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 August 8, 2011

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

Release Notification and Corrective Action

OPERATOR

☐ Initial Report ☒ Final Report

Name of Company **ConocoPhillips Company**	Contact **Lisa Hunter**
Address **3401 East 30th St, Farmington, NM**	Telephone No. **(505) 326-9786**
Facility Name: **San Juan 29-6 Unit 31M**	Facility Type: **Gas Well**

Surface Owner **Public (Private)**	Mineral Owner **Federal**	API No. **3003927516**

LOCATION OF RELEASE

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
K	**10**	**29N**	**06W**	**2275**	**South**	**2060**	**West**	**Rio Arriba**

Latitude 36.73919 Longitude -107.45162

NATURE OF RELEASE

Type of Release **Hydrocarbon - Condensate**	Volume of Release **14 BBL**	Volume Recovered **0 BBL**
Source of Release **Production Tank**	Date and Hour of Occurrence **Unknown**	Date and Hour of Discovery **02/20/14 @ 12:20 p.m.**
Was Immediate Notice Given? ☐ Yes ☐ No ☒ Not Required	If YES, To Whom? **N/A**	
By Whom? **N/A**	Date and Hour **N/A**	
Was a Watercourse Reached? ☐ Yes ☒ No	If YES, Volume Impacting the Watercourse. **N/A**	

OIL CONS. DIV DIST. 3
JUN 20 2014

If a Watercourse was Impacted, Describe Fully.*
N/A

Describe Cause of Problem and Remedial Action Taken.*
Pinhole on bottom side of weld at bottom of production tank caused a slow release of 14 BBLs of condensate, in which 0 BBLs were recovered. Leak was stopped and product transferred.

Describe Area Affected and Cleanup Action Taken.*
ConocoPhillips will assess the soil to determine a path forward for clean-up if necessary. Third-Party Environmental assessed. Excavation was 10' x 10' x 4' Deep. 24 c/yds of soil was transported to I.E.I Land Farm and 24 c/yds of clean soil was transported from Bill Smith Ranch, and placed in the excavation site. Analytical results were below the regulatory standards – no further action required. The soil sampling report is attached for review.

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

Signature:	OIL CONSERVATION DIVISION Approved by Environmental Specialist:	
Printed Name: **Lisa Hunter**		
Title: **Field Environmental Specialist**	Approval Date: 9/8/2014	Expiration Date:
E-mail Address: **Lisa.Hunter@cop.com**	Conditions of Approval:	Attached ☐
Date: **June 19, 2014** Phone: **(505) 326-9786**		

* Attach Additional Sheets If Necessary

nJK1425732861

Animas Environmental Services, LLC
www.animasenvironmental.com
624 E. Comanche
Farmington, NM 87401
505-564-2281
Durango, Colorado
970-403-3084

May 29, 2014

Lisa Hunter
ConocoPhillips
San Juan Business Unit
Office 214-04
5525 Hwy 64
Farmington, New Mexico 87401

Via electronic mail to:
SJBUE-Team@ConocoPhillips.com

RE: Release Assessment and Final Excavation Report
San Juan 29-6 Unit 31M
Rio Arriba, New Mexico

Dear Ms. Hunter:

On February 27 and 28 and March 3, 2014, Animas Environmental Services, LLC (AES) completed a release assessment and environmental clearance of the final excavation limits at the ConocoPhillips (CoP) San Juan 29-6 Unit 31M, located in Rio Arriba County, New Mexico. The release consisted of approximately 14 barrels (bbls) of petroleum hydrocarbons from the onsite production tank. The initial release assessment was completed by AES on February 28, 2014, and the final excavation was completed by CoP contractors while AES was at the location on March 3, 2014.

1.0 Site Information

1.1 Location

Site Name – San Juan 29-6 Unit 31M
Location – NE¼ SW¼, Section 10, T29N, R6W, Rio Arriba County, New Mexico
Well Head Latitude/Longitude – N36.73918 and W107.45224, respectively
Release Location Latitude/Longitude – N36.73922 and W107.45187, respectively
Land Jurisdiction – Private
Figure 1. Topographic Site Location Map
Figure 2. Aerial Site Map, March 2014

1.2 NMOCD Ranking

In accordance with New Mexico Oil Conservation Division (NMOCD) release protocols, action levels were established per NMOCD *Guidelines for Remediation of Leaks, Spills, and Releases* (August 1993) prior to site work. The release was given a ranking score of 10 based on the following factors:

- **Depth to Groundwater:** A cathodic protection report form dated March 2005 for the San Juan 29-6 Unit 31M reported the depth to groundwater at 100 feet below ground surface (bgs). (0 points)
- **Wellhead Protection Area:** The release location is not within a wellhead protection area. (0 points)
- **Distance to Surface Water Body:** Approximately 750 feet to the northeast is an ephemeral tributary of Frances Creek. (10 points)

1.3 Assessment

AES was initially contacted by Lisa Hunter of CoP on February 24, 2014, and on February 27 and 28, 2014, Stephanie Lynn, Jesse Sprague, Anna Riling, and Emilee Skyles of AES completed the release assessment field work. The assessment included collection and field sampling of 22 soil samples from 7 borings in and around the release area. Soil borings were terminated between 2 and 9 feet. Based on the field sampling results, AES recommended further excavation of the release area. Sample locations are shown on Figure 3.

