

# Closure Report

## Site Description

Site Name:	Federal 27 #8
Company:	Oxy Permian Ltd.
Legal Description:	U/L M, Section 27, T22S, R32E
County:	Lea County, NM
GPS Coordinates:	N 32.35703° W 103.66887°

## Release Data

Date of Release:	02/18/2014
Type of Release:	Produced water
Source of Release:	Stuffing box leak on wellhead
Volume of Release:	15 bbls
Volume Recovered:	0 bbls

## Remediation Specifications

Remediation Parameters:	Excavate to a depth of a minimum of 7 feet in the area around SP1. Excavate to a depth of a minimum of 1 foot in the areas of SP2 and SP4. Excavate to a depth of a minimum of 3 feet in the area of SP3. Obtain a bottom confirmation field screen at SP1. Backfill the site with clean soil.	
Remediation Activities:	09/02/2014 to 09/29/2014	
Plan Sent to OCD:	06/26/2014	Email from Cliff Brunson to Geoffrey Leking
OCD Approval of Plan:	07/01/2014	Email from Geoffrey Leking to Cliff Brunson
Plan Sent to BLM:	06/26/2014	Email from Cliff Brunson to J. Van Curen
BLM Approval of Plan:	06/30/2014	Meeting between C. Brunson & J. Van Curen

## Supporting Documentation

Initial C-141	Signed 02/19/2014
Final C-141	Signed 10/10/2014
Site Diagram	February 2014
Groundwater Plot	400'
TOPO Maps	February 2014
Lab Summary	03/15/2014-03/16/2014
Lab Analysis	03/15/2014-03/16/2014
Correspondence	Request and approval of remediation plan via email

## Request for Closure

Based on the completion of the remediation plan as agreed upon, BBC International requests closure approval from NMOCD.

Cliff Brunson, President of BBC International Inc.

10/20/2014

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	Oxy USA Inc.	Contact	Austin Tramell
Address	1017 W. Stanolind Rd, Hobbs, NM	Telephone No.	(575) 397-8210
Facility Name	Federal 27 #8	Facility Type	Well
Surface Owner	BLM	Mineral Owner	
		Lease No.	30-025-32755

**LOCATION OF RELEASE**

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
M	27	22S	32E	580'	South	790'	West	Lea

Latitude N 32.35681° Longitude W 103.6680°

**NATURE OF RELEASE**

Type of Release	Produced Water	Volume of Release	15 bbls	Volume Recovered	0 bbls
Source of Release	Stuffing box leak on well head	Date and Hour of Occurrence	02/18/2014	Date and Hour of Discovery	
Was Immediate Notice Given?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Not Required	If YES, To Whom?	Goeffrey Leking- NMOCD, Jennifer Van Curen- BLM		
By Whom?	Kathy Purvis, BBC International	Date and Hour	02/18/2014 @ 3:20 pm		
Was a Watercourse Reached?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If YES, Volume Impacting the Watercourse.			

If a Watercourse was Impacted, Describe Fully.\*

Describe Cause of Problem and Remedial Action Taken.\*

The stuffing box on the well head leaked 15 bbls of produced water onto the ground. No fluids were recovered and the stuffing box was repaired.

Describe Area Affected and Cleanup Action Taken.\*

The affected area was approximately 20' x 60' on the location pad and 2' x 15' off the location pad. Remediation will be completed in accordance with a plan approved by both the NMOCD and the BLM.

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:	<u>OIL CONSERVATION DIVISION</u>		
Printed Name: Austin Tramell	Approved by District Supervisor:		
Title: HES Coordinator	Approval Date:	Expiration Date:	
E-mail Address: Austin.Tramell@oxy.com	Conditions of Approval:		Attached <input type="checkbox"/>
Date: 2/19/14	Phone: (575) 397-8210		

\* Attach Additional Sheets If Necessary

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  
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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	Oxy USA Inc.	Contact	Chancey Summers
Address	1017 W. Stanolind Rd, Hobbs, NM	Telephone No.	(575) 397-8216
Facility Name	Federal 27 #8	Facility Type	Well
Surface Owner	BLM	Mineral Owner	
		API No.	30-025-32755

**LOCATION OF RELEASE**

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
M	27	22S	32E	580'	South	790'	West	Lea

Latitude N 32.35681° Longitude W 103.6680°

**NATURE OF RELEASE**

Type of Release	Produced Water	Volume of Release	15 bbls	Volume Recovered	0 bbls
Source of Release	Stuffing box leak on well head	Date and Hour of Occurrence	02/18/2014	Date and Hour of Discovery	
Was Immediate Notice Given?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Not Required	If YES, To Whom?	Geoffrey Leking- NMOCD, Jennifer Van Curen- BLM		
By Whom?	Kathy Purvis, BBC International	Date and Hour	02/18/2014 @ 3:20 pm		
Was a Watercourse Reached?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If YES, Volume Impacting the Watercourse.			

If a Watercourse was Impacted, Describe Fully.\*

Describe Cause of Problem and Remedial Action Taken.\*

The stuffing box on the well head leaked 15 bbls of produced water onto the ground. No fluids were recovered and the stuffing box was repaired.

Describe Area Affected and Cleanup Action Taken.\*

The affected area was approximately 20' x 60' on the location pad and 2' x 15' off the location pad. Remediation was completed in accordance with the remediation plan approved by Geoffrey Leking of NMOCD via email on 07/01/2014 and approved by Jennifer Van Curen in a meeting on 06/30/2014.

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:		<b>OIL CONSERVATION DIVISION</b>	
Printed Name:	Chancey Summers	Approved by District Supervisor:	
Title:	HES Advisor	Approval Date:	Expiration Date:
E-mail Address:	Chancey Summers@oxy.com	Conditions of Approval:	
Date:	10-10-14	Phone:	(575) 397-8216
			Attached <input type="checkbox"/>

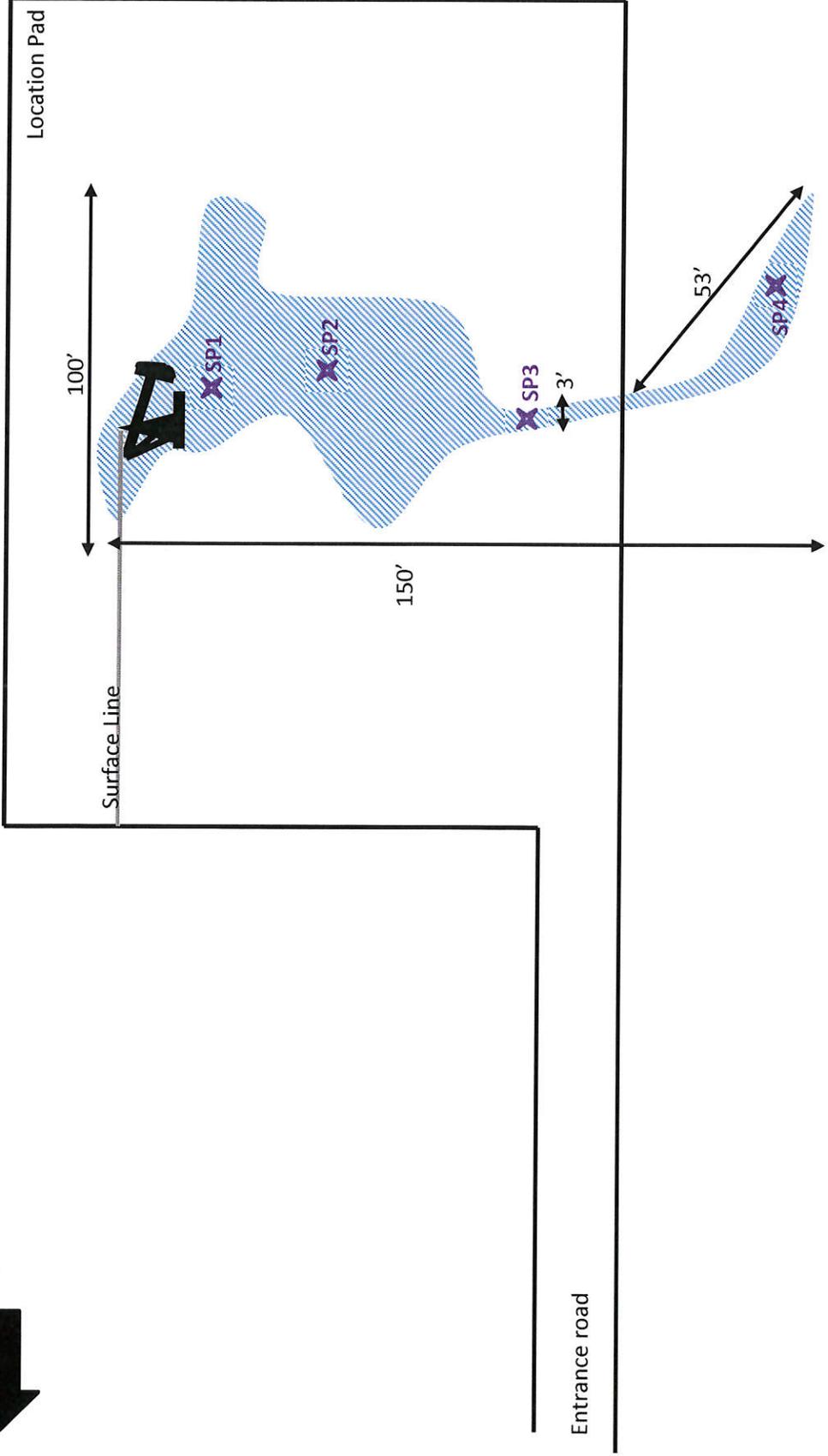
\* Attach Additional Sheets If Necessary

