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*Cimarex Energy Company of Colorado
Drilling Department
Dorsey Rogers
207 South Mesa
Carlsbad, New Mexico 8822*

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A wholly-owned subsidiary of Cimarex Energy Co., a NYSE Listed Company, "XEC"

Final Closure Report

*Antero 12 Fee #3 Drying Pad, API: 30-025-38499
Sec. 12 15S 37E - Lea County, New Mexico*

Presented to:

New Mexico Oil Conservation Division

*1220 South St. Francis Drive
Santa Fe, New Mexico 87505*

Prepared by:

Phoenix Environmental, LLC.

*P.O. Box 1856
Hobbs, New Mexico 88240*



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IMPORTANT NOTICE:

Phoenix Environmental, LLC., with offices at 2113 French Drive, Hobbs, New Mexico 88241 (the Company), has prepared this project report for remediation of Antero 12 Fee #3, to the best of its ability. No warranty, expressed or implied, is made or intended. The report was prepared for Cimarex Energy Company, with offices at 207 South Mesa, Carlsbad, New Mexico 88022, and (the Client). All information disclosed in this plan is for internal purposes only and is considered confidential. By accepting this document, the recipient agrees to keep confidential the information contained herein. The recipient further agrees not to copy, reproduce or distribute to any third party this project plan in whole or in part, without express written permission from the Company or Client.





SECTION I

District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Avenue, Artesia, NM 88210
District III
1000 Rio Brazos Road, Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

RECEIVED State of New Mexico
Energy Minerals and Natural Resources
Oil Conservation Division
1220 South St. Francis Dr.
HOBBSOCD Santa Fe, NM 87505

Form C-144
June 1, 2004

For drilling and production facilities, submit to appropriate NMOCD District Office.
For downstream facilities, submit to Santa Fe office

Pit or Below-Grade Tank Registration or Closure

Is pit or below-grade tank covered by a "general plan"? Yes ☐ No ☐

Type of action: Registration of a pit or below-grade tank ☐ Closure of a pit or below-grade tank ☒

Operator: <u>CIMAREX ENERGY CO.</u> Telephone: <u>972-401-3111</u> e-mail address: <u>Z.FARRIS@CIMAREX.COM</u>		
Address: <u>P.O. Box 140907 IRVING, TX 75014-0907</u>		
Facility or well name: <u>ANTERO '12 FEE #3H</u> API #: <u>30-025-38499</u> U/L or Q/L or Q/Lr Sec <u>12</u> T <u>15S</u> R <u>37E</u>		
County: <u>LEA</u> Latitude <u>33°1'57" 759 N</u> Longitude <u>103°9' 18252</u> NAD: 1927 <input type="checkbox"/> 1983 <input checked="" type="checkbox"/>		
Surface Owner: Federal <input type="checkbox"/> State <input type="checkbox"/> Private <input type="checkbox"/> Indian <input checked="" type="checkbox"/>		
Pit Type: Drilling <input checked="" type="checkbox"/> Production <input type="checkbox"/> Disposal <input type="checkbox"/> Workover <input type="checkbox"/> Emergency <input type="checkbox"/> Lined <input checked="" type="checkbox"/> Unlined <input type="checkbox"/> Liner type: Synthetic <input checked="" type="checkbox"/> Thickness <u>12</u> mil Clay <input type="checkbox"/> Pit Volume _____ bbl	Below-grade tank Volume: _____ bbl Type of fluid: _____ Construction material: _____ Double-walled, with leak detection? Yes <input type="checkbox"/> If not, explain why not: _____	
Depth to ground water (vertical distance from bottom of pit to seasonal high water elevation of ground water.) <u>60'</u>	Less than 50 feet 50 feet or more, but less than 100 feet 100 feet or more	(20 points) (10 points) <u>X</u> (0 points)
Wellhead protection area: (Less than 200 feet from a private domestic water source, or less than 1000 feet from all other water sources.)	Yes No	(20 points) (0 points) <u>X</u>
Distance to surface water: (horizontal distance to all wetlands, playas, irrigation canals, ditches, and perennial and ephemeral watercourses.)	Less than 200 feet 200 feet or more, but less than 1000 feet 1000 feet or more	(20 points) (10 points) (0 points) <u>X</u>
Ranking Score (Total Points)		<u>10</u>

If this is a pit closure: (1) Attach a diagram of the facility showing the pit's relationship to other equipment and tanks. (2) Indicate disposal location: (check the onsite box if you are burying in place) onsite ☐ offsite ☒ If offsite, name of facility C.R.I. (3) Attach a general description of remedial action taken including remediation start date and end date. (4) Groundwater encountered: No ☒ Yes ☐ If yes, show depth below ground surface _____ ft. and attach sample results.