On March 3, 2014, AES returned to the location to collect confirmation soil samples of the excavation. The field sampling activities included collection of two confirmation soil samples from the excavation. The area of the final excavation measured approximately 27 feet by 22 feet by 0.5 to 4.5 feet in depth. Sample locations and final excavation extents are presented on Figure 4.

2.0 Soil Sampling

A total of 22 soil samples from 7 borings (SB-1 through SB-7) and 2 composite samples (SC-1 and SC-2) were collected during the assessments. All soil samples were field screened for volatile organic compounds (VOCs), and selected samples were also analyzed for total petroleum hydrocarbons (TPH). One composite sample (SC-1) collected during the excavation clearance was submitted for confirmation laboratory analysis.

2.1 Field Sampling

2.1.1 Volatile Organic Compounds

Field screening for VOC vapors was conducted with a photo-ionization detector (PID) organic vapor meter (OVM). Before beginning field screening, the PID-OVM was first calibrated with 100 parts per million (ppm) isobutylene gas.

2.1.2 Total Petroleum Hydrocarbons

Field TPH samples were analyzed per U.S. Environmental Protection Agency (USEPA) Method 418.1 using a Buck Scientific Model HC-404 Total Hydrocarbon Analyzer Infrared Spectrometer (Buck). A 3-point calibration was completed prior to conducting soil analyses. Field analytical protocol followed AES's *Standard Operating Procedure: Field Analysis Total Petroleum Hydrocarbons per EPA Method 418.1*.

2.2 Laboratory Analyses

The soil sample collected for laboratory analysis was placed into new, clean, laboratory-supplied containers, which were then labeled, placed on ice, and logged onto a sample chain of custody record. The sample was maintained on ice until delivery to the analytical laboratory, Hall Environmental Analysis Laboratory (Hall) in Albuquerque, New Mexico. Soil sample SC-1 was laboratory analyzed for:

- Benzene, toluene, ethylbenzene, and xylene (BTEX) per USEPA Method 8021B.

2.3 Field and Laboratory Analytical Results

On February 27 and 28, 2014, initial assessment field screening results for VOCs via OVM showed concentrations ranging from 0.0 ppm in SB-2 and SB-3 up to 1,950 ppm in SB-7. Field TPH concentrations ranged from less than 20.0 mg/kg in SB-3 and SB-4 up to 9,540 mg/kg in SB-7.

On March 3, 2014, final excavation field screening results for VOCs via OVM in SC-1 and SC-2 were reported at 2,462 ppm and 85.3 ppm, respectively. Field TPH concentrations were reported at less than 20.0 mg/kg in SC-1 and SC-2. Results are included below in Table 1 and on Figures 3 and 4. The AES Field Sampling Reports are attached.

Table 1. Field Sampling VOCs and TPH Results
San Juan 29-6 Unit 31M Initial Release Assessment and Final Excavation
February and March 2014

Sample ID	*Date Sampled*	*Sample Depth (ft bgs)*	*VOCs via OVM (ppm)*	*TPH 418.1 (mg/kg)*
*NMOCD Action Level**			*100*	*1,000*
SB-1	2/27/14	Surface	51.5	74.0
		1	22.6	NA
		3	14.0	47.3
		5	5.9	NA
		9	1.0	23.0
SB-2	2/27/14	Surface	0.0	NA
		1	0.8	NA
		3	3.5	24.9
		5	0.9	32.9
SB-3	2/27/14	Surface	0.0	NA
		2	0.0	<20.0
SB-4	2/27/14	Surface	0.2	27.8
		1	0.8	NA
		3	1.2	NA
		5	1.6	<20.0
SB-5	2/27/14	Surface	34.7	42.8
		1	13.5	NA
		3	16.0	NA
		5	30.0	NA
SB-6	2/28/14	Surface	19.6	84.6
SB-7	2/28/14	Surface	**1,950**	**4,020**
		2	**1,564**	**9,540**
SC-1	3/3/14	1 to 4.5	**2,462**	<20.0
SC-2	3/3/14	0.5 to 3	85.3	<20.0

NA – not analyzed
*Action level determined by the NMOCD ranking score per *NMOCD Guidelines for Remediation of Leaks, Spills, and Releases* (August 1993)

Laboratory analyses for SC-1 were used to confirm field sampling results from the final excavation. Benzene and total BTEX concentrations in SC-1 were reported as 0.19 mg/kg and 3.2 mg/kg, respectively. Results are presented in Table 2 and on Figure 4. The laboratory analytical report is attached.

