



January 4, 2016

Ms. Heather Patterson  
**NMOCD District 2**  
811 S. 1<sup>st</sup> Street  
Artesia, NM 88210

AMARILLO  
921 North Bivins  
Amarillo, Texas 79107  
Phone 806.467.0607  
Fax 806.467.0622

ARTESIA  
408 West Texas Ave.  
Artesia, New Mexico 88210  
Phone 575.746.8768  
Fax 575.746.8905

HOBBS  
318 East Taylor Street  
Hobbs, New Mexico 88240  
Phone 575.393.4261  
Fax 575.393.4658

MIDLAND  
2901 State Hwy 349  
Midland, Texas 79706  
Phone 432.522.2133  
Fax 432.522.2180

OKLAHOMA CITY  
7700 North Hudson Avenue  
Suite 10  
Oklahoma City, Oklahoma 73116  
Phone 405.486.7030  
Fax 806.467.0622

SAN ANTONIO  
11 Commercial Place  
Schertz, Texas 78154  
Phone 210.265.8025  
Fax 210.568.2191

Subject: **Soil Assessment and Remediation Work Plan (Revised)**  
Bridger Logistics, LLC  
Centurion-Pecos River Station: Oxy Unload  
2RP-3323

Dear Ms. Patterson

Centurion Pipeline, LP has contracted Talon/LPE (Talon) to perform remediation services at the Centurion Pecos River Station Oxy Unload Tank Battery. The results of our soil assessment and proposed remediation activities consist of the following.

#### **Background Information**

The Pecos River Station Oxy Unload is located approximately fifteen (15) miles south of Carlsbad, New Mexico. The legal location for this site is Unit Letter L, Section 12, Township 28 South and Range 23 East. More specifically the latitude and longitude for this site are 32.31587 North and -104.04916 West. A site plan is presented in Appendix I.

According to the soil survey provided by the United States Department of Agriculture Natural Resources Conservation Service, the soil in this area is made up of the Pajarito Dune land complex with 0 to 3 percent slopes. Per the New Mexico Bureau of Geology and Mineral Resources, the local surface and shallow geology is comprised of older alluvial deposits of upland plains and piedmont areas. Drainage courses in this area are normally dry. Ground water in the project vicinity is approximately 38-feet below ground surface (bgs) according to the New Mexico Office of the State Engineer. Appendix II.

The ranking for this site is **20** based on the following:

Depth to ground water	<50'
Wellhead Protection Area	>1000'
Distance to surface water body	>1000'

ENVIRONMENTAL CONSULTING  
ENGINEERING  
DRILLING  
CONSTRUCTION  
SPILL MANAGEMENT  
GENERAL CONTRACTING

Toll Free: 866.742.0742  
[www.talonlpe.com](http://www.talonlpe.com)

## Incident Description

Human error caused a tank battery to overflow while a truck was unloading into the tanks. This resulted in a release of approximately 65bbbls of crude oil. All of the fluid was contained within a lined and bermed facility. Vacuum trucks were immediately dispatched to the location to recover the released fluid. They were able to recover approximately 63.5bbbls of crude oil from the containment.

## Remedial Activities

Talon mobilized personnel to conduct a site assessment and to provide emergency remediation of the impacted area. The release was contained within a lined battery. Upon correspondence with NMOCD it was decided that no soil sampling would not be possible without breaching the liner and that the best course of action would be to remove the impacted gravel from the surface of the liner and replace it with clean gravel. Hand excavation activities then commenced within the battery. Once the impacted gravel was removed it was discovered that two holes had previously be cut into the liner, presumably to access the hatches on tanks 1 & 2. Centurion was notified and Talon collected grab soil samples from underneath tanks 1 & 2.

Upon receipt of analytical results from this soil sampling event it was apparent that the soil underneath the tanks was above NMOCD Recommended Remedial Action Levels (RRAL's) for BTEX and TPH. This information was forwarded to NMOCD for review. It was determined that vertical delineation of the impacted soil underneath the battery liner would be required in order to develop a remediation strategy. Due to the existing infrastructure within the tank battery NMOCD agreed that utilizing a backhoe to dig one sample pit between tanks 1 & 2 would be the best option for accessing the vertical impacts at this site. The analytical results from the initial soil sampling event and the vertical delineation are summarized in the table below.

## Laboratory Results

See [Appendix V](#) for complete report of laboratory results.

Sample ID	Depth (feet)	BTEX (mg/kg)	Chlorides (mg/kg)	TPH (mg/kg) GRO	TPH (mg/kg) DRO
TANK 1	N/A	81.4	80	1930	6050
TANK 2	N/A	143	48	3140	6250
S-1	0	6.2	--	139	1360
S-1	1	ND	--	ND	37.5
S-1	2	ND	--	ND	ND
S-1	3	ND	--	ND	ND

(--) Analyte Not Tested

(ND) Analyte Not Detected

Based upon the site ranking of **20**, NMOCD Recommended Remedial Action Levels (RRAL) are 50 mg/kg for BTEX, 10 mg/kg for Benzene, and 100 mg/kg for TPH.

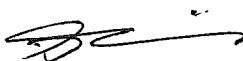
## Proposed Remedial Actions

- The three 500bbl tanks and the associated piping will be removed from the battery.
- The damaged liner will be removed and hauled off for disposal.
- The impacted soil within the battery will be excavated utilizing field PID readings to guide the excavation.
- Once field data indicates that all of the impacted soil has been successfully removed confirmation soil samples will be obtained for laboratory analysis of TPH and BTEX concentrations.
- Upon receipt of analytical results below NMOCD RRAL's, and NMOCD approval the site will be backfilled with caliche and prepared for liner installation.
- A 40-mil liner will be installed to contain future releases.
- Upon completion of the liner installation the battery will be backfilled with gravel and the tanks will be reset and put back into service.