(5) Attach soil sample results and a diagram of sample locations and excavations.

Additional Comments:
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APR 08 2008
HOBBS OCD

I hereby certify that the information above is true and complete to the best of my knowledge and belief. I further certify that the above-described pit or below-grade tank has been/will be constructed or closed according to NMOCD guidelines ☐, a general permit ☐, or an (attached) alternative OCD-approved plan ☐.

Date: _____
Printed Name/Title: Dorsey Rogers Duty Signature: [Signature]
Your certification and NMOCD approval of this application/closure does not relieve the operator of liability should the contents of the pit or tank contaminate ground water or otherwise endanger public health or the environment. Nor does it relieve the operator of its responsibility for compliance with any other federal, state, or local laws and/or regulations.

Approval: _____
Printed Name/Title: _____ Signature: [Signature] ENVIRONMENTAL ENGINEER Date: 4.8.08



4311 Monica Lane, Carlsbad, NM 88220

Phone 505-236-6012

Fax 505-236-6063

Cell 505- 361-3217

Email bandr@pvtnetworks.net

March 20, 2008

Cimarex Energy Co.
P.O. Box 140907
Irving Texas 75014-0907

Re: Cimarex Energy Co.
Antero 12 Fee #3 – Final Drying pad Closure

Antero 12 Fee No.3
API: 30-025-38499
Sec 12-T15S-R37E

Depth to Ground Water: 50'-100'
Planned Analytical Testing: Chlorides
Site Ranking Score: 10
Primary Land Use: Ranching and Oil & Gas Production

Pursuant to Pit Rule 50 in the Pit and Below Grade Tank Guidelines of the New Mexico Oil Conservation District of the State of New Mexico regulatory requirement for pit closure, please accept the following documentation for final closure of the drilling pit for the aforementioned location.

All drill cuttings were stiffened and transported to Controlled Recovery, Inc. of Hobbs, New Mexico. Upon transferring all pit contents to C.R.I., field tests were performed on the soil within in the confines of the original drying pad. The field results of chloride delineation of the impacted material are as follows (a diagram has also been attached):

North East Quad <32.5mg/kg

North West Quad <32.5mg/kg

South East Quad <32.5mg/kg

South West Quad <32.5mg/kg

The pit area will be backfilled with clean native material and contoured to prevent erosion and ponding of rainwater.

Soil samples were collected, prepared, and packaged per EPA guidelines and forwarded to Trace Analysis in Lubbock, Texas for official analytical testing. Please find the official analytical results attached hereto.

Please review the attached documentation and contact me at 575-361-2132 with any questions or concerns.

Sincerely,

Rayland VanNatta
B&R Trucking



SECTION II

Project Overview

B & R Trucking, Inc. (B&R) was contracted for the closure of a reserve-drilling pit on the Antero 12 Fee #3, belonging to Cimarex Energy Co... The Antero 12 Fee #3 is located in Section 12 T15S R37E. The GPS Reading is 33°01'57.8"N & 103°9'18.3"W, with an elevation of 3783 feet above sea level. The land, in and around the site, is primarily used as domestic pasture for ranching and the production of oil and gas.

The potential contaminates of concern were mid- to high-level concentrations of drilling mud and cuttings that were left on the drying pad once drilling operations were completed.

The ground water depth data available from the State of New Mexico Engineers' office showed the vertical depth to the top of water to be about 60 feet below surface.

Pursuant to the NMOCD guidelines for clean up of unlined surface impoundments, the clean up level for this site will be at <500 ppm for TPH (Total Petroleum Hydrocarbons) and <50 ppm for BTEX (Benzene, Toluene, Ethylbenzene, and Xylene). The NMOCD has also asked for CL (Chlorides) be returned back as close to background levels as possible or <250 ppm.

