NM1 - 2

GENERAL CORRESPONDENCE

YEAR(S):

9/2003 → 1988

NEW MEXICO ENERGY, MINERALS and NATURAL RESOURCES DEPARTMENT

BILL RICHARDSON
Governor
Joanna Prukop
Cabinet Secretary

Lori Wrotenbery
Director
Oil Conservation Division

September 17, 2003

Mr. Frates Seeligson
4040 Broadway Suite 510
San Antonio, TX 78209

Re: Case No. 13167
Application of the New Mexico Oil Conservation Division through the Environmental Bureau Chief to Revoke the Permit of A.L. Daugherty to Operate an Oil Treatment Plant and Disposal Facility and to Release Bond; Chaves County, New Mexico.

Dear Mr. Seeligson;

By letter dated August 8, 2003, the Division notified you that it intended to revoke the permit for the Daugherty-Crosby Salt Lake Treating Plant and Disposal Facility at Section 19, T8 S, R 30 E; Section 24, T 8 S, R 29 E; and Section 19, T 8 S, R 29 E, NMPM, in Chaves County, New Mexico, if it did not receive a request from you to keep the permit. The Division did not receive such a request. Therefore, the Division is proceeding with a permit revocation hearing.

A hearing will be conducted by a Division hearing examiner in Porter Hall, first floor, 1220 South St. Francis Drive, Santa Fe, New Mexico, at 8:15 a.m. on Thursday, October 9, 2003. At that hearing, you will have an opportunity to oppose the revocation of the permit.

If you have any questions, please do not hesitate to call me at (505) 476-3451.

Very truly yours,

Gail MacQuesten
Assistant General Counsel

ec: Martyne Kieling

NEW MEXICO ENERGY, MINERALS and NATURAL RESOURCES DEPARTMENT

BILL RICHARDSON
Governor
Joanna Prukop
Cabinet Secretary

Lori Wrotenbery
Director
Oil Conservation Division

August 8, 2003

Mr. Frates S. Seeligson
4040 Broadway Suite 510
San Antonio, TX 78209

VIA CERTIFIED MAIL 7001-1904-0004-3929-9918

Re: Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E; and Section 19, T 8 S, R 29 E, NMPM, Chaves County, New Mexico Permitted by Order No. R-5464 issued in Case No. 5922, under date of June 14, 1977.

Dear Mr. Seeligson:

The Oil Conservation Division (OCD) has determined that disposal operations have ceased at the referenced facility. Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility submitted a closure plan that was approved by the OCD on January 31, 2003. Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility submitted a closure reports dated June 1, 2003. The closure of the facility was approved by the OCD on August 8, 2003.

In the absence of a response to this letter, the Division will proceed with an application for a hearing to show cause why the permit for this facility should not be revoked. You posted a surety bond, in the amount of $25,000, No. 111 3268 3654 issued by Fireman's Fund Insurance Co. on Apirl 10, 1989. Upon revocation of the permit this Bond will be released.

Unless the permitee submits to this office, no later than August 29, 2003 a request to keep the permit, the Division will proceed to schedule a permit revocation hearing.

Should you have any questions, please call Martyne Kieling at (505)-476-3488.

Sincerely,

Roger C. Anderson
Environmental Bureau Chief

ec: David K. Brooks, OCD legal
OCD ~~Hobbs~~ Artesia

New Mexico Office of the State Engineer
Well Reports and Downloads

Township: 08S Range: 31E Sections:

NAD27 X: Y: Zone: Search Radius:

County: Basin: Number: Suffix:

Owner Name: (First) (Last) ○ Non-Domestic ○ Domestic ◉ All

Well / Surface Data Report | Avg Depth to Water Report | Water Column Report

Clear Form | WATERS Menu | Help

WELL / SURFACE DATA REPORT 10/21/2003

(quarters are 1=NW 2=NE 3=SW 4=SE)
(quarters are biggest to smallest X Y are ir

DB File Nbr	Use	(acre ft per annum) Diversion	Owner	Well Number	Source	Tws	Rng	Sec	q	q	q	Zone
RA 08329	DOM	3	GRAVES	RA 08329		08S	31E	06	3	1		
RA 08364	STK	4	FRATES SEELINGSON	RA 08364		08S	31E	32	1	2	3	
RA 08366	STK	2.5	FRATES SEELINGSON	RA 08366		08S	31E	19	4	1	1	

Record Count: 3

NEW MEXICO ENERGY, MINERALS and NATURAL RESOURCES DEPARTMENT

BILL RICHARDSON
Governor
Joanna Prukop
Cabinet Secretary

Lori Wrotenbery
Director
Oil Conservation Division

August 8, 2003

Mr. Frates S. Seeligson
4040 Broadway Suite 510
San Antonio, TX 78209

RE: CLOSURE
Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility
Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E;
and Section 19, T 8 S, R 29 E, NMPM, Chaves County, New Mexico

Dear Mr. Seeligson:

The New Mexico Oil Conservation Division (OCD) is in receipt Safety & Environmental Solutions, Inc. closure report dated June 1, 2003, for the Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility at the above-referenced location. Based on the closure report and the May 28, 2003 and August 6, 2003 OCD inspection, the OCD has determined that the Daughtery - Crosby Salt Lake treating plant has been remediated to OCD standards and the site has been restored to prevent erosion. **The OCD hereby approves of the closure of Daughtery - Crosby Salt Lake treating plant.**

Please be advised that OCD approval does not relieve Daughtery - Crosby Salt Lake of liability should any remaining contaminants result in pollution of the ground water, surface water or the environment. In addition, OCD approval does not relieve Daughtery - Crosby Salt Lake of the responsibility for compliance with other federal, state, or local laws and/or regulations.

If you have any questions please contact Martyne J. Kieling at 505-476-3488.

Sincerely,

Roger C. Anderson
Environmenal Bureau Chief

xc: Artesia OCD
Bob Allen, Safety & Environmental Solutions, Inc., 703 E. Clinton, Suite 102, Hobbs, NM 88240

STATE OF NEW MEXICO
ENERGY MINERALS AND NATURAL RESOURCES DEPARTMENT
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

✓ Telephone ____ Personal Time 3:15 Date 8-6-03

Originating Party: Mike Stubblefield, OCD Artesia District office

Other Parties: Martyne Kieling, Environmental Bureau

Subject: Daugherty Treating Plant. Mike Performed a final inspection of the Treatment Area, Lake area, and Disposal Pit Area.

Inspection August 6, 2003

Discussion: There is no Material Coming to the Surface at the Disposal Pit Area. The lake Area Shows just a little contaminated Material that is visible in the Heat of the day. Report Says 98% of the Lake material was Removed. This is very Accurate & Looks Good

The Pipeline & Spill Area Along the Slope Looks to be in great Shape even with the Rains that they Have Had. much of the Hard Asphaltrens Have been Broken up ~~and Hauled~~ with the Cross Slope Grading & Ripping.

The treatment Area Look Good ALSO

Conclusions or Agreements: Closure is Approved From the District Level. I will Proceede writing the Closure Approval. and then Request that the ORDER Be Released.

Distribution

Signed Martyne Kieling

RECEIVED
JUN 0 9 2003
Environmental Bureau
Oil Conservation Division

Daughtery – Crosby Salt Lake Treating Plant and Disposal Facility Closure Report
Section 19, Township 8S, Range 30E
Section 24, Township 8S, Range 30E
Section 19, Township 8S, Range 29E
Chaves County, New Mexico

June 1, 2003

Prepared for:

Mr. Frates S. Seeligson
4040 Broadway Suite 510
San Antonio, Texas 78209

By:

Safety & Environmental Solutions, Inc.
703 E. Clinton Suite 103
Hobbs, New Mexico 88240
(505) 397-0510

TABLE OF CONTENTS

I. Background

Safety & Environmental Solutions, Inc. (SESI) was contracted by Frates Seeligson to perform assessment and cleanup services on the area identified as the Daughtery – Crosby Salt Lake Treating Plant and Disposal Facility in the letter from the New Mexico Oil Conservation Division (NMOCD) to Mr. Frates S. Seeligson dated October 22, 2002. The subject area is located in Section 19, Township 8S, Range 30E, Section 24, Township 8S, Range 30E, and Section 19, Township 8S, Range 29E, in Chaves County, New Mexico. The site is situated on the White Lake Ranch privately owned by Mr. Kent Gable. The site was an NMOCD approved treating and reclaiming facility operated from the late 1970s to the late 1980s. The site is currently abandoned.

II. Contaminant and Size of Leak

The suspected contaminant is crude oil and produced water associated with the treating and reclaiming facility. The crude oil and produced water is considered exempt oilfield waste. No evidence of other contaminants was observed.

III. Surface and Ground Water

There is no protectable groundwater in the area according to the database provided by the New Mexico State Engineer's Office.

IV. Soils

The soils in the area are predominantly sand and sandy loam.

V. Work Performed

The above referenced letter required that the following areas be addressed at the subject site: Process Area, Flow Lines, Above Ground Tanks, Crosby Salt Lake and Area between Process Area and Crosby Lake.

The closure of each area is detailed below.

Process Area

Surface contamination in the form of "hardpan" or well-degraded hydrocarbons was present in the process area. There was no evidence of contamination that would migrate either vertically or horizontally from that area. The hardpan was disced in place and broken into small pieces, which will hasten natural attenuation in the area.

Flow Lines

All flowlines were cut into 6' sections and transported to the City of Roswell, solid waste landfill. The total weight of the discarded flowlines was 8.5 tons.

Above Ground Tanks

The two above ground tanks at the site were removed by Wilbanks Trucking Company of Artesia, New Mexico, who accepted the tanks for disposal. The area where the tanks were located was returned to natural grade.

Crosby Salt Lake

The hydrocarbon material at the lake was excavated and disposed of onsite at the location near the lake agreed upon by the NMOCD at the last inspection in December 2002. Two disposal trenches were excavated at that location. One trench was 180' long, 25' wide and 18' deep resulting in the removal of 3,900 cubic yards of soil. Approximately 2,167 cubic yards of contaminated material was placed into this pit and the pit was capped with approximately 2,500 cubic yards of clay and sand. The second trench was 180' long, 30' wide and 16' deep resulting in the removal of approximately 4,160 cubic yards of soil. Approximately 2,600 cubic yards of contaminated material was placed into this pit and the pit was capped with approximately 2,500 cubic yards of clay and sand. The remaining soil that was excavated from the pits was used to build a roadway from the lakebed to the disposal site. This road was ripped and left in place after completion of the project.

SESI retrieved composite sample of the Dunes and the Discard Area. The samples were preserved on ice and sent under chain of custody to Cardinal Laboratories of Hobbs, New Mexico. The samples were analyzed for TPH (EPA method SE-846 8015 M), BTEX (EPA method SW-846 8260, and Chlorides (EPA method 4500-Cl^-B). The results of the analysis are as follows:

ID	GRO	DRO	Cl^-	Benzene	Toluene	Ethyl Benzene	Total Xylenes
D.C. Comp #1 Dunes	<10.0	233	5520	<0.005	<0.005	<0.005	<0.015
D.C. Comp #2 Dunes	<10.0	42.1	1020	<0.005	<0.005	<0.005	<0.015
D.C. Discard Area	<10.0	271	160	<0.005	<0.005	<0.005	<0.015

Area between Process Area and Crosby Lake

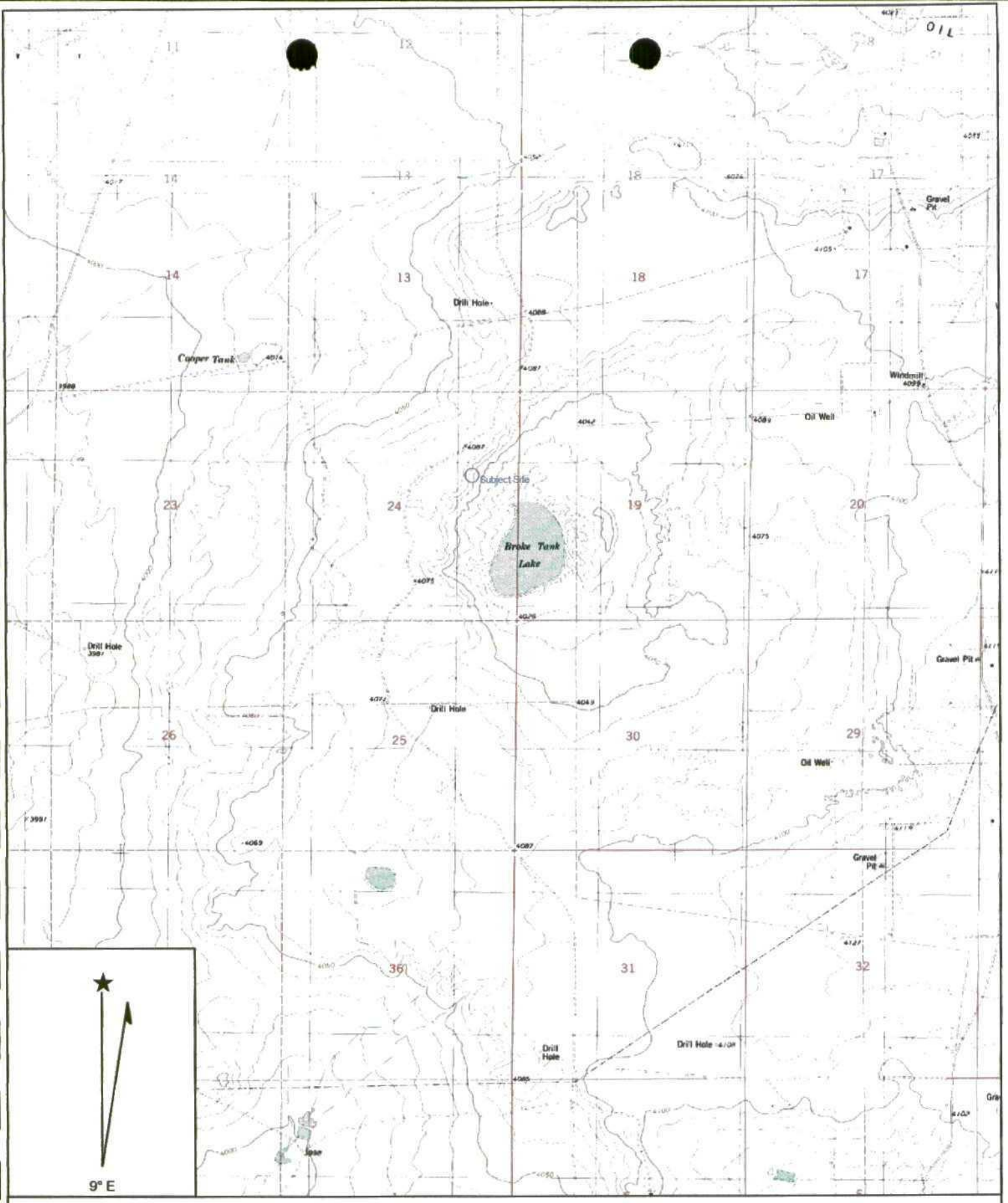
This area contained degraded hydrocarbon contamination along two "run" areas. This area was approximately 600' X 600' and was "disced" in place and broken into small pieces, which will hasten natural attenuation in the area.

The area was worked in a manner to avoid future erosion of the area. No vertical or horizontal investigation was performed in this area.

VI. Figures & Appendices

Figure 1 - Vicinity Map
Appendix A - Analytical Results
Appendix B - Site Photos

Figure 1
Vicinity Map



Name: PRESLER LAKE
Date: 1/11/2003
Scale: 1 inch equals 2857 feet

Location: 033° 35' 56.5" N 103° 55' 46.4" W
Caption: Frates Seeligson
Daughtery - Crosby Salt Lake
Treating Plant _Disposal Facility

Appendix A
Analytical Results

CARDINAL LABORATORIES

PHONE (915) 673-7001 • 2111 BEECHWOOD • ABILENE, TX 79603
PHONE (505) 393-2326 • 101 E. MARLAND • HOBBS, NM 88240

ANALYTICAL RESULTS FOR
SAFETY & ENVIRONMENTAL SOLUTIONS, INC.
ATTN: BOB ALLEN
703 E. CLINTON, #103
HOBBS, NM 88240
FAX TO: (505) 393-4388

Receiving Date: 05/19/03
Reporting Date: 05/20/03
Project Number: SEE-02-001
Project Name: NOT GIVEN
Project Location: NOT GIVEN

Sampling Date: 05/16/03
Sample Type: SOIL
Sample Condition: COOL & INTACT
Sample Received By: BC
Analyzed By: BC

LAB NUMBER	SAMPLE ID	GRO (C_6-C_{10}) (mg/Kg)	DRO (>C_{10}-C_{28}) (mg/Kg)	Cl* (mg/Kg)
ANALYSIS DATE		05/20/03	05/20/03	05/20/03
H7668-1	D.C. COMP #1 DUNES	<10.0	233	5520
H7668-2	D.C. COMP #2 DUNES	<10.0	42.1	1020
H7668-3	D.C. DISCARD AREA	<10.0	271	160
Quality Control		814	844	990
True Value QC		800	800	1000
% Recovery		102	106	99.0
Relative Percent Difference		2.5	3.4	6.0

METHODS: TPH GRO & DRO: EPA SW-846 8015 M; Cl^-: Std. Methods 4500-Cl^-B
*Analyses performed on 1:4 w:v aqueous extracts.

Chemist

5/20/03
Date

H7668A.XLS

CARDINAL LABORATORIES

PHONE (915) 673-7001 • 2111 BEECHWOOD • ABILENE, TX 79603
PHONE (505) 393-2326 • 101 E. MARLAND • HOBBS, NM 88240

ANALYTICAL RESULTS FOR
SAFETY & ENVIRONMENTAL SOLUTIONS, INC.
ATTN: BOB ALLEN
703 E. CLINTON, #103
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FAX TO: (505) 393-4388

Receiving Date: 05/19/03
Reporting Date: 05/20/03
Project Number: SEE-02-001
Project Name: NOT GIVEN
Project Location: NOT GIVEN

Sampling Date: 05/16/03
Sample Type: SOIL
Sample Condition: COOL & INTACT
Sample Received By: BC
Analyzed By: BC

LAB NUMBER	SAMPLE ID	BENZENE (mg/Kg)	TOLUENE (mg/Kg)	ETHYL BENZENE (mg/Kg)	TOTAL XYLENES (mg/Kg)
ANALYSIS DATE		05/19/03	05/19/03	05/19/03	05/19/03
H7668-1	D.C. COMP #1 DUNES	<0.005	<0.005	<0.005	<0.015
H7668-2	D.C. COMP #2 DUNES	<0.005	<0.005	<0.005	<0.015
H7668-3	D.C. DISCARD AREA	<0.005	<0.005	<0.005	<0.015
Quality Control		0.090	0.092	0.088	0.262
True Value QC		0.100	0.100	0.100	0.300
% Recovery		89.8	91.9	88.2	87.2
Relative Percent Difference		3.2	6.6	2.0	1.6

METHOD: EPA SW-846 8260

Chemist

5/20/03
Date

CARDINAL LABORATORIES, INC.

2111 Beechwood, Abilene, TX 79603 (915) 673-7001 Fax (915) 673-7020
101 East Marland, Hobbs, NM 88240 (505) 393-2326 Fax (505) 393-2476

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Company Name: SESI	BILL TO PO #:
Project Manager:	Company: SAME
Address: 703 E. CLINTON, #103	Attn:
City: HOBBS State: NM Zip: 88240	Address:
Phone #: (505) 397-0510	City:
Fax #: (505) 393-4388	State: Zip:
Project #: 352-02-0011 Project Owner:	Phone #:
Project Name:	Fax #:
Project Location:	

ANALYSIS REQUEST

FOR LAB USE ONLY LAB I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX: GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER:	PRES.: ACID:	ICE / COOL	OTHER:	SAMPLING: DATE	TIME	BTEX 8021B	TPH 8015	Chlorides
H76684	D.C. Comp #1 Dum	C	1			✓					✓		5-16-03	9:44	✓	✓	✓
-2	D.C. Comp #2 Dum	C	1			✓					✓		5-16-03	9:55	✓	✓	✓
-3	D.C. Discard Pile	C	1			✓					✓		5-16-03	10:09	✓	✓	✓

PLEASE NOTE: Liability and Damages. Cardinal's liability and client's exclusive remedy for any claim arising whether based in contract or tort, shall be limited to the amount paid by the client for the analyses. All claims including those for negligence and any other cause whatsoever shall be deemed waived unless made in writing and received by Cardinal within 30 days after completion of the applicable service. In no event shall Cardinal be liable for incidental or consequential damages, including without limitation, business interruptions, loss of use, or loss of profits incurred by client, its subsidiaries, affiliates or successors arising out of or related to the performance of services hereunder by Cardinal, regardless of whether such claim is based upon any of the above stated reasons or otherwise.

Terms and Conditions: Interest will be charged on all accounts more than 30 days past due at the rate of 24% per annum from the original date of invoice, and all costs of collections, including attorney's fees.

Sampler Relinquished:	Date: 5-19-03	Received By:	Phone Result ☐ Yes ☐ No Additional Fax #:
	Time: 10:00		Fax Result: ☐ Yes ☐ No
Relinquished By:	Date: 5/19/03	Received By: (Lab Staff)	REMARKS:
	Time: 11:20		
Delivered By: (Circle One)	Sample Condition: Cool ☑ Yes ☐ No	Intact ☑ Yes ☐ No	CHECKED BY: (Initials)
Sampler - UPS - Bus - Other:			

† Cardinal cannot accept verbal changes. Please fax written changes to 915-673-7020.

Appendix B
Site Photos

Process Area Before 11/20/02

Process Area Before 11/20/02

Lake Shore Before 11/20/02

Lake Shore Before 11/20/02

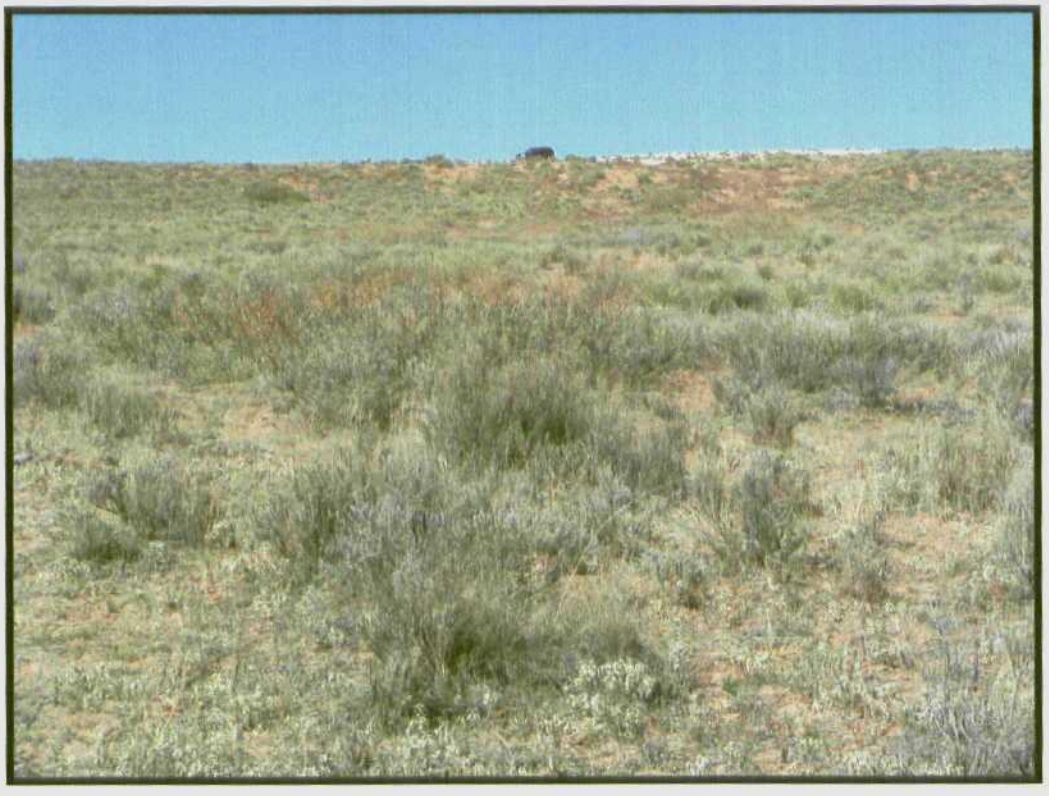
Lake Shore Before 11/20/02

Lake Shore Before 11/20/02

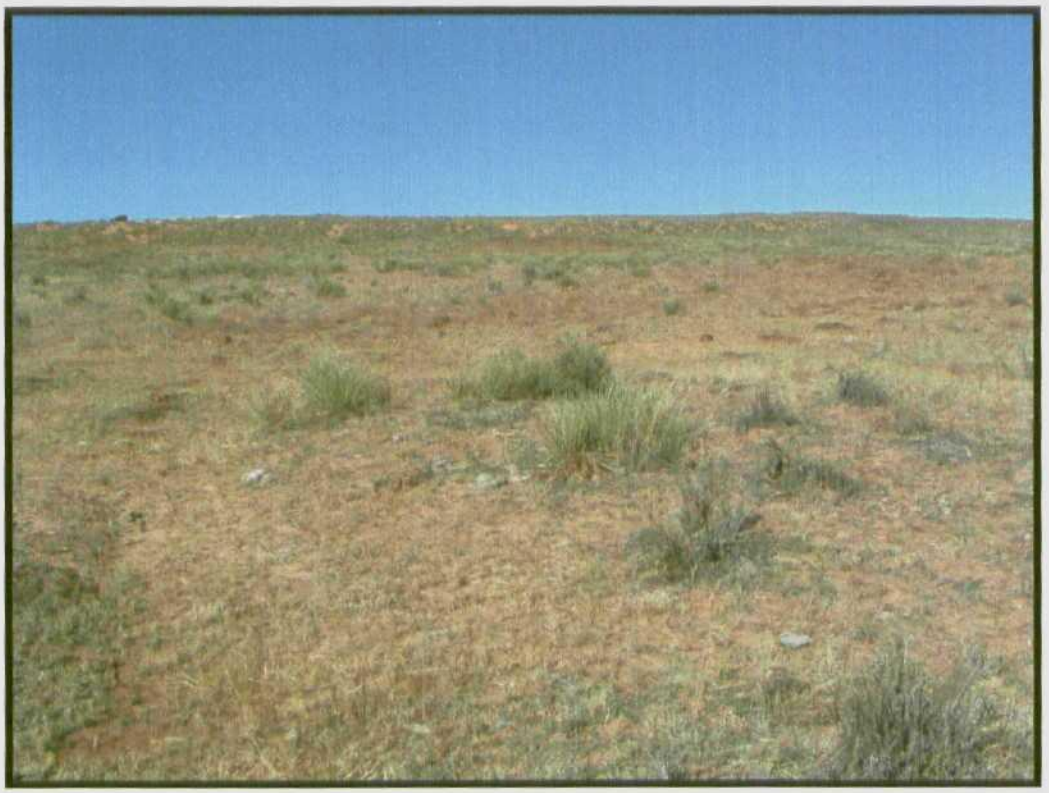
Typical "Run" at Lake Shore 11/20/02

More "Run" at Lake Shore 11/20/02

Lake Shore 11/20/02



"Run" Area Between Process Area & Lake Bed 11/20/02



"Run" Area Between Process Area & Lake Bed 11/20/02

"Run" Area 11/20/02

"Run" Area 11/20/02

Lake Shore During Excavation 3/5/03

"Typical" Material Found at Lake Shore 3/5/03

Lake Shore During Excavation 3/5/03

Lake Shore During Excavation 3/5/03

"Typical" Material Found at Lake Shore 3/5/03

Lake Shore During Excavation 3/21/03

Trench #1 3/21/03

Trench #1 3/21/03

Lake Shore During Excavation 3/25/03

Lake Shore During Excavation 3/25/03

Spoils Pile 3/25/03

Lake Shore 3/25/03

Spoils Pile 3/25/03

Spoils Pile 3/25/03

Spoils Pile 3/25/03

Spoils Pile 3/25/03

Contaminated Material Being Placed in Trench 3/25/03

Partially Filled Trench #1 3/25/03

Partially Filled Trench #1 3/25/03

Lake Shore 4/4/03

Lake Shore 4/4/03

Lake Shore 4/4/03

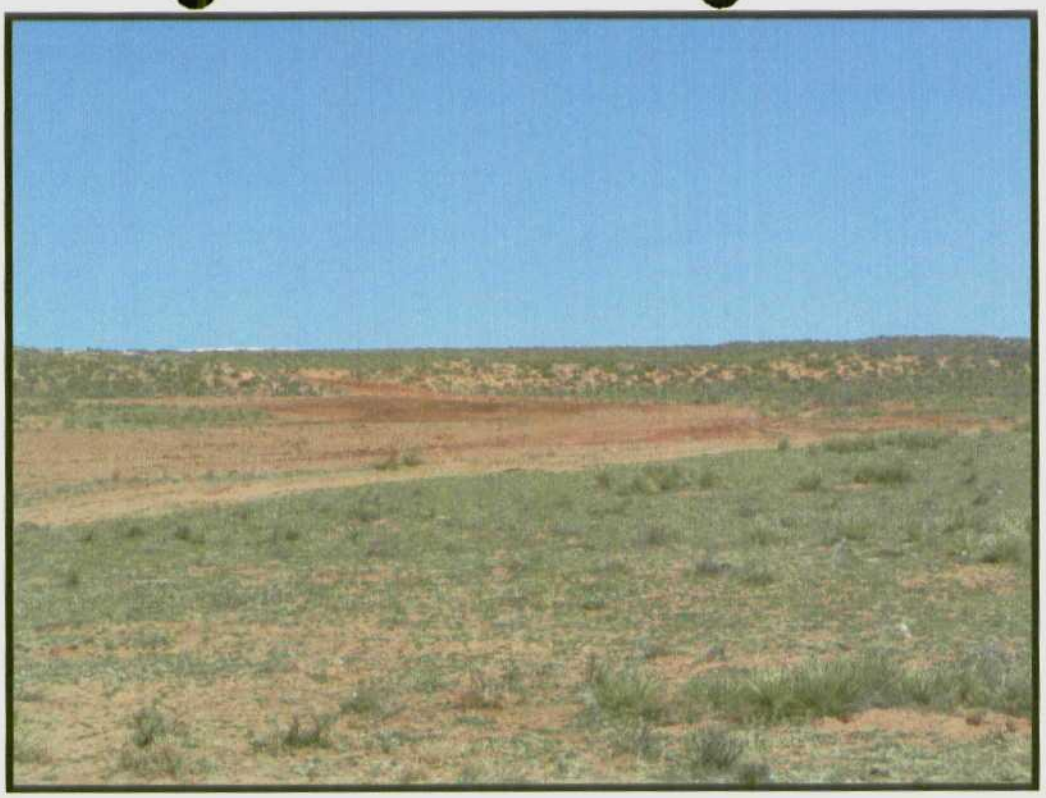
Lake Shore 4/4/03

Trench #2 4/4/03

Lake Shore 4/4/03

"Run" Area Between Process Area & Lake 4/4/03

"Run" Area Between Process Area & Lake 4/4/03



"Run" Area Between Process Area & Lake 4/4/03

"Run" Area Between Process Area & Lake 4/4/03

"Run" Area Between Process Area & Lake 4/4/03

Lake Shore Final 5/16/03

Lake Shore Final 5/16/03

Example of Isolated Small Run
Soil Sampled Underneath This Run 5/16/03

Soil Sample Location5/16/03

Capped Trench 5/16/03

Capped Trench 5/16/03

Run Area 5/16/03

Run Area 5/16/03

Run Area 5/16/03

Process Area Final 5/16/03

Overview of Project Final 5/16/03

Overview of Project Final 5/16/03

Above Ground Tank Area Final 5/16/03

Kieling, Martyne

From: Stubblefield, Mike
Sent: Friday, March 28, 2003 2:44 PM
To: Kieling, Martyne
Cc: Arrant, Bryan
Subject: Remediation actions Daughtery Treating Plant & Disposal Facility

Martyne,

Here are some photo's taken on my inspection today.
The remediation actions will probably be concluded today
along the lake shores and on the sand dune area to the east
of the lake playas. Some of the photo's are of the disposal pit
excavated on the bench north and east of lake playas. One disposal
pit has recovered materials in it and the disposal pit being excavated has
the recovered materials stockpiled near it. Bob Allen will not cover the disposal pits
until next Friday giving Frates a chance to see the open pits. Remediation operations
will now start to correct through blending the degraded hydrocarbon going from the closed
treating facilty site down to the lake playas.
Will keep you informed as the project progresses.