Table 2. Laboratory Analytical Results – Benzene, Total BTEX, and TPH
San Juan 29-6 Unit 31M Final Excavation, March 2014

Sample ID	Date Sampled	Sample Depth (ft bgs)	Benzene (mg/kg)	Total BTEX (mg/kg)	GRO (mg/kg)	DRO (mg/kg)
*NMOCD Action Level**			*10*	*50*	*1,000*	
SC-1	3/3/14	1 to 4.5	0.19	3.2	NA	NA

NA – not analyzed
*Action level determined by the NMOCD ranking score per *NMOCD Guidelines for Remediation of Leaks, Spills, and Releases* (August 1993)

3.0 Conclusions and Recommendations

On February 27 and 28, 2014, AES conducted an assessment of petroleum contaminated soils from an estimated 14 bbl hydrocarbon release associated with the onsite production tank at the San Juan 29-6 Unit 31M. Action levels for releases are determined by the NMOCD ranking score per *NMOCD Guidelines for Remediation of Leaks, Spills, and Releases* (August 1993), and the site was assigned a rank of 10.

Initial assessment field sampling results above the NMOCD action level of 100 ppm VOCs and 1,000 mg/kg TPH were reported in SB-7. In SB-7, the highest VOC concentration was reported at the ground surface with 1,950 ppm, and the highest TPH concentration was reported at 9,540 mg/kg.

On March 3, 2014, final clearance of the excavation area was completed. Field sampling results of the excavation extents showed that VOC concentrations were below applicable NMOCD action levels for the final walls and base of the excavation, except at the southwest corner (SC-1), which had a VOC concentration of 2,462 ppm. Field TPH concentrations were below the applicable NMOCD action level of 1,000 mg/kg for the excavation extents. Additionally, laboratory analytical results from March 3, 2014, reported benzene and total BTEX concentrations in SC-1 (SW corner) below NMOCD action levels of 10 mg/kg and 50 mg/kg, respectively.

Based on final field sampling and laboratory analytical results from the excavation of petroleum contaminated soils at the San Juan 29-6 Unit 31M, benzene, total BTEX, VOC,

and TPH concentrations were below applicable NMOCD action levels for the final excavation extents. No further work is recommended at the release.

If you have any questions about this report or site conditions, please do not hesitate to contact Deborah Watson at (505) 564-2281.

Sincerely,

Emilee Skyles
Staff Geologist

Elizabeth McNally, PE

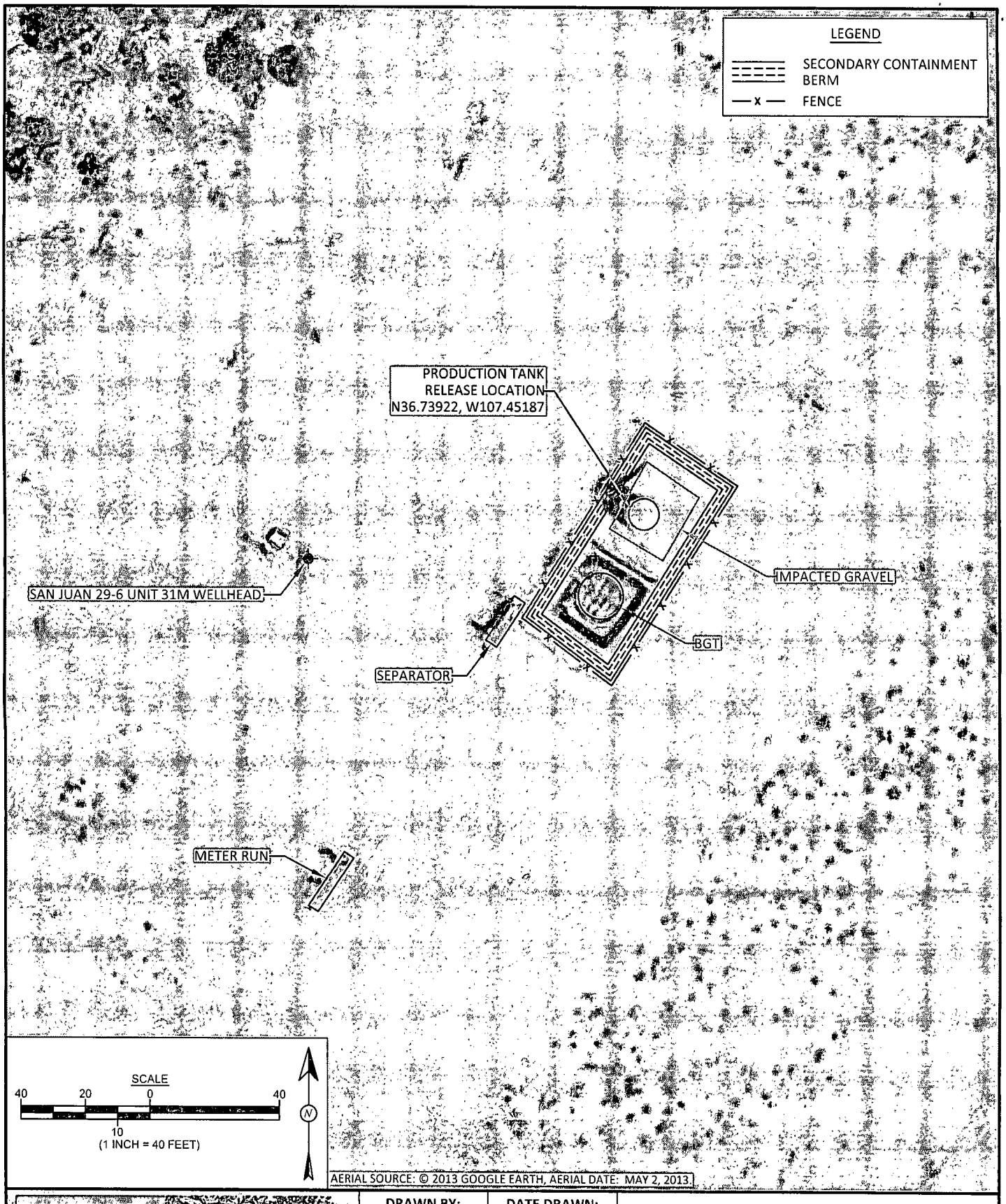
Attachments:

