District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Avenue, 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
July 21, 2008

For temporary pits, closed-loop systems, and below-grade tanks, submit to the appropriate NMOCD District Office.
For permanent pits and exceptions submit to the Santa Fe Environmental Bureau office and provide a copy to the appropriate NMOCD District Office.

9970

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

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

Instructions: Please submit one application (Form C-144) per individual pit, closed-loop system, 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: Four Star Oil & Gas Company OGRID #: 131944
Address: Post Office Box 36366, Houston, TX 77236
Facility or well name: Jicarilla C 34
API Number: 30-039-22840 OCD Permit Number:
U/L or Qtr/Qtr Qtr/Qtr K Section 22 Township 25N Range 5 W County: Rio Arriba
Center of Proposed Design: Latitude 36.383332° Longitude -107.350279° NAD: ☐1927 ☐ 1983
Surface Owner: ☐ Federal ☐ State ☐ Private ☒ Tribal Trust or Indian Allotment

2.
☐ **Pit:** Subsection F or G of 19.15.17.11 NMAC
Temporary: ☐ Drilling ☐ Workover
☐ Permanent ☐ Emergency ☐ Cavitation ☐ P&A
☐ 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_____

RCVD APR 30 '12
OIL CONS. DIV.
DIST. 3

3.
☐ **Closed-loop System:** Subsection H of 19.15.17.11 NMAC
Type of Operation: ☐ P&A ☐ Drilling a new well ☐ Workover or Drilling (Applies to activities which require prior approval of a permit or notice of intent)
☐ Drying Pad ☐ Above Ground Steel Tanks ☐ Haul-off Bins ☐ Other _____
☐ Lined ☐ Unlined Liner type: Thickness _____mil ☐ LLDPE ☐ HDPE ☐ PVC ☐ Other _____
Liner Seams: ☐ Welded ☐ Factory ☐ Other _____

4.
☒ **Below-grade tank:** Subsection I of 19.15.17.11 NMAC
Volume: 45 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 None

5.
☐ **Alternative Method:**
Submittal of an exception request is required. Exceptions must be submitted to the Santa Fe Environmental Bureau office for consideration of approval.

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6.

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

7.

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)

8.

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 19.15.3.103 NMAC

9.

Administrative Approvals 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:

☐ Administrative approval(s): Requests must be submitted to the appropriate division district or the Santa Fe Environmental Bureau office for consideration of approval.

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

10.

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. Requests regarding changes to certain siting criteria may require administrative approval from the appropriate district office or may be considered an exception which must be submitted to the Santa Fe Environmental Bureau office for consideration of approval. Applicant must attach justification for request. Please refer to 19.15.17.10 NMAC for guidance. **Siting criteria does not apply to drying pads or above-grade tanks associated with a closed-loop system.**

Ground water is less than 50 feet below the bottom of the temporary pit, permanent pit, or below-grade tank. - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No
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 300 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application. *(Applies to temporary, emergency, or cavitation pits and below-grade tanks)* - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image	☐ Yes ☐ No ☐ NA
Within 1000 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application. *(Applies to permanent pits)* - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image	☐ Yes ☐ No ☐ NA
Within 500 horizontal feet of a private, domestic fresh water well or spring that less than five households use for domestic or stock watering purposes, or within 1000 horizontal feet of any other fresh water well or spring, 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 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 500 feet of a wetland. - US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	☐ 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

11.
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: _____

12.
Closed-loop Systems 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.

- ☐ Geologic and Hydrogeologic Data (only for on-site closure) - based upon the requirements of Paragraph (3) of Subsection B of 19.15.17.9
- ☐ Siting Criteria Compliance Demonstrations (only for on-site closure) - 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: _____

☐ Previously Approved Operating and Maintenance Plan API Number: _____ *(Applies only to closed-loop system that use above ground steel tanks or haul-off bins and propose to implement waste removal for closure)*

13.
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

14.
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 ☐ Closed-loop System ☐ 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 (Exceptions must be submitted to the Santa Fe Environmental Bureau for consideration)

15.
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 F 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 I of 19.15.17.13 NMAC
- ☐ Site Reclamation Plan - based upon the appropriate requirements of Subsection G of 19.15.17.13 NMAC

16.

Waste Removal Closure For Closed-loop Systems That Utilize Above Ground Steel Tanks or Haul-off Bins Only: (19.15.17.13.D NMAC)

Instructions: Please indentify the facility or facilities for the disposal of liquids, drilling fluids and drill cuttings. Use attachment if more than two facilities are required.

Disposal Facility Name: _____ Disposal Facility Permit Number: _____

Disposal Facility Name: _____ Disposal Facility Permit Number: _____

Will any of the proposed closed-loop system operations and associated activities occur on or in areas that *will not* be used for future service and operations?

☐ Yes (If yes, please provide the information below) ☐ No

Required for impacted areas which will not be used for future service and operations:

☐ 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 I of 19.15.17.13 NMAC

☐ Site Reclamation Plan - based upon the appropriate requirements of Subsection G of 19.15.17.13 NMAC

17.

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 may require administrative approval from the appropriate district office or may be considered an exception which must be submitted to the Santa Fe Environmental Bureau office for consideration of approval. Justifications and/or demonstrations of equivalency are required. Please refer to 19.15.17.10 NMAC for guidance.

Ground water is less than 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 between 50 and 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
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 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 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 private, domestic fresh water well or spring that less than five households use for domestic or stock watering purposes, or within 1000 horizontal feet of any other fresh water well or spring, 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
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 500 feet of a wetland. - US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	☐ 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

18.

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 F of 19.15.17.13 NMAC

☐ Construction/Design Plan of Burial Trench (if applicable) based upon the appropriate requirements 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 Subsection F of 19.15.17.13 NMAC

☐ Waste Material Sampling Plan - based upon the appropriate requirements of Subsection F 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 I of 19.15.17.13 NMAC

☐ Site Reclamation Plan - based upon the appropriate requirements of Subsection G of 19.15.17.13 NMAC

19.
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: _____

20.
OCD Approval: ☐ Permit Application (including closure plan) ☒ Closure ~~Plan (only)~~ ☐ OCD Conditions (see attachment)

OCD Representative Signature: Jonathan D. Kelly **Approval Date:** 5/30/2012

Title: Compliance Officer **OCD Permit Number:** _____

21.
Closure Report (required within 60 days of closure completion): Subsection K of 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:** October 13, 2011

22.
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.

23.
Closure Report Regarding Waste Removal Closure For Closed-loop Systems That Utilize Above Ground Steel Tanks or Haul-off Bins Only:
Instructions: Please indentify the facility or facilities for where the liquids, drilling fluids and drill cuttings were disposed. Use attachment if more than two facilities were utilized.

Disposal Facility Name: _____ Disposal Facility Permit Number: _____

Disposal Facility Name: _____ Disposal Facility Permit Number: _____

Were the closed-loop system operations and associated activities performed on or in areas that *will not* be used for future service and operations?
☐ Yes (If yes, please demonstrate compliance to the items below) ☐ No

Required for impacted areas which will not be used for future service and operations:
☐ Site Reclamation (Photo Documentation)
☐ Soil Backfilling and Cover Installation
☐ Re-vegetation Application Rates and Seeding Technique

24.
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) **See Attached**
☐ Proof of Deed Notice (required for on-site closure) **Not Required**
☐ Plot Plan (for on-site closures and temporary pits) **Not Required**
☒ Confirmation Sampling Analytical Results (if applicable) **See Attached**
☐ Waste Material Sampling Analytical Results (required for on-site closure) **Not Required**
☒ Disposal Facility Name and Permit Number **Envirotech's Landfarm #2, permit #: NM-01-001**
☒ Soil Backfilling and Cover Installation **See Attached**
☒ Re-vegetation Application Rates and Seeding Technique **Pursuant to the BLM MOU and Approved Closure Plan**
☒ Site Reclamation (Photo Documentation) **See Attached**
On-site Closure Location: Latitude _____ Longitude _____ NAD: ☐1927 ☐ 1983

25.
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): Ms. Laura Clenney Title: Facilities Engineer

Signature: _____ Date: 4/25/12

e-mail address: laura.clenney@chevron.com Telephone: (281) 881-0322

156 Blue Sky Drive
Durango, CO 81301
970-385-5792 telephone
970-759-0444 Cell
johnstonland@frontier.net

JOHNSTON LAND COMPANY, INC.