Mike S.


MVC-005F.JPG


MVC-006F.JPG


MVC-007F.JPG


MVC-008F.JPG


MVC-009F.JPG


MVC-010F.JPG


MVC-011F.JPG


MVC-012F.JPG


MVC-013F.JPG

Kieling, Martyne

From: Stubblefield, Mike
Sent: Wednesday, March 12, 2003 7:10 AM
To: Kieling, Martyne
Subject: RE: Daughtery/White Lakes

Martyne,

I made my weekly visit to the Daughtery treating site yesterday.
A backhoe is on site excavating and stockpiling the degraded
hydrocarbon from the lake shores. There are some places were contamination
has penetrated deeper than expected. Bob Allen is meeting with Frates today before
excavating to vertical extent in the mentioned areas. It is estimated that the stockpiling actions
will take at least two more weeks. When the recovery and stockpiling actions are concluded and the
stockpiled materials are ready for burial I would like to have you inspect the lake shoreline for your approval
on final excavation near the lake. I will E-mail you when the area as I have mentioned is ready for your inspection.

Mike S.

-----Original Message-----
From: Kieling, Martyne
Sent: Tuesday, March 11, 2003 2:56 PM
To: Stubblefield, Mike
Subject: Daughtery/White Lakes

Mike,

How are things going out at the old Daughtery treating plant and the lake shore cleanup. Please advise should I come for a day visit to check on the cleanup around the lake?
as you probably know our travel has been halted as far as per deim is concerned. But I will come if I can squeeze it all in one day. Let me know what you think.

Martyne J. Kieling
Martyne J. Kieling
Environmental Geologist

P.O. Box 1613
703 E. Clinton Suite 102
Hobbs, New Mexico 88240
505/397-0510
Fax 505/393-4388
www.sesi-nm.com

Safety & Environmental Solutions, Inc.

April 17, 2003

Mrs. Martyne Kieling
Environmental Geologist
Oil Conservation Division
P.O. Box 6429
Santa Fe, NM 87504

Dear Martyne:

This letter will request a modification to the approved work plan for the Daughtery-Crosby Salt Lake Treating Plant. As we discussed during our telephone conversation today, Mr. Seeligson had agreed to install boreholes in order to delineate the process area as well as cap it with caliche. However, after further review of that area , it is our feeling that there is only minimal surface contamination in the form of "hardpan" or well degraded hydrocarbons is present in that area. There is no evidence of contamination that would migrate either vertically or horizontally from that area. The "hardpan" can be disced in place and broken into small pieces which will hasten natural attenuation in the area.

Please consider this request to allow only discing the area instead of the original plan. We feel this is a reasonable action considering the overall improvement in the facility due to the completion of the remaining steps in the approved work plan.

Thank you for your consideration in this matter. If I may answer any questions of be of further service, please call me.

Sincerely,

Bob Allen CHMM, REM, CET, CES
President

BA/jra

NEW MEXICO ENERGY, MINERALS and NATURAL RESOURCES DEPARTMENT

BILL RICHARDSON
Governor
Joanna Prukop
Cabinet Secretary

Lori Wrotenbery
Director
Oil Conservation Division

April 21, 2003

Mr. Frates S. Seeligson
4040 Broadway Suite 510
San Antonio, TX 78209

RE: Remediation / Cleanup
Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility
Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E;
and Section 19, T 8 S, R 29 E, NMPM, Chaves County, New Mexico

Dear Mr. Seeligson:

The New Mexico Oil Conservation Division (OCD) has received the letter dated April 17, 2003 from Safety & Environmental Solutions, Inc. requesting to modify the Remediation and Cleanup Work Plan, dated January 10, 2003, for the Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility. The OCD hereby approves of the modification to disc or rip the process area to aid in the natural attenuation.

Please be advised that this approval does not relieve Daughtery-Crosby Salt Lake Treating Plant and Disposal Facility of liability should their operation result in pollution of surface water, ground water, or the environment. In addition, OCD approval does not relieve Daughtery-Crosby Salt Lake Treating Plant and Disposal Facility of responsibility for compliance with other federal, state or local regulations.

If there are any questions, please contact me at (505) 476-3488.

Sincerely

Martyne J. Kieling
Environmental Geologist

xc: Artesia OCD
Bob Allen, Safety & Environmental Solutions, Inc., 703 E. Clinton Suite 102, Hobbs, NM 88240

Kieling, Martyne

From: Stubblefield, Mike
Sent: Friday, April 18, 2003 6:34 AM
To: Kieling, Martyne
Subject: RE: Daughtery

Martyne,

I believe Safety & Environmental Solutions request for modification of the work plan is based on a sound bases and is approval able.

Mike S.

-----Original Message-----
From: Kieling, Martyne
Sent: Thursday, April 17, 2003 3:31 PM
To: Stubblefield, Mike
Subject: Daughtery

Mike,

I received a call from Bob Allen today and he submitted a request to modify the approved work plan for the Daughtery site. When you get a chance can you look this over and with your knowledge of the site give me your recommendation.

Thanks
Martyne

-----Original Message-----
From: Bob Allen [mailto:ballen@sesi-nm.com]
Sent: Thursday, April 17, 2003 2:18 PM
To: Martyne Keeling
Subject:

Bob Allen
Safety & Environmental Solutions, Inc.
505-397-0510

P.O. Box 1613
703 E. Clinton Suite 102
Hobbs, New Mexico 88240
505/397-0510
Fax 505/393-4388
www.sesi-nm.com

Safety & Environmental Solutions, Inc.

April 17, 2003

Mrs. Martyne Kieling
Environmental Geologist
Oil Conservation Division
P.O. Box 6429
Santa Fe, NM 87504

Dear Martyne:

This letter will request a modification to the approved work plan for the Daughtery-Crosby Salt Lake Treating Plant. As we discussed during our telephone conversation today, Mr. Seeligson had agreed to install boreholes in order to delineate the process area as well as cap it with caliche. However, after further review of that area , it is our feeling that there is only minimal surface contamination in the form of "hardpan" or well degraded hydrocarbons is present in that area. There is no evidence of contamination that would migrate either vertically or horizontally from that area. The "hardpan" can be disced in place and broken into small pieces which will hasten natural attenuation in the area.

Please consider this request to allow only discing the area instead of the original plan. We feel this is a reasonable action considering the overall improvement in the facility due to the completion of the remaining steps in the approved work plan.

Thank you for your consideration in this matter. If I may answer any questions of be of further service, please call me.

Sincerely,

Bob Allen

Bob Allen CHMM, REM, CET, CES
President

BA/jra

FRATES SEELIGSON, JR.

3737 Broadway - #210
San Antonio, TX 78209

Phone 210-826-5645
Fax 210-826-5689

February 20, 2003

Ms. Martyne J. Kieling, Environmental Geologist
New Mexico Energy Minerals and Natural Resources Department
Fax #505-476-3462

RE: Daughtery-Crosby Salt Lake Treating Plant and Disposal Facility
Section 19, T 8 S, R 30E; Section 24, T 8 S, R 29 E; and
Section 19, T 8 S, R 29 E,
NMPM, Chaves County, New Mexico
National Surety Corporation, Bond No. 11132683654

Following is Paul Gabel's permission to do the work as outlined.

Frates Seeligson, Jr.

Mr. Frates S Seeligson
4040 Broadway Suite 510
San Antonio, TX 78209

February 19, 2003

To Whom It May Concern:

Mr. Seeligson has our permission to perform the work outlined in the Remediation and Cleanup Work Plan on the Daughtery-Crosby Salt Lake Treating Plant and Disposal Facility. We ask that Mr. Seeligson or the crew performing the work call either myself or our ranch manager the day before bringing equipment onto or beginning work on the ranch. We also request that any roads used to bring equipment to the job site be repaired to their condition before this project.

Sincerely.

Paul Gabel

Paul Gabel
PO Box 9
Sudan TX 79371
806 227 2288 phone
806 227 2258 fax

Ranch Manager
Terry Brice
505 398 3172 phone
505 631 0509 mobile

FAX COVER SHEET

P.O. Box 1613
703 E. Clinton Suite 103
Hobbs, New Mexico
88240
505/397-0510
Fax 505/393-4388

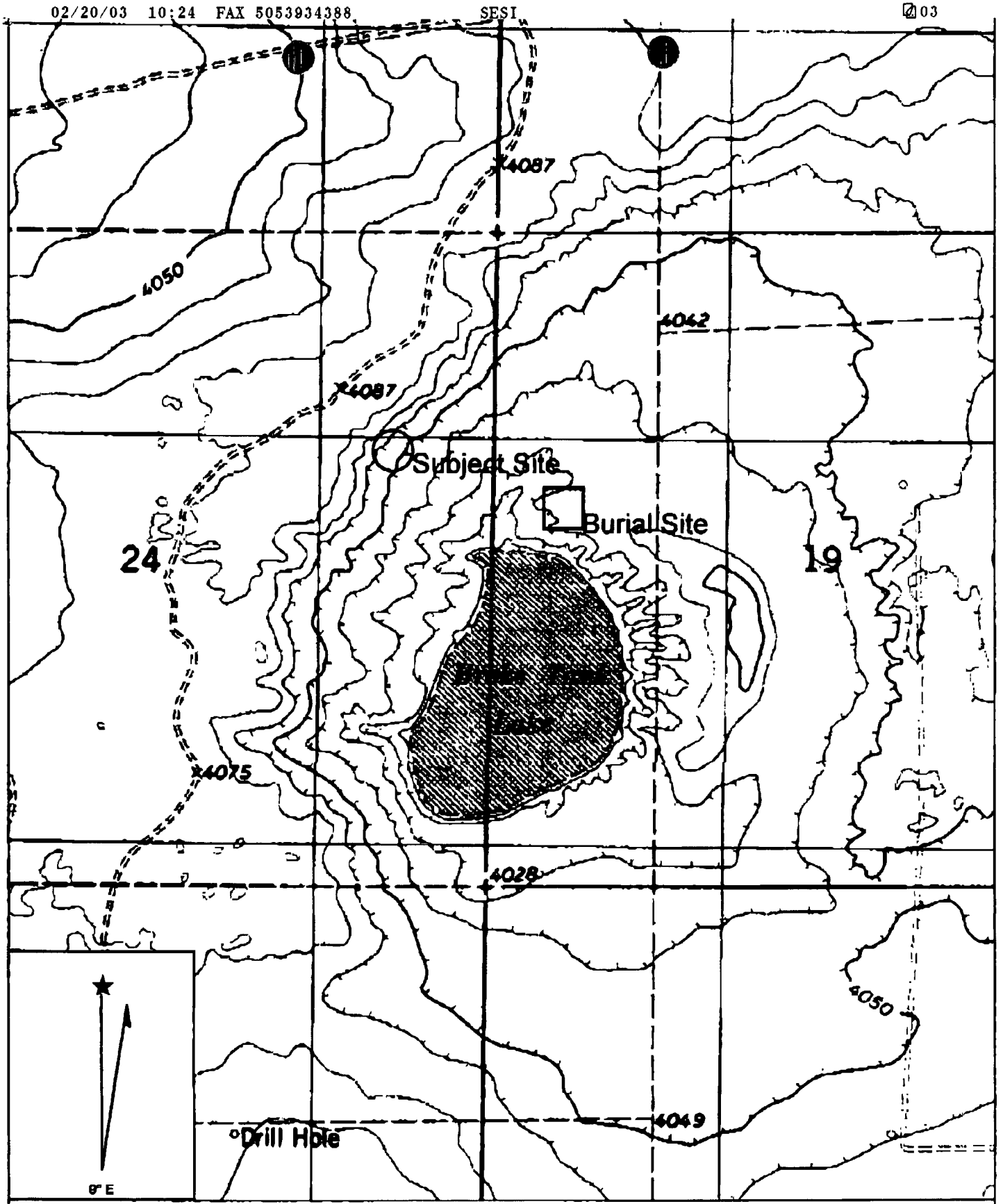
Safety & Environmental Solutions, Inc.

Send to: **NMOCD**	**From:** **Jerri Lee**
Attention: Martyne Kieling	**Date: 2-20-03**
Office Location:	**Office Location:**
Fax Number: 505-476-3462	**Phone Number:**

- ☐ Urgent
- ☐ Reply ASAP
- ☒ Please comment
- ☐ Please review
- ☐ For your information

Total pages, including cover: 3

Comments:



Name: PRESLER LAKE
Date: 2/6/2003
Scale: 1 inch equals 1000 feet

Location: 033° 36' 14.8" N 103° 55' 41.1" W
Caption: Frates Seelgson
Daughtery-Crosby Salt Lake
Treating Plant Disposal Facility

STATE OF NEW MEXICO
ENERGY MINERALS AND NATURAL RESOURCES DEPARTMENT
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

✓ Telephone ____ Personal Time 9:00 am Date 2-20-03

Originating Party: Frates Seelyson
Other Parties: Mantyre Kieling

Subject: Have Recieved written Approval to begin Cleanup

Discussion: will be calling with a Start Date very Soon
Will Send OCD a copy of Approval letter.

Conclusions or Agreements: District Mike Stubblefield will be Notified Also

Distribution

Signed Mantyre Kieling

STATE OF NEW MEXICO
ENERGY MINERALS AND NATURAL RESOURCES DEPARTMENT
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

✓ Telephone ____ Personal Time 2:30 Date 2-10-03

Originating Party Allen Hodge Other Parties Martyne Kieling

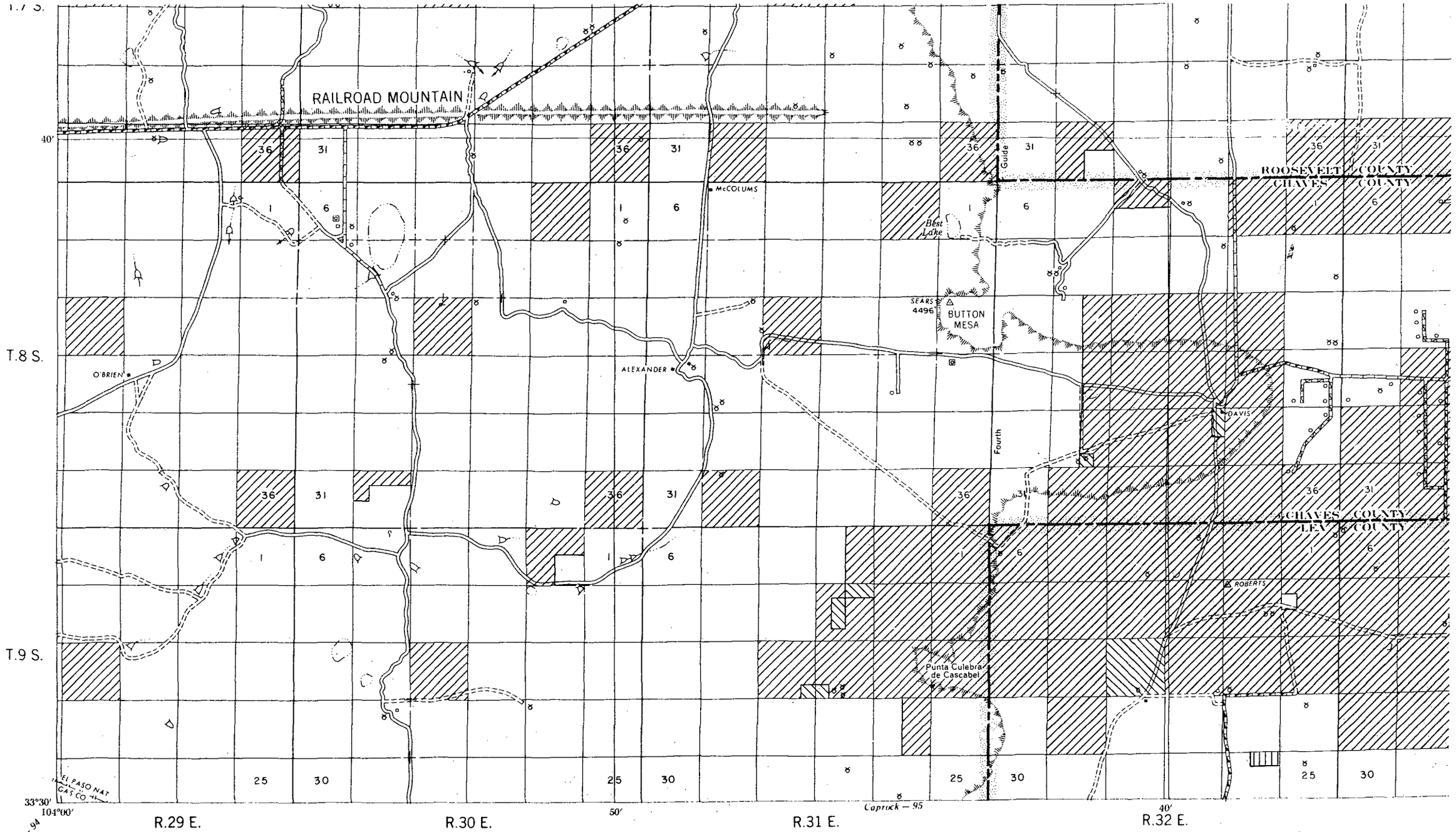
Subject Daugherty Treating Plant. Cleanup.

Discussion ~~Partners~~ owners of the treating Plant Seeligson are trying to locate the Current Land owner. They Have Just engaged a Lawyer From Roswell to Aid them in their Search.

Conclusions or Agreements ~~Pleg~~ The Seeligsons are Still Actively trying to Cleanup the Facility

Distribution

Signed Martyne Kieling



Control by U.S. Coast and Geodetic Survey; U.S. Geological Survey; U.S. Forest Service; Bureau of Land Management and Planning Division—Modified Conic Projection Standard Parallel 34½° North American Datum

Longitude West from Greenwich

Scale $\frac{1}{126720}$ or 1 Inch = 2 Miles

1 1/2 0 1 2 3 4

STATUTE MILES

DATE OF INVENTORY

CHAVES COUNTY	1966
ROOSEVELT CO.	1964
LEA COUNTY	1963

Control by U.S. Coast and Geodetic Survey; U.S. Geological Survey; U.S. Forest Service; Bureau of Land Management and Planning Division—Modified Conic Projection Standard Parallel 34½° North American Datum

Longitude West from Greenwich

Scale $\frac{1}{126720}$ or 1 Inch = 2 Miles

1 1/2 0 1 2 3 4

STATUTE MILES

DATE OF INVENTORY

CHAVES COUNTY	1966
ROOSEVELT CO.	1964
LEA COUNTY	1963

T.7 S.

40'

T.8 S.

T.9 S.

RAILROAD MOUNTAIN

McCOLUMS

Best Lake

Guide

ROOSEVELT COUNTY
CHAVES COUNTY

SEARS 4496

BUTTON MESA

O'BRIEN

ALEXANDER

DAVIS

PUMP STATION

FLYING M

Fourth

CHAVES COUNTY
LEA COUNTY

ROBERTS

Punta Culebra de Cascabel

EL PASO NAT GAS CO.

33°30'

104°00'

Aayarman – 94

Caprock – 95

50'

40'

R.29 E.

R.30 E.

R.31 E.

R.32 E.

R.33 E.

Longitude West from Greenwich

Scale $\frac{1}{126720}$ or 1 Inch = 2 Miles

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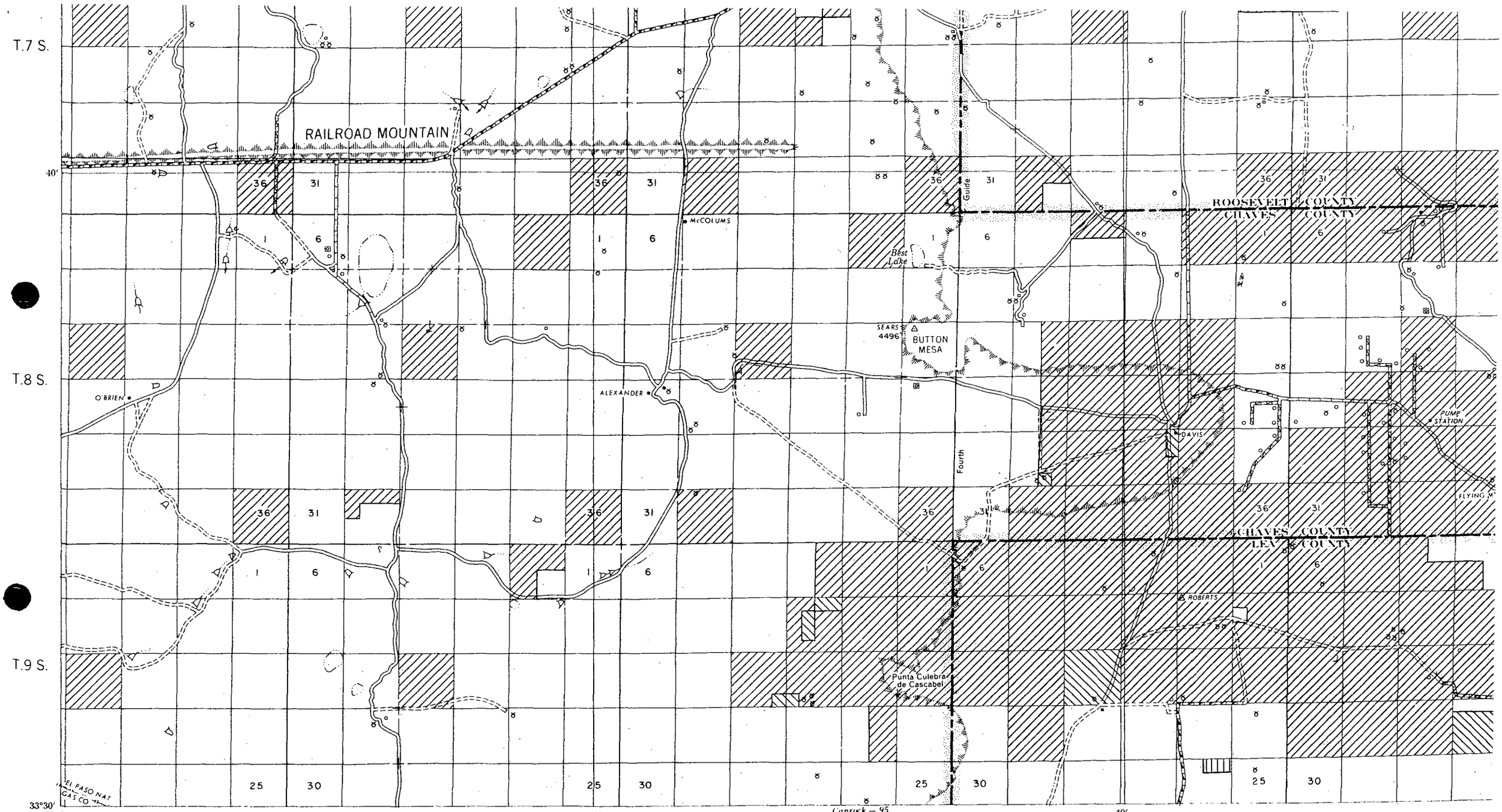
STATUTE MILES

Control by U.S. Coast and Geodetic Survey; U.S. Geological Survey; U.S. Forest Service; Bureau of Land Management and Planning Division—Modified Conic Projection Standard Parallel 34½° North American Datum

DATE OF INVENTORY

CHAVES COUNTY	1966
ROOSEVELT CO.	1964
LEA COUNTY	1963

Q1



Control by U.S. Coast and Geodetic Survey; U.S. Geological Survey; U.S. Forest Service; Bureau of Land Management and Planning Division—Modified Conic Projection Standard Parallel 34½° North American Datum

Longitude West from Greenwich

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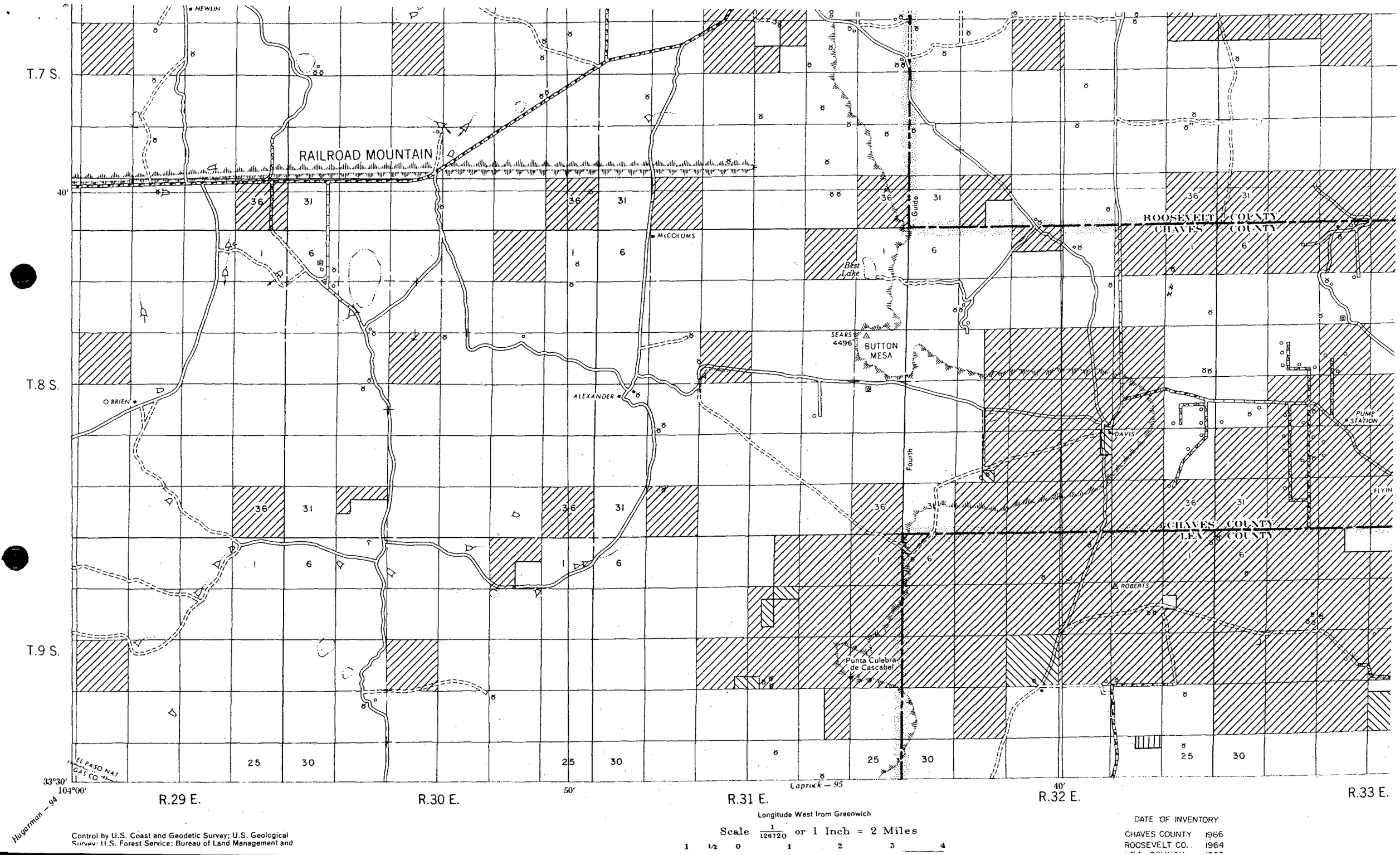


Control by U.S. Coast and Geodetic Survey; U.S. Geological Survey; U.S. Forest Service; Bureau of Land Management and

Longitude West from Greenwich

Scale $\frac{1}{126720}$ or 1 Inch = 2 Miles

1 1/2 0 1 2 3 4

DATE OF INVENTORY

CHAVES COUNTY	1966
ROOSEVELT CO.	1964

NEW MEXICO ENERGY, MINERALS and NATURAL RESOURCES DEPARTMENT

BILL RICHARDSON
Governor
Joanna Prukop
Cabinet Secretary

Lori Wrotenbery
Director
Oil Conservation Division

January 31, 2003

Mr. Frates S. Seeligson
4040 Broadway Suite 510
San Antonio, TX 78209

RE: Remediation / Cleanup
Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility
Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E;
and Section 19, T 8 S, R 29 E, NMPM, Chaves County, New Mexico

Dear Mr. Seeligson:

The New Mexico Oil Conservation Division (OCD) has received the Remediation and Cleanup Work Plan dated January 10, 2003 for the Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility. The OCD hereby approves of the remediation and cleanup plan prepared by Safety & Environmental Solutions, Inc. with the following conditions.

1. The landowner of record at the site must be notified and written permission must be received regarding the work outlined in the Remediation and Cleanup Work Plan.

2. A topographic map showing the disposal trench location that was discussed at the December 2002 site inspection must be included as part of the Work Plan.

3. The analytical results will be made available to the OCD as the work progresses.

4. The OCD Santa Fe and Artesia District offices must be notified within 48 hours of beginning the site work, within 48 hours of beginning trenching and with in 48 hours of covering and backfilling the disposal trench.

5. A final report will be submitted to the OCD Santa Fe office and a copy to the Artesia District office upon completion of the project. The report must include a detailed description of the work that was performed and must include all analytical results delineating nature and extent along with maps locating any and all remaining waste that is left or disposed of on site. The report should also describe where the flow lines and tanks were disposed or recycled.

Please be advised that this approval does not relieve Daughtery-Crosby Salt Lake Treating Plant and Disposal Facility of liability should their operation result in pollution of surface water, ground water, or the environment. In addition, OCD approval does not relieve Daughtery-Crosby Salt Lake Treating Plant and Disposal Facility of responsibility for compliance with other federal, state or local regulations.

If there are any questions, please contact me at (505) 476-3488.

