

Jenny 1
DEPUTY OIL & GAS INSPECTOR
OCT 19 1996

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

SUBMITTED TO
NATURAL RESOURCE
AND OIL & GAS ADMINISTRATION

RECEIVED
JUL 30 1996

PIT REMEDIATION AND CLOSURE REPORT

OIL COM. DIV.
DIST. 3

Operator: PNM Gas Services Telephone: 324-3763
Address: 603 W. Elm Farmington, N. Mex. 87410
Facility or Well Name: Jenny 1 (Snyder)
Location: Unit or Qtr/Qtr Sec B Sec 13 T 26N R 4W County Rio Arriba
Pit Type: Separator Dehydrator Other
Land Type: Jic. Res.

Pit Location: Pit dimensions: length 19, width 17, depth 6
(Attach diagram) Reference: wellhead , other
Footage from reference: 155'
Direction from reference: 45 Degrees East of North
of West South

Depth To Groundwater: Less than 50 feet (20 points)
(Vertical distance from 50 feet to 99 feet (10 points)
contaminants to seasonal high water elevation of groundwater) Greater than 100 feet (0 points) 0

Distance to an Ephemeral Stream Less than 100 feet (10 points) 10
(Downgradient dry wash greater than ten feet in width) Greater than 100 feet (0 points)

Distance to Nearest Lake, Playa, or Watering Pond Less than 100 feet (10 points) 0
(Downgradient lakes, playas and livestock or wildlife watering ponds) Greater than 100 feet (0 points)

Wellhead Protection Area: Yes (20 points) 0
(Less than 200 feet from a private domestic water source, or: less than 1000 feet from all other water sources) No (0 points)

Distance To Surface Water: Less than 100 feet (20 points)
(Horizontal distance to perennial lakes, ponds, rivers, streams, creeks, irrigation canals and ditches) 100 feet to 1000 feet (10 points) 0
Greater than 1000 feet (0 points)

RANKING SCORE (TOTAL POINTS): 10

Jenny 1

Date Remediation Started: 5/20/96 Date Completed: 6/11/96

Remediation Method: Excavation Approx. cubic yards 71.7
(Check all appropriate sections) Landfarmed Amt. landfarmed (yds) 71.7

Other _____

Remediation Location: Onsite Offsite _____
(i.e. landfarmed onsite, name and location of offsite facility)

General Description of Remedial Action: Removed plastic liner from pit. Removed 71.7 yds. of cont. soil. Pit clean

Groundwater Encountered: No Yes _____ Depth _____

Final Pit: Sample location North, East, South, West side walls
Closure Sampling: at bottom of pit center.
(if multiple samples, attach sample results and diagram of sample locations and depths) Sample depth 6'
Sample date 5/20/96 Sample time 1000

Sample Results

Soil: Benzene (ppm) 0.0207 Water: Benzene (ppb) _____
Total BTEX (ppm) 1.0973 Toluene (ppb) _____
Field Headspace (ppm) 37 Ethylbenzene (ppb) _____
TPH 8015 (ppm) <5.0 Total Xylenes (ppb) _____

Groundwater 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 BELIEF

DATE 5/30/96 PRINTED NAME Ronald A. Dedrick
SIGNATURE Ronald A. Dedrick AND TITLE Environmental Tech.

