NM -

# GENERAL CORRESPONDENCE

YEAR(S):

2003-1983



Leviling Across Layone, at Layone Catona Inc.

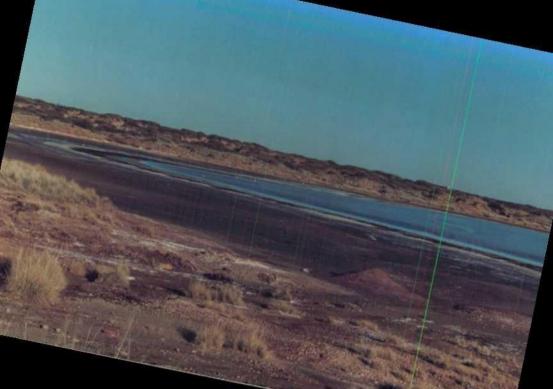
Laguna Gatuna, Lea County, NM

11-20-91 C. Shoay



Oily wastes spilled on lease site N/ Laguna Gatung.

11-21-91 C. Showy



Lasure Coatuna 12/9/92



J.F. McAdams, Brooks Federal #3

12/9/92

Laguna Gathna



Laguna Catuna 12/9/92

....



## NEW MEXICO ENERGY, MILERALS and NATURAL RESOURCES DEPARTMENT

BILL RICHARDSON
Governor

Joanna Prukop Cabinet Secretary

November 17, 2003

Lori Wrotenbery
Director
Oil Conservation Division

Travelers Casualty & Surety Company

ATTN: Mary Athanites - Bond 7600 E. Orchard Road, Ste. 330 Greenwood Village, CO 80111

RE: \$25,000 Bond for Commercial Surface Waste Management Facility

Laguna Gatuna, Inc., Principal

Reliance, Surety Bond No. B615109

Dear Ms. Athanites:

The New Mexico Oil Conservation Division (OCD) received Travelers Casualty & Surety Company letter dated October 13, 2003. The above referenced letter requested that the OCD cancel the Surface Waste Disposal Bond No. B615109. 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 OCD inspected Laguna Gatuna, Inc on September 25, 2003 and found that some hydrocarbon contamination has risen to the surface of the covered pit area. The Laguna Gatuna, Inc. former surface waste disposal facility requires continued monitoring until OCD clean-up standards are met. The subject bond will remain in full force and effect until the required clean-up/monitoring is performed and closure of the facility is approved by the OCD.

If you have any questions please call me at (505) 476-3488

Sincerely,

Martyne J. Kieling

**Environmental Geologist** 

xc with attachments:

Hobbs District Office

Larry Squires, Laguna Gatuna, Inc.

Laguna Gatuna, Inc. September 25, 2003 New Mexico Oil Conservation Division Inspection



Photo 1: Entrance, sign and treating plant tanks. Photo taken looking southeast.



Photo 2: Hydrocarbon contamination on the surface of the former pit area. Laguna Gatuna, a salt lake, is the white in the upper part of the photo. Photo taken looking south-southeast.



Photo 3: Hydrocarbon contamination shows as dark areas across the former pit area. Photo taken looking southwest.

#### Kieling, Martyne

From:

Kieling, Martyne

Sent:

Friday, September 10, 1999 9:49 AM

To:

'Al\_Collar@nm.blm.gov'

Subject:

RE: laguna gatuna

ΑI

I hope this helps.

1a. April 16,1969 Order **R-3725**: Larry C. Squires is hereby granted an acception to Order (3) of Commission Order R-3221, as ammended, to dispose of water produced in conjunction with the production of oil or gas, or both, in two natural salt lakds located in Lea Conty New Mexico.

Laguna Plata sections 2, 3, 9, 10 and 11, T20S, R32E, NMPM and Laguna Gatuna Sections 7, 17,18, 19, and 20, T20S, R33E, NMPM

- 1b. July1, 1981 Order **R-6718**: The applicant, Pollution Control, Inc., is here by authorized to install and operate a chemical and heat-treatment type oil treating plant in the E/2 NW/4 of Section 18, T20S, R33E NMPM, Lea County, NM, for the purpose of treating and reclaiming sediment oil to be obtained from salt water being disposed of in applicants's Salt Water disposal facilities located at Laguna Gatuna. (operated under Order R-3725).
- 1c. August 20, 1984 Order **R-3725-A**: The applicant, Pollution Control, Inc., in hereby authorized th expansion of its Laguna Gatuna disposal Operation by approval of a second disposal site located in the SW/4 SW/4 of Section 17, T20S, R32E, NMPM, Lea County, NM, and for disposal of solid oil-field wastes including drilling mud and cutttings at this and/or the original disposal site.
- 2. In 1988 Pollution Control, Inc., changed to Laguna Gatuna, Inc.
- 3. May 22, 1992 Facility recieved a compliance order from EPA regarding dischard to a water of the US. and in February 1993 the facility covered pits.
- 4. OCD did not use any authority to stop disposal.

Our Files are available for your review please call me for an apointment. (505) 827-7153

#### Martyne Kieling

From:

Al\_Collar@nm.blm.gov[SMTP:Al\_Collar@nm.blm.gov]

Sent:

Thursday, September 09, 1999 4:37 PM

To:

Kieling, Martyne

Cc:

GRANT\_VAUGHN%DOI@nm.blm.gov

Subject:

laguna gatuna

#### martyne:

i talked to bill olsen and he thought you could help me end some confucion about Laguna Gatuna Inc disposal facility

what i need to know is:

- 1. when did the laguna gatuna disposal facility get approved by the OCD
- 2. what authority did the OCD use ( I can't remember the OCD Order numbers!!!)
- 3. when and if the disposal facility ceased operations

4. what authority did the OCD use to stop disposal operations at Laguna Gatuna thanks for the help.

al collar roswell field office bureau of land management 505.627.0270 OIL CONSERVATION DIVISION

RECE VED

Analytical **Technologies,** Inc.

ATI I.D. 412381

January 20, 1995

NM Oil Conservation Division 2040 S. Pacheco Santa Fe, NM 87505

Project Name/Number: LAGUNA GATUNA

Attention: Roger Anderson

On 12/16/94, Analytical Technologies, Inc., (ADHS License No. AZ0015), received a request to analyze aqueous samples. The samples were analyzed with EPA methodology or equivalent methods. The results of these analyses and the quality control data, which follow each set of analyses, are enclosed.

All analyses were cancelled on 12/16/94 for sample "ASHLEY WELL" per Roger Anderson.

If you have any questions or comments, please do not hesitate to contact us at (505) 344-3777.

ľtiă Krakowski, Ph.D.

Project Manager

H. Mitchell Rubenstein, Ph.D.

Laboratory Manager

MR:jt

Enclosure



CLIENT

: NM OIL CONSERVATION DIV.

DATE RECEIVED

:12/16/94

PROJECT #

: (NONE)

PROJECT NAME

: LAGUNA GATUNA

REPORT DATE

:01/20/95

ATI ID: 412381

ATI #	CLIENT DESCRIPTION	MATRIX	DATE COLLECTED
01	ASHLEY WELL	AQUEOUS	12/12/94
02	SEEP 30	AQUEOUS	12/12/94
03	SEEP 80	AQUEOUS	12/12/94
04	FAST SEEP	AQUEOUS	12/12/94

---TOTALS---

MATRIX AQUEOUS #SAMPLES

#### ATI STANDARD DISPOSAL PRACTICE

The samples from this project will be disposed of in thirty (30) days from the date of this report. If an extended storage period is required, please contact our sample control department before the scheduled disposal date.



#### GAS CHROMATOGRAPHY RESULTS

TEST

: BTEX, MTBE (EPA 8020)

CLIENT

: NM OIL CONSERVATION DIV. ATI I.D.: 412381

PROJECT #

: (NONE)

PROJECT NAME : LAGUNA GATUNA

SAMPLE			DATE	DATE	DATE	DIL.
ID. #	CLIENT I.D.	MATRIX	SAMPLED	EXTRACTED	ANALYZED	FACTOR
02	SEEP 30	AQUEOUS	12/12/94	NA	12/19/94	1
03	SEEP 80	<b>AQUEOUS</b>	12/12/94	NA	12/19/94	1
04	FAST SEEP	AQUEOUS	12/12/94	NA	12/19/94	1
PARAME	TER		UNITS	02	03	04
BENZEN	Е		UG/L	<0.5	<0.5	120
TOLUEN	E		UG/L	<0.5	<0.5	<0.5
ETHYLB	ENZENE		UG/L	<0.5	<0.5	<0.5
TOTAL	XYLENES		UG/L	<0.5	<0.5	0.7
METHYL	-t-BUTYL ETHER		UG/L	<2.5	<2.5	<2.5
SURROG	ATE:					
BROMOF	LUOROBENZENE (%)			86	94	112



#### GAS CHROMATOGRAPHY RESULTS

#### REAGENT BLANK

: BTEX, MTBE (EPA 8020) TEST

ATI I.D.

: 412381

BLANK I.D.

: 121994

MATRIX

: AQUEOUS

CLIENT

: NM OIL CONSERVATION DIV. DATE EXTRACTED : NA

PROJECT # : (NONE)

DATE ANALYZED : 12/19/94

PROJECT NAME : LAGUNA GATUNA

DILUTION FACTOR: 1

PARAMETER	UNITS	
BENZENE	UG/L	<0.5
TOLUENE	UG/L	<0.5
ETHYLBENZENE	UG/L	<0.5
TOTAL XYLENES	UG/L	<0.5
METHYL-t-BUTYL ETHER	UG/L	<2.5

#### SURROGATE:

BROMOFLUOROBENZENE (%)

105



#### GAS CHROMATOGRAPHY - QUALITY CONTROL

#### MSMSD

TEST

: BTEX, MTBE (EPA 8020)

MSMSD # : 41238501

ATI I.D.

: 412381

CLIENT

: NM OIL CONSERVATION DIV.

DATE EXTRACTED

: NA

PROJECT #

: (NONE)

DATE ANALYZED

: 12/22/94

PROJECT NAME: LAGUNA GATUNA

SAMPLE MATRIX

: AQUEOUS

REF. I.D.