Sincerely

Martyne J. Kieling
Environmental Geologist

Xc: Artesia OCD
Safety & Environmental Solutions, Inc., 703 E. Clinton Suite 102, Hobbs, NM 88240

Daughtery – Crosby Salt Lake Treating Plant and Disposal Facility Remediation/Cleanup Work Plan Section 19, Township 8S, Range 30E Section 24, Township 8S, Range 30E Section 19, Township 8S, Range 29E Chaves County, New Mexico

January 10, 2003

Prepared for:

Mr. Frates S. Seeligson
4040 Broadway Suite 510
San Antonio, Texas 78209

By:

Safety & Environmental Solutions, Inc.
703 E. Clinton Suite 102
Hobbs, New Mexico 88240
(505) 397-0510

TABLE OF CONTENTS

I. Purpose

The purpose of this work plan is to propose a plan for the cleanup of the area identified as the Daughtery – Crosby Salt Lake Treating Plant and Disposal Facility in the letter from the New Mexico Oil Conservation Division (NMOCD) to Mr. Frates S. Seeligson dated October 22, 2002. The subject area is located in Section 19, Township 8S, Range 30E, Section 24, Township 8S, Range 30E, and Section 19, Township 8S, Range 29E, in Chaves County, New Mexico. The site is situated on the White Lake Ranch privately owned by Mr. Kent Gable. The site was an NMOCD approved treating and reclaiming facility operated from the late 1970s to the late 1980s. This plan will allow closure in a manner that will protect the population, environment and groundwater of the area surrounding the subject location. (Figure 1)

II. Background

The subject site was used as a water treating and oil reclaiming facility in the past. The site is currently abandoned. Two abandoned tanks and many feet of associated flowlines are still on-site.

III. Contaminant and Size of Area

The suspected contaminant is crude oil and produced water associated with the treating and reclaiming facility. The crude oil and produced water is considered exempt oilfield waste. No evidence of other contaminants was observed.

IV. Vertical and Horizontal Extent of Contamination

A vertical and horizontal extent investigation has not been performed at this site. The only area requiring a vertical and horizontal extent investigation is the process area.

V. Groundwater

There is no protectable groundwater in the area according to the database provided by the New Mexico State Engineer's Office .

VI. Action Plan

The above referenced letter requires that the following areas be addressed at the subject site: Process Area, Flow Lines, Above Ground Tanks, Crosby Salt Lake and Area between Process Area and Crosby Lake.

The action plan for the closure of each area is detailed below.

Process Area

This area will be delineated for the vertical and horizontal extent of contamination. We plan to install three to four boreholes in the area from which samples will be taken from the appropriate depths and sent to a laboratory for analysis. The results will be documented in the closure report.

In addition, a cap of caliche material will be placed over this area. There will be no soil excavation or removal in this area.

Flow Lines

All flowlines left in the area that were associated with this facility will be cut up, and taken to a local landfill for proper disposal.

Above Ground Tanks

The two above ground tanks at the site will be removed.

Crosby Salt Lake

The hydrocarbon material at the lake will be excavated and disposed of onsite at the location near the lake agreed upon by the NMOCD at the last inspection in December 2002. A disposal trench will be excavated at that location and the contaminated soils placed in the trench. A 3' to 4' cap of native soil with a high clay content from the surrounding area will be place on top of the filled disposal trench.

SESI will take samples of the soil immediately under the material that is to be removed at several points around the area. These samples will be used to document the level of TPH under the material. No specific TPH level must be attained in this area.

Area between Process Area and Crosby Lake

This area contains degraded hydrocarbon contamination along two "run" areas. This area will be "disced" in place. The area will be worked in a manner to avoid future erosion of the area. No vertical or horizontal investigation will be performed in this area. No specific level of TPH must be attained in this area.

After completion of the project, the appropriate reports will be filed with the NMOCD in the closure report.

Figure 1
Vicinity Map

FRATES SEELIGSON, JR.

3737 Broadway - #210
San Antonio, TX 78209

Phone 210-826-5645
Fax 210-826-5689

November 26, 2002

Ms. Martyne J. Kieling, Environmental Geologist
New Mexico Energy Minerals and Natural Resources Department
Oil Conservation Division
1220 South St. Francis Drive
Santa Fe, New Mexico 87505

RE: Daughtery-Crosby Salt Lake Treating Plant and Disposal Facility
Section 19, T 8 S, R 30E; Section 24, T 8 S, R 29 E; and
Section 19, T 8 S, R 29 E,
NMPM, Chaves County, New Mexico
National Surety Corporation, Bond No. 11132683654

Dear Martyne:

Just to follow up on the progress of the clean up of the Daughtery-Crosby Salt Lake Treating Plant and Disposal Facility, I just returned from Roswell where I had a meeting with both Bob Allen and Larry Gandy. I am awaiting their estimates on the cost of the cleanup and will contract one of the two once the information is at hand.

I hope this meets with your approval. Happy Thanksgiving.

Sincerely,

Frates Seeligson, Jr.

P.O. Box 1613
703 E. Clinton Suite 102
Hobbs, New Mexico 88240
505/397-0510
Fax 505/393-4388
www.sesi-nm.com

Safety & Environmental Solutions, Inc.

November 8, 2002

Mrs. Martyne Kieling
Environmental Geologist
Oil Conservation Division
P.O. Box 6429
Santa Fe, NM 87504

Dear Martyne:

Safety & Environmental Solutions, Inc. (SESI) has been retained by Mr. Frates Seeligson of San Antonio, Texas to perform assessment and remedial services at the Daughtery-Crosby Salt Lake Treating Plant and disposal facility. Mr. Seeligson is unable to travel to New Mexico until November 25, 2002 when we plan to meet at the site in order to finalize plans to comply with your letter of October 22, 2002.

In your letter you required a response by November 27, 2002; however, I would like to request an extension of time for that request to December 27, 2002. This extension of time will allow us adequate time to perform the assessment services and formulate an appropriate remediation plan.

Thank you for your consideration in this matter. If I may answer any questions of be of further service, please call me.

Sincerely,

Bob Allen

Bob Allen CHMM, REM, CET, CES
President

BA/jra

NEW MEXICO ENERGY, MINERALS and NATURAL RESOURCES DEPARTMENT

GARY E. JOHNSON
Governor
Betty Rivera
Cabinet Secretary

Lori Wrotenbery
Director
Oil Conservation Division

October 22, 2002

CERTIFIED MAIL
RETURN RECEIPT NO. 7001-1940-0004-3929-8140

Mr. Frates S. Seeligson
4040 Broadway Suite 510
San Antonio, TX 78209

RE: Daughtery - Crosby Salt Lake Treating Plant and Disposal Facility Inspection
Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E;
and Section 19, T 8 S, R 29 E,
NMPM, Chaves County, New Mexico
National Surety Corporation, Bond No.11132683654

Dear Mr. Seeligson:

The New Mexico Oil Conservation Division (OCD), inspected the Daughtery - Crosby Salt Lake treating plant and disposal facility located in the Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E; and Section 19, T 8 S, R 29 E, NMPM, Chaves County, New Mexico, on June 3, 2002. The OCD inspection indicated that the facility requires some additional remediation. Below is a list of items that must be addressed prior to the OCD closing the site and returning the surety bond No.11132683654 for $25,000 held by the National Surety Corporation. Please review Attachment 1 that contains photos taken during the inspection.

1. Process Area:

Petroleum contaminated soil is still evident at the processing area on top of the hill (see photo 1).

Contaminated soils must be either excavated and removed to an OCD approved disposal facility or be further remediated on site. Please refer to the enclosed "Unlined Surface Impoundment Closure Guidelines" for remediation and sampling guidance. The soil samples must be analyzed for total petroleum hydrocarbons (TPH) and benzene, toluene, ethylbenzene, and xylene (BTEX). Remediation levels are based on depth to groundwater, proximity to water wells, and proximity to surface water.

Upon approval of final remediation the process area must be reseeded with a native seed mix.

2. Flow lines:

Flow lines are still in place down the slope from the process area toward Crosby Salt Lake (see photo 5)

All flow lines associated with the treating plant and disposal operation must be recycled or disposed of at an OCD approved facility.

3. Above Ground Tanks:

Two of the former above ground tanks from the treating plant along with the catwalk (photo 7 & 8) have been moved off site to a location approximately one half mile west of the facility process area (see photo 6).

Any oil or BS&W material contained within these tanks must be hauled to an OCD approved waste management facility. Please supply written documentation that the current landowner at this location has taken possession of the tanks. If this is not the case the tanks and catwalk must either be recycled or disposed of at an OCD approved facility.

4. Crosby Salt Lake:

The cleanup activities in 1988 removed petroleum-contaminated soils from the lakebed and shoreline and placed the contaminated material along the upper banks of the lake. These contaminated soil piles are now weeping hydrocarbons that are running back down toward the lake playa (see photo 2, 3 and 4). Hydrocarbons migrating toward Crosby Salt Lake present a potential hazard to migratory birds.

Contaminated soils must be either excavated and removed to an OCD approved disposal facility or be further remediated on site. Please refer to the enclosed "Unlined Surface Impoundment Closure Guidelines" for remediation and sampling guidance. The soil samples must be analyzed for total petroleum hydrocarbons (TPH) and benzene, toluene, ethylbenzene, and xylene (BTEX). Remediation levels for this location are based on depth to groundwater, proximity to water wells, and proximity to surface water.

Please provide the OCD with a remediation plan for the Daughtery/Crosby Salt Lake treating plant and disposal facility. The remediation plan must address the above items and must include a timetable for beginning and completion of the project. **A response is required by November 27, 2002.**

The National Surety Corporation Bond No. 11132683654 for $25,000 will remain in full force and affect until such time as the OCD has approved the remediation and closed the facility. If you have any questions please do not hesitate to contact me at (505) 476-3488.

Sincerely,

Martyne J. Kieling
Environmental Geologist

Attachments
xc: Artesia OCD Office
Shannon Dom SM1A25, Fireman's Fund Insurance Company, 777 San Marin Drive, Navato, CA 94998

Photo1. Contaminated soils at the former location of the treating plant.

Photo 2. Contaminated soils that were removed from Crosby Salt Lake in 1988 and piled along the edge of the lake.

Photo 3. Contaminated soils that were removed from Crosby Salt Lake in 1988 and piled along the edge of the lake.

Photo 4. Contaminated soil along the edge of the saltpan of Crosby Salt Lake. Hydrocarbons are weeping from the material and flowing back toward the lakebed.

Photo 5. Flow lines that extend from the top of the hill down to the lake.

Photo 6. Two tanks and one catwalk from the treating plant that have been moved west approximately ½ mile.

Photo 7. For Reference: Tanks at the facility in 08-27-1997

Photo 8. For Reference: Photo of tanks at the facility in 08-27-1997

Photo1. Contaminated soils at the former location of the treating plant.

Photo 2. Contaminated soils that were removed from Crosby Salt Lake in 1988 and piled along the edge of the lake.

Photo 3. Contaminated soils that were removed from Crosby Salt Lake in 1988 and piled along the edge of the lake.

Photo 4. Contaminated soil along the edge of the saltpan of Crosby Salt Lake. Hydrocarbons are weeping from the material and flowing back toward the lakebed.

Photo 5. Flow lines that extend from the top of the hill down to the lake.

Photo 6. Two tanks and one catwalk from the treating plant that have been moved west approximately ½ mile.

Kieling, Martyne

From: Stubblefield, Mike
Sent: Tuesday, June 04, 2002 10:00 AM
To: Kieling, Martyne
Subject: INSPECTION TRIP 6/3/2002 CHAVES COUNTY CROSBY SALT LAKE

MARTYNE,

HOPE YOU ARE FEELING WELL TODAY. HERE ARE PHOTO'S OF MY INSPECTION WITH MYSELF AND FRATES SEELIGSON JR. TAKEN AT THE OLD CROSBY SALT LAKE TREATING PLANT.
PHOTO 003 TREATING PLANT SITE LOOKING FROM THE SOUTH.
PHOTO 006 HISTORIC HYDROCARBON SPILL REMOVED FROM THE LAKE PLAYAS TO THE SAND HILLS DUE EAST OF THE CROSBY BRINE LAKE.
PHOTO 007 HISTORIC HYDROCARBON SPILL REMOVED FROM THE LAKE PLAYAS TO THE SAND HILLS DUE EAST OF THE CROSBY BRINE LAKE.
PHOTO 011 HISTORIC HYDROCARBON SPILL AT POINT OF ENTRY FROM TREATING PLANT TO CROSBY LAKE PLAYAS.
PHOTO 014 OLD FLOWLINE LEFT IN PLACE BETWEEN TREATING PLANT AND LAKE PLAYAS.
PHOTO 005 STOCK TANKS REMOVED FROM TREATING PLANT AREA TO PASTURE EST. .4 MILE WEST OF OLD TREATING PLANT SITE.
PHOTO 006 FLOW LINES FROM TREATING PLANT REMOVED TO PASTURE LAND EST. .4 MILE WEST OF OLD TREATING PLANT SITE.

MIKE S.


MVC-003F.JPG

MVC-006F.JPG

MVC-007F.JPG

MVC-011F.JPG

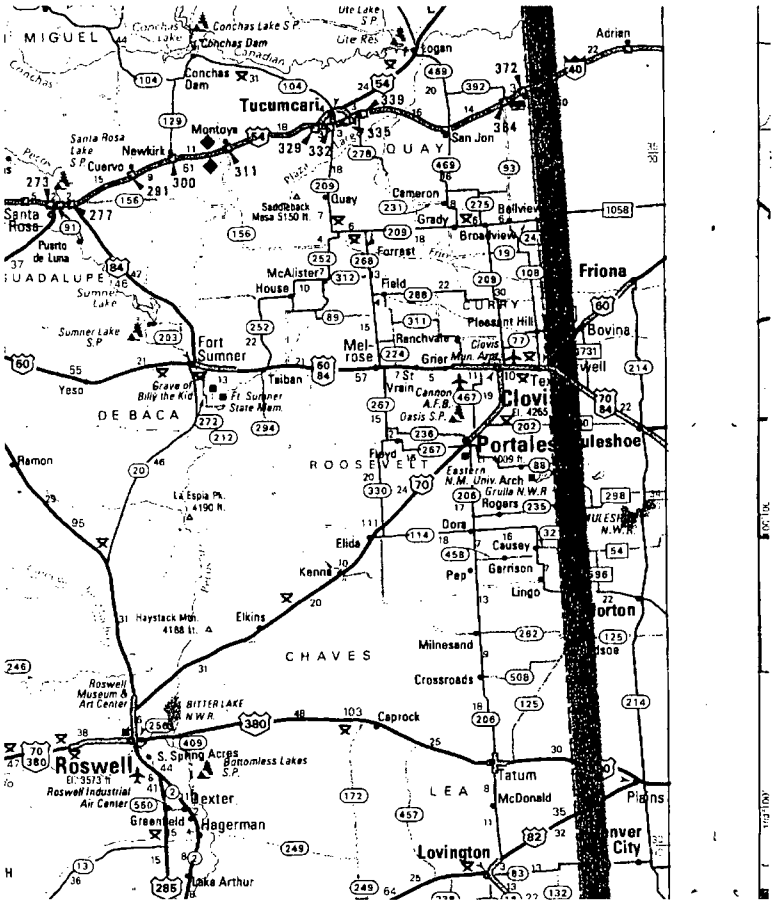
MVC-014F.JPG

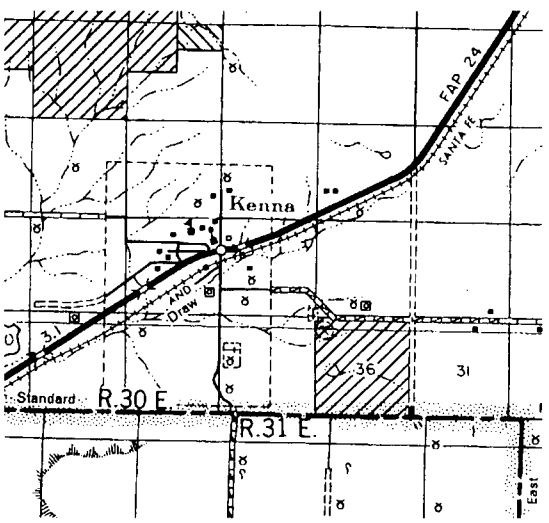
MVC-005F.JPG

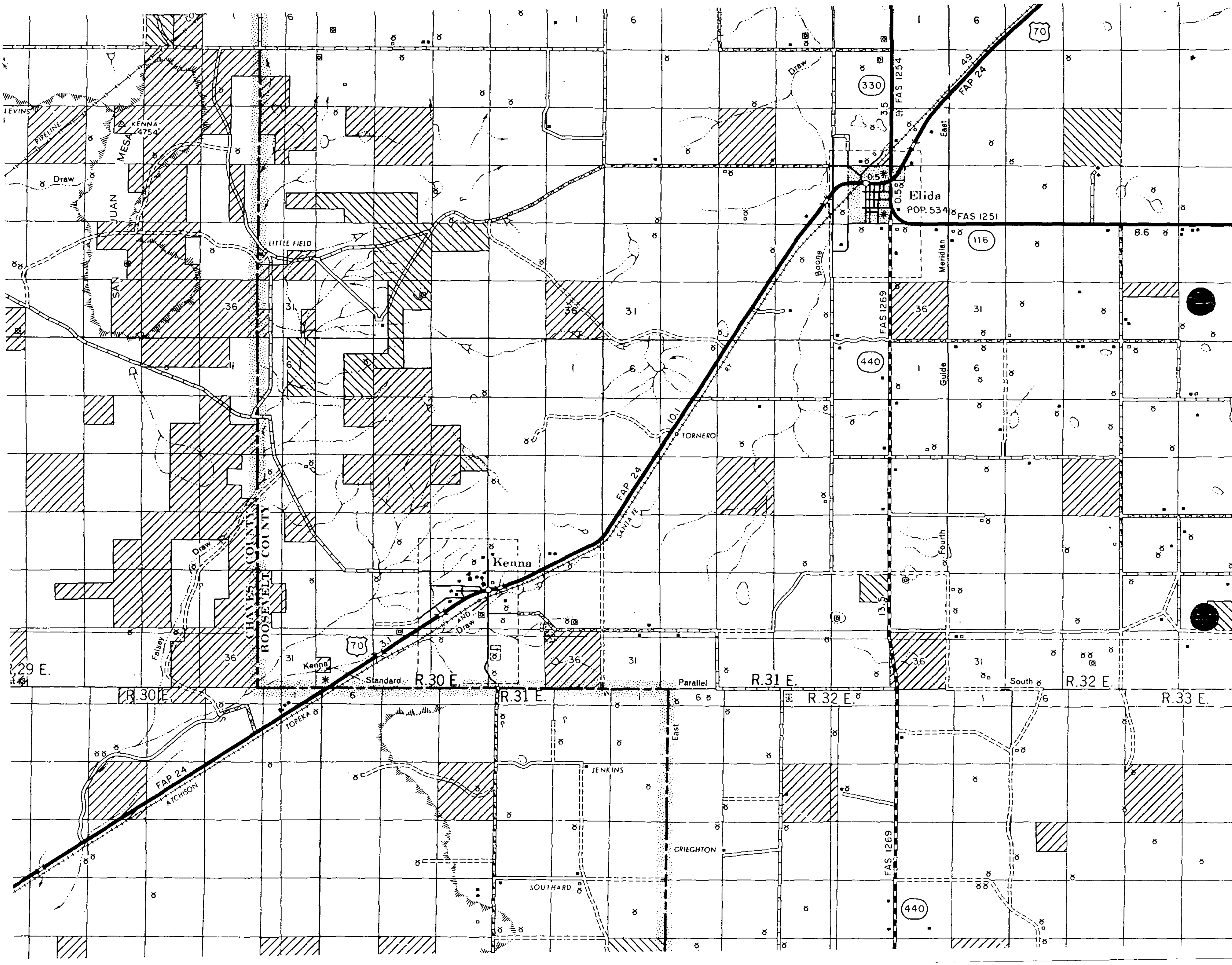
MVC-006F.JPG

Frates, here are the directions that I promised.

Lubbock, TX to Kenna, NM is approximately 152 miles.
Find Portales, NM. Go 24 miles West on US 70 to Elida, then another 10 miles west to Kenna (a wide spot in the road, so I am told).
I will meet you next to the Railroad tracks, on the south side of US 70, wherever the main turn off is for Kenna.
I will be driving a White Ford Expedition with NM Oil Conservation Division Labels on the side.
I will have will have a cell phone with me 1-505-660-1067. **MEET AT 10:00 am on June 3, 2002**







Elida
POP. 534
Kenna
KENNA 4754
SAN JUAN MESA
LITTLE FIELD
TORNERO
JENKINS
GRIEGHTON
SOUTHARD
TOPEKA
ATCHISON
SANTA FE
RY
Standard
CHAVES COUNTY
ROOSEVELT COUNTY
PIPELINE
FAP 24
FAS 1254
FAS 1251
FAS 1269
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116
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R.30 E.
R.31 E.
R.32 E.
R.33 E.
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Boone
Meridian
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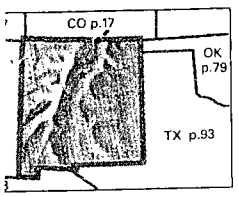


Selected Recreational & Historical Sites

Aztec Ruins National Monument, B-3
Capulin Volcano National Monument, B-10
Carlsbad Caverns National Park, M-9
El Morro National Monument, F-2
Gila Cliff Dwellings National Monument, J-2
Pecos National Monument, E-7
Taos, C-7
White Sands National Monument, K-6

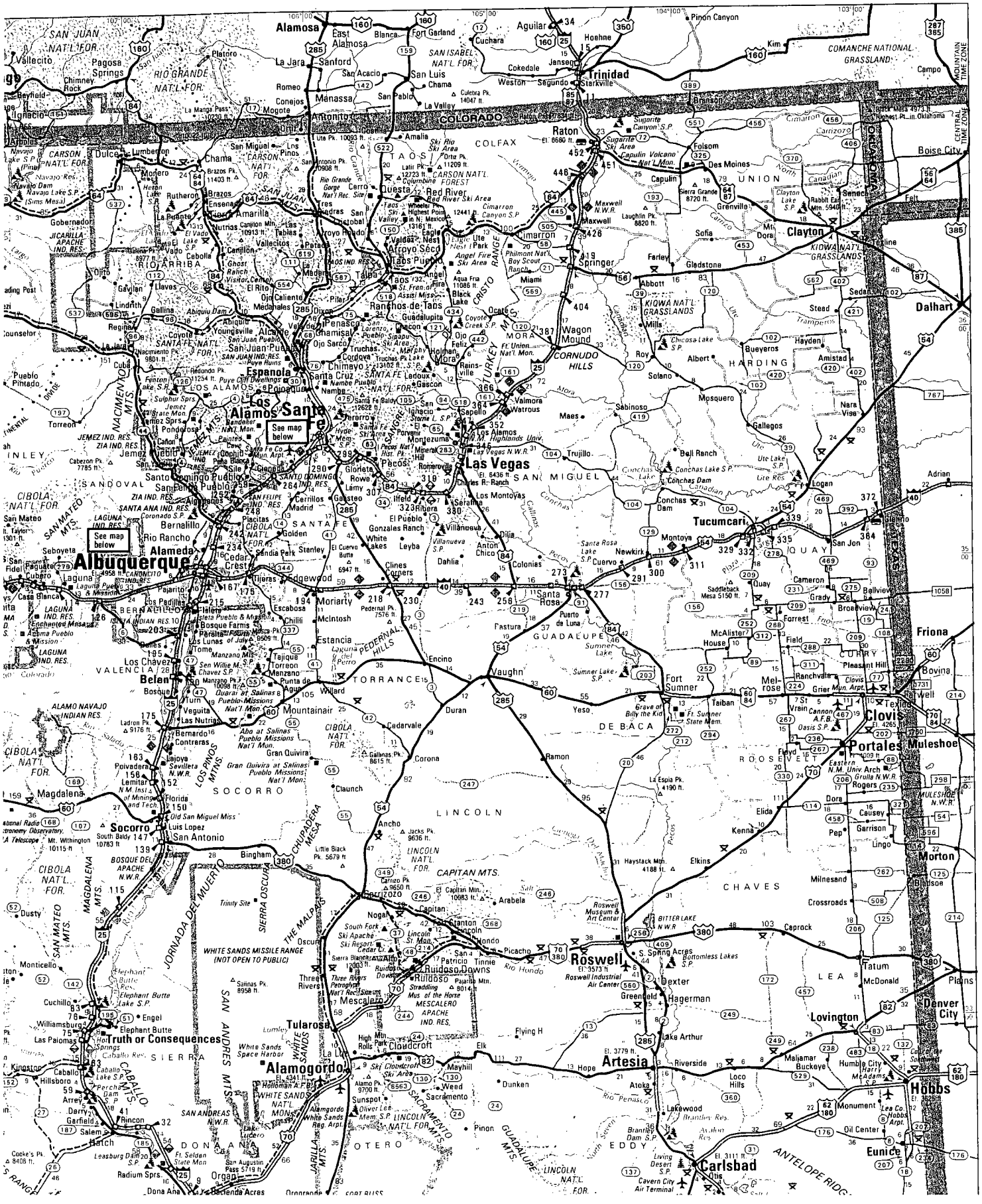
How to Determine Distance

0 10 20 30 Miles
0 10 20 30 40 Kilometers

Mileage in red between red arrowheads, in black between intersections. Some interchange numbers indicate mileage.

Mileage Between Principal Cities

	Alamogordo	Albuquerque	Carlsbad	Clovis	Farmington	Gallup	Las Cruces	Raton	Roswell	Santa Fe	Socorro	Tucumcari
Albuquerque	209		275	217	180	138	223	223	198	61	78	175
Clovis	229	217	188		397	355	298	234	111	208	246	84
Las Cruces	69	223	216	298	401	337		394	187	283	145	306
Roswell	118	198	77	111	378	336	187	281		190	163	161
Santa Fe	228	61	267	208	198	198	283	168	190		137	167



STATE OF NEW MEXICO
ENERGY MINERALS AND NATURAL RESOURCES DEPARTMENT
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

✓ Telephone ____ Personal Time 2:55 pm Date 4-23-02

Originating Party: Marilyn Kieling

Other Parties: Frates Seeligson Jr
cell 210-861-4881

Subject: Daughtry Treating Plant. Left message to please call Back

Discussion:

Conclusions or Agreements:

Distribution

Signed: Marilyn Kieling

STATE OF NEW MEXICO
ENERGY MINERALS AND NATURAL RESOURCES DEPARTMENT
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

✓ Telephone ____ Personal Time 12:27 Date 10-6-00 Left message
Returned call 10:15 10-11-00 Left message

Originating Party: Frates Seeligson Jr. Other Parties: Martyn Kieling
Cellphone 210-861-4881

Subject Daughtery Treating Plant Final Inspection

(I will need something in writing as to what was Done and when)

Discussion Meet at 10:00 in Roswell November 7th Tuesday.

Conclusions or Agreements

Distribution

Signed Martyn Kieling

STATE OF NEW MEXICO
ENERGY MINERALS AND NATURAL RESOURCES DEPARTMENT
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

✓ Telephone ____ Personal Time ~~AM~~ 4:01 Date August 31st 2000

Sept 5th 2000
called Back

Originating Party: Frakes Seeligson Jr. 210-826-5645 ex 14

Other Parties: Martyne Kieling

Subject: Daugherty White Lake Ranch

Discussion: Meet at Facility to Close it out Checkout work that was Done

Frakes will Call Back in a dy or two with A Date.

Conclusions or Agreements:

Distribution

Signed: Martyne J Kieling

FRATES SLICK SEELIGSON, JR.
4040 Broadway, Suite #510
San Antonio, Texas 78209
210-826-5645

January 20, 1999

Ms. Martyne J. Kieling
New Mexico Energy, Minerals & Natural Resources Department
Oil Conservation Division
2040 South Pacheco Street
Santa Fe, New Mexico 87505

RE: Crosby Salt Lake Treating Plant Inspection
Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E;
And Section 19, T 8 S, R 29 E,
NMPM, Chaves County, New Mexico

Dear Ms. Kieling:

Pursuant to your letter dated November 20, 1998 and our phone conversation on January 19, 1999, Crosby Salt Lake intends to make all necessary corrections to the treating plant. The recommendations put forth in the OCD's November letter shall be the guidelines that we follow.

Crosby Salt Lake has already contacted Mr. A.L. Daugherty as a possible site restoration manager and the present landowner, Mr. Kent Gable, regarding the use of heavy equipment. In addition, Mr. Dirk Jones, attorney-at-law, was contacted for advice regarding environmental consultants. Furthermore, I myself plan to travel to Roswell, in hopes of expediting the operation.

Regarding a timetable for completion of each correction, I can only say as soon as possible. Having no prior experience with cleaning up oil field sites, any date of completion would be mere speculation on my part. However, what I propose to do is to maintain communication with the OCD through you, updating the progress. I hope this meets with your approval.

If you have any questions or concerns please feel free to phone at (210) 826-5645 ext. 14.

Sincerely,

Frates Seeligson, Jr.

STATE OF NEW MEXICO
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

☒ Telephone ☐ Personal	Time 2:00	Date 1-19-99

Originating Party	Other Parties
Martyne Kieling Roger Anderson	Frates Seeligon Jr.

