

District I  
P.O. Box 1980, Hobbs, NM

District II  
P.O. Drawer DD, Artesia, NM 88201

District III  
1000 Rio Brazos Rd. Aztec, NM 87410

DEFEND OIL & GAS INSPECTOR

State of New Mexico  
Energy, Minerals and Natural Resources Department

OIL CONSERVATION DIVISION

2040 South Pacheco Street  
Santa Fe, New Mexico 87505

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

FEB 03 1999

Approved

PIT REMEDIATION AND CLOSURE REPORT

RECEIVED  
NOV 12 1998  
OIL CON. DIV.  
DIST. 3

Operator: PNM Gas Services (Chateau) Telephone: 324-3764

Address: 603 W. Elm Street Farmington, NM 87401

Facility or Well Name: Davis #1 (Chateau)

Location: Unit G Sec 5 T 26 N R 8 W County San Juan

Pit Type: Separator ☒ Dehydrator ☐ Other                     

Land Type: BLM ☐ State ☐ Fee ☐ Other Navajo land.

Pit Location: Pit dimensions: length 20 width 20 depth 3

(Attach diagram) Reference: wellhead ☒ other                     

Footage from reference: 60'

Direction from reference: 45 Degrees ☒ East North ☐  
of ☐ West South ☒

Depth to Ground Water:  (Vertical distance from contaminants to seasonal high water elevation of ground water)	Less than 50 feet	(20 points)	
	50 feet to 99 feet	(10 points)	
	Greater than 100 feet	(0 points)	<u>0</u>

Wellhead Protection Area:  (Less than 200 feet from a private domestic water source, or, less than 1,000 feet from all other water sources)	Yes	(20 points)	
	No	(0 points)	<u>0</u>

Distance to Surface Water:  (Horizontal distance to perennial lakes, ponds, rivers, streams, creeks, irrigation canals and ditches)	Less than 200 feet	(20 points)	
	200 feet to 1,000 feet	(10 points)	
	Greater than 1,000 feet	(0 points)	<u>0</u>

RANKING SCORE (TOTAL POINTS): 0

Davis #1 (Chateau)

Date Remediation Started: 6/25/98

Date Completed: 6/25/98

Remediation Method:

Excavation

x

Approx. Cubic Yard

50

(Check all appropriate sections)

Landfarmed

x

Amount Landfarmed (cubic yds)

50

Other

Remediation Location:

Onsite

x

Offsite

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

Backfill Material Location:

General Description of Remedial Action:

Excavated contaminated soil to a pit size of 17' X 20' X 4' and landfarmed soil onsite within a bermed area at a depth of 6" to 12". Soil was aerated by disking/plowing until soil met regulatory levels.

\*\*\* Sandstone encountered at 4'. See attached risk analysis and lab analysis form.

Ground Water Encountered:

No



Yes



Depth

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Final Pit Closure Sampling:

Sample Location

Bottom of excavation.

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

Sample depth

4'

Sample date

6/25/98

Sample time

1:45:00 PM

Sample Results

Benzene (ppm) < 1.0000

Total BTEX (ppm) 65.5000 \*\*\*

Field headspace (ppm)

TPH (ppm) 120.00

Method

8015

Vertical Extent (ft)

Risk Analysis form attached Yes



No



Ground Water Sample:

Yes



No



(If yes, see attached Groundwater Site Summary Report)

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

DATE October 29, 1998

SIGNATURE

*Maureen Gannon*

PRINTED NAME Maureen Gannon  
AND TITLE Project Manager



**Environmental Services**

Well Name:

Well Legals:

Pit Type:

Horizontal Distance to Surface Water:

Groundwater Depth:

Davis #1

Unit G, Sec 5, T26N, R8W

Separator

Greater than 1,000 feet

Greater than 100 feet

**RISK ANALYSIS**

PNM requests closure of their former pit on the Davis #1 well site using a limited risk analysis based on the following conditions:

1. Groundwater is estimated to be at a depth of 174 feet based upon the elevation of the site and the elevation of the nearest "listed" or "named" river. (Reference: Fresno Canyon, NM topographic map.)
2. The site is not located within 200 feet of a domestic water well and is not within 1,000 feet of any other water source.
3. PNM excavated 50 cubic yards of soil from the former pit. Subsurface lateral contamination has been remediated (see attached analytical results). Source removal minimizes the possibility of surface water contamination.
4. Sandstone was encountered at 4 feet below ground surface. Bedrock/sandstone provides a barrier between remaining contamination and groundwater. Vertical migration through bedrock or sandstone to groundwater is unlikely.
5. PNM excavated and performed remediation to the maximum depth and horizontal extent practicable.

PNM believes their former pit on the Davis #1 well site poses minimal threat to groundwater, human health and the environment based upon our past experience in excavating over 800 pits.

OFF: (505) 325-5667



LAB: (505) 325-1556

**On Site Technologies, LTD.**

**Date:** 07-Jul-98

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**CLIENT:** PNM - Public Service Company of NM  
**Project:** Davis #1  
**Lab Order:** 9806105

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## **CASE NARRATIVE**

Samples were analyzed using the methods outlined in the following references:

Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, SW846, 3rd Edition

All method blanks, laboratory spikes, and/or matrix spikes met quality assurance objectives.

