

Hornsby 35 Fed 2-3 Battery

CLOSURE REPORT

Release Date: 7/26/2015

UL/E Sec 35, T26 south, R27 east, Eddy county NM

API # 30-015-42208

February 11, 2016

Prepared by:

Lance Crenshaw, Project Manager Environmental Department Diversified Field Service, Inc. 206 West Snyder Hobbs, NM 88240 Phone: (575)964-8394

Fax: (575)393-8396

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Hornsby 35 Fed 2-3 Battery

1 Introduction

Cimarex Energy has retained Diversified Field Service, Inc. (DFSI) to address environmental issues for the site detailed herein.

The site is located southeast of Whites City, NM, in Eddy County. The leak site resulted from a 4" flowline failure. The impacted area is inside of the lined battery and on the location pad just outside of the containment. Approximately 59 bbls of produced water was released, with 45 bbls inside the lined containment and 14 bbls on the pad. All fluids inside the lined containment were recovered; 10 bbls were recovered on the pad. A C-141 was submitted to the NMOCD on July 27, 2015. The C-141 is attached.

2 SITE ACTIVITIES

On September 17, 2015, DFSI personnel did a site assessment and mapped the spill location. On September 22, 2015, DFSI personnel returned to the location to begin soil sampling. Six sample points were delineated vertically. Each sample was tested for chloride levels as well as BTEX. The BTEX samples were performed using a Mini Rae Photoionization Detector (PID). The clean field samples were taken to a lab for confirmation. The results are attached.

DFSI personnel returned to the location on February 2, 2016, to begin excavation. In the areas of SP1-SP3, 2' of contaminated soil was removed. In the areas of SP4-SP6, 1' of contaminated soil was removed. All contaminated material was hauled to an approved NM state disposal. Fresh caliche was then brought in for backfill, and the location was returned to its previous state. Photos of the work being done can be viewed in Appendix II.

3 Conclusion

DFSI, on behalf of Cimarex, respectfully requests the closure of the regulatory file for the site.

Appendix I

INITIAL FORM C-141

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

State of New Mexico Energy Minerals and Natural Resources

Form C-141
Revised August 8, 2011

Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, NM 87505 Submit 1 Copy to appropriate District Office in accordance with 19.15.29 NMAC.

			Rele	ase Notific	ation	and Co	rrective A	ction				10 mg - 1 grant - 1 mg
						OPERA'	ГOR			al Report		Final Report
Name of Co							ristine Alderma					
Address 60				d TX			lo. 432-853-70	59				
Facility Nar	ne Horns	by 35 Fed 3	H			Facility Typ	e production					
Surface Ow	ner Feder	al		Mineral C	wner				API No	. 30-015	-4220	8
				LOCA	TIOI	OF REI	LEASE					
Unit Letter	Section	Township	Range	Feet from the		South Line	Feet from the	East/W	est Line	County		
E	35	26S	27E	210		S	1310		W	Eddy		
				Latitude 32.00	05684	Longitude	-104.1651154					
				_	_	OF REL		_				
Type of Relea	ase Produc	ed water				Volume of	Release 59 bbls			Recovered 5		
Source of Rel	lease 4" po	ly flow line				Date and H 7/26/15	our of Occurrenc	e	Date and 1 7/26/15	Hour of Dis	covery	'
Was Immedia	ite Notice (Yes [No □ Not Re	quired	If YES, To Mike Brate	Whom? her/Shelly Tucke	r				
By Whom?	Christine A	Iderman				Date and H	our 7/27	/15 1:3	3 pm			
Was a Watero		hed?	🛌			If YES, Vo	lume Impacting t	he Wate	rcourse.			
•			Yes 🛚									
If a Watercou	rse was Im	pacted, Descri	be Fully.*	*								•
NA												
containment a	ured due to and 10 bbls	pressure. 45 were recovered	bbls were ed.	contained within	a lined	containment a	and were recovere	ed. 14 b	bls were or	location pa	ad just	outside of
Describe Area Environmenta	a Affected and consulting	and Cleanup A g company (D	Action Tak Piversified	en.*) will be on locati	on to sa	mple and dev	elop work plan,					
regulations al public health should their o	l operators or the envir perations h unent. In a	are required to conment. The ave failed to a ddition, NMC	o report an acceptance dequately CD accep	is true and comp nd/or file certain r te of a C-141 repo investigate and r tance of a C-141	elease northernorth	otifications a NMOCD m contaminati	nd perform correct arked as "Final Ro on that pose a thro	tive acti eport" de eat to gre	ons for rele oes not reli ound water	eases which eve the ope surface wa	may e rator o iter, hu	ndanger f liability ıman health
Signature:	mote	no Al	der	nan			OIL CONS			DIVISIO	<u>)N</u>	
Printed Name	: Christine	Alderman				Approved by	Environmental S ₁	pecialist	:			
Title: ESH S	upervisor					Approval Dat	e:	}	Expiration 1	Date:		
E-mail Addre	ss: caldern	nan@cimarex	com			Conditions of	Approval:			Attached		