N



Oxy

Federal 27 #8



U/L M, Section 27, T22S, R32E

580' FSL, 790' FWL

Lea County, NM

GPS at stake: N 32.35703° W 103.66887°

BBC International, Inc.

Oxy

Federal 27 #8

Date: 02/25/2014 DRWG by: K. Purvis

NOT TO SCALE File: Oxy 2014

# Groundwater Plot

## Oxy Federal 27 #8

County  
Lea

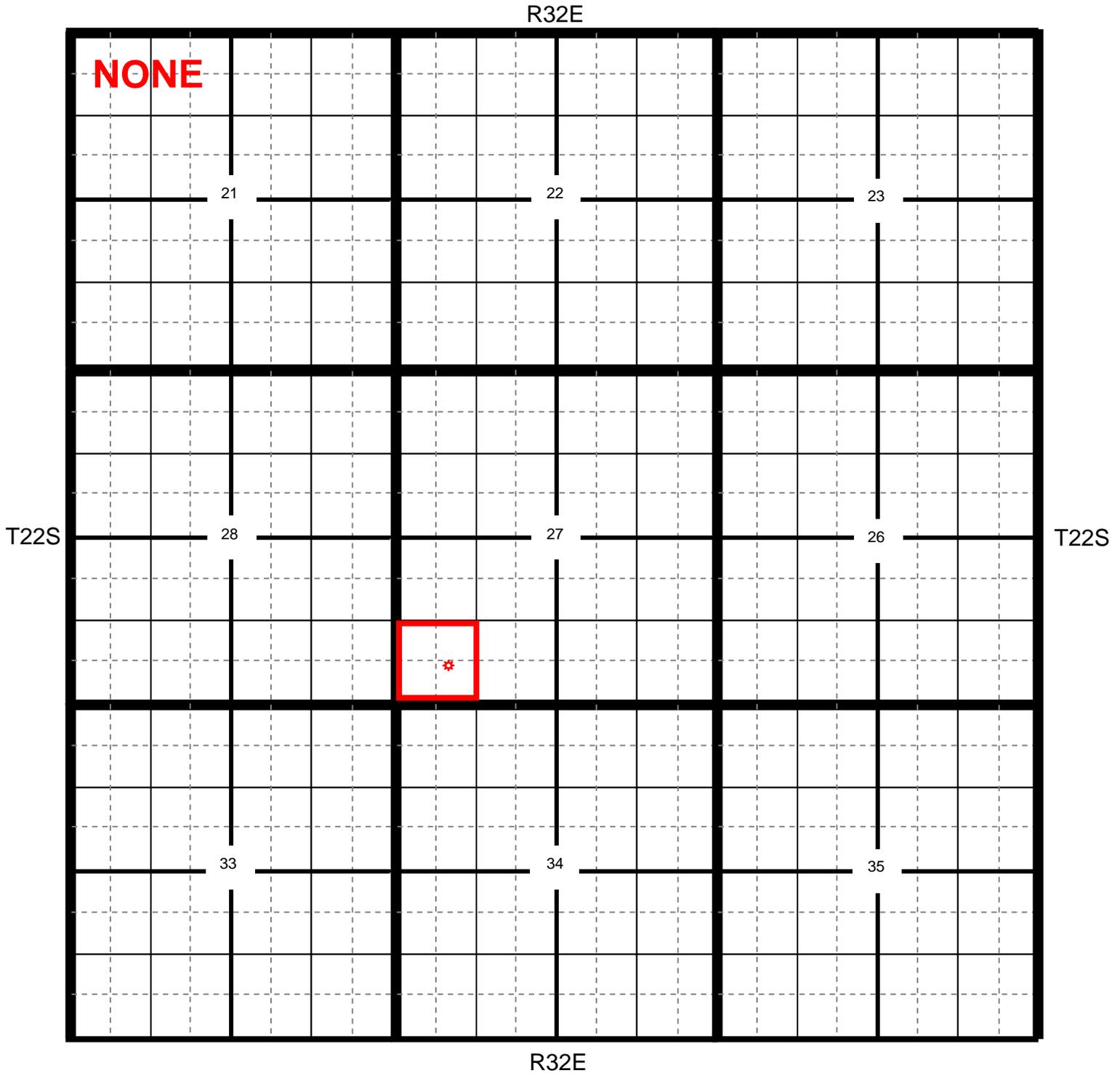
Unit Letter  
M

Section  
27

Township  
22S

Range  
32E

Trend Map 400'



⚙ Location

● OCD

● USGS

● SEO

● All Databases

## Oxy Federal 27 #8

County: Lea      Unit Letter: M      Section: 27      Township: 22S      Range: 32E

Trend Map 400'

1

2

NW/NW <b>NONE</b>	NE/NW	NW/NE	NE/NE
Unit Letter D	Unit Letter C	Unit Letter B	Unit Letter A
SW/NW	SE/NW	SW/NE	SE/NE
Unit Letter E	Unit Letter F	Unit Letter G	Unit Letter H
NW/SW	NE/SW	NW/SE	NE/SE
Unit Letter L	Unit Letter K	Unit Letter J	Unit Letter I
SW/SW 	SE/SW	SW/SE	SE/SE
Unit Letter M	Unit Letter N	Unit Letter O	Unit Letter P

