100	
	200	181
	500	
	1000	
	5000	

The accepted percent relative deviation (%RSD) of the calibration factor is less than 20% over the working range.

Analyst — Date: 9/23/2016

Isaac Garcia
Print Name

Review — Date: 9/23/2016

Felipe Aragon, CES
Print Name

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EPA METHOD 418.1 TOTAL PETROLEUM HYDROCARBONS

Client:	CrownQuest Operating	Project #:	07151-0019
Sample No.:	1	Date Reported:	9/23/2016
Sample ID:	P&A Marker+12"	Date Sampled:	8/3/2016
Sample Matrix:	Soil	Date Analyzed:	8/3/2016
Preservative:	Cool	Analysis Needed:	TPH-418.1
Condition:	Cool and Intact		

Parameter	Concentration (mg/kg)	Det. Limit (mg/kg)
Total Petroleum Hydrocarbons	**1,390**	**5.0**

ND = Parameter not detected at the stated detection limit.

References: Method 418.1, Petroleum Hydrocarbons, Total Recoverable, Chemical Analysis of Water and Waste, USEPA Storet No. 4551, 1978.

Comments: **Chacon Jicarilla Apache D #1**

Instrument calibrated to 200 ppm standard and zeroed before each sample.

Analyst

Isaac Garcia
Printed

Review

Felipe Aragon, CES
Printed

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EPA METHOD 418.1
TOTAL PETROLEUM HYDROCARBONS

Client:	CrownQuest Operating	Project #:	07151-0019
Sample No.:	2	Date Reported:	9/23/2016
Sample ID:	P&A Marker+4.5'	Date Sampled:	8/3/2016
Sample Matrix:	Soil	Date Analyzed:	8/3/2016
Preservative:	Cool	Analysis Needed:	TPH-418.1
Condition:	Cool and Intact		

Parameter	Concentration (mg/kg)	Det. Limit (mg/kg)
Total Petroleum Hydrocarbons	**316**	**5.0**

ND = Parameter not detected at the stated detection limit.

References: Method 418.1, Petroleum Hydrocarbons, Total Recoverable, Chemical Analysis of Water and Waste, USEPA Storet No. 4551, 1978.

Comments: **Chacon Jicarilla Apache D #1**

Instrument calibrated to 200 ppm standard and zeroed before each sample.

Analyst

Isaac Garcia
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Review

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EPA METHOD 418.1
TOTAL PETROLEUM
HYDROCARBONS

Client:	CrownQuest Operating	Project #:	07151-0019
Sample No.:	3	Date Reported:	9/23/2016
Sample ID:	Walls	Date Sampled:	8/3/2016
Sample Matrix:	Soil	Date Analyzed:	8/3/2016
Preservative:	Cool	Analysis Needed:	TPH-418.1
Condition:	Cool and Intact		

Parameter	Concentration (mg/kg)	Det. Limit (mg/kg)
Total Petroleum Hydrocarbons	**120**	**5.0**

ND = Parameter not detected at the stated detection limit.

References: Method 418.1, Petroleum Hydrocarbons, Total Recoverable, Chemical Analysis of Water and Waste, USEPA Storet No. 4551, 1978.

Comments: **Chacon Jicarilla Apache D #1**

Instrument calibrated to 200 ppm standard and zeroed before each sample.

Analyst

Isaac Garcia
Printed

Review

Felipe Aragon, CES
Printed

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CONTINUOUS CALIBRATION
EPA METHOD 418.1
TOTAL PETROLEUM
HYDROCARBONS

Cal. Date: 3-Aug-16

Parameter	Standard Concentration mg/L	Concentration Reading mg/L
TPH	100	
	200	204
	500	
	1000	
	5000	

The accepted percent relative deviation (%RSD) of the calibration factor is less than 20% over the working range.

Analyst — Date: 9/23/2016

Isaac Garcia
Print Name

Review — Date: 9/23/2016

Felipe Aragon, CES
Print Name

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Analytical Report

Report Summary

Client: Crown Quest Operating

Chain Of Custody Number:

Samples Received: 7/7/2016 4:08:00PM

Job Number: 07151-0019

Work Order: P607023

Project Name/Location: Chacon Jicarilla Apache D #1

Report Reviewed By:

Walter Hinchman, Laboratory Director — Date: 7/14/16

Tim Cain, Quality Assurance Officer — Date: 7/14/16

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	14-Jul-16 13:46

Analyical Report for Samples

Client Sample ID	Lab Sample ID	Matrix	Sampled	Received	Container
Contaminated Soil	P607023-01A	Solid	07/07/16	07/07/16	Glass Jar, 4 oz.

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	14-Jul-16 13:46

Contaminated Soil

P607023-01 (Solid)

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
TCLP Metals									
Arsenic	ND	0.05	mg/L	1	1629006	07/13/16	07/13/16	EPA 6010C	
Barium	1.04	0.50	mg/L	1	1629006	07/13/16	07/13/16	EPA 6010C	
Cadmium	ND	0.01	mg/L	1	1629006	07/13/16	07/13/16	EPA 6010C	
Chromium	ND	0.05	mg/L	1	1629006	07/13/16	07/13/16	EPA 6010C	
Lead	ND	0.02	mg/L	1	1629006	07/13/16	07/13/16	EPA 6010C	
Selenium	ND	0.05	mg/L	1	1629006	07/13/16	07/13/16	EPA 6010C	
Silver	ND	0.03	mg/L	1	1629006	07/13/16	07/13/16	EPA 6010C	
TCLP Mercury by EPA 7470A									
Mercury	ND	0.0002	mg/L	1	1629007	07/13/16	07/13/16	EPA 7470A	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	14-Jul-16 13:46

TCLP Metals - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1629006 - Metal Water Digestion EPA 3015A										
Blank (1629006-BLK1)				Prepared & Analyzed: 13-Jul-16						
Arsenic	ND	0.05	mg/L							
Barium	ND	0.50	"							
Cadmium	ND	0.01	"							
Chromium	ND	0.05	"							
Lead	ND	0.02	"							
Selenium	ND	0.05	"							
Silver	ND	0.03	"							
LCS (1629006-BS1)				Prepared & Analyzed: 13-Jul-16						
Arsenic	0.82	0.05	mg/L	1.00		81.6	80-120			
Barium	0.93	0.50	"	1.00		93.2	80-120			
Cadmium	0.85	0.01	"	1.00		84.8	80-120			
Chromium	0.86	0.05	"	1.00		86.1	80-120			
Lead	0.83	0.02	"	1.00		82.7	80-120			
Selenium	0.82	0.05	"	1.00		82.2	80-120			
Silver	0.84	0.03	"	1.00		84.1	80-120			
Matrix Spike (1629006-MS1)	Source: P607023-01			Prepared & Analyzed: 13-Jul-16						
Arsenic	0.88	0.05	mg/L	1.00	ND	88.3	75-125			
Barium	1.96	0.50	"	1.00	1.04	91.9	75-125			
Cadmium	0.84	0.01	"	1.00	ND	84.3	75-125			
Chromium	0.85	0.05	"	1.00	ND	85.3	75-125			
Lead	0.78	0.02	"	1.00	ND	77.7	75-125			
Selenium	0.92	0.05	"	1.00	ND	91.8	75-125			
Silver	0.88	0.03	"	1.00	ND	88.3	75-125			
Matrix Spike Dup (1629006-MSD1)	Source: P607023-01			Prepared & Analyzed: 13-Jul-16						
Arsenic	0.88	0.05	mg/L	1.00	ND	88.3	75-125	0.0629	20	
Barium	1.92	0.50	"	1.00	1.04	87.4	75-125	2.29	20	
Cadmium	0.84	0.01	"	1.00	ND	83.8	75-125	0.489	20	
Chromium	0.85	0.05	"	1.00	ND	84.6	75-125	0.811	20	
Lead	0.78	0.02	"	1.00	ND	77.7	75-125	0.0286	20	
Selenium	0.92	0.05	"	1.00	ND	91.6	75-125	0.279	20	
Silver	0.88	0.03	"	1.00	ND	87.5	75-125	0.935	20	