7/30/15

Phone: 432-853-7059

^{*} Attach Additional Sheets If Necessary

Appendix II

SITE PHOTOS



Hornsby 35 Fed 2-3H

PHOTO PAGE



Spill area behind tank battery



Spill area behind tank battery



Spill area with sample point

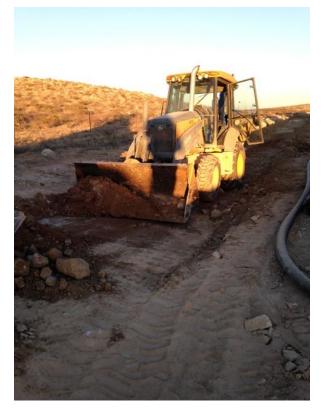


Spill area behind battery





Excavating spill area behind battery



Excavating spill area behind battery



Spill area fully excavated



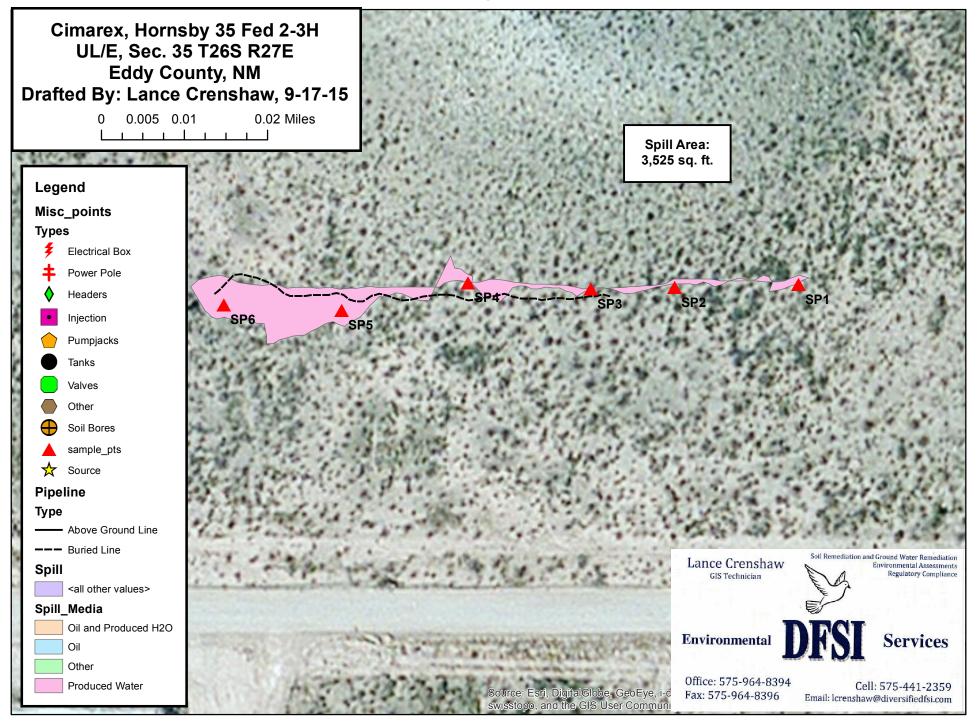


Spill area fully excavated and backfilled with fresh caliche, site completed

Appendix III

SITE MAP

Site Diagram



Appendix IV

LABORATORY ANALYSES

Diversified Environmental Services

Company Name:CimarexSP Date:9/22/2015Location Name:Hornsby 35 Fed 2-3HRel Date:

SP1	CHL	PID	SP2	CHL	PID	SP3	CHL	PID	SP4	CHL	PID	SP5	CHL	PID
Surface	1,200	16.9	Surface	250	17.3	Surface	225	0.3	Surface	500	2.5	Surface	1,050	0.5
1'	1,475	12.3	1'	1,000	104.2	1'	2,749	0.2	1'	100	0.6	1'	575	0
2'	200	5.6	2'	425	16	2'	350	0.2						
2'	288		2'	592		2'	480		1'	96		1'	800	

Lab Confirmation Sample
Field Sampling
Needs Delineation and confirmation samples

SP6	CHL	PID	SP7	CHL	PID	SP8	CHL	PID	SP9	CHL	PID	SP10	CHL	PID
Surface	2,674	16.8												
1'	250	505.3												
1'	272													
									ļ <u>L</u>					
									ļ L					
									ļ <u>L</u>					

Lab Confirmation Sample
Field Sampling
Needs Delineation and confirmation samples



September 29, 2015

KENNETH BROWNTREE
CIMAREX ENERGY CO.-MIDLAND
600 N. MARIENFELD ST, SUITE 600
MIDLAND, TX 79701

RE: HORNSBY 25 FED #3H

