

RECEIVED By JKeyes at 8:34 am, Jul 25, 2016



CONOCOPHILLIPS

P.O. Box 2197 Houston, TX 77252-2197 Phone 281.293.1000

MCA Battery #4

Corrective Action Plan

API No. 30-025-0058300

Release Date: August 22nd, 2015

Unit Letter A, Section 26, Township 17S, Range 32E



PO Box 2948 | Hobbs, NM 88241 | Phone 575.393.2967

July 19th, 2016

Jamie Keyes Environmental Specialist – New Mexico Oil Conservation Division Energy, Minerals and Natural Resources Department 1625 N. French Dr. Hobbs, NM 88240

> RE: Corrective Action Plan ConocoPhillips MCA Battery #4 (1RP-3822) UL/A sec. 26 T17S R32E API No. 30-025-0058300

Mr. Keyes:

ConocoPhillips (CoP) has retained Basin Environmental Service Technologies to address potential environmental concerns at the above-referenced site.

Background and Previous Work

The site is located approximately 3.5 miles southeast of Maljamar, New Mexico The initial C-141 states that the site is located at UL/C Sec. 16 T17S R35E. However, GIS mapping shows the site to be located within UL/A Sec. 26 T17S R32E. NM OSE, BLM and Basin installed monitor well records indicate that groundwater will likely be encountered at a depth of approximately 69 +/- feet.

On August 22nd, 2015, CoP discovered a release from a transfer pump intake line. A total of 6.1 produced water was released over 4,790 sq ft of caliche pad and pasture land. 1 barrel produced water was recovered. BLM and NMOCD were notified of the release on August 22nd, 2015, and an initial C-141 was submitted to both parties the same day. NMOCD approved the initial C-141 on August 28th, 2015 (Appendix A).

Basin personnel were on site to assess the release August 25th, 2015. The release was mapped and photographed (Figure 1). On June 8th, 2016 Field samples were collected at surface. On July 11th, 2016, 4 verticals were installed samples were taken with depth and representative samples were sent to a commercial laboratory for analysis (Appendix B). Laboratory analysis of Point 1 at 6" returned a chloride value of 48 mg/kg, Gasoline Range Organics (GRO), Diesel Range Organics (DRO) and BTEX values of non-detect. Laboratory analysis of Point 2 at 6" returned a chloride reading of 32 mg/kg, Gasoline Range Organics (GRO), Diesel Range Organics (DRO) and BTEX values of non-detect. Laboratory analysis of Point 3 at 3" returned a chloride value of 32 mg/kg, Gasoline Range Organics (GRO), Diesel Range Organics (DRO) and BTEX values of non-detect. Laboratory analysis of Point 4 at 6" returned a chloride value of 32 mg/kg, Gasoline Range Organics (GRO), Diesel Range Organics (DRO) and BTEX values of non-detect.

Photo Documentation of these activities may be found in Appendix C.

Corrective Action Plan

Based on the assessment, the release area around point 1,2 &4 will be excavated to a depth of 6 inches bgs. The release area around point 3 will be excavated to a depth of 3 feet bgs. Once all excavations are complete, discreet wall samples from all excavations will be collected and field tested for chlorides and organic vapors. If the field data indicates that the wall samples will not achieve chloride, Gasoline Range Organics (GRO), Diesel Range Organics (DRO) and BTEX readings below regulatory standards, the walls of the excavation will be extended until field testing indicates that all constituents from the wall samples will return values below regulatory standards. The samples will then be taken to a commercial laboratory to confirm that all constituents return readings are below regulatory standards.

There are buried and surface lines running throughout the release. To provide for the safety of people and equipment at the site, the excavation will remain 3 to 5 ft away from the buried and surface lines.

All excavated soil will be taken to a NMOCD approved facility for disposal. Clean soil will be imported to the site to serve as backfill. A sample of the backfill soil will be taken to a commercial laboratory to confirm that the chloride reading is below regulatory standards. The lease pad will be backfilled with clean, imported caliche and the pasture will be backfilled with clean, imported to the surrounding location.

Revegetation of the site will be performed as follows:

Disturbed areas associated with the remediation efforts will be reseeded. If after one growing season the vegetation has not taken hold, seeding may need to be repeated until revegetation is successful. The seed will be spread using a hand-held broadcaster and the area raked or dragged to cover the seed. Because the seed will be broadcast, the pounds per acre will be doubled. BLM #2 seed mix will be used.

The seed mixture will be planted in the amounts specified in pounds of pure live seed (PLS) per acre. Commercially sold seed will be either certified or registered. The area will be seeded following backfilling of the excavated area.