: 41238501

UNITS

: UG/L

PARAMETER	SAMPLE RESULT	CONC SPIKE	SPIKED SAMPLE	% REC	DUP SPIKE	DUP % REC	RPD
BENZENE	5.2	10	15	98	15	98	0
TOLUENE	<0.5	10	10	100	10	100	0
ETHYLBENZENE	<0.5	10	10	100	10	100	0
TOTAL XYLENES	<0.5	30	33	110	34	113	3
METHYL-t-BUTYL ETHER	49	20	74	125	75	130	1

#412381 Fax827-7" (205)261-1152 \* Bottos Hot preserved (Signotural : (Signamora) REMARKS - of spirtant T YES IN NO 9412131655 94/2K0700 NEW MEXICO OIL CONSCONITION ADUSTON SEALS INTACT shll | 91/21 2040 S. AICHECO SNYO FE, NM 87505 LABORATORY SAMPLE RECORD Dissibulian: Dignal Accompanies Brigmans; Copy to Cuerdinals? Field Files TAINERS Received for Laboratory by: Received by: /Signature/ Received by: 15-pnotures SAMPLERS: 15, MARL YEALES, / CAPACS ENSTICE STATION LOCATION ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT ASHLEY WELL CAGUMA CAPUMA \* Isager Anderson SEG 80 12/11/99 VIVILLA Date / Time SEG 30 各 **DIL CONSERVATION DIVISION** STATE OF NEW MEXICO PROJ. NO. PROJECT NAME 00:50 16:50 96,49 16:55 Relinquished by: (Symethre) Relinquished by: 15. prospies DATE TIME





#### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION



BRUCE KING GOVERNOR

ANITA LOCKWOOD CABINET SECRETARY

May 9, 1994

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

### CERTIFIED MAIL RETURN RECEIPT NO. P-111-334-100

Mr. Larry C. Squires Laguna Gatuna, Inc. Box 2158 Hobbs, New Mexico 88240

RE: SITE CLOSURE AND BOND RELEASE

LAGUNA GATUNA INC. DISPOSAL FACILITIES

Dear Mr. Squires:

The New Mexico Oil Conservation Division (OCD) is in receipt of Laguna Gatuna Inc.'s April 15, 1994 correspondence titled "LAGUNA GATUNA SALT WATER RECLMATION DISPOSAL BOND". This document requests the formal closure of Laguna Gatuna Inc.'s produced water disposal and former treating plant facilities such that the bond required under OCD rule 711 can be released.

This document states that the OCD advised you of the "necessary actions to be taken in order to comply with Oil Conservation Division rules" and that the conditions have been met. It is not clear to the OCD what conditions you are referring to. On September 30, 1993, myself, Jerry Sexton, Bill Olson and Bobby Myers of the OCD met with you to inspect the facilities. At that time, the OCD informed you that under OCD Rule 711 a closure plan must be submitted to the director for approval prior to release of the bond, that all tanks and equipment must be removed from the site and that oil was resurfacing from the unlined liquids pits which were backfilled.

During the inspection, the OCD also sampled fluids seeping from the area of the old treating plant's unlined liquid waste pits into the Laguna Gatuna Playa. The OCD expressed their concern that hydrocarbons may be present in this seep. Enclosed you will find copies of the results of the OCD's sampling of this seep. These analyses show that hydrocarbons are present in the seep from this area.

Mr Larry C. Squires May 9, 1994 Page 2

To date, the OCD has not received a closure plan for the facility nor have the other items discussed during the inspection been addressed. In order to expedite your request, please provide to the director for approval a closure plan for the facility as required under OCD Rule 711 (attached). The closure plan should address each of the following items as listed in Rule 711.A.11.:

- 1. Removal or demolition of buildings.
- 2. Removal of all tanks, vessels, equipment or hardware.
- 3. Actions taken or actions necessary for containment and/or removal of fluids and chemicals.
- 4. Removal of contaminated soils.
- 5. Backfilling and grading of pits.
- 6. Aquifer restoration (if necessary).
- 7. Reclamation of the general facility.

Submission of the above referenced information will allow the OCD to continue a review of your request. If you have any questions, please contact me at (505) 827-5812.

Sincerely,

Roger C. Anderson

Bureau Chief

xc: OCD Hobbs Office

ORGANIC CHEMISTRY ANALY CAL REQUEST FORM	SID No. 0R93 2553 C
SCIENTIFIC LABORATORY DIVISION	SLD No. UNBS 72303 C
700 CAMINO DE SALUD N.E., ALBUQUERQUE, NM 87106	Date
Organic Chemistry Section - Telephone: (505) 841-2570 Request	
2 User 3 Request ID No.	064522-C 4 Priority Military Call EID-SLD
Code #: [7   0   3   2   0 ] ID No.:	Coordinator)
active to the second se	ounty: 7 City: 8 State
Name: Laguna Octuna La	ea Hobbs Nim
9 Sample	
Location: Lagurna 16 attuna De	eipi i i i i i i i i i i i i i i i i i i
10 Collected Data	93 109 130 At 1 1 1 1 3 10 I hre
by	· / / / / / / / / / / / / / / / / / / /
First  Listst	Date: (YY/MM/DD) Time: 24 hr. clock 3:00 pm = 1500 hrs.
11 Codes:	12 Latitude (DDMMSS)
Submitter WSS # Organization	2 Digit ID
13 Report Name 14 Phone #:	Longitude (DDDMMSS) (Fineeded)
To: David G. Boyer (505) 827-581	15 Sampling Information:
New Mexico Oil Conservation Division	Grab Grab
	Sample Purpose: Composite Composite Composite Composite Compliance Flow Proportioned
P. O. Box 2088 City, State Zip	
Santa Fe, New Mexico 87504-2088	☐- Monitoring ☐- Sample Split w/Permittee ☐- Special ☐- Chain of Custody
16 Field  Data: pH: , Conductivity: umhos@ *C, Temperature:	• Chlorine
	C, Residual:mg/l, Flow:
17 Sample Source:  ☐-Stream ☐-Well; Depth:  [18] Field Notes/ Sample #:	
G-Lake G-Spring	
☐-Drain ☐-Distribution	
☐-Pool ☐-Point-of-Entry ☐-WMTP ☐-Other: See	
Wastowster C Other	eservation; Sample stored at room temperature
P-ice Samp	ble stored in an ice bath (Not Frozen) ble Preserved with Sodium Thiosulfate to remove chlorine residual
	ble Preserved with Hydrochloric Acid (2 drops/40 ml)
- glass jugs (volume = )	GCIZ
(volume =)	~
21 Analyses Requested: Please check the appropriate box(es) below to	indicate the type of analytical screen(s)
required. Whenever possible, list specific com	
Malatila Osmana	
Volatile Screens: Semiv	olatile Screens:
	(763) Acid Extractables
	(751) Aliphatic Hydrocarbons
	(755) Base/Neutral Extractables (EPA 625)
	(756) Base/Neutral/Acid Extractables (EPA 8270)
	(758) Herbicides, Chlorophenoxy Acid (759) Herbicides, Triazines
	(759) Herbicides, Thazines (760) Organochlorine Pesticides
	(761) Organophosphate Pesticides
	(767) Polychlorinated Biphenyls (PCB's)
	(764) Polynuclear Aromatic Hydrocarbons
	(762) SDWA Pesticides & Herbicides
Remarks:	

#### SCIENTIFIC LABORATORY DIVISION

P.O. Box 4700 Albuquerque, NM 87196-4700 700 Camino de Salud, NE [505]-841-2500

ORGANIC CHEMISTRY SECTION [505]-841-2570

December 2, 1993

Request ID No. 064522

## ANALYTICAL REPORT SLD Accession No. OR-93-2553

**Distribution** 

( ) User 70320

(■) Submitter 260

(X) SLD Files

To: Roger Anderson

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 water, purgeable sample submitted to this laboratory on October 5, 1993

#### DEMOGRAPHIC DATA

		GRAPHIC DATA
Co	OLLECTION	LOCATION
On: 30-Sep-93	By: Ols	Laguna Gatuna Seep
At: 11:30 hrs.	In/Near: Hobbs	

ANALYTICAL RESULTS: Aromatic & Halogenated Purgeable [EPA-601/2] Screen {754}

Parameter	ValueNo	te MDL	Units
Benzene	190.00	1.00	ppb
Isopropylbenzene	2.80	1.00	ppb
Naphthalene	3.90	1.00	ppb

See Laboratory Remarks for Additional Information

#### 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.

Evidentiary Seals: Not Sealed [7]; Intact: No [7], Yes [7] & Broken By: \_\_\_\_\_\_\_ Date: \_\_\_\_\_\_

#### Laboratory Remarks: Confirmed by GC/MS

This is a revised report.

Twelve unidentified peaks were found in the C3 substituted benzene region.

#### VOLATILE ORGANICS ANALYSIS DATA SHEET

Lab Name: NM SCIENTIFIC LABORATORY D	IVISION Contract: N/A
Lab Code: N/A Case No.: N/A	SAS No.: N/A SDG No.: N/A
Matrix: (soil/water) Water	Lab Sample ID: OR-93-2553
Sample wt/vol: 5.0 (g/mL) mL	SLD Batch No: 341
Level: (low/med) Low	Date Received: 10/05/93
% Moisture: not dec. N/A dec. N/A	Date Extracted: N/A
Extraction: (SepF/Cont/Sonc) N/A	Date Analyzed: 10/14/93

(Continued on page 2.)