Should you have any questions or if further information is required, please do not hesitate to contact our office at (575)-746-8768.

Respectfully submitted,

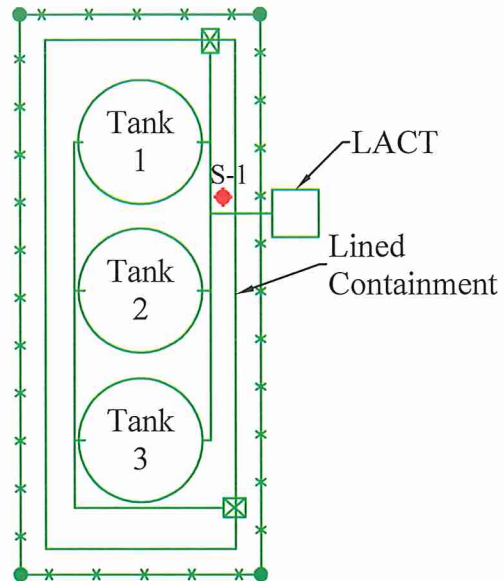
  
Sheldon Hitchcock  
Project Manager

  
David J. Adkins  
District Manager

# SITE PLAN



NM-31



0 15 30  
Scale in Feet

Legend

- Sample Location
- Chain Link Fence



Date: 11/10/2015

Scale: 1" = 30'

Drawn By: TJS

Pecos River Oxy Unload Station  
Bridger Group, LLC  
Eddy County, New Mexico  
Figure 1 - Site Plan

# GROUNDWATER DATA



# New Mexico Office of the State Engineer

## Water Column/Average Depth to Water

(A CLW##### in the POD suffix indicates the POD has been replaced & no longer serves a water right file.)

(R=POD has been replaced, O=orphaned, C=the file is closed)

(quarters are 1=NW 2=NE 3=SW 4=SE)

(quarters are smallest to largest)

(NAD83 UTM in meters)

(In feet)

POD Number	POD Sub-Code	basin	County	Q 64	Q 16	Q 4	Sec	Tws	Rng	X	Y	Distance	Depth Well	Depth Water	Water Column
<a href="#">C 03469 POD1</a>	C	ED		3	4	3	11	23S	28E	588374	3575538	401	68	38	30
<a href="#">C 00315</a>	C	ED		3	1	3	11	23S	28E	587973	3575995*	405	100	45	55
<a href="#">C 03469 POD3</a>	C	ED		3	4	3	11	23S	28E	588381	3575538	408	47		
<a href="#">C 03469 POD2</a>	C	ED		3	4	3	11	23S	28E	588382	3575506	414	48		
<a href="#">C 00235</a>	C	ED			2	2	15	23S	28E	587676	3575280*	431	160		
<a href="#">C 00616</a>		ED		1	3	1	14	23S	28E	587982	3574978*	612	120	30	90
<a href="#">C 00321</a>	C	ED			4	2	15	23S	28E	587679	3574874*	775	120		
<a href="#">C 02503</a>	C	ED			4	2	15	23S	28E	587679	3574874*	775	70	12	58
<a href="#">C 00608</a>	C	ED		3	3	1	11	23S	28E	587970	3576401*	811	200		
<a href="#">C 00269</a>	C	ED		4	4	2	15	23S	28E	587778	3574773*	840	240	35	205
<a href="#">C 00269 CLW199753</a>	O	ED		4	4	2	15	23S	28E	587778	3574773*	840	240	35	205

Average Depth to Water: **32 feet**

Minimum Depth: **12 feet**

Maximum Depth: **45 feet**

Record Count: 11

UTMNAD83 Radius Search (in meters):

Easting (X): 587976

Northing (Y): 3575590

Radius: 1000

\*UTM location was derived from PLSS - see Help

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.

# INITIAL 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

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.

FAB1528630830

Release Notification and Corrective Action

NAB15286331221

OPERATOR

☒ Initial Report ☐ Final Report

Name of Company: Bridger, LLC

896881p

Contact: Angel Lance

Address: 2009 Chenault Drive. ST. 100

Telephone No. 469-744-6152

Facility Name: Pecos River Station Oxy Unload

Facility Type: Tank Battery

Surface Owner: Private

Mineral Owner:

API No.

LOCATION OF RELEASE

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
L	12	28	23					Eddy

Latitude 32.31587 Longitude -104.04916

NATURE OF RELEASE

Type of Release: Crude	Volume of Release: 65bbls	Volume Recovered: 63.5
Source of Release: Tank overflow	Date and Hour of Occurrence: 10/9/15 @ 8:30am	Date and Hour of Discovery: 10/9/15 @ 8:30am
Was Immediate Notice Given? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Not Required	If YES, To Whom? Heather Patterson & Mike Bratcher NMOCD District II	
By Whom? Sheldon Hitchcock-Talon/LPE	Date and Hour: 10/9/15 12:37p	
Was a Watercourse Reached? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If YES, Volume Impacting the Watercourse:	NM OIL CONSERVATION ARTESIA DISTRICT

If a Watercourse was Impacted, Describe Fully.\*

OCT 09 2015

RECEIVED

Describe Cause of Problem and Remedial Action Taken.\*

Human error caused a tank battery to overflow while a truck was unloading into the tanks. Vacuum trucks were immediately dispatched to the location to recover the released fluid. All of the fluid was contained within a lined and bermed facility.

Describe Area Affected and Cleanup Action Taken.\*

The affected area was inside of a lined and bermed tank battery. Vacuum trucks were utilized to recover 63.5bbls of crude from the battery. Soil sampling will not be possible within the facility due to the liner. The gravel in the battery will be removed, hauled to an NMOCD approved solid waste disposal facility and replaced. Once the remediation activities are complete, a final C-141 will be submitted to NMOCD 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.