Enclosed are the results of analyses for samples received by the laboratory on 09/23/15 8:50.

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/ga/lab accred certif.html.

Cardinal Laboratories is accreditated 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.

Celey D. Keine

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,

Celey D. Keene

Lab Director/Quality Manager



CIMAREX ENERGY CO.-MIDLAND KENNETH BROWNTREE 600 N. MARIENFELD ST, SUITE 600 MIDLAND TX, 79701

Fax To: **UNK-NOWN**

Received: 09/23/2015 Sampling Date: 09/22/2015

Reported: 09/29/2015 Sampling Type: Soil

Project Name: HORNSBY 25 FED #3H Sampling Condition: Cool & Intact Project Number: NONE GIVEN Sample Received By: Jodi Henson

Project Location: NOT GIVEN

Sample ID: SAMPLE PT. 1 @ 2' (H502512-01)

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	09/26/2015	ND	2.18	109	2.00	1.81	
Toluene*	<0.050	0.050	09/26/2015	ND	1.89	94.6	2.00	0.837	
Ethylbenzene*	<0.050	0.050	09/26/2015	ND	1.80	90.0	2.00	1.03	
Total Xylenes*	<0.150	0.150	09/26/2015	ND	5.76	96.1	6.00	0.741	
Total BTEX	<0.300	0.300	09/26/2015	ND					
Surrogate: 4-Bromofluorobenzene (PID	108 9	% 85.6-13	7						
Chloride, SM4500CI-B	mg/kg		Analyze	d By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	288	16.0	09/25/2015	ND	416	104	400	0.00	
TPH 8015M	mg/	kg	Analyze	d By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	09/24/2015	ND	162	80.9	200	1.42	
DRO >C10-C28	148	10.0	09/24/2015	ND	173	86.3	200	0.855	
Surrogate: 1-Chlorooctane	73.1	% 47.2-15	7						
Surrogate: 1-Chlorooctadecane	83.9	% 52.1-17	'6						

