



# AE Order Number Banner

## Report Description

This report shows an AE Order Number in Barcode format for purposes of scanning. The Barcode format is Code 39.



**App Number: pJXK1603348630**

**1RP - 2752**

**SOUTHERN UNION GAS SERVICES LTD**

# *Basin Environmental Service Technologies, LLC*

3100 Plains Highway  
P. O. Box 301  
Lovington, New Mexico 88260  
[jwlowry@basinenv.com](mailto:jwlowry@basinenv.com)  
Office: (575) 396-2378 Fax: (575) 396-1429



Geoff Leking  
New Mexico Energy, Minerals and Natural Resources Department  
New Mexico Oil Conservation Division (District 1)  
1625 French Drive  
Hobbs, New Mexico 88240

Re: Monitor Well Plugging Report  
Line 290 (East of Jal South) (NMOCD Reference # 1RP-11-11-2752)  
Unit Letter D, Section 34, Township 25 South, Range 37 East  
Lea County, New Mexico

HOBBS OCD  
DEC 10 2013  
RECEIVED

Mr. Leking,

This email has been prepared in regard to Regency Field Services, LLC, formerly Southern Union Gas Services' Line 290 (East of Jal South) (1RP-11-11-2752) Historical Remediation Site. The legal description of the release site is Unit Letter "D", Section 34, Township 25 South, Range 37 East, in Lea County, New Mexico. The property affected by the release is owned by George Willis. The release site GPS coordinates are 32° 05.467' North and 103° 09.406' West. The inferred depth to groundwater was 80-85' bgs prior to the installation of the monitor well. Please reference the attached Site Location Map.

On October 26, 2011, Southern Union discovered a release had occurred on the Line #290 pipeline. Failure of a section of the twelve inch (12") steel, high-pressure natural gas pipeline resulted in the release of approximately twenty barrels (20 bbls) of a mixture of natural gas, crude oil, and produced water. During initial response activities, the pipeline was fitted with a temporary clamp to mitigate the release. Following initial response activities, the affected pipeline segment was replaced with twelve inch (12") steel pipe. The release was reported to the NMOCD Hobbs District Office on November 3, 2011. The "Release Notification and Corrective Action" (Form C-141) indicated the release affected an area measuring approximately 350' in length and approximately 5' to 10' in width.

On May 2, 2012, following NMOCD approval of the *Risk-Based Site Closure Proposal*, Basin began remediation activities at the release site. The excavation floor was advanced and leveled at approximately ten feet (10') bgs, pending the installation of an NMOCD approved twenty (20) mil polyurethane liner. The excavation sidewalls were advanced until laboratory analytical results from confirmation soil samples indicated benzene, BTEX, TPH and chloride concentrations were below NMOCD regulatory standards. Excavated material was stockpiled on-site pending final disposition. Please reference the *Remediation Summary, Risk-Based Soil Closure Request & Groundwater Investigation Proposal* dated June 2012 for details of remediation activities.

Between May 2 and May 18, 2012, approximately 2,700 yd<sup>3</sup> of impacted material was transported to Sundance Services, Inc. (NMOCD Permit #NM-01-0003), for disposal.

On May 21, 2012, a twenty (20) mil polyurethane liner was installed on the floor of the excavation at approximately ten feet (10') bgs. Approximately one foot (1') of non-impacted pad sand was installed both above and below the liner to protect the liner from damage during installation and backfilling activities. The liner was fitted with 8" PVC conduit in three (3) locations to allow for the installation of groundwater monitor wells without compromising the integrity of the liner.

From May 21 through May 25, 2012, the excavation was backfilled with non-impacted material purchased from the landowner. Backfill was compacted in 18" lifts and contoured to fit the surrounding topography. The final dimensions of the excavation were approximately three hundred feet (300') in length, ranging in width from approximately 12' to approximately 45', and approximately 10' in depth.