OIL CONSERVATION DIVISION

Signature: *A. Lance*

Printed Name: Angel Lance

Approved by Environmental Specialist: *[Signature]*

Title: Field Safety Rep.

Approval Date: 10/13/15

Expiration Date: N/A

E-mail Address: alance@bridgergroup.com

Conditions of Approval:  
Remediation per O.C.D. Rules & Guidelines ☐

Date: 10/9/15

Phone: 469-744-6182

SUBMIT REMEDIATION PROPOSAL NO

\* Attach Additional Sheets If Necessary

LATER THAN: 11/13/15

2RP-3323



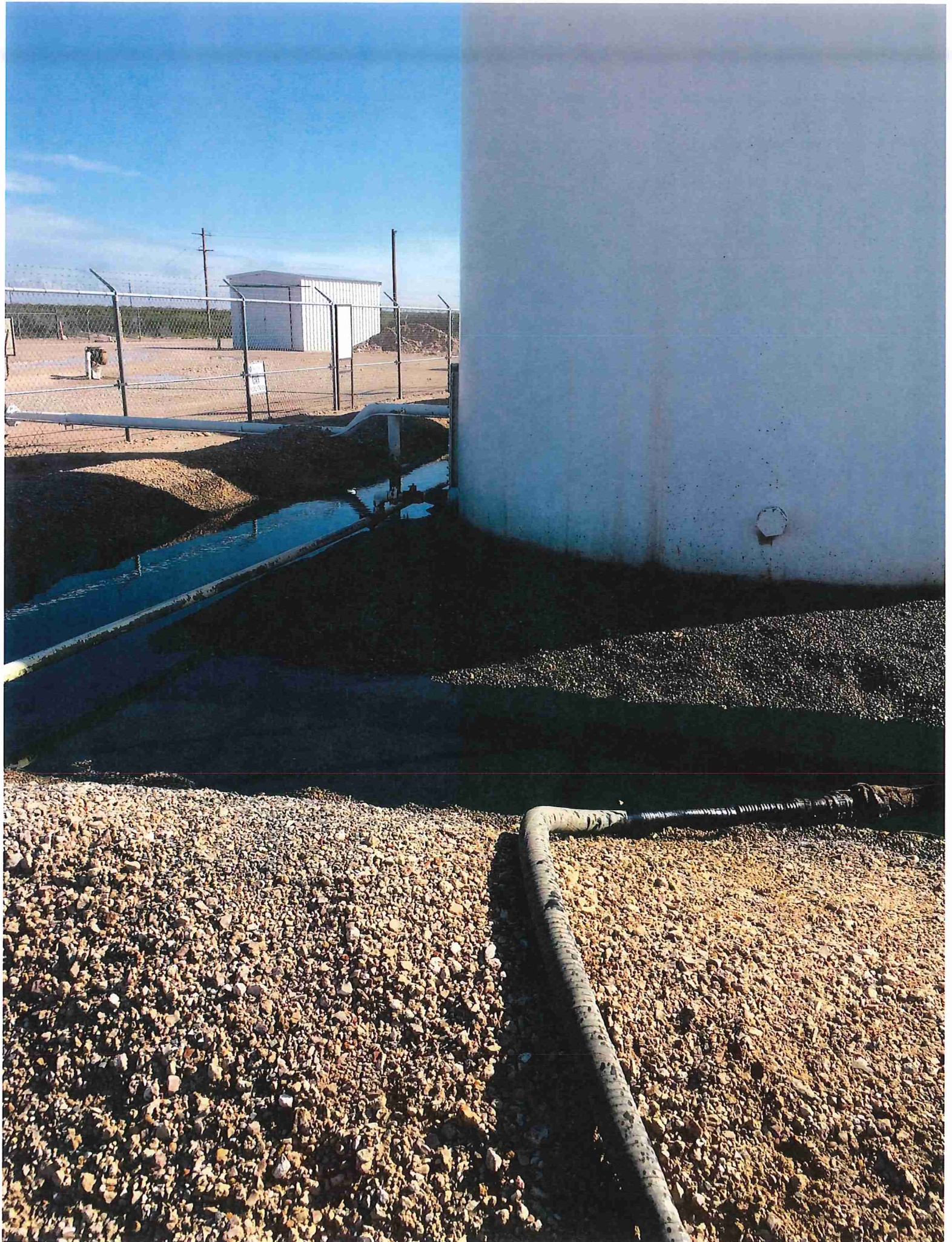
# PHOTOGRAPHIC DOCUMENTATION

**DANGER**  
CONFINED SPACE  
ENTER BY  
PERMIT ONLY

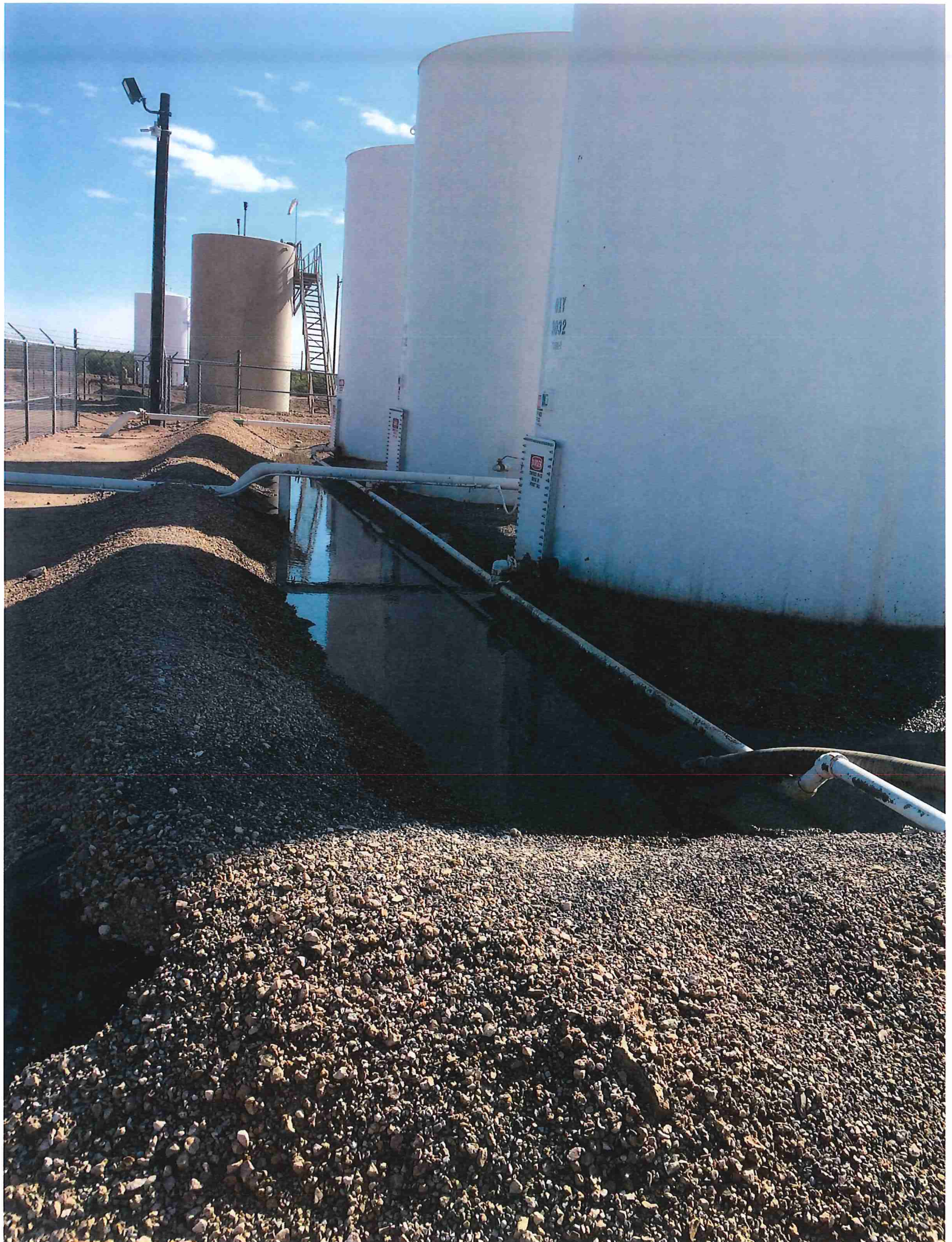


**OXY**  
**UNLOAD STATION**

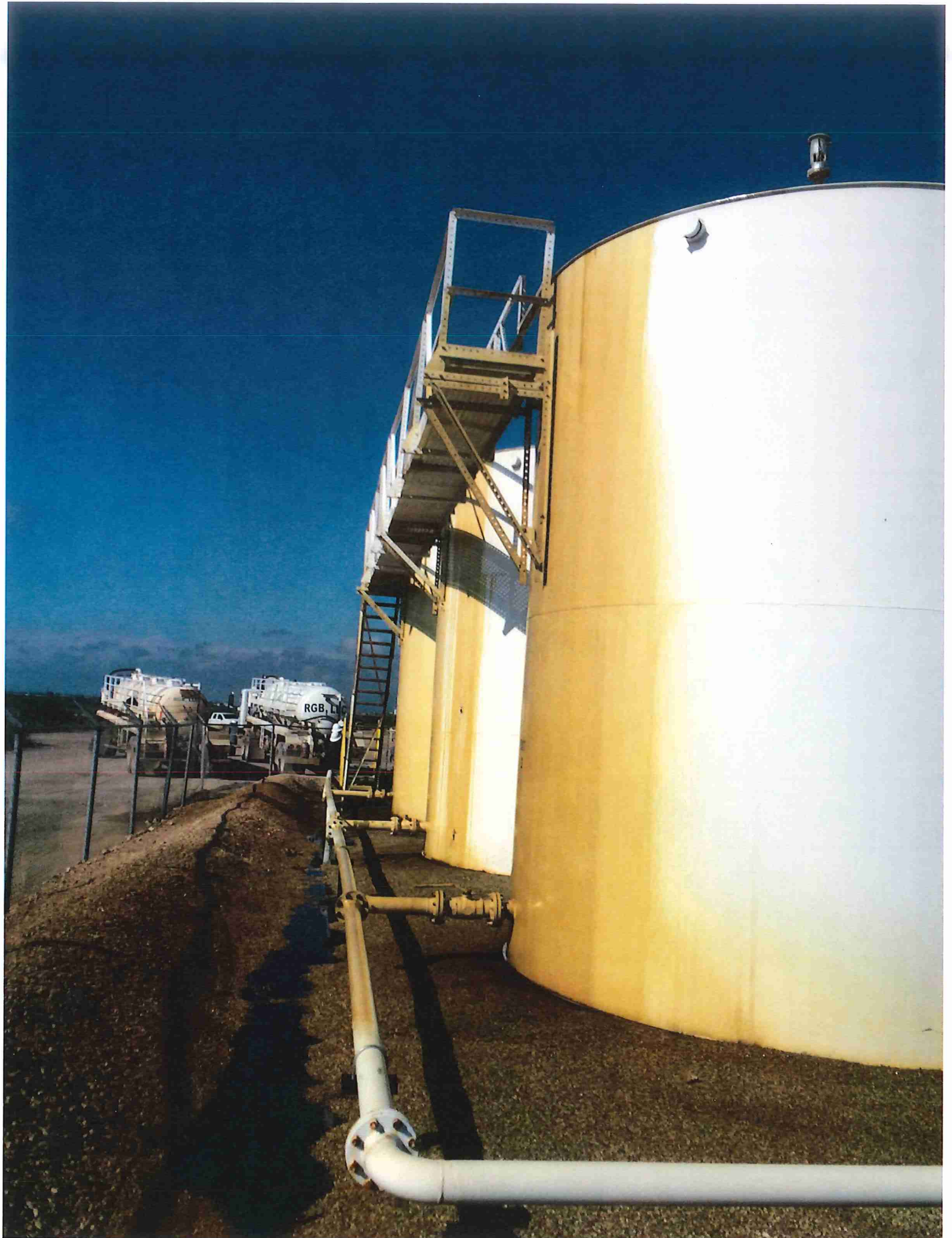








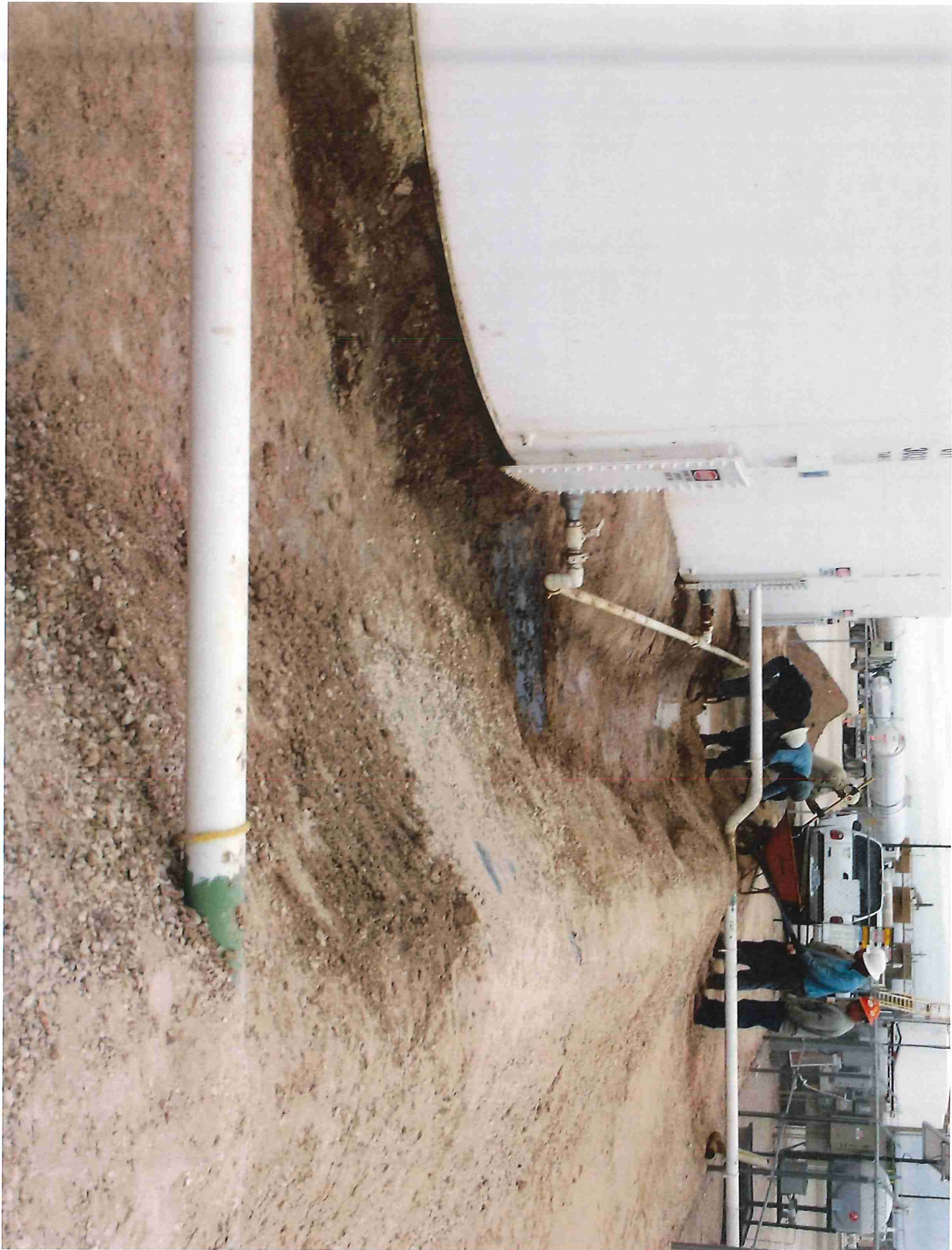
