OFF: (505) 325-5667



LAB: (505) 325-1556

## ANALYTICAL REPORT

Date: 07-Jul-98

<b>Client:</b>	PNM - Public Service Company of NM	<b>Client Sample Info:</b>	Davis #1
<b>Work Order:</b>	9806105	<b>Client Sample ID:</b>	9806251345; Bottom
<b>Lab ID:</b>	9806105-01A	<b>Matrix:</b>	SOIL
<b>Project:</b>	Davis #1	<b>Collection Date:</b>	6/25/98 1:45:00 PM
		<b>COC Record:</b>	7245

Parameter	Result	PQL	Qual	Units	DF	Date Analyzed
<b>DIESEL RANGE ORGANICS</b>		<b>SW8015</b>				Analyst: HR
T/R Hydrocarbons: C10-C28	120	25		mg/Kg	1	7/3/98
<b>BTEX</b>		<b>SW8020A</b>				Analyst: HR
Benzene	ND	1000		µg/Kg	1000	7/1/98
Toluene	ND	1000		µg/Kg	1000	7/1/98
Ethylbenzene	8700	1000		µg/Kg	1000	7/1/98
m,p-Xylene	49000	2000		µg/Kg	1000	7/1/98
o-Xylene	7800	1000		µg/Kg	1000	7/1/98

65,500  
65.50 ppm

<b>Qualifiers:</b>	PQL - Practical Quantitation Limit	S - Spike Recovery outside accepted recovery limits
	ND - Not Detected at Practical Quantitation Limit	R - RPD outside accepted recovery limits
	J - Analyte detected below Practical Quantitation Limit	E - Value above quantitation range
	B - Analyte detected in the associated Method Blank	Surr: - Surrogate

1 of 1

OFF: (505) 325-5667



LAB: (505) 325-1556

## ANALYTICAL REPORT

Date: 07-Jul-98

<b>Client:</b>	PNM - Public Service Company of NM	<b>Client Sample Info:</b>	Davis #1
<b>Work Order:</b>	9806105	<b>Client Sample ID:</b>	9806251400; Walls
<b>Lab ID:</b>	9806105-02A	<b>Matrix:</b>	SOIL
<b>Project:</b>	Davis #1	<b>Collection Date:</b>	6/25/98 2:00:00 PM
		<b>COC Record:</b>	7245

Parameter	Result	PQL	Qual	Units	DF	Date Analyzed
<b>DIESEL RANGE ORGANICS</b>		<b>SW8015</b>				<b>Analyst: DC</b>
T/R Hydrocarbons: C10-C28	ND	25		mg/Kg	1	7/7/98
<b>BTEX</b>		<b>SW8020A</b>				<b>Analyst: HR</b>
Benzene	ND	1		µg/Kg	1	7/1/98
Toluene	ND	2		µg/Kg	1	7/1/98
Ethylbenzene	ND	1		µg/Kg	1	7/1/98
m,p-Xylene	ND	2		µg/Kg	1	7/1/98
o-Xylene	ND	1		µg/Kg	1	7/1/98

**Qualifiers:**

- PQL - Practical Quantitation Limit
- ND - Not Detected at Practical Quantitation Limit
- J - Analyte detected below Practical Quantitation Limit
- B - Analyte detected in the associated Method Blank

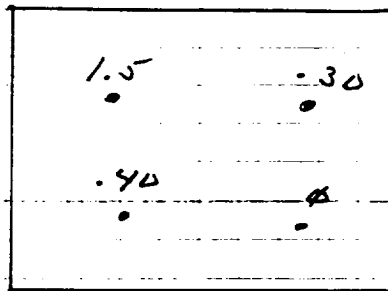
- S - Spike Recovery outside accepted recovery limits
- R - RPD outside accepted recovery limits
- E - Value above quantitation range
- Surr: - Surrogate

1 of 1

Davis #1  
Chateau Oil  
Sec. 5, 26N, 8W

7-20-98

Landfarm: On location



⊗

50 yards  
2"-12" depth

soil vapor headspace = 5.8 ppm

980720 1430

OFF: (505) 325-5667



LAB: (505) 325-1556

**On Site Technologies, LTD.**

**Date:** 28-Jul-98

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**CLIENT:** PNM - Public Service Company of NM  
**Project:** PNM Pit Remediation  
**Lab Order:** 9807058

**CASE NARRATIVE**

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Samples were analyzed using the methods outlined in the following references:

Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, SW846, 3rd Edition

All method blanks, laboratory spikes, and/or matrix spikes met quality assurance objectives.



OFF: (505) 325-5667



LAB: (505) 325-1556

## ANALYTICAL REPORT

Date: 28-Jul-98

<b>Client:</b>	PNM - Public Service Company of NM	<b>Client Sample Info:</b>	Davis #1 LF
<b>Work Order:</b>	9807058	<b>Client Sample ID:</b>	9807201430; 6pt. Comp.
<b>Lab ID:</b>	9807058-12A	<b>Matrix:</b>	SOIL
<b>Project:</b>	PNM Pit Remediation	<b>Collection Date:</b>	7/20/98 2:30:00 PM
		<b>COC Record:</b>	7389

Parameter	Result	PQL	Qual	Units	DF	Date Analyzed
<b>DIESEL RANGE ORGANICS</b>		<b>SW8015</b>				<b>Analyst: HR</b>
T/R Hydrocarbons: C10-C28	ND	25		mg/Kg	1	7/24/98

**Qualifiers:**

- PQL - Practical Quantitation Limit
- ND - Not Detected at Practical Quantitation Limit
- J - Analyte detected below Practical Quantitation Limit
- B - Analyte detected in the associated Method Blank

- S - Spike Recovery outside accepted recovery limits
- R - RPD outside accepted recovery limits
- E - Value above quantitation range
- Surr: - Surrogate

1 of 1