## ANALYTICAL REPORT SLD Accession No. OR-93-2553 Continuation, Page 2 of 4

GPC Cleanup:	(Y/N) <u>No</u>	pH:	Dilution Factor: 1	
			CONCENTRATION UNITS:	
			(ug/L or ug/Kg):	ug/L

This sample was analyzed for the following compounds using EPA Methods 601 & 602

CAS NO.	COMPOUND	CONC.	Q	PQL
67-64-1	Acetone		Ü	5.0
71-43-2	Benzene	190.0		1.0
108-86-1	Bromobenzene		Ü	1.0
74-97-5	Bromochloromethane		Ū	1.0
75-27-4	Bromodichloromethane		U	1.0
75-25-2	Bromoform		U	1.0
78-93-3	2-Butanone (MEK)		U	5.0
104-51-8	n-Butylbenzene		U	1.0
135-98-8	sec-Butylbenzene		U	1.0
98-06-6	tert-Butylbenzene		U	1.0
1634-04-4	tert-Butyl methyl ether (MTBE)		U	5.0
56-23-5	Carbon tetrachloride		U	1.0
108-90-7	Chlorobenzene		U	1.0
67-66-3	Chloroform		U	1.0
95-49-8	2-Chlorotoluene		U	1.0
106-43-4	4-Chlorotoluene		Ū	1.0
96-12-8	1,2-Dibromo-3-chloropropane		U	1.0
124-48-1	Dibromochloromethane		U	1.0
106-93-4	1,2-Dibromoethane		U	1.0
74-95-3	Dibromomethane		U	1.0
95-50-1	1,2-Dichlorobenzene		U	1.0
541-73-1	1,3-Dichlorobenzene		U	1.0
106-46-7	1,4-Dichlorobenzene		U	1.0
75-71-8	Dichlorodifluoromethane		U	1.0
75-34-3	1,1-Dichloroethane		U	1.0
107-06-2	1,2-Dichloroethane		U	1.0
75-35-4	1,1-Dichloroethene		U	1.0
156-59-4	cis-1,2-Dichloroethene		U	1.0
156-60-5	trans-1,2-Dichloroethene		U	1.0
78-87-5	1,2-Dichloropropane		U	1.0
142-28-9	1,3-Dichloropropane		U	1.0
590-20-7	2,2-Dichloropropane		U	1.0
563-58-6	1,1-Dichloropropene		U	1.0
1006-01-5	cis-1,3-Dichloropropene		U	1.0
1006-02-6	trans-1,3-Dichloropropene		Ū	1.0

(Continued on page 3.)

## ANALYTICAL REPORT SLD Accession No. OR-93-2553 Continuation, Page 3 of 4

100-41-4	Ethylbenzene	<u> </u>	U	1.0
87-68-3	Hexachlorobutadiene		Ū	1.0
98-82-8	Isopropylbenzene	2.8		1.0
99-87-6	4-Isopropyltoluene		บ	1.0
75-09-2	Methylene chloride		U	1.0
90-12-0	1-Methylnaphthalene		บ	1.0
91-57-6	2-Methylnaphthalene		U	1.0
91-20-3	Naphthalene	3.9		1.0
103-65-1	n-Propylbenzene		U	1.0
100-42-5	Styrene		U	1.0
630-20-6	1,1,1,2-Tetrachloroethane		ับ	1.0
79-34-5	1,1,2,2-Tetrachloroethane		U	1.0
127-18-4	Tetrachloroethene		U	1.0
109-99-9	Tetrahydrofuran (THF)		U	5.0
108-88-3	Toluene		U	1.0
87-61-5	1,2,3-Trichlorobenzene		บ	1.0
120-82-1	1,2,4-Trichlorobenzene		U	1.0
71-55-6	1,1,1-Trichloroethane		U	1.0
79-00-5	1,1,2-Trichloroethane		U	1.0
79-01-6	Trichloroethene		U	1.0
75-69-4	Trichlorofluoromethane		U	1.0
96-18-4	1,2,3-Trichloropropane		U	1.0
95-63-6	1,2,4-Trimethylbenzene		U	1.0
108-67-8	1,3,5-Trimethylbenzene		U	1.0
75-01-4	Vinyl chloride		U	1.0
95-47-6	o-Xylene		U	1.0
N/A	p- & m-Xylene		U	1.0

Several other compounds were detected in the C-3 substituted benzene region at about 1 ug/L, but they were not identified.

- \* CONC = CONCENTRAION DETERMINED
  - PQL = Practical Quantitation Limit (Approximately 10 times MDL)
- \* Q = Qualifier Definitions:
- B Indicates compound was detected in the Lab Blank as well as in the sample.
- D Indicates value taken from a secondary (diluted) sample analysis.
- E Indicates compound concentration exceeded the range of the standard curve.
- J Indicates an estimated value for tentatively identified compounds, or for compounds detected and identified but present at a concentration less than the quantitation limit.

(Continued on page 4.)

#### ANALYTICAL REPORT SLD Accession No. OR-93-2553 Continuation, Page 4 of 4

N - Indicates that more than one peak was used for quantitation.

U - Indicates compound was analyzed for, but not detected above the concentration listed (Quantitation Limit).

#### QUALITY CONTROL SUMMARY FOR VOLATILES SCREEN

METHOD BLANK: A laboratory method blank was analyzed along with this sample to assure the absence of interfering contaminants from lab reagents, instruments, or the general laboratory environment. Unless listed below, no contaminants were detected in this blank above the reported detection limit.

COMPOUND DETECTED No Compounds Detected

CONCENTRATION (PPB)

SURROGATE RECOVERIES:

SURROGATE CONCENTRATION % RECOVERY Bromofluorobenzene 25.0 ppb 105.0 2-Bromo-1-chloropropane 25.0 ppb 110.0

SPIKE RECOVERY: The % recoveries for compounds in the batch spike were from 80% to 120% with the exception of the compounds listed below:

COMPOUND

CONCENTRATION

% RECOVERY

No exceptions

dqq

Analyst:

Patrick R. Hoermann

Analyst, Organic Chemistry

Reviewed By:

Richard F. Meyerhein

11/05/93

Supervisor, Organic Chemistry Section

#### NTIFIC LABORATORY DIVIS

P.O. Box 4700 Albuquerque, NM 87196-4700 700 Camino de Salud, NE [505]-841-2500

WATER CHEMISTRY SECTION [505]-841-2555

February 18, 1994

Request ID No. 064520

**ANALYTICAL REPORT** SLD Accession No. WC-93-5970

**Distribution** 

() User 70320

(X Submitter 260

(x) SLD Files

To:

David Boyer

NM Oil Consv. Div. State Land Office Bldg.

P.O. Box 2088

Santa Fe, NM 87504-2088 From:

Water Chemistry Section

Scientific Laboratory Div. 700 Camino de Salud, NE

Albuquerque, NM 87106

Re: A water, Nonpres/No sample submitted to this laboratory on October 5, 1993

#### DEMOGRAPHIC DATA

COLLECTION

LOCATION

On: 30-Sep-93 At: 11:30 hrs.

By: Ols . . .

In/Near: Hobbs

Laguna Gartuna Seep

**ANALYTICAL RESULTS** 

Analysis	Value	<u>D. Lmt.</u>	<u>Units</u>	
calcium	1530.00		${ t mG/L}$	
magnesium	1640.00	<del></del>	${ m mG/L}$	
potassium	1000.00		${ m mG/L}$	
sodium	20650.00		mG/L	
alkalinity	293.00		mG/L	
bicarbonate	358.00		${ m mG/L}$	
carbonate	0.00	<del></del>	mG/L	
chloride	34000.00		mG/L	
sulfate	5900.00		mG/L	
total diss resid	75490.00		mG/L	

Reviewed By: \_

ohn A. Finney

02/15/94

Supervisor, Water Chemistry Section

RECEIVED

MAR 1 4 1994

OIL CONSERVATION SANTA FE

LAGUNA

GATUNA

Box 2158
Hobbs NM 88240
Telephone (505) 393-7544

April 15, 1994

Oil Conservation Division Post Office Box 2088 Santa Fe, New Mexico 87504-2088

Attention: Mr. Roger Anderson

Re: Laguna Gatuna Salt Water

Reclmation Disposal Bond

#### Gentlemen:

In regard to your recent inspection tour of Laguna's facility and your advising me of the necessary actions to be taken in order to comply with the Oil Conservation Division rules, please be advised that all of these conditions have now been met and we request an inspection in order that the bond can be released.

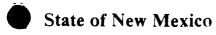
Best personal regards.

Very truly yours

LAGUNA GATUNA, INC.

Larry C. Squires

cc: Mr. Jerry Sexton







#### ENVIRONMENT DEPARTMENT

JUDITH M. ESPINOSA SECRETARY

RON CURRY DEPUTY SECRETARY

#### MEMORANDUM

To:

Members of the Water Quality Control Commission

Fr.:

Glenn Saums, NMED Point Source Regulation Section

Subj.:

Laguna Gatuna Inc. v. USEPA

Date:

July 21, 1993

As promised by Kathleen Sisneros, attached is a copy of the subject lawsuit mentioned in the July 20, 1993 WQCC meeting.

If you have any questions, please contact me at 827-2827.

#### Attachment

cc:

w/o attachment

Kathleen M. Sisneros, Director NMED W&WMD



## United States Bistrict Court

- DISTRICT OF New Mexico

LAGUNA GATUNA, INC.. a New Mexico corporation.

SUMMONS IN A CIVIL ACTION

Plaintiff.

CASE NUMBER:

CAROL M. BROWNER. Administrator of the Environmental Protection Agency: JOE D. WINKLE, Acting Director of Region VI of T V 9? ENVIRONMENTAL PROTECTION AGENCY.

Defendants.

TO: (Name and Address of Defendant)

Joe D. Winkle Acting Regional Administrator Region VI of the Environmental Protection Agency 1445 Ross Ave. Dailas, TX 75202

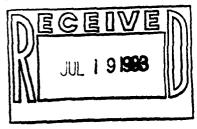
YOU ARE HEREBY SUMMONED and required to file with the Clerk of this Court and serve upon

PLAINTIFF'S ATTORNEY (1874 and address)

William Perry Pendley Todd S. Welch MOUNTAIN STATES LEGAL FOUNDATION 1660 Lincoln St., Suite 2300 Denver, CO 80264

J.W. Neal J.W. Neal, P.C. P.O. Box 278 Hobbs, NM 88240

an answer to the complaint which is herewith served upon you, within sixty (60) days after service of this summons upon you, exclusive of the day of service. If you fail to do so, judgment by default will be taken against you for the relief demanded in the complaint.



RODERT M. MARCH, Clerk

DATE

IN THE UNITED STATES DISTRICT COURT FOR THE DISTRICT OF NEW MEXICO

LAGUNA GATUNA, INC., A New Mexico Corporation, 53 JUH 24 PH 2: 24

Plaintiff,

٧S

Civil Action No:

CAROL M. BROWNER, Administrator of the Environmental Protection Agency, JOE D. WINKLE, Acting Regional Administrator, Region VI of the Environmental Protection Agency, and the ENVIRONMENTAL PROTECTION AGENCY,

WILLIAM W. DEATON-WWD

Defendants.

#### COMPLAINT AND JURY DEMAND

#### PARTIES

- 1. Plaintiff Laguna Gatuna, Inc. (Plaintiff Gatuna) is a corporation, organized and existing under the laws of the State of New Mexico and is currently in good standing. Plaintiff Gatuna's principle place of business is in Hobbs, Lea County, New Mexico. Plaintiff Gatuna holds an ownership interest in 400 acres of real property located in Sections 17 & 18, Range 32 East, Township 20 South, Lea County, New Mexico.
- 2. Defendant Carol M. Browner is the Administrator for the Environmental Protection Agency (EPA) and is sued in her official capacity.
- 3. Defendant Joe D. Winkle is Acting Regional Administrator for Region VI of the EPA and is sued in his official capacity. The State of New Mexico is located in EPA Region VI.