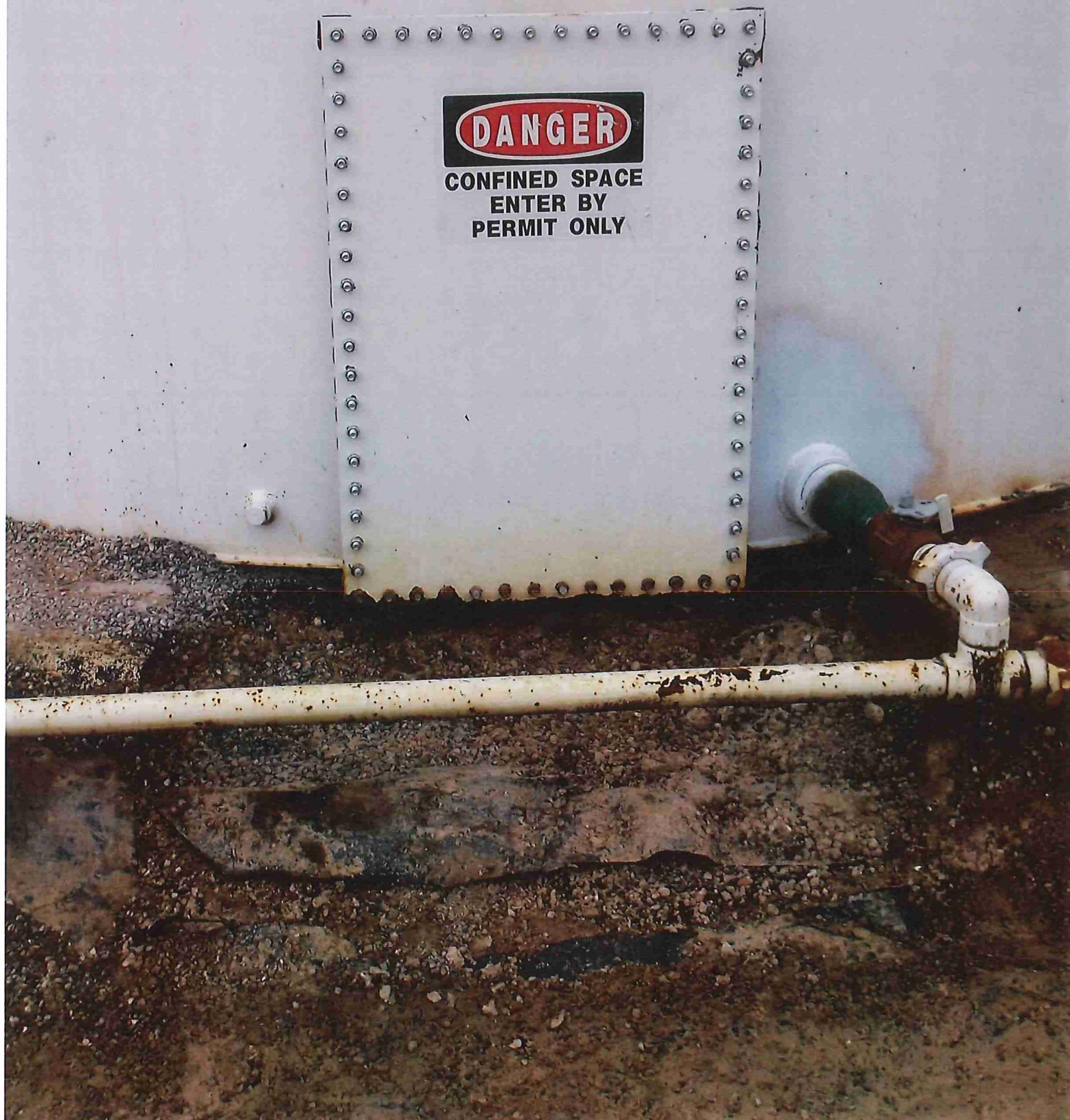






**Smith**  
WELDED TANK

1000 Gallon  
2000 Gallon  
3000 Gallon  
4000 Gallon  
5000 Gallon  
6000 Gallon  
7000 Gallon  
8000 Gallon  
9000 Gallon  
10000 Gallon  
12000 Gallon  
15000 Gallon  
20000 Gallon  
25000 Gallon  
30000 Gallon  
40000 Gallon  
50000 Gallon  
60000 Gallon  
70000 Gallon  
80000 Gallon  
90000 Gallon  
100000 Gallon





**Smith**  
INDUSTRIES

10000 10th Avenue  
St. Louis, MO 63143

**WELDED TASK**

Name: \_\_\_\_\_

Date: \_\_\_\_\_

Welding: \_\_\_\_\_

Grinding: \_\_\_\_\_

Bending: \_\_\_\_\_

Drilling: \_\_\_\_\_

Painting: \_\_\_\_\_

Assembly: \_\_\_\_\_

Signature: \_\_\_\_\_

Date: \_\_\_\_\_

MULTIPLE THICKNESS

