

*Denny E. Faust*  
DEPUTY OIL & GAS INSPECTOR

JICARILLA APACHE TRIBE

FEB 08 1999

ENVIRONMENTAL PROTECTION OFFICE

P.O. BOX 507  
DULCE, NEW MEXICO 87528

SUBMIT ONE COPY  
TO NATURAL  
RESOURCE DEPT  
AND OIL- GAS  
ADMINISTRATION

Risk  
BTEX

PIT REMEDIATION AND CLOSURE REPORT

Operator: PNM Gas Services ( CONOCO ) Telephone: 324-3764  
Address: 603 W. Elm Street Farmington, NM 87401  
Facility or Well Name: Jicarilla K19  
Location: Unit G Sec 12 T 25 N R 5 W County Rio Arriba  
Pit Type: Separator ☐ Dehydrator ☐ Other Manual drip blowdown  
Land Type: Jicarilla Apache

Pit Location: Pit dimensions: Length 20 ' Width 20 ' Depth 3 '  
(Attach diagram) Reference: Wellhead ☒ Other \_\_\_\_\_  
Footage from reference: 76'  
Direction from reference: 9 degrees ☐ East of ☐ North  
☒ 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) 0

**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) 0

**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 100 feet (0 points) 0

**Distance to Ephemeral Stream (dry wash):**

(Horizontal distance to all downgradient streams having a width of at least 10 feet)

Less than or equal to 100 feet (10 points)  
Greater than 100 feet (0 points) 0

**Distance to Nearest Lake, Playa, or Watering Pond:**

(Horizontal distance to all downgradient lakes, playas, and livestock or wildlife water ponds)

Less than or equal to 100 feet (10 points)  
Greater than 100 feet (0 points) 0

RANKING SCORE (TOTAL POINTS): 0

Date Remediation Started: 10/21/98

Date Completed: 12/15/98

Remediation Method: Excavation ☒

Approx. Cubic Yards 142

(Check all appropriate sections)

Landfarmed ☒

Amount Landfarmed (cubic yds) 142

Other

Remediation Location: Onsite ☒

Offsite

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

## General Description of Remedial Action:

Removal of contaminated soil from all four sidewalls, as to get a below 100 ppm head space reading.

Bottom is rock.

Final excavation dimensions: 16'(N&amp;S)X30'(E&amp;W)X8'(D)

Ground Water Encountered: No ☒Yes ☐

Depth

## Final Pit Closure

## Sampling:

Sample Location Composite of North, East, South, and West sidewalls and a three point composite of rock bottom.

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

Sample depth 8'

Sample date 10/21/98

Sample time 0915 0910

## Sample Results

Soil: Benzene (ppm) ND

Water: Benzene (ppb)

Total BTEX (ppm) 0.293

Toluene (ppb)

Field headspace (ppm) 55.8

Ethylbenzene (ppb)

TPH (ppm) ND

Method 8015

Total Xylenes (ppb)

Vertical Extent (ft) 8'

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: 11-20-98

PRINTED NAME Ray Haston

SIGNATURE

TITLE Environmental Tech. III

AFTER REVIEW OF THE PIT CLOSURE INFORMATION, PIT CLOSURE IS APPROVED IN ACCORDANCE TO JICARILLA APACHE TRIBE PIT CLOSURE ORDINANCE:

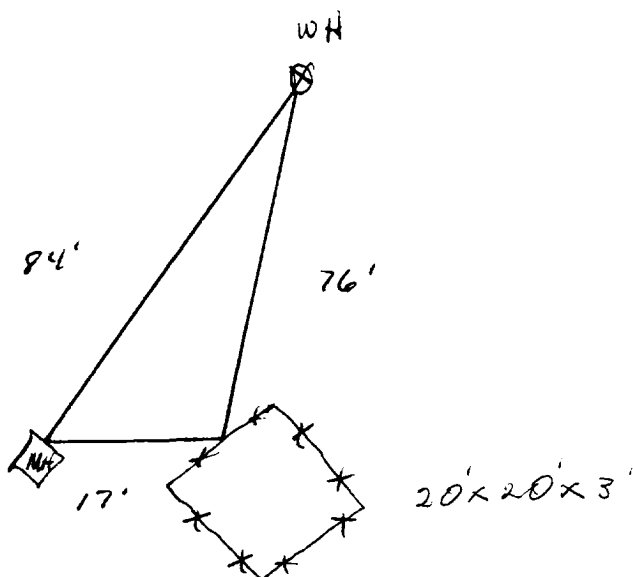
APPROVED: YES ☒ NO ☐ (REASON):

SIGNATURE:

DATE: 11-30-98

Jicarilla K19  
(G)12-25N-5W  
CONOCO  
10-21-98

N ↑



Excavation Sampling

16'(N+S) x 30'(E+W) x 8'(D)

5' sample 582 ppm  
8' sample 778 ppm

3 point bottom sample  
at 8' - 201 ppm  
Bottom is rock.