June 17, 2011 **Certified Return Receipt**

Bureau of Land Management
Farmington District Office
1235 La Plata Highway, Suite A
Farmington, NM 87401-8731

Re: Form 3160-5 for five (5) Final Reclamation
Rio Arriba County, NM

Dear BLM,

Johnston Land Company, Inc. ("JLC") is providing regulatory specialist services for Chevron Midcontinent, L.P., a Texas Limited Partnership ("Chevron"), whose address is P.O. Box 730, Aztec, NM 87410.

Attached herewith please find submitted in Triplicate, Sundry Notice Form 3160-5 – Notice of Intent for final reclamation for the following Wells:

1. JICARILLA B #18 30-039-05744
2. JICARILLA B #4 30-039-05706
3. JICARILLA B #8 30-039-05741
4. JICARILLA C #16 30-039-05760
5. JICARILLA C #34 30-039-22840

Your approval and submission onto BIA and Jicarilla Apache Nation for their comments is greatly appreciated.

If you should have any questions or require additional information please contact the undersigned.

Thank you very much.

Johnston Land Company, Inc.

By: _____
Robert K. Johnston, President

cc: Laura Clenney, Chevron
Kurt Sandoval, BIA, 120 Seneca Drive, Dulce, NM 87528
Bryce Hammond Jicarilla Oil and Gas Administration, 6 Dulce Rock Drive, Dulce, NM 87528

Land, Right of Way, Permitting, and Project Management Services

envirotech
Analytical Laboratory

EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0793
Sample ID:	BGT @ 6"	Date Reported:	07-18-11
Laboratory Number:	58965	Sampled:	07-15-11
Chain of Custody No:	12192	Date Received:	07-15-11
Sample Matrix:	Soil	Date Extracted:	07-18-11
Preservative:	Cool	Date Analyzed:	07-18-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**148**	**0.2**
Diesel Range (C10 - C28)	**3,180**	**0.1**
Total Petroleum Hydrocarbons	**3,330**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C 34**

Analyst

Review

5796 US Highway 64, Farmington, NM 87401 | Ph (505)632-0615 Fr (800)362-1879 Fx (505) 632-1865 lab@envirotech-inc.com envirotech-inc.com

envirotech
Analytical Laboratory

EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0793
Sample ID:	BGT @ 5'	Date Reported:	07-18-11
Laboratory Number:	58966	Sampled:	07-15-11
Chain of Custody No:	12192	Date Received:	07-15-11
Sample Matrix:	Soil	Date Extracted:	07-18-11
Preservative:	Cool	Date Analyzed:	07-18-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**309**	**0.2**
Diesel Range (C10 - C28)	**3,360**	**0.1**
Total Petroleum Hydrocarbons	**3,670**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C 34**

Analyst

Review

5796 US Highway 64, Farmington, NM 87401 | Ph (505) 632-0615 Fr (800) 362-1879 Fx (505) 632-1865 lab@envirotech-inc.com envirotech-inc.com

envirotech
Analytical Laboratory

EPA Method 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Quality Assurance Report

Client:	QA/QC	Project #:	N/A
Sample ID:	07-18-11 QA/QC	Date Reported:	07-18-11
Laboratory Number:	58958	Date Sampled:	N/A
Sample Matrix:	Methylene Chloride	Date Received:	N/A
Preservative:	N/A	Date Analyzed:	07-18-11
Condition:	N/A	Analysis Requested:	TPH

	I-Cal Date	I-Cal RF:	C-Cal RF:	% Difference	Accept. Range
Gasoline Range C5 - C10	07/18/11	9.996E+02	1.000E+03	**0.04%**	**0 - 15%**
Diesel Range C10 - C28	07/18/11	9.996E+02	1.000E+03	**0.04%**	**0 - 15%**

Blank Conc. (mg/L - mg/Kg)	Concentration	Detection Limit
Gasoline Range C5 - C10	**3.3**	**0.2**
Diesel Range C10 - C28	**2.2**	**0.1**

Duplicate Conc. (mg/Kg)	Sample	Duplicate	% Difference	Range
Gasoline Range C5 - C10	**ND**	**ND**	**0.00%**	**0 - 30%**
Diesel Range C10 - C28	**ND**	**ND**	**0.00%**	**0 - 30%**

Spike Conc. (mg/Kg)	Sample	Spike Added	Spike Result:	% Recovery	Accept. Range
Gasoline Range C5 - C10	**ND**	**250**	**260**	**104%**	**75 - 125%**
Diesel Range C10 - C28	**ND**	**250**	**247**	**98.9%**	**75 - 125%**

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste,

SW-846, USEPA, December 1996.

Comments: **QA/QC for Samples 58958, 58960-58961, 58965-58967**

Analyst

Review

5796 US Highway 64, Farmington, NM 87401 | Ph (505) 632-0615 Fr (800) 362-1879 Fx (505) 632-1865 lab@envirotech-inc.com envirotech-inc.com

envirotech
Analytical Laboratory

EPA METHOD 8021
AROMATIC VOLATILE ORGANICS

Client:	Chevron	Project #:	92270-0793
Sample ID:	BGT @ 6"	Date Reported:	07-18-11
Laboratory Number:	58965	Date Sampled:	07-15-11
Chain of Custody:	12192	Date Received:	07-15-11
Sample Matrix:	Soil	Date Analyzed:	07-18-11
Preservative:	Cool	Date Extracted:	07-18-11
Condition:	Intact	Analysis Requested:	BTEX
		Dilution:	10

Parameter	Concentration (ug/Kg)	Det. Limit (ug/Kg)
Benzene	**ND**	**0.9**
Toluene	**13.9**	**1.0**
Ethylbenzene	**40.4**	**1.0**
p,m-Xylene	**122**	**1.2**
o-Xylene	**180**	**0.9**
Total BTEX	**356**	

ND - Parameter not detected at the stated detection limit.

Surrogate Recoveries:	Parameter	Percent Recovery
	Fluorobenzene	**93.0 %**
	1,4-difluorobenzene	**104 %**
	Bromochlorobenzene	**94.0 %**

References: Method 5030B, Purge-and-Trap, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Method 8021B, Aromatic Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C 34**

Analyst

Review

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EPA METHOD 8021
AROMATIC VOLATILE ORGANICS

Client:	Chevron	Project #:	92270-0793
Sample ID:	BGT @ 5'	Date Reported:	07-18-11
Laboratory Number:	58966	Date Sampled:	07-15-11
Chain of Custody:	12192	Date Received:	07-15-11
Sample Matrix:	Soil	Date Analyzed:	07-18-11
Preservative:	Cool	Date Extracted:	07-18-11
Condition:	Intact	Analysis Requested:	BTEX
		Dilution:	10

Parameter	Concentration (ug/Kg)	Det. Limit (ug/Kg)
Benzene	**36.9**	**0.9**
Toluene	**98.8**	**1.0**
Ethylbenzene	**399**	**1.0**
p,m-Xylene	**1,400**	**1.2**
o-Xylene	**443**	**0.9**
Total BTEX	**2,380**	

ND - Parameter not detected at the stated detection limit.

Surrogate Recoveries:	Parameter	Percent Recovery
	Fluorobenzene	**86.8 %**
	1,4-difluorobenzene	**90.6 %**
	Bromochlorobenzene	**103 %**

References: Method 5030B, Purge-and-Trap, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Method 8021B, Aromatic Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C 34**

Analyst

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EPA METHOD 8021
AROMATIC VOLATILE ORGANICS

Client:	N/A	Project #:	N/A
Sample ID:	0718BBLK QA/QC	Date Reported:	07-18-11
Laboratory Number:	58964	Date Sampled:	N/A
Sample Matrix:	Soil	Date Received:	N/A
Preservative:	N/A	Date Analyzed:	07-18-11
Condition:	N/A	Analysis:	BTEX
		Dilution:	10

Calibration and Detection Limits (ug/L)	I-Cal RF:	C-Cal RF:	%Diff. Accept. Range 0 - 15%	Blank Conc	Detect. Limit
Benzene	3.5647E+006	3.5719E+006	0.2%	ND	0.1
Toluene	3.6249E+006	3.6322E+006	0.2%	ND	0.1
Ethylbenzene	3.1897E+006	3.1961E+006	0.2%	ND	0.1
p,m-Xylene	8.9278E+006	8.9457E+006	0.2%	ND	0.1
o-Xylene	2.9578E+006	2.9637E+006	0.2%	ND	0.1

Duplicate Conc. (ug/Kg)	Sample	Duplicate	%Diff.	Accept Range	Detect. Limit
Benzene	ND	ND	0.0%	0 - 30%	0.9
Toluene	1.4	1.4	0.0%	0 - 30%	1.0
Ethylbenzene	ND	ND	0.0%	0 - 30%	1.0
p,m-Xylene	2.1	2.3	9.5%	0 - 30%	1.2
o-Xylene	1.6	1.6	0.0%	0 - 30%	0.9

Spike Conc. (ug/Kg)	Sample	Amount Spiked	Spiked Sample	% Recovery	Accept Range
Benzene	ND	500	534	107%	39 - 150
Toluene	1.4	500	539	108%	46 - 148
Ethylbenzene	ND	500	524	105%	32 - 160
p,m-Xylene	2.1	1000	1,060	106%	46 - 148
o-Xylene	1.6	500	536	107%	46 - 148

ND - Parameter not detected at the stated detection limit.

