

District I  
P.O. Box 1989 Hobbs, NM

District II  
P.O. Drawer DD, Artesia, NM, 88221

District III  
1000 Rio Brazos Rd, Aztec, NM 87410

*Donna E. Faust*  
DISTRICT OIL & GAS INSPECTOR

State of New Mexico  
Energy, Minerals and Natural Resources Department

SUBMIT 1 COPY TO  
APPROPRIATE  
DISTRICT OFFICE  
AND 1 COPY TO  
SANTA FE OFFICE

MAR 28 1997

OIL CONSERVATION DIVISION

2040 South Pacheco Street  
Santa Fe, New Mexico 87505

*Approved*  
**PIT REMEDIATION AND CLOSURE REPORT**

**Operator:** PNM Gas Services (Meridian) **Telephone:** 324-3764

**Address:** 603 W. Elm Street Farmington, NM 87401

**Facility or Well Name:** Zachry #16E

**Location:** Unit: P Sec. 33 T. 29 N R. 10 W County San Juan

**Pit Type:** Separator ☐ Dehydrator ☐ Other No PNM Equipment

**Land Type:** BLM ☒ State ☐ Fee ☐ Other ☐

**Pit Location:** Pit dimensions: length 20 width 20 depth 4

(Attach diagram) Reference: wellhead ☒ other ☐

Footage from reference: 115'

Direction from reference: 60 Degrees ☐ East ☐ North ☐  
☒ West of ☒ South

**Depth to Ground Water:** Less than 50 feet (20 points)  
50 feet to 99 feet (10 points)  
Greater than 100 feet (0 points) 0

(Vertical distance from contaminants to seasonal high water elevation of ground water)

**Wellhead Protection Area:** Yes (20 points)  
No (0 points) 0

(Less than 200 feet from a private domestic water source, or; less than 1,000 feet from all other water sources)

**Distance to Surface Water:** Less than 200 feet (20 points)  
200 feet to 1,000 feet (10 points)  
Greater than 1,000 feet (0 points) 0

(Horizontal distance to perennial lakes, ponds, rivers, streams, creeks, irrigation canals and ditches)

**RANKING SCORE (TOTAL POINTS):** 0

**Date Remediation Started:**

8/28/96

**Date Completed:**

8/30/96

**Remediation Method:**

Excavation

☒

Approx. Cubic Yard

291

(Check all appropriate sections)

Landfarmed

☒

Amount Landfarmed (cubic yds)

261

Other

**Remediation Location:**

Onsite

☒

Offsite

(i.e., landfarmed onsite, name and location of offsite facility)

**Backfill Material Location:****General Description of Remedial Action:**

Excavated contaminated soil to pit size of 23'x18'x19' and landfarmed soil onsite within a bermed area at a depth of 6" to 12". Soil was aerated by plowing/disking until soil met regulatory levels.

**Ground Water Encountered:**

No

☒

Yes

Depth

**Final Pit Closure Sampling:**

Sample Location

5 pt composite-4 side walls and center of pit bottom

(if multiple samples, attach sample result and diagram of sample locations and depths.)

Sample depth

19'

Sample date

8/28/96

Sample time

3:00:00 PM

Sample Results

Benzene (ppm)

0.1062

Total BTEX (ppm)

4.9925

Field headspace (ppm)

TPH

26.9

Method

8015A

Vertical Extent (ft)

Risk Assessment form attached

Yes

No

☒**Ground Water Sample:**

Yes

No

☒

(If yes, attach sample results)