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Analytical Laboratory

Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	14-Jul-16 13:46

TCLP Mercury by EPA 7470A - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1629007 - Mercury Water Digestion KMNO4										
Blank (1629007-BLK1)				Prepared & Analyzed: 13-Jul-16						
Mercury	ND	0.0002	mg/L							
LCS (1629007-BS1)				Prepared & Analyzed: 13-Jul-16						
Mercury	0.002	0.0002	mg/L	0.00229		101	80-120			
Matrix Spike (1629007-MS1)		Source: P607028-01		Prepared & Analyzed: 13-Jul-16						
Mercury	0.002	0.0002	mg/L	0.00229	ND	102	75-125			
Matrix Spike Dup (1629007-MSD1)		Source: P607028-01		Prepared & Analyzed: 13-Jul-16						
Mercury	0.002	0.0002	mg/L	0.00229	ND	104	75-125	1.47	15	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	14-Jul-16 13:46

Notes and Definitions

DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference

Client: Crown Quest

Project: Chacon Jicarilla Apache DF 1

Sampler: R. Garcia

Phone:

Email(s): Rsaac

Project Manager: Greg Crabtree

RUSH?
- [ ] 1d
- [ ] 3d

Lab Use Only
Lab WO# P607023
Job Number 07151-0019

Page 1 of 1

Sample ID	Sample Date	Sample Time	Matrix	Containers QTY - Vol/TYPE/Preservative	GRO/DRO by 8015	BTEX by 8021	TPH by 418.1	Chloride by 300.0	TCLP Metals	CO Table 910-1	TDS			Lab Number	Correct Cont/Prsrv (s) Y/N
Contaminated soil	7/7/16	1:32	S	1-4oz/Gl/cool					X					1	Y

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
	7/7/16	16:08		7/7/16	1684
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time

Lab Use Only
**Received on Ice Y / N
T1____ T2____ T3____
AVG Temp °C 4.0

Sample Matrix: S - Soil, Sd - Solid, Sg - Sludge, A - Aqueous, O - Other _____

Container Type: g - glass, p - poly/plastic, ag - amber glass

**Samples requiring thermal preservation must be received on ice the day they are sampled or received packed in ice at an avg temp above 0 but less than 6 °C on subsequent days.

- [ ] Sample(s) dropped off after hours to a secure drop off area.

Chain of Custody

Notes/Billing info:

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Analytical Report

Report Summary

Client: Crown Quest Operating

Chain Of Custody Number:

Samples Received: 7/21/2016 5:28:00PM

Job Number: 07151-0019

Work Order: P607056

Project Name/Location: Chacon Jicarilla Apache D #1

Report Reviewed By:

Walter Hinchman, Laboratory Director — Date: 8/1/16

Tim Cain, Quality Assurance Officer — Date: 8/1/16

Supplement to analytical report generated on: 8/1/16 8:32 am

The results in this report apply to the samples submitted to Envirotech's Analytical Laboratory and were analyzed in accordance with the chain of custody document supplied by you, the client, and as such are for your exclusive use only. The results in this report are based on the sample as received unless otherwise noted. Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc. If you have any questions regarding this analytical report, please don't hesitate to contact Envirotech's Laboratory Staff.

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

Analyical Report for Samples

Client Sample ID	Lab Sample ID	Matrix	Sampled	Received	Container
Pump Jack Pad	P607056-01A	Solid	07/21/16	07/21/16	Glass Jar, 4 oz.
BGT Comp.	P607056-02A	Solid	07/21/16	07/21/16	Glass Jar, 4 oz.
P&A Marker + 1'	P607056-03A	Solid	07/21/16	07/21/16	Glass Jar, 4 oz.
AST Comp. + 1'	P607056-04A	Solid	07/21/16	07/21/16	Glass Jar, 4 oz.

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

Pump Jack Pad

P607056-01 (Solid)

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Volatile Organics by EPA 8021									
Benzene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Toluene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Ethylbenzene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
p,m-Xylene	ND	0.20	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
o-Xylene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Total Xylenes	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Total BTEX	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Surrogate: 4-Bromochlorobenzene-PID		*100 %*		*50-150*	*1630010*	*07/22/16*	*07/27/16*	*EPA 8021B*	
Nonhalogenated Organics by 8015									
Gasoline Range Organics (C6-C10)	ND	20.0	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8015D	
Diesel Range Organics (C10-C28)	**67.1**	25.0	mg/kg	1	1630011	07/22/16	07/26/16	EPA 8015D	
Surrogate: 1-Chloro-4-fluorobenzene-FID		*98.6 %*		*50-150*	*1630010*	*07/22/16*	*07/27/16*	*EPA 8015D*	
Oil Range Organics (C28-C40+)	**169**	50.0	mg/kg	1	1630011	07/22/16	07/26/16	EPA 8015D	
Surrogate: n-Nonane		*94.9 %*		*50-200*	*1630011*	*07/22/16*	*07/26/16*	*EPA 8015D*	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

BGT Comp.

P607056-02 (Solid)

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Volatile Organics by EPA 8021									
Benzene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Toluene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Ethylbenzene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
p,m-Xylene	ND	0.20	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
o-Xylene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Total Xylenes	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Total BTEX	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Surrogate: 4-Bromochlorobenzene-PID		*99.8 %*		*50-150*	*1630010*	*07/22/16*	*07/27/16*	*EPA 8021B*	
Nonhalogenated Organics by 8015									
Gasoline Range Organics (C6-C10)	ND	20.0	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8015D	
Diesel Range Organics (C10-C28)	ND	25.0	mg/kg	1	1630011	07/22/16	07/26/16	EPA 8015D	
Surrogate: 1-Chloro-4-fluorobenzene-FID		*99.2 %*		*50-150*	*1630010*	*07/22/16*	*07/27/16*	*EPA 8015D*	
Oil Range Organics (C28-C40+)	ND	50.0	mg/kg	1	1630011	07/22/16	07/26/16	EPA 8015D	
Surrogate: n-Nonane		*88.6 %*		*50-200*	*1630011*	*07/22/16*	*07/26/16*	*EPA 8015D*	
Total Petroleum Hydrocarbons by 418.1									
Total Petroleum Hydrocarbons	ND	40.0	mg/kg	1	1631001	07/26/16	07/26/16	EPA 418.1	
Cation/Anion Analysis									
Chloride	**49.7**	20.0	mg/kg	1	1630014	07/22/16	07/27/16	EPA 300.0	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

P&A Marker + 1'

P607056-03 (Solid)

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Volatile Organics by EPA 8021									
Benzene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Toluene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Ethylbenzene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
p,m-Xylene	ND	0.20	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
o-Xylene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Total Xylenes	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Total BTEX	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Surrogate: 4-Bromochlorobenzene-PID		*100 %*		*50-150*	*1630010*	*07/22/16*	*07/27/16*	*EPA 8021B*	
Nonhalogenated Organics by 8015									
Gasoline Range Organics (C6-C10)	ND	20.0	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8015D	
Diesel Range Organics (C10-C28)	**566**	25.0	mg/kg	1	1630011	07/22/16	07/26/16	EPA 8015D	
Surrogate: 1-Chloro-4-fluorobenzene-FID		*98.0 %*		*50-150*	*1630010*	*07/22/16*	*07/27/16*	*EPA 8015D*	
Oil Range Organics (C28-C40+)	**691**	50.0	mg/kg	1	1630011	07/22/16	07/26/16	EPA 8015D	
Surrogate: n-Nonane		*99.1 %*		*50-200*	*1630011*	*07/22/16*	*07/26/16*	*EPA 8015D*	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

AST Comp. + 1'

P607056-04 (Solid)