Surrogate: 1-Chlorooctadecane

Cardinal Laboratories *=Accredited Analyte

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CIMAREX ENERGY CO.-MIDLAND KENNETH BROWNTREE 600 N. MARIENFELD ST, SUITE 600 MIDLAND TX, 79701

Fax To: **UNK-NOWN**

Received: 09/23/2015 Sampling Date: 09/22/2015

Reported: 09/29/2015 Sampling Type: Soil

Project Name: HORNSBY 25 FED #3H Sampling Condition: Cool & Intact Sample Received By: Project Number: NONE GIVEN Jodi Henson

Project Location: **NOT GIVEN**

Sample ID: SAMPLE PT. 2 @ 2' (H502512-02)

BTEX 8021B	mg,	/kg	Analyze	d By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	09/26/2015	ND	2.18	109	2.00	1.81	
Toluene*	<0.050	0.050	09/26/2015 ND		1.89	94.6	2.00	0.837	
Ethylbenzene*	<0.050	0.050	09/26/2015	ND	1.80	90.0	2.00	1.03	
Total Xylenes*	<0.150	0.150	09/26/2015	ND	5.76	96.1	6.00	0.741	
Total BTEX	<0.300	0.300	09/26/2015	ND					
Surrogate: 4-Bromofluorobenzene (PID	107	% 85.6-13	7						
Chloride, SM4500Cl-B	mg/kg		Analyzed By: CK						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	592	16.0	09/25/2015	ND	416	104	400	0.00	
TPH 8015M	mg,	/kg	Analyze	d By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	09/24/2015	ND	162	80.9	200	1.42	
DRO >C10-C28	23.7	10.0	09/24/2015	ND	173	86.3	200	0.855	
Surrogate: 1-Chlorooctane	67.0	% 47.2-15	7						
Surrogate: 1-Chlorooctadecane	73.8	% 52 1-17	6						

Surrogate: 1-Chlorooctadecane 73.8 % 52.1-176

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CIMAREX ENERGY CO.-MIDLAND KENNETH BROWNTREE 600 N. MARIENFELD ST, SUITE 600 MIDLAND TX, 79701

MIDLAND 1X, 79701
Fax To: UNK-NOWN

Received: 09/23/2015 Sampling Date: 09/22/2015

Reported: 09/29/2015 Sampling Type: Soil

Project Name: HORNSBY 25 FED #3H Sampling Condition: Cool & Intact
Project Number: NONE GIVEN Sample Received By: Jodi Henson

Project Location: NOT GIVEN

Sample ID: SAMPLE PT. 3 @ 2' (H502512-03)

BTEX 8021B	mg/kg		Analyze	d By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	09/26/2015	ND	2.18	109	2.00	1.81	
Toluene*	<0.050	0.050	09/26/2015	ND	1.89	94.6	2.00	0.837	
Ethylbenzene*	<0.050	0.050	09/26/2015	ND	1.80	90.0	2.00	1.03	
Total Xylenes*	<0.150	0.150	09/26/2015	ND	5.76	96.1	6.00	0.741	
Total BTEX	<0.300	0.300	09/26/2015	ND					
Surrogate: 4-Bromofluorobenzene (PID	107 9	% 85.6-13	7						
Chloride, SM4500Cl-B	mg/kg		Analyze	d By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	480	16.0	09/25/2015	ND	416	104	400	0.00	
TPH 8015M	mg/	kg	Analyze	d By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	09/25/2015	ND	162	80.9	200	1.42	
DRO >C10-C28	45.3	10.0	09/25/2015	ND	173	86.3	200	0.855	
Surrogate: 1-Chlorooctane	66.9	% 47.2-15	7						
Surrogate: 1-Chlorooctadecane	74.2	% 52.1-17	6						

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CIMAREX ENERGY CO.-MIDLAND
KENNETH BROWNTREE
600 N. MARIENFELD ST, SUITE 600
MIDLAND TY, 79701