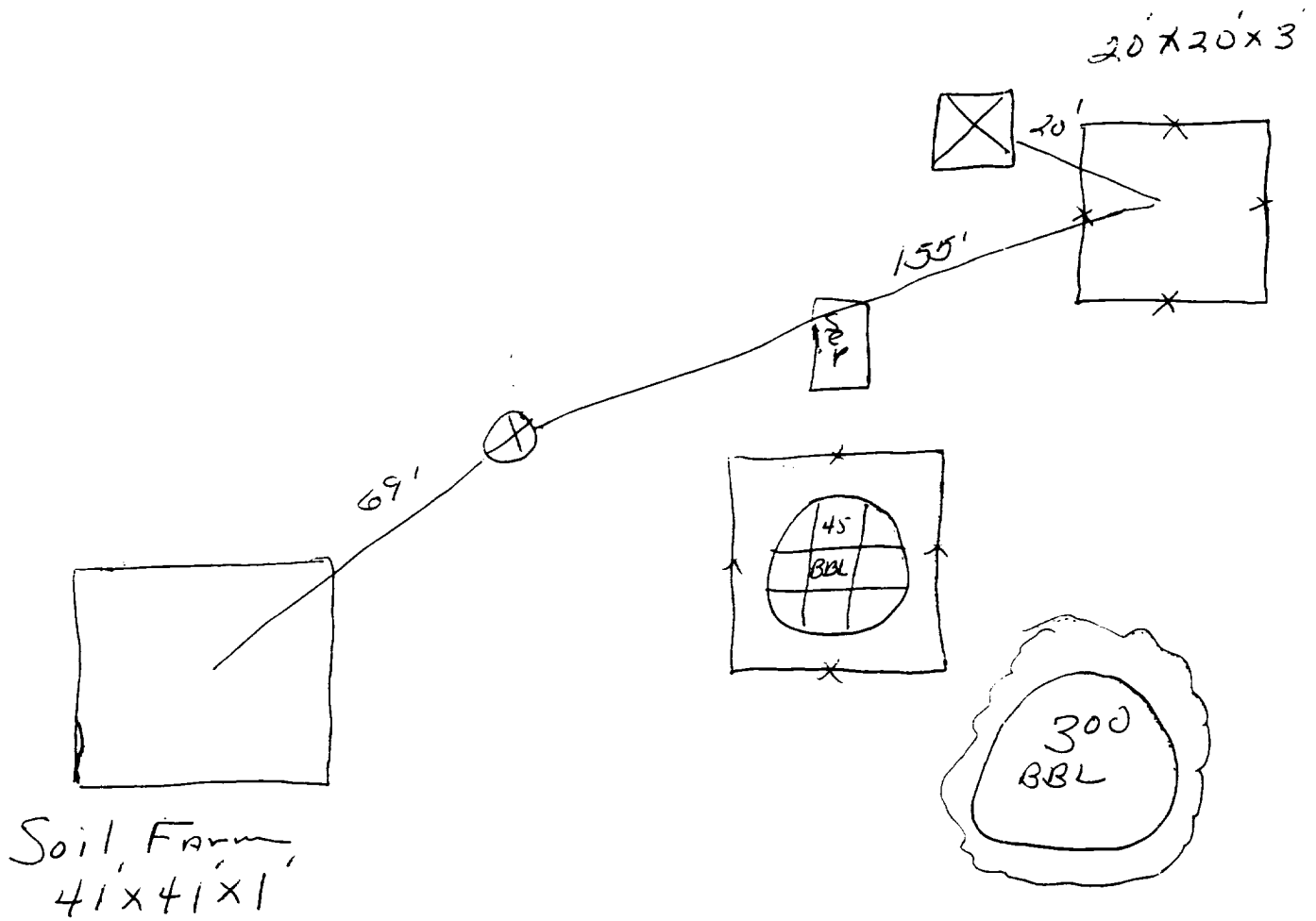
AFTER REVIEW OF THE PIT CLOSURE INFORMATION, PIT CLOSURE IS APPROVED IN ACCORDANCE WITH THE JICARILLA APACHE TRIBE PIT CLOSURE ORDINANCE.

APPROVED: YES NO (REASON) _____

SIGNED: [Signature] DATE: 6-5-96

Tenny 1 SOCO

Sec. 13 T26N R4W unit B





OFF: (505) 325-8786

LAB: (505) 325-5667

Diesel Range Organics

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

Date: *24-May-96*
 COC No.: *4671*
 Sample No. *10970*
 Job No. *2-1000*

Project Name: ***PNM Gas Services - Jenny 1***
 Project Location: ***9605201000; North Wall***
 Sampled by: *RB* Date: *20-May-96* Time: *10:00*
 Analyzed by: *HR* Date: *22-May-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><5.0</i>	<i>mg/kg</i>	<i>5.0</i>	<i>mg/kg</i>

Quality Assurance Report

DRO QC No.: 0475-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><5.0</i>	<i>ppm</i>	<i>2,000</i>	<i>2,020</i>	<i>1.0</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>117</i>	<i>106</i>	<i>(70-130)</i>	<i>7</i>	<i>20%</i>

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

Approved by: *[Signature]*
 Date: *5/24/96*

P. O. BOX 2606 • FARMINGTON, NM 87499



OFF: (505) 325-8786

LAB: (505) 325-5667

Diesel Range Organics

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

Date: *24-May-96*
 COC No.: *4671*
 Sample No. *10971*
 Job No. *2-1000*

Project Name: *PNM Gas Services - Jenny 1*
 Project Location: *9605201003; East Wall*
 Sampled by: *RB* Date: *20-May-96* Time: *10:03*
 Analyzed by: *HR* Date: *22-May-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><5.0</i>	<i>mg/kg</i>	<i>5.0</i>	<i>mg/kg</i>

Quality Assurance Report

DRO QC No.: 0475-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><5.0</i>	<i>ppm</i>	<i>2,000</i>	<i>2,020</i>	<i>1.0</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>117</i>	<i>106</i>	<i>(70-130)</i>	<i>7</i>	<i>20%</i>