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Volatile Organics by EPA 8021									
Benzene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Toluene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Ethylbenzene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
p,m-Xylene	ND	0.20	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
o-Xylene	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Total Xylenes	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Total BTEX	ND	0.10	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8021B	
Surrogate: 4-Bromochlorobenzene-PID		*99.6 %*		*50-150*	*1630010*	*07/22/16*	*07/27/16*	*EPA 8021B*	
Nonhalogenated Organics by 8015									
Gasoline Range Organics (C6-C10)	ND	20.0	mg/kg	1	1630010	07/22/16	07/27/16	EPA 8015D	
Diesel Range Organics (C10-C28)	**119**	25.0	mg/kg	1	1630011	07/22/16	07/26/16	EPA 8015D	
Surrogate: 1-Chloro-4-fluorobenzene-FID		*99.2 %*		*50-150*	*1630010*	*07/22/16*	*07/27/16*	*EPA 8015D*	
Oil Range Organics (C28-C40+)	**245**	50.0	mg/kg	1	1630011	07/22/16	07/26/16	EPA 8015D	
Surrogate: n-Nonane		*89.6 %*		*50-200*	*1630011*	*07/22/16*	*07/26/16*	*EPA 8015D*	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

Volatile Organics by EPA 8021 - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1630010 - Purge and Trap EPA 5030A										
Blank (1630010-BLK1)				Prepared: 21-Jul-16 Analyzed: 22-Jul-16						
Benzene	ND	0.10	mg/kg							
Toluene	ND	0.10	"							
Ethylbenzene	ND	0.10	"							
p,m-Xylene	ND	0.20	"							
o-Xylene	ND	0.10	"							
Total Xylenes	ND	0.10	"							
Total BTEX	ND	0.10	"							
Surrogate: 4-Bromochlorobenzene-PID	*0.159*		"	*0.160*		*99.5*	*50-150*			
LCS (1630010-BS1)				Prepared: 21-Jul-16 Analyzed: 22-Jul-16						
Benzene	11.6	0.10	mg/kg	10.0		116	70-130			
Toluene	11.3	0.10	"	10.0		114	70-130			
Ethylbenzene	11.3	0.10	"	10.0		113	70-130			
p,m-Xylene	22.5	0.20	"	20.0		112	70-130			
o-Xylene	11.0	0.10	"	10.0		110	70-130			
Surrogate: 4-Bromochlorobenzene-PID	*0.162*		"	*0.160*		*101*	*50-150*			
Matrix Spike (1630010-MS1)		**Source: P607050-01**		Prepared: 21-Jul-16 Analyzed: 22-Jul-16						
Benzene	11.4	0.10	mg/kg	10.0	ND	115	54.3-133			
Toluene	11.3	0.10	"	10.0	0.20	111	61.4-130			
Ethylbenzene	11.2	0.10	"	10.0	ND	112	61.4-133			
p,m-Xylene	22.3	0.20	"	20.0	0.32	110	63.3-131			
o-Xylene	11.0	0.10	"	10.0	0.22	108	63.3-131			
Surrogate: 4-Bromochlorobenzene-PID	*0.162*		"	*0.160*		*102*	*50-150*			
Matrix Spike Dup (1630010-MSD1)		**Source: P607050-01**		Prepared: 21-Jul-16 Analyzed: 22-Jul-16						
Benzene	11.1	0.10	mg/kg	10.0	ND	111	54.3-133	3.38	20	
Toluene	11.0	0.10	"	10.0	0.20	108	61.4-130	3.38	20	
Ethylbenzene	10.8	0.10	"	10.0	ND	108	61.4-133	3.42	20	
p,m-Xylene	21.6	0.20	"	20.0	0.32	106	63.3-131	3.37	20	
o-Xylene	10.6	0.10	"	10.0	0.22	104	63.3-131	3.25	20	
Surrogate: 4-Bromochlorobenzene-PID	*0.164*		"	*0.160*		*102*	*50-150*			

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

Nonhalogenated Organics by 8015 - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1630010 - Purge and Trap EPA 5030A										
Blank (1630010-BLK1)				Prepared: 21-Jul-16 Analyzed: 22-Jul-16						
Gasoline Range Organics (C6-C10)	ND	20.0	mg/kg							
Surrogate: 1-Chloro-4-fluorobenzene-FID	*0.166*		"	*0.160*		*103*	*50-150*			
LCS (1630010-BS1)				Prepared: 21-Jul-16 Analyzed: 22-Jul-16						
Gasoline Range Organics (C6-C10)	138	20.0	mg/kg	122		113	70-130			
Surrogate: 1-Chloro-4-fluorobenzene-FID	*0.160*		"	*0.160*		*100*	*50-150*			
Matrix Spike (1630010-MS1)		**Source: P607050-01**		Prepared: 21-Jul-16 Analyzed: 22-Jul-16						
Gasoline Range Organics (C6-C10)	141	20.0	mg/kg	122	ND	116	70-130			
Surrogate: 1-Chloro-4-fluorobenzene-FID	*0.159*		"	*0.160*		*99.3*	*50-150*			
Matrix Spike Dup (1630010-MSD1)		**Source: P607050-01**		Prepared: 21-Jul-16 Analyzed: 22-Jul-16						
Gasoline Range Organics (C6-C10)	140	20.0	mg/kg	122	ND	115	70-130	0.928	20	
Surrogate: 1-Chloro-4-fluorobenzene-FID	*0.163*		"	*0.160*		*102*	*50-150*			

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Analytical Laboratory

Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

Nonhalogenated Organics by 8015 - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1630011 - DRO Extraction EPA 3550M										
Blank (1630011-BLK1)				Prepared: 21-Jul-16 Analyzed: 25-Jul-16						
Diesel Range Organics (C10-C28)	ND	25.0	mg/kg							
Surrogate: n-Nonane	*45.3*		"	*50.0*		*90.6*	*50-200*			
LCS (1630011-BS1)				Prepared: 21-Jul-16 Analyzed: 25-Jul-16						
Diesel Range Organics (C10-C28)	399	25.0	mg/kg	500		79.8	38-132			
Surrogate: n-Nonane	*40.5*		"	*50.0*		*81.0*	*50-200*			
Matrix Spike (1630011-MS1)		**Source: P607050-01**		Prepared: 21-Jul-16 Analyzed: 25-Jul-16						
Diesel Range Organics (C10-C28)	1070	25.0	mg/kg	500	685	76.4	38-132			
Surrogate: n-Nonane	*44.7*		"	*50.0*		*89.4*	*50-200*			
Matrix Spike Dup (1630011-MSD1)		**Source: P607050-01**		Prepared: 21-Jul-16 Analyzed: 25-Jul-16						
Diesel Range Organics (C10-C28)	1050	25.0	mg/kg	500	685	72.1	38-132	2.01	20	
Surrogate: n-Nonane	*44.5*		"	*50.0*		*89.1*	*50-200*			

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

Total Petroleum Hydrocarbons by 418.1 - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1631001 - 418 Freon Extraction										
Blank (1631001-BLK1)				Prepared & Analyzed: 26-Jul-16						
Total Petroleum Hydrocarbons	ND	40.0	mg/kg							
LCS (1631001-BS1)				Prepared & Analyzed: 26-Jul-16						
Total Petroleum Hydrocarbons	914	40.0	mg/kg	1000		91.4	80-120			
Matrix Spike (1631001-MS1)	**Source: P607056-02**			Prepared & Analyzed: 26-Jul-16						
Total Petroleum Hydrocarbons	932	40.0	mg/kg	1000	ND	93.2	70-130			
Matrix Spike Dup (1631001-MSD1)	**Source: P607056-02**			Prepared & Analyzed: 26-Jul-16						
Total Petroleum Hydrocarbons	932	40.0	mg/kg	1000	ND	93.2	70-130	0.00	30	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