Figure 1. Topographic Site Location Map
Figure 2. Aerial Site Map, February 2014
Figure 3. Release Assessment Sample Locations and Results, February 2014
Figure 4. Final Excavation Sample Locations and Results, March 2014
AES Field Sampling Report 022714
AES Field Sampling Report 022814
AES Field Sampling Report 030314
Hall Analytical Report 1403056

C:\Users\emcnally.AES\Dropbox (Animas Environmental)\0000 Animas Server Dropbox EM\2014 Projects\ConocoPhillips\SJ 29-6 Unit 31M\San Juan 29-6 Unit 31M Release and Final Excavation Report 052914 EM.docx

DRAWN BY: S. Glasses	**DATE DRAWN:** February 28, 2014	**FIGURE 1**
REVISIONS BY: C. Lameman	**DATE REVISED:** February 28, 2014	**TOPOGRAPHIC SITE LOCATION MAP**
CHECKED BY: D. Watson	**DATE CHECKED:** February 28, 2014	ConocoPhillips SAN JUAN 29-6 UNIT 31M NE¼ SW¼, SECTION 10, T29N, R6W RIO ARRIBA COUNTY, NEW MEXICO N36.73918, W107.45224
APPROVED BY: E. McNally	**DATE APPROVED:** February 28, 2014	

Animas Environmental Services, LLC



Animas Environmental Services, LLC

DRAWN BY: C. Lameman	**DATE DRAWN:** March 6, 2014
REVISIONS BY: C. Lameman	**DATE REVISED:** March 28, 2014
CHECKED BY: D. Watson	**DATE CHECKED:** March 28, 2014
APPROVED BY: E. McNally	**DATE APPROVED:** March 28, 2014

FIGURE 2

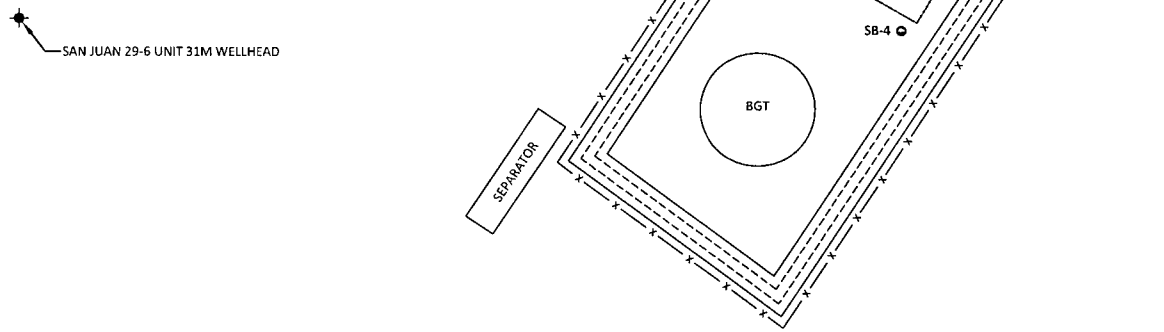
AERIAL SITE MAP
FEBRUARY 2014
ConocoPhillips
SAN JUAN 29-6 UNIT 31M
NE¼ SW¼, SECTION 10, T29N, R6W
RIO ARRIBA COUNTY, NEW MEXICO
N36.73918, W107.45224

