



## **COG – VT 36 STATE #001H (7/6/16)**

### **REMEDIATION PLAN**

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COG will excavate the spill area as depicted on the following site diagram. The leak area near T-1 will be excavated to a minimum depth of 4 feet then a liner will be placed in the excavation. However, since a new pipeline is being installed in this area, the excavation will most likely be deeper than 4 feet so that the liner is below the new pipeline and to protect the integrity of the liner. The leak area near T-2 and T-3 will be excavated to a depth of 2 feet.

Due to the expediency of this project, field titration samples will be taken to assist in the horizontal boundaries of the sidewalls and further delineation of the bottom in the T-1 area.

The entire site will then be backfilled with clean soil.

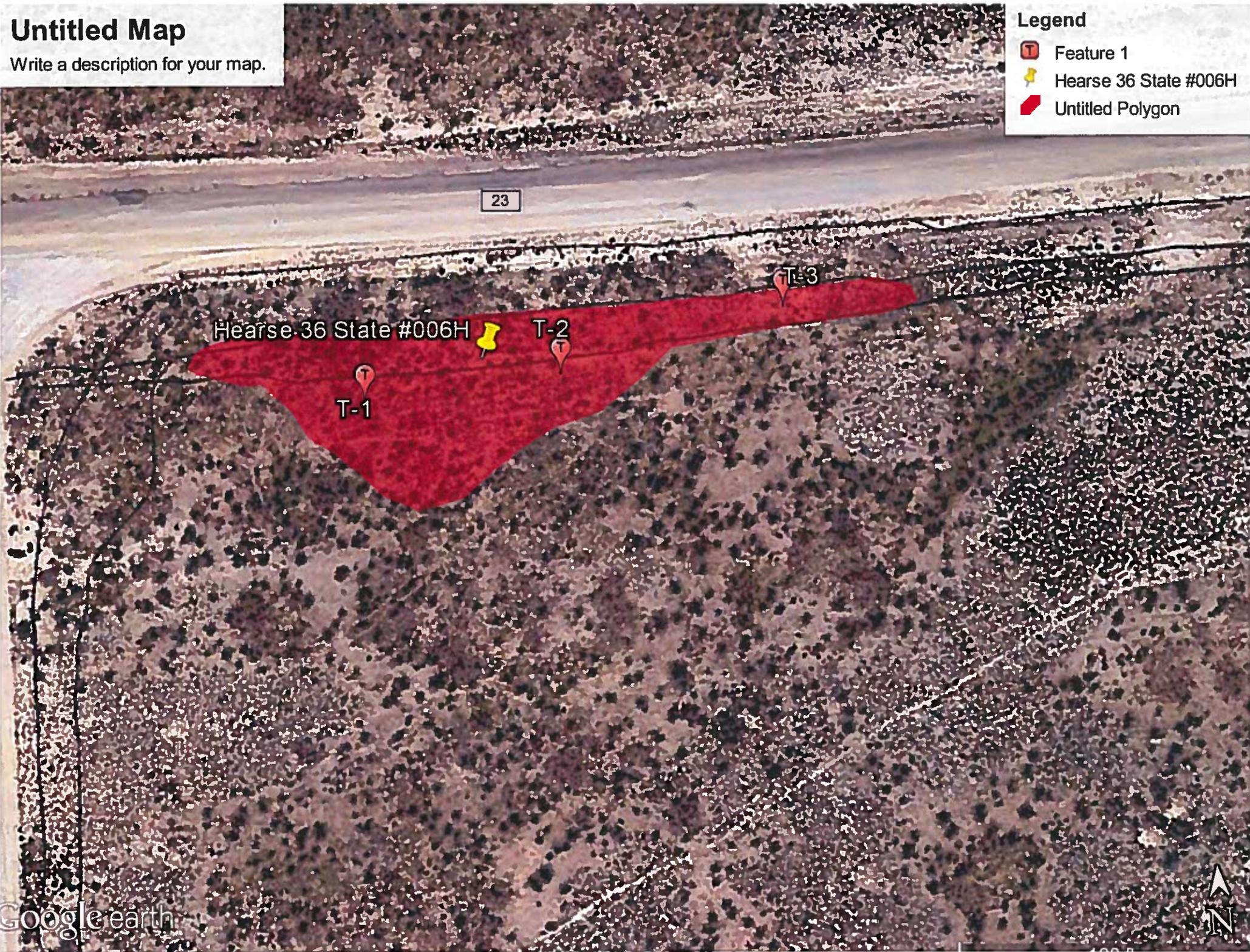
All excavated materials will be disposed of at an NMOCD-approved disposal facility.