The site will be visited on a quarterly basis to assess the establishment of vegetative growth. Staff personnel performing the site visit will also look for the presence of noxious weeds at the site. If a noxious weed is observed at the site, CoP will determine the most effective manner to eradicate it.

Once these activities have been completed, a report will be sent to NMOCD and BLM requesting 'remediation termination' and site closure.

Basin appreciates the opportunity to work with you on this project. Please contact me if you have any questions or wish to discuss the site.

Sincerely,

hyle Norma____

Kyle Norman Project Lead Basin Environmental Service Technologies (575) 942-8542

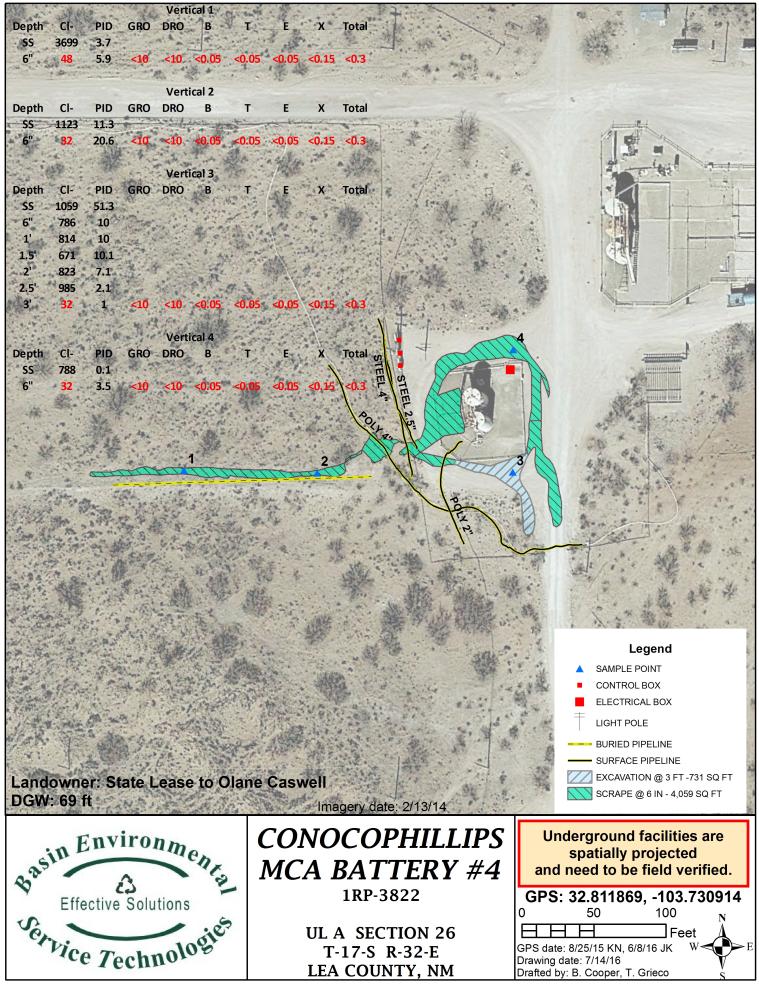
Attachments:

Figure 1 – Proposed Excavation Appendix A – Initial C-141 Appendix B – Laboratory Analysis Appendix C – Photo Documentation

Figures

Basin Environmental Service Technologies, LLC P.O. Box 2948, Hobbs, NM 88241 Phone 575.393.2967

Proposed Excavation



Appendix A Intial C-141

Basin Environmental Service Technologies, LLC P.O. Box 2948 Hobbs, NM 88241 Phone 575.393.2967

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

	RECE	VED	
fexico	Construction of the second s		

State of New Mexico Energy Minerals and Natural R By OCD District 1 at 7:36 am, Aug 28, 2015

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.