4. The Environmental Protection Agency is an independent agency of the United States of America charged with the duty to enforce laws protecting the environment.

#### JURISDICTION AND VENUE

- 5. Jurisdiction is proper in this Court pursuant to 28 U.S.C. § 1331.
- 6. Venue is proper in the United States District Court for the District of New Mexico pursuant to 28 U.S.C. § 1391(e)(3), in that the real property which is involved in this action is located in the State of New Mexico.

#### FACTS

- 7. Plaintiff Gatuna is in the business of disposing of oil field production waters produced in the area around Laguna Gatuna (Laguna). Plaintiff Gatuna has constructed the necessary facilities to operate its business at Laguna Gatuna. Plaintiff Gatuna has invested \$1,000,000.00 in the construction of said facilities.
- 8. Laguna Gatuna is a "sinkhole" located in sections 7,
  17, 18, and 19 of Township 20 South, Range 33 East N.M.P.M., Lea
  County, New Mexico. No streams empty into Laguna Gatuna; no
  streams drain out of Laguna Gatuna; and there are no surface or
  groundwater connections between Laguna Gatuna and any other water
  body. Laguna Gatuna consists of approximately 398 acres, of
  which a portion is owned by the Federal Government and managed by
  the Bureau of Land Management (BLM). Another portion is owned by

the State of New Mexico. The remainder is owned or held with sufficient legal interest by Plaintiff Gatuna.

9. The land owned by the Federal Government and managed by the BLM is legally described as follows:

S\( of the SE\( \) of Section 7; W\( \) of the NW\( \) of the NW\( \),
S\( \) of the NW\( \), and NW\( \) of the SW\( \) of Section 17, NE\( \)
and N\( \) of the SE\( \) of Section 18, N\( \) of the NE\( \) of the
NE\( \) of Section 19, and that part of the S\( \) of the NE\( \)
of the NE\( \) of Section 19, lying North of U.S. Highway
62-180, Township 20 South, Range 33 East N.M.P.M., Lea
County, New Mexico.

10. The land owned or held with sufficient legal interest by Plaintiff Gatuna is legally described as follows:

SW\(\frac{1}{2}\) of the SW\(\frac{1}{2}\) of Section 17; S\(\frac{1}{2}\) of the SE\(\frac{1}{2}\), SW\(\frac{1}{2}\), E\(\frac{1}{2}\) of the NW\(\frac{1}{2}\), and the SW\(\frac{1}{2}\) of the NW\(\frac{1}{2}\) of Section 18, Township 20 South, Range 33 East N.M.P.M., Lea County, New Mexico.

11. The land leased by Plaintiff Gatuna from the State of New Mexico for the purpose of disposing of oilfield brine is legally described as follows:

That portion of the NW\$ of the NE\$ and N\$ of the SE\$ of Section 18, N\$ of the NE\$ of the NE\$ of Section 19, and that part of the S\$ of the NE\$ of the NE\$ of Section 19, lying North of U.S. Highway 62-180, Township 20 South, Range 33 East N.M.P.M., Lea County, New Mexico.

- 12. The nearest stream to Laguna Gatuna is the Pecos River, located approximately 40 miles away.
- 13. In 1969, Pollution Control Inc., the predecessor company of Plaintiff Gatuna, obtained a permit from the BLM and a business lease from the State of New Mexico to dispose of brine water produced during oil extraction activities. In 1979, the BLM permit was reissued for a thirty (30) year period. In 1988 the permit and leases were transferred to Plaintiff Gatuna and

Plaintiff Gatuna owned and operated same until they were canceled by the BLM, as hereinafter stated.

- 14. In 1987, Plaintiff Gatuna's predecessor in interest, Snyder Ranches, Inc., approached the EPA and requested a ruling concerning whether Laguna Gatuna was "waters of the United States" and, therefore, subject to the provisions of the Clean Water Act 33 U.S.C. §1311 et seg. On or about August 13, 1987, EPA sent a letter to Plaintiff Gatuna indicating that Laguna Gatuna was not "waters of the United States" and disposal was allowed without a permit.
- 15. Plaintiff Gatuna alleges upon information and belief that in the spring of 1991, the United States Fish and Wildlife Service (FWS) stated in a letter that birds might use Laguna Gatuna.
- 16. Plaintiff Gatuna alleges upon information and belief that based on the information from the FWS, the EPA indicated Laguna Gatuna may be "waters of the United States" 33 U.S.C. § 1362(8) and subject to the Clean Water Act. Plaintiff Gatuna contacted the EPA, Region VI, and requested a meeting to provide information on the status of Laguna Gatuna as waters of the United States. At the meeting EPA indicated it was necessary to make additional studies to ascertain the status of Laguna Gatuna. Plaintiff Gatuna alleges on information and belief that the promised studies were never completed.
- 17. After the meeting, FWS and EPA, in the course of studying all of the playa lakes in New Mexico, discovered dead

birds in the vicinity of Laguna Gatuna and without further study or discussion ordered Plaintiff Gatuna to cease operations.

- 13. In May of 1992, EPA sent to Plaintiff Gatuna an Administrative Order requiring Plaintiff Gatuna to cease all operations involving the disposal of production waters at Laguna Gatuna or face the possibility of criminal or civil penalties pursuant to the Clean Water Act.
- 19. As a result of the Administrative Order, Plaintiff Gatuna contacted EPA, Region VI, to present evidence clearly refuting that Laguna Gatuna was "waters of the United States" subject to the Clean Water Act.
- 20. During the course of the meeting, Plaintiff Gatuna showed EPA that:
  - a. 1992 was an abnormally wet year with rain in the Hobbs area being more than 300% of normal;
  - b. surveys in the spring of 1991 showed no sign that Laguna Gatuna was being used by any wildlife, migratory or otherwise;
  - c. that the dead birds found at Laguna Gatuna in the spring of 1992 died of "salt poisoning" according to the autopsy;
  - d. an independent water analysis conducted in June of 1992 showed the water of Laguna Gatuna to have 263,000 mg/l of sodium chloride and a natural spring flowing into Laguna Gatuna had 251,000 mg/l of sodium chloride;

- e. the produced water Plaintiff Gatuna was placing in Laguna Gatuna had only 35,000 mg/l of sodium chloride and, therefore, was doing more to prevent the salt poisoning of the birds than it was to cause it;
- f. birds do not mest or feed on or near Laguna Gatuna;
- g. Laguna Gatuna, under normal circumstances, is dry;
- h. Laguna Gatuna has no shelter or food source for migratory birds; and
- i. the presence of water fowl in the spring of 1992 was an aberration not likely to reoccur under normal circumstances.
- 21. Pursuant to the criminal penalty provisions of the Clean Water Act, a person "who willfully or negligently violates [the CWA] . . . shall be punished by a fine . . . or imprisonment . . . or by both." 33 U.S.C. § 1319(c)(1).
- Water Act, any person "who violates [the CWA] . . . or violates any order issued by the Administrator . . . shall be subject to a civil penalty not to exceed \$25,000 per day . . . " 33 U.S.C. § 1319(d).
- 23. Subsequently, the BLM revoked the permit previously held by Plaintiff Gatuna and Plaintiff Gatuna is now out of business as a result of the decision of the EPA and the BLM.
- 24. The issuance of the Administrative Order is final agency action and this matter is ripe for judicial review pursuant to the Administrative Procedure Act (APA) 5 U.S.C. §706

et seg. and because of the due process claims under the United
States Constitution.

#### COUNT I

### DECLARATORY JUDGMENT AS TO CLEAN WATER ACT JURISDICTION

- 25. Plaintiff Gatuna realleges and incorporates by reference herein each and every allegation contained in paragraphs 1 through 21 of its complaint.
- 26. Section 301 of the Clean Water Act, 33 U.S.C. § 1311, provides that the discharge of any "pollutant" into "navigable waters" is unlawful unless authorized by a permit. The Clean Water Act defines "navigable waters" as the "waters of the United States, including the territorial seas." 33 U.S.C. § 1362(8).
- 27. The EPA has promulgated certain regulations, which purport to "define" "waters of the United States." Pursuant to 40 C.F.R. § 230.3(s) "waters of the United States" are defined to include:
  - all waters which are currently used or were used in the past, or may be susceptible to use in interstate or foreign commerce; all . . . playa lakes . . . the use, degradation or destruction of which could affect interstate or foreign commerce including . . . waters which are or could be used by interstate or foreign travelers for recreational or other purposes . . . [and waters] which are used or could be used for industrial purposes by industries in interstate commerce."
- 28. As a result of the regulations, the United States
  Government, through the EPA, has asserted Clean Water Act
  jurisdiction over the property owned by Plaintiff Gatuna and the
  property managed by the BLM for which Plaintiff Gatuna has a
  permit.

