

December 10, 2010

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

Mr. Mike Bratcher **NMOCD District 2** 1301 W Grand Avenue Artesia, NM 88210

RECEIVED DEC 16 2010 NMOCD ARTESIA

ARTESIA

408 West Texas Ave. Artesia, New Mexico 88210 Phone 575,746,8768 Fax 575.746.8905

RE: Final Closure Report for the Finney Oil Company Malco #1 Storage Tank Crude Release (Lease # LC 067849) 2RP-398.

AUSTIN

9II West Anderson Lane Suite 202 Austin, Texas 78757 Phone 512.989.3428 Dear Mr.Bratcher,

Fax 512.989.3487

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

> SAN ANTONIO 17170 Jordan Rd

Suite IO2 Selma, Texas 78154 Phone 210.265.8025 Fax 210.568.2191

**TULSA** 525 South Main Street Suite 535 Tulsa, Oklahoma 74103 Phone 918.742.0871 Fax 918.382.0232

Background

On February 6, 2010 a crude oil release was discovered at the Malco #1 storage tank. The leak resulted from a hole in the tank which was subsequently repaired. The property owner, US Bureau of Land Management (BLM) was informed of the release and a C-141 was filed with the New Mexico Oil Conservation Division (NMOCD). The estimated quantity of release was reported as 25.5 barrels, of which nothing was immediately recovered. The resultant spill measured up to 700 feet in length along the larger of the two divergent flow paths, downhill to the north and northwest. The width of the flow paths averaged between 3 feet to 20 feet in width. To minimize the immediate effects of the release, Mr. Finney spread soil and caliches on parts of the flow path to act as an absorbent.

### **Field Activities**

Mr. Finney contacted Talon on March 9, 2010 to request assistance with the remediation activities. Talon subsequently visited the site and then received verbal approval from the NMOCD District 2 office to perform preliminary sampling activities (3/17/10). Talon collected samples along the flow path at depths ranging from 1.5 feet to 3.5 feet below ground surface (bgs). These samples were collected in laboratory provided sample containers, preserved on ice and relinquished to Cardinal Laboratories in Hobbs, NM for analysis of TPH GRO/DRO by SW-846 Method 8015B, BTEX by SW-846 Method 8021, and total chlorides. These analytical results are provided with this letter. Please note that sample point FP-6 is incorrectly identified as a duplicate of FP-5 on the laboratory summary page (i.e. the second FP-5 should be labeled as "FP-6"). This laboratory report was submitted with the original work plan.

While performing the site sampling, Talon identified numerous historic release flow paths from apparent chloride impacts originating from sources not associated with the Malco #1 incident. The Malco #1 release does appear to cross some of these historic flow paths. This is a very old field and exhibits visual evidence of heavy historic chloride impacts in the surrounding terrain. The area is heavily traversed by flow lines and contains many oil production appurtenances.

**ENVIRONMENTAL CONSULTING ENGINEERING** DRILLING CONSTRUCTION SPILL MANAGEMENT

Toll Free: 866,742,0742 www.talonlpe.com

**GENERAL CONTRACTING** 

Based on this visual observation and the background sampling performed by Talon, it appears that Mr. Finney's declaration that the release should have contained little, if any, produced water appears valid.

Analytical results for the sample collected by Mr. Finney from the surface of the flow path (as requested by the BLM - sample I.D. "Tank Battery") indicate a chloride level of 320 mg/kg. Laboratory results from Talon's delineation sampling indicate that only two sample locations exhibited chlorides above 500 mg/kg, and one of these locations (FP-2) was collected outside of the Malco #1 release (between the two flow paths) for use as a background sample. The FP-2 sample indicated very low hydrocarbon content, but elevated chlorides (3,120mg/kg). Additionally, Talon collected three off-site background samples up gradient of the location. Two of these samples (001 and 003) were submitted to the laboratory for chloride analysis. The results indicate background chloride concentrations at 12,400 and 14,000 mg/kg, respectively. This data was submitted with the original work plan.

#### Final Closure Report

Talon mobilized equipment to the Malco Federal #1 site on May 3, 2010. The flow path located north of the Malco tank battery was ripped and then treated using and emulsion of 50 gallons of micro blaze and 1700 gallons of fresh water. The site was monitored over a four (4) month period. Proper notification to witness soil sampling was provided to the NMOCD on August 18, 2010.

On August 20, 2010 a composite soil sample was collected for analytical testing from 0.5 feet to one (1') foot below ground surface (bgs) along the flow path to evaluate the remedial results. This sample was collected in laboratory provided containers, preserved on ice, and relinquished to Cardinal Lab in Hobbs, NM for analysis for TPH GRO/DRO by SW-846 Method 8015B, BTEX by SW-846 8021. Analytical results dated September 1, 2010 are attached.

The analytical results received from Cardinal Lab dated September 1, 2010 reported the TPH to be 4610 mg/kg. BTEX was reported to be <50 mg/kg. The site ranking score for the Malco #1 is 0. The TPH and BTEX as reported by analytical results were under the corrective actions level for this site. Therefore Finney Oil Company respectfully requests closure for the release that occurred on February 6, 2010.

If you have any questions please feel free to call us.