# Untitled Map

Write a description for your map.

## Legend

-  Feature 1
-  Hearse 36 State #006H
-  Untitled Polygon





# Groundwater Plot

## COG VT 36 State #001H

County  
Eddy

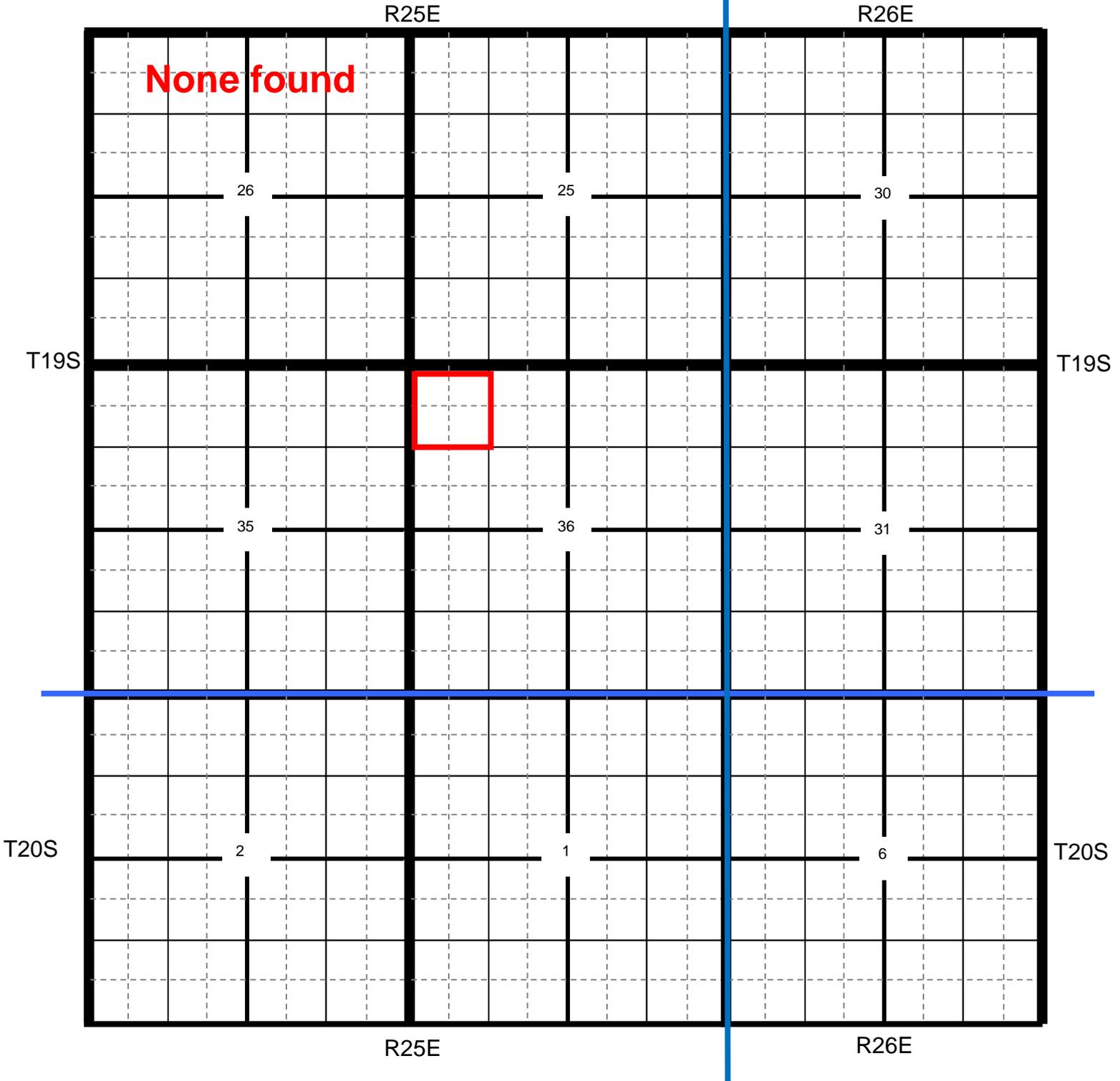
Unit Letter  
D

Section  
36

Township  
19S

Range  
25E

Trend Map 125'



📍 Location

● OCD

● USGS

● SEO

● All Databases

COG Operating, LLC VT 36 State #001H

<b>County</b> Eddy	<b>Unit Letter</b> D	<b>Section</b> 36	<b>Township</b> 19S	<b>Range</b> 25E
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Trend Map 125'

1

2

NW/NW  Unit Letter D	NE/NW  Unit Letter C	NW/NE  None found  Unit Letter B	NE/NE  Unit Letter A
SW/NW  Unit Letter E	SE/NW  Unit Letter F	SW/NE  Unit Letter G	SE/NE  Unit Letter H
NW/SW  Unit Letter L	NE/SW  Unit Letter K	NW/SE  Unit Letter J	NE/SE  Unit Letter I
SW/SW  Unit Letter M	SE/SW  Unit Letter N	SW/SE  Unit Letter O	SE/SE  Unit Letter P

3

4

**Laboratory Analytical Results Summary**  
**VT 36 State #001H**

		Sample	T1 @ 0-1'	T1 @ 2'	T1 @ 4'	T1 @ 6'	T1 @ 8'	T1 @ 10'	T1 @ 12'
Analyte	Method	Date	10/11/16	10/11/16	10/11/16	10/11/16	10/11/16	10/11/16	10/11/16