Findings and Conclusion

It appeared that in excess of 700 cubic yards of impacted soil were impacted in the pit area with the dimensions of 100x100. Impacted soils at the site were transported to a NMOCD approved disposal facility for disposal. (CRI Permit # 9166)

The bottom of the excavation (approximately 2.5 feet) was tested for TPH, BTEX & Chlorides to make certain that the target limits had been met prior to backfilling and compaction for closure. The site cleaned up well with vertical depth of impact, listed above at 2.5 feet and not impacting groundwater. All of the final lab analyses were below the NMOCD guidelines for unlined surface impoundments (refer to attached laboratory reports for actual levels.)

The site was backfilled and compacted with clean backfill and contoured with a crown back to grade to prevent ponding on the area. The site was reseeded and should vegetate very well with upcoming rains.



Chronology of Operations

1. *February 27, 2008 – Phoenix mobilized on-site. The first order on the agenda was a tailgate safety meeting to review any potential safety concerns of the site and to cover the clean- up operations. (Please note that a daily safety meeting is the first order of the day before any work begins on site). New Mexico One Call was notified of the intent to finish the pit closure*
2. *February 28, 2008 – Crew began excavating impacted soils from the drying pad and loaded the soils into trucks. Trucks hauled 120 cubic yards of drill cuttings off site to CRI (Permit #9166), a NMOCD disposal facility.*
3. *February 29, 2008 – Crew continued to excavate impacted soils from the drying pad and loaded into trucks. Trucks hauled 400 cubic yards of impacted soil off site for disposal.*
4. *March 1, 2008 – Crew continued to excavate contents of the drying pad and load the contents into trucks. Trucks hauled 20 cubic yards of drill cuttings off- site for disposal.*
5. *March 3, 2008 - Crew continued to excavate contents of the drying pad and load the contents into trucks. Trucks hauled 40 cubic yards of cuttings off- site for disposal.*
6. *March 4, 2008 – Crew finished hauling impacted soil, from the drying pad to disposal. A total of 100 cubic yards was taken to disposal on this date. The bottom of the work over pit was cleaned. Final samples were taken and sent to a third party laboratory for analysis of Chlorides for final verification of limits. (Please refer to attached reports, pages 6 through 9 of this report).*
7. *April 10, 2008 – Crew push in material from location to backfill drying pad. Final contouring and compactions was implemented to return the site back to grade. Contouring was completed with a crown to prevent rainwater ponding.*



Final Closure Report

Page 5 of 13

Company: Cimarex Energy Company of Colorado
Location: Antero 12 Fee #3

Limitations

Phoenix Environmental LLC has prepared this report to the best of its ability. No other warranty expressed, implied or intended is made.

This report has been prepared for Cimarex Energy Company of Colorado our client. The information contained in this report including all exhibits and attachments, may not be used by any other party without the express consent from Phoenix Environmental LLC and/or the client.

Certification

The following Phoenix/Cimarex personnel have reviewed this report and verify that to the best of their knowledge the contents are true and correct.

Name: **Allen Hodge, REM # 7096**

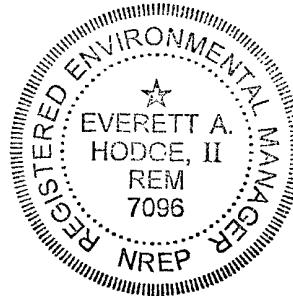
Signature: 

Title: VP Operations
Phoenix Environmental LLC

Name: **Dorsey Rogers**

Signature: 

Title: Drilling Superintendent
Cimarex Energy Company of Colorado





SECTION III



SUMMARY SOIL ANALYSIS REPORT

Client: Cimarex Energy Co.
Supervisor: Allen Hodge
Sample Matrix: Soil

Facility: Antero 12 Fee #3
Order No.: Dorsey Rogers
Samples Received: Intact on site

Initial Project Screening

Sample	Date	Depth	Chlorides	TPH	BTEX	Location	Test Method
#1							
#2							
#3							
#4							
#5							
#6							

Samples reported in parts per million (ppm) and depth is in feet (') and inches (")