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

Approved by: *Dall*
 Date: *5/24/96*

P. O. BOX 2606 • FARMINGTON, NM 87499



OFF: (505) 325-8786

LAB: (505) 325-5667

Diesel Range Organics

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

Date: *24-May-96*
 COC No.: *4671*
 Sample No. *10972*
 Job No. *2-1000*

Project Name: *PNM Gas Services - Jenny 1*
 Project Location: *9605201006; South Wall*
 Sampled by: *RB* Date: *20-May-96* Time: *10:06*
 Analyzed by: *HR* Date: *22-May-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><5.0</i>	<i>mg/kg</i>	<i>5.0</i>	<i>mg/kg</i>

Quality Assurance Report

DRO QC No.: 0475-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><5.0</i>	<i>ppm</i>	<i>2,000</i>	<i>2,020</i>	<i>1.0</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>117</i>	<i>106</i>	<i>(70-130)</i>	<i>7</i>	<i>20%</i>

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

Approved by: *JcG*
 Date: *5/24/96*

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OFF: (505) 325-8786

LAB: (505) 325-5667

Diesel Range Organics

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

Date: *24-May-96*
 COC No.: *4671*
 Sample No. *10973*
 Job No. *2-1000*

Project Name: *PNM Gas Services - Jenny 1*
 Project Location: *9605201009; West Wall*
 Sampled by: *RB* Date: *20-May-96* Time: *10:09*
 Analyzed by: *HR* Date: *22-May-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>< 5.0</i>	<i>mg/kg</i>	<i>5.0</i>	<i>mg/kg</i>

Quality Assurance Report

DRO QC No.: 0475-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>< 5.0</i>	<i>ppm</i>	<i>2,000</i>	<i>2,020</i>	<i>1.0</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>117</i>	<i>106</i>	<i>(70-130)</i>	<i>7</i>	<i>20%</i>

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

Approved by: *[Signature]*
 Date: *5/24/96*

P. O. BOX 2606 • FARMINGTON, NM 87499



OFF: (505) 325-8786

LAB: (505) 325-5667

Diesel Range Organics

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

Date: *24-May-96*
 COC No.: *4671*
 Sample No. *10974*
 Job No. *2-1000*

Project Name: *PNM Gas Services - Jenny 1*
 Project Location: *9605201012; Bottom Pit*
 Sampled by: *RB* Date: *20-May-96* Time: *10:12*
 Analyzed by: *HR* Date: *22-May-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><5.0</i>	<i>mg/kg</i>	<i>5.0</i>	<i>mg/kg</i>

Quality Assurance Report

DRO QC No.: *0475-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><5.0</i>	<i>ppm</i>	<i>2,000</i>	<i>2,020</i>	<i>1.0</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>117</i>	<i>106</i>	<i>(70-130)</i>	<i>7</i>	<i>20%</i>

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

Approved by: *[Signature]*
 Date: *5/24/96*

P. O. BOX 2606 • FARMINGTON, NM 87499

- TECHNOLOGY BLENDING INDUSTRY WITH THE ENVIRONMENT -



OFF: (505) 325-8786

LAB: (505) 325-5667

AROMATIC VOLATILE ORGANICS

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

Date: *23-May-96*
COC No.: *4671*
Sample No.: *10974*
Job No.: *2-1000*

Project Name: *PNM Gas Services - Jenny 1*
Project Location: *9605201012; Bottom Pit*
Sampled by: *RB*
Analyzed by: *DC*
Sample Matrix: *Soil*

Date: *20-May-96* Time: *10:12*
Date: *22-May-96*

Aromatic Volatile Organics

Component	Result	Units of Measure	Detection Limit	Units of Measure
<i>Benzene</i>	<i>20.7</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>Toluene</i>	<i>200.2</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>Ethylbenzene</i>	<i>39.5</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>m,p-Xylene</i>	<i>644.4</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>o-Xylene</i>	<i>192.6</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
	TOTAL	1097.3		ug/kg

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

Approved by: *Jeff*
Date: *5/23/96*

P. O. BOX 2606 • FARMINGTON, NM 87499

- TECHNOLOGY BLENDING INDUSTRY WITH THE ENVIRONMENT -

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

SUBMIT 1 COPY
NATURAL RESOURCE DE
AND OIL & GAS ADMINISTRATI

ON-SITE SOIL REMEDIATION REPORT

Operator: PNM Gas Services Telephone: 324-3763
Address: 603 W. Elm. Farmington, N Mex. 87401
Facility or Well Name: Jenny 1
Location: Unit or Qtr/Qtr Sec B Sec 13 T 26N R 4W County Rio Arriba
Land Type: Jicarilla Res.