I HEREBY CERTIFY THAT THE INFORMATION ABOVE IS TRUE AND COMPLETE TO THE BEST OF MY KNOWLEDGE AND MY BELIEF

DATE

January 22, 1997

SIGNATURE

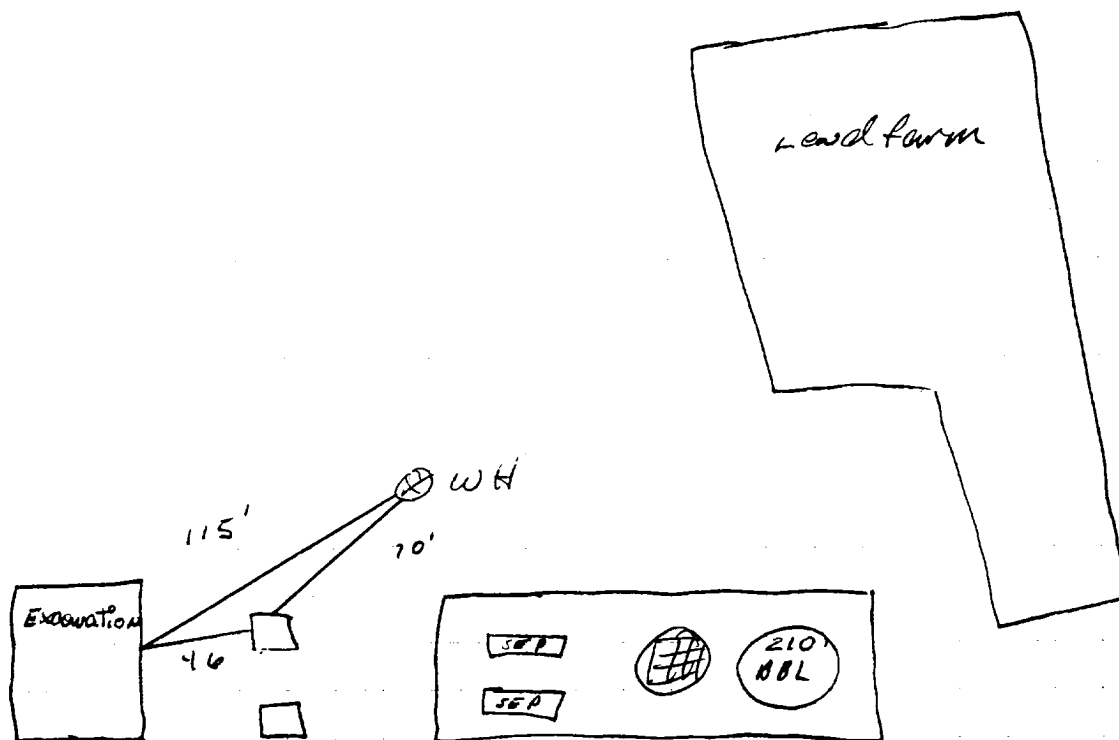
*Denver Bearden*PRINTED NAME  
AND TITLE

Denver Bearden

Administrator III

Zachry #16E

↑  
N



OFF: (505) 325-5667



LAB: (505) 325-1556

### *Diesel Range Organics*

Attn: *Denver Bearden*  
Company: *PNM Gas Services*  
Address: *603 W. Elm*  
City, State: *Farmington, NM 87401*

Date: *3-Sep-96*  
COC No.: *4957*  
Sample No.: *11945*  
Job No.: *2-1000*

Project Name: *PNM Gas Services - Zachry #16E*  
Project Location: *9608281500; Pit Excavation Composite Sample*  
Sampled by: *RH* Date: *28-Aug-96* Time: *15:00*  
Analyzed by: *DC* Date: *3-Sep-96*  
Sample Matrix: *Soil*

### *Laboratory Analysis*

<i>Parameter</i>	<i>Result</i>	<i>Unit of Measure</i>	<i>Detection Limit</i>	<i>Unit of Measure</i>
<i>Diesel Range Organics (C10 - C28)</i>	<i>26.9</i>	<i>mg/kg</i>	<i>5.0</i>	<i>mg/kg</i>

### *Quality Assurance Report*

*DRO QC No.: 0489-QC*

### *Calibration Check*

<i>Parameter</i>	<i>Method Blank</i>	<i>Unit of Measure</i>	<i>True Value</i>	<i>Analyzed Value</i>	<i>% Diff</i>	<i>Limit</i>
<i>Diesel Range (C10 - C28)</i>	<i>&lt; 5.0</i>	<i>ppm</i>	<i>100</i>	<i>106</i>	<i>5.9</i>	<i>15%</i>

### *Matrix Spike*

<i>Parameter</i>	<i>1 - Percent Recovered</i>	<i>2 - Percent Recovered</i>	<i>Limit</i>	<i>%RSD</i>	<i>Limit</i>
<i>Diesel Range (C10-C28)</i>	<i>104</i>	<i>96</i>	<i>(70-130)</i>	<i>5</i>	<i>20%</i>

**Method** - SW-846 EPA Method 8015A mod. - Nonhalogenated Volatile Hydrocarbons by Gas Chromatography

Approved by: *[Signature]*

Date: *9/3/96*

P.O. BOX 2606 • FARMINGTON, NM 87499

- TECHNOLOGY BLENDING INDUSTRY WITH THE ENVIRONMENT -

OFF: (505) 325-5667



LAB: (505) 325-1556

**AROMATIC VOLATILE ORGANICS**

Attn: *Denver Bearden*  
Company: *PNM Gas Services*  
Address: *603 W. Elm*  
City, State: *Farmington, NM 87401*

Date: *30-Aug-96*  
COC No.: *4957*  
Sample No. *11945*  
Job No. *2-1000*

Project Name: *PNM Gas Services - Zachry #16E*  
Project Location: *9608281500; Pit Excavation Composite Sample*  
Sampled by: *RH* Date: *28-Aug-96* Time: *15:00*  
Analyzed by: *HR* Date: *29-Aug-96*  
Sample Matrix: *Soil*