3

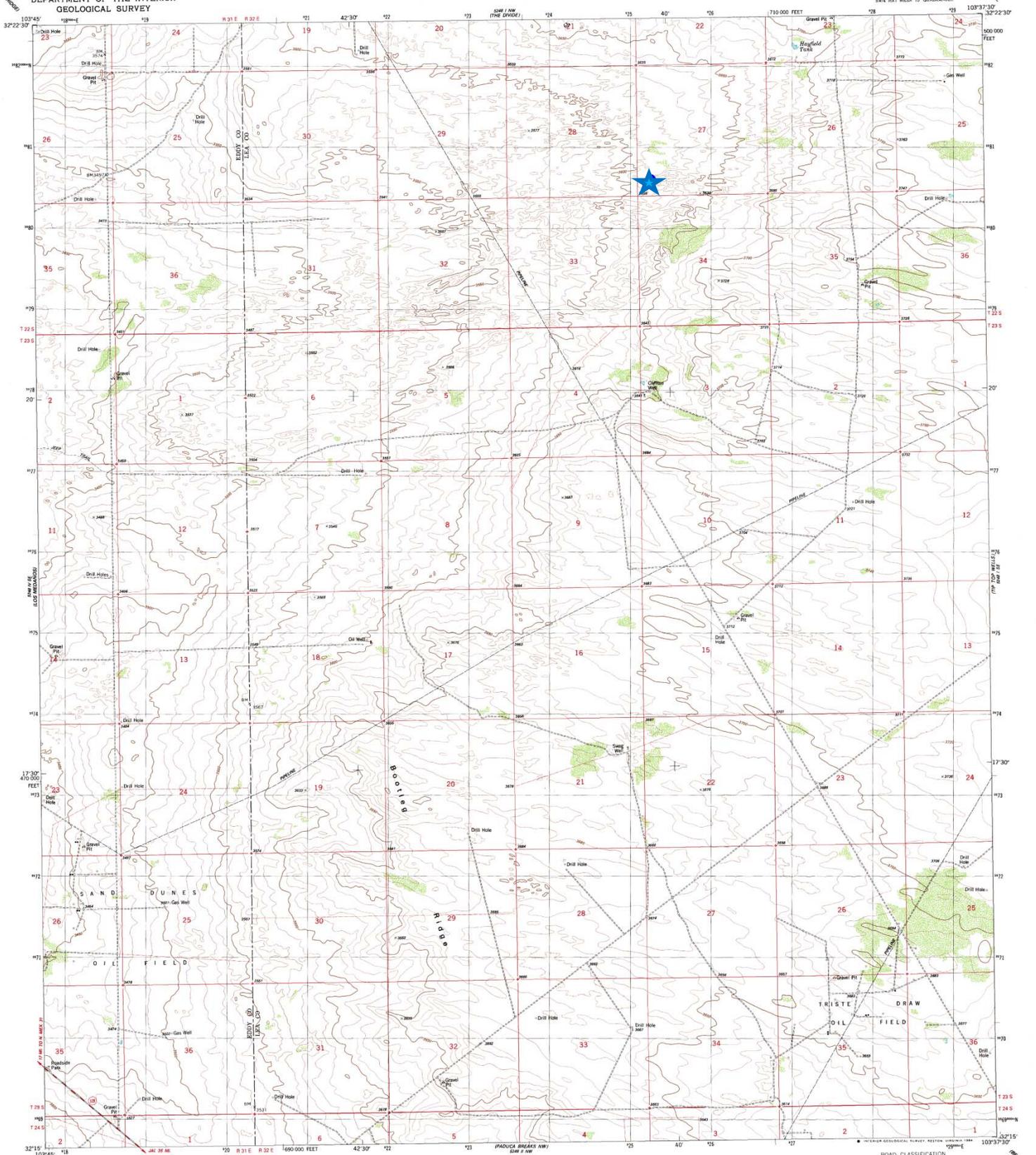
4

# Oxy

## Federal 27 #8

BOOTLEG RIDGE QUADRANGLE  
NEW MEXICO  
7.5 MINUTE SERIES (TOPOGRAPHIC)

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
GEOLOGICAL SURVEY



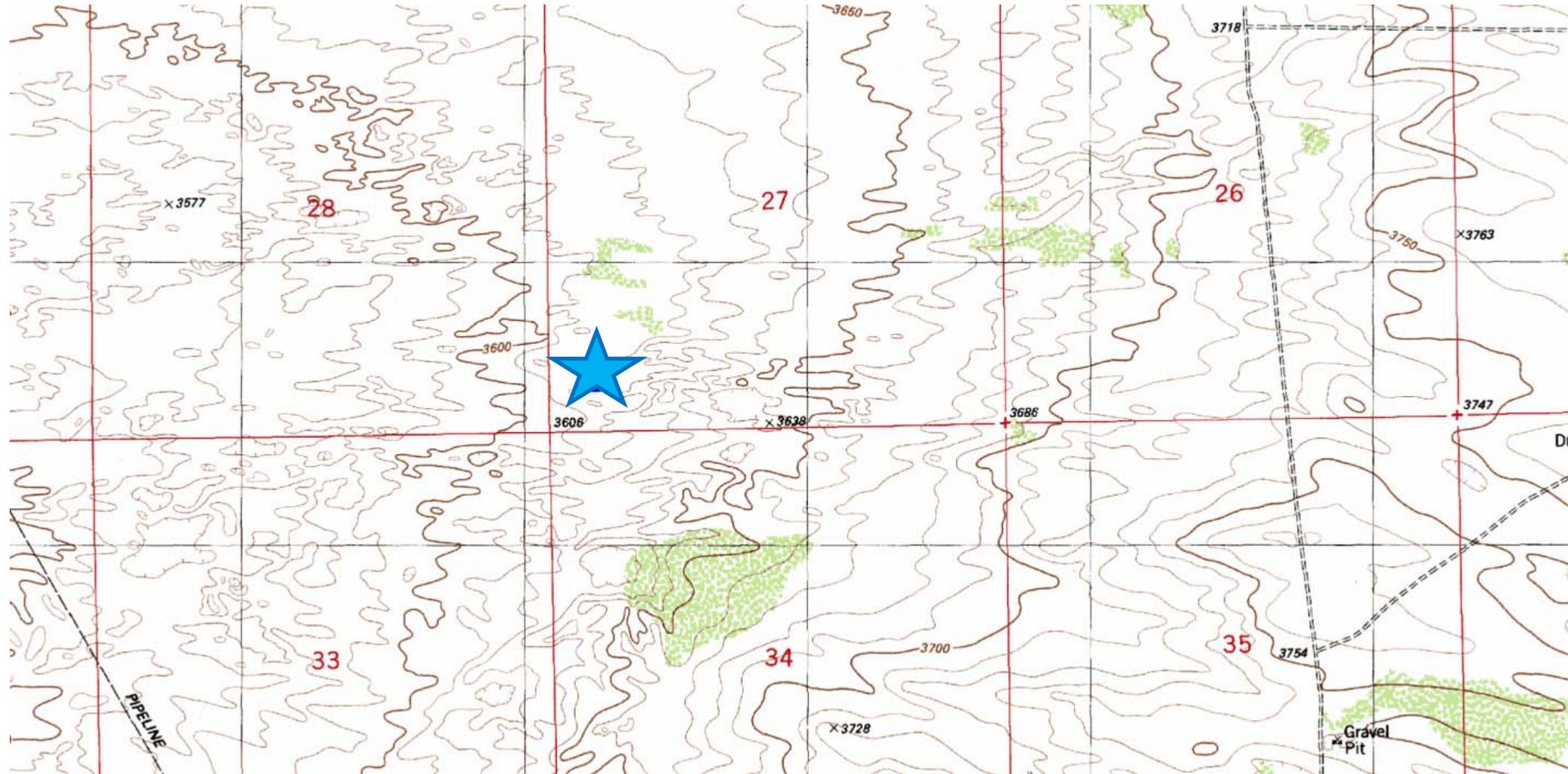
Mapped, edited, and published by the Geological Survey  
Control by USGS and NOS/NOAA  
Topography by photogrammetric methods from aerial photographs  
taken 1977. Field checked 1978. Map edited 1984  
Projection and 1:24,000-foot grid ticks: New Mexico  
coordinate system, east zone (transverse Mercator)  
1000-meter Universal Transverse Mercator grid, zone 13  
1927 North American Datum  
To place on the predicted North American Datum 1983  
move the projection lines 3 meters south and  
45 meters east as shown by dashed corner ticks  
Fine red dashed lines indicate selected fence lines

SCALE 1:24 000  
CONTOUR INTERVAL 10 FEET  
NATIONAL GEODESIC VERTICAL DATUM OF 1929  
THIS MAP COMPLIES WITH NATIONAL MAP ACCURACY STANDARDS  
FOR SALE BY U.S. GEOLOGICAL SURVEY, DENVER, COLORADO 80225 OR RESTON, VIRGINIA 22092  
A FOLDER DESCRIBING TOPOGRAPHIC MAPS AND SYMBOLS IS AVAILABLE ON REQUEST

ROAD CLASSIFICATION  
Primary highway, hard surface  
Secondary highway, hard surface  
Interestate Route  
Light-duty road, hard or improved surface  
Unimproved road  
U.S. Route  
State Route  
BOOTLEG RIDGE, N. MEX.  
804 HAT MESA 19 QUADRANGLE  
32103-C6-1F-024  
1984  
GMA 5248 1 SW-SERIES Y881

# Oxy

## Federal 27 #8



**Laboratory Analytical Results Summary  
Federal 27 #8**

		Sample	SP1 @ 1'	SP1 @ 3'	SP1 @ 5'	SP1 @ 7'	SP1 @ 9'
Analyte	Method	Date	3/15/14	3/15/14	3/15/14	3/15/14	3/15/14
			mg/Kg	mg/Kg	mg/Kg	mg/Kg	mg/Kg
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	<0.150	<0.150	<0.150
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	<0.300	<0.300	<0.300
<b>Chloride</b>	SM4500CI-B		<16.0	<b>384</b>	<b>3480</b>	<b>4320</b>	<b>336</b>
<b>GRO</b>	TPH 8015M		<10.0	<10.0	<10.0	<10.0	<10.0
<b>DRO</b>	TPH 8015M		<10.0	<10.0	<10.0	<10.0	<10.0