MIDLAND TX, 79701 Fax To: UNK-NOWN

Received: 09/23/2015 Sampling Date: 09/22/2015

Reported: 09/29/2015 Sampling Type: Soil

Project Name: HORNSBY 25 FED #3H Sampling Condition: Cool & Intact
Project Number: NONE GIVEN Sample Received By: Jodi Henson

Project Location: NOT GIVEN

Sample ID: SAMPLE PT. 4 @ 1' (H502512-04)

BTEX 8021B	mg/kg		Analyze	d By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	09/26/2015	ND	2.18	109	2.00	1.81	
Toluene*	< 0.050	0.050	09/26/2015	ND	1.89	94.6	2.00	0.837	
Ethylbenzene*	< 0.050	0.050	09/26/2015	ND	1.80	90.0	2.00	1.03	
Total Xylenes*	<0.150	0.150	09/26/2015	ND	5.76	96.1	6.00	0.741	
Total BTEX	<0.300	0.300	09/26/2015	ND					
Surrogate: 4-Bromofluorobenzene (PID	107 9	% 85.6-13	7						
Chloride, SM4500Cl-B	mg/kg		Analyze	d By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	96.0	16.0	09/25/2015	ND	416	104	400	0.00	
TPH 8015M	mg/	kg	Analyze	d By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	09/25/2015	ND	162	80.9	200	1.42	
DRO >C10-C28	<10.0	10.0	09/25/2015	ND	173	86.3	200	0.855	
Surrogate: 1-Chlorooctane	78.9	% 47.2-15	7						
Surrogate: 1-Chlorooctadecane	79.3	% 52.1-17	6						

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CIMAREX ENERGY CO.-MIDLAND KENNETH BROWNTREE 600 N. MARIENFELD ST, SUITE 600 MIDLAND TX, 79701

Fax To: **UNK-NOWN**

Received: 09/23/2015 Sampling Date: 09/22/2015

Reported: 09/29/2015 Sampling Type: Soil

Project Name: HORNSBY 25 FED #3H Sampling Condition: Cool & Intact Sample Received By: Project Number: NONE GIVEN Jodi Henson

Project Location: **NOT GIVEN**

Sample ID: SAMPLE PT. 5 @ 1' (H502512-05)

BTEX 8021B	mg/	kg	Analyze	ed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	09/26/2015	ND	2.18	109	2.00	1.81	
Toluene*	<0.050	0.050	09/26/2015	ND	1.89	94.6	2.00	0.837	
Ethylbenzene*	<0.050	0.050	09/26/2015	ND	1.80	90.0	2.00	1.03	
Total Xylenes*	<0.150	0.150	09/26/2015	ND	5.76	96.1	6.00	0.741	
Total BTEX	<0.300	0.300	09/26/2015	ND					
Surrogate: 4-Bromofluorobenzene (PID	106 %	% 85.6-13	7						
Chloride, SM4500CI-B	mg/kg		Analyzed By: CK						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	800	16.0	09/25/2015	ND	416	104	400	0.00	
TPH 8015M	mg/	'kg	Analyze	ed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	09/25/2015	ND	162	80.9	200	1.42	
DRO >C10-C28	<10.0	10.0	09/25/2015	ND	173	86.3	200	0.855	
Surrogate: 1-Chlorooctane	75.4	% 47.2-15	7						
Surrogate: 1-Chlorooctadecane	75.89	% 52 1-17	'6						

Surrogate: 1-Chlorooctadecane 75.8 % 52.1-176

Cardinal Laboratories *=Accredited Analyte

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CIMAREX ENERGY CO.-MIDLAND KENNETH BROWNTREE 600 N. MARIENFELD ST, SUITE 600 MIDLAND TX, 79701

MIDLAND TX, 79701
Fax To: UNK-NOWN

Received: 09/23/2015 Sampling Date: 09/22/2015

Reported: 09/29/2015 Sampling Type: Soil

Project Name: HORNSBY 25 FED #3H Sampling Condition: Cool & Intact
Project Number: NONE GIVEN Sample Received By: Jodi Henson