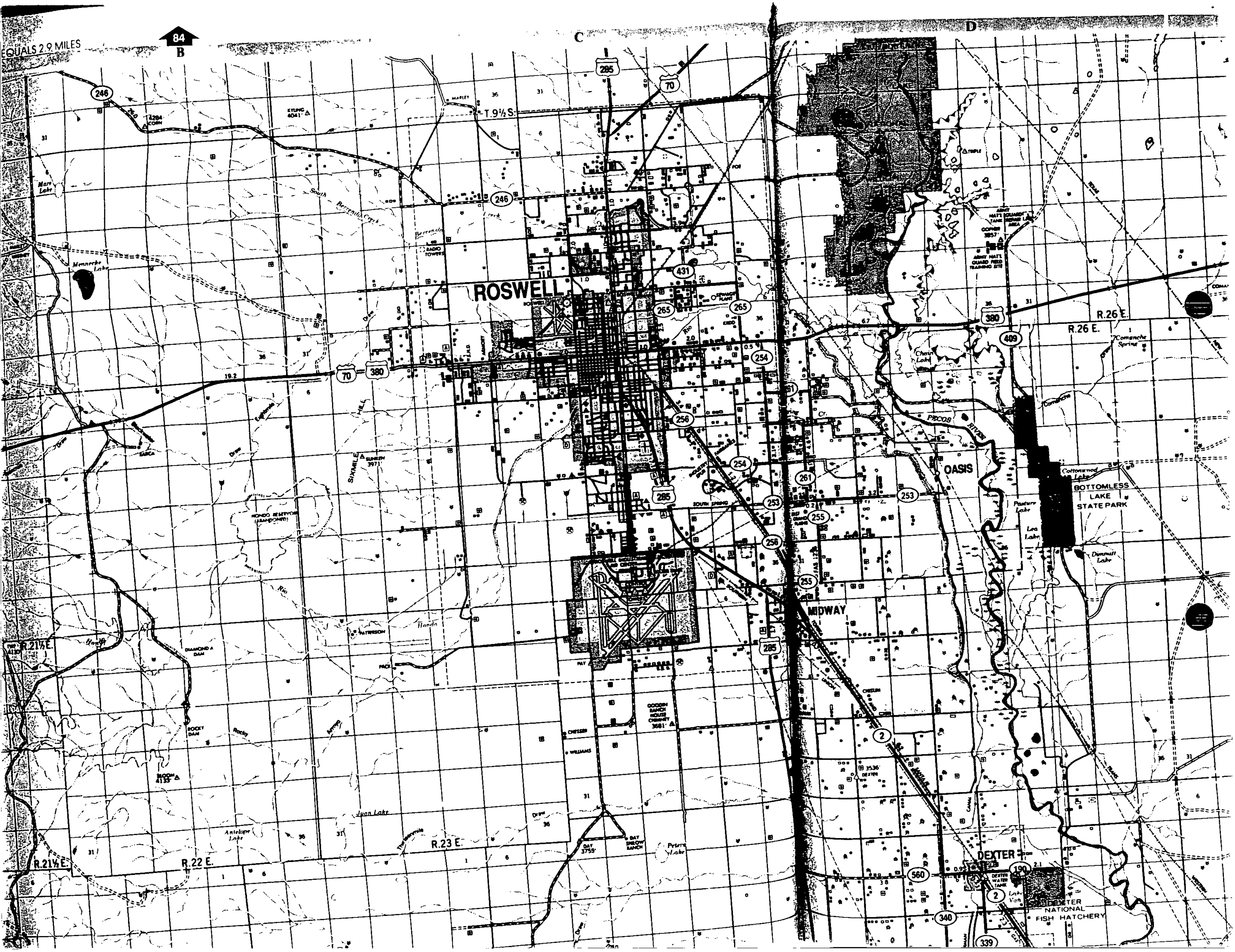
Subject: Daughety Crosby Salt lake Remediation

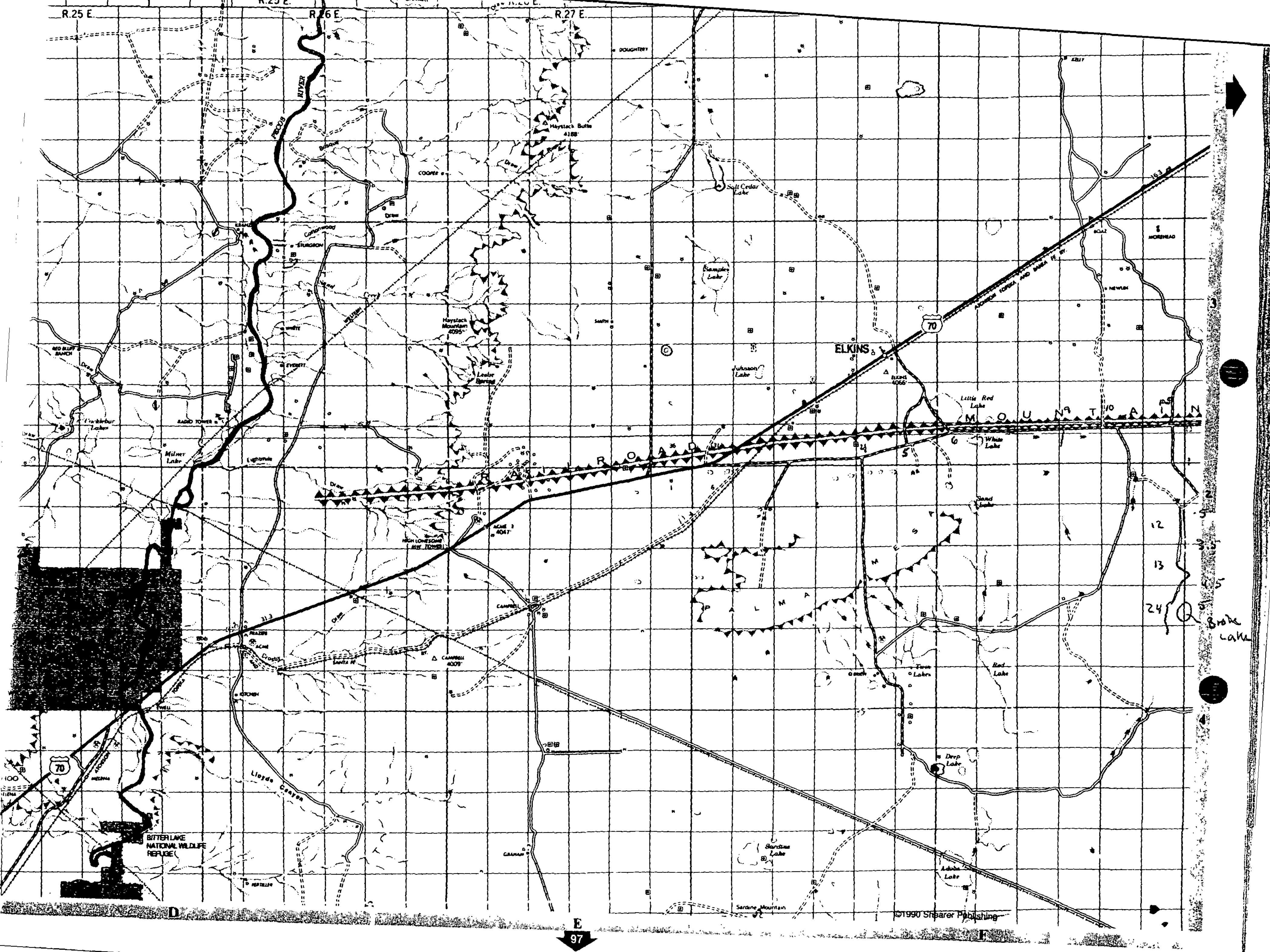
Discussion: Will write a reply letter today as to what they Plan on Doing. Added NORM to Pipe Survey. Letter will Have time line as to when they Plan on getting the clean up Done.

Conclusions or Agreements: They will Also Notify SF office of Sampling. Some can observe/split

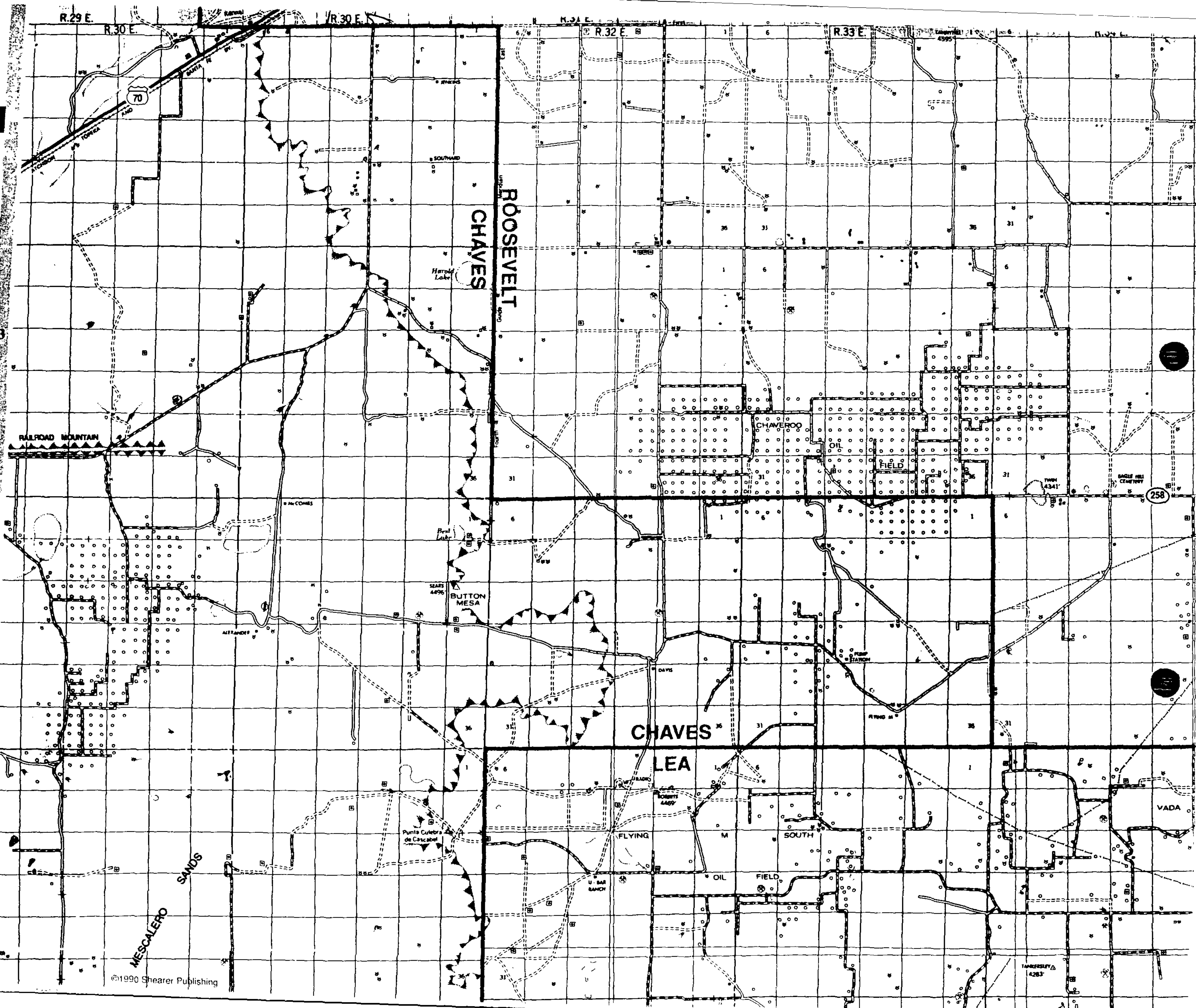
Distribution

Signed Martyne J. Kieling

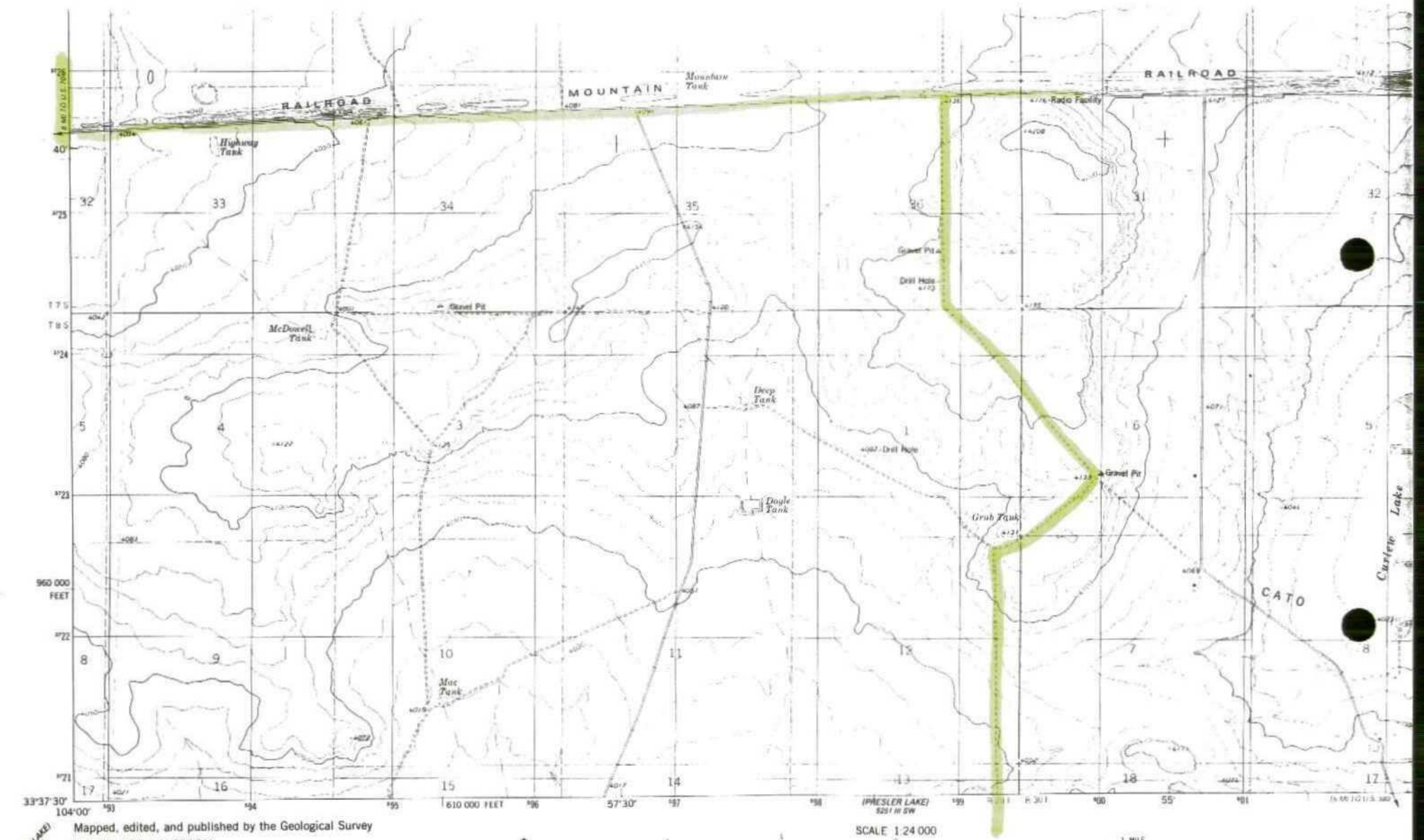

EQUALS 2.9 MILES
84
B
C
D
ROSWELL
MIDWAY
OASIS
DEXTER
BOTTOMLESS
LAKE
STATE PARK
NATIONAL
FISH HATCHERY
T.9½S.
R.21½E.
R.22 E.
R.23 E.
R.26 E.
PECOS RIVER
Mennecke Lake
Chain Lake
Comanche Spring
Cottonwood Lake
Pasture Lake
Lea Lake
Dimmitt Lake
Juan Lake
Antelope Lake
Rio Hondo
Rocky
RADIO TOWERS
HONDO RESERVOIR (ABANDONED)
SIXMILE HILL
ROCKY DAM
DIAMOND A DAM
CHESSER
WILLIAMS
PATTERSON
GOODIN RANCH HOUSE CHIMNEY 3681'
DAY 3755'
SIX MILE 3971'
KYLING 4041'
4284'
BLOOM 4135'
3536'
SOUTH SPRING
246
70
380
285
431
265
254
256
253
255
261
409
2
560
190
340
339



R.25 E.
R.26 E.
R.27 E.
PECOS RIVER
Haystack Butte
4188'
Haystack Mountain
4095'
Salt Cedar Lake
ELKINS
Johnson Lake
ELKINS
4066'
Little Red Lake
White Lake
MOUNTAIN
RAILROAD
Sand Lake
MESA
PALMA
70
Twin Lakes
Red Lake
Deep Lake
Sardine Lake
Adobe Lake
Sardine Mountain
Lloyds Canyon
Milner Lake
RADIO TOWER
CAMPBELL
4009'
ACME
4047'
BITTER LAKE
NATIONAL WILDLIFE
REFUGE
D
E
97
F
©1990 Shearer Publishing


R.29 E.
R.30 E.
R.30 E.
R.32 E.
R.33 E.
70
ROOSEVELT
CHAVES
JENKINS
SOUTHARD
Harrold Lake
RAILROAD MOUNTAIN
CHAVEROO
OIL
FIELD
TWIN 4341'
EAGLE HILL CEMETERY
258
McCOMBS
Best Lake
SEARS 4496
BUTTON MESA
ALEXANDER
DAVIS
PUMP STATION
FLYING M
CHAVES
LEA
ROBERTS 4469
FLYING
M
SOUTH
OIL
FIELD
VADA
U-BAR RANCH
Punta Culebra de Cascabel
MESCALERO
SANDS
TANKERSLEY 4283'
©1990 Shearer Publishing

CURLEW LAKE QUAD



Mapped, edited, and published by the Geological Survey

Control by USGS and NOS/NOAA

Topography by photogrammetric methods from aerial photographs taken 1974. Field checked 1975. Map edited 1978

Projection and 10,000-foot grid ticks: New Mexico coordinate system, east zone (transverse Mercator)
1000-meter Universal Transverse Mercator grid, zone 13.
1927 North American datum

Fine red dashed lines indicate selected fence lines

UTM GRID AND 1978 MAGNETIC NORTH DECLINATION AT CENTER OF SHEET

SCALE 1:24 000

1 0 1 MILE

1000 0 1000 2000 3000 4000 5000 6000 7000 FEET

1 0 1 KILOMETER

CONTOUR INTERVAL 10 FEET
NATIONAL GEODETIC VERTICAL DATUM OF 1929

NEW MEXICO

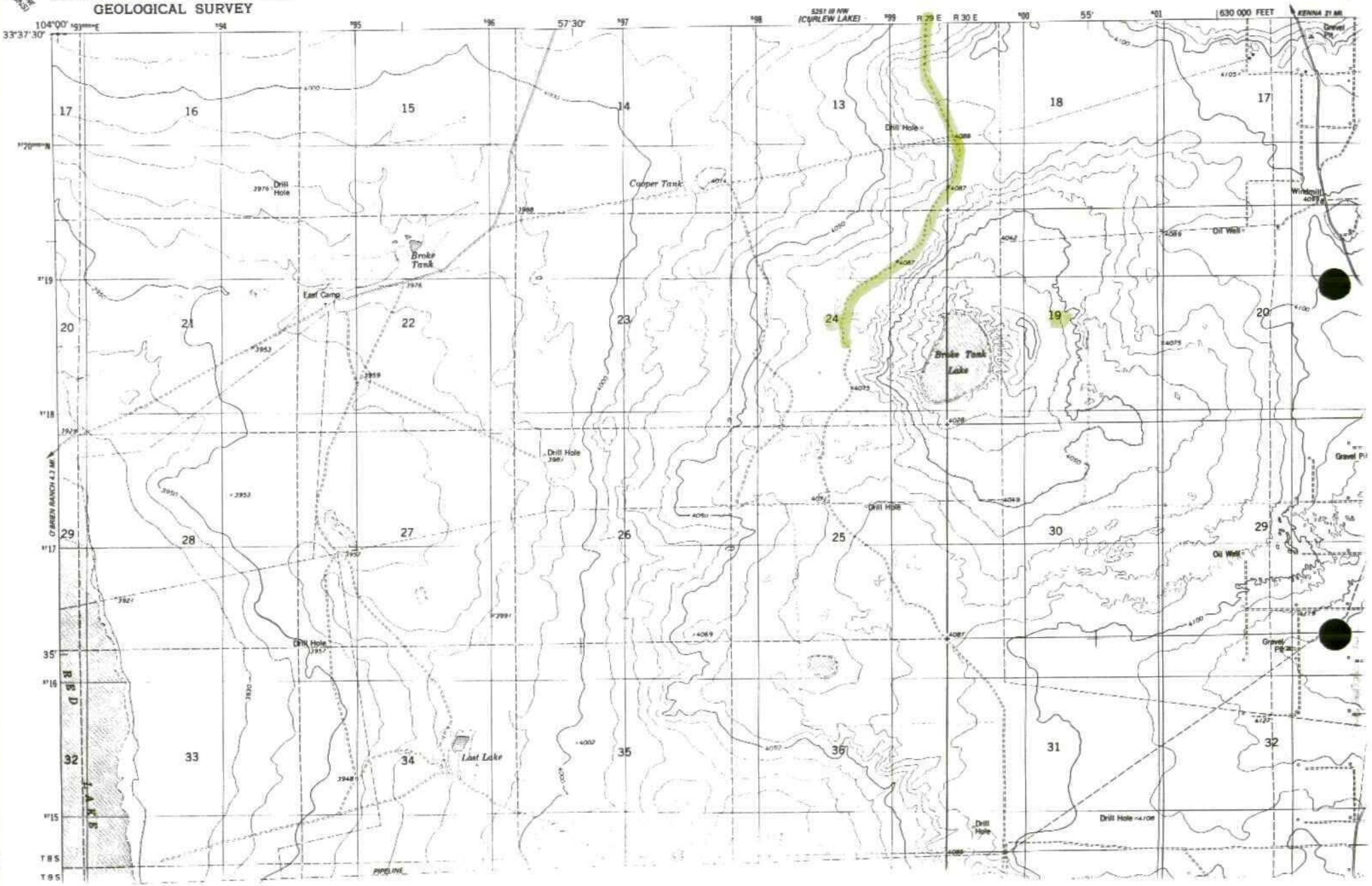
QUADRANGLE LOCATION

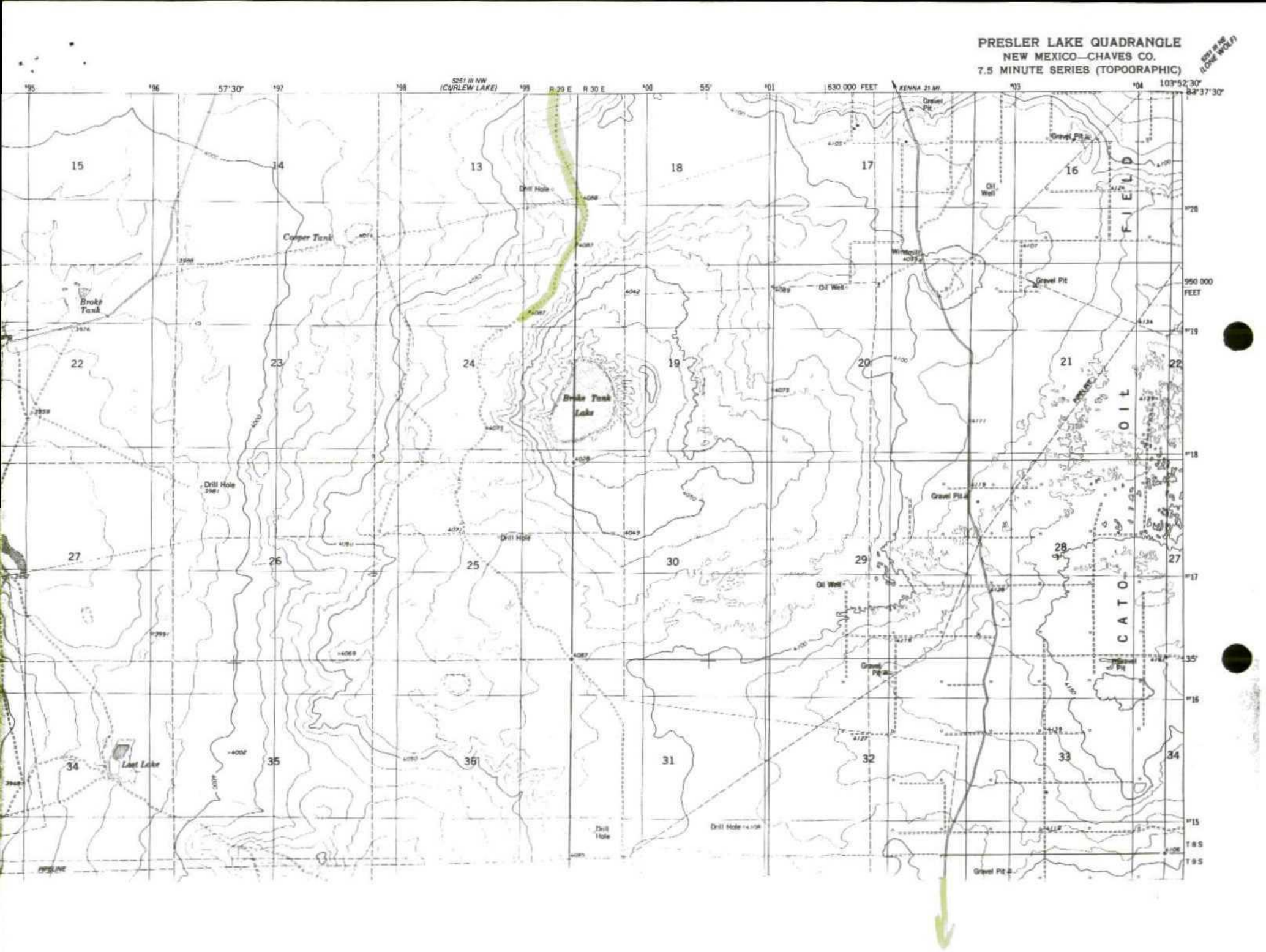
THIS MAP COMPLIES WITH NATIONAL MAP ACCURACY STANDARDS

FOR SALE BY U. S. GEOLOGICAL SURVEY, DENVER, COLORADO 80225, OR RESTON, VIRGINIA 22092
A FOLDER DESCRIBING TOPOGRAPHIC MAPS AND SYMBOLS IS AVAILABLE ON REQUEST

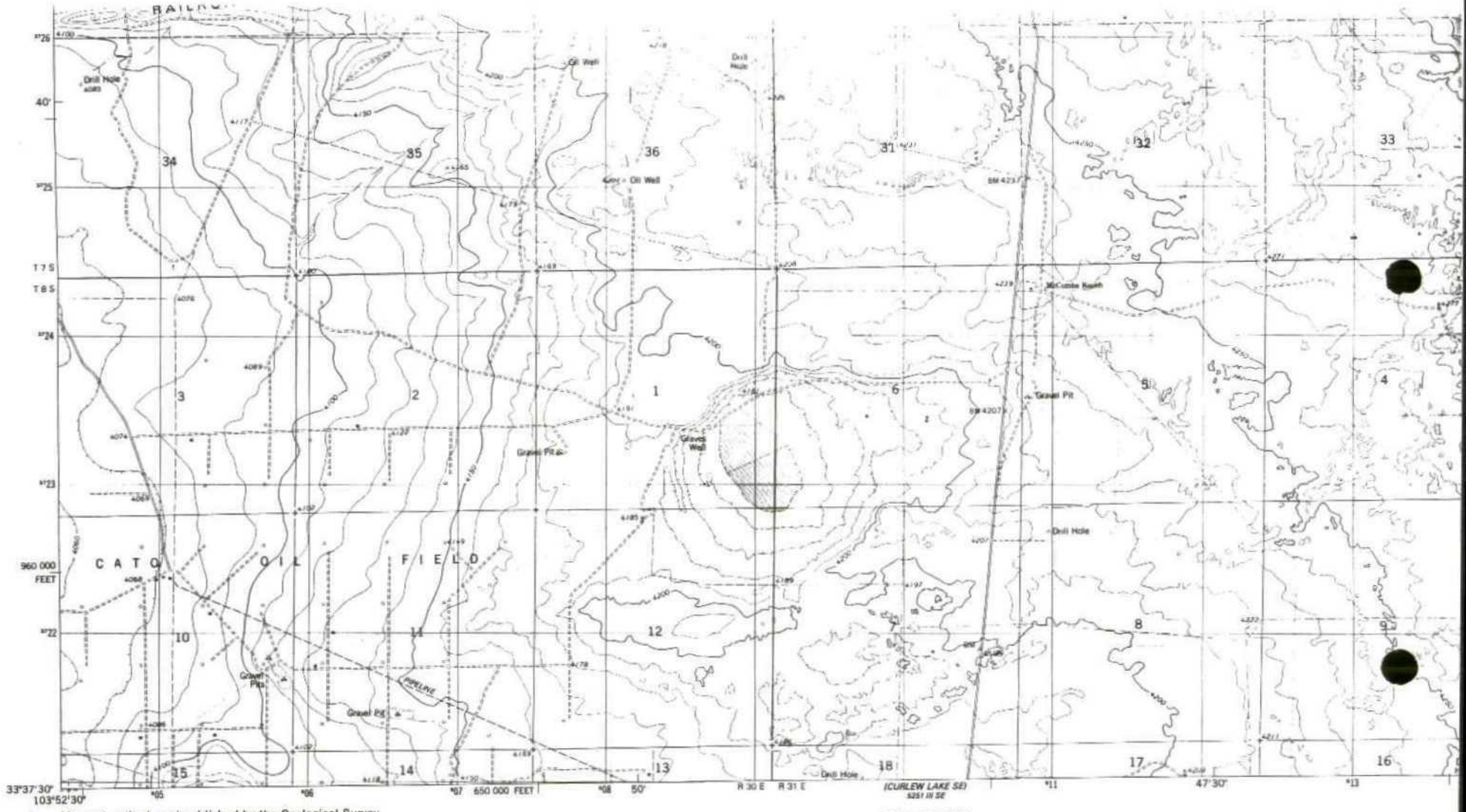
PRESLER LAKE QUAD

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY




PRESLER LAKE QUADRANGLE
NEW MEXICO—CHAVES CO.
7.5 MINUTE SERIES (TOPOGRAPHIC)
103°52'30"
33°37'30"
R 29 E
R 30 E
630 000 FEET
950 000 FEET
CATO OIL FIELD
Cooper Tank
Broke Tank
Broke Tank Lake
Last Lake
Drill Hole
Oil Well
Gravel Pit
PIPELINE
T 8 S
T 9 S

LONE WOLF QUAD



Mapped, edited, and published by the Geological Survey

Control by USGS and NOS/NOAA

Topography by photogrammetric methods from aerial photographs taken 1974. Field checked 1975. Map edited 1979

Projection and 10,000-foot grid ticks: New Mexico coordinate system, east zone (transverse Mercator)
1000-meter Universal Transverse Mercator grid, zone 13
1927 North American Datum
To place on the predicted North American Datum 1983 move the projection lines 6 meters south and 47 meters east as shown by dashed corner ticks

Fine red dashed lines indicate selected fence lines

Revisions shown in purple and woodland compiled from aerial photographs taken 1982 and other sources
This information not field checked. Map edited 1984

UTM GRID AND 1984 MAGNETIC NORTH DECLINATION AT CENTER OF SHEET

SCALE 1:24 000

1 MILE
1000 0 1000 2000 3000 4000 5000 6000 7000 FEET
1 KILOMETER

CONTOUR INTERVAL 10 FEET
NATIONAL GEODETIC VERTICAL DATUM OF 1929

NEW MEXICO
QUADRANGLE LOCATION

THIS MAP COMPLIES WITH NATIONAL MAP ACCURACY STANDARDS
FOR SALE BY U.S GEOLOGICAL SURVEY, DENVER, COLORADO 80225, OR RESTON, VIRGINIA 22092
A FOLDER DESCRIBING TOPOGRAPHIC MAPS AND SYMBOLS IS AVAILABLE ON REQUEST

NEW MEXICO ENERGY, MINERALS
& NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION
2040 South Pacheco Street
Santa Fe, New Mexico 87505
(505) 827-7131

November 20, 1998

CERTIFIED MAIL
RETURN RECEIPT NO. P-326-936-488

Mr. Frates Seeligson
4040 Broadway Suite 510
San Antonio, TX 78209

RE: Crosby Salt Lake Treating Plant Inspection
Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E;
and Section 19, T 8 S, R 29 E,
NMPM, Chaves County, New Mexico

Dear Mr. Seeligson:

The New Mexico Oil Conservation Division (OCD), inspected the Crosby Salt Lake treating plant located in the Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E; and Section 19, T 8 S, R 29 E, NMPM, Chaves County, New Mexico, on August 8, 1997 and again on May 18, 1998.

The OCD inspection, current file review and conversations with yourself and Mr. A.L. Daugherty indicate that the facility is to be closed however there are some permit deficiencies regarding closure which must be addressed.