Remediation activities conducted at the Line #290 (East of Jal South) release site met the objectives set forth in the *Remediation Summary & Risk-Based Site Closure Proposal* dated April 2012. A *Remediation Summary, Risk Based Soil Closure Request & Groundwater Investigation Proposal* was submitted to the NMOCD and subsequently approved.

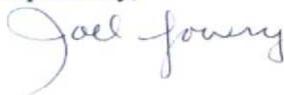
On September 4, 2012, in accordance with the Groundwater Investigation portion of the approved proposal, a monitor well (MW-1) was installed in the western portion of the release site in the area defined by soil sample Sample #3. Considerable time was given to allow for the monitor well to make water. It was allowed to remain undisturbed overnight to determine whether groundwater had been reached. Subsequent gauging determined that the monitor well was dry.

Between September 5, 2012, and July 23, 2013, as per the NMOCD, monitor well MW-1 was gauged monthly to check for the presence of groundwater. Monthly gauging of the onsite monitor well indicated there was no groundwater within the red, silty clay zone that characterized the subsurface at the Line 290 East of Jal South release site.

On September 27, 2013, upon receiving NMOCD and NMOSE approval, monitor well MW-1 was plugged and abandoned by a licensed driller in accordance with NMAC 19.27.4. Please see the attached Plugging Record and Photographs.

If you have any questions or would like any additional information, please feel free to contact me by phone or email. Thanks.

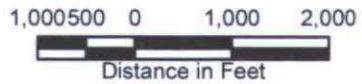
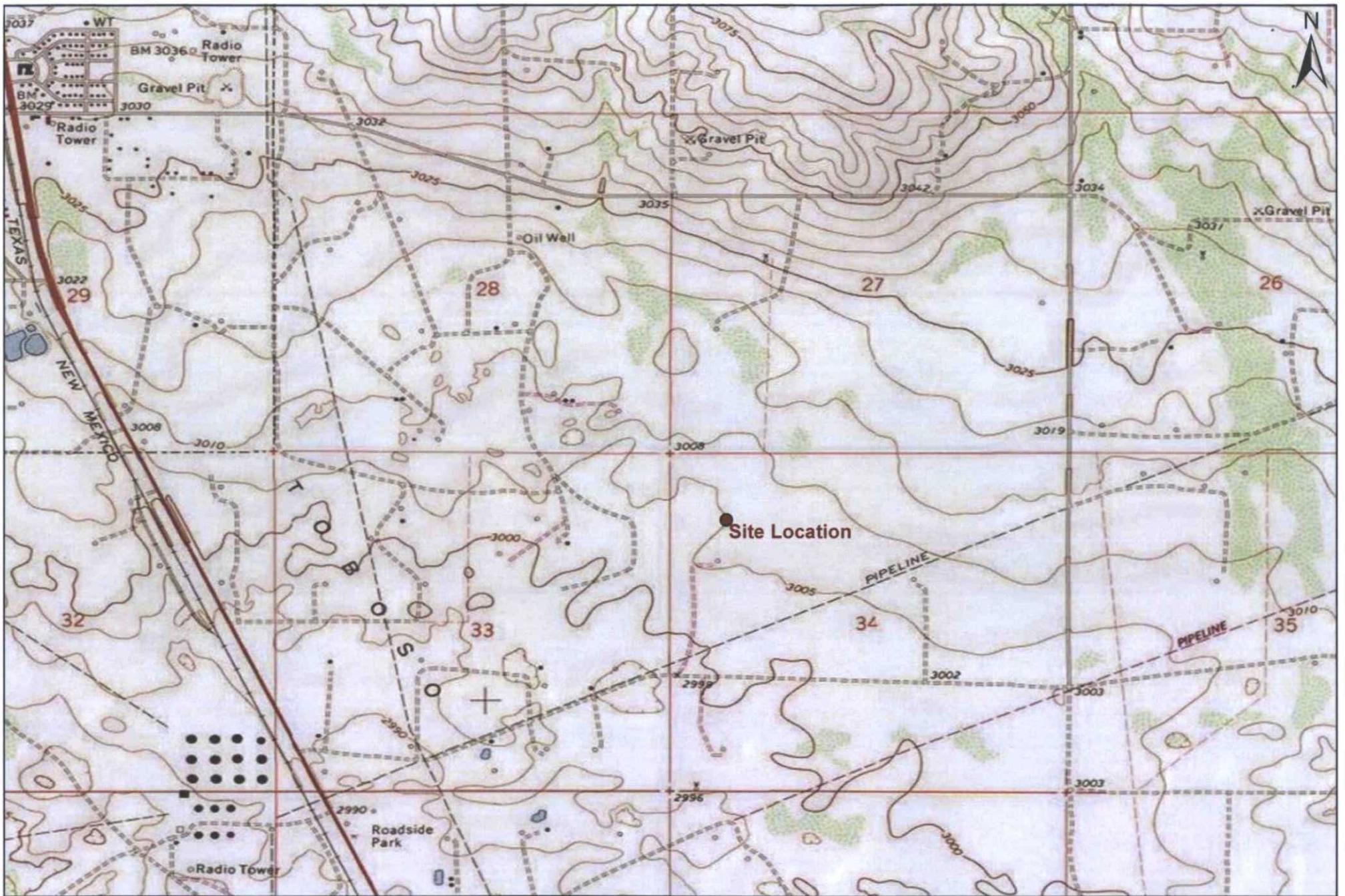
Respectfully,