Analyzed By: MC

Project Location: NOT GIVEN

Sample ID: SAMPLE PT. 6 @ 1' (H502512-06)

RTFY 8021R

Benzene* <0.200	RIEX 8051R	тд/кд		Anaiyze	а ву: м5					
Toluene* 0.772 0.200 09/28/2015 ND 1.75 87.4 2.00 1.79 Ethylbenzene* 3.18 0.200 09/28/2015 ND 1.67 83.5 2.00 1.51 Total Xylenes* 6.51 0.600 09/28/2015 ND 5.37 89.5 6.00 1.51 Total BTEX 10.5 1.20 09/28/2015 ND ND 5.37 89.5 6.00 1.51 Surrogate: 4-Bromofluorobenzene (PID 116 % 85.6-137 Analyzed By: CK ND 4 <t< th=""><th>Analyte</th><th>Result</th><th>Reporting Limit</th><th>Analyzed</th><th>Method Blank</th><th>BS</th><th>% Recovery</th><th>True Value QC</th><th>RPD</th><th>Qualifier</th></t<>	Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Ethylbenzene* 3.18 0.200 09/28/2015 ND 1.67 83.5 2.00 1.51 Total Xylenes* 6.51 0.600 09/28/2015 ND 5.37 89.5 6.00 1.51 Total BTEX 10.5 1.20 09/28/2015 ND ND <th< td=""><td>Benzene*</td><td><0.200</td><td>0.200</td><td>09/28/2015</td><td>ND</td><td>2.04</td><td>102</td><td>2.00</td><td>2.21</td><td></td></th<>	Benzene*	<0.200	0.200	09/28/2015	ND	2.04	102	2.00	2.21	
Total Xylenes* 6.51 0.600 09/28/2015 ND 5.37 89.5 6.00 1.51 Total BTEX 10.5 1.20 09/28/2015 ND 5.37 89.5 6.00 1.51 Surrogate: 4-Bromofluorobenzene (PID 116 % 85.6-137 85.6-137 ND 416 104 400 Quality Chloride, SM4500Cl-B mg/kg Analyzed Method Blank BS % Recovery True Value QC RPD Quality Chloride 272 16.0 09/25/2015 ND 416 104 400 0.00 TPH 8015M mg/kg Analyzed By: MS Method Blank BS % Recovery True Value QC RPD Quality GRO C6-C10 352 10.0 09/25/2015 ND 162 80.9 200 1.42 DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	Toluene*	0.772	0.200	09/28/2015	ND	1.75	87.4	2.00	1.79	
Total BTEX 10.5 1.20 09/28/2015 ND Surrogate: 4-Bromofluorobenzene (PID 116 % 85.6-137 Chloride, SM4500Cl-B mg/kg Analyzed By: CK Analyte Result Reporting Limit Analyzed By: MS Chloride 272 16.0 09/25/2015 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 Quality GRO C6-C10 352 10.0 09/25/2015 ND 162 80.9 200 1.42 DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	Ethylbenzene*	3.18	0.200	09/28/2015	ND	1.67	83.5	2.00	1.51	
Surrogate: 4-Bromofluorobenzene (PID 116 % 85.6-137 Chloride, SM4500Cl-B mg/kg Analyzed By: CK Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Quality Quality Chloride 272 16.0 09/25/2015 ND 416 104 400 0.00 400 0.00 TPH 8015M mg/kg Analyzed By: MS Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Quality Quality GRO C6-C10 352 10.0 09/25/2015 ND 162 80.9 200 1.42 200 1.42 DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	Total Xylenes*	6.51	0.600	09/28/2015	ND	5.37	89.5	6.00	1.51	
Chloride, SM4500Cl-B mg / kg Analyzed By: CK Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualified Qualified Chloride 272 16.0 09/25/2015 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 Qualified Qualified GRO C6-C10 352 10.0 09/25/2015 ND 162 80.9 200 1.42 80.9 200 1.42 DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	Total BTEX	10.5	1.20	09/28/2015	ND					
Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Quality Chloride 272 16.0 09/25/2015 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 Quality GRO C6-C10 352 10.0 09/25/2015 ND 162 80.9 200 1.42 DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	Surrogate: 4-Bromofluorobenzene (PID	116	% 85.6-13	7						
Chloride 272 16.0 09/25/2015 ND 416 104 400 0.00 TPH 8015M mg/kg Analyzed By: MS Analyte Result Reporting Limit Analyzed By: MS Method Blank BS % Recovery True Value QC RPD Quality GRO C6-C10 352 10.0 09/25/2015 ND 162 80.9 200 1.42 DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	Chloride, SM4500Cl-B	mg,	/kg	Analyze	ed By: CK					
TPH 8015M mg/kg Analyzed By: MS Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Quality GRO C6-C10 352 10.0 09/25/2015 ND 162 80.9 200 1.42 DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Quality GRO C6-C10 352 10.0 09/25/2015 ND 162 80.9 200 1.42 DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	Chloride	272	16.0	09/25/2015	ND	416	104	400	0.00	
GRO C6-C10 352 10.0 09/25/2015 ND 162 80.9 200 1.42 DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	TPH 8015M	mg,	/kg	Analyze	ed By: MS					
DRO >C10-C28 3240 10.0 09/25/2015 ND 173 86.3 200 0.855	Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<u> </u>	GRO C6-C10	352	10.0	09/25/2015	ND	162	80.9	200	1.42	
Surrogate: 1-Chlorooctane 109 % 47.2-157	DRO >C10-C28	3240	10.0	09/25/2015	ND	173	86.3	200	0.855	
	Surrogate: 1-Chlorooctane	109	% 47.2-15	7						