		Sample	SP2 @ 1'	SP2 @ 3'	SP2 @ 4'
Analyte	Method	Date	3/15/14	3/15/14	3/15/14
			mg/Kg	mg/Kg	mg/Kg
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	<0.150
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	<0.300
<b>Chloride</b>	SM4500CI-B		<b>1760</b>	<b>416</b>	<b>240</b>
<b>GRO</b>	TPH 8015M		<10.0	<10.0	<10.0
<b>DRO</b>	TPH 8015M		<10.0	<10.0	<10.0

		Sample	SP3 @ 1'	SP3 @ 3'	SP3 @ 5'	SP3 @ 7'	SP3 @ 8'
Analyte	Method	Date	3/16/14	3/16/14	3/16/14	3/16/14	3/16/14
			mg/Kg	mg/Kg	mg/Kg	mg/Kg	mg/Kg
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	<0.150	<0.150	<0.150
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	<0.300	<0.300	<0.300
<b>Chloride</b>	SM4500CI-B		<b>2600</b>	<b>1330</b>	<b>576</b>	<b>128</b>	<16.0
<b>GRO</b>	TPH 8015M		<10.0	<10.0	<10.0	<10.0	<10.0
<b>DRO</b>	TPH 8015M		<10.0	<10.0	<10.0	<10.0	<10.0

		Sample	SP4 @ 1'	SP4 @ 3'	SP4 @ 5'
Analyte	Method	Date	3/16/14	3/16/14	3/16/14
			mg/Kg	mg/Kg	mg/Kg
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	<0.150
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	<0.300
<b>Chloride</b>	SM4500CI-B		<b>13100</b>	<16.0	<16.0
<b>GRO</b>	TPH 8015M		<10.0	<10.0	<10.0
<b>DRO</b>	TPH 8015M		<b>108</b>	<10.0	<10.0



March 31, 2014

Cliff Brunson

BBC International, Inc.

P.O. Box 805

Hobbs, NM 88241

RE: FEDERAL 27 #8

Enclosed are the results of analyses for samples received by the laboratory on 03/25/14 9:00.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-13-5. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (\*). For a complete list of accredited analytes and matrices visit the TCEQ website at [www.tceq.texas.gov/field/qa/lab\\_accred\\_certif.html](http://www.tceq.texas.gov/field/qa/lab_accred_certif.html).

Cardinal Laboratories is accredited through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2	Haloacetic Acids (HAA-5)
Method EPA 524.2	Total Trihalomethanes (TTHM)
Method EPA 524.4	Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

A handwritten signature in cursive script that reads "Celey D. Keene".

Celey D. Keene

Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 1' (H400872-01)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.44	122	2.00	2.62	
Toluene*	<0.050	0.050	03/28/2014	ND	2.32	116	2.00	2.19	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.26	113	2.00	1.89	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.62	110	6.00	1.24	
Total BTEX	<0.300	0.300	03/28/2014	ND					

*Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126*

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	03/27/2014	ND	416	104	400	0.00	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	190	94.9	200	2.52	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	188	93.8	200	2.38	

*Surrogate: 1-Chlorooctane 111 % 65.2-140*
*Surrogate: 1-Chlorooctadecane 114 % 63.6-154*

Cardinal Laboratories

\* = Accredited Analyte

PLEASE NOTE: Liability and Damages. Cardinal's liability and client's exclusive remedy for any claim arising, whether based in contract or tort, shall be limited to the amount paid by client for analyses. All claims, including those for negligence and any other cause whatsoever shall be deemed waived unless made in writing and received by Cardinal within thirty (30) days after completion of the applicable service. In no event shall Cardinal be liable for incidental or consequential damages, including, without limitation, business interruptions, loss of use, or loss of profits incurred by client, its subsidiaries, affiliates or successors arising out of or related to the performance of the services hereunder by Cardinal, regardless of whether such claim is based upon any of the above stated reasons or otherwise. Results relate only to the samples identified above. This report shall not be reproduced except in full with written approval of Cardinal Laboratories.



Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 3' (H400872-02)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.44	122	2.00	2.62	
Toluene*	<0.050	0.050	03/28/2014	ND	2.32	116	2.00	2.19	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.26	113	2.00	1.89	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.62	110	6.00	1.24	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>384</b>	16.0	03/27/2014	ND	416	104	400	0.00	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 99.6 % 65.2-140

Surrogate: 1-Chlorooctadecane 99.9 % 63.6-154

Cardinal Laboratories

\* = Accredited Analyte

PLEASE NOTE: Liability and Damages. Cardinal's liability and client's exclusive remedy for any claim arising, whether based in contract or tort, shall be limited to the amount paid by client for analyses. All claims, including those for negligence and any other cause whatsoever shall be deemed waived unless made in writing and received by Cardinal within thirty (30) days after completion of the applicable service. In no event shall Cardinal be liable for incidental or consequential damages, including, without limitation, business interruptions, loss of use, or loss of profits incurred by client, its subsidiaries, affiliates or successors arising out of or related to the performance of the services hereunder by Cardinal, regardless of whether such claim is based upon any of the above stated reasons or otherwise. Results relate only to the samples identified above. This report shall not be reproduced except in full with written approval of Cardinal Laboratories.



Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 5' (H400872-03)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.44	122	2.00	2.62	
Toluene*	<0.050	0.050	03/28/2014	ND	2.32	116	2.00	2.19	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.26	113	2.00	1.89	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.62	110	6.00	1.24	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 108 % 89.4-126

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>3480</b>	16.0	03/27/2014	ND	416	104	400	0.00	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 76.9 % 65.2-140

Surrogate: 1-Chlorooctadecane 87.4 % 63.6-154

Cardinal Laboratories

\* = Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 7' (H400872-04)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>4320</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 74.2 % 65.2-140

Surrogate: 1-Chlorooctadecane 83.9 % 63.6-154

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 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 9' (H400872-05)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 106 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	336	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 87.3 % 65.2-140

Surrogate: 1-Chlorooctadecane 90.9 % 63.6-154

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 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 2 @ 1' (H400872-06)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 106 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>1760</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 87.9 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.2 % 63.6-154

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Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 2 @ 3' (H400872-07)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>416</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 89.3 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.6 % 63.6-154

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Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 2 @ 4' (H400872-08)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>240</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 85.5 % 65.2-140

Surrogate: 1-Chlorooctadecane 93.4 % 63.6-154

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**Analytical Results For:**

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 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 1' (H400872-09)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 108 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>2600</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 90.4 % 65.2-140

Surrogate: 1-Chlorooctadecane 93.4 % 63.6-154

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 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 3' (H400872-10)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 108 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>1330</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 76.1 % 65.2-140

Surrogate: 1-Chlorooctadecane 87.1 % 63.6-154

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Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 5' (H400872-11)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>576</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 81.1 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.1 % 63.6-154

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Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 7' (H400872-12)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	128	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 75.9 % 65.2-140

Surrogate: 1-Chlorooctadecane 83.0 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 8' (H400872-13)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 90.4 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.5 % 63.6-154

Cardinal Laboratories

\* = Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 4 @ 1' (H400872-14)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 108 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>13100</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
<b>DRO &gt;C10-C28</b>	<b>108</b>	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 91.9 % 65.2-140

Surrogate: 1-Chlorooctadecane 99.6 % 63.6-154

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\* = Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 4 @ 3' (H400872-15)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 87.5 % 65.2-140

Surrogate: 1-Chlorooctadecane 92.9 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 4 @ 5' (H400872-16)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 84.3 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.2 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Notes and Definitions**

- ND Analyte NOT DETECTED at or above the reporting limit
- RPD Relative Percent Difference
- \*\* Samples not received at proper temperature of 6°C or below.
- \*\*\* Insufficient time to reach temperature.
- Chloride by SM4500Cl-B does not require samples be received at or below 6°C  
Samples reported on an as received basis (wet) unless otherwise noted on report



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Celey D. Keene, Lab Director/Quality Manager



**ARDINAL LABORATORIES**  
 101 East Marland, Hobbs, NM 88240  
 (505) 393-2326 FAX (505) 393-2476

**CHAIN-OF-CUSTODY AND ANALYSIS REQUEST**

**ANALYSIS REQUEST**

182

Company Name: BBC International, Inc. P.O. #: **BILL TO**

Project Manager: Cliff Brunson Company: **BILL TO**

Address: P.O. Box 805 State: NM zip: 88241 Attn: **BILL TO**

City: Hobbs Address: **BILL TO**

Phone #: 575-397-6388 Fax #: 575-397-0397 City: **BILL TO**

Project #: Project Owner: Oxy State: Zip: **BILL TO**

Project Name: Federal 27 #8 Phone #: **BILL TO**

Project Location: Lea County, NM Fax #: **BILL TO**

Sampler Name: Gary Ray PRESERV SAMPLING

FOR LAB USE ONLY

Lab I.D. Sample I.D. (G)RAB OR (C)OMP.

Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX						DATE	TIME	TPH	BTEX	CI
				GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :					
H400872	SP1 @ 1'		1						3/15/14	10:20 AM	✓	✓	✓	
	SP1 @ 3'		1						3/15/14	10:42 AM	✓	✓	✓	
	SP1 @ 5'		1						3/15/14	11:15 AM	✓	✓	✓	
	SP1 @ 7'		1						3/15/14	11:45 AM	✓	✓	✓	
	SP1 @ 9'		1						3/15/14	1:10 PM	✓	✓	✓	
	SP2 @ 1'		1						3/15/14	1:40 PM	✓	✓	✓	
	SP2 @ 3'		1						3/15/14	2:15 PM	✓	✓	✓	
	SP2 @ 4'		1						3/15/14	2:30 PM	✓	✓	✓	
	SP3 @ 1'		1						3/16/14	10:45 AM	✓	✓	✓	
	SP3 @ 3'		1						3/16/14	11:15 AM	✓	✓	✓	

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Relinquished By: *[Signature]* Date: *3/15/14* Time: *1:00*  
 Received By: *[Signature]* Date: *3/15/14* Time: *1:00*

Delivered By: (Circle One) *UPS*  
 Sampler - UPS - Bus - Other: *UPS*

Sample Condition: Cool  Intact   
 Yes  No   
 CHECKED BY: *[Signature]*

REMARKS: *#54*



# CARDINAL LABORATORIES

101 East Marland, Hobbs, NM 88240  
(505) 393-2326 FAX (505) 393-2476

## CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

**BILL TO**

ANALYSIS REQUEST

Company Name: BBC International, Inc. P.O. #: \_\_\_\_\_  
 Project Manager: Cliff Brunson Company: \_\_\_\_\_  
 Address: P.O. Box 805 State: NM Zip: 88241 Attn: \_\_\_\_\_  
 City: Hobbs Address: \_\_\_\_\_  
 Phone #: 575-397-6388 Fax #: 575-397-0397 City: \_\_\_\_\_  
 Project #: \_\_\_\_\_ Project Owner: Oxy State: \_\_\_\_\_ Zip: \_\_\_\_\_  
 Project Name: Federal 27 #8 Phone #: \_\_\_\_\_  
 Project Location: Lea County, NM Fax #: \_\_\_\_\_  
 Sampler Name: Gary Ray

FOR LAB USE ONLY

Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX						DATE	TIME	TPH	BTEX	CI
				GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :					
11	SP3 @ 5'	G	1			✓			✓	3/16/14	11:39 AM	✓	✓	✓
12	SP3 @ 7'	G	1			✓			✓	3/16/14	12:00 PM	✓	✓	✓
13	SP3 @ 8'	G	1			✓			✓	3/16/14	12:15 PM	✓	✓	✓
14	SP4 @ 1'	G	1			✓			✓	3/16/14	1:30 PM	✓	✓	✓
15	SP4 @ 3'	G	1			✓			✓	3/16/14	1:48 PM	✓	✓	✓
16	SP4 @ 5'	G	1			✓			✓	3/16/14	2:15 PM	✓	✓	✓

Relinquished By: *[Signature]* Date: 3/16/14 Time: 5:00 PM  
 Received By: \_\_\_\_\_ Date: 7:10 AM Time: 1:20 PM

Delivered By: (Circle One) UPS - Bus - Other: \_\_\_\_\_  
 Sample Condition: Cool  Intact   
 Yes No Yes No

CHECKED BY: *[Signature]*

REMARKS: \_\_\_\_\_

Phone Result:  Yes  No Add'l Phone #: \_\_\_\_\_  
 Fax Result:  Yes  No Add'l Fax #: \_\_\_\_\_

† Cardinal cannot accept verbal changes. Please fax written changes to 505-393-2476

#54

22

## Kathy Purvis

---

**From:** Leking, Geoffrey R, EMNRD <GeoffreyR.Leking@state.nm.us>  
**Sent:** Tuesday, July 01, 2014 2:42 PM  
**To:** Cliff P. Brunson  
**Cc:** C J Summers; Ken Swinney; Jennifer Gilkey; Kathy Purvis  
**Subject:** OCD Concurrence with Various OXY Remediation Plans

Cliff

The OCD concurs with the :

- 1) OXY-State C Trac 11 Battery-Remediation Plan
- 2) OXY-Fred Turner JR B Battery-Remediation Plan
- 3) OXY-Federal 27 #8-Remediation Plan
- 4) OXY-MLMU #98-Remediation Plan
- 5) OXY-South Mattix Battery-Remediation Plan
- 6) OXY-MLMU Satellite #2-Remediation Plan
- 7) OXY-MLMU #71-Remediation Plan

Approval of the Red Tank 35 Fed #3 Remediation Plan is dependent on your response regarding the excavation depth at SP2 and SP3. Thanks Cliff.

Geoffrey Leking  
Environmental Specialist  
NMOCD-Hobbs  
1625 N. French Drive  
Hobbs, NM 88240  
Office: (575) 393-6161 Ext. 113  
Cell: (575) 399-2990  
email: [geoffreyr.leking@state.nm.us](mailto:geoffreyr.leking@state.nm.us)

---

**From:** Cliff P. Brunson [<mailto:cbrunson@bbcinternational.com>]  
**Sent:** Thursday, June 26, 2014 8:30 PM  
**To:** Leking, Geoffrey R, EMNRD  
**Cc:** C J Summers; Ken Swinney; Jennifer Gilkey; Kathy Purvis  
**Subject:** OXY-State C Trac 11 Battery-Remediation Plan

Geoff,

This e-mail is to confirm our conversation on June 19, 2014 about the remediation plan for the above referenced site. I have attached the materials that we used in our discussion. As discussed, Oxy will excavate to a depth of 4 feet in the area around SP1, 1 foot in the areas of SP2 and SP3, 2 feet in the area of SP4, and 1 foot in the areas of SP5 and SP6 as depicted on the attached site diagram. Then the site will then be backfilled with clean soil.

If you would please e-mail your concurrence with this remediation plan, it would be greatly appreciated.

Thanks, Cliff

Cliff P. Brunson, CEI, CRS  
President  
BBC International, Inc.  
World-Wide Environmental Specialists  
Mailing Address:  
P. O. Box 805  
Hobbs, NM 88241-0805 USA  
Shipping Address:  
1324 W. Marland St.  
Hobbs, NM 88240 USA  
Phone: (575) 397-6388  
Fax: (575) 397-0397  
E-Mail: [cbrunson@bbcinternational.com](mailto:cbrunson@bbcinternational.com)

\*\*\*\*\*

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\*\*\*\*\*

## Kathy Purvis

---

**From:** Cliff P. Brunson <cbrunson@bbcinternational.com>  
**Sent:** Thursday, June 26, 2014 8:21 PM  
**To:** Jennifer Van Curen  
**Cc:** C J Summers; Ken Swinney; Jennifer Gilkey; Kathy Purvis  
**Subject:** OXY-Federal 27 #8-Remediation Plan  
**Attachments:** Remediation Packet, Federal 27 #8.pdf

Jennifer,

This e-mail is to request the BLM's approval for the following remediation plan for the above referenced site. I have attached the materials that pertain to the site and the plan. This plan has already been approved by Geoff Leking of the NMOCD. Oxy will excavate to a depth of 7 feet in the area around SP1, 1 foot in the area around SP2, 3 feet in the area around SP3, and 1 foot in the area around SP4 as depicted on the attached site diagram. Then the site will then be backfilled with clean soil.

If you would please e-mail your concurrence with this remediation plan, it would be greatly appreciated. If you have any questions, please let us know.