Date Remediation Started: 5/20/96 Date Completed: 5/21/96
Remediation Method: Landfarmed Approx. cubic yards 71.7
Composted
Other

Depth To Groundwater: (pts.) 0
Distance to an Ephemeral Stream (pts.) 10
Distance to Nearest Lake, Playa, or Watering Pond (pts.) 0
Wellhead Protection Area: (pts.) 0
Distance To Surface Water: (pts.) 0
RANKING SCORE (TOTAL POINTS): 10

Final Closure Sampling:
Sampling Date: 5/21/96 Time: 1700
Sample Results:
Field Headspace (ppm) 18.8
TPH 8015 (ppm) 45.0 Method _____
Other _____

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

DATE 5/30/96 PRINTED NAME Ronald A. Dedrick
SIGNATURE Ronald A. Dedrick AND TITLE Environmental Tech.

AFTER REVIEW OF THE SOIL REMEDIATION INFORMATION, ON-SITE REMEDIATION IS APPROVED IN ACCORDANCE TO THE JICARILLA APACHE TRIBE PIT CLOSURE ORDINANCE.

APPROVED: YES NO (REASON) _____

SIGNED: Kasey M. Maunell DATE: 6-5-96



OFF: (505) 325-8786

LAB: (505) 325-5667

Diesel Range Organics

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

Date: *24-May-96*
 COC No.: *4671*
 Sample No. *10975*
 Job No. *2-1000*

Project Name: *PNM Gas Services - Jenny 1*
 Project Location: *9605211700; 5pt. Composite Land Farm*
 Sampled by: *RB* Date: *21-May-96* Time: *17:00*
 Analyzed by: *HR* Date: *22-May-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>< 5.0</i>	<i>mg/kg</i>	<i>5.0</i>	<i>mg/kg</i>

Quality Assurance Report

DRO QC No.: 0475-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>< 5.0</i>	<i>ppm</i>	<i>2,000</i>	<i>2,020</i>	<i>1.0</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>117</i>	<i>106</i>	<i>(70-130)</i>	<i>7</i>	<i>20%</i>

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

Approved by: *[Signature]*
 Date: *5/24/96*

P. O. BOX 2606 • FARMINGTON, NM 87499

- TECHNOLOGY BLENDING INDUSTRY WITH THE ENVIRONMENT -



OFF: (505) 325-8786

LAB: (505) 325-5667

AROMATIC VOLATILE ORGANICS

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

Date: *23-May-96*
COC No.: *4671*
Sample No.: *10975*
Job No.: *2-1000*

Project Name: *PNM Gas Services - Jenny 1*
Project Location: *9605211700; 5pt. Composite Land Farm*
Sampled by: *RB* Date: *21-May-96* Time: *17:00*
Analyzed by: *DC* Date: *22-May-96*
Sample Matrix: *Soil*

Laboratory Analysis

<i>Component</i>	<i>Result</i>	<i>Unit of Measure</i>	<i>Detection Limit</i>	<i>Unit of Measure</i>
<i>Benzene</i>	<i>1.6</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>Toluene</i>	<i>9.5</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>Ethylbenzene</i>	<i>4.3</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>m,p-Xylene</i>	<i>58.2</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>o-Xylene</i>	<i>17.7</i>	<i>ug/kg</i>	<i>0.2</i>	<i>ug/kg</i>
<i>TOTAL</i>	<i>91.3</i>	<i>ug/kg</i>		

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

Approved by: *[Signature]*
Date: *5/24/96*

P. O. BOX 2606 • FARMINGTON, NM 87499

- TECHNOLOGY BLENDING INDUSTRY WITH THE ENVIRONMENT -



OFF: (505) 325-8786

LAB: (505) 325-5667

QUALITY ASSURANCE REPORT
for EPA Method 8020

Date Analyzed: 22-May-96

Internal QC No.: 0444-STD

Surrogate QC No.: 0445-STD

Reference Standard QC No.: 0355-STD

Method Blank

Analyte	Result	Units of Measure
Average Amount of All Analytes In Blank	<0.2	ppb

Calibration Check

Analyte	Units of Measure	True Value	Analyzed Value	% Diff	Limit
Benzene	ppb	20.0	18.6	7	15%
Toluene	ppb	20.0	18.9	5	15%
Ethylbenzene	ppb	20.0	18.9	6	15%
m,p-Xylene	ppb	40.0	37.3	7	15%
o-Xylene	ppb	20.0	18.8	6	15%

Matrix Spike

Analyte	1 - Percent Recovered	2 - Percent Recovered	Limit	%RSD	Limit
Benzene	88	88	(39-150)	1	20%
Toluene	91	94	(46-148)	2	20%
Ethylbenzene	89	88	(32-160)	1	20%
m,p-Xylene	92	92	(35-145)	0	20%
o-Xylene	88	92	(35-145)	3	20%

Surrogate Recoveries

Laboratory Identification	S1 Percent Recovered	S2 Percent Recovered
Limit Percent Recovery	(70-130)	
10974-4671	96	
10975-4671	100	

S1: Fluorobenzene

Jenny 1 Joil Farm