			mg/Kg						
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	n/a	n/a	n/a	n/a	n/a
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	n/a	n/a	n/a	n/a	n/a
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	n/a	n/a	n/a	n/a	n/a
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	n/a	n/a	n/a	n/a	n/a
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	n/a	n/a	n/a	n/a	n/a
<b>Chloride</b>	SM4500CI-B		<b>3760</b>	<b>3880</b>	<b>3760</b>	<b>4640</b>	<b>3560</b>	<b>3040</b>	<b>2960</b>
<b>GRO</b>	TPH 8015M		<10.0	<10.0	n/a	n/a	n/a	n/a	n/a
<b>DRO</b>	TPH 8015M		<10.0	<10.0	n/a	n/a	n/a	n/a	n/a

		Sample	T2 @ 0-1'	T2 @ 2'	T2 @ 4'	T2 @ 6'
Analyte	Method	Date	10/11/16	10/11/16	10/11/16	10/11/16
			mg/Kg	mg/Kg	mg/Kg	mg/Kg
<b>Benzene</b>	BTEX 8021B		<0.050	<0.050	n/a	n/a
<b>Toluene</b>	BTEX 8021B		<0.050	<0.050	n/a	n/a
<b>Ethylbenzene</b>	BTEX 8021B		<0.050	<0.050	n/a	n/a
<b>Total Xylenes</b>	BTEX 8021B		<0.150	<0.150	n/a	n/a
<b>Total BTEX</b>	BTEX 8021B		<0.300	<0.300	n/a	n/a
<b>Chloride</b>	SM4500CI-B		<b>1720</b>	<b>1360</b>	<b>544</b>	<b>64</b>
<b>GRO</b>	TPH 8015M		<10.0	<10.0	n/a	n/a
<b>DRO</b>	TPH 8015M		<10.0	<10.0	n/a	n/a