Surrogate: 1-Chlorooctadecane 99.8 % 52.1-176

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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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CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

101 East Marland, Hobbs, NM 88240 (575) 393-2326 FAX (575) 393-2476

Company Name: 11.			
^*		BILL TO	ANALYSIS REQUEST
11160	renneth Brownfree	P.O. #:	
	State: 7:	Company: Charex	
Phone #:	Fax #:	Aun: For	
Project #: Pi	t Owner:	Address:	
Project Name: Chmanex			
1 25 t	1+2+	State: Zip:	
wis the se	× +5 T	Phone #:	
1		Fax #:	
	MATRIX	PRESERV. SAMPLING	
Lab I.D. Sample I.D.		BASE:	Н
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5 Sample Point 4		X 4050:1	××××××××××××××××××××××××××××××××××××××
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PLEASE NOTE: Liability and Damages. Cardinal's liability and client's exclusive remedy for any claim arising whether beauty	sike remedy for any claim areing whether years		
service. In no event shall Cardinal be liable for includental or consequential damages, including without limitation, business interruptions, loss of use, or loss of profits incurred by client, business interruptions, loss of use, or loss of profits incurred by client, its subsidiaries, Relinquished By: Date: Date:	alsoever shall be deemed waived unless made in writing and reo amages, including without limitation, business interruptione, loss is hereunder by Cardinal regardless of whether such daim is bare.	e in writing and received by Cardinal within 30 days after completion of the applicable interruptions, loss of use, or loss of profits incurred by client, its subsidiaries, set such daim is based upon any of the above stated reasons or otherwise.	8
1/23	305	Phone Result: Fax Result: REMARKS:	☐ Yes ☐ No Add'I Phone #:
reinquished By: Date: Time:	Received By:	/	malves a
Delivered By: (Circle One) Sampler - UPS - Bus - Other:	Sample Condition Cool Intact	CHECKED BY:	monterson @
+ Cardinal cannot cannot		CA	cflores @



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

No records found.