Joel W. Lowry

Attachments:

- Attachment #1: Site Location Map
- Attachment #2: Soil Bore/Monitor Well Logs
- Attachment #3: NMOSE Plugging Record
- Attachment #4: Photographs



**Figure 1**  
**Site Location Map**  
 Southern Union Gas Services  
 Line #290 (East of Jal South)  
 Lea County, New Mexico  
 NMOCD Ref. #: 1RP-11-11-2752

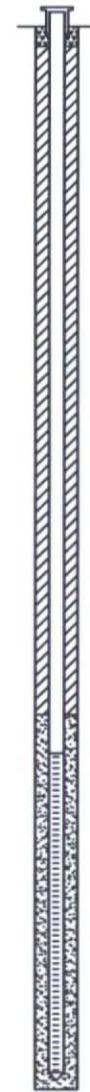


Basin Environmental Service Technologies, LLC  
 3100 Plains Hwy.  
 Lovington, NM 88260

Drawn By: BJA	Checked By: BRB
May 21, 2012	Scale: 1" = 2000'

# Soil Boring/Monitor Well Log MW-1

Depth Below Ground Surface	Soil Column	Chloride Field Test	PID Reading	Petroleum Odor	Petroleum Stain	Soil Description
0 - 10'						Backfill
10' - 12'						Tan fine sand
12' - 18'		<112	1,700	Strong	None	Red fine silty sand
18' - 26'		<112	1,700	Strong	None	Tan silty sand
26' - 54'		<112	504	Strong	None	Tan silty sand w/ sandstone
			760	Strong	None	
			550	Moderate	None	
			852	Moderate	None	
			102	Slight	None	54' - 80' Tan silty sand (sugar sand)
			1,110	Strong	None	
		<112	160	Moderate	None	
			170	Moderate	None	80' - 85' Red silty sand w/ clay
85' - 110'						Red silty clay



Date Drilled September 4, 2012  
 Thickness of Bentonite Seal 71 Ft  
 Depth of Exploratory Boring 110 Ft bgs  
 Depth to Groundwater 85 Ft bgs  
 Ground Water Elevation \_\_\_\_\_

- Indicates the PSH level measured on \_\_\_\_\_
- Indicates the groundwater level measured on \_\_\_\_\_
- Indicates samples selected for Laboratory Analysis.
- PID Head-space reading in ppm obtained with a photo-ionization detector.
- Grout Surface Seal
- Bentonite Pellet Seal
- Sand Pack
- Screen