Cation/Anion Analysis - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1630014 - Anion Extraction EPA 300.0										
Blank (1630014-BLK1)				Prepared: 22-Jul-16 Analyzed: 27-Jul-16						
Chloride	ND	20.0	mg/kg							
LCS (1630014-BS1)				Prepared: 22-Jul-16 Analyzed: 27-Jul-16						
Chloride	510	20.0	mg/kg	500		102	90-110			
Matrix Spike (1630014-MS1)	**Source: P607050-01**			Prepared: 22-Jul-16 Analyzed: 27-Jul-16						
Chloride	1300	20.0	mg/kg	500	768	106	80-120			
Matrix Spike Dup (1630014-MSD1)	**Source: P607050-01**			Prepared: 22-Jul-16 Analyzed: 27-Jul-16						
Chloride	1320	20.0	mg/kg	500	768	110	80-120	1.48	20	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D #1	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	01-Aug-16 08:35

Notes and Definitions

DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference

Client: Crown Quest
Project: Crown Quest
Sampler: E. Garcia
Phone:
Email(s): Esaac / Felipe
Project Manager: Greg Crabtree

RUSH? ☐ 1d ☐ 3d

Lab Use Only
Lab WO# P607056
Job Number 07151-0019

Page 1 of 1

Sample ID	Sample Date	Sample Time	Matrix	Containers QTY - Vol/TYPE/Preservative	GRO/DRO by 8015 + exto	BTEX by 8021	TPH by 418.1	Chloride by 300.0	TCLP Metals	CO Table 910-1	TDS			Lab Number	Correct Cont/Prsrv (s) Y/N
Pump Jack pad	7/21/16	10:31	S	1-4oz/G/cool	X	X								1	Y
BGT Comp.		10:44			X	X	X	X						2	
P+A Marker +1'		12:10			X	X								3	
AST Comp. +1'		12:38			X	X								4	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
	7/21/16	17:28		7/21/16	1728
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time

Lab Use Only
**Received on Ice Y / N
T1____ T2____ T3____
AVG Temp °C 4.0

Sample Matrix: S - Soil, Sd - Solid, Sg - Sludge, A - Aqueous, O - Other _____
Container Type: g - glass, p - poly/plastic, ag - amber glass

**Samples requiring thermal preservation must be received on ice the day they are sampled or received packed in ice at an avg temp above 0 but less than 6 °C on subsequent days.

☒ Sample(s) dropped off after hours to a secure drop off area.

Chain of Custody

Notes/Billing info:

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Analytical Report

Report Summary

Client: Crown Quest Operating

Chain Of Custody Number:

Samples Received: 8/3/2016 4:50:00PM

Job Number: 07151-0019

Work Order: P608016

Project Name/Location: Chacon Jicarilla Apache
D#1 07151-0019

Report Reviewed By: _____ Date: 8/11/16

Walter Hinchman, Laboratory Director

_____ Date: 8/11/16

Tim Cain, Quality Assurance Officer

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D#1 07151-0019	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	11-Aug-16 16:30

Analyical Report for Samples

Client Sample ID	Lab Sample ID	Matrix	Sampled	Received	Container
P + A Marker + 4.5'	P608016-01A	Soil	08/03/16	08/03/16	Glass Jar, 4 oz.
Walls	P608016-02A	Soil	08/03/16	08/03/16	Glass Jar, 4 oz.

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D#1 07151-0019	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	11-Aug-16 16:30

P + A Marker + 4.5'

P608016-01 (Solid)

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Volatile Organics by EPA 8021									
Benzene	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Toluene	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Ethylbenzene	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
p,m-Xylene	ND	0.20	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
o-Xylene	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Total Xylenes	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Total BTEX	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Surrogate: 4-Bromochlorobenzene-PID		*99.6 %*		*50-150*	*1633012*	*08/09/16*	*08/10/16*	*EPA 8021B*	
Nonhalogenated Organics by 8015									
Gasoline Range Organics (C6-C10)	ND	20.0	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8015D	
Diesel Range Organics (C10-C28)	63.8	25.0	mg/kg	1	1633013	08/10/16	08/10/16	EPA 8015D	
Surrogate: 1-Chloro-4-fluorobenzene-FID		*103 %*		*50-150*	*1633012*	*08/09/16*	*08/10/16*	*EPA 8015D*	
Oil Range Organics (C28-C40+)	63.0	50.0	mg/kg	1	1633013	08/10/16	08/10/16	EPA 8015D	
Surrogate: n-Nonane		*80.5 %*		*50-200*	*1633013*	*08/10/16*	*08/10/16*	*EPA 8015D*	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D#1 07151-0019	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	11-Aug-16 16:30

Walls

P608016-02 (Solid)

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Volatile Organics by EPA 8021									
Benzene	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Toluene	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Ethylbenzene	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
p,m-Xylene	ND	0.20	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
o-Xylene	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Total Xylenes	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Total BTEX	ND	0.10	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8021B	
Surrogate: 4-Bromochlorobenzene-PID		*100 %*		*50-150*	*1633012*	*08/09/16*	*08/10/16*	*EPA 8021B*	
Nonhalogenated Organics by 8015									
Gasoline Range Organics (C6-C10)	ND	20.0	mg/kg	1	1633012	08/09/16	08/10/16	EPA 8015D	
Diesel Range Organics (C10-C28)	ND	25.0	mg/kg	1	1633013	08/10/16	08/10/16	EPA 8015D	
Surrogate: 1-Chloro-4-fluorobenzene-FID		*103 %*		*50-150*	*1633012*	*08/09/16*	*08/10/16*	*EPA 8015D*	
Oil Range Organics (C28-C40+)	ND	50.0	mg/kg	1	1633013	08/10/16	08/10/16	EPA 8015D	
Surrogate: n-Nonane		*83.2 %*		*50-200*	*1633013*	*08/10/16*	*08/10/16*	*EPA 8015D*	

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D#1 07151-0019	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	11-Aug-16 16:30

Volatile Organics by EPA 8021 - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1633012 - Purge and Trap EPA 5030A										
Blank (1633012-BLK1)				Prepared: 09-Aug-16 Analyzed: 10-Aug-16						
Benzene	ND	0.10	mg/kg							
Toluene	ND	0.10	"							
Ethylbenzene	ND	0.10	"							
p,m-Xylene	ND	0.20	"							
o-Xylene	ND	0.10	"							
Total Xylenes	ND	0.10	"							
Total BTEX	ND	0.10	"							
Surrogate: 4-Bromochlorobenzene-PID	*0.159*		"	*0.160*		*99.4*	*50-150*			
LCS (1633012-BS1)				Prepared: 09-Aug-16 Analyzed: 10-Aug-16						
Benzene	10.4	0.10	mg/kg	10.0		104	70-130			
Toluene	10.4	0.10	"	10.0		104	70-130			
Ethylbenzene	10.2	0.10	"	10.0		102	70-130			
p,m-Xylene	20.4	0.20	"	20.0		102	70-130			
o-Xylene	9.99	0.10	"	10.0		99.9	70-130			
Surrogate: 4-Bromochlorobenzene-PID	*0.161*		"	*0.160*		*101*	*50-150*			
Matrix Spike (1633012-MS1)		**Source: P608016-01**		Prepared: 09-Aug-16 Analyzed: 10-Aug-16						
Benzene	10.5	0.10	mg/kg	10.0	ND	105	54.3-133			
Toluene	10.4	0.10	"	10.0	ND	104	61.4-130			
Ethylbenzene	10.2	0.10	"	10.0	ND	102	61.4-133			
p,m-Xylene	20.4	0.20	"	20.0	ND	102	63.3-131			
o-Xylene	10.0	0.10	"	10.0	ND	100	63.3-131			
Surrogate: 4-Bromochlorobenzene-PID	*0.160*		"	*0.160*		*100*	*50-150*			
Matrix Spike Dup (1633012-MSD1)		**Source: P608016-01**		Prepared: 09-Aug-16 Analyzed: 10-Aug-16						
Benzene	10.8	0.10	mg/kg	10.0	ND	108	54.3-133	3.04	20	
Toluene	10.7	0.10	"	10.0	ND	107	61.4-130	3.03	20	
Ethylbenzene	10.5	0.10	"	10.0	ND	106	61.4-133	3.08	20	
p,m-Xylene	21.0	0.20	"	20.0	ND	105	63.3-131	3.18	20	
o-Xylene	10.3	0.10	"	10.0	ND	103	63.3-131	2.93	20	
Surrogate: 4-Bromochlorobenzene-PID	*0.159*		"	*0.160*		*99.3*	*50-150*			