Basin/County Search:

County: Eddy

PLSS Search:

Section(s): 35, 36, 26, 25 **Township:** 26S **Range:** 27E



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

No records found.

Basin/County Search:

County: Eddy

PLSS Search:

Section(s): 30, 31, 29, 32 Township: 26S Range: 28E

Appendix V

FINAL C-141

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

Form C-141 Revised October 10, 2003

Submit 2 Copies to appropriate District Office in accordance with Rule 116 on back side of form 1220 South St. Francis Dr. Santa Fe, NM 87505

			Rele	ease Notific	cation	and Co	rrective A	ction	
						OPERA T	ľOR	☐ Initia	l Report x Final Report
Name of Co						Contact Cl	ristine Alderman		
Address 60			lland TX		-	Felephone N	Jo. 432-853-705	9	
Facility Nar	ne Horns	sby 35 Fed 3H			I	Facility Typ	e Production		
Surface Ow	ner Fede	ral		Mineral ()wner			Lease N	0, 30-015-42208
				LOCA	ATION	OF REI	LEASE		
Unit Letter	Section	Township	Range	Feet from the		South Line	Feet from the	East/West Line	County
Е	35	26S	27E	210	S		1310	W	Eddy
l	L		La	titude 32.000568	84	Longitud	e -104.1651154		
				NAT	URE	OF RELI	EASE		
Type of Rele		iced Water	•			Volume of			
Source of Re					••••		lour of Occurrenc	e7/26/15 Date and l	Hour of Discovery 7/26/15
Was Immedia	ate Notice (Yes [] No ☐ Not Re	havirad	If YES, To			
D 37/10	Ol : ::		163 _	I NO LI NOLKO	equired		ther/Shelly Tucker		
By Whom? Was a Water		Alderman					our 7/27/15 1:33 lume Impacting t		
,, as a ,, acor	course reca		Yes x] No		11 120, 10	rame impacting i	ne watercourse.	
If a Watercou	iree was Im	nacted Descr	ibe Fully	*					
li a watereot	nse was an	pacted, Desci	ioe i uny.						
Describe Cau	se of Probl	em and Reme	dial Actio	n Taken.*					
Poly line rupt	tured due to				ed contai	nment and we	re recovered. 14 bb	ols were on location p	oad just outside of containment and
10 bbls were i	recovered.								
Describe Are	a Affected	and Cleanup A	Action Tal	cen.* Diversified E	nvironme	ental sampled	the spill area and d	eveloped a work plan	n. The areas of SP1-SP3 were
excavated to 2'	BGS; the ar	eas of SP4-SP6	were excav	rated to 1' BGS. All	contamin	ated material	was hauled to an ap	oproved NM state dis	sposal. Fresh caliche was brought
in for backfill.	The location	was returned	to its previ	ous state.					f
I hereby certi	fy that the	nformation gi	ven above	e is true and comp	lete to th	e best of my	knowledge and u	nderstand that purs	uant to NMOCD rules and
regulations al	l operators	are required t	o report a	nd/or file certain r	elease no	otifications ar	nd perform correc	tive actions for rele	eases which may endanger
should their o	or the envi	ronment. The	acceptan	ce of a C-141 repo	ort by the	: NMOCD m	arked as "Final K	eport" does not reli	eve the operator of liability , surface water, human health
	-				_				ompliance with any other
federal, state,									•
							OIL CON	<u>SERVATION</u>	DIVISION
Signature:									
Ĭ.	Gl · · ·	411				Approved by	District Supervis	or:	
Printed Name	: Christin	e Alderman		2011					
Title: ESH	Supervisor					Approval Dat	e:	Expiration 1	Date:
	calder	man@cimarex.	com	P P P P P P P P P P P P P P P P P P P		•			
E-mail Addre	SS: Calder	manwellilaiex.			(Conditions of	Approval:		Attached
Date: 2/11/	16		Phone	432-853-7059					

^{*} Attach Additional Sheets If Necessary