Dilution: Spike and spiked sample concentration represent a dilution proportional to sample dilution.

References: Method 5030B, Purge-and-Trap, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.
Method 8021B, Aromatic and Halogenated Volatiles by Gas Chromatography Using Photoionization and/or Electrolytic Conductivity Detectors, SW-846, USEPA December 1996.

Comments: **QA/QC for Samples 58957, 58960-58961, 58964-58966**

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Chloride

Client:	Chevron	Project #:	92270-0793
Sample ID:	BGT @ 6"	Date Reported:	07/20/11
Lab ID#:	58965	Date Sampled:	07/15/11
Sample Matrix:	Soil	Date Received:	07/15/11
Preservative:	Cool	Date Analyzed:	07/19/11
Condition:	Intact	Chain of Custody:	12192

Parameter	Concentration (mg/Kg)
Total Chloride	**10**

Reference: U.S.E.P.A., 4500B, "Methods for Chemical Analysis of Water and Wastes", 1983. Standard Methods For The Examination of Water And Waste Water", 18th ed., 1992.

Comments: **Jicarilla C 34**

Analyst

Review

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CHAIN OF CUSTODY RECORD

12192

Client:	Project Name / Location:
Chevron	Jicarilla C 34
Client Address:	Sampler Name: Crystal Delgani
Client Phone No.:	Client No.: 97270-0793

ANALYSIS / PARAMETERS

Sample No./ Identification	Sample Date	Sample Time	Lab No.	Sample Matrix	No./Volume of Containers	Preservative	TPH (Method 8015)	BTEX (Method 8021)	VOC (Method 8260)	RCRA 8 Metals	Cation / Anion	RCI	TCLP with H/P	PAH	TPH (418.1)	CHLORIDE				Sample Cool	Sample Intact
						$HgCl_2$ HCl Ice															
BGT @ 6'	7/15/11	1538	58965	Soil Solid Sludge Aqueous	1-4oz		/	/								/				Y	Y
BGT @ 5'	"	1539	58966	Soil Solid Sludge Aqueous	"		/	/												"	"
Separator @ 4'	"	1540	58967	Soil Solid Sludge Aqueous	"		/	/												"	"
				Soil Solid Sludge Aqueous																	
				Soil Solid Sludge Aqueous																	
				Soil Solid Sludge Aqueous																	
				Soil Solid Sludge Aqueous																	
				Soil Solid Sludge Aqueous																	
				Soil Solid Sludge Aqueous																	
				Soil Solid Sludge Aqueous																	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
Crystal Delgani	7/15/11	1821	Gene Gazzin	7/15/11	1821
Relinquished by: (Signature)			Received by: (Signature)		
Relinquished by: (Signature)			Received by: (Signature)		

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0793
Sample ID:	North	Date Reported:	07-21-11
Laboratory Number:	59015	Sampled:	07-19-11
Chain of Custody No:	12210	Date Received:	07-20-11
Sample Matrix:	Soil	Date Extracted:	07-20-11
Preservative:	Cool	Date Analyzed:	07-20-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**3.2**	**0.2**
Diesel Range (C10 - C28)	**103**	**0.1**
Total Petroleum Hydrocarbons	**106**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C 34**

Analyst

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0793
Sample ID:	East	Date Reported:	07-21-11
Laboratory Number:	59016	Sampled:	07-19-11
Chain of Custody No:	12210	Date Received:	07-20-11
Sample Matrix:	Soil	Date Extracted:	07-20-11
Preservative:	Cool	Date Analyzed:	07-20-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**1.8**	**0.2**
Diesel Range (C10 - C28)	**149**	**0.1**
Total Petroleum Hydrocarbons	**151**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C 34**

Analyst

Review

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0793
Sample ID:	South	Date Reported:	07-21-11
Laboratory Number:	59017	Sampled:	07-19-11
Chain of Custody No:	12210	Date Received:	07-20-11
Sample Matrix:	Soil	Date Extracted:	07-20-11
Preservative:	Cool	Date Analyzed:	07-20-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**2.6**	**0.2**
Diesel Range (C10 - C28)	**110**	**0.1**
Total Petroleum Hydrocarbons	**113**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C 34**

Analyst

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0793
Sample ID:	West	Date Reported:	07-21-11
Laboratory Number:	59018	Sampled:	07-19-11
Chain of Custody No:	12210	Date Received:	07-20-11
Sample Matrix:	Soil	Date Extracted:	07-20-11
Preservative:	Cool	Date Analyzed:	07-20-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**ND**	**0.2**
Diesel Range (C10 - C28)	**30.8**	**0.1**
Total Petroleum Hydrocarbons	**30.8**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C 34**

Analyst

Review

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0793
Sample ID:	Center @ 8' BGS	Date Reported:	07-21-11
Laboratory Number:	59019	Sampled:	07-19-11
Chain of Custody No:	12210	Date Received:	07-20-11
Sample Matrix:	Soil	Date Extracted:	07-20-11
Preservative:	Cool	Date Analyzed:	07-20-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**4.8**	**0.2**
Diesel Range (C10 - C28)	**4.8**	**0.1**
Total Petroleum Hydrocarbons	**9.6**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C 34**

Analyst

Review

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EPA Method 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Quality Assurance Report

Client:	QA/QC	Project #:	N/A
Sample ID:	07-20-11 QA/QC	Date Reported:	07-21-11
Laboratory Number:	59015	Date Sampled:	N/A
Sample Matrix:	Methylene Chloride	Date Received:	N/A
Preservative:	N/A	Date Analyzed:	07-20-11
Condition:	N/A	Analysis Requested:	TPH

	I-Cal Date	I-Cal RF	C-Cal RF	% Difference	Accept. Range
Gasoline Range C5 - C10	07/20/11	9.996E+02	1.000E+03	**0.04%**	**0 - 15%**
Diesel Range C10 - C28	07/20/11	9.975E+02	9.979E+02	**0.04%**	**0 - 15%**

Blank Conc. (mg/L - mg/Kg)	Concentration	Detection Limit
Gasoline Range C5 - C10	**3.1**	**0.2**
Diesel Range C10 - C28	**3.3**	**0.1**

Duplicate Conc. (mg/Kg)	Sample	Duplicate	% Difference	Range
Gasoline Range C5 - C10	**3.2**	**3.3**	**3.7%**	**0 - 30%**
Diesel Range C10 - C28	**103**	**97.6**	**5.4%**	**0 - 30%**

Spike Conc. (mg/Kg)	Sample	Spike Added	Spike Result	% Recovery	Accept. Range
Gasoline Range C5 - C10	**3.2**	**250**	**261**	**103%**	**75 - 125%**
Diesel Range C10 - C28	**103**	**250**	**351**	**99.4%**	**75 - 125%**

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste,

SW-846, USEPA, December 1996.