- 29. The property owned by Plaintiff Gatuna and the property cwned by the BLM for which Plaintiff Gatuna holds a permit contain no "waters of the United States" subject to the regulations of the Clean Water Act.
- administrative process which would allow Plaintiff Gatuna to challenge the decision of the EPA that Laguna Gatuna is "waters of the United States" is if Plaintiff Gatuna violates the cease and desist order and subjects itself to the criminal and civil penalties authorized by the Clean Water Act which amount to the possibility of going to jail or \$25,000 per day as a civil penalty.
- 31. Additionally, the United States Government and the EPA are precluded from asserting Clean Water Act jurisdiction over the property of Plaintiff Gatuna and the BLM property for which Plaintiff Gatuna holds a permit for one or more of the following reasons:
  - a. The EPA's purported "interpretation" and/or

    "construction" of "waters of the United States" as

    applied to Plaintiff Gatuna's property exceeds the

    scope of the EPA's statutory authority;
  - b. As applied, the EPA's purported "interpretation" and/or "construction" of "waters of the United States" would exceed Congress' power to regulate interstate commerce under Article 1, Section 8 of the United States Constitution;

- c. The EPA's actions in expanding, and in effect amending,

  "waters of the United States" under the guise of

  purported "interpretation" and/or "construction" of

  "waters of the United States" constitutes rulemaking

  and as such is invalid because the rulemaking was and

  is being carried out in violation of the public notice

  and comment provisions of the Administrative Procedures

  Act, 5 U.S.C. § 553; and
- d. The Government's assertion of Clean Water Act jurisdiction as applied violates Plaintiff Gatuna's rights of due process and equal protection under the law.
- 32. Gatuna has suffered irreparable harm as a result of the decision by the EPA. If the declaratory judgment sought herein is not granted, Plaintiff Gatuna will continue to suffer irreparable harm in that:
  - a. Plaintiff Gatuna will be forced to choose between exercising its rights to use its private property and "violating" the Clean Water Act;
  - b. BLM has revoked the permit held by Plaintiff Gatuna as a result of the decision made by the EPA that Laguna Gatuna is "waters of the United States;"
  - c. If Plaintiff Gatuna does continue its permitted operation, the government will accuse Plaintiff Gatuna of being a "flagrant and multiple violator;"

- d. Plaintiff Gatuna has been and continues to be harmed, if not destroyed, by the "impending charges" threatened explicitly and implicitly in the EPA's cease and desist order, in that Plaintiff Gatuna's business reputation has been diminished;
- e. Plaintiff Gatuna may be subjected to criminal liability even though the question as to whether Laguna Gatuna is "waters of the United States" has not been established and is based on reasonable differences of opinion; and
- f. Plaintiff Gatuna's credit relationship with lenders has been impaired.
- 33. A declaration as to the rights and other legal relations with respect to the property owned by Plaintiff Gatuna and the ability of the United States Government and the EPA to assert Clean Water Act jurisdiction over this property is required.
- 34. Plaintiff Gatuna is entitled to a plenary trial on the merits before this Court on the issue of whether the United States Government has Clean Water Act jurisdiction over Laguna Gatuna.

#### COUNT II

## PROCEDURAL DUE PROCESS VIOLATION (Taking of a liberty interest)

35. Plaintiff Gatuna realleges and incorporates by reference herein each and every allegation contained in paragraphs 1 through 21 of its complaint.

- 37. Plaintiff Gatuna has a constitutional liberty interest in its ability to contract and to engage in the business of disposing of production waters within the bounds established by the law.
- 38. Since the actions of the EPA affect the above described liberty interest of Plaintiff Gatuna, Plaintiff Gatuna is guaranteed the right to a procedure to determine the factual basis and legality of the decision of the EPA to declare Laguna Gatuna "waters of the United States."
- 39. Whether Laguna Gatuna is "waters of the United States" is a factual dispute in need of resolution.
- 40. The actions of the EPA deprive Plaintiff Gatuna of constitutional liberties without due process of law as guaranteed by the Fifth Amendment and, as such, are unconstitutional actions.

#### COUNT III

#### PROCEDURAL DUE PROCESS VIOLATION (Taking of a property interest)

- 41. Plaintiff Gatuna realleges and incorporates by reference herein each and every allegation contained in paragraphs 1 through 21 of its complaint.
- 42. EPA is an independent agency of the United States. actions of the EPA in declaring Laguna Gatuna "waters of the United States" are state actions, subject to the due process protections of the Fifth Amendment to the United States Constitution.
- 43. The actions of the EPA in declaring Laguna Gatuna "waters of the United States" deprives Plaintiff Gatuna of a property right without due process as quaranteed by the Fifth Amendment to the United States Constitution.
- 44. Whether Laguna Gatuna is "waters of the United States" is a factual dispute in need of resolution.
- 45. Actions of the EPA in depriving Plaintiff Gatuna of a constitutionally protected property right without due process is unconstitutional state action.

#### COUNT IV

SUBSTANTIVE DUE PROCESS VIOLATION (Violation of constitutional equal protection guarantees)

46. Plaintiff Gatuna realleges and incorporates by reference herein each and every allegation contained in paragraphs 1 through 21 of its complaint.

47. The Clean Water Act and its implementing regulations are an arbitrary and invidious use of government power in that Plaintiff Gatuna has no opportunity to challenge the decision without subjecting itself to the civil and criminal penalties of the Clean Water Act and as such is an unconstitutional exercise of authority.

#### PRAYER FOR RELIEF

WHEREFORE, Plaintiff Gatuna respectfully requests:

- 1. An Order of Declaratory Judgment declaring that Laguna Gatuna, as described above, is not "navigable water," is not "water of the United States," and is not in any way subject to jurisdiction under the Clean Water Act by the United States Government, including the Army Corps of Engineers and the EPA;
- 2. An order declaring that EPA must provide due process before constitutionally guaranteed liberty and property interests are taken:
- 3. An order declaring that the actions of EPA are an unconstitutional exercise of authority;
- 4. Plaintiff Gatuna's costs and attorneys' fees incurred in bring this action; and
- 5. Such other and further relief as to the court seems just and equitable in the premises.

#### JURY DEMAND

PLAINTIFF GATUNA DEMANDS A TRIAL BY JURY OF ANY AND ALL ISSUES IN THIS ACTION TRIABLE OF RIGHT BY A JURY.

PATED this day 22 nd

of June, 1993.

WILLIAM PERRY PENDLEY

TODD S. WELCH

MOUNTAIN STATES LEGAL FOUNDATION

1660 Lincoln Street

Suite 2300

Denver, Colorado 80264

(303) 861-0244

AND

J.W.\NEAL

J.W. NEAL, P.C.

Box 278

Hobbs, New Mexico 88240

(505) 397-3614

Attorneys for Plaintiff Laguna Gatuna, Inc.





#### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION



#### BRUCE KING GOVERNOR

ANITA LOCKWOOD CABINET SECRETARY

#### <u>MEMORANDUM</u>

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.

#### 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 Paigig 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 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 nonexempt 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 pipelinerelated pits:
- Caustic or acid cleaners:
- Boiler cleaning wastes:
- Boiler refractory bricks:
- Boiler scrubber fluids, sludges,
- Incinerator ash:
- Laboratory wastes;
- Sanitary wastes;
- Pesticide wastes:
- Radioactive tracer wastes:
  - Drums, insulation, and miscellaneous solids.

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.

#### 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 recolouing OCD regulated facilities, especially, may be subject to hazardous waste rules for disposal of wastes and contaminated soils containing penzene:

- Oil and gas service companies having wastes such as vacuum truck, tank, and drum ringate 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. Clav. Assistant Administrator.





### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT ON DIVISION

## OIL CONSERVATION DIVISION HOBBS DISTRICT OFFICE

'93 MA 12 AM 9 19

BRUCE KING GOVERNOR

February 10, 1993

POST OFFICE BOX 1980 HOBBS, NEW MEXICO 88241-1980 (505) 393-6161

Mr. Larry Squires Snyder Ranches P.O. Box 726 Lovington, NM 88260

RE: PITS AT LAGUNA GATUNA

Dear Mr. Squires:

The Hobbs Oil Conservation Division (OCD) District did witness the work done on the covering of the pits at Laguna Gatuna.

The pits were covered by digging a large hole in a pit or knocking the side out of a pit and pumping the liquid out of the pit, then mixing the solids with sand, then placing several feet of sand over the pit. I did witness that the dozier could drive over the pits after the cover was in place. As I explained over the phone, Roger Anderson and Dave Boyer made the deal of how the pits were to be covered. Roger did inspect the East pit being closed.

A General Petroleum truck was pumping water out of the hole and Roger was not sure if they were not unloading into the pit. The Hobbs District OCD checked at Rogers request, to make sure the pits were not being used.

I would recommend you get with Roger Anderson and confirm the agreement made on the closure of the pits.

Yours very truly,

JERRY SEXTON

District I Supervisor

JS/sad

xc: Bill LeMay Roger Anderson





## UNITED STATES ENVIRONMENTAL PROTECTION AGENCY/ED

# REGION 6 1445 ROSS AVENUE, SUITE 1200 2 MBY 26 AM 10 06 DALLAS, TX 75202-2733

MAY-22 1992

REPLY TO: 6W-ET

CERTIFIED MAIL: RETURN RECEIPT REQUESTED (P 435 987 214)
Dr. Larry Squires
President
Laguna Gatuna, Inc.
P.O. Box 2158

Hobbs, New Mexico 88240

Re: Order for Information Docket No. VI-92-1716

NPDES Permit No. NMU000008

Dear Dr. Squires:

Pursuant to Section 308 of the Clean Water Act (CWA), 33 U.S.C. 1251 et seq., the Environmental Protection Agency (EPA) has the authority to obtain information pertinent to carrying out its responsibilities under the CWA. Accordingly, the enclosed Order for Information is hereby served on you and Laguna Gatuna, Inc.

Compliance with the provisions of this Order is expected within the maximum time periods established by each part of the Order. Your cooperation and prompt attention will be appreciated. In response hereto, please reference Docket No. VI-92-1716 and your NPDES permit number and send correspondence to the attention of Ms. Dianne Ratkey (6W-ET). Failure to submit the information required by the Order could result in the issuance of an EPA administrative penalty order or referral to the United States Department of Justice for judicial action with monetary fines.

It is the policy of EPA to achieve full compliance with the NPDES permit program as rapidly as possible. This office is prepared to help you in any way it can. If you have any questions, please contact Ms. Dianne Ratkey, EPA, Dallas, Texas at (214) 655-6470.

Sincerely yours,

Myron O. Knudson, P.E.

Director

Water Management Division (6W)

mym O, Kmile

Enclosure

cc: SEE NEXT PAGE

cc: Mr. Jim Piatt, Bureau Chief Surface Water Quality Bureau New Mexico Environment Department

# UNITED STATES ENVIRONMENTAL PROTECTION AGENCY REGION 6

IN THE MATTER OF	§	DOCKET NO. VI-92-1716
	§	
LAGUNA GATUNA, INC.	§	
	§	
PROCEEDINGS UNDER SECTION 308(a)(4)(A),	§	
CLEAN WATER ACT,	§	
[33 U.S.C. § 1318(a)(4)(A)]	§	ORDER FOR INFORMATION
In Re: NPDES Permit No. NMU000008	§	

The following FINDINGS are made and Order issued pursuant to the authority vested in the Administrator of the Environmental Protection Agency (EPA) by the above referenced statute (hereinafter the Act) and duly delegated to the Regional Administrator, Region 6, and duly redelegated to the undersigned Director, Water Management Division, Region 6.

I.