Signature: \_\_\_\_\_ Date: \_\_\_\_\_



# LABORATORY RESULTS



PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

---

October 21, 2015

SHELDON HITCHCOCK

TALON LPE

408 W. TEXAS AVE.

ARTESIA, NM 88210

RE: PECOS RIVER STATION: OXY UNLOAD

Enclosed are the results of analyses for samples received by the laboratory on 10/20/15 10:55.

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

Celey D. Keene

Lab Director/Quality Manager

**Analytical Results For:**

 TALON LPE  
 SHELDON HITCHCOCK  
 408 W. TEXAS AVE.  
 ARTESIA NM, 88210  
 Fax To: (575) 745-8905

Received:	10/20/2015	Sampling Date:	10/20/2015
Reported:	10/21/2015	Sampling Type:	Soil
Project Name:	PECOS RIVER STATION: OXY UNLOAD	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	NOT GIVEN		

**Sample ID: TANK 1 (H502732-01)**

BTEX 8021B		mg/L		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	4.43	1.00	10/20/2015	ND	2.04	102	2.00	0.988	
Toluene*	22.9	1.00	10/20/2015	ND	1.86	92.8	2.00	1.59	
Ethylbenzene*	2.82	1.00	10/20/2015	ND	1.84	91.9	2.00	1.91	
Total Xylenes*	51.3	3.00	10/20/2015	ND	6.03	100	6.00	2.01	
Total BTEX	81.4	6.00	10/20/2015	ND					

Surrogate: 4-Bromofluorobenzene (PID) 109 % 66.2-142

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	80.0	16.0	10/20/2015	ND	368	92.0	400	0.00	

TPH 8015M		mg/kg		Analyzed By: MS						S-06
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
GRO C6-C10	1930	50.0	10/20/2015	ND	201	100	200	2.40		
DRO >C10-C28	6050	50.0	10/20/2015	ND	215	107	200	1.74		