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Analytical Laboratory

Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D#1 07151-0019	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	11-Aug-16 16:30

Nonhalogenated Organics by 8015 - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1633012 - Purge and Trap EPA 5030A										
Blank (1633012-BLK1)				Prepared: 09-Aug-16 Analyzed: 10-Aug-16						
Gasoline Range Organics (C6-C10)	ND	20.0	mg/kg							
Surrogate: 1-Chloro-4-fluorobenzene-FID	*0.170*		"	*0.160*		*106*	*50-150*			
LCS (1633012-BS1)				Prepared: 09-Aug-16 Analyzed: 10-Aug-16						
Gasoline Range Organics (C6-C10)	134	20.0	mg/kg	106		127	70-130			
Surrogate: 1-Chloro-4-fluorobenzene-FID	*0.169*		"	*0.160*		*105*	*50-150*			
Matrix Spike (1633012-MS1)	**Source: P608016-01**			Prepared: 09-Aug-16 Analyzed: 10-Aug-16						
Gasoline Range Organics (C6-C10)	132	20.0	mg/kg	106	ND	125	70-130			
Surrogate: 1-Chloro-4-fluorobenzene-FID	*0.167*		"	*0.160*		*104*	*50-150*			
Matrix Spike Dup (1633012-MSD1)	**Source: P608016-01**			Prepared: 09-Aug-16 Analyzed: 10-Aug-16						
Gasoline Range Organics (C6-C10)	134	20.0	mg/kg	106	ND	127	70-130	1.20	20	
Surrogate: 1-Chloro-4-fluorobenzene-FID	*0.163*		"	*0.160*		*102*	*50-150*			

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Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D#1 07151-0019	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	11-Aug-16 16:30

Nonhalogenated Organics by 8015 - Quality Control

Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch 1633013 - DRO Extraction EPA 3570										
Blank (1633013-BLK1)				Prepared & Analyzed: 10-Aug-16						
Diesel Range Organics (C10-C28)	ND	25.0	mg/kg							
Oil Range Organics (C28-C40+)	ND	50.0	"							
Surrogate: n-Nonane	*39.8*		*"*	*50.0*		*79.6*	*50-200*			
LCS (1633013-BS1)				Prepared & Analyzed: 10-Aug-16						
Diesel Range Organics (C10-C28)	376	25.0	mg/kg	500		75.1	38-132			
Surrogate: n-Nonane	*40.4*		*"*	*50.0*		*80.8*	*50-200*			
Matrix Spike (1633013-MS1)		**Source: P608016-01**		Prepared & Analyzed: 10-Aug-16						
Diesel Range Organics (C10-C28)	435	25.0	mg/kg	500	63.8	74.3	38-132			
Surrogate: n-Nonane	*40.9*		*"*	*50.0*		*81.7*	*50-200*			
Matrix Spike Dup (1633013-MSD1)		**Source: P608016-01**		Prepared & Analyzed: 10-Aug-16						
Diesel Range Organics (C10-C28)	440	25.0	mg/kg	500	63.8	75.2	38-132	1.03	20	
Surrogate: n-Nonane	*39.8*		*"*	*50.0*		*79.5*	*50-200*			

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Analytical Laboratory

Crown Quest Operating	Project Name:	Chacon Jicarilla Apache D#1 07151-0019	
PO 2221	Project Number:	07151-0019	**Reported:**
Farmington NM, 87499	Project Manager:	Greg Crabtree	11-Aug-16 16:30

Notes and Definitions

DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference

Client: Crown Quest

Project: Chacon Jicarilla Apache D#1 07151-0019

Sampler: I. Garcia

Phone:

Email(s): Isaac

Project Manager: Greg Crabtree

RUSH? ☐ 1d ☐ 3d

Page 1 of 1

Lab Use Only	
Lab WO#	P608016
Job Number	07151-0019

Sample ID	Sample Date	Sample Time	Matrix	Containers QTY - Vol/TYPE/Preservative	Analysis and Method: GRO/DRO by 8015 TPHC	BTEX by 8021	TPH by 418.1	Chloride by 300.0	TCLP Metals	CO Table 910-1	TDS			lab Only: Lab Number	Correct Cont/Prsrv (s) Y/N
P+A Marker + 4.5'	8/3/16	1420	S	1-4oz/G/cool	X	X								1	Y
Walls	"	1440	S	"	X	X								2	"

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
[signature]	8/3/16	1650	[signature]	8/3/16	1650
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time

Lab Use Only
**Received on Ice (Y) / N
T1____ T2____ T3____
AVG Temp °C 4.0

Sample Matrix: S - Soil, Sd - Solid, Sg - Sludge, A - Aqueous, O - Other _____

Container Type: g - glass, p - poly/plastic, ag - amber glass

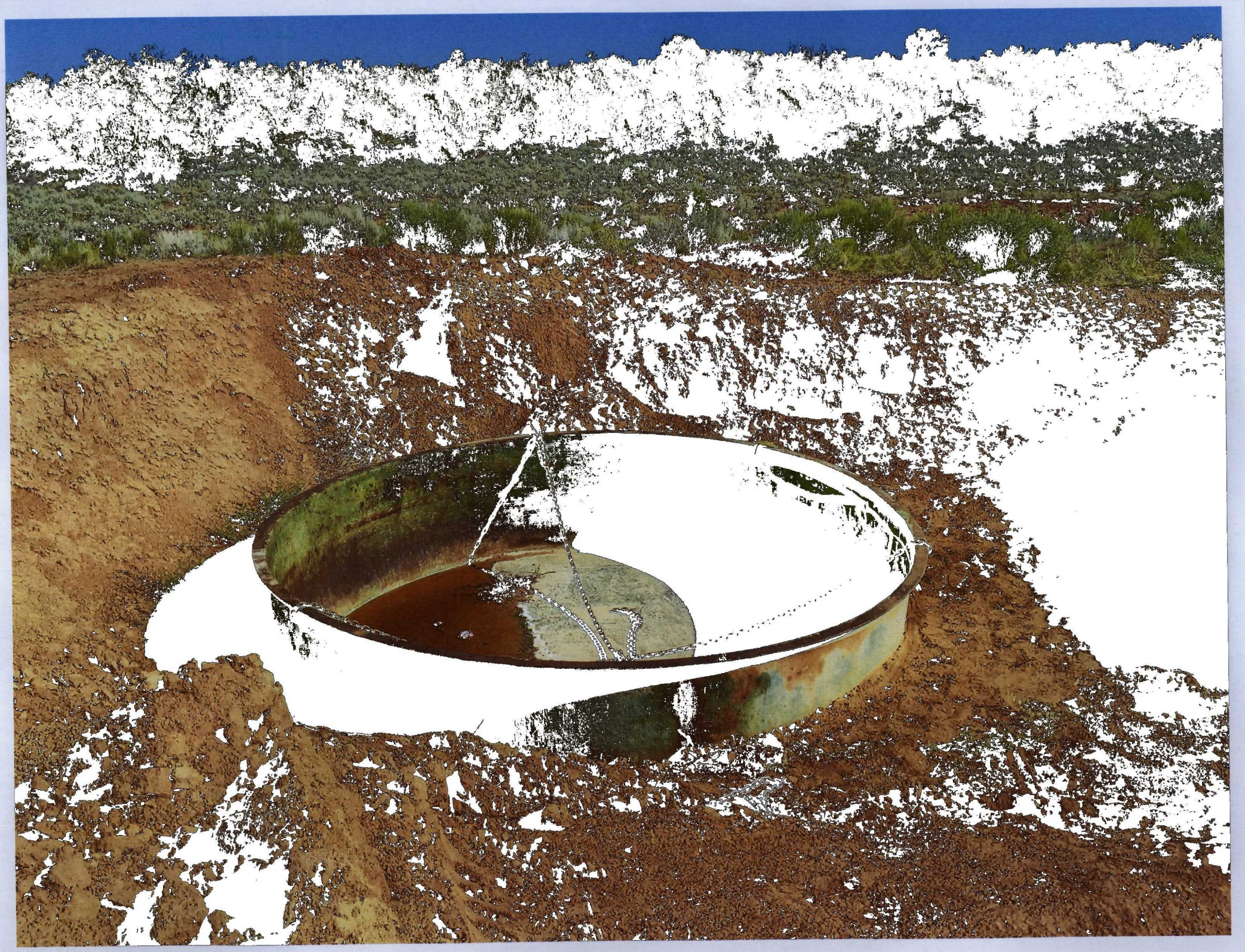
**Samples requiring thermal preservation must be received on ice the day they are sampled or received packed in ice at an avg temp above 0 but less than 6 °C on subsequent days.