		Sample	T3 @ 0-1'	T3 @ 2'	T3 @ 4'
Analyte	Method	Date	10/11/16	10/11/16	10/11/16
			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>6000</b>	<b>5600</b>	<b>224</b>
<b>GRO</b>	TPH 8015M		<10.0	<10.0	<10.0
<b>DRO</b>	TPH 8015M		<10.0	<10.0	<10.0



October 20, 2016

ROBERT GRUBBS, JR  
COG OPERATING  
P. O. BOX 1630  
ARTESIA, NM 88210

RE: HEARSE 36 STATE #006H

Enclosed are the results of analyses for samples received by the laboratory on 10/12/16 11:00.

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/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 black ink that reads "Celey D. Keene". The signature is written in a cursive style.

Celey D. Keene  
Lab Director/Quality Manager

**Analytical Results For:**

 COG OPERATING  
 ROBERT GRUBBS, JR  
 P. O. BOX 1630  
 ARTESIA NM, 88210  
 Fax To: NONE

Received:	10/12/2016	Sampling Date:	10/11/2016
Reported:	10/20/2016	Sampling Type:	Soil
Project Name:	HEARSE 36 STATE #006H	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Angela Cabrera
Project Location:	EDDY COUNTY, NM		

**Sample ID: T-1 0-1' (H602305-01)**

BTEX 8021B		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/13/2016	ND	2.29	114	2.00	0.988	
Toluene*	<0.050	0.050	10/13/2016	ND	2.39	119	2.00	1.16	
Ethylbenzene*	<0.050	0.050	10/13/2016	ND	2.31	116	2.00	1.50	
Total Xylenes*	<0.150	0.150	10/13/2016	ND	6.99	116	6.00	1.41	
Total BTEX	<0.300	0.300	10/13/2016	ND					

*Surrogate: 4-Bromofluorobenzene (PID) 102 % 73.6-140*

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>3760</b>	16.0	10/13/2016	ND	400	100	400	3.92	

TPH 8015M		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	10/13/2016	ND	183	91.7	200	0.933	
DRO >C10-C28	<10.0	10.0	10/13/2016	ND	193	96.7	200	0.574	

*Surrogate: 1-Chlorooctane 95.0 % 35-147*
*Surrogate: 1-Chlorooctadecane 98.6 % 28-171*

Cardinal Laboratories

\*=Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 COG OPERATING  
 ROBERT GRUBBS, JR  
 P. O. BOX 1630  
 ARTESIA NM, 88210  
 Fax To: NONE

 Received: 10/12/2016  
 Reported: 10/20/2016  
 Project Name: HEARSE 36 STATE #006H  
 Project Number: NONE GIVEN  
 Project Location: EDDY COUNTY, NM

 Sampling Date: 10/11/2016  
 Sampling Type: Soil  
 Sampling Condition: Cool & Intact  
 Sample Received By: Angela Cabrera

**Sample ID: T-1 2' (H602305-02)**

BTEX 8021B		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/13/2016	ND	2.29	114	2.00	0.988	
Toluene*	<0.050	0.050	10/13/2016	ND	2.39	119	2.00	1.16	
Ethylbenzene*	<0.050	0.050	10/13/2016	ND	2.31	116	2.00	1.50	
Total Xylenes*	<0.150	0.150	10/13/2016	ND	6.99	116	6.00	1.41	
Total BTEX	<0.300	0.300	10/13/2016	ND					

Surrogate: 4-Bromofluorobenzene (PID) 99.3 % 73.6-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>3880</b>	16.0	10/13/2016	ND	400	100	400	3.92	