Comments: **QA/QC for Samples 58973-58975, 59015-59026**

Analyst

Review

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0868
Sample ID:	South Wall	Date Reported:	10-14-11
Laboratory Number:	59972	Date Sampled:	10-13-11
Chain of Custody No:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Extracted:	10-13-11
Preservative:	Cool	Date Analyzed:	10-13-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**5.8**	**0.2**
Diesel Range (C10 - C28)	**ND**	**0.1**
Total Petroleum Hydrocarbons	**5.8**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

Review

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0868
Sample ID:	Bottom	Date Reported:	10-14-11
Laboratory Number:	59973	Date Sampled:	10-13-11
Chain of Custody No:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Extracted:	10-13-11
Preservative:	Cool	Date Analyzed:	10-13-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**2.9**	**0.2**
Diesel Range (C10 - C28)	**1.1**	**0.1**
Total Petroleum Hydrocarbons	**4.0**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

Review

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0868
Sample ID:	East Wall	Date Reported:	10-14-11
Laboratory Number:	59974	Date Sampled:	10-13-11
Chain of Custody No:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Extracted:	10-13-11
Preservative:	Cool	Date Analyzed:	10-13-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**4.5**	**0.2**
Diesel Range (C10 - C28)	**ND**	**0.1**
Total Petroleum Hydrocarbons	**4.5**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

Review

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0868
Sample ID:	West Wall	Date Reported:	10-14-11
Laboratory Number:	59975	Date Sampled:	10-13-11
Chain of Custody No:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Extracted:	10-13-11
Preservative:	Cool	Date Analyzed:	10-13-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**2.7**	**0.2**
Diesel Range (C10 - C28)	**ND**	**0.1**
Total Petroleum Hydrocarbons	**2.7**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

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EPA METHOD 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Client:	Chevron	Project #:	92270-0868
Sample ID:	North Wall	Date Reported:	10-14-11
Laboratory Number:	59976	Date Sampled:	10-13-11
Chain of Custody No:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Extracted:	10-13-11
Preservative:	Cool	Date Analyzed:	10-13-11
Condition:	Intact	Analysis Requested:	8015 TPH

Parameter	Concentration (mg/Kg)	Det. Limit (mg/Kg)
Gasoline Range (C5 - C10)	**5.2**	**0.2**
Diesel Range (C10 - C28)	**ND**	**0.1**
Total Petroleum Hydrocarbons	**5.2**	

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

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EPA Method 8015 Modified
Nonhalogenated Volatile Organics
Total Petroleum Hydrocarbons

Quality Assurance Report

Client:	QA/QC	Project #:	N/A
Sample ID:	10-13-11 QA/QC	Date Reported:	10-14-11
Laboratory Number:	59967	Date Sampled:	N/A
Sample Matrix:	Methylene Chloride	Date Received:	N/A
Preservative:	N/A	Date Analyzed:	10-13-11
Condition:	N/A	Analysis Requested:	TPH

	I-Cal Date	I-Cal RF	C-Cal RF	% Difference	Accept. Range
Gasoline Range C5 - C10	40829	1.004E+03	1.004E+03	**0.04%**	**0 - 15%**
Diesel Range C10 - C28	40829	1.001E+03	1.001E+03	**0.04%**	**0 - 15%**

Blank Conc. (mg/L - mg/Kg)	Concentration	Detection Limit
Gasoline Range C5 - C10	**2.2**	**0.2**
Diesel Range C10 - C28	**2.4**	**0.1**

Duplicate Conc. (mg/Kg)	Sample	Duplicate	% Difference	Range
Gasoline Range C5 - C10	**ND**	**ND**	**0.00%**	**0 - 30%**
Diesel Range C10 - C28	**ND**	**ND**	**0.00%**	**0 - 30%**

Spike Conc. (mg/Kg)	Sample	Spike Added	Spike Result	% Recovery	Accept. Range
Gasoline Range C5 - C10	**ND**	**250**	**242**	**96.7%**	**75 - 125%**
Diesel Range C10 - C28	**ND**	**250**	**243**	**97.1%**	**75 - 125%**

ND - Parameter not detected at the stated detection limit.

References: Method 8015B, Nonhalogenated Volatile Organics, Test Methods for Evaluating Solid Waste,

SW-846, USEPA, December 1996.

Comments: **QA/QC for Samples 59965-59976**

Analyst

Review

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EPA METHOD 8021
AROMATIC VOLATILE ORGANICS

Client:	Chevron	Project #:	92270-0868
Sample ID:	South Wall	Date Reported:	10-14-11
Laboratory Number:	59972	Date Sampled:	10-13-11
Chain of Custody:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Analyzed:	10-13-11
Preservative:	Cool	Date Extracted:	10-13-11
Condition:	Intact	Analysis Requested:	BTEX
		Dilution:	10

Parameter	Concentration (ug/Kg)	Det. Limit (ug/Kg)
Benzene	**ND**	**0.9**
Toluene	**ND**	**1.0**
Ethylbenzene	**9.0**	**1.0**
p,m-Xylene	**11.2**	**1.2**
o-Xylene	**ND**	**0.9**
Total BTEX	**20.2**	

ND - Parameter not detected at the stated detection limit.

Surrogate Recoveries:	Parameter	Percent Recovery
	Fluorobenzene	**91.6 %**
	1,4-difluorobenzene	**102 %**
	Bromochlorobenzene	**100 %**

References: Method 5030B, Purge-and-Trap, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Method 8021B, Aromatic Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

Review

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EPA METHOD 8021
AROMATIC VOLATILE ORGANICS

Client:	Chevron	Project #:	92270-0868
Sample ID:	Bottom	Date Reported:	10-14-11
Laboratory Number:	59973	Date Sampled:	10-13-11
Chain of Custody:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Analyzed:	10-13-11
Preservative:	Cool	Date Extracted:	10-13-11
Condition:	Intact	Analysis Requested:	BTEX
		Dilution:	10

Parameter	Concentration (ug/Kg)	Det. Limit (ug/Kg)
Benzene	**ND**	**0.9**
Toluene	**4.7**	**1.0**
Ethylbenzene	**3.4**	**1.0**
p,m-Xylene	**11.0**	**1.2**
o-Xylene	**ND**	**0.9**
Total BTEX	**19.1**	

ND - Parameter not detected at the stated detection limit.

Surrogate Recoveries:	Parameter	Percent Recovery
	Fluorobenzene	**93.9 %**
	1,4-difluorobenzene	**103 %**
	Bromochlorobenzene	**100 %**

References: Method 5030B, Purge-and-Trap, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Method 8021B, Aromatic Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

Review

5796 US Highway 64, Farmington, NM 87401 | Ph (505) 632-0615 Fr (800) 362-1879 Fx (505) 632-1865 lab@envirotech-inc.com envirotech-inc.com

envirotech
Analytical Laboratory

EPA METHOD 8021
AROMATIC VOLATILE ORGANICS

Client:	Chevron	Project #:	92270-0868
Sample ID:	East Wall	Date Reported:	10-14-11
Laboratory Number:	59974	Date Sampled:	10-13-11
Chain of Custody:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Analyzed:	10-13-11
Preservative:	Cool	Date Extracted:	10-13-11
Condition:	Intact	Analysis Requested:	BTEX
		Dilution:	10

Parameter	Concentration (ug/Kg)	Det. Limit (ug/Kg)
Benzene	**ND**	**0.9**
Toluene	**ND**	**1.0**
Ethylbenzene	**ND**	**1.0**
p,m-Xylene	**ND**	**1.2**
o-Xylene	**ND**	**0.9**
Total BTEX	**ND**	

ND - Parameter not detected at the stated detection limit.

Surrogate Recoveries:	Parameter	Percent Recovery
	Fluorobenzene	**95.4 %**
	1,4-difluorobenzene	**103 %**
	Bromochlorobenzene	**94.7 %**

References: Method 5030B, Purge-and-Trap, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Method 8021B, Aromatic Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

Review

5796 US Highway 64, Farmington, NM 87401 | Ph (505)632-0615 Fr (800)362-1879 Fx (505) 632-1865 lab@envirotech-inc.com envirotech-inc.com

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Analytical Laboratory

EPA METHOD 8021
AROMATIC VOLATILE ORGANICS

Client:	Chevron	Project #:	92270-0868
Sample ID:	West Wall	Date Reported:	10-14-11
Laboratory Number:	59975	Date Sampled:	10-13-11
Chain of Custody:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Analyzed:	10-13-11
Preservative:	Cool	Date Extracted:	10-13-11
Condition:	Intact	Analysis Requested:	BTEX
		Dilution:	10

Parameter	Concentration (ug/Kg)	Det. Limit (ug/Kg)
Benzene	**ND**	**0.9**
Toluene	**ND**	**1.0**
Ethylbenzene	**ND**	**1.0**
p,m-Xylene	**ND**	**1.2**
o-Xylene	**ND**	**0.9**
Total BTEX	**ND**	

ND - Parameter not detected at the stated detection limit.

Surrogate Recoveries:	Parameter	Percent Recovery
	Fluorobenzene	**94.5 %**
	1,4-difluorobenzene	**103 %**
	Bromochlorobenzene	**93.2 %**

References: Method 5030B, Purge-and-Trap, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Method 8021B, Aromatic Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

Review

5796 US Highway 64, Farmington, NM 87401 | Ph (505) 632-0615 Fr (800) 362-1879 Fx (505) 632-1865 lab@envirotech-inc.com envirotech-inc.com

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Analytical Laboratory

EPA METHOD 8021
AROMATIC VOLATILE ORGANICS

Client:	Chevron	Project #:	92270-0868
Sample ID:	North Wall	Date Reported:	10-14-11
Laboratory Number:	59976	Date Sampled:	10-13-11
Chain of Custody:	12742	Date Received:	10-13-11
Sample Matrix:	Soil	Date Analyzed:	10-13-11
Preservative:	Cool	Date Extracted:	10-13-11
Condition:	Intact	Analysis Requested:	BTEX
		Dilution:	10

Parameter	Concentration (ug/Kg)	Det. Limit (ug/Kg)
Benzene	**ND**	**0.9**
Toluene	**ND**	**1.0**
Ethylbenzene	**ND**	**1.0**
p,m-Xylene	**ND**	**1.2**
o-Xylene	**ND**	**0.9**
Total BTEX	**ND**	

ND - Parameter not detected at the stated detection limit.