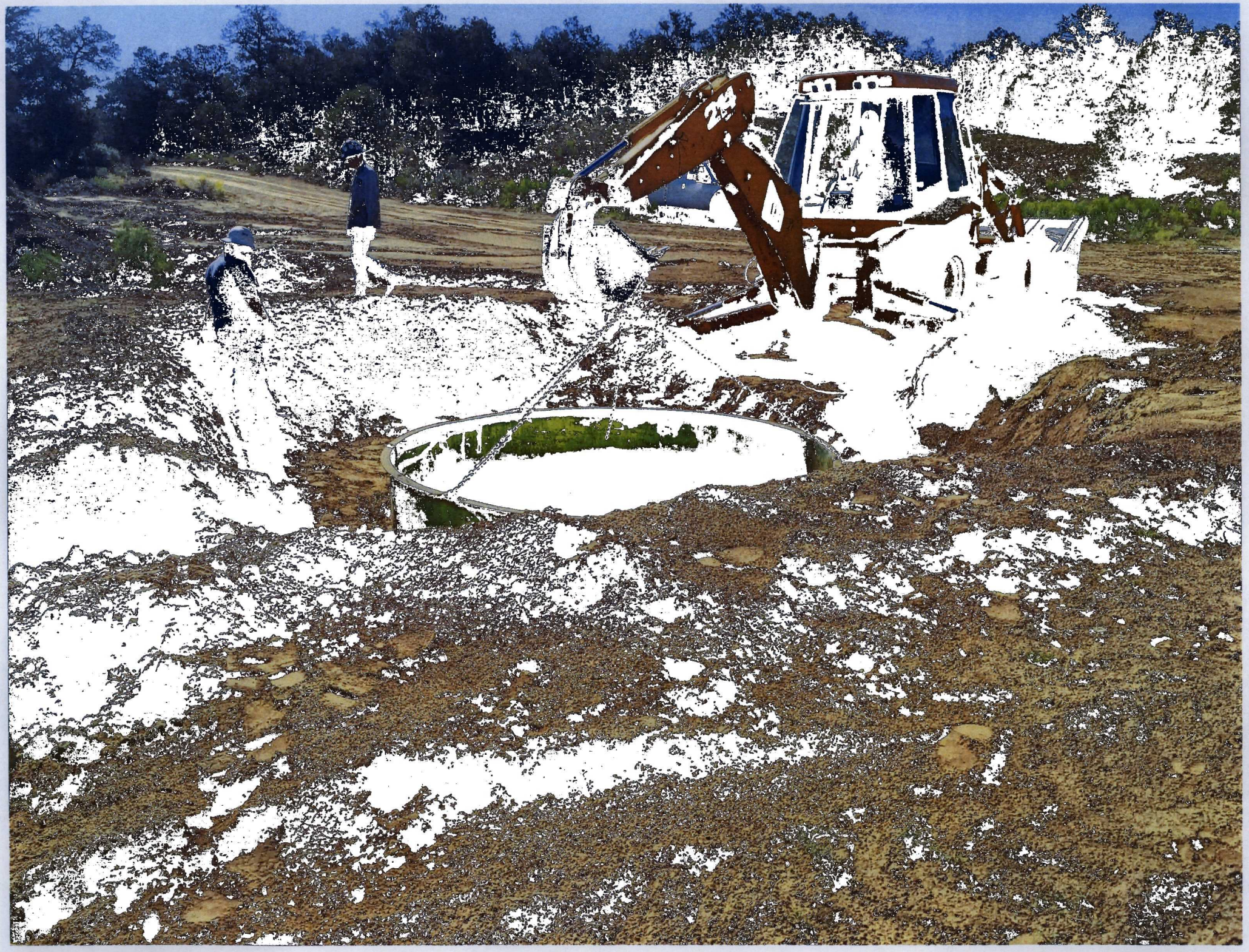
☐ Sample(s) dropped off after hours to a secure drop off area.