Release Notification	on and Co	orrective A	ction		
	OPERA		🛛 Init	ial Report	Final Report
Name of Company: ConocoPhillips	Contact: Ja		-		
Address: 29 Vacuum Complex Lane Facility Name: MCA Battery #4	Facility Typ	No. 575-704-245	5		
				00.005.00	
Surface Owner: NMOCD Mineral Owner	: BLM		APIN	o. 30-025-00	58300
LOCATIO		1			
Unit LetterSectionTownshipRangeFeet from theNortC1617S35E660Nort	h/South Line h	Feet from the 1980	East/West Line West	County LEA	
Latitude 32.8400459 - Longitude 103.7736511 NAD83	E OF REL	FASE			
Type of Release: Spill		Release: 6.1 BPV	W Volume	Recovered: 1 B	3PW
Source of Release: Tank Overflow	and the second second second second	Iour of Occurrence 5 8:30 am	e Date and	Hour of Disco 2015 8:30 am	overy
Was Immediate Notice Given?	If YES, To		00/22/	0.00 ui	1
By Whom? Jay Garcia		Iour: 08/22/2015 1			
Was a Watercourse Reached?	If YES, V	olume Impacting th	he Watercourse.		
If a Watercourse was Impacted, Describe Fully.*		APPRO	VED		
· · · · · · · · · · · · · · · · · · ·		THE REPORT OF THE		:36 am A	ug 28, 2015
ENV – Agency Reportable – 6.1 BPW – MCA Battery On Saturday August 22, 2015 at 0830 MDT, at MCA I a release of 6.1 bbl. of produced water with 1 bbl. of p remediated according to BLM, NMOCD and COPC gu RR: II	Battery 4, a produced w	spill occurred	d following a d. The affect	ed area will	lbe
Describe Area Affected and Cleanup Action Taken.*					
Release of 6.1 barrels produced water released and 1 barrel recover the total of produced water that was released on the ground. A mean 39'X 54'X 1" equaled 2bbls and 162'X 5'X 1" equaled .8 which recovered which a grand total of 6.1 bbls was release. On calicher remediated according to BLM, NMOCD and COPC guidelines.	a total of 5.1 e pad and pas	70'X 4"X 1" eq bbls of produced ture and was not	ualed 1.3bbls, 1 water was relea contained. The	80'X 6'X 1" ased and a tota affected area	equaled 1bbls, al of 1bbl was a will be
I hereby certify that the information given above is true and complete to regulations all operators are required to report and/or file certain release public health or the environment. The acceptance of a C-141 report by t should their operations have failed to adequately investigate and remedia or the environment. In addition, NMOCD acceptance of a C-141 report federal, state, or local laws and/or regulations.	notifications a he NMOCD m ate contaminat	nd perform correct arked as "Final Re on that pose a thre	tive actions for re port" does not re eat to ground wate	leases which m lieve the operat er, surface wate	ay endanger tor of liability r, human health
		OIL CONS	SERVATION	DIVISION	1
Signature: Jay Garcia			Λ	bu	
Printed Name: Jay Garcia	Approved by	Environmental Sp	pecialist: //am	¥ lhye	
Title: LEAD HSE	Approval Da	08/28/2015 te:	Expiration	10/28/20 Date:	D15

Conditions of Approval:

Discrete site samples required. Delineate and

Geotagged photos of remediation required.

remediate per NMOCD guidelines.

E-mail Address: jay.c.garcia@conocophillips.com

pJXK1524027278

nJXK152402711

Attached 🗌

1RP 3822

Appendix B Laboratory Analysis

Basin Environmental Service Technologies, LLC P.O. Box 2948 Hobbs, NM 88241 Phone 575.393.2967



July 19, 2016

KYLE NORMAN Basin Environmental Service P.O. Box 301 Lovington, NM 88260

RE: MCA BATTERY #4

Enclosed are the results of analyses for samples received by the laboratory on 07/12/16 15:35.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-16-8. 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.

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,

Celeg D. Keine

Celey D. Keene Lab Director/Quality Manager



Basin Environmental Service KYLE NORMAN P.O. Box 301 Lovington NM, 88260 Fax To: (575) 396-1429

Received:	07/12/2016	Sampling Date:	07/11/2016
Reported:	07/19/2016	Sampling Type:	Soil
Project Name:	MCA BATTERY #4	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	NOT GIVEN		

Sample ID: VERT 1 @ 6" (H601557-01)

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	07/12/2016	ND	1.85	92.6	2.00	2.46	
Toluene*	<0.050	0.050	07/12/2016	ND	1.96	98.1	2.00	1.84	
Ethylbenzene*	<0.050	0.050	07/12/2016	ND	1.89	94.6	2.00	2.47	
Total Xylenes*	<0.150	0.150	07/12/2016	ND	5.71	95.2	6.00	1.70	
Total BTEX	<0.300	0.300	07/12/2016	ND					
Surrogate: 4-Bromofluorobenzene (PID	99.8	% 73.6-14	0						
Chloride, SM4500Cl-B	mg/	kg	Analyze	d By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	48.0	16.0	07/13/2016	ND	400	100	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	07/12/2016	ND	161	80.3	200	0.850	
DRO >C10-C28	<10.0	10.0	07/12/2016	ND	165	82.7	200	3.31	
Surrogate: 1-Chlorooctane	83.7	% 35-147							
0	05.7	/0 55=14/							