The following is a list the permit closure deficiencies found at Crosby Salt Lake during the inspection. Attachment 1 contains photographs taken during the inspection on August 8, 1997 and again on May 18, 1998. Crosby Salt Lake shall provide the OCD with a detailed description of how the corrections will be made and a time table of when each of the corrections will be completed. **A response is required by Crosby Salt Lake to these deficiencies by January 20, 1999.**

1. Process Area:

There was evidence of leaks and deliberate spills around most of the above grade tanks (see pictures 1, 2, 3, 5, 6, 7, 10, 11, and 15 dated 8/8/97 and picture 1 dated 5/18/98). Pictures 1, 2 and 11 show that the small tank was jacked up and the drain port was open and oil was allowed to flow out onto the ground. Some of the spills and the tank bottom dump areas have been disked to allow for bioremediation to begin (pictures 2 and 4 dated 5/18/98).

The surface spill, tank area, and tank bottom dump area (pictures 12 and 13 dated 8/8/98) soils shall either be removed to an OCD approved disposal facility or be further remediated on site. The closure proposal shall include final testing of the soils for total

petroleum hydrocarbons (TPH) and benzene, toluene, ethylbenzene, and xylene (BTEX). The proposal shall also include the reseeding the site with native grasses.

2. Spill Reporting:

All spills/releases shall be reported pursuant to OCD Rule 116. Enclosed please find a spill report form C-141 to be filled out and filed with the appropriate OCD District office.

3. Open Top Tanks and Pits:

To protect migratory birds, all tanks exceeding 16 feet in diameter, and exposed pits and ponds shall be screened, netted or covered unless rendered non hazardous (Order R-8952, Rule 711).

The small open toped tank was not netted. There is a large bird nest on the catwalk between the two tanks (see pictures 1 and 15 dated 8/8/97). Cattle tracks, five dead birds and a dead rodent were found in the spilled oil surrounding the tanks (see pictures 3, 4, 5, and 6 dated 8/8/97).

4. Above Ground Tanks:

If any oil or BS&W remains within the tanks the material shall be hauled to an OCD approved 711 waste management facility. All empty tanks shall be removed from the facility location.

5. Trash and Potentially Hazardous Materials:

All trash and potentially hazardous materials shall be properly disposed of. The contaminated soil at the facility area shall be remediated on sight and/or removed to an OCD approved 711 waste management facility (see picture 1, 2, 3, 4, 5, 6, 7, 10, 11, 12, 13, and 15 dated 8/8/97). The tanks, abandoned flow lines to Crosby Salt Lake (Picture 4 dated 5/18/98), piping, trash and equipment should be recycled or properly disposed of.
NoRM inscale

6. Soil Spreading, Disking and Lift Thickness:

All contaminated soils to be landfarmed at the facility will be spread on the surface in six inch lifts or less and disked a minimum of one time every two weeks (biweekly) to enhance biodegradation of contaminants.

7. Historical Facility Spills:

The historical spills that occurred along the flow line to Crosby Salt Lake are still evident (see pictures 8 and 9 dated 8/8/97 and picture 4 dated 5/18/98). The contaminated soil along the flow line route shall be sampled at several intervals and tested for total petroleum hydrocarbons (TPH) and benzene, toluene, ethylbenzene, and xylene (BTEX). Upon review of the analytical results the OCD will determine if any soil remediation is required.

If you have any questions please do not hesitate to contact me at (505) 827-7153.

Sincerely,

Martyne J. Kieling
Environmental Geologist

Attachments
xc: Artesia OCD Office
Hobbs OCD Office
Mr. A.L. Daugherty, 400 Twin Diamond, Roswell, NM 88201

CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)

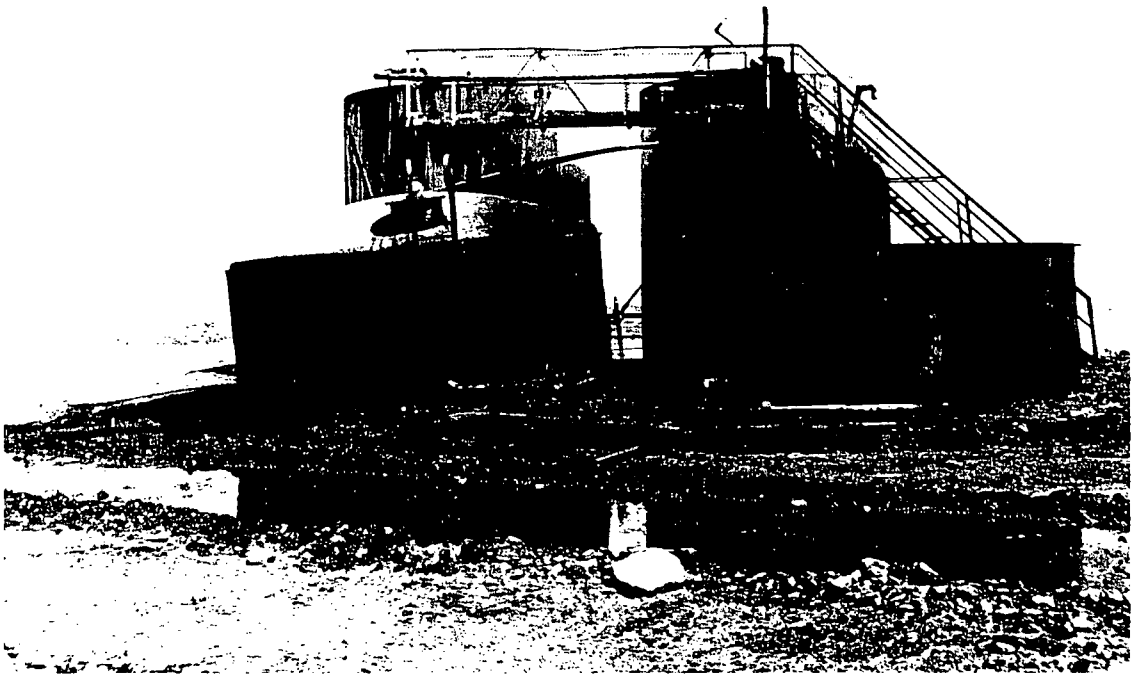


PHOTO NO. 1 DATE: 8/8/97

PHOTO NO. 2 DATE: 8/8/97

CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)

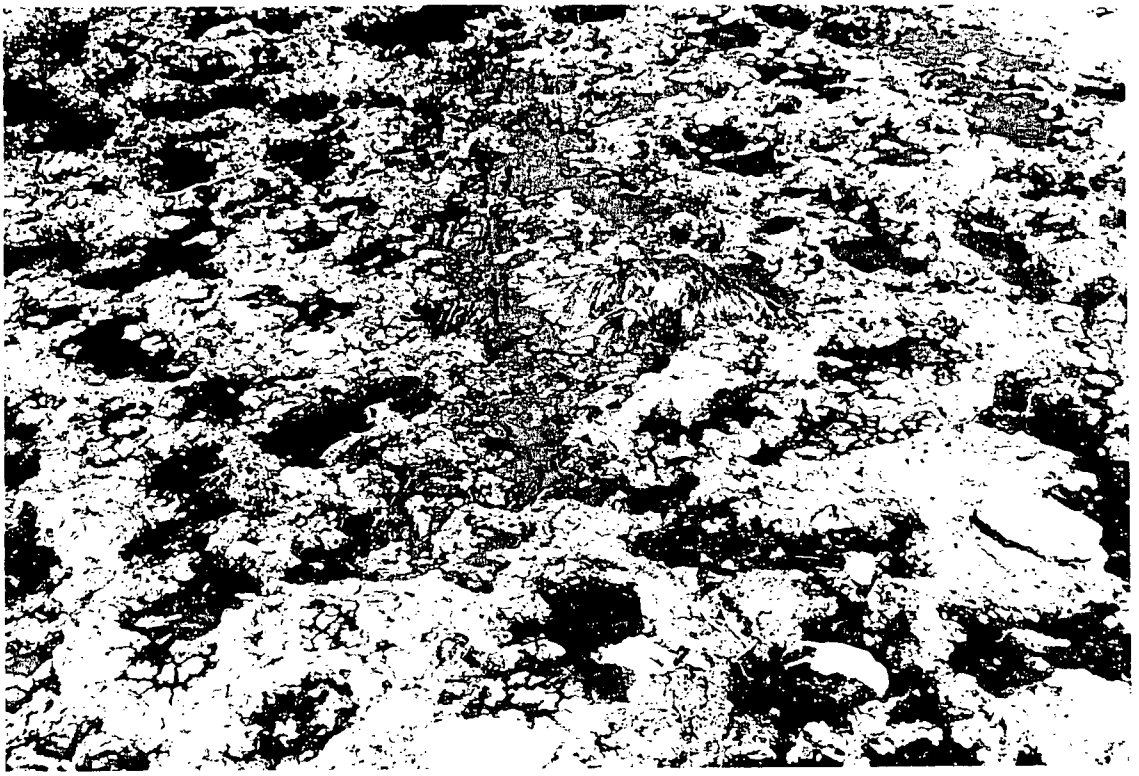


PHOTO NO. 3 DATE: 8/8/97

PHOTO NO. 4 DATE: 8/8/97

CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)

PHOTO NO. 5 DATE: 8/8/97

PHOTO NO. 6 DATE: 8/8/97

CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)

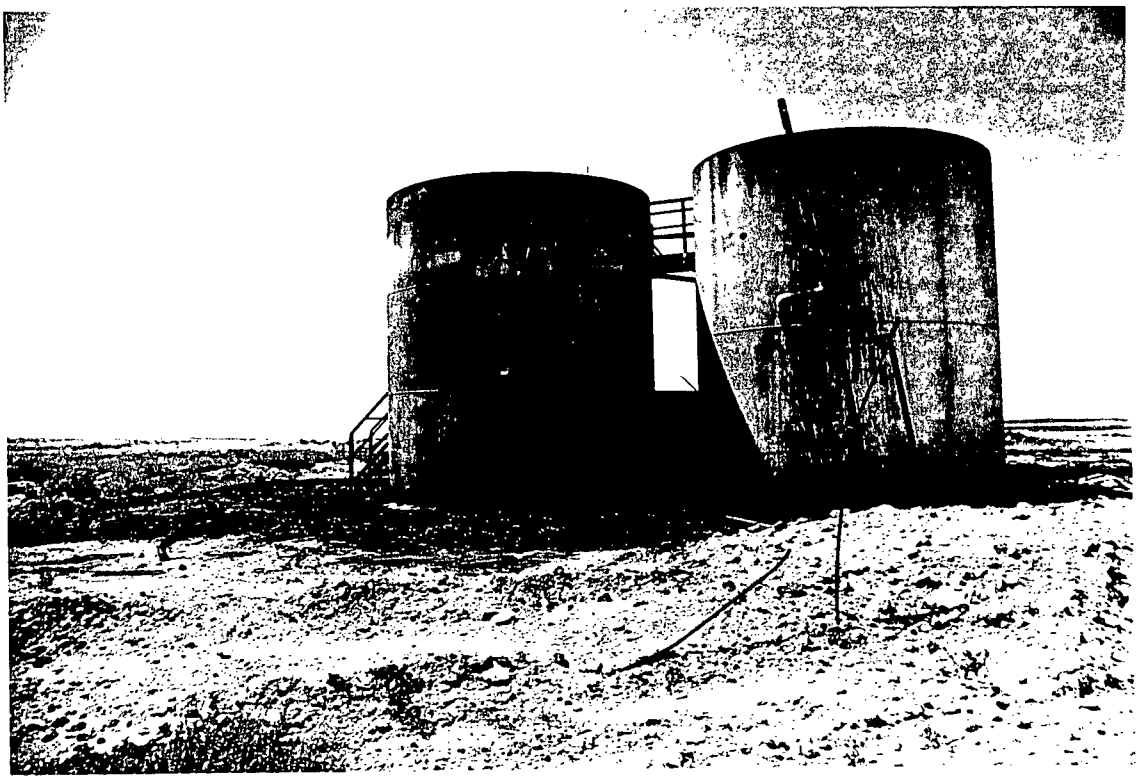
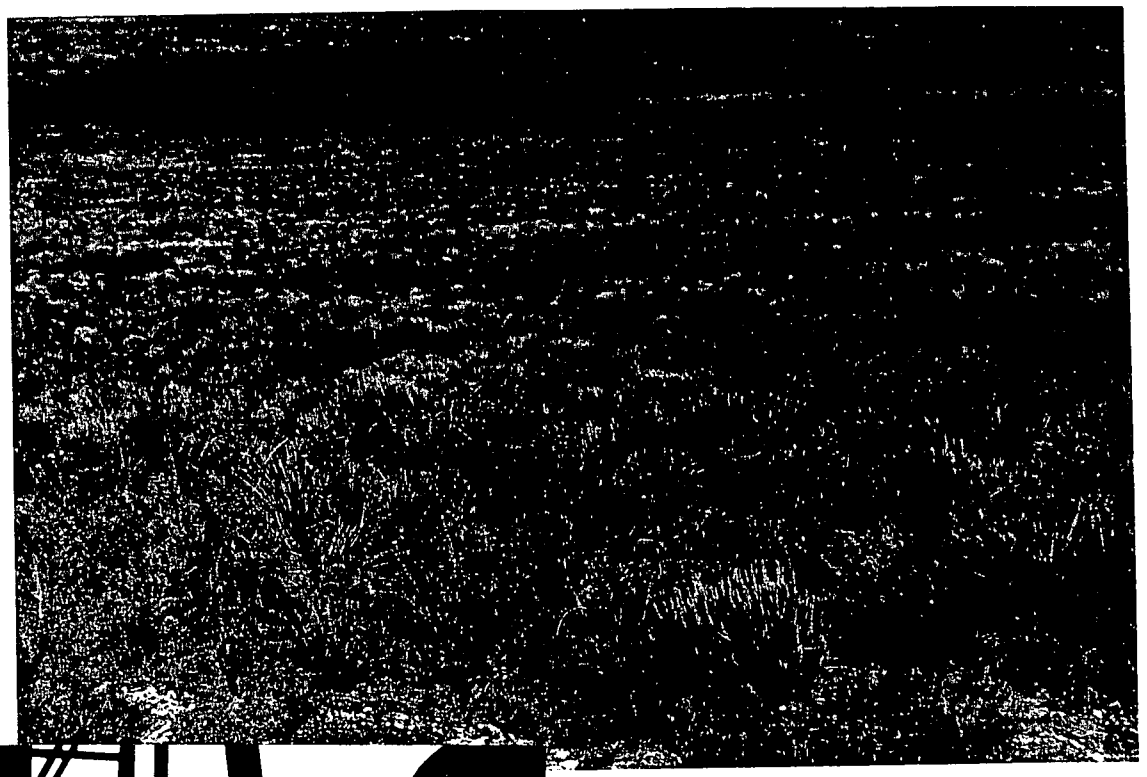


PHOTO NO. 7 DATE: 8/8/97

PHOTO NO. 8 DATE: 8/8/97

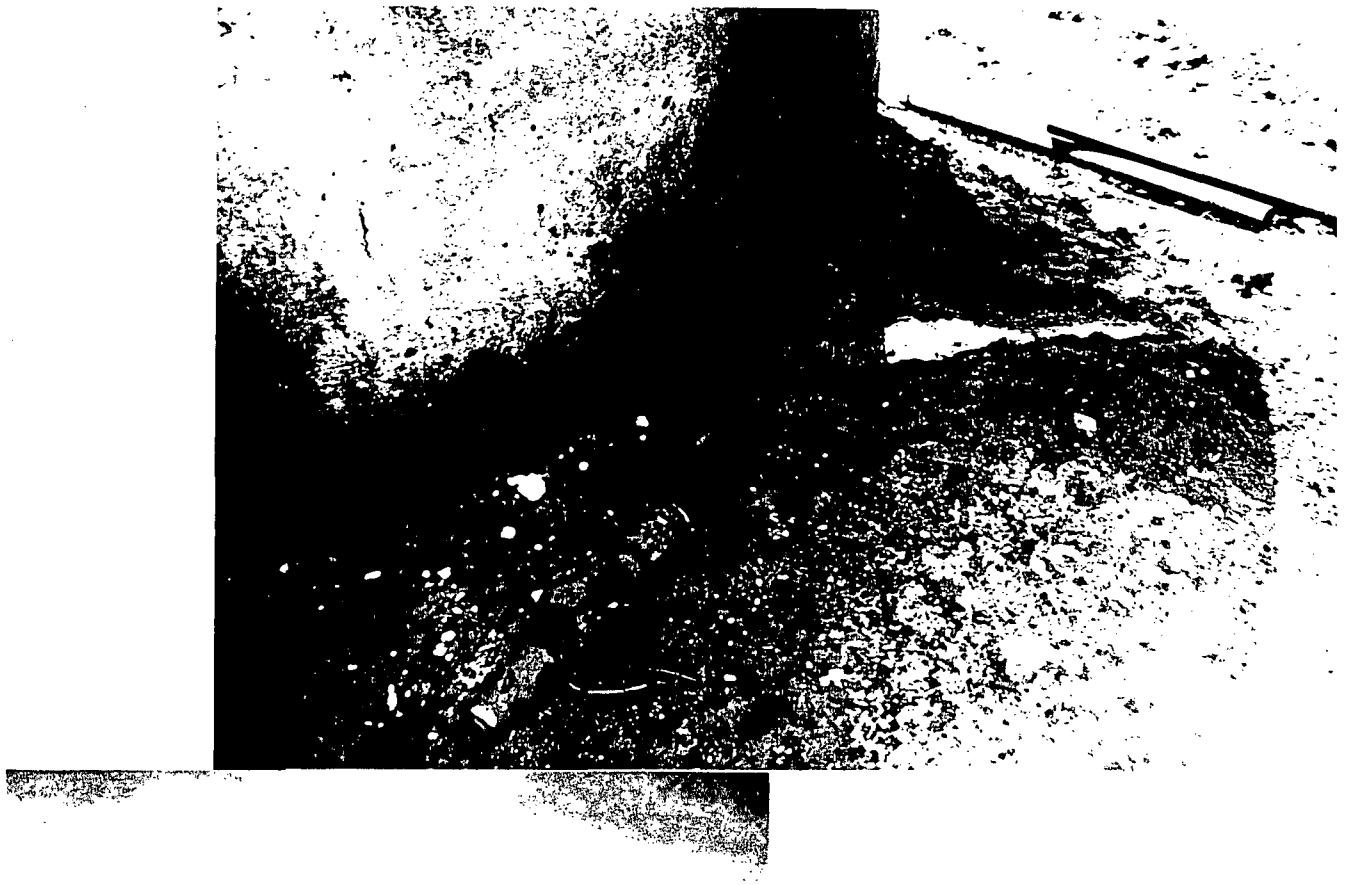
CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)



. 9 DATE: 8/8/97

PHOTO NO. 10 DATE: 8/8/97

CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)



11 DATE: 8/8/97

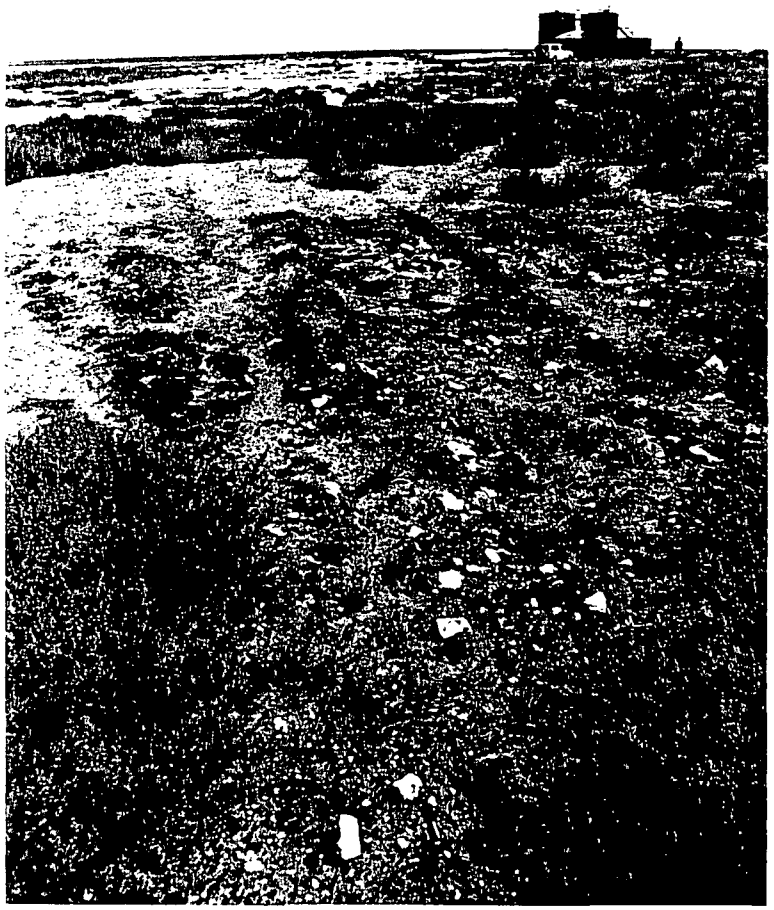


PHOTO NO. 12 DATE: 8/8/97

CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)

PHOTO NO. 13 DATE: 8/8/97

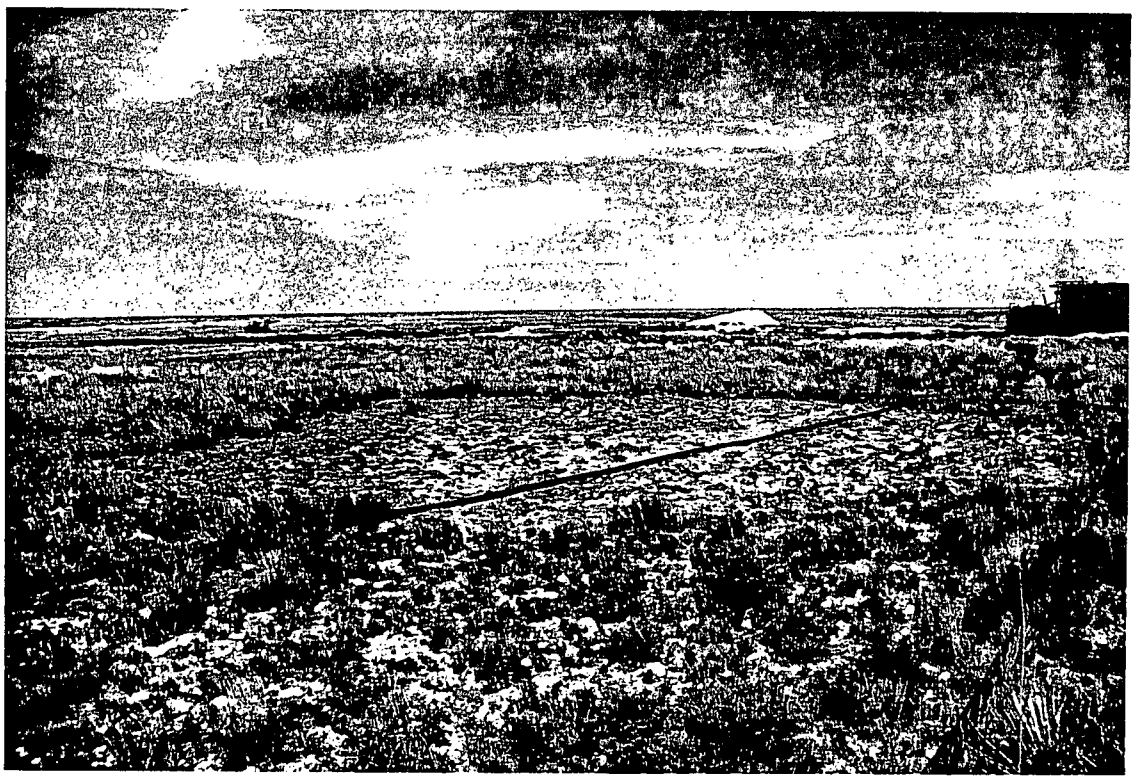
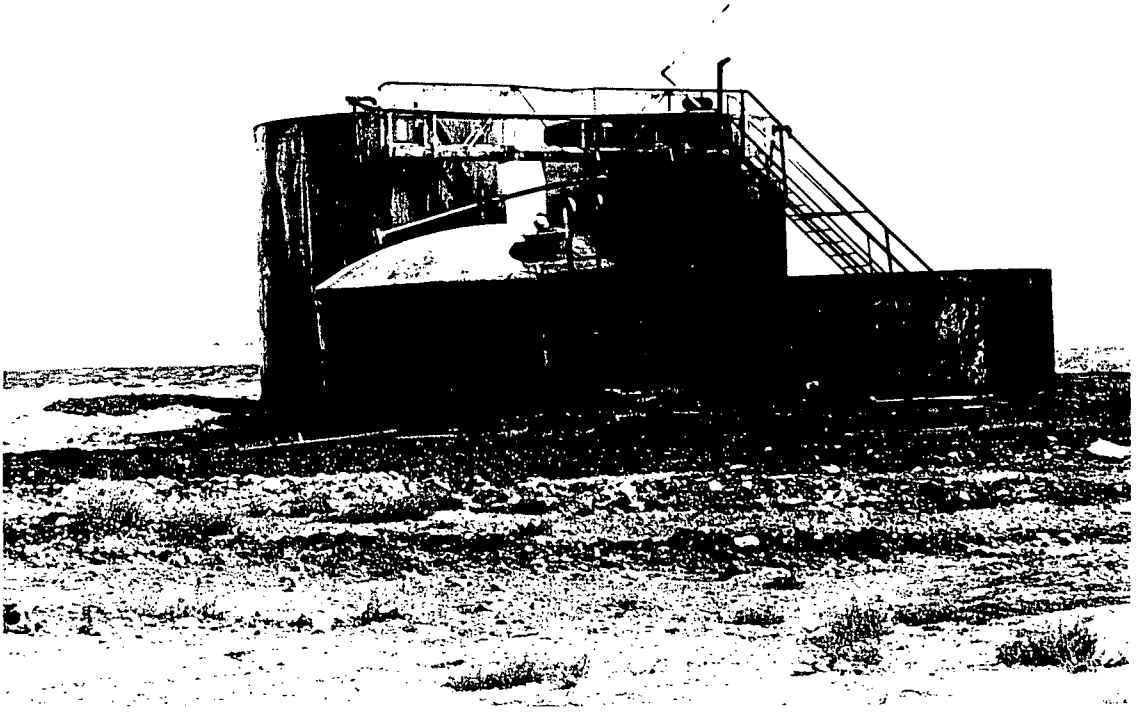


PHOTO NO. 14 DATE: 8/8/97

CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)



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CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)

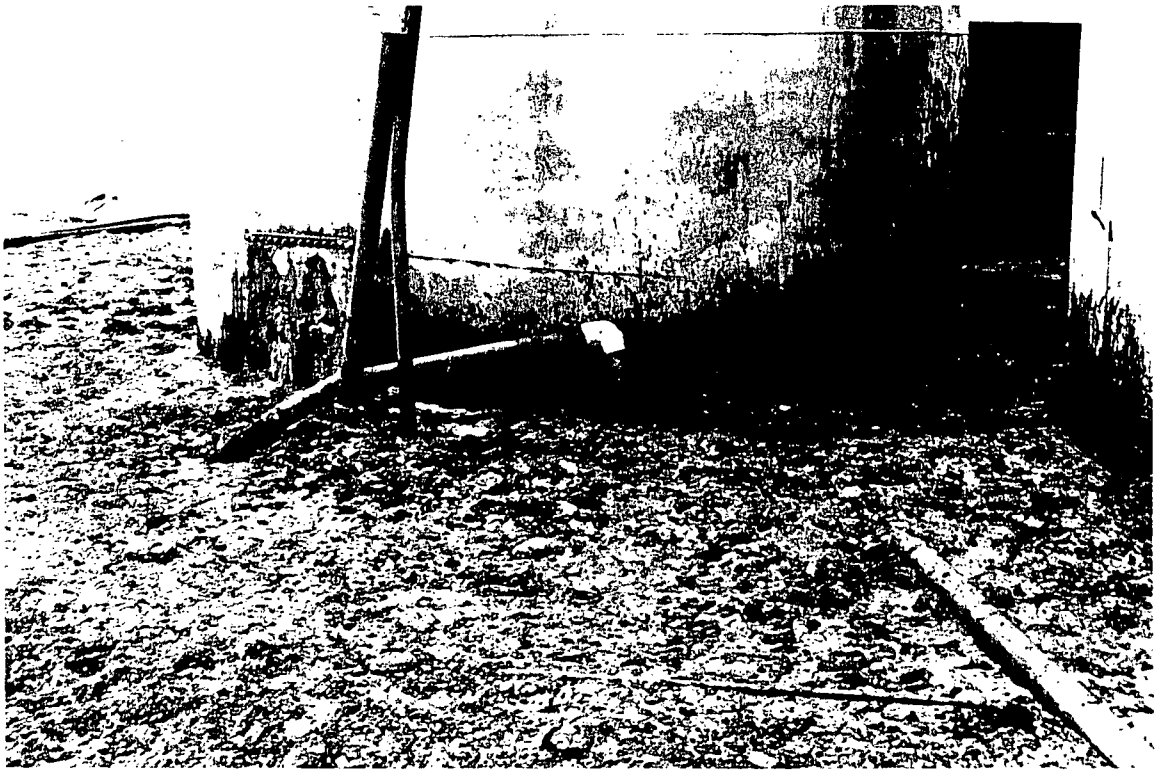

PHOTO NO. 1 DATE: 5/18/98

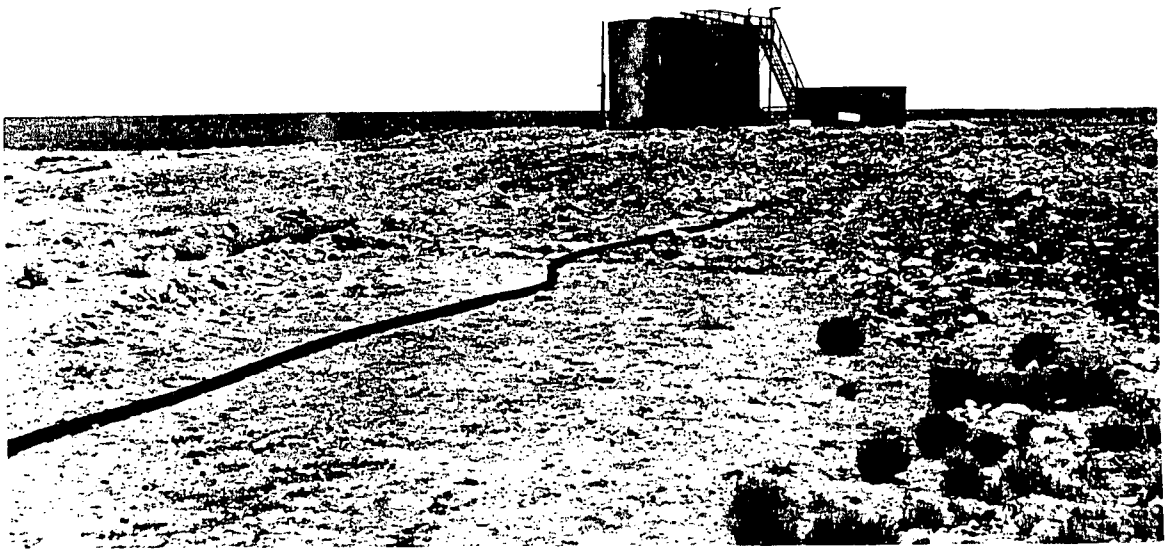

PHOTO NO. 2 DATE: 5/18/98

CROSBY SALT LAKE, 711 FACILITY INSPECTION (PHOTOS BY OCD)

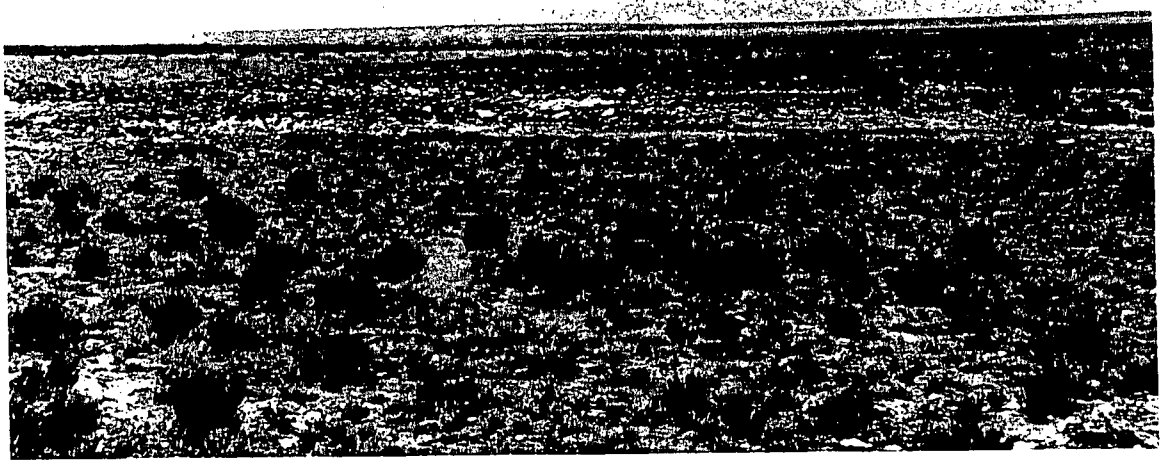

PHOTO NO. 3 DATE: 5/18/98

PHOTO NO. 4 DATE: 5/18/98

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 11:	Treating Plant Tanks,
	Tank jacked up, open valve, tank contents drained onto ground.