west wall sample  
at 8' - 6.8 ppm

north wall sample  
at 8' - 55.8 ppm

East wall sample  
at 8' - 15.2 ppm

South wall sample  
at 8' - 9.3 ppm

not to scale

OFF: (505) 325-5667



LAB: (505) 325-1556

**On Site Technologies, LTD.**

**Date:** 10-Nov-98

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**CLIENT:** PNM - Public Service Company of NM  
**Project:** Jicarilla K-19  
**Lab Order:** 9810073

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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: 10-Nov-98

<b>Client:</b>	PNM - Public Service Company of NM	<b>Client Sample Info:</b>	Jicarilla K-19
<b>Work Order:</b>	9810073	<b>Client Sample ID:</b>	9810210910; 3pt. Comp. Bottom
<b>Lab ID:</b>	9810073-01A	<b>Matrix:</b>	SOIL
<b>Project:</b>	Jicarilla K-19	<b>Collection Date:</b>	10/21/98 9:10:00 AM
		<b>COC Record:</b>	5767

Parameter	Result	PQL	Qual	Units	DF	Date Analyzed
<b>DIESEL RANGE ORGANICS</b>		<b>SW8015</b>				Analyst: HR
T/R Hydrocarbons: C10-C28	ND	25		mg/Kg	1	11/3/98
<b>BTEX</b>		<b>SW8020A</b>				Analyst: DC
Benzene	ND	5		µg/Kg	5	10/28/98
Toluene	ND	10		µg/Kg	5	10/28/98
Ethylbenzene	13	5		µg/Kg	5	10/28/98
m,p-Xylene	200	10		µg/Kg	5	10/28/98
o-Xylene	80	5		µg/Kg	5	10/28/98

293  
.293 ppm

**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

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OFF: (505) 325-5667



LAB: (505) 325-1556

## ANALYTICAL REPORT

Date: 10-Nov-98

<b>Client:</b>	PNM - Public Service Company of NM	<b>Client Sample Info:</b>	Jicarilla K-19
<b>Work Order:</b>	9810073	<b>Client Sample ID:</b>	9810210915; 4pt. Comp. Walls
<b>Lab ID:</b>	9810073-02A	<b>Matrix:</b>	SOIL
<b>Project:</b>	Jicarilla K-19	<b>Collection Date:</b>	10/21/98 9:15:00 AM
		<b>COC Record:</b>	5767

Parameter	Result	PQL	Qual	Units	DF	Date Analyzed
<b>DIESEL RANGE ORGANICS</b>		<b>SW8015</b>				Analyst: <b>HR</b>
T/R Hydrocarbons: C10-C28	ND	25		mg/Kg	1	11/3/98
<b>BTEX</b>		<b>SW8020A</b>				Analyst: <b>DC</b>
Benzene	ND	1		µg/Kg	1	10/28/98
Toluene	ND	2		µg/Kg	1	10/28/98
Ethylbenzene	ND	1		µg/Kg	1	10/28/98
m,p-Xylene	ND	2		µg/Kg	1	10/28/98
o-Xylene	1.2	1		µg/Kg	1	10/28/98

1,2  
.0012 ppv

<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

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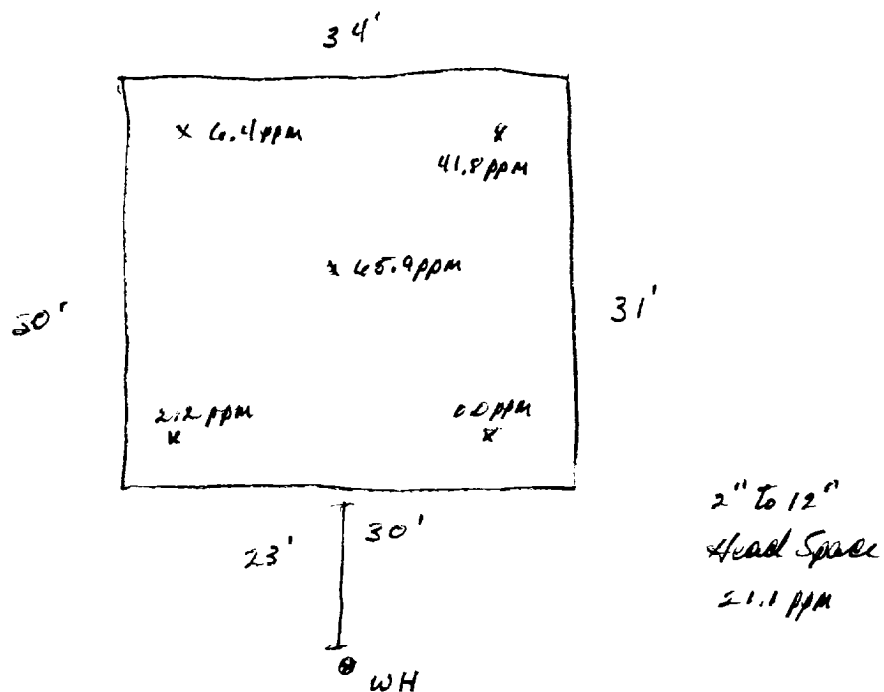
**JICARILLA APACHE TRIBE  
ENVIRONMENTAL PROTECTION OFFICE  
P.O. BOX 507  
DULCE, NEW MEXICO 87528**