Interim Project Screening

Sample	Date	Depth	Chlorides	PID TPH	PID BTEX	Location	Test Method
#1	2/28/08	2.5'	100			Northeast Quarter	EPA 325.3
#2	2/28/08	2.5'	100			Northwest Quarter	EPA 325.3
#3	2/28/08	2.5'	100			Southeast Quarter	EPA 325.3
#4	2/28/08	2.5'	720			Southwest Quarter	EPA 325.3
#5							
#6							
#7							
#8							
#9							
#10							
#11							
#12							
#13							
#14							
#15							
#16							

Samples reported in parts per million (ppm) and depth is in feet (') and inches (")

Final (Third Party Laboratory) Project Screening Verification

Sample	Date	Depth	Chlorides	TPH	BTEX	Location	Test Method
#1	3/6/08	2.5'	<32.5			Northeast Quarter	See Report
#2	3/6/08	2.5'	<32.5			Northwest Quarter	See Report
#3	3/6/08	2.5'	<32.5			Southeast Quarter	See Report
#4	3/6/08	2.5'	<32.5			Southwest Quarter	See Report
#5							
#6							
#7							

Samples reported in parts per million (ppm) and depth is in feet (') and inches (")



Phoenix Environmental, LLC.
P.O. Box 1856 – 2113 French Drive
Hobbs, New Mexico 88241
505.391.9685 – FAX: 505.391.9687

SOIL ANALYSIS REPORT

Date: 2/28/08
Client: Cimarex Energy Co.
Supervisor: Trey Hughes
Sample Matrix: Soil

Facility: Antero 12 Fee #3
Test Method: EPA 325.3
Order No.: Dorsey Rogers
Sample Received: Intact on site

<u>Sample</u>	<u>Cl (ppm)</u>	<u>Depth (feet)</u>	<u>Location</u>
#1	100	2.5'	Northeast Quarter
#2	100	2.5'	Northwest Quarter
#3	100	2.5'	Southeast Quarter
#4	720	2.5'	Southwest Quarter

COMMENTS: Sample meet limits for NMOCD guidelines for unlined pit closure.

Summary Report

Trey Hughes
B & R Trucking
4311 Monica Lane
Carlsbad, NM, 88220

Report Date: March 20, 2008

Work Order: 8030609



Project Location: Antero 12 #3 (Nom)
Project Name: Drying Pad
Project Number: Cimarex

Sample	Description	Matrix	Date Taken	Time Taken	Date Received
152661	NE Quad	soil	2008-02-28	13:00	2008-03-06
152662	NW Quad	soil	2008-02-28	13:30	2008-03-06
152663	SE Quad	soil	2008-02-28	14:00	2008-03-06
152664	SW Quad	soil	2008-02-28	14:30	2008-03-06

