

INSPECTOR

DEC 29 1997

Approved

Meter Number:83105

Location Name:EBU #113

Location:TN-24 RG-10

SC-12 UL-H

4 - Fee

NMOCD Zone:OUTSIDE

Hazard Ranking Score:00

RECEIVED
APR 14 1997

OIL CON. DIV.
DIST. 3

**RATIONALE FOR RISK-BASED CLOSURE OF PRODUCTION PITS
LOCATED OUTSIDE OF THE VULNERABLE ZONE
IN THE SAN JUAN BASIN**

This production pit location was ranked according to the criteria in the New Mexico Oil Conservation Division's Unlined Surface Impoundment Closure Guidelines and received a ranking score of zero. The estimated depth to groundwater is greater than 100-feet beneath ground surface (bgs), the pit is not in a well head protection area, and there are no surface water bodies within 1,000 horizontal feet of the pit location.

The primary source, discharge to the pit has been removed. There has been no discharge to the pits for at least 4 years and the pits have been closed for at least one year.

Each pit was backfilled with clean soil and graded in a manner to divert precipitation away from the excavated area. Minimal infiltration of rainfall is expected. Any rainfall that does infiltrate the ground surface must migrate through clean backfill before reaching the residual hydrocarbons.

There is no source material at the ground surface, so direct contact of hydrocarbons with livestock and the populous is not likely.

In general, outside of the vulnerable area and alluvial valleys, bedrock material is generally encountered within 20 feet of the ground surface. Bedrock material in the San Juan Basin consists of interbedded sandstones, shales and clays. According to Freeze and Cherry, 1979, the hydraulic conductivity of the bedrock material are as follows:

Sandstone	10^{-9} to 10^{-13} cm/sec
Shale	10^{-12} to 10^{-16} cm/sec
Clay	10^{-12} to 10^{-15} cm/sec

Based on this information, the residual hydrocarbons should not migrate to groundwater.

Natural process (bioremediation) are degrading the residual hydrocarbon to carbon dioxide and water and will continue until the source is gone, therefore minimizing any impact to the environment.

Based on the above information, it is highly unlikely that any source material will impact groundwater or ever find an exposure pathway to affect human health and therefore El Paso Field Services Company (EPFS) requests closure of this pit location.



Meter: 83105 Location: EBU #113
Operator #: _____ Operator Name: SKULLY OIL CO. P/L District: BALLARD
Coordinates: Letter: H Section 12 Township: 24 Range: 10
Or Latitude _____ Longitude _____
Pit Type: Dehydrator _____ Location Drip: X Line Drip: _____ Other: _____
Site Assessment Date: 1-19-95 Area: 11 Run: 21

NMOCD Zone: (From NMOCD Maps)

Land Type:

Inside	<input type="checkbox"/> (1)	BLM	<input type="checkbox"/> (1)
Outside	<input checked="" type="checkbox"/> (2)	State	<input type="checkbox"/> (2)
		Fee	<input checked="" type="checkbox"/> (3)
		Indian	_____

Depth to Groundwater

Less Than 50 Feet (20 points)	<input type="checkbox"/> (1)
50 Ft to 99 Ft (10 points)	<input type="checkbox"/> (2)
Greater Than 100 Ft (0 points)	<input checked="" type="checkbox"/> (3)

Wellhead Protection Area :

Is it less than 1000 ft from wells, springs, or other sources of fresh water extraction? , or ; Is it less than 200 ft from a private domestic water source? ☐ (1) YES (20 points) ☒ (2) NO (0 points)

Horizontal Distance to Surface Water Body

Less Than 200 Ft (20 points)	<input type="checkbox"/> (1)
200 Ft to 1000 Ft (10 points)	<input type="checkbox"/> (2)
Greater Than 1000 Ft (0 points)	<input checked="" type="checkbox"/> (3)

Name of Surface Water Body _____

(Surface Water Body : Perennial Rivers, Major Wash, Streams, Creeks, Irrigation Canals, Ditches, Lakes, Ponds)

Distance to Nearest Ephemeral Stream ☐ (1) < 100' (Navajo Pits Only)

☐ (2) > 100'