TPH 8015M		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	10/13/2016	ND	183	91.7	200	0.933	
DRO >C10-C28	<10.0	10.0	10/13/2016	ND	193	96.7	200	0.574	

Surrogate: 1-Chlorooctane 91.6 % 35-147

Surrogate: 1-Chlorooctadecane 96.0 % 28-171

**Sample ID: T-1 4' (H602305-03)**

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>3760</b>	16.0	10/18/2016	ND	416	104	400	0.00	

Cardinal Laboratories

\*=Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 COG OPERATING  
 ROBERT GRUBBS, JR  
 P. O. BOX 1630  
 ARTESIA NM, 88210  
 Fax To: NONE

 Received: 10/12/2016  
 Reported: 10/20/2016  
 Project Name: HEARSE 36 STATE #006H  
 Project Number: NONE GIVEN  
 Project Location: EDDY COUNTY, NM

 Sampling Date: 10/11/2016  
 Sampling Type: Soil  
 Sampling Condition: Cool & Intact  
 Sample Received By: Angela Cabrera

**Sample ID: T-1 6' (H602305-04)**

Chloride, SM4500CI-B		mg/kg		Analyzed By: HM					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	4640	16.0	10/19/2016	ND	416	104	400	3.77	

**Sample ID: T-1 8' (H602305-05)**

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	3560	16.0	10/20/2016	ND	432	108	400	3.77	

**Sample ID: T-1 10' (H602305-06)**

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	3040	16.0	10/20/2016	ND	432	108	400	3.77	

**Sample ID: T-1 12' (H602305-07)**

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	2960	16.0	10/20/2016	ND	432	108	400	3.77	

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 COG OPERATING  
 ROBERT GRUBBS, JR  
 P. O. BOX 1630  
 ARTESIA NM, 88210  
 Fax To: NONE

 Received: 10/12/2016  
 Reported: 10/20/2016  
 Project Name: HEARSE 36 STATE #006H  
 Project Number: NONE GIVEN  
 Project Location: EDDY COUNTY, NM

 Sampling Date: 10/11/2016  
 Sampling Type: Soil  
 Sampling Condition: Cool & Intact  
 Sample Received By: Angela Cabrera

**Sample ID: T-2 0-1' (H602305-08)**

BTEX 8021B		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/13/2016	ND	2.29	114	2.00	0.988	
Toluene*	<0.050	0.050	10/13/2016	ND	2.39	119	2.00	1.16	
Ethylbenzene*	<0.050	0.050	10/13/2016	ND	2.31	116	2.00	1.50	
Total Xylenes*	<0.150	0.150	10/13/2016	ND	6.99	116	6.00	1.41	
Total BTEX	<0.300	0.300	10/13/2016	ND					

Surrogate: 4-Bromofluorobenzene (PID) 99.0 % 73.6-140

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	1720	16.0	10/13/2016	ND	400	100	400	3.92	

TPH 8015M		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	10/13/2016	ND	184	91.8	200	5.61	
DRO >C10-C28	<10.0	10.0	10/13/2016	ND	191	95.7	200	5.61	

Surrogate: 1-Chlorooctane 77.0 % 35-147

Surrogate: 1-Chlorooctadecane 84.4 % 28-171

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\*=Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 COG OPERATING  
 ROBERT GRUBBS, JR  
 P. O. BOX 1630  
 ARTESIA NM, 88210  
 Fax To: NONE

 Received: 10/12/2016  
 Reported: 10/20/2016  
 Project Name: HEARSE 36 STATE #006H  
 Project Number: NONE GIVEN  
 Project Location: EDDY COUNTY, NM

 Sampling Date: 10/11/2016  
 Sampling Type: Soil  
 Sampling Condition: Cool & Intact  
 Sample Received By: Angela Cabrera