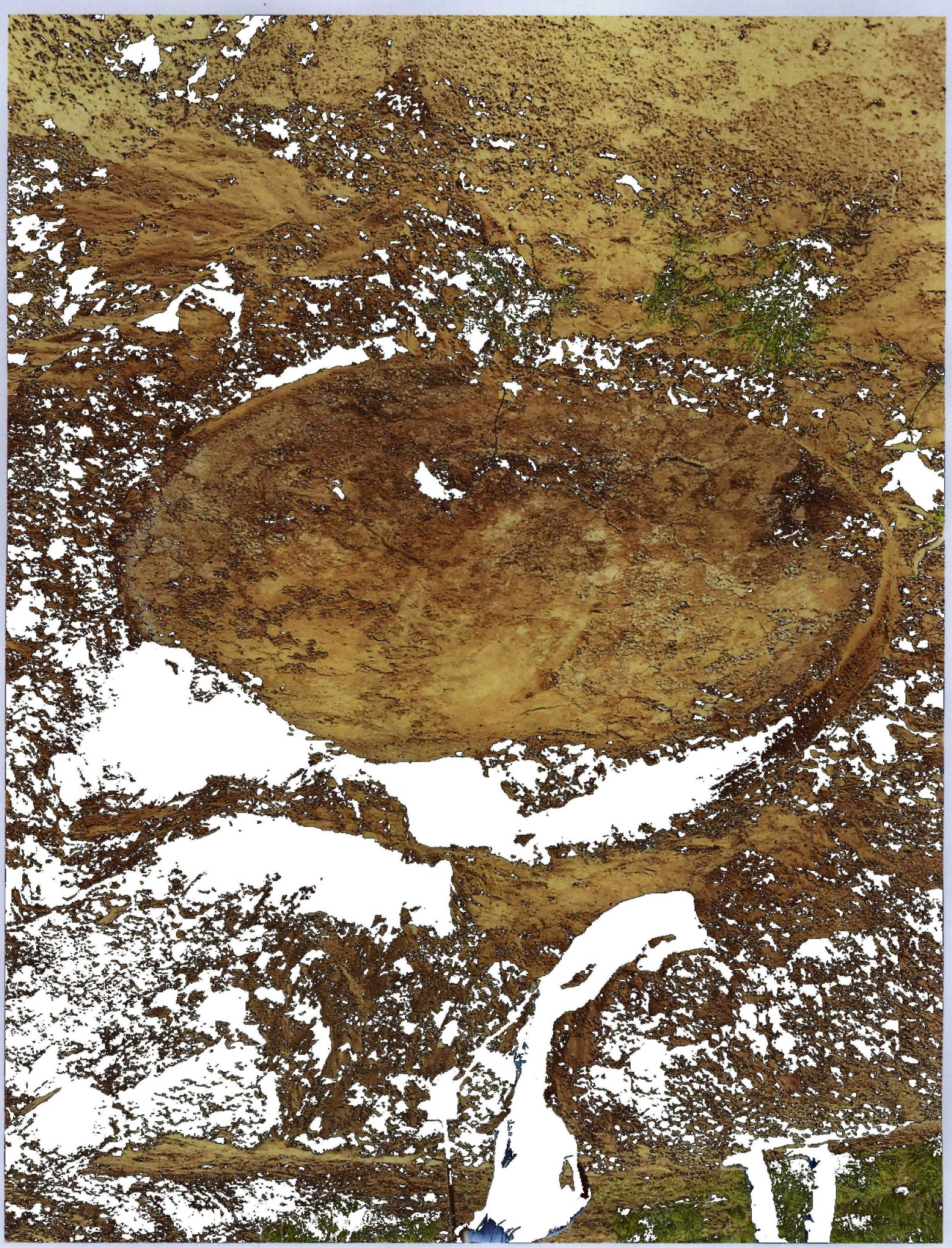
Chain of Custody

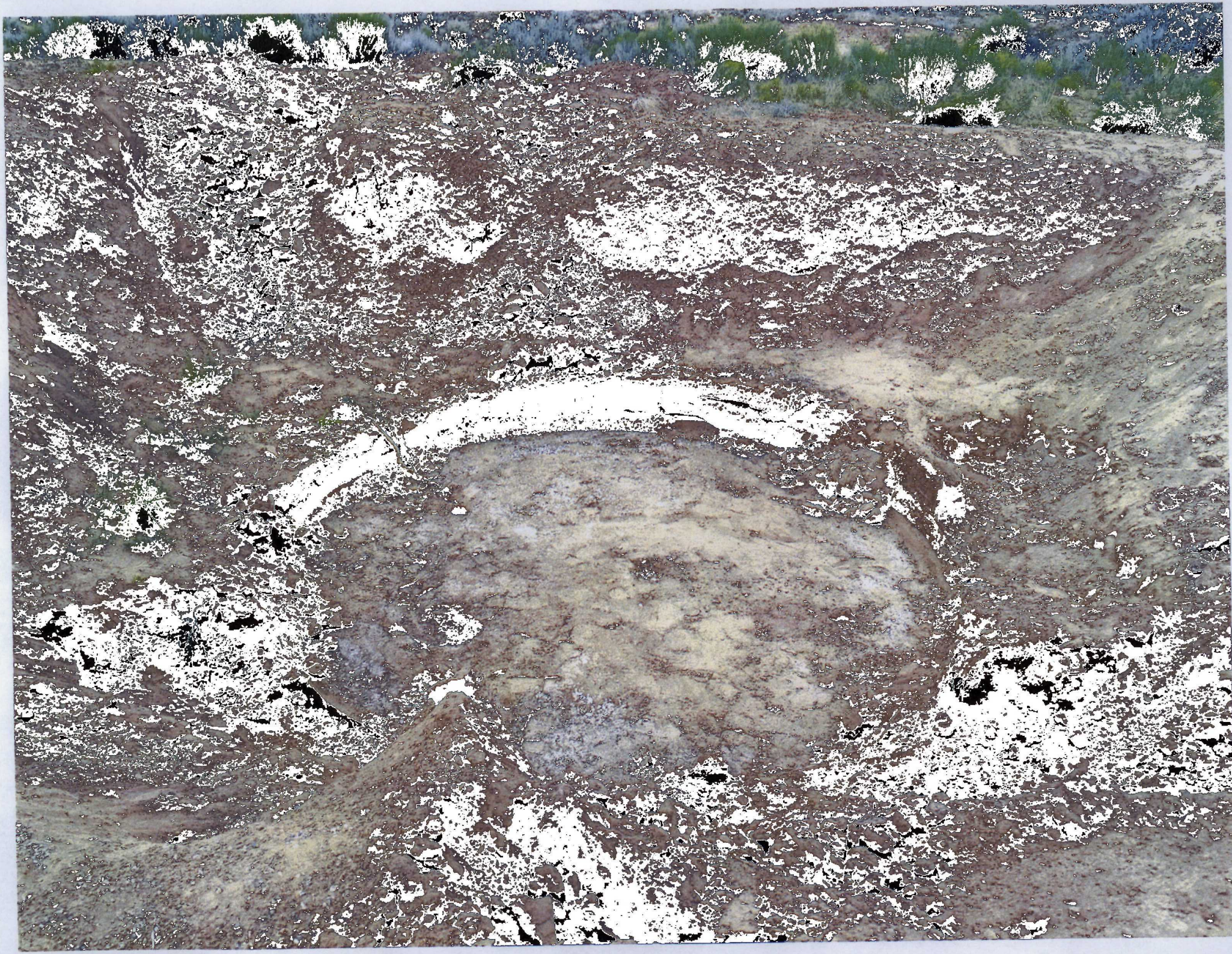
Notes/Billing info:
ice in cooler - AY

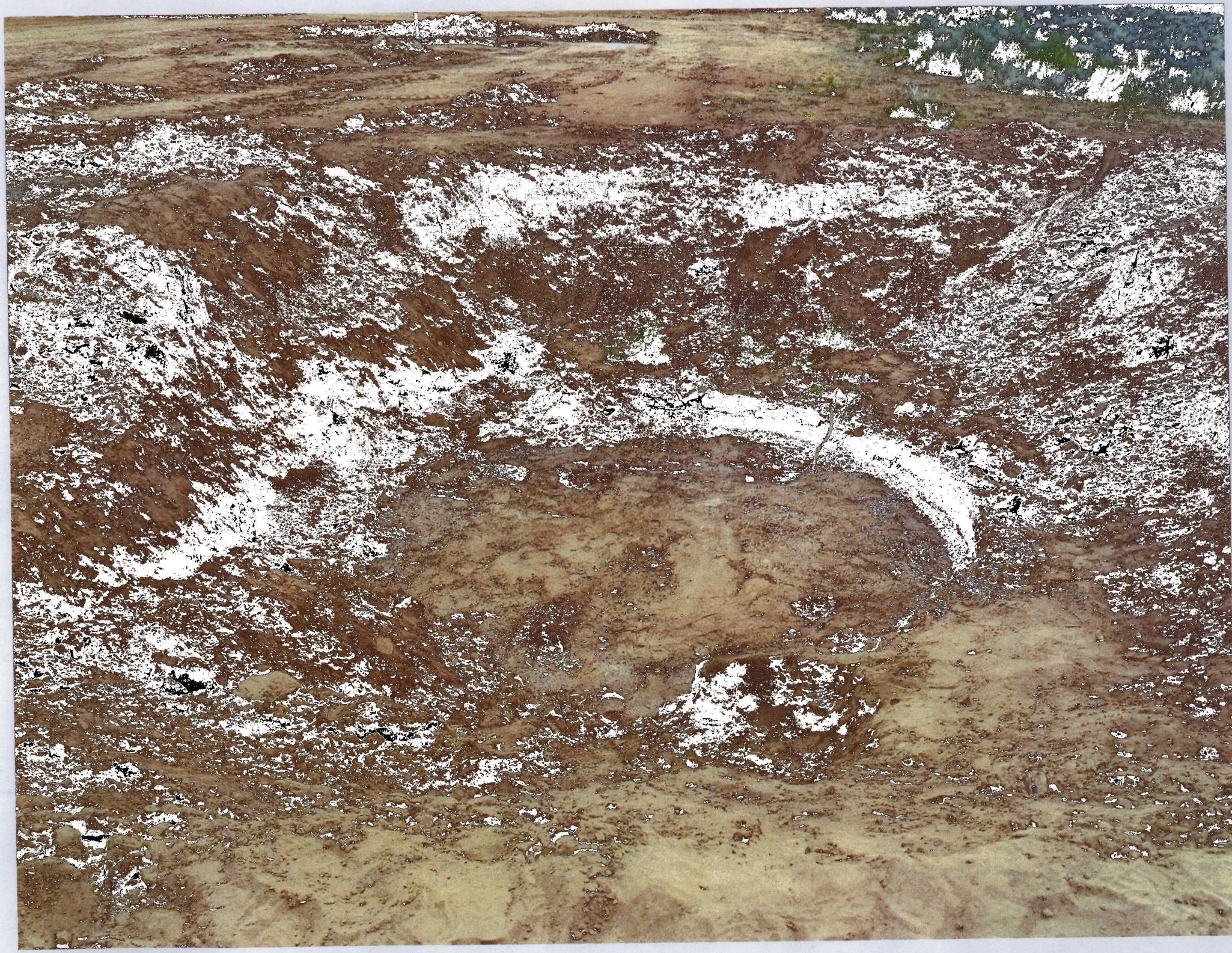
envirotech Analytical Laboratory
5796 US Highway 64, Farmington, NM 87401
Three Springs • 65 Mercado Street, Suite 115, Durango, CO 81301
Ph (505) 632-0615 Fx (505) 632-1865
Ph (970) 259-0615 Fr (800) 362-1879
envirotech-inc.com