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 9:	Former Treating Plant spills/ discharge pathway to Playa , Looking Southeast
	Oil contaminated soil center of photo in dark green plants.

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 12:	Treating Plant Tanks, Looking Southeast
	Tank bottoms spread on ground North northwest of Tank area

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 13:	Treating Plant Tanks, Looking Southeast
	Tank bottoms spread on ground Northwest of Tank area

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 10:	Treating Plant Tanks, Looking south southwest
	Oil contaminated soil next to Treating Plant Tanks .

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 15:	Treating Plant Tanks, Looking Southeast
	Tank jacked up, valve open, tank contents drained onto ground.
	Bird nest on catwalk

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 14:	Treating Plant Tanks, Looking East
	Brine leak from pipeline.

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 1:	Treating Plant Tanks, Looking East South East
	Tank jacked up, valve open, tank contents drained onto ground.

Sec 19 T 8S R 29 E
Sec 19, T 8S, R 30 E
Sec 24 T 8S R 29 E

Crosby Salt Lake

Frates S. Seligson /AL. DAUGHERTY

May 18, 1995

OCD Murtyne Kieling
Roger Anderson

AL. DAUGHERTY

Sec 19, T 8 S, R 29 E
Sec 19, T 8 S, R 30 E
Sec 24, T 8 S, R 29 E

Crosby Salt Lake
Frakes S. Seeligson / AL Daugherty

May 18, 1998

OCD Marilyne Kieling
Roger Anderson

AL Daugherty

Sec 19, T 8 S, R 29 E

Sec 19, T 8 S, R 30 E

Sec 24, T 8 S, R 29 E

Crosby Salt lake

Frankes S. Seeligson / AL Daugherty

May 18, 1998

OCD Martyne Kieling

Roger Anderson

A.L. Daugherty

Sec. 19, T 8S, R 29 E

Sec 19, T 8S, R 30 E

Sec 24, T 8S, R 29 E

CROSBY SALT LAKE

FRATES S. SEELIGSON / A.L. DAUGHERTY

MAY 18, 1955

OCD MARTYNE KIELING
ROGER ANDERSON

A.L. DAUGHERTY

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 9:	Former Treating Plant spills/ discharge pathway to Playa , Looking Southeast Oil contaminated soil center of photo in dark green plants.

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe Ray Smith, Artesia
Picture 6:	Oil contaminated soil next to Treating Plant Tanks, Oily soil dead bird in center of photo.

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 5:	Oil contaminated soil next to Treating Plant Tanks,
	Oily soil with hoof prints, large dead bird in center of photo.

OCD 711 Facility: A.L. Daugherty, White Lake Disposal
Inspection Date: August 27, 1997
OCD Personnel: Martyne Kieling, Santa Fe
Ray Smith, Artesia

Picture 4: Oil contaminated soil next to Treating Plant Tanks,
Oily soil with hoof prints, large dead bird in center of photo.

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 3:	Oil contaminated soil next to Treating Plant Tanks, Oily soil with hoof prints, dead bird in center of photo, dead rodent bottom right.

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 2:	Treating Plant Tanks, Looking East North East
	Tank jacked up, valve open, tank contents oil/bottoms/water drained onto ground

OCD 711 Facility:	A.L. Daugherty, White Lake Disposal
Inspection Date:	August 27, 1997
OCD Personnel:	Martyne Kieling, Santa Fe
	Ray Smith, Artesia
Picture 7:	Treating Plant Tanks, Looking Northwest
	Oil contaminated soil next to Treating Plant Tanks,

STATE OF NEW MEXICO
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

☒ Telephone ☐ Personal	Time	Date
	1:20	10-23-98

Originating Party	Other Parties
AL Daugherty p(505) 625-1867 400 Twin Diamond Roswell, NM 88201	

Subject

Discussion

Copy on correspondance; wrap this up by Christmas.

Inspection Report.

Conclusions or Agreements

Distribution

Signed

STATE OF NEW MEXICO
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

☑ Telephone ☐ Personal	Time 11:20	Date 4/14/98
Originating Party ~~Frank Seeligson Secretary~~ Marlene Kieling	Other Parties ~~Martyne~~ Franks Seeligson Secretary	

Subject AL Daughtery Treating Plant

Discussion Left Message Concerning the ~~Clean up~~ / Ingestion Date May 18 1:00 pm. Have called & Talked to A.L. And He was willing to meet at the Site

I will call & confirm Date & Time two weeks prior.

Conclusions or Agreements

Distribution

Signed Marlene Kieling

STATE OF NEW MEXICO
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

☑ Telephone ☐ Personal	Time	Date
	11:15	4/14/98

Originating Party	Other Parties
~~A.L. Daugherty~~ Marilyne Kieling	~~Marilyne Kieling~~ A.L. Daugherty

Subject: AL Daugherty Treating Plant Final Inspection
505-625-1867 Roswell

Discussion: Tentative Date to Tour Facility @ 1:00 pm May 18th
Call Back and Confirm Date on May 4th -----

Conclusions or Agreements

Distribution

Signed Marilyne Kieling

FRATES SEELIGSON

4040 Broadway - Suite 510
San Antonio, TX 78209

Telephone 210-826-5645
Fax 210-826-5689

April 9, 1998

Ms. Martyne J. Kieling, Environmental Geologist
New Mexico Energy, Minerals & Natural Resources Dept.
Oil Conservation Division
2040 South Pacheco Street
Santa Fe, NM 87505

RE: $25,000 Bond for Commercial Surface Waste Disposal facility
Fireman's Fund Ins. Co., Surety Bond No. 111 3268 3654
Your Letter of 3/30/98

Dear Ms. Kieling:

Once you have a date certain when you wish to visit the Chaves County property, please let me know. We will help set up a meeting with A. L. Daugherty, former foreman of White Lake Ranch. If you wish to contact Mr. Daugherty directly, please call him at 505-625-1867 in Roswell. In addition, I will write the new owner of the ranch notifying him of what we would like to do.

Best regards,

Frates Seeligson

Frates Seeligson

Daughtery

STATE OF NEW MEXICO
OIL CONSERVATION DIVISION

MEMORANDUM OF MEETING OR CONVERSATION

☒ Telephone ☐ Personal	Time 10:40	Date 4/9/98

Originating Party (First called 4/3/98 Left message)	Other Parties
Frates Seeligson 210-826-5649	Martyne Kieling
White Lake Ranch	

Subject

AL Daughtery Treating Plant
Forman ↑ ran Site

Discussion

Site Closuer, Bond, and Inspection.
Mr. Seeligson will Fax AL Daughtery Phone # and a copy of a Letter He will write to The New Land owners.
The Property Has been Sold.

I Told Mr Seeligson That I would like to Inspect the Site 2 or 3rd week of May with a Company Representative on Site.

Conclusions or Agreements

Wait For Fax with # Phone

Distribution

Signed Martyne J Kieling

NEW MEXICO ENERGY, MINERALS
& NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION
2040 South Pacheco Street
Santa Fe, New Mexico 87505
(505) 827-7131

March 30, 1998

CERTIFIED MAIL
RETURN RECEIPT NO. P-326-936-413

Ms. Cindy Ash
Fireman's Fund Insurance Companies
P.O. Box 2519
Dallas, TX 75221

RE: $25,000 Bond for Commercial Surface Waste Disposal facility
Frates S. Seeligson., Principal
Section 19, T 8 S, R 30 E; Section 24, T 8 S, R 29 E; and Section 19, T 8 S, R 29 E, NMPM,
Chaves County, New Mexico
Fireman's Fund Insurance Co., Surety
Bond No. 111 3268 3654

Dear Ms. Ash:

The New Mexico Oil Conservation Division (OCD) received the Fireman's Fund Insurance Company letter on March 23, 1998. The above referenced letter requested that the OCD cancel the Surface Waste Disposal Bond No. 111 3268 3654. Cancellation of the bond is conditional upon compliance with all applicable statutes of the State of New Mexico and all rules, regulations and orders of the OCD, and upon clean-up of the facility site to standards of the OCD.

The Frates S. Seeligson surface waste disposal facility was inspected on August 27, 1997 by OCD personnel. The facility site requires additional clean-up to meet OCD standards. Since the activities/operations giving rise to the needed cleanup have already been conducted the **subject bond will remain in full force and effect** until the required clean-up is performed and closure of the facility is approved by the OCD.

If you have any questions please call me at (505) 827-7153

Sincerely,

Martyne J. Kieling
Environmental Geologist

xc: Artesia District Office
Frates S. Seeligson, 4040 Broadway, Suite 510, San Antonio, Texas 78205

STATE OF NEW MEXICO

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

DRUG FREE

MEMORANDUM

BRUCE KING
GOVERNOR

ANITA LOCKWOOD
CABINET SECRETARY

POST OFFICE BOX 2088
STATE LAND OFFICE BUILDING
SANTA FE, NEW MEXICO 87504
(505) 827-5800

TO: ALL COMMERCIAL SURFACE DISPOSAL FACILITIES

FROM: WILLIAM J. LEMAY, Director
Oil Conservation Division

SUBJECT: DOCUMENTATION REQUIRED FOR ACCEPTANCE OF WASTE

DATE: APRIL 2, 1993

The Oil Conservation Division (OCD) has issued a number of Rule 711 permits for commercial surface disposal facilities which allow the facilities to accept certain types of wastes. The OCD has not previously listed the documentation that should accompany all waste accepted at these facilities. Attached is a list of the documentation to accompany any waste accepted by an OCD-permitted commercial disposal facility. Listed are the certifications and tests required for the various classifications of waste. Also attached is a list of the oil and gas wastes exempted from EPA "hazardous waste" classification.

This documentation provides protection from hazardous waste regulations for the waste generator, transporter and disposal facility and facilitates OCD oversight. Please note that certain types of non-oilfield wastes can also be accepted by a disposal facility under its OCD Rule 711 permit. The OCD is currently in the process of developing an information form to accompany each load of waste received at a disposal facility. Until that form is finalized, each facility may develop and use its own forms and shall retain these records at the facility.

If you have any questions regarding the technical aspects of the documentation needed, please call **Roger Anderson** at **505/827-5812**.

DOCUMENTATION REQUIRED TO ACCEPT WASTES
COMMERCIAL SURFACE DISPOSAL FACILITIES
(April 1, 1993)

1. Exempt Oilfield Waste: A "Certification of Waste Status" signed by a corporate official of the waste generator certifying that the wastes are generated from oil and gas exploration and production operations and are exempt from Resource Conservation and Recovery Act (RCRA) Subtitle C regulations.

2. Exempt, Non-Oilfield Waste: A "Certification of Waste Status" signed by the New Mexico Environment Department (NMED) or the appropriate regulatory agency for non-oilfield wastes which are exempt from RCRA Subtitle C regulations. Acceptance is on a case-by-case basis only after OCD approval from both Santa Fe and the appropriate district office.

3. Non-exempt, Non-hazardous Waste from OCD Permitted Facilities: The analytical results of *Hazardous Waste Characterization. The test for hazardous characteristics for a particular waste may be effective for one year from the date of analysis, if, the subsequent wastes from the same waste stream are accompanied by a statement from a corporate official that there has been no change in the processes employed or the chemicals stored/used at the facility generating the waste. Acceptance is on a case-by-case basis only after OCD approval from both Santa Fe and the appropriate district office.

4. Non-Exempt, Non-hazardous, Non-Oilfield Waste: The analytical results of *Hazardous Waste Characterization **and** a "Certification of Waste Status" certifying the non-hazardous classification of the wastes signed by the NMED or appropriate regulatory agency. Acceptance of waste is on a case-by-case basis only after OCD approval from both Santa Fe and the appropriate district.

5. Hazardous Waste: At no time will wastes which are hazardous by either listing or testing be accepted at an OCD permitted disposal facility.

* Includes corrosivity, reactivity, ignitability, and toxic constituents and a certification that no listed hazardous wastes are contained within the wastes. The samples for these analyses and results will be obtained from the wastes prior to removal from the generator's facility and without dilution in accordance with EPA SW-846 sampling procedures.

NOTES:

1. As of September 25, 1990, any facility disposing of 1.1 tons or more of non-exempt waste per month with benzene as a constituent (e.g. oily liquid or solids, or aromatic wastes) is disposing of hazardous waste if, after testing, benzene levels of liquids, and of liquid leachate from solids are above 0.5 milligrams per liter (equivalent to 500 parts per billion). Benzene is a naturally occurring constituent of crude oil and refined product (especially gasoline), and is also used as a cleaning solvent. (Other types of solvents and chemicals have been subject to hazardous waste rules for several years.)

   As of March 29, 1991, facilities disposing of between 0.11 and 1.1 tons of non-exempt waste per month became subject to the same rules. Regulation of such facilities is the responsibility of either the US Environmental Protection Agency or the New Mexico Environment Department (dependent on jurisdiction transfer from USEPA).

   The following OCD regulated facilities, especially, may be subject to hazardous waste rules for disposal of wastes and contaminated soils containing benzene:

   - Oil and gas service companies having wastes such as vacuum truck, tank, and drum rinsate from trucks, tanks and drums transporting or containing non-exempt waste.
   - Crude oil treating plants and crude tank bottom reclaimers using benzene solvent, or liquids containing benzene as cleaning solutions.
   - Transportation pipelines and mainline compressor stations generating waste, including waste deposited in transportation pipeline-related pits.

   Source: Federal Register, Thursday, March 29, 1990, p.11,798 - 11,877.

2. In April, 1991, EPA clarified the status of oil and tank bottom reclamation facilities:

   A. Those wastes that are derived from the processing by reclaimers of only exempt wastes from primary oil and gas field operations are also exempt from the hazardous waste requirements. For example, wastes generated from the process of recovering crude oil from tank bottoms are exempt because the crude storage tanks are exempt.

   B. Those reclaimer wastes derived from non-exempt wastes (eg. reclamation of used motor oil, refined product tank bottoms), or that otherwise contain material which are not uniquely associated with or intrinsic to primary exploration and production field operations would not be exempt. An example of such non-exempt wastes would be waste solvent generated from the solvent cleaning of tank trucks that are used to transport oil field tank bottoms. The use of solvent is neither unique nor intrinsic to the production of crude oil.

   Source: EPA Office of Solid Waste and Emergency Response letter opinion dated April 2, 1991, signed by Don R. Clay, Assistant Administrator.

EPA WASTE CLASSIFICATION
O & G EXPLORATION AND PRODUCTION WASTES*

Oil and Natural Gas Exploration and Production Materials and Wastes Exempted by EPA from Consideration as "Hazardous Wastes" (provided non-exempt waste which is or may be "hazardous" has not been added):

- Produced water;
- Drilling fluids;
- Drill cuttings;
- Rigwash;
- Drilling fluids and cuttings from offshore operations disposed of onshore;
- Geothermal production fluids;
- Hydrogen sulfide abatement wastes from geothermal energy production;
- Well completion, treatment, and stimulation fluids;
- Basic sediment and water and other tank bottoms from storage facilities that hold product and exempt waste;
- Accumulated materials such as hydrocarbons, solids, sand, and emulsion from production separators, fluid treating vessels, and production impoundments;
- Pit sludges and contaminated bottoms from storage or disposal of exempt wastes;
- Workover wastes;
- Gas plant dehydration wastes, including glycol-based compounds, glycol filters, filter media, backwash, and molecular sieves;
- Gas plant sweetening wastes for sulfur removal, including amines, amine filters, amine filter media, backwash, precipitated amine sludge, iron sponge, and hydrogen sulfide scrubber liquid and sludge;
- Cooling tower blowdown;
- Spent filters, filter media, and backwash (assuming the filter itself is not hazardous and the residue in it is from an exempt waste steam);
- Packing fluids;
- Produced sand;
- Pipe scale, hydrocarbon solids, hydrates, and other deposits removed from piping and equipment prior to transportation;
- Hydrocarbon-bearing soil;
- Pigging wastes from gathering lines;
- Wastes from subsurface gas storage and retrieval, except for nonexempt wastes listed below;
- Constituents removed from produced water before it is injected or otherwise disposed of;
- Liquid hydrocarbons removed from the production stream but not from oil refining;
- Gases from the production stream, such as hydrogen sulfide and carbon dioxide, and volatilized hydrocarbons;
- Materials ejected from a producing well during the process known as blowdown;
- Waste crude oil from primary field operations and production;
- Light organics volatilized from exempt wastes in reserve pits or impoundments or production equipment;
- *Liquid and solid wastes generated by crude oil and crude tank bottom reclaimers****.

Materials and Wastes Not Exempted (may be a "hazardous waste" if tests or EPA listing define as "hazardous") **:

- Unused fracturing fluids or acids;
- Gas plant cooling tower cleaning wastes;
- Painting wastes;
- Oil and gas service company wastes, such as empty drums, drum rinsate, vacuum truck rinsate, sandblast media, painting wastes, spent solvents, spilled chemicals, and waste acids;
- Vacuum truck and drum rinsate from trucks and drums transporting or containing non-exempt waste;
- Refinery wastes;
- *Liquid and solid wastes generated by refined oil and product tank bottom reclaimers****;
- Used equipment lubrication oils;
- Waste compressor oil, filters, and blowdown;
- Used hydraulic fluids;
- Waste solvents;
- Waste in transportation pipeline-related pits;
- Caustic or acid cleaners;
- Boiler cleaning wastes;
- Boiler refractory bricks;
- Boiler scrubber fluids, sludges, and ash;
- Incinerator ash;
- Laboratory wastes;
- Sanitary wastes;
- Pesticide wastes;
- Radioactive tracer wastes;
- Drums, insulation, and miscellaneous solids.

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* Source: Federal Register, Wednesday, July 6, 1988, p.25,446 - 25,459.

** See important note on 1990 disposal restrictions for non-exempt waste on reverse.

*** See reverse side for explanation of oil and tank bottom reclaimer listings.

(rev. NMOCD 9/91)

STATE OF NEW MEXICO

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

GARREY CARRUTHERS
GOVERNOR

March 1, 1990

POST OFFICE BOX 2088
STATE LAND OFFICE BUILDING
SANTA FE, NEW MEXICO 87504
(505) 827-5800

Mr. Frates S. Seeligson
1604 NBC Building
San Antonio, Texas 78205

Re: $25,000 Bond for Commercial Surface
Waste Disposal Facilities
Frates S. Seeligson, Principal
Bond No. 111 3268 3654

Dear Mr. Seeligson:

We have corresponded with you previously requesting a rider to your bond giving the location of your facility as:

Section 19, T-8-S, R-30-E
Section 24, T-8-S, R-29-E and
Section 19, T-8-S, R-29-E,
all in Chaves County, New Mexico.

We have not yet received that rider as requested.

You are hereby directed to file the rider with Diane Richardson, Administrator of the OCD Bond Department, at the letterhead address not later than 3:00 p.m. on March 9, 1990.

If you fail to file the rider as required, you will immediately cease operations at the facility and begin reclamation. Your failure to comply with this directive will result in a civil assessment being made against you, and each day of violation will be considered a separate offense for which a separate assessment will be assessed.

Sincerely,

WILLIAM J. LEMAY,
Director

WJL/RGS/dr

Submit 4 Copies
to Appropriate
District Office

DISTRICT I
P.O. Box 1980, Hobbs, NM 88241-1980

DISTRICT II
P.O. Drawer DD, Artesia, NM 88211-0719

DISTRICT III
1000 Rio Brazos Rd., Aztec, NM 87410

State of New Mexico
Energy, Minerals and Natural Resources Department

Form C-134
Aug. 1, 1989

OIL CONSERVATION DIVISION

P.O. Box 2088
Santa Fe, New Mexico 87504-2088

OIL CONSERVATION DIVISION
RECEIVED
89 OCT 13 AM 9 12

Permit No. A-020
(For Division Use Only)

APPLICATION FOR EXCEPTION TO DIVISION ORDER R-8952
FOR PROTECTION OF MIGRATORY BIRDS Rule 8(b), Rule 105(b), Rule 312(h), Rule 313, or Rule711(I)

Operator Name: A.L. Dougherty

Operator Address: HCR 31 Roswell, New Mexico 88210

Lease or Facility Name Crosby Salt Lake Location ____ 19 8S 29E
(Ut. Ltr. Sec. Twp. Rge)

Size of pit or tank: Approximately 80 Acres

Operator requests exception from the requirement to screen, net or cover the pit or tank at the above-described facility.

X The pit or tank is not hazardous to migratory waterfowl. Describe completely the reason pit is non-hazardous.

The lake is kept free of oil.

1) If any oil or hydrocarbons should reach this facility give method and time required for removal:

If any oil or hydrocarbons reach the lake,
clean up will begin immediately.

2) If any oil or hydrocarbons reach the above-described facility the operator is required to notify the appropriate District Office of the OCD with 24 hours.

____ Operator proposes the following alternate protective measures: ____

CERTIFICATION BY OPERATOR: I hereby certify that the information given above is true and complete to the best of my knowledge and belief.

Signature A. L. Dougherty Title Operator Date ____

Printed Name A.L. Dougherty Telephone No. (505) 623-2657

FOR OIL CONSERVATION DIVISION USE

Date Facility Inspected 8/22/89

Inspected by mw + IS

Approved by Mike Williams

Title Dist Supervisor

Date 9/20/89

STATE OF NEW MEXICO

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

GARREY CARRUTHERS
GOVERNOR

February 21, 1989

POST OFFICE BOX 2088
STATE LAND OFFICE BUILDING
SANTA FE, NEW MEXICO 87504
(505) 827-5800

CERTIFIED MAIL
RETURN RECEIPT NO. P-106 675 481

Mr. A. L. Daugherty
Clovis Star Route
Roswell, New Mexico 88210

RE: Crosby Salt Lake Disposal Facility
Chaves County, New Mexico

Dear Mr. Daugherty:

Commercial surface waste disposal facilities in New Mexico are now regulated by Oil Conservation Division (OCD) Rule 711 (enclosed). This rule, which became effective June 6, 1988, outlines specific information required by the OCD to permit commercial surface disposal facilities. Although your operations were permitted by the Division through a hearing process, certain information now required by Rule 711 must be supplied by you in order for them to come into compliance with the new rule. Both of your tank facilities (Section 34, Township 8 South, Range 29 East and Section 19, Township 8 South, Range 30 East) that discharge into Crosby Salt Lake will be treated as one facility for permitting and bonding purposes. Both facilities shall be addressed in the below requirements.

The following information must be furnished to the OCD within 120 days of receipt of this letter:

1. Principals

   Supply the names, phone numbers and addresses of all owners and the official contact person for the permitted facility.

2. Description

   Supply descriptions of the facilities including detailed diagrams of all fences, cattleguards, pits, dikes, piping, and tanks. Include in your description the security measures that are in place or will be instituted to prevent any unauthorized disposal at the facilities.

3. Contingency Plan

   Submit a contingency plan for reporting and clean up of any spills, leaks or releases.

4. Maintenance

   Submit a routine inspection and maintenance plan to ensure permit compliance. Include the inspection frequency and maintenance of all berms, pits, tanks, piping, water levels and siphons.

5. Closure Plan

Submit a plan for closure of the facility. The plan should include, but is not limited to the removal of fluids and chemicals, backfilling of pits, disposition of contaminated soils, disposition of buildings,tanks, vessels, equipment or hardware, and general reclamation and restoration of the site to as close to its original condition as practical.

6. Affidavit

Certification by an authorized representative that information submitted is true, accurate, and complete to the best of the applicants knowledge.

Public Notice requirements were fulfilled through the hearing process, so no additional public notice is required.

If you have not already fulfilled the $25,000 bond requirement or the annual status report, you must begin this process immediately.

District personnel in the Artesia District have inspection and enforcement authority within their district to ensure compliance with OCD Rule 711 and permit conditions placed on individual disposal facilities.

If you have questions, please do not hesitate to contact me at (505) 827-5884, or Mr. Mike Williams, Artesia District, at (505) 748-1283.

Sincerely,

Roger C. Anderson

Roger C. Anderson
Environmental Engineer

RCA/sl

Enclosure

cc: OCD Artesia Office
OCD Hobbs Office

CHECKLIST FOR COMPLIANCE WITH RULE 711

Facility Name and Mailing Address: [illegible]

Order No.: R-5464

Location: 24-8S-27E & 19-8S-30E

Contact Person: A.L. DAUGHERTY [illegible]

CHAS. F. MALONE, ATTY. [illegible]

Date of Review:

✓ 1. Plat and topo maps showing location in relation to governmental surveys and roads, watercourses, water wells and dwellings within one mile.

✓ 2. Names and addresses of facility site landowners and landowners of record within one-half mile.

3. Description of facility with a diagram indicating location of fences and cattleguards, and detailed engineering construction/installation diagrams of pits, liners, dikes, piping, sprayers, and tanks.

✓ 4. Plan for disposal of approved waste solids or liquids.

5. Contingency plan for reporting and cleanup of spills or releases.

6. Routine inspection and maintenance plan.

7. Closure plan.

✓ 8. Geohydrological evidence that fresh water will not be affected.

9. a. Proof that owners and occupants within ½ mile were notified.

b. OCD public notice.

10. Affidavit of verification.

11. Bond (required by 12/30/88 for current facilities).

Lab ACCU-LABS
No. 77-521.07-123

17

ORGANIC ANALYSIS REQUEST FORM

REPORT TO: DAVID BOYER
N.M. OIL CONSERVATION DIVISION
P.O. Box 2088
Santa Fe, NM 87504-2088

Sample No. 890331 1255
DATE REC. ______
PRIORITY ______
PHONE(S): 827-5812

COLLECTION CITY: ______; COUNTY: Chaves

COLLECTION DATE/TIME CODE: (Year-Month-Day-Hour-Minute) 8 9 0 3 3 1 1 2 5 5

LOCATION CODE: (Township-Range-Section-Tracts) [illegible] + + (10N06E24342)

SUBMITTER: David Boyer

SAMPLE TYPE: WATER [X], SOIL [ ], FOOD [ ], OTHER: ______

This form accompanies 2 Septum Vials, ____ Glass Jugs, and/or ____

Samples were preserved as follows:

- [ ] NP: No Preservation; Sample stored at room temperature.
- [X] P-Ice Sample stored in an ice bath (Not Frozen).
- [ ] P-AA Sample Preserved with Ascorbic Acid to remove chlorine residual.
- [X] P-HCl Sample Preserved with Hydrochloric Acid (2 drops/40 ml)

ANALYSES REQUESTED: Please check the appropriate box(es) below to indicate the type of analytical screens required. Whenever possible list specific compounds suspected or required.

PURGEABLE SCREENS

- [ ] (753) Aliphatic Headspace (1-5 Carbons)
- [X] (754) Aromatic & Halogenated Purgeables
- [ ] (765) Mass Spectrometer Purgeables
- [ ] (766) Trihalomethanes
- [ ] (774) SDWA VOC's I (8 Regulated +)
- [ ] (775) SDWA VOC's II (EDB & DBCP)

Other Specific Compounds or Classes

- [ ] ______
- [ ] ______

EXTRACTABLE SCREENS

- [ ] (751) Aliphatic Hydrocarbons
- [ ] (755) Base/Neutral Extractables
- [ ] (758) Herbicides, Chlorophenoxy acid
- [ ] (759) Herbicides, Triazines
- [ ] (760) Organochlorine Pesticides
- [ ] (761) Organophosphate Pesticides
- [ ] (767) Polychlorinated Biphenyls (PCB's)
- [ ] (764) Polynuclear Aromatic Hydrocarbons
- [ ] (762) SDWA Pesticides & Herbicides

Remarks: ______

FIELD DATA: ~50,000

pH= ____; Conductivity= ____ umho/cm at ____ °C; Chlorine Residual= ____ mg/l

Dissolved Oxygen= ____ mg/l; Alkalinity= ____ mg/l; Flow Rate ____ ____/____

Depth to water ____ ft.; Depth of well ____ ft.; Perforation Interval ____-____ ft.; Casing: ______

Sampling Location, Methods and Remarks (i.e. odors, etc.)
Broke Tank (Crosby Salt) Lake - Sample from ~~West~~ S.E. side of dike at North end of lake.

I certify that the results in this block accurately reflect the results of my field analyses, observations and activities.(signature collector): David A Boyer Method of Shipment to the Lab: Freight Express

CHAIN OF CUSTODY

I certify that this sample was transferred from DB to Dm
at (location) ALR on 4/5/89 - 12:25 and that
the statements in this block are correct. Evidentiary Seals: Not Sealed [ ] OR Seals Intact: Yes [ ] No [ ]
Signatures [signature]

For OCD use: Date owner notified: 6/19/89 Phone or Letter? Initials [illegible]

Accu-Labs Research, Inc.