Sample: 152661 - NE Quad

Param	Flag	Result	Units	RL
Chloride		<32.5	mg/Kg	3.25

Sample: 152662 - NW Quad

Param	Flag	Result	Units	RL
Chloride		< 32.5	mg/Kg	3.25

Sample: 152663 - SE Quad

Param	Flag	Result	Units	RL
Chloride		< 32.5	mg/Kg	3.25

Sample: 152664 - SW Quad

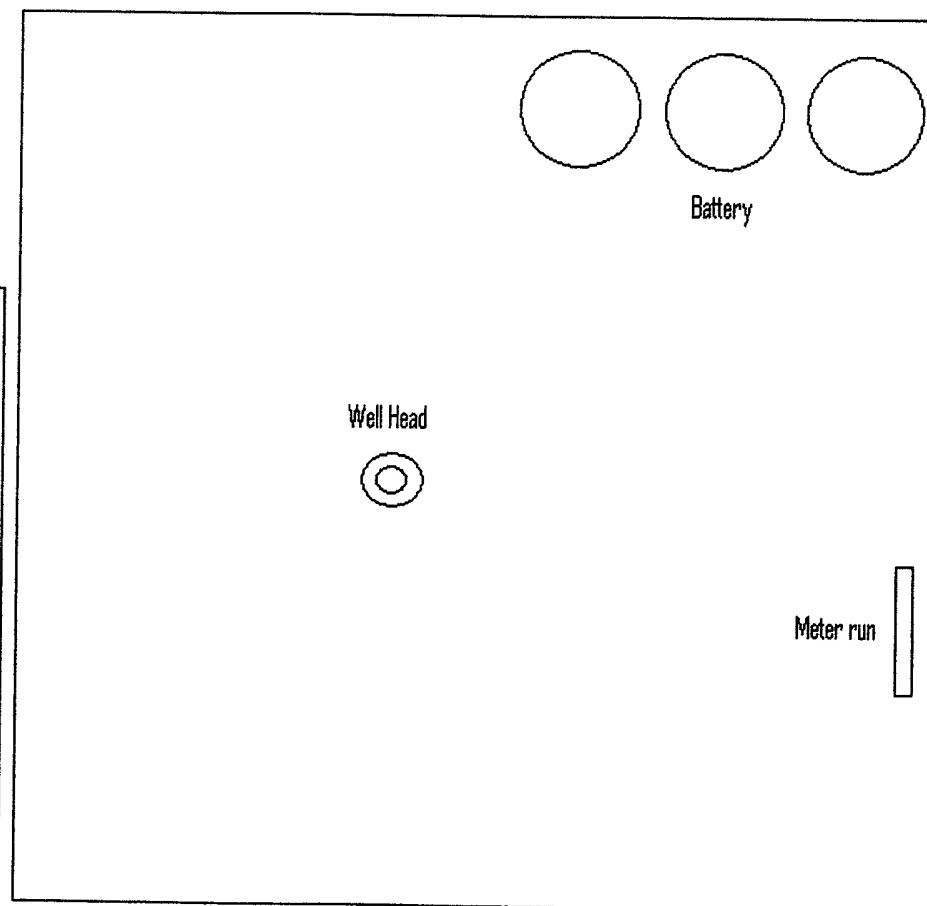
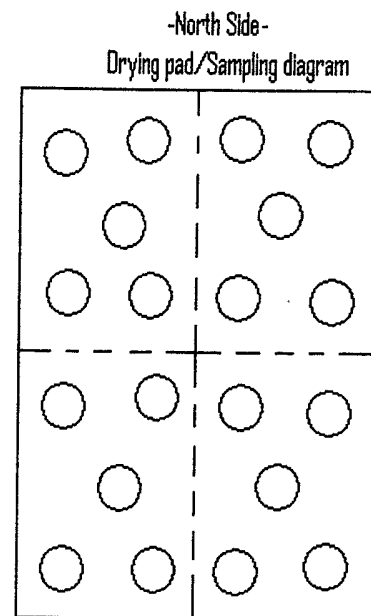
Param	Flag	Result	Units	RL
Chloride		< 32.5	mg/Kg	3.25