FIGURE 3

RELEASE ASSESSMENT
SAMPLE LOCATIONS AND RESULTS
FEBRUARY 2014
ConocoPhillips
SAN JUAN 29-6 UNIT 31M
NE¼ SW¼, SECTION 10, T29N, R6W
RIO ARRIBA COUNTY, NEW MEXICO
N36.73918, W107.45224

Field Sampling Results				
Sample ID	*Date*	*Depth (ft)*	*OVM-PID (ppm)*	*TPH (mg/kg)*
		NMOCD ACTION LEVEL	*100*	*1,000*
SB-1	2/27/14	Surface	51.5	74.0
		1	22.6	*NA*
		3	14.0	47.3
		5	5.9	*NA*
		9	1.0	23.0
SB-2	2/27/14	Surface	0.0	*NA*
		1	0.8	*NA*
		3	3.5	24.9
		5	0.9	32.9
SB-3	2/27/14	Surface	0.0	*NA*
		2	0.0	<20.0
SB-4	2/27/14	Surface	0.2	27.8
		1	0.8	*NA*
		3	1.2	*NA*
		5	1.6	<20.0
SB-5	2/27/14	Surface	34.7	42.8
		1	13.5	*NA*
		3	16.0	*NA*
		5	30.0	*NA*
SB-6	2/28/14	Surface	19.6	84.6
SB-7	2/28/14	Surface	**1,950**	**4,015**
		2	**1,564**	**9,540**

NA - NOT ANALYZED



Animas Environmental Services, LLC

DRAWN BY: S. Glasses	**DATE DRAWN:** February 28, 2014
REVISIONS BY: S. Glasses	**DATE REVISED:** May 27, 2014
CHECKED BY: D. Watson	**DATE CHECKED:** May 27, 2014
APPROVED BY: E. McNally	**DATE APPROVED:** May 27, 2014

LEGEND

- SAMPLE LOCATIONS
- SECONDARY CONTAINMENT BERM
- —x— FENCE

N

SCALE
15 9 0 15
3
(1 INCH = 15 FEET)

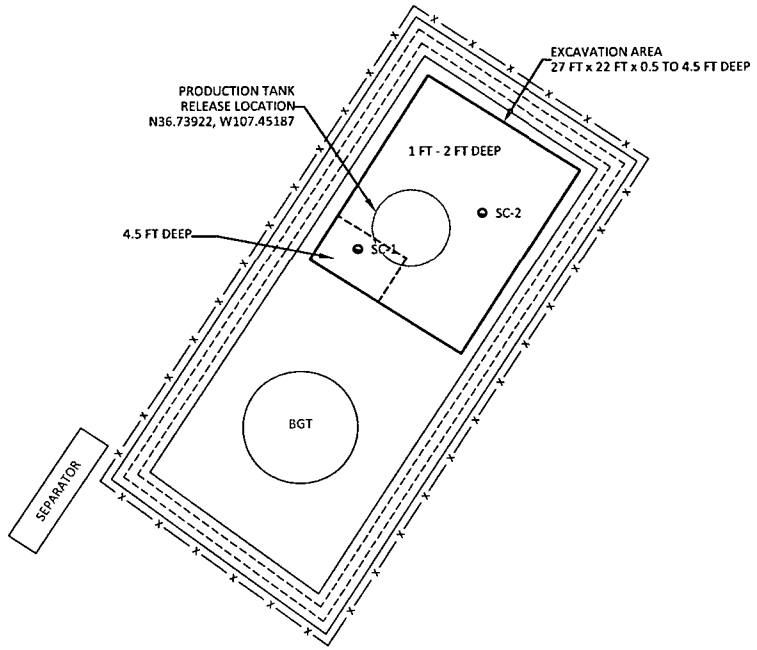
FIGURE 4

FINAL EXCAVATION
SAMPLE LOCATIONS AND RESULTS
MARCH 2014
ConocoPhillips
SAN JUAN 29-6 UNIT 31M
NE¼ SW¼, SECTION 10, T29N, R6W
RIO ARRIBA COUNTY, NEW MEXICO
N36.73918, W107.45224

Field Sampling Results				
Sample ID	Date	Depth (ft)	OVM-PID (ppm)	TPH (mg/kg)
NMOCD ACTION LEVEL			100	1,000
SC-1	3/3/14	1 to 4.5	2,462	<20.0
SC-2	3/3/14	0.5 to 3	85.3	<20.0
ALL SAMPLES WERE COMPOSITE SAMPLES.				

Laboratory Analytical Results				
Sample ID	Date	Depth (ft)	Benzene (mg/kg)	Total BTEX (mg/kg)
NMOCD ACTION LEVEL			10	50
SC-1	3/3/14	1 to 4.5	0.19	3.2
SAMPLE WAS ANALYZED PER EPA METHOD 8021B.				