SUBMIT ONE COPY  
TO NATURAL  
RESOURCE DEPT  
AND OIL- GAS  
ADMINISTRATION

**ON-SITE SOIL REMEDIATION REPORT**

<b>Operator:</b> <u>PNM Gas Services</u> ( <u>CONOCO</u> ) <b>Telephone:</b> <u>324-3764</u>																			
<b>Address:</b> <u>603 W. Elm Street</u> <u>Farmington, NM 87401</u>																			
<b>Facility or Well Name:</b> <u>Jicarilla K19 Land Farm</u>																			
<b>Location:</b> Unit <u>G</u> Sec <u>12</u> T <u>25 N</u> R <u>5 W</u> County <u>Rio Arriba</u>																			
<b>Land Type:</b> <u>Jicarilla Apache</u>																			
<b>Date Remediation Started:</b> <u>10/21/98</u> <b>Date Completed:</b> <u>12/1/98</u>																			
<b>Remediation Method:</b> Landfarmed <input checked="" type="checkbox"/> Approx. cubic yards <u>142</u> Composted <input type="checkbox"/> Other _____																			
<table><tr><td>Depth to Ground Water:</td><td>(pts.)</td><td><u>0</u></td></tr><tr><td>Distance to an Ephemeral Stream:</td><td>(pts.)</td><td><u>0</u></td></tr><tr><td>Distance to Nearest Lake, Playa, or Watering Pond:</td><td>(pts.)</td><td><u>0</u></td></tr><tr><td>Wellhead Protection Area:</td><td>(pts.)</td><td><u>0</u></td></tr><tr><td>Distance to Surface Water:</td><td>(pts.)</td><td><u>0</u></td></tr><tr><td><b>Ranking Score (Total Points):</b></td><td></td><td><u>0</u></td></tr></table>	Depth to Ground Water:	(pts.)	<u>0</u>	Distance to an Ephemeral Stream:	(pts.)	<u>0</u>	Distance to Nearest Lake, Playa, or Watering Pond:	(pts.)	<u>0</u>	Wellhead Protection Area:	(pts.)	<u>0</u>	Distance to Surface Water:	(pts.)	<u>0</u>	<b>Ranking Score (Total Points):</b>		<u>0</u>	<b>Final Closure Sampling:</b> <b>Sampling Date:</b> <u>11/18/98</u> <b>Time</b> <u>1227</u>  <b>Sampling Results:</b> Field Headspace (ppm) <u>21.1</u> TPH (ppm) <u>ND</u> <b>Method</b> <u>8015</u> Other _____
Depth to Ground Water:	(pts.)	<u>0</u>																	
Distance to an Ephemeral Stream:	(pts.)	<u>0</u>																	
Distance to Nearest Lake, Playa, or Watering Pond:	(pts.)	<u>0</u>																	
Wellhead Protection Area:	(pts.)	<u>0</u>																	
Distance to Surface Water:	(pts.)	<u>0</u>																	
<b>Ranking Score (Total Points):</b>		<u>0</u>																	
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AFTER REVIEW OF THE SOIL REMEDIATION INFORMATION, ON-SITE REMEDIATION IS APPROVED IN ACCORDANCE TO THE JICARILLA APACHE TRIBE PIT CLOSURE ORDINANCE:																			
<b>APPROVED:</b> YES <u>X</u> NO _____ <b>(REASON):</b> <u>use as Backfill</u>																			
<table><tr><td><b>SIGNATURE:</b> <u><i>Kent M... ..</i></u></td><td><b>DATE:</b> <u>12-15-98</u></td></tr></table>		<b>SIGNATURE:</b> <u><i>Kent M... ..</i></u>	<b>DATE:</b> <u>12-15-98</u>																
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Jicarilla K19  
(G) 12-25N-5W  
CONOCO  
142 yds.





OFF: (505) 325-5667



LAB: (505) 325-1556

**On Site Technologies, LTD.**

**Date:** 03-Dec-98

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**CLIENT:** PNM - Public Service Company of NM  
**Project:** Jicarilla Pit Remediation Landfarms  
**Lab Order:** 9811062

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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.

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## ANALYTICAL REPORT

Date: 03-Dec-98

<b>Client:</b>	PNM - Public Service Company of NM	<b>Client Sample Info:</b>	Jicarilla K-19 LF
<b>Work Order:</b>	9811062	<b>Client Sample ID:</b>	9811181227; 6pt. Comp.
<b>Lab ID:</b>	9811062-02A	<b>Matrix:</b>	SOIL
<b>Project:</b>	Jicarilla Pit Remediation Landfarms	<b>Collection Date:</b>	11/18/98 12:27:00 PM
		<b>COC Record:</b>	7404

Parameter	Result	PQL	Qual	Units	DF	Date Analyzed
<b>DIESEL RANGE ORGANICS</b>		<b>SW8015</b>				Analyst: HR
T/R Hydrocarbons: C10-C28	ND	25		mg/Kg	1	12/1/98

**Qualifiers:**

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1 of 1

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