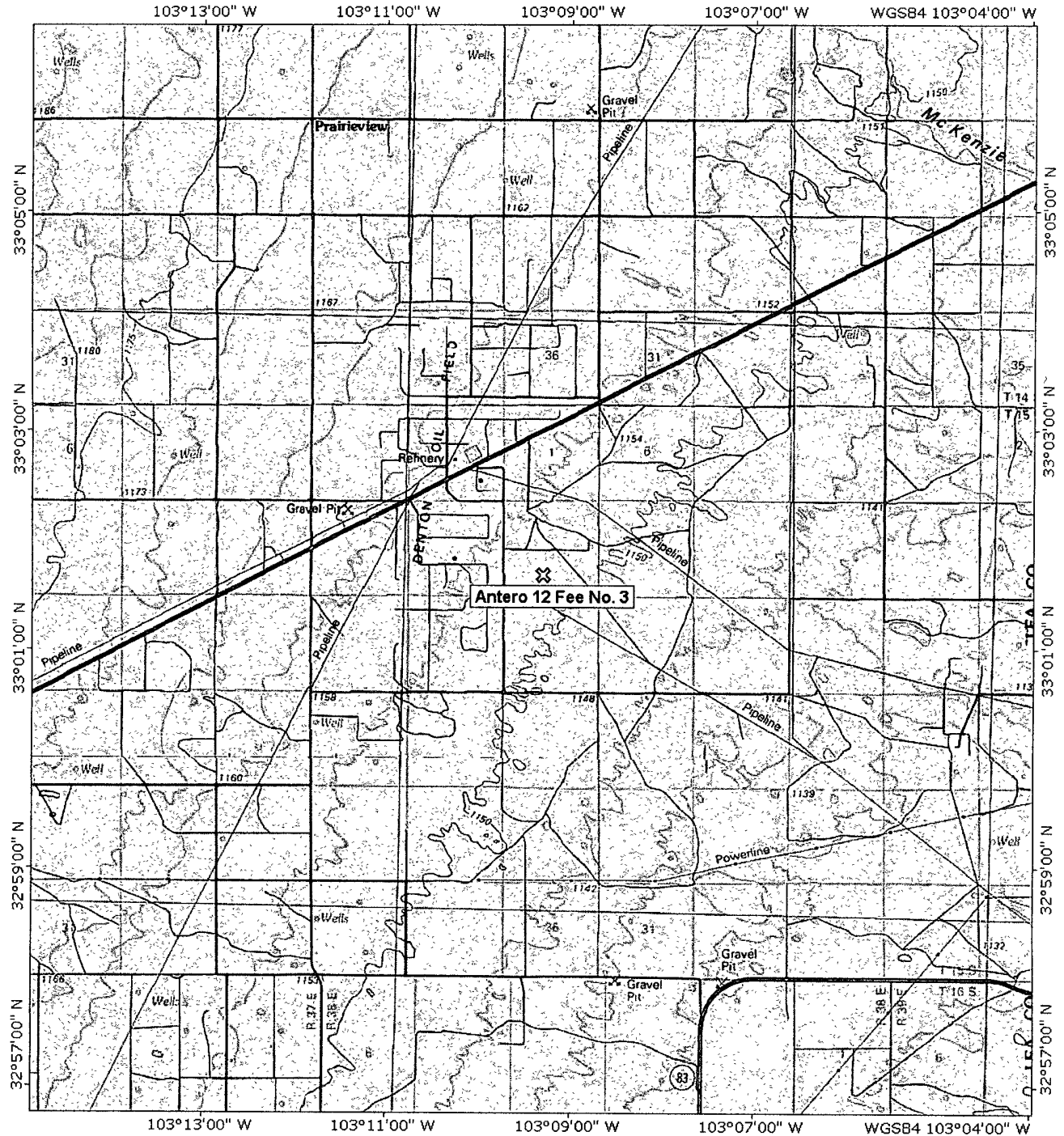
SECTION IV

Cimarex Energy Co.
Antero 12 #3
Sampling/Location diagram

The Excavation included the removal of all mud, liner, and 6" of soil under liner.
Field samples were then performed and digging continued where necessary.
The drying pad was divided into four equal quadrants. Five samples were taken in each quad (one in each corner and one in the center) they were then combined into one composite sample for that quad.