Laguna Gatuna, Inc., (hereinafter referred to as the "Respondent"), the mailing address for which is P.O. Box 2158, Hobbs, New Mexico 88240, is doing business in the State of New Mexico.

II.

Section 308(a) of the Act, 33 U.S.C. § 1318(a) provides that:

Whenever required to carry out the objective of this Act, including but not limited to ... determining whether any person is in violation of any ... limitation, prohibition ... or standard of performance ... the Administrator shall require the owner or operator of any point source to ... provide such other information as he may reasonably require ....

III.

#### FINDINGS OF FACT

On March 27, 1991, the NPDES General Permit (NMG320000) for the 0il and Gas Extraction Point Source Category, Onshore Subcategory was final and became effective. This permit prohibits the discharge of pollutants from any onshore oil and gas wells and facilities into waters of the United States. It does not apply to existing wells which, at the time of permit issuance, fall within the Stripper Subcategory as defined in 40 CFR 435, Subpart F, but onshore wells in which production later falls below ten (10) barrels per day shall remain subject to the permit.

This permit prohibits the discharge of any pollutants from wells or facilities subject to its terms. Said pollutants include, but are not limited to:

Drilling Fluids
Drill Cuttings
Produced Water
Produced Sands
Deck and Rig Floor Drainage
Blowout Preventer Fluid
Well Treatment Fluids

Laguna Gatuna is a playa lake located in Lea County, New Mexico. Laguna Gatuna provides a significant nesting, feeding and loafing area for migratory birds, including shorebirds, ducks, coots, grebes, and raptors. Laguna Gatuna is moreover capable of receiving discharges of pollutants by multiple industries engaged in interstate commerce. But for the currently polluted

Docket No. VI-92-1716 Page 3

State, Laguna Gatuna would also be capable of use by agricultural industries engaged in interstate or foreign commerce, including cattle ranching. Due to those uses and potential uses, Laguna Gatuna is a "water of the United States" as defined at 40 CFR Part 122.2.

The Respondent discharges pollutants to Laguna Gatuna. The Respondent's representatives have verbally informed EPA that said pollutants include produced water derived from facilities in the Onshore Subcategory of the Oil and Gas Extraction Point Source Category. The Respondent's discharge of said pollutants can and does pollute and degrade Laguna Gatuna, thus affecting actual and potential interstate commerce. Numerous migratory birds have been killed by said discharges.

IV.

#### FINDINGS

Based of the above FINDINGS OF FACT, the EPA finds that there is insufficient information to determine whether or not the Respondent is discharging in compliance with the Clean Water Act and NPDES General Permit Number NMG320000.

#### ORDER

Based on the foregoing FINDINGS OF FACT and pursuant to the authority vested in the Administrator under Section 308(a)(4)(A) of the Act, 33 U.S.C. § 1318 (a)(4)(A), and duly delegated to the Regional Administrator, Region 6, and duly redelegated to the undersigned Director, Water Management Division, Region 6, it is ordered:

- A. That the Permittee, within thirty (30) days of the effective date of Order, shall submit the following information pertaining to any discharge since March 1991:
  - 1) The date on which each discharge occurred, or if specific dates are not available, the frequency of the discharge;
  - The source of or the specific operation with which the discharge is associated;
  - The specific pollutants present in each discharge;
  - 4) The quantity of each discharge
- B. That the Respondent, within thirty (30) days of the effective date of this Order, shall submit the name, address and location of each industrial source which has provided any pollutants discharged by Laguna Gatuna, Inc. since March 1991.
- C. That the Respondent, within thirty (30) days of the effective date of this Order, shall submit copies of any state and/or federal permit issued to Laguna Gatuna. Inc.

This information should be addressed to the Water Management Division, Enforcement Branch (6W-E), EPA, 1445 Ross Avenue, Dallas, Texas 75202-2733. It will be considered in any further evaluation of the nature and extent of the Permittee's noncompliance with the Clean Water Act. Section 309 of the Act, as amended by the Water Quality Act of 1987, provides civil and criminal penalties for failure to submit information required under Section 308 and criminal penalties for knowingly making a false statement under Section 308.

Docket No. VI-92-1716 Page 5

The effective date of this Order shall be the date it is received by the Permittee.

Myron O. Knudson, P.E.

Director

Water Management Division (6W)

OIL CONSERVE ON DIVISION



#### UNITED STATES ENVIRONMENTAL PROTECTION AGENCY OF VED

REGION 6 1445 ROSS AVENUE, SUITE 1200 '92 MAY 25 AM 10 06 DALLAS, TX 75202-2733

MAY 2 2 1992

REPLY TO: 6W-ET

CERTIFIED MAIL: RETURN RECEIPT REQUESTED (P 435 987 213)

Dr. Larry Squires President Laguna Gatuna, Inc. P.O. Box 2158 Hobbs, New Mexico 88240

Re: Administrative Order Docket No. VI-92-1061

NPDES Permit No. NMU000008

Dear Dr. Squires:

Violation of an NPDES permit requires the Environmental Protection Agency (EPA) to take appropriate enforcement action to assure compliance. Pursuant to the Clean Water Act (33 U.S.C. § 1251 et seq.), the enclosed Administrative Order is hereby served on you and Laguna Gatuna, Inc., for the violations described therein.

Compliance with the provisions of this Order is expected within the maximum time periods established by each part of the Order. Your cooperation and prompt attention will be appreciated. The violations cited in the referenced Order could result in the issuance of an EPA administrative penalty order or referral to the United States Department of Justice for judicial action with monetary fines. In response hereto, please reference Docket No. VI-92-1061 and your NPDES permit number, and send correspondence to the attention of Ms. Dianne Ratkey (6W-ET).

It is the policy of EPA to achieve full compliance with the NPDES permit program as rapidly as possible. This office is prepared to help you in any way it can. If you have any questions, please contact Ms. Dianne Ratkey, EPA, Dallas, Texas at (214) 655-6470.

Sincerely yours,

Myron O. Knudson, P.E.

Director

Water Management Division (6W)

Mym O, Knuch

Enclosure

cc: SEE NEXT PAGE

cc: Mr. Jim Piatt, Bureau Chief Surface WAter Quality Burau New Mexico Environment Department

# UNITED STATES ENVIRONMENTAL PROTECTION AGENCY REGION 6

IN THE MATTER OF	§	DOCKET NO. VI-92-1061
	§	
LAGUNA GATUNA, INC.	§	
PROGRESSION INVESTIGATION 2007-1/21	8	
PROCEEDINGS UNDER SECTION 309(a)(3), CLEAN WATER ACT,	8	
[33 U.S.C. § 1319(a)(3)]	8	ADMINISTRATIVE ORDER
In RE: UNPERMITTED DISCHARGE	§	
OF POLLUTANTS FROM ( 3)	§	
FACILITY NO. NMU000008	§	

The following FINDINGS are made and Order issued pursuant to the authority vested in the Administrator of the Environmental Protection Agency (EPA) by the above referenced statute (hereinafter the Act) and duly delegated to the Regional Administrator, Region 6, and duly redelegated to the undersigned Director, Water Management Division, Region 6.

I.

Laguna Gatuna, Inc., (hereinafter referred to as the "Respondent"), the mailing address for which is P.O. Box 2158, Hobbs, New Mexico 88240, is licensed to do business in the State of New Mexico.

II.

Section 301(a) of the Act, 33 U.S.C. § 1311(a) prohibits the discharge of any pollutant into the waters of the United States except insofar as such discharge is regulated by a permit issued pursuant to Section 402 of the Clean Water Act.

Section 308(a) of the Act, 33 U.S.C. § 1318(a) provides that:

Whenever required to carry out the objective of this Act, including but not limited to ... determining whether any person is in violation of any ... limitation, prohibition ... or standard of performance ... the Administrator shall require the owner or operator of any point source to ... provide such other information as he may reasonably require ...

III.

#### PERMIT FINDINGS

On March 27, 1991, the NPDES General Permit (NMG320000) for the Oil and Gas Extraction Point Source Category, Onshore Subcategory was final and became effective. This permit prohibits the discharge of pollutants from any onshore oil and gas wells and facilities into waters of the United States. It does not apply to wells or facilities in the Agricultural and Wildlife Use Subcategory. Likewise, it does not apply to existing wells which, at the time of permit issuance, fall within the Stripper Subcategory as defined in 40 CFR 435, Subpart F, but onshore wells in which production later falls below ten (10) barrels per day shall remain subject to the permit.

This permit prohibits the discharge of any pollutants from wells or facilities subject to its terms. Said pollutants include, but are not limited to:

Drilling Fluids
Drill Cuttings
Produced Water
Produced Sands
Deck and Rig Floor Drainage
Blowout Preventer Fluid
Well Treatment Fluids

Docket No. VI-92-1061 Page 3

IV.

#### FINDINGS OF FACT

Laguna Gatuna is a playa lake located in Lea County, New Mexico. Laguna Gatuna provides a significant nesting, feeding and loafing area for migratory birds, including shorebirds, ducks, coots, grebes, and raptors. Laguna Gatuna is moreover capable of receiving discharges of pollutants by multiple industries engaged in interstate commerce. But for the currently polluted State, Laguna Gatuna would also be capable of use by agricultural industries engaged in interstate or foreign commerce, including cattle ranching. Due to those uses and potential uses, Laguna Gatuna is a "water of the United States" as defined at 40 CFR Part 122.2.

The Respondent discharges pollutants to Laguna Gatuna. The Respondent's representatives have verbally informed EPA that said pollutants include produced water derived from facilities in the Onshore Subcategory of the Oil and Gas Extraction Point Source Category. The Respondent's discharge of said pollutants can and does pollute and degrade Laguna Gatuna, thus affecting actual and potential interstate commerce. Numerous migratory birds have been killed by said discharges.

Docket No. VI-92-1061 Page 4

ν.

#### FINDINGS OF VIOLATION

EPA has not authorized the Respondent's discharges of pollutants in accordance with Section 402 of the Clean Water Act, 33 U.S.C. Part 1242. EPA has in fact prohibited discharges of Onshore Subcategory wastewater pollutants to waters of the United States through issuance of National Pollutant Discharge Elimination System (NPDES) permit GNM320000. The Respondent nevertheless continues to discharge said pollutants to Laguna Gatuna, thus violating Section 301(a) of the Clean Water Act, 33 U.S.C. Part 1311(a).

VI.