Surrogate: 1-Chlorooctane 126 % 47.2-157

Surrogate: 1-Chlorooctadecane 181 % 52.1-176

Cardinal Laboratories

\*=Accredited Analyte

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



Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

 TALON LPE  
 SHELDON HITCHCOCK  
 408 W. TEXAS AVE.  
 ARTESIA NM, 88210  
 Fax To: (575) 745-8905

Received:	10/20/2015	Sampling Date:	10/20/2015
Reported:	10/21/2015	Sampling Type:	Soil
Project Name:	PECOS RIVER STATION: OXY UNLOAD	Sampling Condition:	Cool & Intact
Project Number:	NONE GIVEN	Sample Received By:	Jodi Henson
Project Location:	NOT GIVEN		

**Sample ID: TANK 2 (H502732-02)**

BTEX 8021B		mg/L							
		Analyzed By: MS							
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	2.05	2.00	10/20/2015	ND	2.04	102	2.00	0.988	
Toluene*	34.2	2.00	10/20/2015	ND	1.86	92.8	2.00	1.59	
Ethylbenzene*	13.7	2.00	10/20/2015	ND	1.84	91.9	2.00	1.91	
Total Xylenes*	93.6	6.00	10/20/2015	ND	6.03	100	6.00	2.01	
Total BTEX	143	12.0	10/20/2015	ND					

Surrogate: 4-Bromofluorobenzene (PID) 105 % 66.2-142

Chloride, SM4500Cl-B		mg/kg							
		Analyzed By: AP							
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	48.0	16.0	10/20/2015	ND	368	92.0	400	0.00	

TPH 8015M		mg/kg							
		Analyzed By: MS							
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	3140	50.0	10/20/2015	ND	201	100	200	2.40	
DRO >C10-C28	6250	50.0	10/20/2015	ND	215	107	200	1.74	

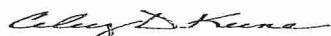
Surrogate: 1-Chlorooctane 136 % 47.2-157

Surrogate: 1-Chlorooctadecane 165 % 52.1-176

Cardinal Laboratories

\*—Accredited Analyte

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



Celey D. Keene, Lab Director/Quality Manager



### 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.
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

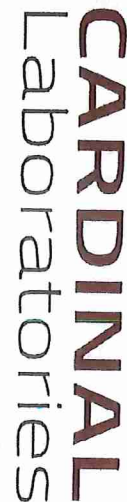
\* = Accredited Analyte

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



---

Celey D. Keene, Lab Director/Quality Manager



## CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Page 5 of 5



PHONE (575) 393-2326 • 101 E. MARLAND • HOBBS, NM 88240

---

November 06, 2015

SHELDON HITCHCOCK

TALON LPE

408 W. TEXAS AVE.

ARTESIA, NM 88210

RE: PECOS RIVER STATION: OXY UNLOAD

Enclosed are the results of analyses for samples received by the laboratory on 10/30/15 15:15.

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

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

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

Accreditation applies to public drinking water matrices.

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

Sincerely,

Celey D. Keene

Lab Director/Quality Manager





PHONE (575) 393-2326 • 101 E. MARLAND • HOBBS, NM 88240

**Analytical Results For:**

TALON LPE  
SHELDON HITCHCOCK  
408 W. TEXAS AVE.  
ARTESIA NM, 88210  
Fax To: (575) 745-8905

Received:	10/30/2015	Sampling Date:	10/30/2015
Reported:	11/06/2015	Sampling Type:	Soil
Project Name:	PECOS RIVER STATION: OXY UNLOAD	Sampling Condition:	Cool & Intact
Project Number:	701834.037.01	Sample Received By:	Celey D. Keene
Project Location:	NOT GIVEN		

**Sample ID: S-1 0' (H502858-01)**

BTEX 8021B		mg/kg		Analyzed By: MS				S-04	
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	0.159	0.050	11/05/2015	ND	2.08	104	2.00	2.22	
Toluene*	0.593	0.050	11/05/2015	ND	2.28	114	2.00	2.94	
Ethylbenzene*	<0.050	0.050	11/05/2015	ND	2.06	103	2.00	3.69	
Total Xylenes*	5.44	0.150	11/05/2015	ND	6.56	109	6.00	3.57	
Total BTEX	6.20	0.300	11/05/2015	ND					

Surrogate: 4-Bromofluorobenzene (PID) 190 % 73.6-140

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	139	10.0	11/04/2015	ND	212	106	200	1.40	
DRO >C10-C28	1360	10.0	11/04/2015	ND	218	109	200	2.41	

Surrogate: 1-Chlorooctane 122 % 35-147

Surrogate: 1-Chlorooctadecane 145 % 28-171

Cardinal Laboratories

\* = Accredited Analyte

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

Celey D. Keene, Lab Director/Quality Manager



PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

**Analytical Results For:**

TALON LPE  
SHELDON HITCHCOCK  
408 W. TEXAS AVE.  
ARTESIA NM, 88210  
Fax To: (575) 745-8905

Received:	10/30/2015	Sampling Date:	10/30/2015
Reported:	11/06/2015	Sampling Type:	Soil
Project Name:	PECOS RIVER STATION: OXY UNLOAD	Sampling Condition:	Cool & Intact
Project Number:	701834.037.01	Sample Received By:	Celey D. Keene
Project Location:	NOT GIVEN		

**Sample ID: S-1 1' (H502858-02)**

BTX 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	11/05/2015	ND	2.08	104	2.00	2.22	
Toluene*	<0.050	0.050	11/05/2015	ND	2.28	114	2.00	2.94	
Ethylbenzene*	<0.050	0.050	11/05/2015	ND	2.06	103	2.00	3.69	
Total Xylenes*	<0.150	0.150	11/05/2015	ND	6.56	109	6.00	3.57	
Total BTX	<0.300	0.300	11/05/2015	ND					

Surrogate: 4-Bromofluorobenzene (PIL) 107 % 73.6-140

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	11/04/2015	ND	212	106	200	1.40	
DRO >C10-C28	37.5	10.0	11/04/2015	ND	218	109	200	2.41	