Thanks, Cliff

Cliff P. Brunson, CEI, CRS  
President  
BBC International, Inc.  
World-Wide Environmental Specialists  
Mailing Address:  
P. O. Box 805  
Hobbs, NM 88241-0805 USA  
Shipping Address:  
1324 W. Marland St.  
Hobbs, NM 88240 USA  
Phone: (575) 397-6388  
Fax: (575) 397-0397  
E-Mail: [cbrunson@bbcinternational.com](mailto:cbrunson@bbcinternational.com)

\*\*\*\*\*

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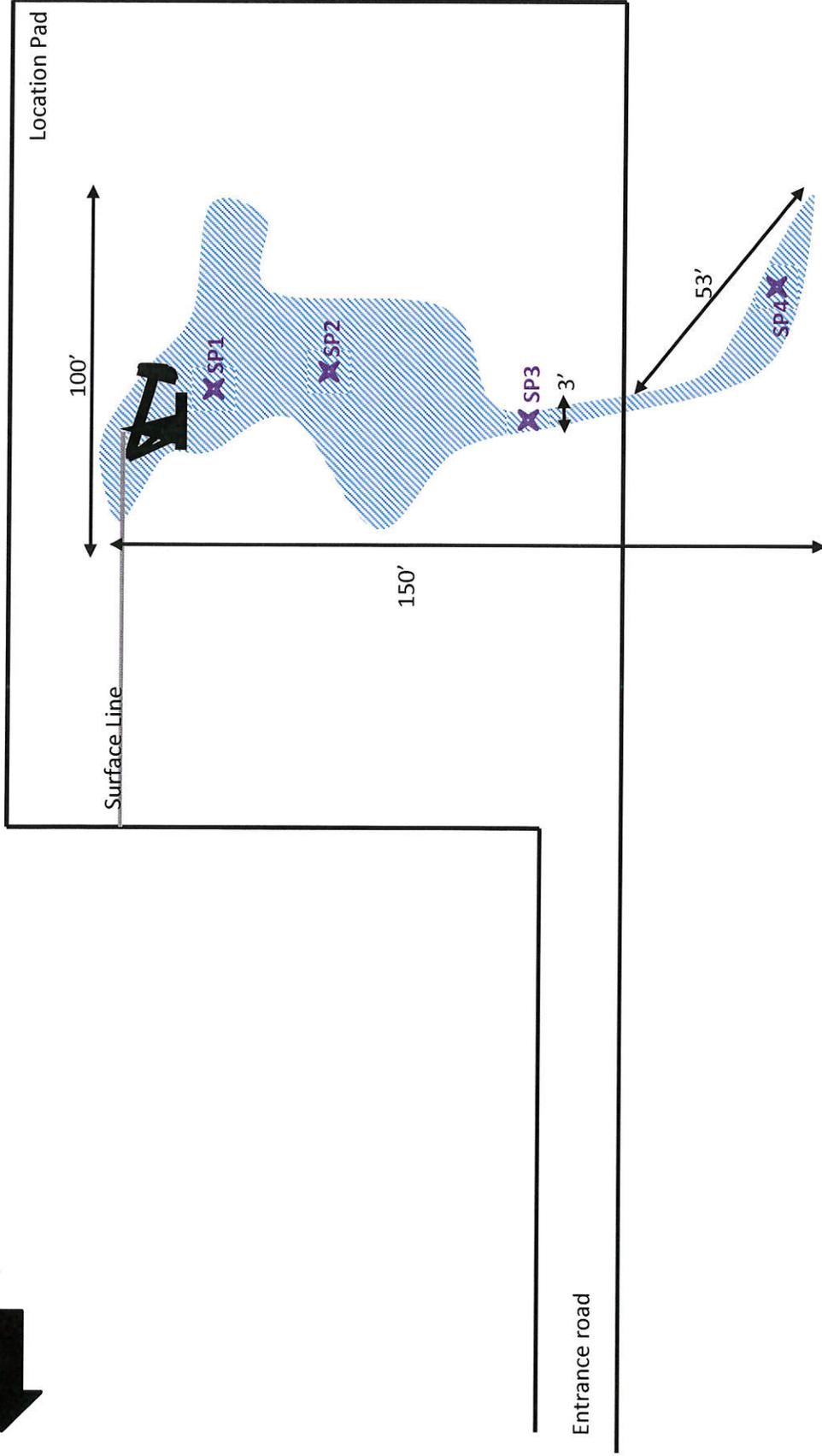
\*\*\*\*\*

N



Oxy

Federal 27 #8



U/L M, Section 27, T22S, R32E

580' FSL, 790' FWL

Lea County, NM

GPS at stake: N 32.35703° W 103.66887°

<b>BBC International, Inc.</b>	
<b>Oxy</b>	
<b>Federal 27 #8</b>	
Date: 02/25/2014	DRWG by: K. Purvis
NOT TO SCALE	
File: Oxy 2014	

# Groundwater Plot

## Oxy Federal 27 #8

County  
Lea

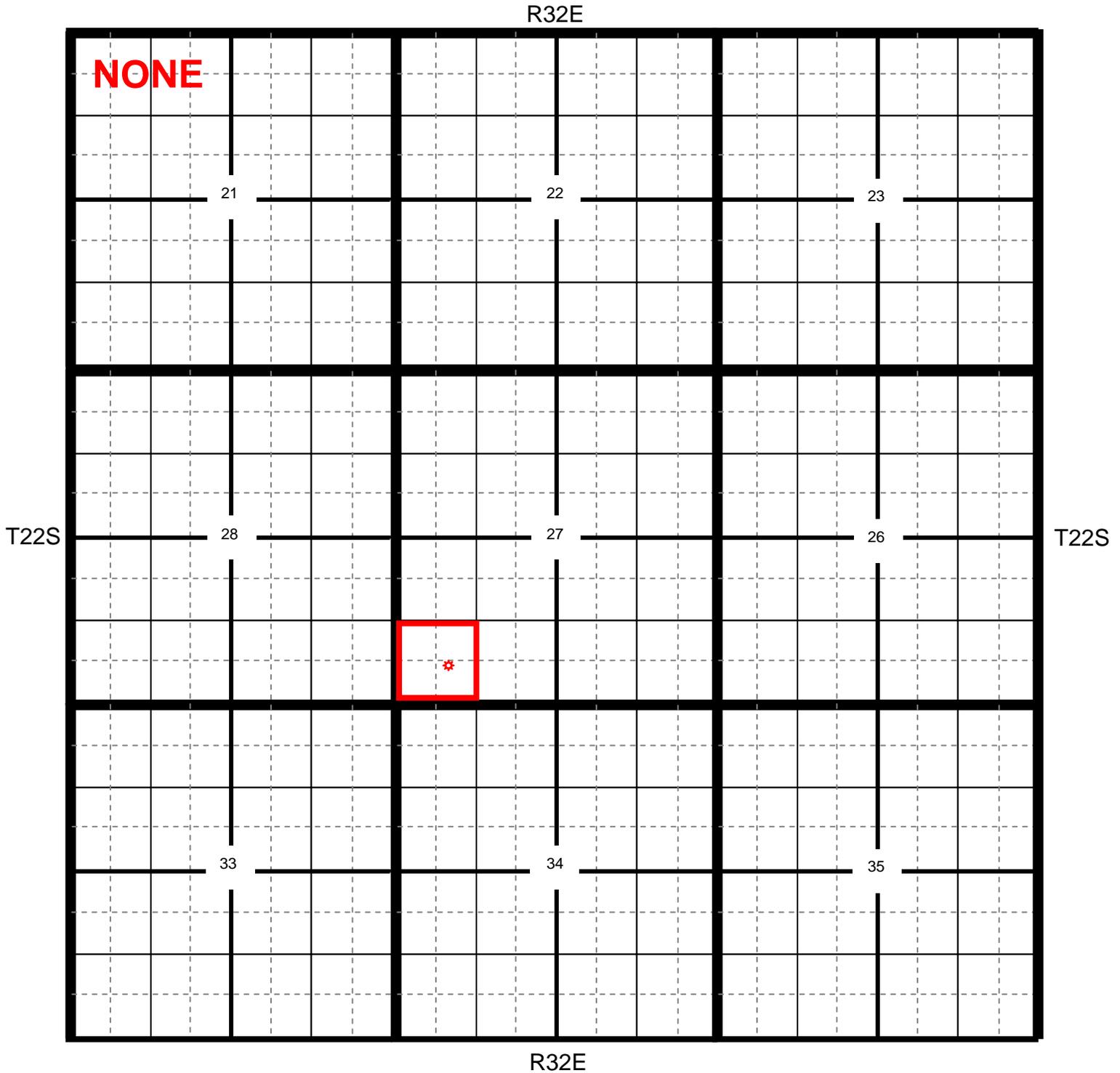
Unit Letter  
M

Section  
27

Township  
22S

Range  
32E

Trend Map 400'