Cardinal Laboratories

*=Accredited Analyte

Celey D. Keine

Celey D. Keene, Lab Director/Quality Manager



Basin Environmental Service KYLE NORMAN P.O. Box 301 Lovington NM, 88260 Fax To: (575) 396-1429

Received:	07/12/2016	Sampling Date:	07/11/2016
Reported:	07/19/2016	Sampling Type:	Soil
Project Name:	MCA BATTERY #4	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	NOT GIVEN		

Sample ID: VERT 2 @ 6" (H601557-02)

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	07/12/2016	ND	1.85	92.6	2.00	2.46	
Toluene*	<0.050	0.050	07/12/2016	ND	1.96	98.1	2.00	1.84	
Ethylbenzene*	<0.050	0.050	07/12/2016	ND	1.89	94.6	2.00	2.47	
Total Xylenes*	<0.150	0.150	07/12/2016	ND	5.71	95.2	6.00	1.70	
Total BTEX	<0.300	0.300	07/12/2016	ND					
Surrogate: 4-Bromofluorobenzene (PID	101 9	% 73.6-14	0						
Chloride, SM4500Cl-B	mg/	kg	Analyzed By: CK						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	32.0	16.0	07/13/2016	ND	400	100	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	07/12/2016	ND	161	80.3	200	0.850	
DRO >C10-C28	<10.0	10.0	07/12/2016	ND	165	82.7	200	3.31	
Surrogate: 1-Chlorooctane	84.8	% 35-147	,						
Surrogate: 1-Chlorooctadecane	88.5	28-171							

Cardinal Laboratories

*=Accredited Analyte

Celey D. Keine

Celey D. Keene, Lab Director/Quality Manager



Basin Environmental Service KYLE NORMAN P.O. Box 301 Lovington NM, 88260 Fax To: (575) 396-1429

Received:	07/12/2016	Sampling Date:	07/11/2016
Reported:	07/19/2016	Sampling Type:	Soil
Project Name:	MCA BATTERY #4	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	NOT GIVEN		

Sample ID: VERT 3 @ 3' (H601557-03)

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	07/12/2016	ND	1.85	92.6	2.00	2.46	
Toluene*	<0.050	0.050	07/12/2016	ND	1.96	98.1	2.00	1.84	
Ethylbenzene*	<0.050	0.050	07/12/2016	ND	1.89	94.6	2.00	2.47	
Total Xylenes*	<0.150	0.150	07/12/2016	ND	5.71	95.2	6.00	1.70	
Total BTEX	<0.300	0.300	07/12/2016	ND					
Surrogate: 4-Bromofluorobenzene (PID	101 9	73.6-14	0						
Chloride, SM4500Cl-B	mg/	kg	Analyze	d By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	32.0	16.0	07/13/2016	ND	400	100	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	07/12/2016	ND	161	80.3	200	0.850	
DRO >C10-C28	<10.0	10.0	07/12/2016	ND	165	82.7	200	3.31	
Surrogate: 1-Chlorooctane	83.7	% 35-147							
Surrogate: 1-Chlorooctadecane	86.1	% 28-171							

Cardinal Laboratories

*=Accredited Analyte

Celey D. Keine

Celey D. Keene, Lab Director/Quality Manager



Basin Environmental Service KYLE NORMAN P.O. Box 301 Lovington NM, 88260 Fax To: (575) 396-1429

Received:	07/12/2016	Sampling Date:	07/11/2016
Reported:	07/19/2016	Sampling Type:	Soil
Project Name:	MCA BATTERY #4	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	NOT GIVEN		

Sample ID: VERT 4 @ 6" (H601557-04)

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	07/12/2016	ND	1.85	92.6	2.00	2.46	
Toluene*	<0.050	0.050	07/12/2016	ND	1.96	98.1	2.00	1.84	
Ethylbenzene*	<0.050	0.050	07/12/2016	ND	1.89	94.6	2.00	2.47	
Total Xylenes*	<0.150	0.150	07/12/2016	ND	5.71	95.2	6.00	1.70	
Total BTEX	<0.300	0.300	07/12/2016	ND					
Surrogate: 4-Bromofluorobenzene (PID	101 9	73.6-14	0						
Chloride, SM4500Cl-B	mg/	kg	Analyzed By: CK						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	32.0	16.0	07/13/2016	ND	400	100	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	07/12/2016	ND	161	80.3	200	0.850	
DRO >C10-C28	<10.0	10.0	07/12/2016	ND	165	82.7	200	3.31	
Surrogate: 1-Chlorooctane	84.1	% 35-147	,						
Surrogate: 1-Chlorooctadecane	85.8	28-171							