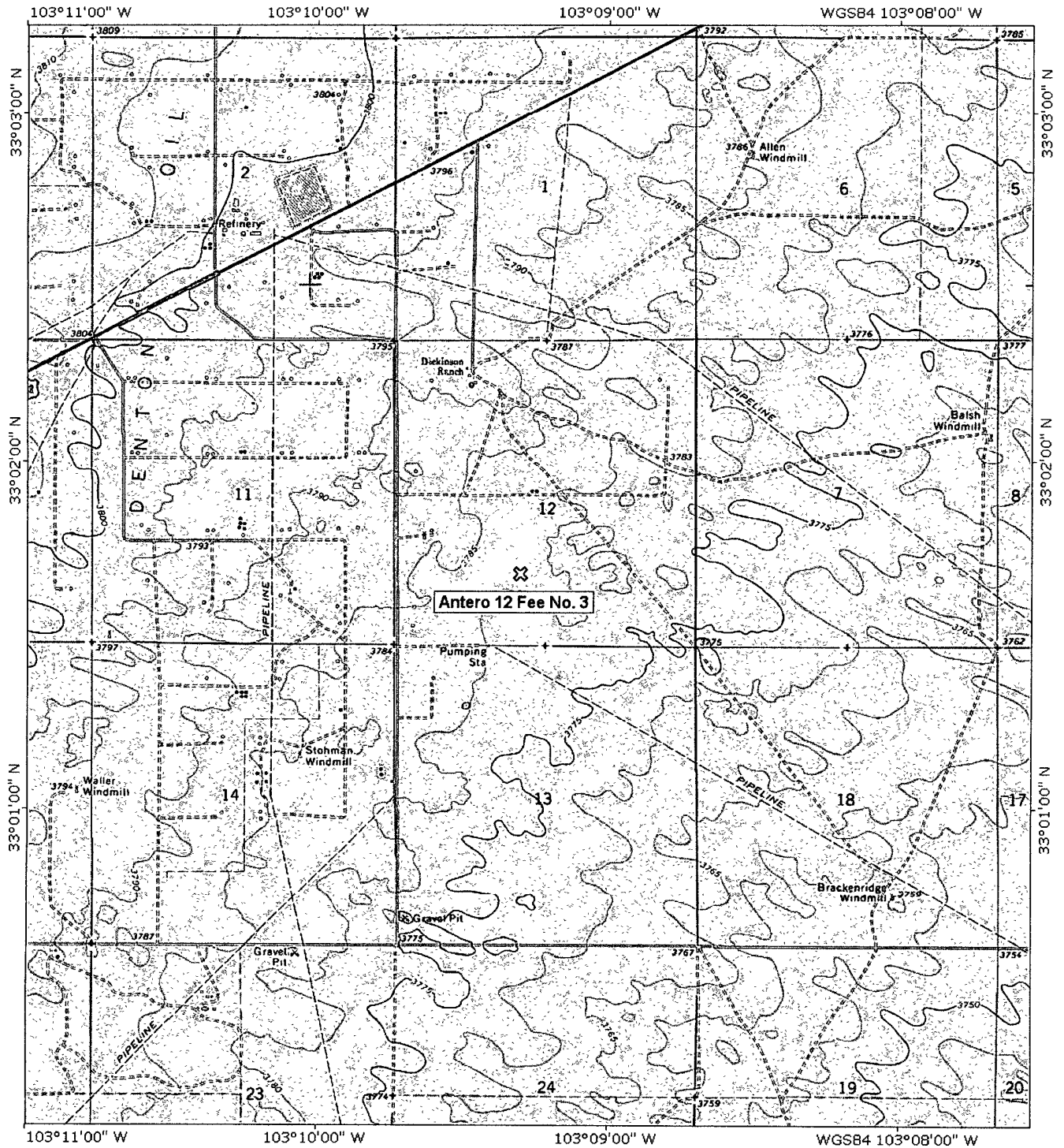
TOPO! map printed on 01/29/09 from "Untitled.tpo"



Map created with TOPO!® ©2003 National Geographic (www.nationalgeographic.com/topo)



TOPO! map printed on 01/29/09 from "Untitled.tpo"



TN 8°

0 1000 FEET 0 500 1000 METERS
Map created with TOPO!® ©2003 National Geographic (www.nationalgeographic.com/topo)