**Sample ID: T-2 2' (H602305-09)**

BTEX 8021B		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/13/2016	ND	2.29	114	2.00	0.988	
Toluene*	<0.050	0.050	10/13/2016	ND	2.39	119	2.00	1.16	
Ethylbenzene*	<0.050	0.050	10/13/2016	ND	2.31	116	2.00	1.50	
Total Xylenes*	<0.150	0.150	10/13/2016	ND	6.99	116	6.00	1.41	
Total BTEX	<0.300	0.300	10/13/2016	ND					

Surrogate: 4-Bromofluorobenzene (PID) 101 % 73.6-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>1360</b>	16.0	10/13/2016	ND	400	100	400	3.92	

TPH 8015M		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	10/13/2016	ND	184	91.8	200	5.61	
DRO >C10-C28	<10.0	10.0	10/13/2016	ND	191	95.7	200	5.61	

Surrogate: 1-Chlorooctane 87.9 % 35-147

Surrogate: 1-Chlorooctadecane 100 % 28-171

**Sample ID: T-2 4' (H602305-10)**

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>544</b>	16.0	10/18/2016	ND	416	104	400	3.77	QM-07, QR-03

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\*=Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 COG OPERATING  
 ROBERT GRUBBS, JR  
 P. O. BOX 1630  
 ARTESIA NM, 88210  
 Fax To: NONE

 Received: 10/12/2016  
 Reported: 10/20/2016  
 Project Name: HEARSE 36 STATE #006H  
 Project Number: NONE GIVEN  
 Project Location: EDDY COUNTY, NM

 Sampling Date: 10/11/2016  
 Sampling Type: Soil  
 Sampling Condition: Cool & Intact  
 Sample Received By: Angela Cabrera

**Sample ID: T-2 6' (H602305-11)**

Chloride, SM4500CI-B		mg/kg		Analyzed By: HM					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>64.0</b>	16.0	10/19/2016	ND	416	104	400	3.77	

**Sample ID: T-3 0-1' (H602305-13)**

BTEX 8021B		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/14/2016	ND	2.35	118	2.00	0.427	
Toluene*	<0.050	0.050	10/14/2016	ND	2.44	122	2.00	0.401	
Ethylbenzene*	<0.050	0.050	10/14/2016	ND	2.37	118	2.00	0.470	
Total Xylenes*	<0.150	0.150	10/14/2016	ND	7.18	120	6.00	0.363	
Total BTEX	<0.300	0.300	10/14/2016	ND					

Surrogate: 4-Bromofluorobenzene (PID) 100 % 73.6-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>6000</b>	16.0	10/13/2016	ND	400	100	400	3.92	

TPH 8015M		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	10/13/2016	ND	184	91.8	200	5.61	
DRO >C10-C28	<10.0	10.0	10/13/2016	ND	191	95.7	200	5.61	

Surrogate: 1-Chlorooctane 94.7 % 35-147

Surrogate: 1-Chlorooctadecane 103 % 28-171

Cardinal Laboratories

\*=Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 COG OPERATING  
 ROBERT GRUBBS, JR  
 P. O. BOX 1630  
 ARTESIA NM, 88210  
 Fax To: NONE

 Received: 10/12/2016  
 Reported: 10/20/2016  
 Project Name: HEARSE 36 STATE #006H  
 Project Number: NONE GIVEN  
 Project Location: EDDY COUNTY, NM

 Sampling Date: 10/11/2016  
 Sampling Type: Soil  
 Sampling Condition: Cool & Intact  
 Sample Received By: Angela Cabrera

**Sample ID: T-3 2' (H602305-14)**

BTEX 8021B		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/14/2016	ND	2.35	118	2.00	0.427	
Toluene*	<0.050	0.050	10/14/2016	ND	2.44	122	2.00	0.401	
Ethylbenzene*	<0.050	0.050	10/14/2016	ND	2.37	118	2.00	0.470	
Total Xylenes*	<0.150	0.150	10/14/2016	ND	7.18	120	6.00	0.363	
Total BTEX	<0.300	0.300	10/14/2016	ND					