SAN JUAN 29-6 UNIT 31M WELLHEAD



Animas Environmental Services, LLC

DRAWN BY:	DATE DRAWN:
S. Glasses	March 6, 2014
REVISIONS BY:	**DATE REVISED:**
C. Lameman	March 28, 2014
CHECKED BY:	**DATE CHECKED:**
D. Watson	March 28, 2014
APPROVED BY:	**DATE APPROVED:**
E. McNally	March 28, 2014

LEGEND

- SAMPLE LOCATIONS
- SECONDARY CONTAINMENT BERM
- —x— FENCE

SCALE
15 9 0 15
(1 INCH = 15 FEET)

AES Field Sampling Report

Animas Environmental Services, LLC
www.animasenvironmental.com
624 E. Comanche
Farmington, NM 87401
505-564-2281
Durango, Colorado
970-403-3084

Client: ConocoPhillips

Project Location: San Juan 29-6 Unit 31M

Date: 2/27/2014

Matrix: Soil

Sample ID	Collection Date	Collection Time	OVM (ppm)	TPH* 418.1 (mg/kg)	TPH Analysis Time	TPH PQL (mg/kg)	DF	TPH Analysts Initials
SB-1 @ surface	2/27/2014	13:30	51.5	74.0	14:23	20.0	1	SAL
SB-1 @ 1'	2/27/2014	13:35	22.6	*Not analyzed for TPH*				
SB-1 @ 3'	2/27/2014	13:40	14.0	47.3	14:31	20.0	1	SAL
SB-1 @ 5'	2/27/2014	13:45	5.9	*Not analyzed for TPH*				
SB-1 @ 9'	2/27/2014	14:05	1.0	23.0	14:34	20.0	1	SAL
SB-2 @ surface	2/27/2014	14:20	0.0	*Not analyzed for TPH*				
SB-2 @ 1'	2/27/2014	14:25	0.8	*Not analyzed for TPH*				
SB-2 @ 3'	2/27/2014	14:30	3.5	24.9	11:01**	20.0	1	SAL
SB-2 @ 5'	2/27/2014	15:00	0.9	32.9	15:46	20.0	1	SAL
SB-3 @ surface	2/27/2014	14:45	0.0	*Not analyzed for TPH*				
SB-3 @ 2'	2/27/2014	14:50	0.0	19.3	15:45	20.0	1	SAL
SB-4 @ surface	2/27/2014	15:30	0.2	27.8	15:57	20.0	1	SAL
SB-4 @ 1'	2/27/2014	15:40	0.8	*Not analyzed for TPH*				
SB-4 @ 3'	2/27/2014	15:45	1.2	*Not analyzed for TPH*				
SB-4 @ 5'	2/27/2014	15:50	1.6	16.5	11:08**	20.0	1.0	SAL
SB-5 @ surface	2/27/2014	15:35	34.7	42.8	11:26**	20.0	1.0	SAL
SB-5 @ 1'	2/27/2014	15:55	13.5	*Not analyzed for TPH*				
SB-5 @ 3'	2/27/2014	16:00	16.0	*Not analyzed for TPH*				
SB-5 @ 5'	2/27/2014	16:05	30.0	*Not analyzed for TPH*				

DF Dilution Factor
NA Not Analyzed
ND Not Detected at the Reporting Limit
PQL Practical Quantitation Limit

Total Petroleum Hydrocarbons - USEPA 418.1

Analyst:

** TPH concentrations recorded may be below PQL.*
** Analyzed on 2/28/14

Report Finalized: 2/28/14

AES Field Sampling Report

Animas Environmental Services, LLC
www.animasenvironmental.com
624 E. Comanche
Farmington, NM 87401
505-564-2281
Durango, Colorado
970-403-3084

Client: ConocoPhillips

Project Location: San Juan 29-6 Unit 31M

Date: 2/28/2014

Matrix: Soil

Sample ID	Collection Date	Collection Time	OVM (ppm)	TPH* 418.1 (mg/kg)	TPH Analysis Time	TPH PQL (mg/kg)	DF	TPH Analysts Initials
SB-6 @ surface	2/28/2014	14:58	19.6	84.6	6:23**	20.0	1	DAW
SB-7 @ surface	2/28/2014	14:59	1,950	4,015	6:21**	200	10	DAW
SB-7 @ 2'	2/28/2014	15:04	1,564	9,540	6:31**	200	10	DAW

DF Dilution Factor

NA Not Analyzed

ND Not Detected at the Reporting Limit

PQL Practical Quantitation Limit

**TPH concentrations recorded may be below PQL.*

** Analyzed on 3/3/14

Total Petroleum Hydrocarbons - USEPA 418.1

Analyst: Deborah Watson

Report Finalized: 2/28/14

AES Field Sampling Report

Animas Environmental Services, LLC
www.animasenvironmental.com
624 E. Comanche
Farmington, NM 87401
505-564-2281
Durango, Colorado
970-403-3084