Surrogate Recoveries:	Parameter	Percent Recovery
	Fluorobenzene	**95.9 %**
	1,4-difluorobenzene	**102 %**
	Bromochlorobenzene	**105 %**

References: Method 5030B, Purge-and-Trap, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Method 8021B, Aromatic Volatile Organics, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.

Comments: **Jicarilla C-34**

Analyst

Review

5796 US Highway 64, Farmington, NM 87401 | Ph (505) 632-0615 Fr (800) 362-1879 Fx (505) 632-1865 lab@envirotech-inc.com envirotech-inc.com

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Analytical Laboratory

EPA METHOD 8021
AROMATIC VOLATILE ORGANICS

Client:	N/A	Project #:	N/A
Sample ID:	1013BBLK QA/QC	Date Reported:	10-14-11
Laboratory Number:	59965	Date Sampled:	N/A
Sample Matrix:	Soil	Date Received:	N/A
Preservative:	N/A	Date Analyzed:	10-13-11
Condition:	N/A	Analysis:	BTEX
		Dilution:	10

Calibration and Detection Limits (ug/L)	I-Cal RF:	C-Cal RF:	%Diff. Accept. Range 0 - 15%	Blank Conc	Detect. Limit
Benzene	2.3875E+006	2.3923E+006	0.2%	ND	0.1
Toluene	8.2803E+005	8.2969E+005	0.2%	ND	0.1
Ethylbenzene	5.8949E+005	5.9067E+005	0.2%	ND	0.1
p,m-Xylene	1.2406E+006	1.2431E+006	0.2%	ND	0.1
o-Xylene	4.5903E+005	4.5995E+005	0.2%	ND	0.1

Duplicate Conc. (ug/Kg)	Sample	Duplicate	%Diff.	Accept Range	Detect. Limit
Benzene	160	162	1.0%	0 - 30%	0.9
Toluene	6,540	6,500	0.6%	0 - 30%	1.0
Ethylbenzene	122	109	10.6%	0 - 30%	1.0
p,m-Xylene	1,530	1,560	2.0%	0 - 30%	1.2
o-Xylene	250	261	4.6%	0 - 30%	0.9

Spike Conc. (ug/Kg)	Sample	Amount Spiked	Spiked Sample	% Recovery	Accept Range
Benzene	160	500	719	109%	39 - 150
Toluene	6,540	500	7,140	101%	46 - 148
Ethylbenzene	122	500	688	111%	32 - 160
p,m-Xylene	1,530	1000	2,110	83.4%	46 - 148
o-Xylene	250	500	830	111%	46 - 148

ND - Parameter not detected at the stated detection limit.

Dilution: Spike and spiked sample concentration represent a dilution proportional to sample dilution.

References: Method 5030B, Purge-and-Trap, Test Methods for Evaluating Solid Waste, SW-846, USEPA, December 1996.
Method 8021B, Aromatic and Halogenated Volatiles by Gas Chromatography Using Photoionization and/or Electrolytic Conductivity Detectors, SW-846, USEPA December 1996.

Comments: QA/QC for Samples 59965-59966, 59969-59976

Analyst

Review

5796 US Highway 64, Farmington, NM 87401 | Ph (505) 632-0615 Fr (800) 362-1879 Fx (505) 632-1865 lab@envirotech-inc.com envirotech-inc.com

RUSH

CHAIN OF CUSTODY RECORD

12742

Client:	Project Name / Location:
CHEVRON	JICARILLA C-34
Client Address:	Sampler Name: T. McKNIGHT
Client Phone No.:	Client No.: 92270-0868

ANALYSIS / PARAMETERS

Sample No./ Identification	Sample Date	Sample Time	Lab No.	Sample Matrix	No./Volume of Containers	Preservative $HgCl_2$	Preservative HCl	Preservative Ice	TPH (Method 8015)	BTEX (Method 8021)	VOC (Method 8260)	RCRA 8 Metals	Cation / Anion	RCI	TCLP with H/P	PAH	TPH (418.1)	CHLORIDE				Sample Cool	Sample Intact
South Wall	10/13/11	11:30	59972	Soil Solid Sludge Aqueous	1/40z			✓	✓	✓												Y	Y
Bottom	10/13/11	11:30	59973	Soil Solid Sludge Aqueous	1/40z			✓	✓	✓													
East Wall	10/13/11	11:30	59974	Soil Solid Sludge Aqueous	1/40z			✓	✓	✓													
West Wall	10/13/11	11:30	59975	Soil Solid Sludge Aqueous	1/40z			✓	✓	✓													
North wall	10/13/11	11:30	59976	Soil Solid Sludge Aqueous	1/40z			✓	✓	✓													
				Soil Solid Sludge Aqueous																			
				Soil Solid Sludge Aqueous																			
				Soil Solid Sludge Aqueous																			
				Soil Solid Sludge Aqueous																			
				Soil Solid Sludge Aqueous																			

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
Tom McKnight	10/13/11	16:55		10/13/11	16:55
Relinquished by: (Signature)			Received by: (Signature)		
Relinquished by: (Signature)			Received by: (Signature)		

RUSH

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5796 US Highway 64 • Farmington, NM 87401 • 505-632-0615 • lab@envirotech-inc.com

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Bill of Lading

MANIFEST # 40017

PHONE: (505) 632-0615 • 5796 U.S. HIGHWAY 64 • FARMINGTON, NEW MEXICO 87401

DATE 10-18-11 JOB# 92270-0889

LOAD NO.	COMPLETE DESCRIPTION OF SHIPMENT						TRANSPORTING COMPANY			
	POINT OF ORIGIN	DESTINATION	MATERIAL	GRID	YDS	BBLS	COMPANY	TRK#	TIME	DRIVER SIGNATURE
1	Chevron J-E-E-34	LFII	CONT SOIL	N-12	18	—	Crazy J	08	1150	Joe Gomez
2	" "	"	"	N-12	12	—	"	M1	1350	Joe Montano
3	" "	"	"	Q 12	20	—	"	68	1633	Joe Gomez
					50					

RESULTS:			LANDFARM EMPLOYEE:	NOTES:
<272	CHLORIDE TEST	/	Tony Latimer	
	PAINT FILTER TEST	/	Certification of above receival & placement	

"I certify the material hauled from the above location has not been added to or mixed with, and is the same material received from the above mentioned Generator, and that no additional materials have been added."

TRANSPORTER CO. Crazy J's NAME Joe Gomez SIGNATURE Joe Gomez

COMPANY CONTACT _____ PHONE _____ DATE _____

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Bill of Lading

MANIFEST # 40018

PHONE: (505) 632-0615 • 5796 U.S. HIGHWAY 64 • FARMINGTON, NEW MEXICO 87401

DATE 10-18-11 JOB# 92270-0889

LOAD NO.	COMPLETE DESCRIPTION OF SHIPMENT						TRANSPORTING COMPANY			
	POINT OF ORIGIN	DESTINATION	MATERIAL	GRID	YDS	BBLS	COMPANY	TRK#	TIME	DRIVER SIGNATURE
1	Chevron: Jic C 34	LFII	CON + SOIL	O-12	20	—	INLand	33	1203	James Butler
2	" "	"	"	P 12	20	—	"	33	1625	James Butler
					40					

RESULTS:			LANDFARM EMPLOYEE:	NOTES:
<272	CHLORIDE TEST	/	Gary Robinson	
	PAINT FILTER TEST	/	Certification of above receival & placement	

"I certify the material hauled from the above location has not been added to or mixed with, and is the same material received from the above mentioned Generator, and that no additional materials have been added."