Issuance of this Order does not preclude the pursuit of additional enforcement action including additional administrative penalty orders, and/or civil or criminal judicial actions for the violations cited herein. If an EPA administrative penalty order is issued or a judicial action is initiated by the U.S. Department of Justice, the Respondent will be subject to a monetary fine.

#### ORDER

Based on the foregoing FINDINGS OF VIOLATION and pursuant to the authority vested in the Administrator under Section 309(a)(3) of the Act, 33 U.S.C. § 1319(a)(3), and duly delegated to the Regional Administrator, Region 6, and duly redelegated to the undersigned Director, Water Management Division, Region 6, it is ordered:

Docket No. VI-92-1061 Page 5

- A. That the Respondent immediately cease and desist from all discharges of wastewater pollutants, including produced water, derived from the Onshore Subcategory of the Oil and Gas Extraction Point Source category, to Laguna Gatuna or to any other water of the United States.
- B. That the Respondent, within fourteen (14) calendar days of the effective date of this Order, shall appear at the Region 6 offices of the United States EPA, 1445 Ross Avenue, 12th Floor, Dallas, Texas, before the undersigned or designee, to show cause why the Respondent has not complied with the mandate of Section 301 of the Clean Water Act and to show cause why the EPA should not take further action against the Respondent.

To arrange the meeting and to provide any comments or questions concerning this matter, please contact Ms. Dianne Ratkey of our office at telephone (214) 655-6470.

The effective date of this Order shall be the date it is received by the Respondent.

DATED: This \_\_\_\_\_\_\_day of \_\_\_\_\_\_\_, 1992.

midn

Myron O. Knudson, P.E.

Director

Water Management Division (6W)

#### STATE OF NEW MEXICO



#### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

**OIL CONSERVATION DIVISION** 



BRUCE KING GOVERNOR

March 30, 1992

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

W. Thomas Kellahin Kellahin, Kellahin & Aubrey P. O. Box 2265 Santa Fe, New Mexico 87504-2265

Re: Laguna Gatuna Inc.

#### Dear Tom:

I reviewed your letter regarding Laguna Gatuna and its request to have the facility located in the SW/4 SW/4 of Section 17 determined to be administratively approved under a prior decision as integral part the primary facility on the other side of the laguna.

We have been over this matter several times with Mr. Squires and we have determined that the site and facility in question is not approved as a commercial disposal facility and is not a part of the primary facility which is currently permitted.

Therefore it will be necessary for Laguna Gatuna, Inc., to apply for a permit under Rule 711, giving all notice as required by the rules of the Oil Conservation Division, in order to obtain a permit for this particular facility. It will also require a seperate bond and the approval conditions will be established at the time of the approval, if it is granted.

Sincerely.

ROBERT G. STOVALL,

General Counsel

RGS/dr

Rojer a

20 min

#### KELLAHIN, KELLAHIN AND AUBREY

ATTORNEYS AT LAW

EL PATIO BUILDING

W. THOMAS KELLAHIN\* KAREN AUBREY<sup>†</sup> 117 NORTH GUADALUPE POST OFFICE BOX 2265 TELEPHONE (505) 982-4285 TELEFAX (505) 982-2047

\*NEW MEXICO BOARD OF LEGAL SPECIALIZATION RECOGNIZED SPECIALIST IN THE AREA OF NATURAL RESOURCES-OIL AND GAS LAW SANTA FE, NEW MEXICO 87504-2265

TALSO ADMITTED IN ARIZONA

JASON KELLAHIN (RETIRED 1991)

March 6, 1992

Mr. William J. LeMay Director Oil Conservation Division 310 Old Santa Fe Trail State Land Office Building Santa Fe, New Mexico 87501

HAND DELIVERED

RE: LAGUNA GATUNA INC.

(Formerly Pollution Control, Inc.)
Request to Correct Prior OCD
Administrative Approval for
Use of Laguna Gatuna as a
Surface Waste Disposal Facilities

OIL CONSERVATION DIVISION

Lea County, New Mexico

Dear Mr. LeMay:

Our firm represents Mr. Larry Squires and Laguna Gatuna Inc. On behalf of Laguna Gatuna Inc., we seek the correction of an error which is contained in the Oil Conservation Division Administrative Approval letter dated August 31, 1988 which approved the referenced surface waste disposal facility. (Enclosure #1). Our reasons for seeking the correction as based upon the following:

The Division's approvals of Pollution Control's (now Laguna Gatuna Inc.) Laguna Gatuna Surface Waste Disposal Facility (Orders R-3725 and R-3725-A) predate the Division's adoption of Rule 711. (Order R-8662) Previously, Laguna Gatuna has been approved as one contiguous facility having multiple sites within and adjacent to Laguna Gatuna.

On August 17, 1988, after the adoption of Rule 711, and in accordance with Division Rule 711, Pollution Control Inc. submitted its administrative application for the re-approval of existing and approval of additional sites to its Laguna Gatuna Disposal Facility. (Enclosure #2) The application included previously approved Site #2 which is

Mr. William J. LeMay March 6, 1992 Page 2

identified as "PCI-3" and is located in the SW/4SW/4 of Section 17. Re-approval was sought to use Site #2 to receive water by two different pipelines and by approved truckers, either on a supervised terminal basis or an "automated-unsupervised terminal" basis for processing and eventual discharge into Laguna Gatuna.

Because of the complex nature of the Site #2 portion of the application, Mr. David Boyer of the OCD discussed the application with Mr. Squires and Mr. J. W. Neal. As a result of that discussion, Mr. Boyer mistakenly believed that Mr. Squires was modifying his application and deleting the request that Site #2 be approved as a truck terminal for BOTH automated-unsupervised basis and on a supervised terminal basis. In fact, Mr. Squires only sought to delete Site #2 as an "automated-unsupervised" terminal.

The mistake in the last sentence of paragraph 1 of the August 31, 1988 approval letter was overlooked by Mr. Squires until the summer of 1991 when he discussed it with Mr. Boyer and believed he had the mistake resolved. However, on August 30, 1991, Mr. Boyer wrote Mr. Squires advising him that Site #2 was now a "noncontiguous site" and he must file a new application if he wished to use Site #2 for any other purpose than the disposal of water produced by the Laguna Gatuna Inc. operated wells. (Enclosure #3). Thereafter, Mr. Squires and Mr. Neal again discussed this matter with Mr. Boyer and attempted without success to have Mr. Boyer correct the mistake. While Mr. Boyer acknowledged the error in deleting Site #2 for supervised trucked water disposal, he still required a new application because now the site was believed to be non-contiguous despite prior approval by the Division as a single facility.

We disagree with Mr. Boyer's opinion that Mr. Squires again must now go through the entire approval process if he wants to use Site #2 for supervised trucked water disposal and for commercial disposal by the two existing pipelines into that portion of the Laguna Gatuna facility. Further, we disagree that this

Mr. William J. LeMay March 6, 1992 Page 3

facility which has always been treated as a single contiguous facility by the OCD has now somehow become multiple separate facilities. Laguna Gatuna is one comprehensive unit composed of several parts all of which involve the same geohydrology.

Because the use of Site #2 as a supervised truck terminal and commercial pipeline discharge point would have been approved by the OCD but for the mistaken belief that Mr. Squires had withdrawn it from his application, it is our opinion that this request can be approved without further notice or a hearing. In fact, Pollution Control, with the knowledge of the Division and the OCD District Office, always has used Site #2 as a pipeline discharge point and as a supervised truck terminal discharge point.

Although this is not intended to be a new application to modify an existing facility as contemplated by Mr. Boyer's construction of OCD Rule 711, we have used the Rule 711 format by which to submit this request. (Enclosure #4).

We have also enclosed for your consideration a proposed administrative order which, if approved by you, will grant this request. (Enclosure #5).

Very truly yours,

Thomas Kellahin

WTK/jcl

cc: Pollution Control Inc.

J.W. Neal, Esq.

ltrt305a.638



#### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

**OIL CONSERVATION DIVISION** 

GARREY CARRUTHERS
GOVERNOR

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

August 31, 1988

## CERTIFIED MAIL RETURN RECEIPT REQUESTED

Mr. Larry Squires
POLLUTION CONTROL, Inc.
P. O. Box 2158
Hobbs, New Mexico 88241

RE: Compliance with OCD Rule 711

Dear Mr. Squires:

The Oil Conservation Division (OCD) has reviewed your application dated August 17, 1988 requesting administrative approval for the existing facility in the NE/4 NW/4 of Section 18, Township 20 South, Range 33 East NMPM, Lea County, New Mexico, and the proposed construction and disposal system detailed in drawings numbered PCI-4 and PCI-4A in the application. At this time approval for modification of the truck terminal in the SW/4 of Section 17 and NW/4 of Section 20, Township 20 South, Range 33 East is not being sought.

The application was submitted pursuant to OCD Rule 711 and is hereby approved with the following conditions:

- 1. A plan for initial and periodic integrity testing of the pipelines leading to the facility will be submitted for approval by the OCD within 60 days. A commitment for repair of the pipelines in the event of any leaks must also be furnished.
- In the event of closure of the facility, the pipelines must be plugged to prevent <u>further disposal of fluids</u> at the facility.

Mr. Larry Squires August 31, 1988 Page 2

- 3. The eastern and western pit areas detailed in drawing number PCI-2 of the application will be closed by filling and mounding with soil by August 30, 1990.
- 4. All water discharged from the gunbarrels will be directed into the settle/skim pit where a minimum 2-1/2 foot freeboard will be maintained to prevent overtopping of the berm. No fluid will be allowed to be discharged or leaked on to the surrounding terrain prior to discharge through pipe into Laguna Gatuna.

Please be advised that the approval of this facility, proposed construction and disposal system does not relieve you of liability should your operation result in actual pollution of surface or ground waters which may be actionable under other laws and/or regulations.

Sincerely,

William J. LeMay

Director

WJL:JB:sl

cc: OCD - Hobbs



### POLLUTION CONTROL, INC.

August 17, 1988

New Mexico Oil Conservation Division P. O. Box 2088 Santa Fe, New Mexico 87504

Attention: David Boyer

Re: Compliance w/OCD Order R-8662 and Rule #711 (L. C. Squires & Pollution Control, Inc.)

#### Gentlemen:

Larry C. Squires and Pollution Control, Inc. have obtained OCD Order Nos. R-3725 and R-3725-A, which authorizes disposal of oil field waters and wastes into the Laguna Gatuna natural salt lake, and R-6718, which authorizes the treatment and reclaiming of sediment oil at the Laguna Gatuna disposal facility. A \$25,000.00 bond as required in OCD Order No. R-8662 has been secured along with an additional \$10,000.00 bond which is required by the BLM.