**Laboratory Analysis**

<i>Parameter</i>	<i>Result</i>	<i>Unit of Measure</i>	<i>Detection Limit</i>	<i>Unit of Measure</i>
<i>Benzene</i>	<i>106.2</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>Toluene</i>	<i>1585.8</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>Ethylbenzene</i>	<i>254.5</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>m,p-Xylene</i>	<i>2528.1</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>o-Xylene</i>	<i>517.9</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>TOTAL</i>	<i>4992.5</i>	<i>ug/kg</i>		

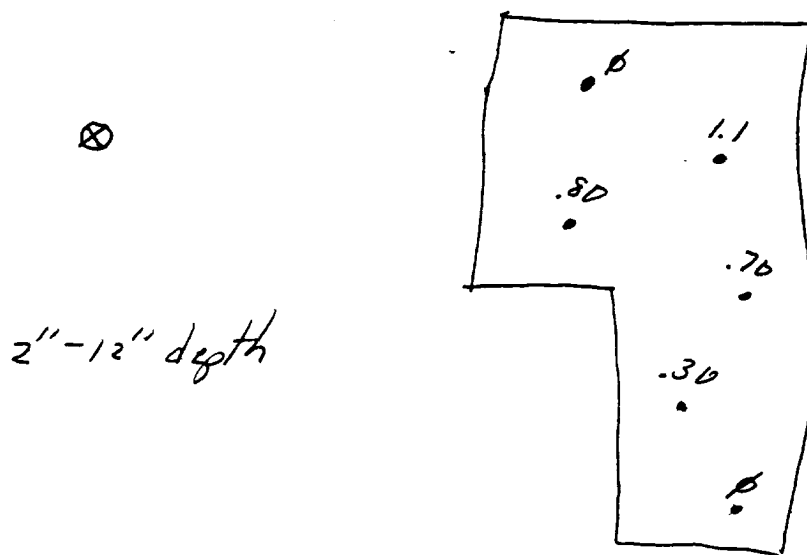
**Method** - SW-846 EPA Method 8020 Aromatic Volatile Organics by Gas Chromatography

Approved by: *DaG*  
Date: *8/30/96*

Zachry #16-E  
Meridian Oil  
Sec. 33, 29N, 10W

10-1-96

Land Farmed: On location  
Composite sample # 9610011045 6 pt. comp.  
Soil Vapor Head space PID reading = 3.3 ppm



OFF: (505) 325-5667



LAB: (505) 325-1556

***Diesel Range Organics***

Attn: *Denver Bearden*  
Company: *PNM Gas Services*  
Address: *603 W. Elm*  
City, State: *Farmington, NM 87401*

Date: *4-Oct-96*  
COC No.: *5048*  
Sample No. *12409*  
Job No. *2-1000*

Project Name: *PNM Gas Services - Zachry #16-E Landfarm*  
Project Location: *9610011045; 6pt. Composite, 2"-12" depth*  
Sampled by: *GC* Date: *1-Oct-96* Time: *10:45*  
Analyzed by: *DC/BV* Date: *4-Oct-96*  
Sample Matrix: *Soil*

***Laboratory Analysis***

<i>Parameter</i>	<i>Result</i>	<i>Unit of Measure</i>	<i>Detection Limit</i>	<i>Unit of Measure</i>
<i>Diesel Range Organics (C10 - C28)</i>	<i>&lt;5.0</i>	<i>mg/kg</i>	<i>5.0</i>	<i>mg/kg</i>

***Quality Assurance Report***

*DRO QC No.: 0489-QC*

***Calibration Check***

<i>Parameter</i>	<i>Method Blank</i>	<i>Unit of Measure</i>	<i>True Value</i>	<i>Analyzed Value</i>	<i>% Diff</i>	<i>Limit</i>
<i>Diesel Range (C10 - C28)</i>	<i>&lt;5.0</i>	<i>ppm</i>	<i>100</i>	<i>110</i>	<i>10.3</i>	<i>15%</i>

***Matrix Spike***

<i>Parameter</i>	<i>1- Percent Recovered</i>	<i>2 - Percent Recovered</i>	<i>Limit</i>	<i>%RSD</i>	<i>Limit</i>
<i>Diesel Range (C10-C28)</i>	<i>112</i>	<i>103</i>	<i>(70-130)</i>	<i>6</i>	<i>20%</i>

**Method** - *SW-846 EPA Method 8015A mod. - Nonhalogenated Volatile Hydrocarbons by Gas Chromatography*

Approved by: *[Signature]*  
Date: *10/4/96*

**P.O. BOX 2606 • FARMINGTON, NM 87499**

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