TRANSPORTER CO. INLAND NAME James Butler SIGNATURE James Butler

COMPANY CONTACT _____ PHONE _____ DATE 10-18-11

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MANIFEST # 40019

PHONE: (505) 632-0615 • 5796 U.S. HIGHWAY 64 • FARMINGTON, NEW MEXICO 87401

DATE 10-18-11 JOB# 92270-0889

LOAD NO.	COMPLETE DESCRIPTION OF SHIPMENT						TRANSPORTING COMPANY			
	POINT OF ORIGIN	DESTINATION	MATERIAL	GRID	YDS	BBLS	COMPANY	TRK#	TIME	DRIVER SIGNATURE
1	Chevron Jic-C 34	LFII	CONT SOIL	P-12	20	—	High Std	6	1210	
2	" "	"	"	N-12	12	—	" "	5	1350	
3	" "	"	"	O-12	20	—	" "	6	1622	
					52					

RESULTS:			LANDFARM EMPLOYEE:	NOTES:
<272	CHLORIDE TEST	/	Gary Robinson	
	PAINT FILTER TEST	/	Certification of above receival & placement	

"I certify the material hauled from the above location has not been added to or mixed with, and is the same material received from the above mentioned Generator, and that no additional materials have been added."

TRANSPORTER CO. High Standard NAME Curby Roberts SIGNATURE

COMPANY CONTACT Cory Wood PHONE 386-0018 DATE 10-18-11

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Bill of Lading

MANIFEST # 40020

PHONE: (505) 632-0615 • 5796 U.S. HIGHWAY 64 • FARMINGTON, NEW MEXICO 87401

DATE 10-18-11 JOB# 93270-0889

LOAD NO.	COMPLETE DESCRIPTION OF SHIPMENT						TRANSPORTING COMPANY			
	POINT OF ORIGIN	DESTINATION	MATERIAL	GRID	YDS	BBLS	COMPANY	TRK#	TIME	DRIVER SIGNATURE
1	Chevron Jic. C34	LFII	Cont Soil	Q12	20	—	Velasquez	3	1211	Rudy Velasquez
					20					

RESULTS:			LANDFARM EMPLOYEE:	NOTES:
<272	CHLORIDE TEST	/	Gary Robinson	
	PAINT FILTER TEST	/	Certification of above receival & placement	

"I certify the material hauled from the above location has not been added to or mixed with, and is the same material received from the above mentioned Generator, and that no additional materials have been added."

TRANSPORTER CO. Velasquez Trucking NAME Rudy Velasquez SIGNATURE Rudy Velasquez

COMPANY CONTACT _____ PHONE _____ DATE 10-18-11

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Bill of Lading

MANIFEST # 40021

PHONE: (505) 632-0615 • 5796 U.S. HIGHWAY 64 • FARMINGTON, NEW MEXICO 87401

DATE 10-18-11 JOB# 92270-0889

LOAD NO.	COMPLETE DESCRIPTION OF SHIPMENT						TRANSPORTING COMPANY			
	POINT OF ORIGIN	DESTINATION	MATERIAL	GRID	YDS	BBLS	COMPANY	TRK#	TIME	DRIVER SIGNATURE
1	Chevron Tic C 34	LF TT	CON'T SOIL	R-12	20	-	Castilla	08	1212	Mac Cregon
	Tic C 34	LF TT	CON'T SOIL	R-12	20	-	Castilla	08	1212	Mac Cregon
					40					

RESULTS:			LANDFARM EMPLOYEE:	NOTES:
272	CHLORIDE TEST	/	Gary Robinson	
	PAINT FILTER TEST	/	Certification of above receival & placement	

"I certify the material hauled from the above location has not been added to or mixed with, and is the same material received from the above mentioned Generator, and that no additional materials have been added."

TRANSPORTER CO. Castilla oil field NAME Mac Aregon SIGNATURE Mac Cregon

COMPANY CONTACT _____ PHONE _____ DATE 10-18-11

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District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Avenue, 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

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

Form C-141
Revised October 10, 2003

Submit 2 Copies to appropriate District Office in accordance with Rule 116 on back side of form

Release Notification and Corrective Action

OPERATOR

☒ Initial Report ☐ Final Report

Name of Company: Four Star Oil & Gas Company	Contact: Ms. Laura Clenney
Address: Post Office Box 36366, Houston, TX 77236	Telephone No. (281) 881-0322
Facility Name: Jicarilla C-34	Facility Type: Gas Well

Surface Owner: Tribal	Mineral Owner:	Lease No.: N/A

LOCATION OF RELEASE

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
K	22	25N	5W	1850	South	1840	West	Rio Arriba

Latitude 36.383332° Longitude -107.350279°

NATURE OF RELEASE

Type of Release: Produced Water	Volume of Release: Historical	Volume Recovered: Not Applicable
Source of Release: Below Grade Tank	Date and Hour of Occurrence: Unknown	Date and Hour of Discovery: July 15, 2011
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.*
No Watercourse Impacted

Describe Cause of Problem and Remedial Action Taken.*
Produced water from gas well at the above mentioned location formerly discharged into a Below Grade Tank (BGT) on location. The Below Grade Tank was removed on July 15, 2011. Soil sampling from directly beneath the tank in accordance with Subsection E of 19.15.17.13 NMAC was performed on July 15, 2011, and indicated that a release had occurred. A site assessment performed on July 19, 2011, indicated the historically impacted area to be approximately 29 feet by 20 feet by eight (8) feet deep. The site has been decommissioned and the BGT removed.

Describe Area Affected and Cleanup Action Taken.*
A five (5)-point composite sample was collected from directly beneath the former BGT immediately once it was removed. The sample was analyzed at Envirotech's Analytical Laboratory for total petroleum hydrocarbons (TPH) using USEPA Method 8015, benzene and total BTEX using USEPA Method 8021 and for total chlorides using USEPA Method 4500B. The sample returned results above the 'Pit Rule" standard of 100 mg/kg TPH, confirming that a release had occurred. Analytical results are attached for your reference.

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:	OIL CONSERVATION DIVISION	
Printed Name: Laura Clenney	Approved by District Supervisor:	
Title: Facilities Engineer	Approval Date:	Expiration Date:
E-mail Address: laura.clenney@chevron.com	Conditions of Approval:	Attached ☐
Date: 4/25/12 Phone: 281-881-0322		

* Attach Additional Sheets If Necessary

District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Avenue, 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

Oil Conservation Division
1220 South St. Francis Dr.
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Form C-141
Revised October 10, 2003

Submit 2 Copies to appropriate District Office in accordance with Rule 116 on back side of form

Release Notification and Corrective Action

OPERATOR

☐ Initial Report ☒ Final Report

Name of Company: Four Star Oil & Gas Company	Contact: Ms. Laura Clenney
Address: Post Office Box 36366, Houston, TX 77236	Telephone No. (281) 881-0322
Facility Name: Jicarilla C-34	Facility Type: Gas Well

Surface Owner: Tribal	Mineral Owner:	Lease No.: N/A

LOCATION OF RELEASE

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
K	22	25N	5W	1850	South	1840	West	Rio Arriba

Latitude 36.383332° Longitude -107.350279°

NATURE OF RELEASE

Type of Release: Produced Water	Volume of Release: Historical	Volume Recovered: Not Applicable
Source of Release: Below Grade Tank	Date and Hour of Occurrence: Unknown	Date and Hour of Discovery: July 15, 2011
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.*
No Watercourse Impacted

Describe Cause of Problem and Remedial Action Taken.*
Produced water from gas well at the above mentioned location formerly discharged into a Below Grade Tank (BGT) on location. The Below Grade Tank was removed on July 15, 2011. Soil sampling from directly beneath the tank in accordance with Subsection E of 19.15.17.13 NMAC was performed on July 15, 2011, and indicated that a release had occurred. A site assessment performed on July 19, 2011, indicated the historically impacted area to be approximately 29 feet by 20 feet by eight (8) feet deep. The site has been decommissioned and the BGT removed.

Describe Area Affected and Cleanup Action Taken.*
A five (5)-point composite sample was collected from directly beneath the former BGT immediately once it was removed. The sample was analyzed at Envirotech's Analytical Laboratory for total petroleum hydrocarbons (TPH) using USEPA Method 8015, benzene and total BTEX using USEPA Method 8021 and for total chlorides using USEPA Method 4500B. The sample returned results above the 'Pit Rule" standard of 100 mg/kg TPH, confirming that a release had occurred. On October 13, 2011, the impacted area was excavated to extents of 29 feet by 20 feet by eight (8) feet to 14 feet deep. Approximately 202 cubic yards of soil were transported to Envirotech's NMOCD permitted soil remediation facility, Landfarm #2. Confirmation sampling activities returned results below regulatory limits for TPH, benzene and total BTEX. Analytical results are attached for your reference.