RECEIVED

MAY 17 1989

OIL CONSERVATION DIV.
SANTA FE

Mr. David Boyer
NM Oil Conservation Division

RE: 9649-29859-20
Date Samples Rec'd: 4-5-89
P.O. No. 77-521.07-123

REPORT OF ANALYSIS

ALR Designation	9649-29859-20-16	9649-29859-20-17	9649-29859-20-18
Sponsor Designation	8903301440	8903311255	8904032115
	3-30-89	3-31-89	Trip Blank 4-3-89
GC/MS VOLATILE ORGANICS, µg/L:			
Chloromethane	<10	<10	<10
Bromomethane	<10	<10	<10
Vinyl chloride	<10	<10	<10
Chloroethane	<10	<10	<10
Methylene chloride	<5	<5	<5
1,1-Dichloroethene	<5	<5	<5
1,1-Dichloroethane	<5	<5	<5
Total 1,2-Dichloroethene	<5	<5	<5
Chloroform	<5	<5	<5
1,2-Dichloroethane	<5	<5	<5
1,1,1-Trichloroethane	<5	<5	<5
Carbon tetrachloride	<5	<5	<5
Bromodichloromethane	<5	<5	<5
1,2-Dichloropropane	<5	<5	<5
c-1,3-Dichloropropene	<5	<5	<5
Trichloroethene	<5	<5	<5
Benzene	<5	<5	<5
Dibromochloromethane	<5	<5	<5
1,1,2-Trichloroethane	<5	<5	<5
t-1,3-Dichloropropene	<5	<5	<5
2-Chloroethylvinyl ether	<5	<5	<5
Bromoform	<5	<5	<5
1,1,2,2-Tetrachloroethane	<5	<5	<5
Tetrachloroethene	<5	<5	<5

Accu-Labs Research, Inc.

Mr. David Boyer
NM Oil Conservation Division

RE: 9649-29859-20
Date Samples Rec'd: 4-5-89
P.O. No. 77-521.07-123

REPORT OF ANALYSIS

ALR Designation	9649-29859-20-16	9649-29859-20-17	9649-29859-20-18
Sponsor Designation	8903301440	8903311255	8904032115
	3-30-89	3-31-89	Trip Blank
			4-3-89
Determination: µg/L			
Toluene	<5	<5	<5
Chlorobenzene	<5	<5	<5
Ethyl benzene	<5	<5	<5
Total Dichlorobenzenes	<5	<5	<5
Total Xylenes	<5	<5	<5

754 WPW

SCIENTIFIC LABORATORY DIVISION
ORGANIC ANALYSIS REQUEST FORM
Organic Section - Phone: 841-2570

89-38C

REPORT TO: DAVID BOYER
N.M. OIL CONSERVATION DIVISION
P.O. Box 2088
Santa Fe, NM 87504-2088

S.L.D. No. OR-
DATE REC. 1-19-89
PRIORITY 3
PHONE(S): 827-5812

COLLECTION CITY: Roswell-NE of Ci-1 ; COUNTY: Chaves

COLLECTION DATE/TIME CODE: (Year-Month-Day-Hour-Minute) 8 9 0 1 1 2 1 1 1 1 5

LOCATION CODE: (Township-Range-Section-Tracts) 0 8 S + 3 0 E + 1 9 + 1 3 3 (10N06E24342)

USER CODE: 8 2 2 3 5 SUBMITTER: David Boyer CODE: 2 6 0

SAMPLE TYPE: WATER [X], SOIL [ ], FOOD [ ], OTHER:

This form accompanies 2 Septum Vials, _____ Glass Jugs, and/or _____

Samples were preserved as follows:

- [ ] NP: No Preservation; Sample stored at room temperature.
- [X] P-Ice Sample stored in an ice bath (Not Frozen).
- [ ] P-AA Sample Preserved with Ascorbic Acid to remove chlorine residual.
- [X] P-HCl Sample Preserved with Hydrochloric Acid (2 drops/40 ml)

RECEIVED
APR 27 1989
OIL CONSERVATION DIV.
SANTA FE

ANALYSES REQUESTED: Please check the appropriate box(es) below to indicate the type of analysis required. Whenever possible list specific compounds suspected or required.

PURGEABLE SCREENS

- [ ] (753) Aliphatic Headspace (1-5 Carbons)
- [X] (754) Aromatic & Halogenated Purgeables
- [ ] (765) Mass Spectrometer Purgeables
- [ ] (766) Trihalomethanes
- [ ] (774) SDWA VOC's I (8 Regulated +)
- [ ] (775) SDWA VOC's II (EDB & DBCP)

Other Specific Compounds or Classes

- [ ] _____
- [ ] _____

EXTRACTABLE SCREENS

- [ ] (751) Aliphatic Hydrocarbons
- [ ] (755) Base/Neutral Extractables
- [ ] (758) Herbicides, Chlorophenoxy acid
- [ ] (759) Herbicides, Triazines
- [ ] (760) Organochlorine Pesticides
- [ ] (761) Organophosphate Pesticides
- [ ] (767) Polychlorinated Biphenyls (PCB's)
- [ ] (764) Polynuclear Aromatic Hydrocarbons
- [ ] (762) SDWA Pesticides & Herbicides

Remarks: Halogenated 10ppm or Lost if possible

FIELD DATA:

pH= 6 ; Conductivity= 44,000 umho/cm at 5.8 °C; Chlorine Residual=_____mg/l

Dissolved Oxygen=_____mg/l; Alkalinity=_____mg/l; Flow Rate_____ ____/____

Depth to water _____ft.; Depth of well_____ft.; Perforation Interval _____-_____ft.; Casing:_____

Sampling Location, Methods and Remarks (i.e. odors, etc.)

Sample from Crocket Salt Lake (Brake Tank Lake), at end of peninsula, N end of Lake

I certify that the results in this block accurately reflect the results of my field analyses, observations and activities.(signature collector): David A Kough Method of Shipment to the Lab: State Car

CHAIN OF CUSTODY

I certify that this sample was transferred from _____ to _____

at (location) _____ on ____/____/____ - ____:____ and that

the statements in this block are correct. Evidentiary Seals: Not Sealed [ ] OR Seals Intact: Yes [ ] No [ ]

Signatures _____ _____

For OCD use: Date owner notified:_____ Phone or Letter? Initials_____

ANALYSES PERFORMED

LAB. No.: OR-

THIS PAGE FOR LABORATORY RESULTS ONLY

This sample was tested using the analytical screening method(s) checked below:

PURGEABLE SCREENS

- ☐ (753) Aliphatic Headspace (1-5 Carbons)
- ☐ (754) Aromatic & Halogenated Purgeables
- ☐ (765) Mass Spectrometer Purgeables
- ☐ (766) Trihalomethanes
- ☐ (774) SDWA VOC's I (8 Regulated +)
- ☐ (775) SDWA VOC's II (EDB & DBCP)

Other Specific Compounds or Classes

- ☐ _____
- ☐ _____

EXTRACTABLE SCREENS

- ☐ (751) Aliphatic Hydrocarbons
- ☐ (755) Base/Neutral Extractables
- ☐ (758) Herbicides, Chlorophenoxy acid
- ☐ (759) Herbicides, Triazines
- ☐ (760) Organochlorine Pesticides
- ☐ (761) Organophosphate Pesticides
- ☐ (767) Polychlorinated Biphenyls (PCB's)
- ☐ (764) Polynuclear Aromatic Hydrocarbons
- ☐ (762) SDWA Pesticides & Herbicides

ANALYTICAL RESULTS

COMPOUND(S) DETECTED	CONC. [PPB]	COMPOUND(S) DETECTED	CONC. [PPB]
* DETECTION LIMIT * *		+ DETECTION LIMIT + +	

ABBREVIATIONS USED:

N D = NONE DETECTED AT OR ABOVE THE STATED DETECTION LIMIT

T R = DETECTED AT A LEVEL BELOW THE STATED DETECTION LIMIT (NOT CONFIRMED)

[RESULTS IN BRACKETS] ARE UNCONFIRMED AND/OR WITH APPROXIMATE QUANTITATION

LABORATORY REMARKS: _____

CERTIFICATE OF ANALYTICAL PERSONNEL

Seal(s) Not Sealed ☐ Intact: Yes ☐ No ☐. Seal(s) broken by: _____ date: _____

I certify that I followed standard laboratory procedures on handling and analysis of this sample unless otherwise noted and that the statements on this page accurately reflect the analytical results for this sample.

Date(s) of analysis: _____. Analyst's signature: _____

I certify that I have reviewed and concur with the analytical results for this sample and with the statements in this block.

Reviewers signature: _____

STATE OF NEW MEXICO HEALTH AND ENVIRONMENT DEPARTMENT
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud, NE
Albuquerque, NM 87106 [505]-841-2500
ORGANIC CHEMISTRY SECTION [505]-841-2570

February 1, 1989

ANALYTICAL REPORT
SLD Accession No. OR-89-0038

Distribution
(■) Submitter
(※) SLD Files

To: NM Oil Consv. Div.
State Land Office Bldg.
P. O. Box 2088
Santa Fe, NM 87504-2088

From: Organic Chemistry Section
Scientific Laboratory Div.
700 Camino de Salud, NE
Albuquerque, NM 87106

Re: **A purgeable water sample submitted to this laboratory on January 19, 1989**

User:
OIL CONSERVATION DIV
State Land Office Bldg.
P. O. Box 2088
Santa Fe, NM 87504-2088

DEMOGRAPHIC DATA

COLLECTION		*LOCATION*	
On: 12-Jan-89	*By:* Boy . . .	*Township:* 08S	*Section:* 19
At: 11:15 hrs.	*In/Near:* Roswell	*Range:* 30E	*Tract:* 133

ANALYTICAL RESULTS: Aromatic & Halogenated Purgeable Screen

Parameter	Value	Note	MDL	Units
Aromatic Purgeables (6)	0.00	N	12.50	ppb
Halogenated Purgeables (33)	0.00	N	12.50	ppb

Notations & Comments:

MDL = Minimal Detectable Level.

A = Approximate Value; N = None Detected above Detection Limit; P = Compound Present, but not quantified;
T = Trace (<Detection Limit); U = Compound Identity Not Confirmed.

Seals: Not Sealed ☑, Intact: No ☐, Yes ☐ & Broken By: _____ Date: _____

Laboratory Remarks: Crosby Salt Lake- North End

Analyst: Gary C. Eden — 1/23/89 — **Reviewed By:** R Meyerhein

Gary C. Eden
Analyst, Organic Chemistry

Analysis Date

Richard F. Meyerhein 02/01/89
Supervisor, Organic Chemistry Section

859
WNW

New Mexico Health and Environment Department
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud NE
Albuquerque, NM 87106 — (505) 841-2555

GENERAL WATER CHEMISTRY and NITROGEN ANALYSIS

DATE RECEIVED 1/19/89	LAB NO. WC-93	USER CODE ☐ 59300 ☐ 59600 ☒ OTHER: 82235	
Collection DATE 89/01/12	SITE INFORM-ATION	Sample location Crosby Salt Lake (Brine Tank)	
Collection TIME 1115		Collection site description N side of lake at end of peninsula	
Collected by — Person/Agency Boyer/Anderson/OCD			

SEND FINAL REPORT TO ▶
ENVIRONMENTAL BUREAU
NM OIL CONSERVATION DIVISION
State Land Office Bldg., P.O. Box 2088
Santa Fe, NM 87504-2088
Attn: David Boyer
Phone: 827-5812

RECEIVED
MAR - 1 1989
OIL CONSERVATION DIVISION
SANTA FE

Station/well code 085-30E-19.133
Owner

SAMPLING CONDITIONS

☐ Bailed ☒ Dipped ☐ Pump ☐ Tap	Water level	Discharge	Sample type brine
pH (00400) 6	Conductivity (Uncorrected) 44,000 µmho	Water Temp. (00010) 5.8 °C	Conductivity at 25°C (00094) µmho

Field comments

SAMPLE FIELD TREATMENT — *Check proper boxes*

No. of samples submitted 1

☒ NF: Whole sample (Non-filtered) ☐ F: Filtered in field with 0.45 µmembrane filter ☐ A: 2 ml H_2SO_4/L added

☒ NA: No acid added ☐ Other-*specify:* ☐ A: 5ml conc. HNO_3 added ☐ A: 4ml fuming HNO_3 added

ANALYTICAL RESULTS from SAMPLES

NA		Units	Date analyzed
☒ Conductivity (Corrected) 25°C (00095)	122430	µmho	1/27
☐ Total non-filterable residue (suspended) (00530)		mg/l	
☒ Other: Lab pH	5.45		1/23
☐ Other:			
☐ Other:			

A-H_2SO_4			
☐ Nitrate-N⁺, Nitrate-N total (00630)		mg/l	
☐ Ammonia-N total (00610)		mg/l	
☐ Total Kjeldahl-N ( )		mg/l	
☐ Chemical oxygen demand (00340)		mg/l	
☐ Total organic carbon ( )		mg/l	
☐ Other:			
☐ Other:			

From NF, NA Sample:

			Date Analyzed
☒ Calcium	62,650	mg/l	1/26/89
☒ Potassium	13710	mg/l	1/24
☒ Magnesium	21,100	mg/l	1/26/89
☒ Sodium	33000	mg/l	1/24
☒ Bicarbonate	359	mg/l	1/23
☒ Chloride	261,200	mg/l	2/2
☒ Sulfate	21[illegible]	mg/l	2/16
☒ Total Solids	>10⁵	mg/l	2/9
☒ Br	206	mg/l	2/07
☒ CO_3	0		1/23
☒ Cation/Anion Balance			

Analyst	Date Reported	Reviewed by
	2/20/89	

Laboratory remarks

2c1205

FOR OCD USE -- Date Owner Notified _____ Phone or Letter? _____ Initals _____

CATIONS			DET.	ANIONS			DET.
ANALYTE	MEQ.	PPM	LIMIT	ANALYTE	MEQ.	PPM	LIMIT
Ca	3126.25	62650.00	<3.0	HC03	5.88	359.00	<1.0
Mg	1733.06	21100.00	<0.3	SO4	4.38	210.00	<10.0
Na	1435.41	33000.00	<10.0	CL	7368.12	##########	<5.0
K	350.64	13710.00	<0.3			>200,000	
Mn	0.00	0.00		NO3	0.00	0.00	< 0.
Fe	0.00	0.00		C03	0.00	0.00	< 1.
				NH3	0.00	0.00	< 0.
				PO4	0.00	0.00	< 0.
SUMS	6645.35	130460.00			7378.38	#########	

Total Dissolved Solids= >100000
Ion Balance = 90.07%

WC No. = 890093
Date out/By Dan 2/23/89

New Mexico Health and Environment Department
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud NE
Albuquerque, NM 87106

HEAVY METAL ANALYSIS FORM

Telephone: (505)841-2553

Date Received	1/19/89	Lab No.	FCP-15	User Code	☒ 82235 ☐ Other:

COLLECTION DATE & TIME: yy 89 | mm 01 | dd 12 | hh 11 | mm 15

COLLECTED BY: Boyer/Anderson

COLLECTION SITE DESCRIPTION: Crosby Salt Lake (Brook Trout Lake)

TO:

OWNER:

ENVIRONMENTAL BUREAU
NM OIL CONSERVATION DIVISION
State Land Office Bldg., PO Box 2088
SANTA FE, NM 87504-2088

ATTN: L. Boyer
TELEPHONE: 827-5812

SITE LOCATION:
County: Chaves

Township, Range, Section, Tract: (10N06E24342)
10S+30E+19+1313

STATION/ WELL CODE:

LATITUDE, LONGITUDE: -

SAMPLING CONDITIONS:

☐ Bailed ☒ Dipped ☐ Pump ☐ Tap	Water Level:	Discharge:	Sample Type: Grab
pH(00400): 6	Conductivity(Uncorr.): 44,000 µmho	Water Temp.(00010): 5.8 °C	Conductivity at 25°C (00094): µmho

FIELD COMMENTS: Sample from Peninsula, N. Side

SAMPLE FIELD TREATMENT Check proper boxes:		LAB ANALYSIS REQUESTED:
☒ WPN: Water Preserved w/HNO_3 Non-Filtered	☐ WPF: Water Preserved w/HNO_3 Filtered	☒ ICAP Scan Mark box next to metal if AA is required.

ANALYTICAL RESULTS (MG/L)

ELEMENT	ICAP VALUE		AA VALUE	ELEMENT	ICAP VALUE		AA VALUE
Aluminum	<1.0			Silicon	<1.0		
Barium	<1.0			Silver	<1.0	☐	
Beryllium	<1.0			Strontium	1280.		
Boron	210.			Tin	8.2		
Cadmium	<1.0	☐		Vanadium	<1.0		
Calcium	49100.			Zinc	<1.0		
Chromium	<1.0	☐		Arsenic		☒	<0.5
Cobalt	<0.5			Selenium		☒	<0.5
Copper	<1.0			Mercury		☒	<0.002
Iron	<1.0					☐	
Lead	<1.0	☐				☐	
Magnesium	17500.					☐	
Manganese	2.3					☐	
Molybdenum	<1.0					☐	
Nickel	<1.0					☐	

LAB COMMENTS: DIGEST

For OCD Use:
Date Owner Notified:
Phone or Letter?
Initials:

ICAP Analyst JAA
Date Analyzed 2/27/89

Reviewer John R. Boyer
Date Reveived 3/13/89

CROSBY Salt Lake

Accu-Labs Research, Inc.

11485 W. 48th Avenue Wheat Ridge, Colorado 80033 (303) 423-2766

February 7, 1989

Mr. David Boyer
NM Oil Conservation Division
State Land Office Bldg.
P.O. Box 2088
Santa Fe, NM 87504-2088

RE: 9649-29142-3
Date Samples Rec'd: 1-20-89
P.O. No. 77-521.07-123

REPORT OF ANALYSIS

ALR Designation	9649-29142-3-1	9649-29142-3-2	9649-29142-3-3
Sponsor Designation	8901121115	8901121645	8901131205
	1-12-89	1-12-89	1-13-89
Determination: mg/L			
Aluminum, total	<1.0*	<1.0*	<1.0*
Barium, total	3.0	10	0.6
Boron, total	190	38	8.2
Cadmium, total	<0.05*	<0.05*	<0.05*
Calcium, total	64,000	--	8900
Chromium, total	<0.05*	<0.05*	<0.05*
Iron, total	<0.1*	7.4	210
Lead, total	<0.5*	<0.5*	<0.5*
Magnesium, total	21,000	--	1400
Manganese, total	4.3	3.8	5.2
Mercury, total	0.0072	0.0060	0.0060
Potassium, total	12,000	--	1100
Sodium, total	34,000	--	47,000
Total Alkalinity, (as $CaCO_3$ to pH 4.5)	280	--	170
Carbonate (as CO_3)	<5	--	<5
Bicarbonate (as HCO_3)	340	--	210
pH	5.5	--	7.0
Specific Conductance, µmhos/cm	900,000	--	340,000
Arsenic, total	0.24	0.13	2.4
Selenium, total	<0.25*	<0.25*	--
Total Solids	540,000	--	200,000
Bromide	2000	--	310

CROSBY Salt Lake (Pond)

ENRON - Bitter Lakes

B & E Disposal

Accu-Labs Research, Inc.

Mr. David Boyer
NM Oil Conservation Division

RE: 9649-29142-3
Date Samples Rec'd: 1-20-89
P.O. No. 77-521.07-123

REPORT OF ANALYSIS

ALR Designation	9649-29142-3-1	9649-29142-3-2	9649-29142-3-3
Sponsor Designation	8901121115	8901121645	8901131205
	1-12-89	1-12-89	1-13-89
Determination: mg/L			
Chloride	230,000	--	110,000
Sulfate (as SO_4)	240	--	770
Ion Balance	103	--	85

* Higher detection limit due to sample matrix interference.

These samples are scheduled to be discarded 30 days after the date of this report.

Mary Fabisiak
Mary Fabisiak
Water Laboratory
Supervisor

MF/dh

754
WPW

SCIENTIFIC LABORATORY DIVISION
ORGANIC ANALYSIS REQUEST FORM
Organic Section - Phone: 841-2570

89-43 C

REPORT TO: DAVID BOYER
N.M. OIL CONSERVATION DIVISION
P.O. Box 2088
Santa Fe, NM 87504-2088

S.L.D. No. OR-
DATE REC. 1-19-89
PRIORITY 3
PHONE(S): 827-5812

COLLECTION CITY: Roswell - NE of City ; COUNTY: Chaves

COLLECTION DATE/TIME CODE: (Year-Month-Day-Hour-Minute) |8|9|0|1|1|2|1|1|0|5| (Tank battery)

LOCATION CODE: (Township-Range-Section-Tracts) |0|8|S+2|9|E+2|4+2|_|_| (10N06E24342)

USER CODE: |8|2|2|3|5| SUBMITTER: David Boyer CODE: |2|6|0| (Lodell)

SAMPLE TYPE: WATER [X], SOIL [ ], FOOD [ ], OTHER:

This form accompanies 2 Septum Vials, ____ Glass Jugs, and/or ____

Samples were preserved as follows:

- [ ] NP: No Preservation; Sample stored at room temperature.
- [X] P-Ice Sample stored in an ice bath (Not Frozen).
- [ ] P-AA Sample Preserved with Ascorbic Acid to remove chlorine residual.
- [X] P-HCl Sample Preserved with Hydrochloric Acid (2 drops/40 ml)

RECEIVED
APR 27 1989
OIL CONSERVATION DIV.
SANTA FE

ANALYSES REQUESTED: Please check the appropriate box(es) below to indicate the type of analytical screens required. Whenever possible list specific compounds suspected or required.

PURGEABLE SCREENS

- [ ] (753) Aliphatic Headspace (1-5 Carbons)
- [X] (754) Aromatic & Halogenated Purgeables
- [ ] (765) Mass Spectrometer Purgeables
- [ ] (766) Trihalomethanes
- [ ] (774) SDWA VOC's I (8 Regulated +)
- [ ] (775) SDWA VOC's II (EDB & DBCP)

Other Specific Compounds or Classes

- [ ] _____
- [ ] _____

EXTRACTABLE SCREENS

- [ ] (751) Aliphatic Hydrocarbons
- [ ] (755) Base/Neutral Extractables
- [ ] (758) Herbicides, Chlorophenoxy acid
- [ ] (759) Herbicides, Triazines
- [ ] (760) Organochlorine Pesticides
- [ ] (761) Organophosphate Pesticides
- [ ] (767) Polychlorinated Biphenyls (PCB's)
- [ ] (764) Polynuclear Aromatic Hydrocarbons
- [ ] (762) SDWA Pesticides & Herbicides

Remarks: _____

FIELD DATA: >50,000

pH= 7 ; Conductivity=_____umho/cm at _____°C; Chlorine Residual=_____mg/l

Dissolved Oxygen=_____mg/l; Alkalinity=_____mg/l; Flow Rate_____ ____/____

Depth to water _____ft.; Depth of well_____ft.; Perforation Interval _____-_____ft.; Casing:_____

Sampling Location, Methods and Remarks (i.e. odors, etc.) at Lake North
Sample from discharge pipe from ~~Scott~~ tank battery, Crosby Salt Lake (Brine Tank Lake)

I certify that the results in this block accurately reflect the results of my field analyses, observations and activities.(signature collector): David K Boyer Method of Shipment to the Lab: State Car

CHAIN OF CUSTODY

I certify that this sample was transferred from _____ to _____

at (location) _____ on ____/____/____ - ____:____ and that

the statements in this block are correct. Evidentiary Seals: Not Sealed [ ] OR Seals Intact: Yes [ ] No [ ]

Signatures _____ _____

For OCD use: Date owner notified: 6/19/89 Phone or (Letter)? Initials DJS

ANALYSES PERFORMED

LAB. No.: OR-

THIS PAGE FOR LABORATORY RESULTS ONLY

This sample was tested using the analytical screening method(s) checked below:

PURGEABLE SCREENS

- ☐ (753) Aliphatic Headspace (1-5 Carbons)
- ☐ (754) Aromatic & Halogenated Purgeables
- ☐ (765) Mass Spectrometer Purgeables
- ☐ (766) Trihalomethanes
- ☐ (774) SDWA VOC's I (8 Regulated +)
- ☐ (775) SDWA VOC's II (EDB & DBCP)

Other Specific Compounds or Classes

- ☐ _____
- ☐ _____

EXTRACTABLE SCREENS

- ☐ (751) Aliphatic Hydrocarbons
- ☐ (755) Base/Neutral Extractables
- ☐ (758) Herbicides, Chlorophenoxy acid
- ☐ (759) Herbicides, Triazines
- ☐ (760) Organochlorine Pesticides
- ☐ (761) Organophosphate Pesticides
- ☐ (767) Polychlorinated Biphenyls (PCB's)
- ☐ (764) Polynuclear Aromatic Hydrocarbons
- ☐ (762) SDWA Pesticides & Herbicides

ANALYTICAL RESULTS

COMPOUND(S) DETECTED	CONC. [PPB]	COMPOUND(S) DETECTED	CONC. [PPB]
* DETECTION LIMIT * ✱		+ DETECTION LIMIT + +	

ABBREVIATIONS USED:

N D = NONE DETECTED AT OR ABOVE THE STATED DETECTION LIMIT

T R = DETECTED AT A LEVEL BELOW THE STATED DETECTION LIMIT (NOT CONFIRMED)

[RESULTS IN BRACKETS] ARE UNCONFIRMED AND/OR WITH APPROXIMATE QUANTITATION

LABORATORY REMARKS: _____

CERTIFICATE OF ANALYTICAL PERSONNEL

Seal(s) Not Sealed ☐ Intact: Yes ☐ No ☐. Seal(s) broken by: _____ date: _____

I certify that I followed standard laboratory procedures on handling and analysis of this sample unless otherwise noted and that the statements on this page accurately reflect the analytical results for this sample.

Date(s) of analysis: _____. Analyst's signature: _____

I certify that I have reviewed and concur with the analytical results for this sample and with the statements in this block.

Reviewers signature: _____

STATE OF NEW MEXICO HEALTH AND ENVIRONMENT DEPARTMENT
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud, NE
Albuquerque, NM 87106 [505]-841-2500
ORGANIC CHEMISTRY SECTION [505]-841-2570

February 1, 1989

ANALYTICAL REPORT
SLD Accession No. OR-89-0043

Distribution
(■) Submitter
(▩) SLD Files

To: NM Oil Consv. Div.
State Land Office Bldg.
P. O. Box 2088
Santa Fe, NM 87504-2088

From: Organic Chemistry Section
Scientific Laboratory Div.
700 Camino de Salud, NE
Albuquerque, NM 87106

Re: **A purgeable water sample submitted to this laboratory on January 19, 1989**

User:
OIL CONSERVATION DIV
State Land Office Bldg.
P. O. Box 2088
Santa Fe, NM 87504-2088

DEMOGRAPHIC DATA

COLLECTION		*LOCATION*	
On: 12-Jan-89	*By:* Boy . . .	*Township:* 08S	*Section:* 24
At: 11:05 hrs.	*In/Near:* Roswell	*Range:* 29E	*Tract:* 2

ANALYTICAL RESULTS: Aromatic & Halogenated Purgeable Screen

Parameter	Value	Note	MDL	Units
Halogenated Purgeables (33)	0.00	N	100.00	ppb
Benzene	2450.00		100.00	ppb
Toluene	1700.00		100.00	ppb
Ethylbenzene	220.00		100.00	ppb
p- & m-Xylene	300.00		100.00	ppb
1,2-Dimethylbenzene	0.00	T	100.00	ppb

Notations & Comments:

MDL = Minimal Detectable Level.

A = Approximate Value; N = None Detected above Detection Limit; P = Compound Present, but not quantified; T = Trace (<Detection Limit); U = Compound Identity Not Confirmed.

Seals: Not Sealed ☑; Intact: No ☐, Yes ☐ & Broken By: _____ Date: _____

Laboratory Remarks: Crosby Salt Lake

Analyst: Gary C. Eden — Gary C. Eden, *Analyst, Organic Chemistry*

1/21/89 — Analysis Date

Reviewed By: R. Meyerhein — Richard F. Meyerhein 02/01/89, *Supervisor, Organic Chemistry Section*

New Mexico Health and Environment Department
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud NE
Albuquerque, NM 87106 — (505) 841-2555

859 WNR

RECEIVED
MAR - 1 1989

GENERAL WATER CHEMISTRY and NITROGEN ANALYSIS

DATE RECEIVED 1/19/89	LAB NO. WC-96	USER CODE ☐ 59300 ☐ 59600 ☒ OTHER: 82235	
Collection DATE 89/01/12	SITE INFORM-ATION ►	Sample location Crosby Salt Lake (Broke tank)	
Collection TIME 1105		Collection site description Tank battery at N. side of Lake, discharge hose of Lake side	
Collected by — Person/Agency Boyer, Anderson /OCD			

SEND FINAL REPORT TO ►

ENVIRONMENTAL BUREAU
NM OIL CONSERVATION DIVISION
State Land Office Bldg, PO Box 2088
Santa Fe, NM 87504-2088

Attn: David Boyer

Phone: 827-5812

RECEIVED
MAR - 1 1989
OIL CONSERVATION DIVISION
- SANTA FE

Station/well code 08S-25E-24,2
Owner (Battery Location)

SAMPLING CONDITIONS

☐ Bailed ☐ Dipped ☒ Pump ☐ Tap	Water level	Discharge	Sample type Grab
pH (00400) 7	Conductivity (Uncorrected) > 50,000 µmho	Water Temp. (00010) °C	Conductivity at 25°C (00094) µmho

Field comments

SAMPLE FIELD TREATMENT — *Check proper boxes*

No. of samples submitted 1

☒ NF: Whole sample (Non-filtered) ☐ F: Filtered in field with 0.45 µmembrane filter ☐ A: 2 ml H_2SO_4/L added

☒ NA: No acid added ☐ Other-*specify:* ☐ A: 5ml conc. HNO_3 added ☐ A: 4ml fuming HNO_3 added

ANALYTICAL RESULTS from SAMPLES

NA		Units	Date analyzed
☒ Conductivity (Corrected) 25°C (00095)	121317	µmho	1/27
☐ Total non-filterable residue (suspended) (00530)		mg/l	
☒ Other: Lab pH	6.39		1/23
☐ Other:			
☐ Other:			

A-H_2SO_4			
☐ Nitrate-N + , Nitrate-N total (00630)		mg/l	
☐ Ammonia-N total (00610)		mg/l	
☐ Total Kjeldahl-N ( )		mg/l	
☐ Chemical oxygen demand (00340)		mg/l	
☐ Total organic carbon ( )		mg/l	
☐ Other:			
☐ Other:			

From NF, NA Sample:

			Date Analyzed
☒ Calcium	17,200	mg/l	1/26/89
☒ Potassium	2860	mg/l	1/24
☒ Magnesium	5870	mg/l	1/26/89
☒ Sodium	55350	mg/l	1/24
☒ Bicarbonate	650	mg/l	1/23
☒ Chloride	119000	mg/l	2/2
☒ Sulfate	1512	mg/l	2/2
☒ Total Solids	> 10^5	mg/l	2/9
☒ CO_3	0		1/23
☒ Rg	126	mg/l	2/07
☒ Cation/Anion Balance			

Analyst	Date Reported	Reviewed by
	2/15/89	

Laboratory remarks

136408

FOR OCD USE -- Date Owner Notified _____ Phone or Letter? _____ Initals _____

CATIONS				ANIONS			
ANALYTE	MEQ.	PPM	DET. LIMIT	ANALYTE	MEQ.	PPM	DET. LIMIT
Ca	858.28	17200.00	<3.0	HC03	10.65	650.00	<1.0
Mg	482.14	5870.00	<0.3	SO4	31.50	1512.00	<10.0
Na	2407.57	55350.00	<10.0	CL	3847.67	#########	<5.0
K	73.15	2860.00	<0.3				
Mn	0.00	0.00		NO3	0.00	0.00	< 0.
Fe	0.00	0.00		C03	0.00	0.00	< 1.
				NH3	0.00	0.00	< 0.
				PO4	0.00	0.00	< 0.
SUMS	3821.13	81280.00			3889.83	#########	

Total Dissolved Solids= 100000
Ion Balance = 98.23%

WC No. = 8800096
Date out/By 2/25/89

New Mexico Health and Environment Department
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud NE
Albuquerque, NM 87106

HEAVY METAL ANALYSIS FORM

Telephone: (505)841-2553

Date Received: 1/19/89 | Lab No. ICP-16 | User Code ☒ 82235 ☐ Other:

COLLECTION DATE & TIME: yy 89 mm 01 dd 12 hh 11 mm 05

COLLECTION SITE DESCRIPTION: Tank battery discharge at Crosby Salt Lake

COLLECTED BY: Boyer/Anderson

TO:

ENVIRONMENTAL BUREAU
NM OIL CONSERVATION DIVISION
State Land Office Bldg., PO Box 2088
SANTA FE, NM 87504-2088

ATTN: D. Boyer
TELEPHONE: 827-5812

MAR 1 ... OIL CONSERVATION DIVISION SANTA FE

OWNER:

SITE LOCATION:
County: Chaves

Township, Range, Section, Tract: (10N06E24342)
(Tank Location) 8S 29E 24 2 1

STATION/ WELL CODE:

LATITUDE, LONGITUDE:

SAMPLING CONDITIONS:

☐ Bailed ☐ Pump
☐ Dipped ☒ Tap

Water Level:

Discharge:

Sample Type: Grab

pH(00400): 7

Conductivity (Uncorr.): >50,000 µmho

Water Temp. (00010): °C

Conductivity at 25°C (00094): µmho

FIELD COMMENTS: Sample from hose at Lakeside

SAMPLE FIELD TREATMENT
Check proper boxes:

☒ WPN: Water Preserved w/HNO_3 Non-Filtered

☐ WPF: Water Preserved w/HNO_3 Filtered

LAB ANALYSIS REQUESTED:

☒ ICAP Scan
Mark box next to metal if AA is required.