Client: ConocoPhillips

Project Location: San Juan 29-6 Unit 31M

Date: 2/28/2014

Matrix: Soil

Sample ID	Collection Date	Collection Time	OVM (ppm)	TPH* 418.1 (mg/kg)	TPH Analysis Time	TPH PQL (mg/kg)	DF	TPH Analysts Initials
SB-6 @ surface	2/28/2014	14:58	19.6	84.6	6:23**	20.0	1	DAW
SB-7 @ surface	2/28/2014	14:59	1,950	4,015	6:21**	200	10	DAW
SB-7 @ 2'	2/28/2014	15:04	1,564	9,540	6:31**	200	10	DAW

DF Dilution Factor

NA Not Analyzed

ND Not Detected at the Reporting Limit

PQL Practical Quantitation Limit

**TPH concentrations recorded may be below PQL.*

** Analyzed on 3/3/14

Total Petroleum Hydrocarbons - USEPA 418.1

Analyst: Deborah Watson

Report Finalized: 3/3/14

AES Field Sampling Report

Animas Environmental Services, LLC
www.animasenvironmental.com
624 E. Comanche
Farmington, NM 87401
505-564-2281
Durango, Colorado
970-403-3084

Client: ConocoPhillips

Project Location: San Juan 29-6 Unit 31M

Date: 3/3/2014

Matrix: Soil

Sample ID	Collection Date	Collection Time	Sample Location	OVM (ppm)	TPH* 418.1 (mg/kg)	TPH Analysis Time	TPH PQL (mg/kg)	DF	TPH Analysts Initials
SC-1	3/3/2014	15:45	SW Composite	2,462	17.0	16:20	20.0	1	EMS
SC-2	3/3/2014	15:48	Composite	85.3	15.7	16:23	20.0	1	EMS

DF Dilution Factor

NA Not Analyzed

ND Not Detected at the Reporting Limit

PQL Practical Quantitation Limit

**TPH concentrations recorded may be below PQL.*

Total Petroleum Hydrocarbons - USEPA 418.1

Analyst: Emily Sky

Report Finalized: 3/3/14

HALL ENVIRONMENTAL ANALYSIS LABORATORY

Hall Environmental Analysis Laboratory
4901 Hawkins NE
Albuquerque, NM 87109
TEL: 505-345-3975 FAX: 505-345-4107
Website: www.hallenvironmental.com

March 05, 2014

Debbie Watson
Animas Environmental
624 East Comanche
Farmington, NM 87401
TEL: (505) 486-4071
FAX

RE: COP San Juan 29-6 Unit 31M OrderNo.: 1403056

Dear Debbie Watson:

Hall Environmental Analysis Laboratory received 1 sample(s) on 3/4/2014 for the analyses presented in the following report.

These were analyzed according to EPA procedures or equivalent. To access our accredited tests please go to www.hallenvironmental.com or the state specific web sites. In order to properly interpret your results it is imperative that you review this report in its entirety. See the sample checklist and/or the Chain of Custody for information regarding the sample receipt temperature and preservation. Data qualifiers or a narrative will be provided if the sample analysis or analytical quality control parameters require a flag. When necessary, data qualifers are provided on both the sample analysis report and the QC summary report, both sections should be reviewed. All samples are reported, as received, unless otherwise indicated. Lab measurement of analytes considered field parameters that require analysis within 15 minutes of sampling such as pH and residual chlorine are qualified as being analyzed outside of the recommended holding time.

Please don't hesitate to contact HEAL for any additional information or clarifications.

ADHS Cert #AZ0682 -- NMED-DWB Cert #NM9425 -- NMED-Micro Cert #NM0190

Sincerely,

Andy Freeman
Laboratory Manager
4901 Hawkins NE
Albuquerque, NM 87109

Analytical Report
Lab Order **1403056**
Date Reported: **3/5/2014**

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Animas Environmental
Client Sample ID: SC-1
Project: COP San Juan 29-6 Unit 31M
Collection Date: 3/3/2014 3:57:00 PM
Lab ID: 1403056-001
Matrix: MEOH (SOIL)
Received Date: 3/4/2014 10:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed	Batch
EPA METHOD 8021B: VOLATILES						Analyst: **JMP**	
Benzene	0.19	0.035		mg/Kg	1	3/4/2014 1:21:26 PM	R17086
Toluene	1.3	0.035		mg/Kg	1	3/4/2014 1:21:26 PM	R17086
Ethylbenzene	0.11	0.035		mg/Kg	1	3/4/2014 1:21:26 PM	R17086
Xylenes, Total	1.6	0.070		mg/Kg	1	3/4/2014 1:21:26 PM	R17086
Surr: 4-Bromofluorobenzene	99.0	80-120		%REC	1	3/4/2014 1:21:26 PM	R17086

Refer to the QC Summary report and sample login checklist for flagged QC data and preservation information.