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:	OIL CONSERVATION DIVISION	
Printed Name: Laura Clenney	Approved by District Supervisor:	
Title: Facilities Engineer	Approval Date:	Expiration Date:
E-mail Address: laura.clenney@chevron.com	Conditions of Approval:	Attached ☐
Date: 4/25/12 Phone: 281-881-0322		

* Attach Additional Sheets If Necessary

BELOW GRADE TANK (BGT) CLOSURE PLAN

SITE NAME:

JICARILLA C-34 WELL SITE
UNIT LETTER K, SECTION 22, TOWNSHIP 25 NORTH, RANGE 5 WEST
RIO ARRIBA COUNTY, NEW MEXICO
LATITUDE: N36.383332° LONGITUDE: W107.350279°

SUBMITTED TO:

MR. BRANDON POWELL
NEW MEXICO OIL CONSERVATION DIVISION
1000 RIO BRAZOS ROAD
AZTEC, NEW MEXICO 87410
(505) 334-6178 EXT 15

SUBMITTED BY:

MR. DON LINDSEY
CHEVRON NORTH AMERICA
POST OFFICE BOX 370
AZTEC, NEW MEXICO 87410
(432) 687-7123

INITIALLY SUBMITTED WITH BGT PERMIT
MARCH 2010

BELOW GRADE TANK (BGT) CLOSURE PLAN
CHEVRON NORTH AMERICA
JICARILLA C-34 WELL SITE
RIO ARRIBA COUNTY, NEW MEXICO

TABLE OF CONTENTS

INTRODUCTION

Chevron North America would like to submit a closure plan for the below grade tank (BGT) at the Jicarilla C-34 well site located in the NE ¼ SW ¼ of Section 22, Township 25 North, Range 5 West, Rio Arriba County, New Mexico. This closure plan has been prepared in conformance with New Mexico Oil Conservation Division (NMOCD) procedures.

SCOPE OF CLOSURE ACTIVITIES

The purpose of this closure plan is to provide the details of activities involved in the closure of the BGT at the Jicarilla C-34 well site. The following scope of closure activities has been designed to meet this objective:

1) Chevron North America shall submit a closure plan to the division's environmental bureau. Upon receipt of this plan the division shall review the current closure plan for adequacy and accordance with 19.15.17.9 Subsection C NMAC and 19.15.17.13 NMAC.
   a. **Closure Plan was submitted on March 1, 2010, to the division's environmental bureau, in accordance with 19.15.17.9 Subsection C NMAC and 19.15.17.13 NMAC. The closure plan was approved on September 8, 2011, by Mr. Brad Jones of the NMOCD, Santa Fe Office.**

2) No less than 72 hours and no greater than one (1) week prior to BGT removal, Chevron North America will provide written notification to the appropriate division district office, as in accordance with 19.15.17.13 Subsection J Paragraph (2) NMAC.
   a. **Due to the oversight of the BGT on this location not being recognized as a BGT, prior notification was not made to the District Office.**

3) Chevron North America shall provide written notification to the surface owner no later than 24 hours prior to BGT removal. BLM will receive notification per a Sundry Notice, as in accordance with 19.15.17.13 Subsection J Paragraph (1) NMAC.
   a. **A Sundry Notice was sent via certified mail to the BLM Farmington field office on June 17, 2011.**

4) Chevron North America or a contractor acting on behalf of Chevron will remove all liquids, and/or sludge, if applicable, prior to closure. Material will be disposed of at Envirotech's Landfarm, Permit # NM-01-0011, as in accordance with 19.15.17.13 Subsection E Paragraph (1) NMAC.
   a. **All waste material was removed from the BGT by Riley Industrial Services and transported to Envirotech's NMOCD permitted Landfarm #2 as listed above; see attached Bill of Lading.**

5) Chevron North America or a contractor acting on behalf of Chevron will remove the BGT and all on-site equipment associated with the BGT that cannot or will not be reused on-site, as in accordance with 19.15.17.13 Subsection E Paragraphs (2) and (3) NMAC.
   a. **Chevron has removed the BGT and associated equipment that will not be reused on-site; see attached Site Photography.**

6) Once the BGT is removed, a five (5) - point composite sample will be collected from directly below the tank or below the leak detection system, if present. An additional discrete sample will be collected from any area that is wet, discolored, or showing other evidence of a release. All samples being collected will be analyzed for benzene and total BTEX using USEPA Method 8021, TPH using USEPA Method 418.1, and chlorides using USEPA Method 300.1, as in accordance with 19.15.17.13 Subsection E Paragraph (4) NMAC.

Sample ID	TPH (8015)	Benzene	BTEX	Total Chlorides
5-Pt. Composite	3,330 ppm	<0.0009 ppm	0.356 ppm	10 ppm

7) Depending on soil sample results, the area will be either backfilled or the area will be excavated.
   a. If soil samples pass the regulatory standards of 0.2 ppm benzene, 50 ppm BTEX, 100 ppm TPH, and 250 ppm or background concentration of chlorides, as in accordance with 19.15.17.13 Subsection E Paragraph (4) NMAC.
      i. Chevron North America or a contractor acting on behalf of Chevron will backfill the excavation or impacted area with non-waste containing, earthen material, in accordance with 19.15.17.13 Subsection E Paragraph (6) NMAC.
         1. **BGT pit was backfilled with clean earthen material in accordance with 19.15.17.13 Subsection E Paragraph (6) NMAC.**

      ii. Upon decommissioning of the well site, Chevron North America, or a contractor acting on behalf of Chevron, will construct a divison-prescribed soil cover, substantially restore, recontour and re-vegetate the site, in accordance with 19.15.17.13 Subsections G, H, and I NMAC.
         1. **Well site was decommissioned and re-vegetated in accordance with 19.15.17.13 Subsections G, H, and I NMAC.**

   b. If soil samples exceed the regulatory standards stated above.
      i. Chevron North America will submit a Release Notification by Form C-141 to the appropriate division district office, in accordance with 19.15.17.13 Subsection E Paragraph (4) NMAC.
         1. **C-141 release notification form is attached.**

      ii. Activities beyond this point will be in accordance with 19.15.3.116 NMAC and 19.15.11.19 NMAC.
         1. **Upon Envirotech's arrival, the closure standard for the site was determined to be 100 ppm TPH and 100 ppm organic vapors due to the well site being located on Jicarilla Apache Reservation. Approximately 202 cubic yards of contaminated soil were removed from the location and transported to an NMOCD permitted soil remediation facility. Confirmation samples were collected and analyzed for TPH using USEPA Method 8015 and for benzene and**

BTEX using USEPA Method 8021. All samples returned results below regulatory standards for this site.

Sample ID	TPH (8015)	Benzene	BTEX
South Wall	5.8 ppm	<0.0009 ppm	0.0202 ppm
Bottom	4.0 ppm	<0.0009 ppm	0.0191 ppm
East Wall	4.5 ppm	<0.0009 ppm	<0.0009 ppm
West Wall	2.7 ppm	<0.0009 ppm	<0.0009 ppm
North Wall	5.2 ppm	<0.0009 ppm	<0.0009 ppm

REPORTING

Reporting will occur within 60 days following the BGT closure and will consist of a form C-144 with all supporting data, and a form C-141 with all supporting data, if necessary. The supporting data will include analytical results, a site diagram, and other information related to the onsite activities.

We appreciate the opportunity to be of service. If you have any questions or require further information, please do not hesitate to contact our office at (505) 632-0615.

Respectfully Submitted:

Chevron North America

Don Lindsey
Chevron North America
Exploration & Production Company

envirotech

April 26, 2012 Project Number 92270-0868

Mr. Brandon Powell
New Mexico Oil Conservation Division
1000 Rio Brazos Road Phone (505) 334-6178
Aztec, New Mexico 87410 brandon.powell@state.nm.us

RE: BELOW-GRADE TANK CLOSURE DOCUMENTATION FOR THE JICARILLA C-34 WELL SITE, RIO ARRIBA COUNTY, NEW MEXICO

Dear Mr. Powell:

On behalf of Chevron North America, please find enclosed the Below Grade Tank (BGT) Closure Plan, Form C-141, Form C-144 and required documents for BGT closure activities conducted at the Jicarilla C-34 well site located in Section 22, Township 25 North, Range 5 West, Rio Arriba County, New Mexico.

This report details sample results above the regulatory limit for total petroleum hydrocarbons (TPH), confirming a release had occurred; see attached ***Analytical Results***. The area of release was excavated and confirmation sampling activities were conducted on October 13, 2011. Pursuant to the sampling results, Envirotech, Inc. recommends no further action in regards to this incident.

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

Respectfully Submitted,
ENVIROTECH, INC.