SECTION V

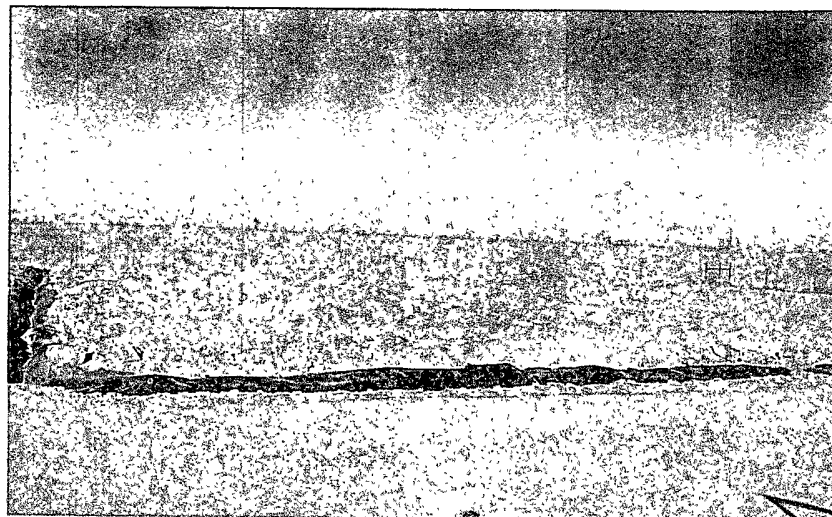


Photo #1 Beginning View of Drying Pad

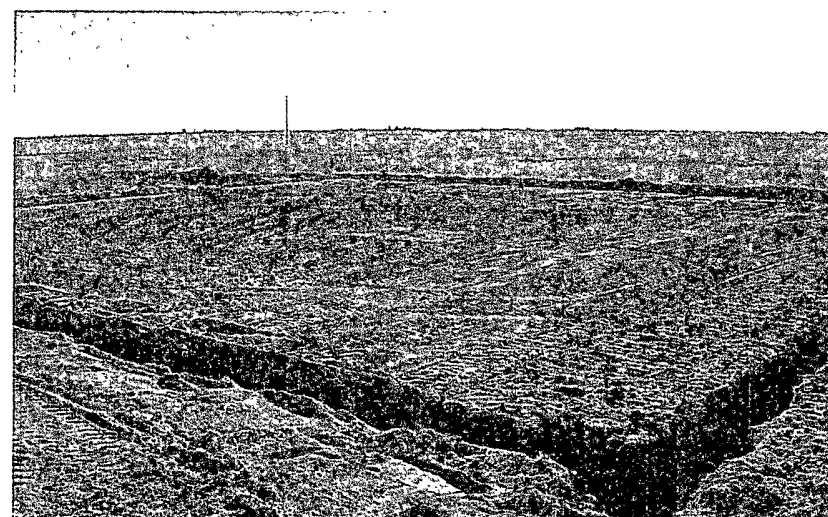


Photo #2 Drying Pad being Cleaned off

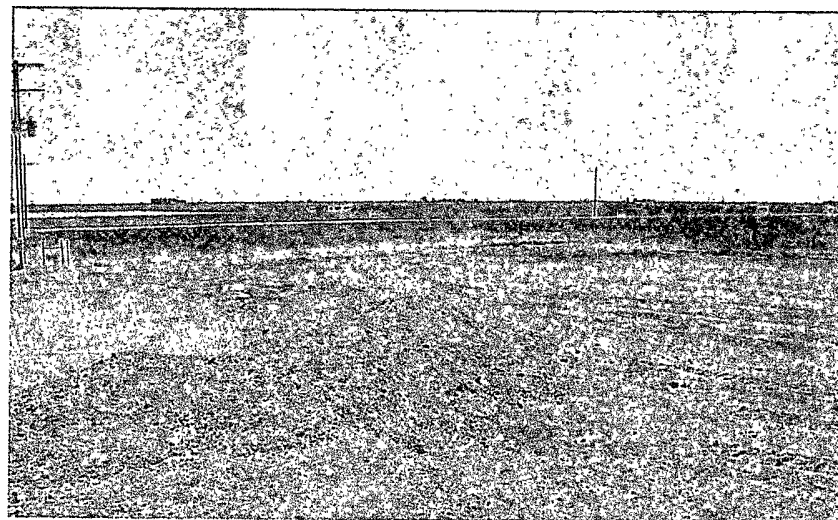


Photo #3 Dressing Location

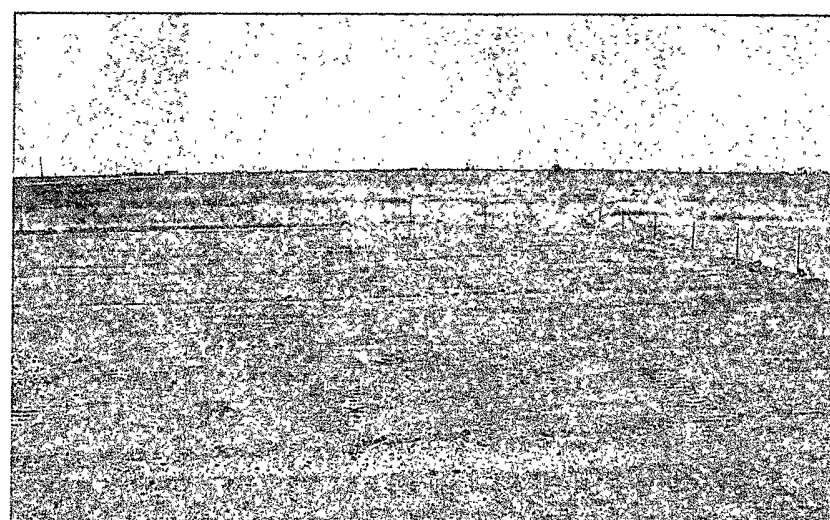


Photo #4 Final View of Location