Surrogate: 1-Chlorooctane 121 % 35-147

Surrogate: 1-Chlorooctadecane 136 % 28-171

Cardinal Laboratories

\*=Accredited Analyte

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

*Celey D. Keene*

Celey D. Keene, Lab Director/Quality Manager

**Analytical Results For:**

TALON LPE  
SHELDON HITCHCOCK  
408 W. TEXAS AVE.  
ARTESIA NM, 88210  
Fax To: (575) 745-8905

Received:	10/30/2015	Sampling Date:	10/30/2015
Reported:	11/06/2015	Sampling Type:	Soil
Project Name:	PECOS RIVER STATION: OXY UNLOAD	Sampling Condition:	Cool & Intact
Project Number:	701834.037.01	Sample Received By:	Celey D. Keene
Project Location:	NOT GIVEN		

**Sample ID: S-1 2' (H502858-03)**

BTX 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	11/05/2015	ND	2.08	104	2.00	2.22	
Toluene*	<0.050	0.050	11/05/2015	ND	2.28	114	2.00	2.94	
Ethylbenzene*	<0.050	0.050	11/05/2015	ND	2.06	103	2.00	3.69	
Total Xylenes*	<0.150	0.150	11/05/2015	ND	6.56	109	6.00	3.57	
Total BTX	<0.300	0.300	11/05/2015	ND					

Surrogate: 4-Bromofluorobenzene (PIL) 107 % 73.6-140

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	11/04/2015	ND	212	106	200	1.40	
DRO >C10-C28	<10.0	10.0	11/04/2015	ND	218	109	200	2.41	

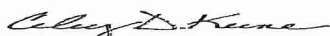
Surrogate: 1-Chlorooctane 115 % 35-147

Surrogate: 1-Chlorooctadecane 130 % 28-171

Cardinal Laboratories

\*=Accredited Analyte

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



Celey D. Keene, Lab Director/Quality Manager



**Analytical Results For:**

TALON LPE  
SHELDON HITCHCOCK  
408 W. TEXAS AVE.  
ARTESIA NM, 88210  
Fax To: (575) 745-8905

Received: 10/30/2015  
Reported: 11/06/2015  
Project Name: PECOS RIVER STATION: OXY UNLOAD  
Project Number: 701834.037.01  
Project Location: NOT GIVEN

Sampling Date: 10/30/2015  
Sampling Type: Soil  
Sampling Condition: Cool & Intact  
Sample Received By: Celey D. Keene

**Sample ID: S-1 3' (H502858-04)**

BTEX 8021B		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	11/05/2015	ND	2.08	104	2.00	2.22	
Toluene*	<0.050	0.050	11/05/2015	ND	2.28	114	2.00	2.94	
Ethylbenzene*	<0.050	0.050	11/05/2015	ND	2.06	103	2.00	3.69	
Total Xylenes*	<0.150	0.150	11/05/2015	ND	6.56	109	6.00	3.57	
Total BTEX	<0.300	0.300	11/05/2015	ND					

Surrogate: 4-Bromofluorobenzene (PIL) 109 % 73.6-140

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10	<10.0	10.0	11/04/2015	ND	212	106	200	1.40	
DRO >C10-C28	<10.0	10.0	11/04/2015	ND	218	109	200	2.41	

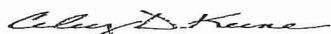
Surrogate: 1-Chlorooctane 115 % 35-147

Surrogate: 1-Chlorooctadecane 129 % 28-171

Cardinal Laboratories

\*=Accredited Analyte

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



Celey D. Keene, Lab Director/Quality Manager

**Notes and Definitions**

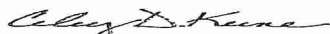
- S-04      The surrogate recovery for this sample is outside of established control limits due to a sample matrix effect.
- ND      Analyte NOT DETECTED at or above the reporting limit
- RPD      Relative Percent Difference
- \*\*      Samples not received at proper temperature of 6°C or below.
- \*\*\*      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

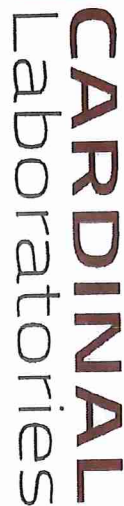
PLEASE NOTE: Liability and Damages. Cardinal's liability and client's exclusive remedy for any claim arising, whether based in contract or tort, shall be limited to the amount paid by client for analyses. All claims, including those for negligence and any other cause whatsoever shall be deemed waived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



---

Celey D. Keene, Lab Director/Quality Manager





## CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

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

Company Name: Talon/LPE Project Manager: S. H. Hunsicker Address: 408 W. Texas Ave. City: Artesia Phone #: 575-746-8768 Project #: 701834, 037, 01 Project Name: <del>Decos</del> Decos River Station 1 Project Location: Sampler Name: S. H. Hunsicker		State: NM zip: 88210 Fax #: 575-746-8905 Project Owner: B. Hunsicker State: Zip: Phone #:		P.O. #: Company: Talon/LPE Attn: Address: City: State: Zip: Phone #:		MATRIX PRESERV SAMPLING		ANALYSIS REQUEST	
---	--	--	--	--	--	-------------------------------	--	------------------	--

[illegible]

**PLEASE NOTE:** Liability and Damages: Customers liability and claims include remedy for any claim arising whether based in contract or tort, shall be limited to the amount paid by the client for the services. All 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 service. In no event shall Cardinal be liable for incidental or consequential damages, including without limitation, business interruption, loss of use, or loss of profits incurred by client, its subsidiaries, franchisees, or affiliates. Cardinal, its franchisees or affiliates shall not be liable for any damages, including without limitation, business interruption, loss of use, or loss of profits incurred by client, its subsidiaries, franchisees, or affiliates, by Cardinal, its franchisees or affiliates using any form of the above stated services or otherwise.

[illegible]

+ Cardinal cannot accept verbal changes. Please fax written changes to (575) 393-2326 #521