ANALYTICAL RESULTS (MG/L)

ELEMENT	ICAP VALUE	AA VALUE
Aluminum	<1.0	
Barium	<1.0	
Beryllium	<1.0	
Boron	51.	
Cadmium	<1.0	☐
Calcium	13900.	
Chromium	<1.0	☐
Cobalt	<0.5	
Copper	<1.0	
Iron	9.7	
Lead	<1.0	☐
Magnesium	5210.	
Manganese	1.8	
Molybdenum	<1.0	
Nickel	<1.0	

ELEMENT	ICAP VALUE	AA VALUE
Silicon	2.7	
Silver	<0.1	☐
Strontium	340.	
Tin	4.5	
Vanadium	<0.1	
Zinc	<0.1	
Arsenic		☒ <0.5
Selenium		☒ <0.5
Mercury		☒ <0.0005

LAB COMMENTS: DIGEST

For OCD Use:
Date Owner Notified:
Phone or Letter?
Initials:

ICAP Analyst: JAH
Date Analyzed: 2/27/89

Reviewer: [signature]
Date Reveived: 3/10/89

New Mexico Health and Environment Department
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud NE
Albuquerque, NM 87106 — [illegible]5) 841-2555

859
WNN

GENERAL WATER CHEMISTRY and NITROGEN ANALYSIS

DATE RECEIVED 8. 15 88	LAB NO. WC-3342	USER CODE ☐ 59300 ☐ 59600 ☒ OTHER: 82235	
Collection DATE 8/8/88	SITE INFORMATION ►	Sample location Emergency Pit at Crosby Salt Lake	
Collection TIME 1625		Collection site description Sample from S. Side Center of beach	
Collected by — Person/Agency Boyer /OCD			

SEND FINAL REPORT TO ►

ENVIRONMENTAL BUREAU
NM OIL CONSERVATION DIVISION
State Land Office Bldg, PO Box 2088
Santa Fe, NM 87504-2088

Attn: David Boyer

Phone: 827-5812

Station/well code 08.35E-19.340

Owner

SAMPLING CONDITIONS

☐ Bailed ☒ Dipped ☐ Pump ☐ Tap	Water level	Discharge	Sample type Grab
pH (00400) 7	Conductivity (Uncorrected) 15,000 µmho	Water Temp. (00010) 35 °C	Conductivity at 25°C (00094) µmho

Field comments

SAMPLE FIELD TREATMENT — *Check proper boxes*

No. of samples submitted 1

☒ NF: Whole sample (Non-filtered) ☐ F: Filtered in field with 0.45 µmembrane filter ☐ A: 2 ml H_2SO_4/L added

☒ NA: No acid added ☐ Other-*specify:* ☐ A: 5ml conc. HNO_3 added ☐ A: 4ml fuming HNO_3 added

ANALYTICAL RESULTS from SAMPLES

NA		Units	Date analyzed
☒ Conductivity (Corrected) 25°C (00095)	15801	µmho	8/29
☐ Total non-filterable residue (suspended) (00530)		mg/l	
☒ Other: Lab pH	7.69		9/13
☐ Other:			
☐ Other:			

A-H_2SO_4			
☐ Nitrate-N +, Nitrate-N total (00630)		mg/l	
☐ Ammonia-N total (00610)		mg/l	
☐ Total Kjeldahl-N ( )		mg/l	
☐ Chemical oxygen demand (00340)		mg/l	
☐ Total organic carbon ( )		mg/l	
☐ Other:			
☐ Other:			

From NA, NA Sample:

			Date Analyzed
☒ Calcium	454	mg/l	9/8
☒ Potassium	61	mg/l	9/7
☒ Magnesium	110	mg/l	9/8
☒ Sodium	3125	mg/l	9/7
☒ Bicarbonate	90.5	mg/l	9/13
☒ Chloride	6025	mg/l	8/24
☒ Sulfate	435	mg/l	8/24
☒ Total Solids	10716	mg/l	9/8
☒ CO_3			
☒ Bromide	20.5	mg/l	8/25
☒ Cation/Anion Balance			

Analyst	Date Reported	Reviewed by
	9 27 88	

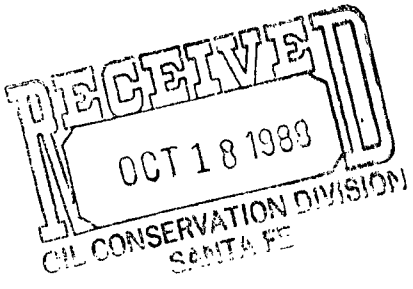
Laboratory remarks

FOR OCD USE -- Date Owner Notified _____ Phone or Letter? _____ Initals _____

CATIONS				ANIONS			
ANALYTE	MEQ.	PPM	DET. LIMIT	ANALYTE	MEQ.	PPM	DET. LIMIT
Ca	22.65	454.00	<3.0	HC03	1.48	90.50	<1.0
Mg	9.03	110.00	<0.3	SO4	9.06	435.00	<10.0
Na	135.93	3125.00	<10.0	CL	169.96	6025.00	<5.0
K	1.56	61.00	<0.3				
Mn	0.00	0.00		NO3	0.00	0.00	< 0.
Fe	0.00	0.00		C03	0.00	0.00	< 1.
				NH3	0.00	0.00	< 0.
				PO4	0.00	0.00	< 0.
SUMS	169.18	3750.00			180.50	6550.50	

Total Dissolved Solids= 10716
Ion Balance = 93.73%

WC No. = 8803342
Date out/By 10/11/89



New Mexico Health and Environment Department
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud NE
Albuquerque, NM 87106

HEAVY METAL ANALYSIS FORM

Telephone: (505)841-2553

Date Received 8/15/88	Lab No. ICP-371	User Code ☒ 82235	☐ Other:

COLLECTION DATE & TIME: yy 88 mm 08 dd 11 hh 16 mm 25

COLLECTED BY: Boyer/OCD

COLLECTION SITE DESCRIPTION: Crazy Salt Lake Emergency Pit

OWNER:

TO:

ENVIRONMENTAL BUREAU
NM OIL CONSERVATION DIVISION
State Land Office Bldg., PO Box 2088
SANTA FE, NM 87504-2088

ATTN: Boyer
TELEPHONE: 827-5812

SITE LOCATION:
County: Chaves

Township, Range, Section, Tract: (10N06E24342)
08S+29E+19+3410

STATION/ WELL CODE:

LATITUDE, LONGITUDE:

SAMPLING CONDITIONS:

	Water Level:	Discharge:	Sample Type:
☐ Bailed ☐ Pump ☒ Dipped ☐ Tap			Grab

pH(00400)	Conductivity (Uncorr.)	Water Temp. (00010)	Conductivity at 25°C (00094)
7	15,000 µmho	32 °C	µmho

FIELD COMMENTS: Sample from Center of bank, south side

SAMPLE FIELD TREATMENT — Check proper boxes:		LAB ANALYSIS REQUESTED:
☒ WPN: Water Preserved w/HNO_3 Non-Filtered	☐ WPF: Water Preserved w/HNO_3 Filtered	☒ ICAP Scan. Mark box next to metal if AA is required.

ANALYTICAL RESULTS (MG/L)

ELEMENT	ICAP VALUE	AA VALUE	ELEMENT	ICAP VALUE	AA VALUE
Aluminum	0.1		Silicon	4.4	
Barium	0.3		Silver	<0.1	☐
Beryllium	<0.1		Strontium	6.0	
Boron	1.5		Tin	<0.1	
Cadmium	<0.1	☐	Vanadium	<0.1	
Calcium	490.		Zinc	<0.1	
Chromium	<0.1	☐	Arsenic		☒ <0.05
Cobalt	<0.05		Selenium		☒ 0.007
Copper	0.3		Mercury		☒ <0.0005
Iron	0.1				☐
Lead	<0.1	☐			☐
Magnesium	110.				☐
Manganese	0.57				☐
Molybdenum	<0.1				☐
Nickel	<0.1				☐

LAB COMMENTS: DIGEST

For OCD Use: Date Owner Notified:	ICAP Analyst	Reviewer Jim Ashley
Phone or Letter?		
Initials:	Date Analyzed	Date Reviewed 12/29/88

SCIENTIFIC LABORATORY DIVISION
ORGANIC ANALYSIS REQUEST FORM
Organic Section - Phone: 841-2570

754 wpw

88-1333-C

REPORT TO: DAVID BOYER
N.M. OIL CONSERVATION DIVISION
P.O. Box 2088
Santa Fe, NM 87504-2088

S.L.D. No. OR- 1333 A+B
DATE REC. 8-15-88
PRIORITY 3
PHONE(S): 827-5812

COLLECTION CITY: Roswell ; COUNTY: Chaves

COLLECTION DATE/TIME CODE: (Year-Month-Day-Hour-Minute) 8 8 0 8 1 1 1 6 2 5

LOCATION CODE: (Township-Range-Section-Tracts) 0 8 S + 2 9 E + 1 9 3 4 0 (10N06E24342)

USER CODE: 8 2 2 3 5 SUBMITTER: David Boyer CODE: 2 6 0

SAMPLE TYPE: WATER [X], SOIL [ ], FOOD [ ], OTHER: _____

This form accompanies 2 Septum Vials, _____ Glass Jugs, and/or _____ _____

Samples were preserved as follows:

- [ ] NP: No Preservation; Sample stored at room temperature.
- [X] P-Ice Sample stored in an ice bath (Not Frozen).
- [ ] P-AA Sample Preserved with Ascorbic Acid to remove chlorine residual.
- [X] P-HCl Sample Preserved with Hydrochloric Acid (2 drops/40 ml)

RECEIVED NOV 11 1988 OIL CONSERVATION DIVISION

ANALYSES REQUESTED: Please check the appropriate box(es) below to indicate the type of analytical screens required. Whenever possible list specific compounds suspected or required.

PURGEABLE SCREENS

- [ ] (753) Aliphatic Headspace (1-5 Carbons)
- [X] (754) Aromatic & Halogenated Purgeables
- [ ] (765) Mass Spectrometer Purgeables
- [ ] (766) Trihalomethanes
- [ ] (774) SDWA VOC's I (8 Regulated +)
- [ ] (775) SDWA VOC's II (EDB & DBCP)

Other Specific Compounds or Classes

- [ ] _____
- [ ] _____

EXTRACTABLE SCREENS

- [ ] (751) Aliphatic Hydrocarbons
- [ ] (755) Base/Neutral Extractables
- [ ] (758) Herbicides, Chlorophenoxy acid
- [ ] (759) Herbicides, Triazines
- [ ] (760) Organochlorine Pesticides
- [ ] (761) Organophosphate Pesticides
- [ ] (767) Polychlorinated Biphenyls (PCB's)
- [ ] (764) Polynuclear Aromatic Hydrocarbons
- [ ] (762) SDWA Pesticides & Herbicides

Remarks: (NOTE: White Labed Facility - ARCO)

FIELD DATA:

pH= 7 ; Conductivity= 15,000 umho/cm at 32 °C; Chlorine Residual= _____ mg/l

Dissolved Oxygen= _____ mg/l; Alkalinity= _____ mg/l; Flow Rate _____ _____/_____

Depth to water _____ ft.; Depth of well _____ ft.; Perforation Interval _____ - _____ ft.; Casing: _____

Sampling Location, Methods and Remarks (i.e. odors, etc.)

Crosby Salt Lake Emerg. Pit. Oil Sheen & Bubbles
Sample from S. Side, Center of bank

I certify that the results in this block accurately reflect the results of my field analyses, observations and activities.(signature collector): D. Boyer Method of Shipment to the Lab: State Car

CHAIN OF CUSTODY

I certify that this sample was transferred from _____ to _____

at (location) _____ on ____/____/____ - ____:____ and that

the statements in this block are correct. Evidentiary Seals: Not Sealed [ ] OR Seals Intact: Yes [ ] No [ ]

Signatures' _____ _____

For OCD use: Date owner notified: 6/19/89 Phone or Letter? Initials MB

ANALYSES PERFORMED

LAB. No.: OR- 1333

THIS PAGE FOR LABORATORY RESULTS ONLY

This sample was tested using the analytical screening method(s) checked below:

PURGEABLE SCREENS

- ☐ (753) Aliphatic Headspace (1-5 Carbons)
- ☒ (754) Aromatic & Halogenated Purgeables
- ☐ (765) Mass Spectrometer Purgeables
- ☐ (766) Trihalomethanes
- ☐ (774) SDWA VOC's I (8 Regulated +)
- ☐ (775) SDWA VOC's II (EDB & DBCP)

Other Specific Compounds or Classes

- ☐ _____
- ☐ _____

EXTRACTABLE SCREENS

- ☐ (751) Aliphatic Hydrocarbons
- ☐ (755) Base/Neutral Extractables
- ☐ (758) Herbicides, Chlorophenoxy acid
- ☐ (759) Herbicides, Triazines
- ☐ (760) Organochlorine Pesticides
- ☐ (761) Organophosphate Pesticides
- ☐ (767) Polychlorinated Biphenyls (PCB's)
- ☐ (764) Polynuclear Aromatic Hydrocarbons
- ☐ (762) SDWA Pesticides & Herbicides

ANALYTICAL RESULTS

COMPOUND(S) DETECTED	CONC. [PPB]	COMPOUND(S) DETECTED	CONC. [PPB]
aromatic purgeables	~~see remarks~~		
benzene	T.R.		
toluene	T.R.		
ethylbenzene	T.R.		
p + m-xylene	T.R.		
o-xylene	T.R.		
halogenated purgeables	N.D.		
	25 ~~50~~ 10/L		
* DETECTION LIMIT * ✱		+ DETECTION LIMIT + +	

ABBREVIATIONS USED:

N D = NONE DETECTED AT OR ABOVE THE STATED DETECTION LIMIT
T R = DETECTED AT A LEVEL BELOW THE STATED DETECTION LIMIT (NOT CONFIRMED)
[RESULTS IN BRACKETS] ARE UNCONFIRMED AND/OR WITH APPROXIMATE QUANTITATION

LABORATORY REMARKS: ~~Twenty five compounds ranging from light unsaturated compounds in the BTX region through the C3 substituted benzene region at ppb to ppm levels detected by the photoionization detector but not identified.~~

CERTIFICATE OF ANALYTICAL PERSONNEL

Seal(s) Not Sealed ☐ Intact: Yes ☐ No ☑ Seal(s) broken by: not sealed date: _____

I certify that I followed standard laboratory procedures on handling and analysis of this sample unless otherwise noted and that the statements on this page accurately reflect the analytical results for this sample.

Date(s) of analysis: 6/19/88. Analyst's signature: Nancy C. Eber

I certify that I have reviewed and concur with the analytical results for this sample and with the statements in this block.

Reviewers signature: R Meyerhein

ANALYSES PERFORMED

LAB. No.: OR- 1337

THIS PAGE FOR LABORATORY RESULTS ONLY

This sample was tested using the analytical screening method(s) checked below:

PURGEABLE SCREENS

- ☐ (753) Aliphatic Headspace (1-5 Carbons)
- ☒ (754) Aromatic & Halogenated Purgeables
- ☐ (765) Mass Spectrometer Purgeables
- ☐ (766) Trihalomethanes
- ☐ (774) SDWA VOC's I (8 Regulated +)
- ☐ (775) SDWA VOC's II (EDB & DBCP)

Other Specific Compounds or Classes

- ☐ _____
- ☐ _____

EXTRACTABLE SCREENS

- ☐ (751) Aliphatic Hydrocarbons
- ☐ (755) Base/Neutral Extractables
- ☐ (758) Herbicides, Chlorophenoxy acid
- ☐ (759) Herbicides, Triazines
- ☐ (760) Organochlorine Pesticides
- ☐ (761) Organophosphate Pesticides
- ☐ (767) Polychlorinated Biphenyls (PCB's)
- ☐ (764) Polynuclear Aromatic Hydrocarbons
- ☐ (762) SDWA Pesticides & Herbicides

ANALYTICAL RESULTS

COMPOUND(S) DETECTED	CONC. [PPB]	COMPOUND(S) DETECTED	CONC. [PPB]
aromatic purgeables			
benzene	1200		
toluene	566		
ethylbenzene	TR		
p+m-xylene	TR		
o-xylene	TR		
halogenated purgeables	N.D.		
* DETECTION LIMIT * ✱	10 PPB	+ DETECTION LIMIT + +	

ABBREVIATIONS USED:

N D = NONE DETECTED AT OR ABOVE THE STATED DETECTION LIMIT

T R = DETECTED AT A LEVEL BELOW THE STATED DETECTION LIMIT (NOT CONFIRMED)

[RESULTS IN BRACKETS] ARE UNCONFIRMED AND/OR WITH APPROXIMATE QUANTITATION

LABORATORY REMARKS: _____

CERTIFICATE OF ANALYTICAL PERSONNEL

Seal(s) Not Sealed ☐ Intact: Yes ☐ No ☑ Seal(s) broken by: not sealed date: _____

I certify that I followed standard laboratory procedures on handling and analysis of this sample unless otherwise noted and that the statements on this page accurately reflect the analytical results for this sample.

Date(s) of analysis: 8/19/88. Analyst's signature: Mary C. Eden

I certify that I have reviewed and concur with the analytical results for this sample and with the statements in this block.

Reviewers signature: K Meyerhein

SCIENTIFIC LABORATORY DIVISION
ORGANIC ANALYSIS REQUEST FORM
Organic Section - Phone: 841-2570

754 WP4 88-1337-C

REPORT TO: DAVID BOYER
N.M. OIL CONSERVATION DIVISION
P.O. Box 2088
Santa Fe, NM 87504-2088

S.L.D. No. OR- 1337 A&B
DATE REC. 8-15-88
PRIORITY 3
PHONE(S): 827-5812

COLLECTION CITY: _____; COUNTY: _____

COLLECTION DATE/TIME CODE: (Year-Month-Day-Hour-Minute) 8 8 0 8 1 1 1 6 1 0

LOCATION CODE: (Township-Range-Section-Tracts) 0 2 5 + 2 8 E + 1 2 + 3 A 1 0 (10N06E24342)

USER CODE: 8 2 2 3 5 SUBMITTER: David Boyer CODE: 2 6 0

SAMPLE TYPE: WATER [X], SOIL [ ], FOOD [ ], OTHER: _____

This form accompanies 2 Septum Vials, ____ Glass Jugs, and/or ____ _____
Samples were preserved as follows:

- [ ] NP: No Preservation; Sample stored at room temperature.
- [X] P-Ice Sample stored in an ice bath (Not Frozen).
- [ ] P-AA Sample Preserved with Ascorbic Acid to remove chlorine residual.
- [X] P-HCl Sample Preserved with Hydrochloric Acid (2 drops/40 ml)

RECEIVED
NOV 11 1988
OIL CONSERVATION DIVISION
SANTA FE

ANALYSES REQUESTED: Please check the appropriate box(es) below to indicate the type of analytical screens required. Whenever possible list specific compounds suspected or required.

PURGEABLE SCREENS

- [ ] (753) Aliphatic Headspace (1-5 Carbons)
- [X] (754) Aromatic & Halogenated Purgeables
- [ ] (765) Mass Spectrometer Purgeables
- [ ] (766) Trihalomethanes
- [ ] (774) SDWA VOC's I (8 Regulated +)
- [ ] (775) SDWA VOC's II (EDB & DBCP)

Other Specific Compounds or Classes

- [ ] _____
- [ ] _____

EXTRACTABLE SCREENS

- [ ] (751) Aliphatic Hydrocarbons
- [ ] (755) Base/Neutral Extractables
- [ ] (758) Herbicides, Chlorophenoxy acid
- [ ] (759) Herbicides, Triazines
- [ ] (760) Organochlorine Pesticides
- [ ] (761) Organophosphate Pesticides
- [ ] (767) Polychlorinated Biphenyls (PCB's)
- [ ] (764) Polynuclear Aromatic Hydrocarbons
- [ ] (762) SDWA Pesticides & Herbicides

Remarks: (Note: Wild Lakes Facility - AMR)

FIELD DATA: > 50,000

pH= 7; Conductivity=_____umho/cm at _____°C; Chlorine Residual=_____mg/l

Dissolved Oxygen=_____mg/l; Alkalinity=_____mg/l; Flow Rate_____ ____/____

Depth to water _____ft.; Depth of well_____ft.; Perforation Interval _____-_____ft.; Casing:_____

Sampling Location, Methods and Remarks (i.e. odors, etc.)
Crosby Salt Lakes, Sample from NW Tank at collection site for produced water

I certify that the results in this block accurately reflect the results of my field analyses, observations and activities.(signature collector): D. G. Boyer Method of Shipment to the Lab: Fed Ex

CHAIN OF CUSTODY

I certify that this sample was transferred from _____ to _____

at (location) _____ on ____/____/____ - ____:____ and that

the statements in this block are correct. Evidentiary Seals: Not Sealed [ ] OR Seals Intact: Yes [ ] No [ ]

Signatures' _____ _____

For OCD use: Date owner notified: 6/19/89 Phone or Letter? Initials DRB

New Mexico Health and Environment Department
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud NE
Albuquerque, NM 87106 —[illegible]5) 841-2555

854

GENERAL WATER CHEMISTRY [illegible]nd NITROGEN ANALYSIS

DATE RECEIVED 8/15/88	LAB NO. WC-3346	USER CODE ☐ 59300 ☐ 59600 ☒ OTHER: 82235	
Collection DATE 880811	SITE INFORMATION ►	Sample location: Crosby Salt Lake - Collection site	
Collection TIME 1610		Collection site description: Sample from NW holding tank for produced water	
Collected by — Person/Agency: Boyer /OCD			

SEND FINAL REPORT TO ►

ENVIRONMENTAL BUREAU
NM OIL CONSERVATION DIVISION
State Land Office Bldg, PO Box 2088
Santa Fe, NM 87504-2088

Attn: David Boyer

Phone: 827-5812

Station/well code:

Owner: 085-295 17.340

SAMPLING CONDITIONS

☐ Bailed ☐ Pump ☐ Dipped ☒ Tap	Water level	Discharge	Sample type: Grab
pH (00400): 7	Conductivity (Uncorrected): > 50,000 µmho	Water Temp. (00010): °C	Conductivity at 25°C (00094): µmho

Field comments

SAMPLE FIELD TREATMENT — *Check proper boxes*

No. of samples submitted: 1	☒ NF: Whole sample (Non-filtered)	☐ F: Filtered in field with 0.45 µmembrane filter	☐ A: 2 ml H_2SO_4/L added

☒ NA: No acid added ☐ Other-*specify*: ☐ A: 5ml conc. HNO_3 added ☐ A: 4ml fuming HNO_3 added

ANALYTICAL RESULTS from SAMPLES

NA — Units, Date analyzed

	Result	Units	Date analyzed
☒ Conductivity (Corrected) 25°C (00095)	192602	µmho	8/30
☐ Total non-filterable residue (suspended) (00530)		mg/l	
☒ Other: Lab pH	7.08		9/14
☐ Other:			
☐ Other:			

A-H_2SO_4

	Result	Units	Date analyzed
☐ Nitrate-N +, Nitrate-N total (00630)		mg/l	
☐ Ammonia-N total (00610)		mg/l	
☐ Total Kjeldahl-N ( )		mg/l	
☐ Chemical oxygen demand (00340)		mg/l	
☐ Total organic carbon ( )		mg/l	
☐ Other:			
☐ Other:			

From NF, NA Sample:

	Result	Units	Date Analyzed
☒ Calcium	15240	mg/l	9/8
☒ Potassium	2090	mg/l	9/7
☒ Magnesium	25957	mg/l	9/8
☒ Sodium	67000	mg/l	9/23
☒ Bicarbonate	498	mg/l	9/14
☒ Chloride	150,500	mg/l	10/17
☒ Sulfate	885	mg/l	8/24
☒ Total Solids	278840	mg/l	9/9
☒ CO_3	0		9/14
☒ Bromide	<0.01 mg/l		8/25
☒ Cation/Anion Balance			

Analyst	Date Reported	Reviewed by
	10/13/88	[illegible]

Laboratory remarks
148400
139% balanced by [illegible] numbers [illegible]

FOR OCD USE -- Date Owner Notified________ Phone or Letter?________ Initals________

New Mexico Health and Environment Department
SCIENTIFIC LABORATORY DIVISION
700 Camino de Salud NE
Albuquerque, NM 87106

HEAVY METAL ANALYSIS FORM

Telephone: (505)841-2553

Date Received	8/15/88	Lab No.	KP-372	User Code	☒ 82235 ☐ Other:

COLLECTION DATE & TIME: yy 88 mm 08 dd 11 hh 16 mm 10

COLLECTED BY: Boyd

COLLECTION SITE DESCRIPTION: Crosby Salt Lake
Sample NW holding tank

TO:

OWNER:

ENVIRONMENTAL BUREAU
NM OIL CONSERVATION DIVISION
State Land Office Bldg., PO Box 2088
SANTA FE, NM 87504-2088

ATTN: Boyd
TELEPHONE: 827-5812

SITE LOCATION:
County: Chaves

Township, Range, Section, Tract: (10N06E24342)
P 10N 06E 24 19 3 4 1 0

STATION/ WELL CODE:

LATITUDE, LONGITUDE: -

SAMPLING CONDITIONS:

☐ Bailed ☐ Pump ☐ Dipped ☒ Tap

Water Level:

Discharge:

Sample Type: Grab

pH(00400)	Conductivity(Uncorr.)	Water Temp.(00010)	Conductivity at 25°C (00094)
7	> 56,000 µmho	°C	µmho

FIELD COMMENTS: Produced water

SAMPLE FIELD TREATMENT
Check proper boxes:

☒ WPN: Water Preserved w/HNO_3 Non-Filtered

☐ WPF: Water Preserved w/HNO_3 Filtered

LAB ANALYSIS REQUESTED:

☒ ICAP Scan
Mark box next to metal if AA is required.

ANALYTICAL RESULTS (MG/L)

ELEMENT	ICAP VALUE		AA VALUE	ELEMENT	ICAP VALUE		AA VALUE
Aluminum	<0.1			Silicon	<0.1		
Barium	<0.1			Silver	<0.1	☐	
Beryllium	<0.1			Strontium	290.		
Boron	60.			Tin	<0.1		
Cadmium	<0.1	☐		Vanadium	<0.1		
Calcium	16000.			Zinc	<0.1		
Chromium	<0.1	☐		Arsenic		☒	≤0.05
Cobalt	<0.05			Selenium		☒	<0.05
Copper	<0.1			Mercury		☒	<0.005
Iron	0.6					☐	
Lead	<0.1	☐				☐	
Magnesium	4780					☐	
Manganese	0.37					☐	
Molybdenum	<0.1					☐	
Nickel	<0.1					☐	

LAB COMMENTS: DIGEST

For OCD Use:
Date Owner Notified: _____
Phone or Letter? _____
Initials: _____

ICAP Analyst _____

Date Analyzed _____

Reviewer _____

Date Received 12/29/88

Crosby Salt Lake (BROKE Tank)

11/68

Crosby Salt Lake (Broke Tank)
11/68

Crosby Salt Lake - Brine Tank

Crosby Salt Lake (Broke Tank)
11/88

Crosby Salt Lake (Brine Tank)
11/68

Crosby Salt Lake (Broke Tank)
11/88

Crosby Salt Lake (Broke Tank)
11/68

12/2/88 Crosby Salt Lake

Crosby Salt Lake (Brine Tank)
11/68

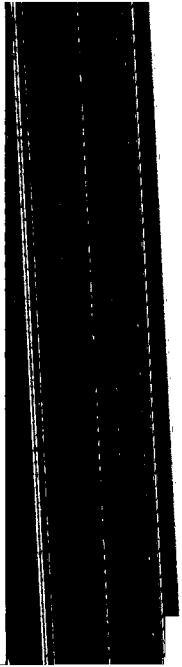
Crosby Salt Lake (Broke Tank)
11/68

Crosby Salt Lake (Brine Tank)
11/68

crosby salt Lake (BROKE Tank)
11/68

12/2/88 Crosby Salt Lake

12/2/88 Crosby salt Lake



12/2/88 Crosby Salt Lake

12/2/88 Crosby Salt Lake

12/2/[illegible] [illegible] by Smith [illegible]

Crosby Salt Lake
W. Facility 8/11/88
35-29E-19.340

Emergency Pond - Crosby Salt Lake
W. Facility 8/11/88

85-27E-19,340

Emergency pond - Crosby Salt Lake
West facility 8/11/88

85-29E-19,340

Crosby Salt Lake - West Facility

8/11/88

85-29E-19.340

Broken Pipe & Spill area
W. Facility - Crosby Salt Lake
8/11/88
85-25E-19.340

Crosby Salt Lake West Facility

8/11/88

85-29E-19.34C

Crosby Salt Lake - West Facility
8/11/88
8S - 39E - 19, 34 L

Crosby Salt Lake - Wfacility
8/11/88
85-29E-19.340

crosby Salt Lake - W. Society

8/11/88

85-29 E-19,340

Crosby Salt Lake - West Facility

8/11/88

8S-29E-19, 34C

Crosby Salt Lake - West Facility

8/11/88

85-29E-19,340

Pipeleak -
Crosby Salt Lake - West Facility
8/11/88

85-29E-19340

Crosby Salt Lake - West Facility
8/11/88

8S-29E-19,340

Crosby Salt Lake - West Facility
8/11/88
8S-29E-19, 34b

Emergency Pond
Crosby Salt Lake - West facility
8/11/88

8S-29E-19.340