⚙ Location

● OCD

● USGS

● SEO

● All Databases

## Oxy Federal 27 #8

County: Lea      Unit Letter: M      Section: 27      Township: 22S      Range: 32E

Trend Map 400'

1

2

NW/NW <b>NONE</b>	NE/NW	NW/NE	NE/NE
Unit Letter D	Unit Letter C	Unit Letter B	Unit Letter A
SW/NW	SE/NW	SW/NE	SE/NE
Unit Letter E	Unit Letter F	Unit Letter G	Unit Letter H
NW/SW	NE/SW	NW/SE	NE/SE
Unit Letter L	Unit Letter K	Unit Letter J	Unit Letter I
SW/SW 	SE/SW	SW/SE	SE/SE
Unit Letter M	Unit Letter N	Unit Letter O	Unit Letter P

3

4

**Laboratory Analytical Results Summary  
Federal 27 #8**

		Sample	SP1 @ 1'	SP1 @ 3'	SP1 @ 5'	SP1 @ 7'	SP1 @ 9'
Analyte	Method	Date	3/15/14	3/15/14	3/15/14	3/15/14	3/15/14
			mg/Kg	mg/Kg	mg/Kg	mg/Kg	mg/Kg
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	<0.150	<0.150	<0.150
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	<0.300	<0.300	<0.300
<b>Chloride</b>	SM4500CI-B		<16.0	<b>384</b>	<b>3480</b>	<b>4320</b>	<b>336</b>
<b>GRO</b>	TPH 8015M		<10.0	<10.0	<10.0	<10.0	<10.0
<b>DRO</b>	TPH 8015M		<10.0	<10.0	<10.0	<10.0	<10.0

		Sample	SP2 @ 1'	SP2 @ 3'	SP2 @ 4'
Analyte	Method	Date	3/15/14	3/15/14	3/15/14
			mg/Kg	mg/Kg	mg/Kg
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	<0.150
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	<0.300
<b>Chloride</b>	SM4500CI-B		<b>1760</b>	<b>416</b>	<b>240</b>
<b>GRO</b>	TPH 8015M		<10.0	<10.0	<10.0
<b>DRO</b>	TPH 8015M		<10.0	<10.0	<10.0

		Sample	SP3 @ 1'	SP3 @ 3'	SP3 @ 5'	SP3 @ 7'	SP3 @ 8'
Analyte	Method	Date	3/16/14	3/16/14	3/16/14	3/16/14	3/16/14
			mg/Kg	mg/Kg	mg/Kg	mg/Kg	mg/Kg
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	<0.050	<0.050	<0.050
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	<0.150	<0.150	<0.150
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	<0.300	<0.300	<0.300
<b>Chloride</b>	SM4500CI-B		<b>2600</b>	<b>1330</b>	<b>576</b>	<b>128</b>	<16.0
<b>GRO</b>	TPH 8015M		<10.0	<10.0	<10.0	<10.0	<10.0
<b>DRO</b>	TPH 8015M		<10.0	<10.0	<10.0	<10.0	<10.0

		Sample	SP4 @ 1'	SP4 @ 3'	SP4 @ 5'
Analyte	Method	Date	3/16/14	3/16/14	3/16/14
			mg/Kg	mg/Kg	mg/Kg
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	<0.050
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	<0.150
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	<0.300
<b>Chloride</b>	SM4500CI-B		<b>13100</b>	<16.0	<16.0
<b>GRO</b>	TPH 8015M		<10.0	<10.0	<10.0
<b>DRO</b>	TPH 8015M		<b>108</b>	<10.0	<10.0



March 31, 2014

Cliff Brunson

BBC International, Inc.

P.O. Box 805

Hobbs, NM 88241

RE: FEDERAL 27 #8

Enclosed are the results of analyses for samples received by the laboratory on 03/25/14 9:00.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-13-5. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (\*). For a complete list of accredited analytes and matrices visit the TCEQ website at [www.tceq.texas.gov/field/qa/lab\\_accred\\_certif.html](http://www.tceq.texas.gov/field/qa/lab_accred_certif.html).

Cardinal Laboratories is accredited through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2	Haloacetic Acids (HAA-5)
Method EPA 524.2	Total Trihalomethanes (TTHM)
Method EPA 524.4	Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

A handwritten signature in cursive script that reads "Celey D. Keene".

Celey D. Keene

Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 1' (H400872-01)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.44	122	2.00	2.62	
Toluene*	<0.050	0.050	03/28/2014	ND	2.32	116	2.00	2.19	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.26	113	2.00	1.89	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.62	110	6.00	1.24	
Total BTEX	<0.300	0.300	03/28/2014	ND					

*Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126*

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	03/27/2014	ND	416	104	400	0.00	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	190	94.9	200	2.52	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	188	93.8	200	2.38	

*Surrogate: 1-Chlorooctane 111 % 65.2-140*
*Surrogate: 1-Chlorooctadecane 114 % 63.6-154*

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\* = Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 3' (H400872-02)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.44	122	2.00	2.62	
Toluene*	<0.050	0.050	03/28/2014	ND	2.32	116	2.00	2.19	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.26	113	2.00	1.89	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.62	110	6.00	1.24	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>384</b>	16.0	03/27/2014	ND	416	104	400	0.00	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 99.6 % 65.2-140

Surrogate: 1-Chlorooctadecane 99.9 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 5' (H400872-03)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.44	122	2.00	2.62	
Toluene*	<0.050	0.050	03/28/2014	ND	2.32	116	2.00	2.19	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.26	113	2.00	1.89	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.62	110	6.00	1.24	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 108 % 89.4-126

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>3480</b>	16.0	03/27/2014	ND	416	104	400	0.00	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 76.9 % 65.2-140

Surrogate: 1-Chlorooctadecane 87.4 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 7' (H400872-04)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>4320</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 74.2 % 65.2-140

Surrogate: 1-Chlorooctadecane 83.9 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 1 @ 9' (H400872-05)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 106 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	336	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 87.3 % 65.2-140

Surrogate: 1-Chlorooctadecane 90.9 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 2 @ 1' (H400872-06)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 106 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>1760</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 87.9 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.2 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 2 @ 3' (H400872-07)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>416</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 89.3 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.6 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

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 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/15/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 2 @ 4' (H400872-08)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>240</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 85.5 % 65.2-140

Surrogate: 1-Chlorooctadecane 93.4 % 63.6-154

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\* = Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 1' (H400872-09)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 108 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>2600</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/26/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/26/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 90.4 % 65.2-140

Surrogate: 1-Chlorooctadecane 93.4 % 63.6-154

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**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 3' (H400872-10)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 108 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>1330</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 76.1 % 65.2-140

Surrogate: 1-Chlorooctadecane 87.1 % 63.6-154

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**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 5' (H400872-11)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	576	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	219	110	200	2.07	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	202	101	200	1.68	

Surrogate: 1-Chlorooctane 81.1 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.1 % 63.6-154

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**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
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 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 7' (H400872-12)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>128</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 75.9 % 65.2-140

Surrogate: 1-Chlorooctadecane 83.0 % 63.6-154

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 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 3 @ 8' (H400872-13)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 90.4 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.5 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 4 @ 1' (H400872-14)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 108 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>13100</b>	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
<b>DRO &gt;C10-C28</b>	<b>108</b>	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 91.9 % 65.2-140

Surrogate: 1-Chlorooctadecane 99.6 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 4 @ 3' (H400872-15)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 87.5 % 65.2-140

Surrogate: 1-Chlorooctadecane 92.9 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 BBC International, Inc.  
 Cliff Brunson  
 P.O. Box 805  
 Hobbs NM, 88241  
 Fax To: (575) 397-0397

Received:	03/25/2014	Sampling Date:	03/16/2014
Reported:	03/31/2014	Sampling Type:	Soil
Project Name:	FEDERAL 27 #8	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	LEA COUNTY, NM		