Cardinal Laboratories

*=Accredited Analyte

Celey D. Keine

Celey D. Keene, Lab Director/Quality Manager



Notes and Definitions

S-06	The recovery of this surrogate is outside control limits due to sample dilution required from high analyte concentration and/or matrix interference's.									
QM-4X	The spike recovery was outside of QC acceptance limits for the MS and/or MSD due to analyte concentration at 4 times or greater the spike concentration. The QC batch was accepted based on LCS and/or LCSD recoveries within the acceptance limits.									
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									

Cardinal Laboratories

*=Accredited Analyte

PLEASE NOTE: Liability and Damages. Cardinal's liability and client's exclusive remedy for any daim 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 whatscever 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 whose shall be instrumed by client, its subsidiaries, affiliates or successor 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.

Celeg D. Keene

Celey D. Keene, Lab Director/Quality Manager

† Cardinal cannot accept verbal o	Delivered By: (Circle One) Sampler - UPS - Bus - Other:	Refinquished By:	atiliates of successors arising out of or related to the performance o Relinguished By:	PLEASE NOTE: Lability and Damages. Cardina's lability and dient's exclusive remedy for any claim analog whether based in contract or tort, shall be limited to the amount paid by the completion of the applicable analyses. At claims including those for negligence and any other cause whatsoever shall be deemed waived unless made in writing and received by Cardinal within 30 days after completion of the applicable analyses. At claims including those for negligence and any other cause whatsoever shall be deemed waived unless made in writing and received by Cardinal within 30 days after completion of the applicable analyses. At claims including those for negligence and any other cause whatsoever shall be deemed waived unless interruptions, loss of tarsets not be shown stand creations on otherwise.	4 ver 40 6.	5 Vert 30 5	20	6		Lab I.D. Sample I.D.		Jkan	Project Location: MCA 8Hru	Project Name:		5-393-2967		Address: 419 W Cain	Project Manager: Kyle Norman	Company Name: Concorphillins	ARDINAL LABORATORIES 101 East Marland, Hobbs, NM 88240
i i	5.20 Sample Condition	Time: 75 Received By:	Date: Received By:	rfs exclusive remedy for any claim arising whether based in coluse user whatsoever shall be deemed waived unless made in writin uental damages, including without limitation, business interrupt		9 (> U	- # 0 V	B)RAB OR (C)OMF CONTAINERS ROUNDWATER JASTEWATER OIL	MATRIX		H H		Project Owner:	Fax #: 575-393-0293	State: NM Zip: 88240			- 1	76
ges to 505-39\$12476	A Yes (Initials)	1	h claim is based upon any on one survey a survey a	contrast or tort, shall be limited to the smount paid sing and received by Cardinal within 30 days after ptions, loss of use, or loss of profils incurred by di ptions, loss of use, or loss of the shows stated rea		-	1.11-12		/ 17.11-16	CID/BASE: CID/BASE: CE / COOL DTHER :	PRESERVI SAMPLING	Fax #: 575-393-	Phone #: 575-393-2967	State: NM Zip: 88240	ŝ	Address: 419 W Cain	Attn:	Company: Basin	P.O. #:	BILL TO	2111 Beechwood, Abilene, TX 79603 (325) 673-7001 FAX (325)673-7020
		email results: knorman@basinenv.com; jkamplain@basinenv;	Phone Result: I Yes IV Add" Phone #: Fax Result: I Yes IV Add" Fax #:	1		I I Carl	1 Shi ol		9:00	Compl	C TF	Chil PH B exit	ori 80 TE as	ide 018 EX TI	es 5 M	1	nic	ons		ANALYSIS REQUEST	ANA

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Appendix C Photo Documentation

Basin Environmental Service Technologies, LLC P.O. Box 2948 Hobbs, NM 88241 Phone 575.393.2967

ConocoPhillips MCA Battery #4

Unit Letter A, Section 26, T17S, R32E



Initial Site Photo, Facing SW

8.25.15



Initial Site Photo, Facing S

8.25.16



Initial Site Photo, Facing NW



Site Photo, Facing E

6.8.16



Installing Vertical 1, Facing E

7.11.16



Installing Vertical 3, Facing NE

7.11.16