Surrogate: 4-Bromofluorobenzene (PID) 98.7 % 73.6-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>5600</b>	16.0	10/13/2016	ND	400	100	400	3.92	

TPH 8015M		mg/kg		Analyzed By: CK					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	10/13/2016	ND	184	91.8	200	5.61	
DRO >C10-C28	<10.0	10.0	10/13/2016	ND	191	95.7	200	5.61	

Surrogate: 1-Chlorooctane 77.2 % 35-147

Surrogate: 1-Chlorooctadecane 83.6 % 28-171

**Sample ID: T-3 4' (H602305-15)**

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<b>Chloride</b>	<b>224</b>	16.0	10/18/2016	ND	416	104	400	3.77	

Cardinal Laboratories

\*=Accredited Analyte

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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.
QR-03	The RPD value for the sample duplicate or MS/MSD was outside if QC acceptance limits due to matrix interference. QC batch accepted based on LCS and/or LCSD recovery and/or RPD values.
QM-07	The spike recovery was outside acceptance limits for the MS and/or MSD. The batch was accepted based on acceptable LCS recovery.
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



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

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

**BILL TO**

**ANALYSIS REQUEST**

Company Name: COG Operating LLC  
 Project Manager: Robert Grubbs Jr  
 Address: 2208 West Main  
 City: Artesia State: NM Zip: 88210  
 Phone #: 432-661-6601 Fax #:   
 Project #: Project Owner:   
 Project Name: Hearse 36 State #006H  
 Project Location: Eddy Co, New Mexico  
 Sample Name: Rober Grubbs Jr  
 P.O. #:   
 Company: COG Operating LLC  
 Attn: Robert McNeill  
 Address: 600 W Illinois  
 City: Midland  
 State: TX Zip: 79701  
 Phone #: (432) 221-0388  
 Fax #:

Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX							DATE	TIME	BTX	TPH	Chloride
				GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :	ACID/BASE:					
H1602305	T-1 0-1'		1	X								X	X	X	
	T-1 2'		1	X								X	X	X	
	T-1 4'		1	X								X	X	X	
	T-1 6'		1	X								X	X	X	
	T-1 8'		1	X								X	X	X	
	T-1 10'		1	X								X	X	X	
	T-1 12'		1	X								X	X	X	
	T-2 0-1'		1	X								X	X	X	
	T-2 2'		1	X								X	X	X	
	T-2 4'		1	X								X	X	X	

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Relinquished By: *[Signature]*  
 Date: 10/12/2016  
 Time: 11:00  
 Received By: *[Signature]*  
 Date:   
 Time:

Delivered By: (Circle One)  
 Sampler - UPS - Bus - Other:   
 Sample Condition:  Cool  Intact  
 Yes  No  
 CHECKED BY: *[Signature]* (Initials)  
 FORM-006 R 20  
 3.8c  
 JC #75

REMARKS:   
 Run the first two horizons if Chlorides exceeds 250mg/kg, Benzene exceeds 10mg/kg, Benzene exceeds 10mg/kg, BTX exceeds 50mg/kg, and TPH exceeds 5000mg/kg. Run next horizon  
 Phone Result:  Yes  No Add'l Phone #:   
 Fax Result:  Yes  No Add'l Fax #:   
 dneel2@concho.com  
 rgrubbs@concho.com



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

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

**BILL TO**

**ANALYSIS REQUEST**

Company Name: COG Operating LLC  
 Project Manager: Robert Grubbs Jr  
 Address: 2208 West Main  
 City: Artesia State: NM Zip: 88210  
 Phone #: 432-661-6601 Fax #: 600 W Illinois  
 Project #: Project Owner: Midland  
 Project Name: Hearse 36 State #006H  
 Project Location: Eddy Co, New Mexico  
 Sampler Name: Rober Grubbs Jr  
 P.O. #: Company: COG Operating LLC  
 Attn: Robert McNeill  
 Address: 600 W Illinois  
 City: Midland  
 State: TX Zip: 79701  
 Phone #: (432) 221-0388  
 Fax #:

Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX							DATE	TIME	BTX	TPH	Chloride
				GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :	ACID/BASE:					
H1602305			1			X					10/11/16	X	X	X	
	T-2 6'		1			X					10/11/16	X	X	X	
	T-2 8'		1			X					10/11/16	X	X	X	
	T-3 0-1'		1			X					10/11/16	X	X	X	
	T-3 2'		1			X					10/11/16	X	X	X	
	T-3 4'		1			X					10/11/16	X	X	X	
	T-3 6'		1			X					10/11/16	X	X	X	
	T-3 8'		1			X					10/11/16	X	X	X	

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Relinquished By: *[Signature]* Date: 10/12/2016  
 Received By: *[Signature]* Date: 11:00  
 Relinquished By: *[Signature]* Date: 11:00  
 Time: 11:00

Delivered By: (Circle One)  UPS  Bus  Other: *3.8c*  
 Sampler - UPS - Bus - Other: *3.8c*  
 Sample Condition:  Cool  Intact  
 CHECKED BY: *[Signature]* (Initials) *3.8c*  
 REMARKS: Run the first two horizons if Chlorides exceeds 250mg/kg, Benzene exceeds 10mg/kg, Benzene exceeds 10mg/kg, BTX exceeds 50mg/kg, and TPH exceeds 5000mg/kg. Run next horizon  
 Phone Result:  Yes  No Add'l Phone #: *dneel2@concho.com*  
 Fax Result:  Yes  No Add'l Fax #: *rgrubbs@concho.com*

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  
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 in accordance with 19.15.29 NMAC.

**Release Notification and Corrective Action**

**OPERATOR**

Initial Report  Final Report

Name of Company:	COG Operating LLC	Contact:	Robert McNeill
Address:	600 West Illinois Avenue, Midland TX 79701	Telephone No.	432-683-7443
Facility Name:	VT 36 STATE #001H	Facility Type:	Flowline
Surface Owner:	State	Mineral Owner:	API No. 30-015-37690

**LOCATION OF RELEASE**

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
D	36	19S	25E	480'	North	330'	West	Eddy

Latitude 32.6227913 Longitude 104.4456329

**NATURE OF RELEASE**

Type of Release:	Produced Water	Volume of Release:	40bbls of Produced Water	Volume Recovered:	0bbls of Produced Water
Source of Release:	4" Balon valve	Date and Hour of Occurrence:	07-06-2016 08:00am	Date and Hour of Discovery:	07-06-2016 08:00am
Was Immediate Notice Given?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Not Required	If YES, To Whom?	Mike Bratcher - NMOCD / Amber Groves - SLO		
By Whom?	Robert Grubbs Jr.	Date and Hour:	7/12/2016 1:36 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.\*

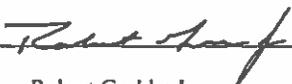
Describe Cause of Problem and Remedial Action Taken.\*

4" Balon valve corroded due to age. The valve was replaced with a new one,

Describe Area Affected and Cleanup Action Taken.\*

This release impacted a 200' x 80' area in the pasture. Concho will have the spill site sampled to delineate any possible contamination from the release and we will present a remediation work plan to the NMOCD for approval prior to any significant remediation work.

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:	Robert Grubbs Jr.	Approved by Environmental Specialist:	
Title:	Senior Environmental Coordinator	Approval Date:	Expiration Date:
E-mail Address:	rgrubbs@concho.com	Conditions of Approval:	
Date:	July 15, 2016	Phone:	432-683-7443
		Attached <input type="checkbox"/>	

\* Attach Additional Sheets If Necessary