### Completion Notes

- 1.) Monitor Well MW-1 was advanced through an established 8" PVC conduit to maintain the integrity of a 20-mil poly liner installed within the excavation at 10' bgs.
- 2.) Monitor well was advanced on date using air rotary drilling techniques.
- 3.) Monitor well was constructed with 2" ID, 0.10-inch factory slotted, threaded joint, Schedule 40 PVC pipe.
- 4.) Well is protected with a locked stick-up steel cover and compression cap.
- 5.) Lines between material types shown on the profile log represent approximate boundaries. Actual transitions may be gradual.
- 6.) Depths indicated are referenced from ground surface.
- 7.) Borehole began to collapse at approximately 80' bgs. Fresh water was injected to maintain the integrity of the borehole.

**Soil Boring/  
Monitor Well Log MW-1**

Southern Union Gas Services  
 Line 290 (East of Jal South)  
 Lea County, New Mexico  
 NMOCD Reference #: 1RP-11-11-2752

Basin Environmental Service Technologies, LLC  
 3100 Plains Hwy.  
 Lovington, NM 88260

Prep By: JWJ	Checked By: BRB
September 5, 2012	



# PLUGGING RECORD



**NOTE: A Well Plugging Plan of Operations shall be approved by the State Engineer prior to plugging - 19.27.4 NMAC**

## I. GENERAL / WELL OWNERSHIP:

State Engineer Well Number: Line #290 MW-1

Well owner: Southern Union Gas Services Phone No.: \_\_\_\_\_

Mailing address: 801 SOUTH LOOP 464

City: MONAHANS State: TX Zip code: 79756

## II. WELL PLUGGING INFORMATION:

1) Name of well drilling company that plugged well: STRAUB CORPORATION

2) New Mexico Well Driller License No.: WD-1711 Expiration Date: JUNE 2015

3) Well plugging activities were supervised by the following well driller(s)/rig supervisor(s): EDWARD BRYAN

4) Date well plugging began: 9-27-13 Date well plugging concluded: 9-27-13

5) GPS Well Location: Latitude: 32 deg, 05 min, 27 sec  
Longitude: 103 deg, 09 min, 26 sec, WGS 84

6) Depth of well confirmed at initiation of plugging as: \_\_\_\_\_ ft below ground level (bgl),  
by the following manner: MEASURING TAPE

7) Static water level measured at initiation of plugging: 114 ft bgl

8) Date well plugging plan of operations was approved by the State Engineer: 7-31-13

9) Were all plugging activities consistent with an approved plugging plan? YES If not, please describe differences between the approved plugging plan and the well as it was plugged (attach additional pages as needed):

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10) Log of Plugging Activities - Label vertical scale with depths, and indicate separate plugging intervals with horizontal lines as necessary to illustrate material or methodology changes. Attach additional pages if necessary.

For each interval plugged, describe within the following columns:

Depth (ft bgl)	Plugging Material Used (include any additives used)	Volume of Material Placed (gallons)	Theoretical Volume of Borehole/ Casing (gallons)	Placement Method (tremie pipe, other)	Comments ("casing perforated first", "open annular space also plugged", etc.)
0	CEMENT 1	3.6 CU FT	2.07 CU FT	TREMIE PIPE	PLUGGED IN PLACE
114'					

MULTIPLY	BY	AND OBTAIN
cubic feet x	7.4805	= gallons
cubic yards x	201.97	= gallons

**III. SIGNATURE:**

I, \_\_\_\_\_, say that I am familiar with the rules of the Office of the State Engineer pertaining to the plugging of wells and that each and all of the statements in this Plugging Record and attachments are true to the best of my knowledge and belief.

  
 \_\_\_\_\_  
 Signature of Well Driller

10-2/13  
 \_\_\_\_\_  
 Date