Toni McKnight, EIT
Environmental Project Manager
tmcknight@envirotech-inc.com

Enclosures: Below Grade Tank Closure Plan
Form C-141
Form C-144 and Required Documentation

Email Cc: Ms. Laura Clenney – Chevron NA
Mr. Don Lindsey – Chevron NA

Chevron

April E. Pohl
Regulatory Specialist
Midcontinent Business Unit

Chevron North America
Exploration and Production Company
(A Chevron U.S.A. Inc. Division)
332 Road 3100
Aztec, New Mexico 87410
Tel: 505-333-1941
Fax: 505-334-7134
April.Pohl@chevron.com

May 24, 2012

Jonathan Kelly
Compliance Officer
New Mexico Oil Conservation Division
1000 Rio Brazos Road
Aztec, NM 87410

RE: Jicarilla C #34 Below Grade Tank documents

Dear Mr. Kelly:

Chevron would like to submit the follow-up documentation requested on May 10, 2012 for the Jicarilla C #34 site.

A Notice of Intent (3160-5) for Plugging and Abandonment (P&A) was submitted to the Bureau of Land Management and approved June 14, 2011. A Subsequent Notice (3160-5) was filed and approved July 14, 2011. During this 30 day period, well site equipment was removed, including the below grade tank (BGT) and the site was closed per the approved Notice of Intent. Chevron did not realize this tank was permitted as a BGT until communication between the NMOCD and Chevron in the latter part of August 2011. This miscommunication resulted in the removal of the tank without the appropriate 72 hour notice to the NMOCD.

The requested pictures of the site are attached.

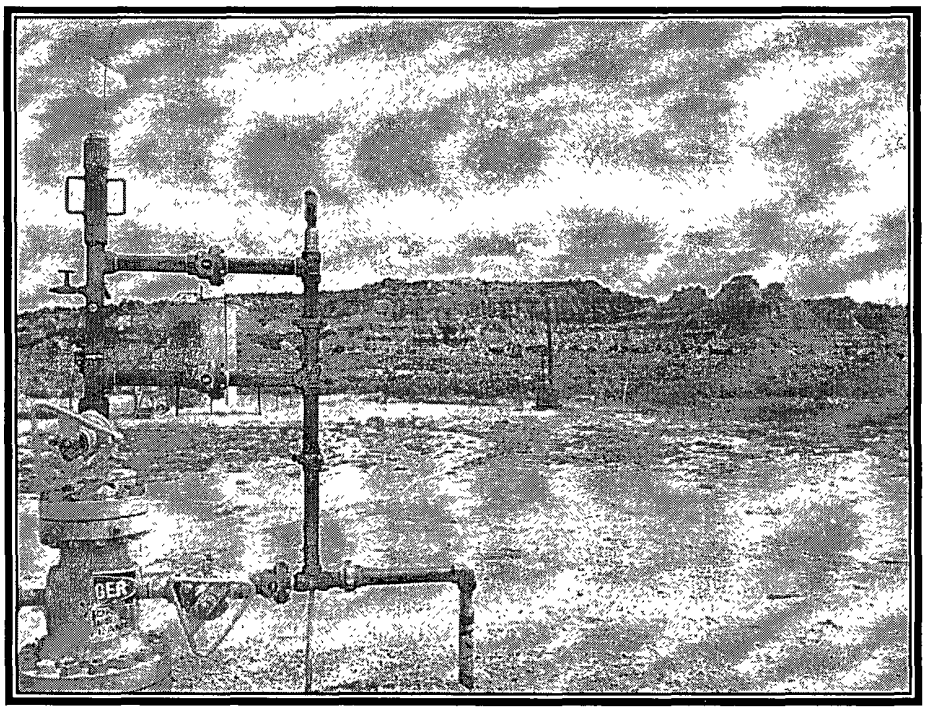
If you have further questions please contact me at 505-333-1941.

Thank you,

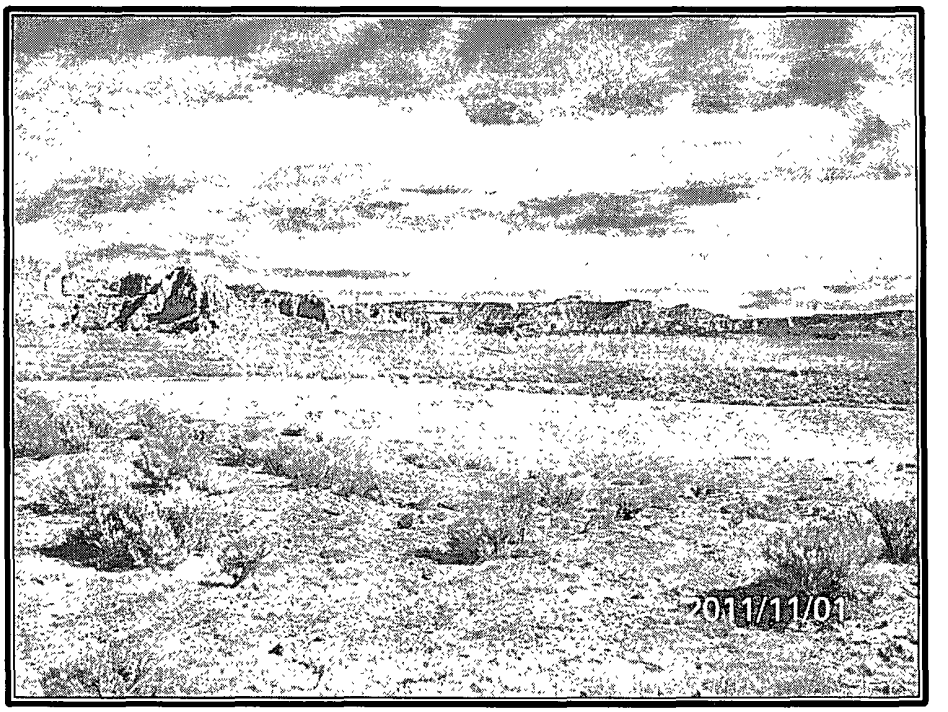
April E Pohl

April E. Pohl
Regulatory Specialist

Site Photography
Chevron North America
Jicarilla C-34 Well Site
Below Grade Tank Closure
Project Number 92270-0868
October 13, 2011

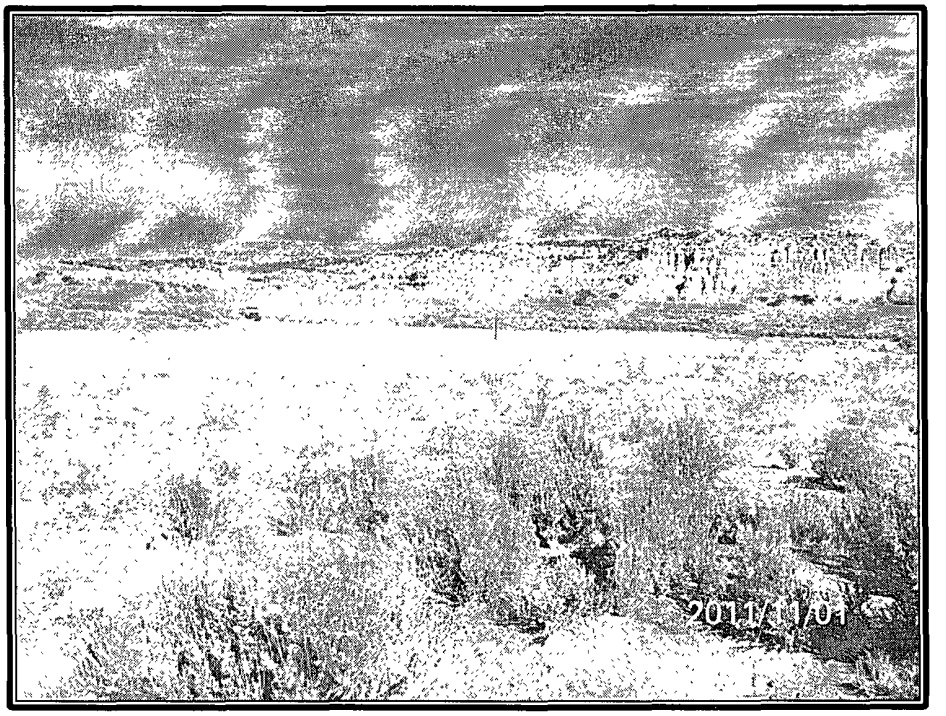


Picture 1: Former Below Grade Tank



Picture 2: Backfilled, Re-contoured, and Re-vegetated Below Grade Tank Pit (View to East)

Site Photography
Chevron North America
Jicarilla C-34 Well Site
Below Grade Tank Closure
Project Number 92270-0868
October 13, 2011



Picture 3: Backfilled, Re-contoured, and Re-vegetated Below Grade Tank Pit (View to North)