**Sample ID: SP 4 @ 5' (H400872-16)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	03/28/2014	ND	2.61	131	2.00	5.08	
Toluene*	<0.050	0.050	03/28/2014	ND	2.48	124	2.00	5.09	
Ethylbenzene*	<0.050	0.050	03/28/2014	ND	2.42	121	2.00	5.04	
Total Xylenes*	<0.150	0.150	03/28/2014	ND	6.94	116	6.00	5.30	
Total BTEX	<0.300	0.300	03/28/2014	ND					

Surrogate: 4-Bromofluorobenzene (PID) 107 % 89.4-126

Chloride, SM4500CI-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	03/27/2014	ND	416	104	400	3.92	

TPH 8015M		mg/kg		Analyzed By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	03/27/2014	ND	212	106	200	5.95	
DRO >C10-C28	<10.0	10.0	03/27/2014	ND	200	100	200	1.66	

Surrogate: 1-Chlorooctane 84.3 % 65.2-140

Surrogate: 1-Chlorooctadecane 91.2 % 63.6-154

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Celey D. Keene, Lab Director/Quality Manager

**Notes and Definitions**

- ND Analyte NOT DETECTED at or above the reporting limit
- RPD Relative Percent Difference
- \*\* Samples not received at proper temperature of 6°C or below.
- \*\*\* Insufficient time to reach temperature.
- Chloride by SM4500Cl-B does not require samples be received at or below 6°C  
Samples reported on an as received basis (wet) unless otherwise noted on report



---

Celey D. Keene, Lab Director/Quality Manager



**ARDINAL LABORATORIES**  
 101 East Marland, Hobbs, NM 88240  
 (505) 393-2326 FAX (505) 393-2476

**CHAIN-OF-CUSTODY AND ANALYSIS REQUEST**

**ANALYSIS REQUEST**

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**BILL TO**

Company Name: BBC International, Inc.  
 Project Manager: Cliff Brunson  
 Address: P.O. Box 805  
 City: Hobbs  
 Phone #: 575-397-6388  
 Project #: Federal 27 #8  
 Project Location: Lea County, NM  
 State: NM zip: 88241  
 Fax #: 575-397-0397  
 Project Owner: Oxy  
 Attn:  
 Address:  
 City:  
 State: Zip:  
 P.O. #:  
 Company:  
 Phone #:  
 Fax #:

FOR LAB USE ONLY  
 Sampler Name: Gary Ray

Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX						DATE	TIME	TPH	BTEX	CI
				GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :					
H400872	SP1 @ 1'		5						3/15/14	10:20 AM	✓	✓	✓	
	SP1 @ 3'		5						3/15/14	10:42 AM	✓	✓	✓	
	SP1 @ 5'		5						3/15/14	11:15 AM	✓	✓	✓	
	SP1 @ 7'		5						3/15/14	11:45 AM	✓	✓	✓	
	SP1 @ 9'		5						3/15/14	1:10 PM	✓	✓	✓	
	SP2 @ 1'		5						3/15/14	1:40 PM	✓	✓	✓	
	SP2 @ 3'		5						3/15/14	2:15 PM	✓	✓	✓	
	SP2 @ 4'		5						3/15/14	2:30 PM	✓	✓	✓	
	SP3 @ 1'		5						3/16/14	10:45 AM	✓	✓	✓	
	SP3 @ 3'		5						3/16/14	11:15 AM	✓	✓	✓	

PLEASE NOTE: Liability and Damages: Cardinal's liability and client's exclusive remedy for any claim arising whether based in contract or tort, shall be limited to the amount paid by the client for the analyses. All claims, including those for negligence and any other cause which may be deemed waived unless made in writing and received by Cardinal within 30 days after completion of the applicable service. In no event shall Cardinal be liable for incidental or consequential damages, business interruptions, loss of use, or loss of profits incurred by client, its subsidiaries, affiliates or successors arising out of or related to the performance of services provided by Cardinal, regardless of whether such claim is based upon any of the above stated reasons or otherwise.

Relinquished By: *[Signature]*  
 Date: *3/15/14*  
 Time: *1:00*  
 Received By: *[Signature]*  
 Date: *3/15/14*  
 Time: *1:20*  
 Sample Condition:  Cool  Intact  
 Delivered By: (Circle One)  UPS  Bus  Other: *1.20*  
 CHECKED BY: *[Signature]*  
 Phone Result:  Yes  No  
 Add'l Phone #: *54*  
 Add'l Fax #: *54*

† Cardinal cannot accept verbal changes. Please fax written changes to 505-393-2476



**CARDINAL LABORATORIES**

101 East Marland, Hobbs, NM 88240  
(505) 393-2326 FAX (505) 393-2476

**CHAIN-OF-CUSTODY AND ANALYSIS REQUEST**

**BILL TO**

**ANALYSIS REQUEST**

Company Name: BBC International, Inc.  
 Project Manager: Cliff Brunson  
 Address: P.O. Box 805  
 City: Hobbs  
 Phone #: 575-397-6388  
 Project #: Federal 27 #8  
 Project Name: Federal 27 #8  
 Project Location: Lea County, NM  
 Sampler Name: Gary Ray  
 P.O. #: \_\_\_\_\_  
 Company: \_\_\_\_\_  
 Attn: \_\_\_\_\_  
 Address: \_\_\_\_\_  
 City: \_\_\_\_\_  
 State: \_\_\_\_\_ Zip: \_\_\_\_\_  
 Phone #: \_\_\_\_\_  
 Fax #: \_\_\_\_\_

Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX						DATE	TIME	TPH	BTEX	CI
				GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :					
11	SP3 @ 5'	G	1			✓			3/16/14	11:39 AM	✓	✓	✓	
12	SP3 @ 7'	G	1			✓			3/16/14	12:00 PM	✓	✓	✓	
13	SP3 @ 8'	G	1			✓			3/16/14	12:15 PM	✓	✓	✓	
14	SP4 @ 1'	G	1			✓			3/16/14	1:30 PM	✓	✓	✓	
15	SP4 @ 3'	G	1			✓			3/16/14	1:48 PM	✓	✓	✓	
16	SP4 @ 5'	G	1			✓			3/16/14	2:15 PM	✓	✓	✓	

FOR LAB USE ONLY

Relinquished By: *[Signature]* Date: 3/16/14 Time: 5:00 PM  
 Received By: \_\_\_\_\_ Date: 7:10 AM Time: 1:20 PM

Delivered By: (Circle One) UPS - Bus - Other: \_\_\_\_\_  
 Sample Condition: Cool  Intact   
 Yes  No  Yes  No

REMARKS: \_\_\_\_\_

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	Oxy USA Inc.	Contact	Austin Tramell
Address	1017 W. Stanolind Rd, Hobbs, NM	Telephone No.	(575) 397-8210
Facility Name	Federal 27 #8	Facility Type	Well
Surface Owner	BLM	Mineral Owner	
		Lease No.	30-025-32755

**LOCATION OF RELEASE**

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
M	27	22S	32E	580'	South	790'	West	Lea

Latitude N 32.35681° Longitude W 103.6680°

**NATURE OF RELEASE**

Type of Release	Produced Water	Volume of Release	15 bbls	Volume Recovered	0 bbls
Source of Release	Stuffing box leak on well head	Date and Hour of Occurrence	02/18/2014	Date and Hour of Discovery	
Was Immediate Notice Given?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Not Required	If YES, To Whom?	Goeffrey Leking- NMOCD, Jennifer Van Curen- BLM		
By Whom?	Kathy Purvis, BBC International	Date and Hour	02/18/2014 @ 3:20 pm		
Was a Watercourse Reached?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If YES, Volume Impacting the Watercourse.			

If a Watercourse was Impacted, Describe Fully.\*

Describe Cause of Problem and Remedial Action Taken.\*  
The stuffing box on the well head leaked 15 bbls of produced water onto the ground. No fluids were recovered and the stuffing box was repaired.

Describe Area Affected and Cleanup Action Taken.\*  
The affected area was approximately 20' x 60' on the location pad and 2' x 15' off the location pad. Remediation will be completed in accordance with a plan approved by both the NMOCD and the BLM.

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:	<u>OIL CONSERVATION DIVISION</u>		
Printed Name: Austin Tramell	Approved by District Supervisor:		
Title: HES Coordinator	Approval Date:	Expiration Date:	
E-mail Address: Austin.Tramell@oxy.com	Conditions of Approval:		Attached <input type="checkbox"/>
Date: 2/19/14	Phone: (575) 397-8210		

\* Attach Additional Sheets If Necessary