TOTAL HAZARD RANKING SCORE: 0 POINTS

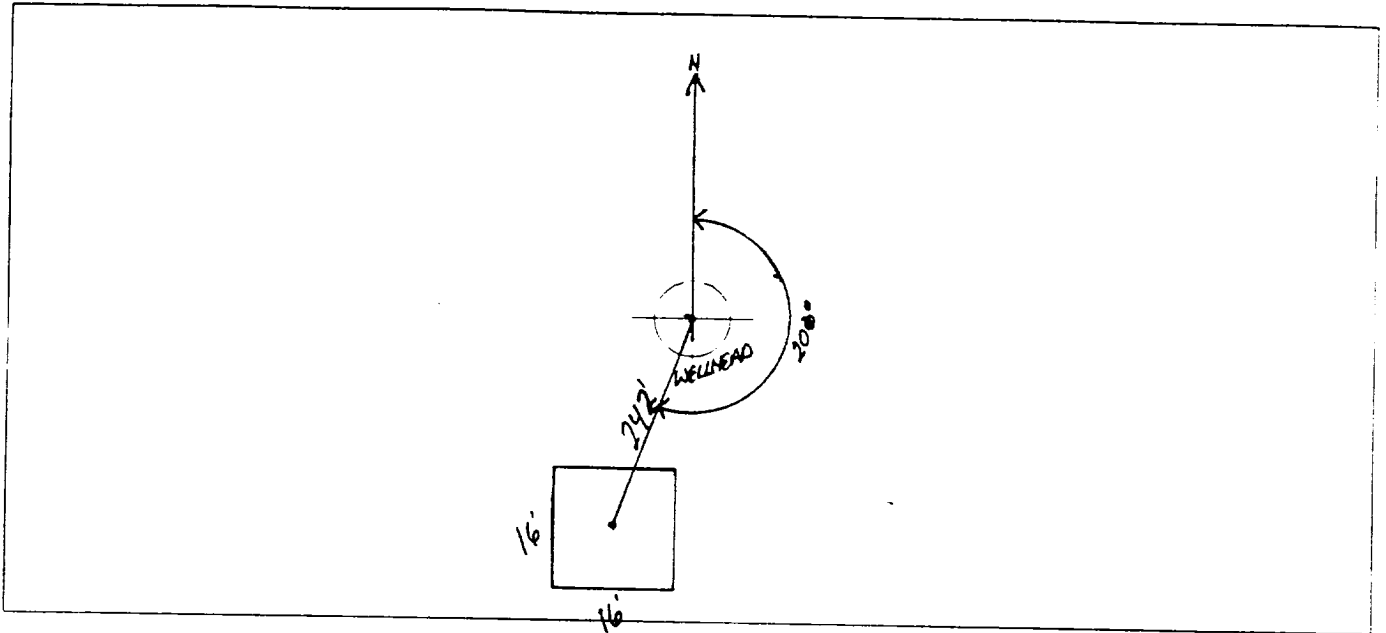
Remarks : REDLINE : TOPO SHOW LOCATION OUTSIDE V.Z. ONLY PIT ON LOCATION.
BELONGS TO EPNG. WILL CLOSE PIT. LOCATION IS ABANDONED.

PUSH IN

ORIGINAL PIT LOCATION

Original Pit : a) Degrees from North 200° Footage from Wellhead 242'
b) Length : 16' Width : 16' Depth : 2'

ORIGINAL PIT LOCATION



Remarks :

PHOTOS- 8959

REMARKS

Completed By:

Robert Thompson

Signature

1.19.95

Date

FIELD PIT REMEDIATION/CLOSURE FORM

GENERAL	<p>Meter: <u>83105</u> Location: <u>EBU# 113</u></p> <p>Coordinates: Letter: <u>H</u> Section <u>12</u> Township: <u>24</u> Range: <u>10</u></p> <p>Or Latitude _____ Longitude _____</p> <p>Date Started : <u>2-10-95</u> Run: <u>11</u> <u>21</u></p>
FIELD OBSERVATIONS	<p>Sample Number(s): <u>MK375</u></p> <p>Sample Depth: <u>9</u> Feet</p> <p>Final PID Reading <u>235</u> PID Reading Depth <u>9</u> Feet</p> <p style="text-align: center;">Yes No</p> <p>Groundwater Encountered <input type="checkbox"/> <input checked="" type="checkbox"/> Approximate Depth _____ Feet</p>
CLOSURE	<p>Remediation Method :</p> <p>Excavation <input type="checkbox"/> Approx. Cubic Yards _____</p> <p>Onsite Bioremediation <input type="checkbox"/></p> <p>Backfill Pit Without Excavation <input checked="" type="checkbox"/></p> <p>Soil Disposition:</p> <p>Envirotech <input type="checkbox"/> Tierra <input type="checkbox"/></p> <p>Other Facility <input type="checkbox"/> Name: _____</p> <p>Pit Closure Date: <u>2-10-95</u> Pit Closed By: <u>BEI</u></p>
REMARKS	<p>Remarks : <u>Arrived dug sample hole. pit had about 1' of water</u> <u>oil on it it rock 9' soil gray strong Hydrocarbon</u> <u>odor</u></p>
	<p>Signature of Specialist: <u>Morgan Killian</u></p>



FIELD SERVICES LABORATORY

ANALYTICAL REPORT

PIT CLOSURE PROJECT - Soil Samples Outside the GWV Zone

SAMPLE IDENTIFICATION

	Field ID	Lab ID
SAMPLE NUMBER:	ML 375	946665
MTR CODE SITE NAME:	83105	N/A
SAMPLE DATE TIME (Hrs):	2-10-95	1140
SAMPLED BY:	N/A	
DATE OF TPH EXT. ANAL.:	2/17/95	2/17/95
DATE OF BTEX EXT. ANAL.:	N/A	N/A
TYPE DESCRIPTION:	VG	Brown clay w/sand

REMARKS: Analysis done at AT 1

RESULTS

PARAMETER	RESULT	UNITS	QUALIFIERS			
			DF	Q	M(g)	V(ml)
TPH (418.1)	51000	MG/KG				
HEADSPACE PID	235	PPM				
PERCENT SOLIDS	87.0	%				

-- TPH is by EPA Method 418.1 --

Narrative:

DF = Dilution Factor Used

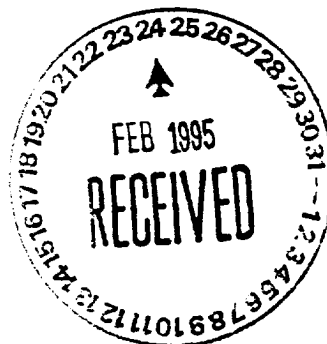
Approved By: J.S.

Date: 3-20-95



Analytical **Technologies**, Inc.

2709-D Pan American Freeway NE Albuquerque NM 87107
Phone (505) 344-3777 FAX (505) 344-4413



ATI I.D. 502381

February 23, 1995

El Paso Natural Gas Co.
P. O. Box 4990
Farmington, NM 87499

Project Name/Number: PIT CLOSURE 24324

Attention: John Lambdin

On 02/17/95, Analytical Technologies, Inc., (ADHS License No. AZ0015), received a request to analyze **non-aqueous** samples. The samples were analyzed with EPA methodology or equivalent methods. The results of these analyses and the quality control data, which follow each set of analyses, are enclosed.

EPA Method 8020 analyses were added on February 21, 1995 for samples 946659, 946660, 946661, 946662, 946663, 946664, 94666, 946667, 946668, 946669, 946680, 946682 per John Lambdin.

If you have any questions or comments, please do not hesitate to contact us at (505) 344-3777.

Letitia Krakowski, Ph.D.
Project Manager

H. Mitchell Rubenstein, Ph.D.
Laboratory Manager

MR:jt

Enclosure

GENERAL CHEMISTRY RESULTS

CLIENT : EL PASO NATURAL GAS CO. ATI I.D. : 502381
PROJECT # : 24324 DATE RECEIVED : 02/17/95
PROJECT NAME : PIT CLOSURE DATE ANALYZED : 02/17/95

PARAMETER	UNITS	05	06	07	08
PETROLEUM HYDROCARBONS, IR	MG/KG	<20	3900	72	51000

944665