Respectfully Submitted,

Mike Stubblefield Project Manager Talon/LPE – Artesia

# APPENDIX I LABORATORY REPORT



September 01, 2010

**GARY SMITH** 

TALON LPE

408 W. TEXAS AVE.

ARTESIA, NM 88210

RE: MALCO FEDERAL #1

Enclosed are the results of analyses for samples received by the laboratory on 08/20/10 16:47.

Cardinal Laboratories is accredited through Texas NELAP for:

Method SW-846 8021

Benzene, Toluene, Ethyl Benzene, and Total Xylenes

Method SW-846 8260

Benzene, Toluene, Ethyl Benzene, and Total Xylenes

Method TX 1005

Total Petroleum Hydorcarbons

Certificate number T104704398-08-TX. Accreditation applies to solid and chemical materials and non-potable water matrices.

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 (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

Celey D. Keine



#### Analytical Results For:

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

Received:

08/20/2010

Reported:

09/01/2010

Project Name:

MALCO FEDERAL #1

Project Number:

MALCO #1

Project Location:

**EDDY COUNTY** 

Sampling Date:

Sampling Type:

08/20/2010

Sampling Condition:

Soil Cool & Intact

Sample Received By:

Jodi Henson

## Sample ID: COMPOSITE (H020690-01)

BTEX 8021B	mg/	'kg	Analyze	d By: CK							
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier		
Benzene*	<0.050	0.050	08/24/2010	ND	0.810	81.0	1.00	5.27			
Toluene*	<0.050	0.050	08/24/2010	ND	0.860	86.0	1.00	3.68			
Ethylbenzene*	<0.050 0.050		08/24/2010	ND	0.906	90.6	1.00	2.96			
Total Xylenes*	<b>0.383</b> 0.150		08/24/2010	ND	2.65	88.2	3.00	3.89			
Surrogate: 4-Bromofluorobenzene (PIL	94.5	% 80-120									
Chloride, SM4500Cl-B	mg/	/kg	Analyze	d By: HM		<u>.</u>					
Analyte	Result Reporting Limit		Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier		
Chloride	80.0	16.0	08/24/2010	ND	416	104	400	3.77			
трн 8015М	mg/	'kg	Analyze	d By: AB			·····		S-06		
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier		
GRO C6-C10	<50.0	50.0	08/31/2010	ND	187	93.3	200	6.38			
DRO >C10-C28	<b>4610</b> 50.0		08/31/2010	ND	191	95.7	200	6.38			
Surrogate: 1-Chlorooctane	21.4	% 70-130							·		
Surrogate: 1-Chlorooctadecane	26.0	% 70-130									

## Cardinal Laboratories

\*=Accredited Analyte

PLEASE NOTE: Liability and Damages. Cardinal's liability and client's exclusive remoty 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 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 limited to the performance of the services hereunder by Cardinal, regardless of whether such



#### **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-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

Cardinal Laboratories \*=Accredited Analyte

PLEASE NOTE: Liability and Damages. Cardinal's liability and clients 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 claims is based upon any of the above stated reasons or otherwise. Results relate only to the samples identified above. This reproduced except in full with written approval of Cardinal Laboratories.

Celey D. Keine



(575) 393-2326 Fax (575) 393-2476								Page_ /_ of														
Company Name: TaloN/LPE						BILL TO				ANALYSIS REQUEST												
Project Manager: Gary Smith						P.O. #:																
Company Name: TaloN/LPE Project Manager: Gary Smith  Address: 409 Texas Artesia Um 89210					Company: Talou/LpE  Attn: Cary Smith  Address: 408 Texas								}				}	<u> </u>		İ		
City: Artesia State: Zip:						Attn: Gary Smith																
Phone #: 575 - 441 - 7353 Fax #:						Address: 408 Texas							İ									
Project #: Malco #1 Project Owner:						City: Artesia			ĺ									1 1				
Project Name: Males #1						State: NM Zip: 882/0																
Project Location: Eddy County						Phone #: 575-441 1353																
Sampler Name: Gary Smith						Fax #: 575-746-8905							į									
FOR LAB USE ONLY	7		Γ	MAT	RIX	PRESERV. SAMPLING						4										
Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP	# CONTAINERS	GROUNDWATER WASTEWATER SOIL	OIL	OTHER:	ACID/BASE: ICE / COOL	OTHER:	DATE	TIME	CH1	BTEX	Chlorie									
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analyses. All claims includin service. In no event shall Ca	d Damages, Cardina's liability and client's exclusive remedy for g those for negligence and any other cause whatsoever shall be ridinal be liable for incidental or consequental damages, including out of or celated to the performance of sensions becounded by	e deeme ng witho	ed waiv ut limit	ed unless made in ation, business inter	writing and ruptions, I	i receiv oss of	ved by Care use, or los	dinal wi s of pro	ithin 30 days afte afits incurred by o	r completion of the lient, its subsidiari	e applicabl ies,	le		30 days	past due at	the rate of	f 24% per		n the origin	its more that al date of in		
affiliates or successors arising out of or related to the performance of services hereunder by Cardinal, regardless of whether such claim Sampler Relinquished:  Date:  2000 Received By:					acii cialii	Phone Re			sult:			No		Phone	#:							
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Sampler - UPS - Bus - Other:  Cool Intact  Yes V Yes  No  No						s (Initials)																
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† Cardinal cannot accept verbal changes. Please fax written changes to 575-393 2476.