WCA

NON-HAZARDOUS MANIFEST

Cell 9

161426

GENERATOR

Generator: Kodaly Production Co

Address: 4001 N Butler, Building 7101

P O Box 3321

Farmington NM

Phone: 505 325 5750

EPA

I.D. #

Shipping Location

Address

Phone

Description of Waste Materials	Industrial Waste Code #	Profile Number	Total Quantity	Unit of Measure	Container Type
Fiberglass tank		SW065	1	yard	

I hereby certify that the above-described materials are not hazardous wastes as defined by 40 CFR, Part 261 or any applicable state law or regulation, have been fully and accurately described, classified and packaged, and are in proper condition for transportation according to applicable law and regulations.

Jeremy Divine
Generator Authorized Agent Name (Print)

Jeremy Divine
Signature

Delivery Date

TRANSPORTER

Transporter Name: Knockout Roustabout

Address: 6811 Driven Lane.

Farmington, N M 87402

I hereby acknowledge receipt of the above-described materials for transport from the generator shipping location listed above.

Edgar Meraz — 9-16-16
Driver Signature — Shipment Date

Driver Name (Print): Edgar Meraz

Truck Number: 303

Truck Type: 07 International

I hereby acknowledge that the above-described materials were received from generator shipping location and were transported without incident to the destination listed below.

Edgar Meraz — 9-16-16
Driver Signature — Delivery Date

DESTINATION

Mailing Address:

Site Name: Bondad Landfill

Address: P.O. Box 295

Bloomfield, NM 87413

Physical Address:

Site Name: Bondad Landfill

Address: CR 318 – Bondad, CO 81301

Phone Number: 1-970-247-8285

I hereby acknowledge receipt of the above-described materials.

Monica Valencia
Name of Authorized Agent (Print)

Signature — 9/16/16
Receipt Date

White – Original | Canary – Shipper Retain | Pink – Transporter Retain | Goldenrod – Generator Retain

WCA

Requested Disposal Facility: Bondad Landfill

Waste Profile #
SW065
WCA Sales Rep: Chantell Griffith
Date: september 15, 2016

I. Generator Information

Generator Name: Roddy Production Co.			
Generator Site Address: Chacon Jicarilla Apache D#1 API# 30-043-20144 UL-A S-23, T23N R-3W			
City:	County: Sandoval	State: N.M.	Zip:
Generator Mailing Address(If Different): P.O. Box 2221.			
City: Farmington	County: San Juan	State: NM.	Zip: 87499.
Generator Contact Name (print): Jeremy Divine			
Phone Number: 432-557-6778		Fax Number: 505-326-6814	

IIa. Transporter Information

Transporter Name: Knock out Roustabout		Transporter Contact Name: Edgar Meraz	
Transporter Address: 6811 Driven Lane.			
City: 505-324-0226	County: San Juan	State: N.M.	Zip: 87402
Phone Number: [redacted] Farmington		Fax Number:	

IIb. Billing Information

Bill To: Roddy Production Co.			
Billing Address: P.O. Box 2221			
City: Farmington	County: San Juan	State: N.M	Zip: 87499.

III. Waste Stream Information

Name of Waste: Fiber Glass tank
Process Generating Waste:
Tank was used to store produced water on an Oil well site. Well was plugged & tank now has to be disposed of.
Type of Waste: X Industrial Process Waste ___ Pollution Control Waste
Physical State: X Solid ___ Semi-Solid ___ Powder ___ Liquid ___ Other: ___
Method of Shipment: X Bulk ___ Bagged ___ Other: ___
Estimated Annual Volume: 5 Cubic Yards ___ Tons ___ Gallons ___ Other:
Frequency: X One Time ___ Daily ___ Weekly ___ Monthly ___ Other
Special Handling Instructions:

IV. Representative Sample Certification

Is the representative sample collected to prepare this profile and laboratory analysis, collected in accordance with U.S. EPA 40 CFR 261.20(c) guidelines or equivalent rules? ___ Yes ___ No		
Sample Date:	Type of Sample: ___ Composite Sample ___ Grab Sample	
Laboratory:	Sample ID Numbers:	
Sampler's Employer:		
Sampler's Name (printed):	Signature:	

V. Physical Characteristics of Waste

Characteristic Components	% by weight (range)
1. Fiber Glass	
2. Open top.	
3. TANK was cut up into Spieces & steam cleaned.	
4.	
5.	

Color	Odor (describe)	Free Liquids	% Solids	pH:	Flash Point:	Phenol
TAN	None	___Yes X No Content ____ %	100%		____ °F	____ ppm

Attach Laboratory Analytical Report (and/or Material Safety Data Sheet) Including Required Parameters provided for this Profile

Does this waste or generating process contain regulated concentrations of the following Pesticides and/or Herbicides: Chlordane, Endrin, Heptachlor (and it epoxides), Lindane, Methoxychlor, Toxaphene, 2,4-D, or 2, 4,5-TP Silvex as defined in 40 CFR 261.33?	___ Yes or X No
Does this waste or generating process cause it to exceed OSHA exposure limits from high levels of Hydrogen Sulfide or Hydrogen Cyanide as defined in 40 CFR 261.23?	___ Yes or X No
Does this waste contain regulated concentrations of Polychlorinated Biphenyls (PCB's) as defined in 40 CFR Part 761?	___ Yes or X No
Does this waste contain regulated concentrations of listed hazardous wastes defined in 40 CFR 261.31, 261.32, 261.33, including RCRA F-Listed Solvents?	___ Yes or X No
Does this waste contain regulated concentrations of 2,3,4,8-Tetrachlorodibenzodioxin (2,3,7,8-TCCD), or any other dioxin as defined in 40 CR 261.31?	___ Yes or X No
Is this a regulated Toxic Material as defined by Federal and/or State regulations?	___ Yes or X No
Is this a regulated Radioactive Waste as defined by Federal and/or State regulations?	___ Yes or X No
Is this a regulated Medical or Infectious Waste as defined by Federal and/or State regulations?	___ Yes or X No
Is this waste generated at a Federal Superfund Clean Up Site?	___ Yes or X No

VI. Generator Certification

I hereby certify that to the best of my knowledge and belief, the information contained herein is a true, complete and accurate description of the waste material being offered for disposal and all known or suspected hazards have been disclosed. All Analytical Results/Material Safety Data Sheets submitted are truthful and complete and are representative of the waste. I further certify that by utilizing this profile, neither myself nor any other employee of the company will deliver for disposal or attempt to deliver for disposal any waste which is classified as toxic waste, hazardous waste or infectious waste, or any other waste material this facility is prohibited from accepting by law. I shall immediately give written notice of any change or condition pertaining to the waste not provided herein. Our company hereby agrees to full indemnify this disposal facility/recycling facility against any damages resulting from this certification being inaccurate or untrue. I further certify that the company has not altered the form or content of this profile sheet as provided by A Clean Environment. The undersigned individual warrants that he/she is authorized to sign this document on behalf of the Generator.

Jeremy Divine Foreman
Authorized Representative Name And Title (Printed)

Roddy Production Co.
Company Name

Jeremy Divine
Authorized Representative Signature

Sept. 14 2016.
Date

VII. Decision

X Approved ___ Rejected Expiration: 12/31/2016

Conditions: Tank must be cleaned & crushed. Visually inspect load.

Rodney T. Bloese, Inspector Rodney T Bloese 9/15/2016
Name, Title Signature Date