Qualifiers:

*	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
O	RSD is greater than RSDlimit	P	Sample pH greater than 2.
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

HALL ENVIRONMENTAL ANALYSIS LABORATORY

Hall Environmental Analysts Laboratory
4901 Hawkins NE
Albuquerque, NM 87109
TEL: 505-345-3975 FAX: 505-345-4107
Website: www.hallenvironmental.com

Sample Log-In Check List

Client Name: Animas Environmental | Work Order Number: 1403056 | RcptNo: 1

Received by/date: 02/04/14

Logged By: Lindsay Mangin 3/4/2014 10:00:00 AM

Completed By: Lindsay Mangin 3/4/2014 10:28:14 AM

Reviewed By: 03/04/14

Chain of Custody

1. Custody seals intact on sample bottles?	Yes ☐	No ☐	Not Present ☑
2. Is Chain of Custody complete?	Yes ☑	No ☐	Not Present ☐
3. How was the sample delivered?	Courier		

Log In

4. Was an attempt made to cool the samples?	Yes ☑	No ☐	NA ☐
5. Were all samples received at a temperature of >0° C to 6.0°C	Yes ☑	No ☐	NA ☐
6. Sample(s) in proper container(s)?	Yes ☑	No ☐	
7. Sufficient sample volume for indicated test(s)?	Yes ☑	No ☐	
8. Are samples (except VOA and ONG) properly preserved?	Yes ☑	No ☐	
9. Was preservative added to bottles?	Yes ☐	No ☑	NA ☐
10. VOA vials have zero headspace?	Yes ☐	No ☐	No VOA Vials ☑
11. Were any sample containers received broken?	Yes ☐	No ☑	
12. Does paperwork match bottle labels? (Note discrepancies on chain of custody)	Yes ☑	No ☐	
13. Are matrices correctly identified on Chain of Custody?	Yes ☑	No ☐	
14. Is it clear what analyses were requested?	Yes ☑	No ☐	
15. Were all holding times able to be met? (If no, notify customer for authorization.)	Yes ☑	No ☐	

# of preserved bottles checked for pH: _____ (<2 or >12 unless noted)

Adjusted? _____

Checked by: _____

Special Handling (if applicable)

16. Was client notified of all discrepancies with this order? Yes ☐ No ☐ NA ☑

Person Notified: _____ Date: _____

By Whom: _____ Via: ☐ eMail ☐ Phone ☐ Fax ☐ In Person

Regarding: _____

Client Instructions: _____

17. Additional remarks:

18. Cooler Information

Cooler No	Temp °C	Condition	Seal Intact	Seal No	Seal Date	Signed By
1	2.5	Good	Yes			

Chain-of-Custody Record

Client: Animas Environmental Services LLC

Mailing Address: 624 E Comanche, Farmington NM 87401

Phone #: 505 564 2281

email or Fax#:

QA/QC Package:
- [x] Standard
- [ ] Level 4 (Full Validation)

Accreditation
- [ ] NELAP
- [ ] Other ______

- [ ] EDD (Type) ______

- [ ] Standard
- [x] Rush Same day

Project Name: CoP San Juan 29-6 Unit 31M

Project #:

Project Manager: D Watson

Sampler: D Watson

On Ice: [x] Yes [ ] No

Sample Temperature: 2.5

HALL ENVIRONMENTAL ANALYSIS LABORATORY

www.hallenvironmental.com

4901 Hawkins NE - Albuquerque, NM 87109

Tel. 505-345-3975 Fax 505-345-4107

Analysis Request

Date	Time	Matrix	Sample Request ID	Container Type and #	Preservative Type	HEAL No. 1403056	BTEX + ~~[illegible]~~ (8021)	BTEX + MTBE + TPH (Gas only)	TPH 8015B (GRO / DRO / MRO)	TPH (Method 418.1)	EDB (Method 504.1)	PAH's (8310 or 8270 SIMS)	RCRA 8 Metals	Anions (F,Cl,NO_3,NO_2,PO_4,SO_4)	8081 Pesticides / 8082 PCB's	8260B (VOA)	8270 (Semi-VOA)					Air Bubbles (Y or N)
3-3-14	1557	soil	SC-1	~~MeOH Kit~~ 4oz	~~MeOH~~ Cold	-001	X															

Date:	Time:	Relinquished by:	Received by:	Date	Time
3-4-14	630	Debbie Watson	[signature]	03/04/14	1000
Date:	Time:	Relinquished by:	Received by:	Date	Time

Remarks: Bill to ConocoPhillips

If necessary, samples submitted to Hall Environmental may be subcontracted to other accredited laboratories. This serves as notice of this possibility. Any sub-contracted data will be clearly notated on the analytical report.