The following information is furnished in compliance with Rule No. 711 and we are respectfully requesting administrative approval for this previously permitted facility.

- 1. A plat and topographic map showing the location of the facility located in the NW/4 of Section 18 and SW/4 of Section 17, T20S, R33E, NMPM, Lea County, New Mexico (Dwg PCI-1). There are no dwellings or water wells within one mile of the facility.
- 2. The landowners of record are the Bureau of Land Management (USA), State of New Mexico and Snyder Ranches, Inc., P. O. Box 2158, Hobbs, New Mexico. Snyder Ranches, Inc. owns or has the surface grazing leases from the Bureau of Land Management and State of New Mexico for all lands surrounding the Laguna Gatuna disposal facility and controls all access to the site.
- 3. Diagrams with land descriptions are enclosed. See Drawings PCI-2 and PCI-3 which shows existing disposal facilities in the SW/4 SW/4 of Section 17 and NE/4 NW/4 of Section 18. Drawings PCI-4 and 4-A show proposed new site located in the NW/4 NW/4 of Section 18.



### POLLUTION CONTROL, INC.

### Page 2 - New Mexico Oil Conservation Division - 8-17-88

- The plan for disposal of oilfield brines at an additional Laguna Gatuna disposal site located in the NW/4 NW/4 of Section 18 is to transport the water by pipeline to a series of terminal tanks where any hydrocarbons can be removed; from these terminal tanks the water will be circulated through an unlined surface pit for additional skimming and settling (see Dwg PCI-4), and from that pit the water will be transported by pipeline to a second holding area for final skimming and settling before being discharged into the Laguna Gatuna for evaporation. An existing discharge facility located in the SW/4 SW/4 of Section 17 will receive water by pipeline and by approved truckers (see Dwg PCI-3) into a tank and then discharged into a number of skim/ settling pits before being discharged into the Laguna Gatuna. A minimum of solid wastes will be accepted at existing facilities located in the NE/4 NW/4 of Section 18 (see Dwg PCI-2). This material will be properly identified and placed in eathern pits, allowed to cure and when adequately cured the pits will be closed. Any. water will be pulled off and disposed into the Laguna Gatuna and any oil will be reclaimed and sold to a certified oil reclaiming facility.
- 5. Any significant spills will be routinely reported to the OCD and appropriate clean up will be accomplished at the earliest possible time.
- 6. The Laguna Gatuna facilities will be checked on a daily schedule by qualified personnel to ensure permit compliance and maintenance will be accomplished on a regular basis.
- 7. Several old pits at the present facilities located in the NE/4 NW/4 of Section 18 are scheduled to be closed within the next two years as water and recoverable hydrocarbons are removed. This will be done on a continuing basis and as pits are adequately cured they will be closed. Flood control dikes will be constructed around the old pits to prevent invasion of rain waters into the pit area.

Old pits will be closed by filling and mounding and the proposed flood control dikes will divert rain waters around old pit areas.



## POLLUTION CONTROL, INC.

- Page 3 New Mexico Oil Conservation Division 8-17-88
  - 8. Geological and hydrological evidence demonstrating that disposal of oil field wastes will be adversely impact fresh water was done by Geohydrology Associates, Inc. and is enclosed. This was furnished at previous OCD hearing in 1969 and 1984.
  - 9. Notice requirements were previously given before the 1969 and 1984 hearings.

I certify that the information submitted is true, accurate and complete to the best of my knowledge.

Respectfully submitted

arry C. Aquires

President

LCS/jp

Encls: OCD Order No. R-3725

OCD Order No. R-3725-A OCD Order No. R-6718

Report/Hydrologic Assessment

Dwgs. PCI-1

PC1-2

PCI-3

PCI-4

PC1-4A

cc: OCD-Hobbs

### STATE OF NEW MEXICO



### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

### **OIL CONSERVATION DIVISION**

BRUCE KING

August 30, 1991

POST OFFICE BOX 2088 STATE LAND OFFICE BUILDING SANTA FE, NEW MEXICO 87504 I505I 827-5800

# CERTIFIED MAIL RETURN RECEIPT NO. P-756-666-146

Mr. Larry Squires Laguna Gatuna, Inc. Box 2158 Hobbs, New Mexico 88240

RE: Status of Laguna Gatuna Facilities

Dear Mr. Squires:

As a result of discussions earlier this summer, I have reviewed the status of your Laguna Gatuna facility with respect to application of OCD Rule 711 (Commercial Surface Waste Disposal Facilities) at that location. The review was complicated because the facility was approved in stages over several years under separate OCC orders. Because of this approval sequence, I will review these orders and explain their relationship to current operation of the facility under Rule 711.

- 1. After a showing that fresh water would not be impacted, OCC Order No. R-3725 (3-19-69) approved an exception to OCC Order No. R-3221 to allow disposal of produced water into Laguna Gatuna. Subsequently, a facility was established in the NE/4 NW/4 of Section 18, Township 20 South, Range 33 East.
- 2. Order No. R-3725-A (8-8-84) authorized a second facility on Laguna Gatuna in the SW/4 SW/4 of Section 17, Township 20 South, Range 33 East and also authorized disposal of solid oil-field waste products, including drilling mud and cuttings, at either the Section 17 or Section 18 facility.
- 3. Order No. R-6718 (6-17-81) approved installation and operation of an oil-treating (reclamation) plant at the Section 18 facility.

ENCLOSURE #3

- 4. Order No. R-8662 (5-19-88) established Rule 711 and required that such facilities comply with the provisions of Rule 711 within 120-days of notification from OCD. On August 17, 1988, Pollution Control, Inc. submitted its Rule 711 application to OCD for review and approval.
- 5. Item 4 of the application states, in part,: "An existing discharge facility located in the SW/4 SW/4 of Section 17 will receive water by pipeline and by approved truckers (See Dwg PCI-3) into a tank and then discharged into a number of skim/settling pits before being discharged into Laguna Gatuna."
- 6. Following review of the application, an approval letter dated August 31, 1988, was sent via certified mail to you. The approval was only for the existing and proposed facility in Section 18. Regarding the Section 17 operation, the undated notes of the application reviewer state that the Section 17 facility was not undergoing permitting at this time, and the approval letter contained following statement: "At this time approval for modification of the truck terminal in the SW/4 of Section 17 and NW/4 of Section 20, Township 20 South, Range 33 East is not being sought." This statement was not challenged in subsequent correspondence with Pollution Control (now Laguna Gatuna, Inc.).
- 7. Current activity at the Section 17 facility as reported by our Hobbs District Office appears limited to disposal of produced water from one or more nearby leases operated by you.

Based on the review of the above documents, I believe the available information supports the following conclusions regarding the status of the Section 17 facility:

- 1. The Section 17 facility is not authorized for commercial surface waste disposal pursuant to OCD Rule 711.
- 2. Under Order No. R-3725 water produced from wells operated by Laguna Gatuna, Inc., only, may be disposed of in Laguna Gatuna at Section 17. You may not accept water from any other source at that location.

If in the future you wish to resume commercial disposal at the Section 17 facility, you must apply for a permit for that facility. Since the facility is not contiguous with the Section 18 facility OCD has determined that a separate application is necessary. As such it will be necessary to comply with the public notice and bonding provisions of Rule 711.

Mr. Larry Squires August 30, 1991 -3-

î,

If you have any questions regarding the legal status of the facility, please contact Robert Stovall, OCD General Counsel, or Roger Anderson of my staff for technical questions.

Sincerely yours,

David G. Boyer, Hydrogeologist Environmental Bureau Chief

DGB/sl

cc:

Robert Stovall

OCD Hobbs Office

Z. Padilla, State Land Office

### State of New Mexico ------Energy, Minerals and Natural Resources Department OIL CONSERVATION DIVISION P.O. Box 2088 Santa Fe, NM 87501

to Correct Administrative Error in Approval

	APPLICATION FOR SURFACE WASTE DISPOSAL FACILITY (Refer to OCD Guidelines for assistance in completing the application.)				
I.	Type:				
II.	OPERATOR: Laguna Gatuna Incorporated				
	ADDRESS: P. 0. Box 2158, Hobbs, NM 88240				
	CONTACT PERSON: Larry C. Squires PHONE:				
III.	(*See Attached List)  LOCATION: /4 /4 Section Township Range  Submit large scale topographic map showing exact location.				
IV.	IS THIS PART OF AN EXISTING FACILITY?   Yes  No				
V,	Attach the name and address of the landowner of the disposal facility site and landowners of record within one-half mile of the site.				
VI.	Attach description of the facility with a diagram indicating location of fences, pits, dikes, and tanks on the facility.				
VII.	Attach detailed engineering designs with diagrams prepared in accordance with Division guidelines for the construction/installation of the following: pits or ponds; leak-detection systems; aerations systems; enhanced evaporation (spray) systems; waste treating systems and security systems.				
VIII.	Attach a contingency plan for reporting and clean-up of spills or releases.				
IX.	Attach a routine inspection and maintenance plan to ensure permit compliance.				
X.	Attach a closure plan.				
XI.	Attach geological/hydrological evidence demonstrating that disposal of oil field wastes will not adversely impact fresh water.				
XII.	Attach proof that the notice requirements of OCD Rule 711 have been met. (Commercial facilities only.)				
XIII.	Attach a contingency plan in the event of a release of H <sub>2</sub> S.				
XIV.	Attach such other information as is necessary to demonstrate compliance with any other OCD rules, regulations and/or orders.				
XV.	CERTIFICATION				
	I hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.				
	Name: Title: VIII Jagana Jack Signature: LAKKU Saule Date:				
	DISTRIBUTION: Original and one copy to Santa Fe with one copy to appropriate Division District Office.				

### III. Location:

- Site 1. Pipeline Terminal Site
  NW/4NW/4 Section 18, Township
  20 South, Range 33 East
- Site 2. Truck Unloading Site SW/4SW/4 Section 17 and NW/4NW/4 Section 20, Township 20 South, Range 33 East
- Site 3. Solids Treating and Burial Site, NE/4NW/4 Section 18, Township 20 South, Range 33 East

ATTACHMENTS: ITEMS V through XII

Application of Laguna Gatuna, Inc. to correct approval of an existing surface waste disposal facility

V. The surface landowner at the disposal facility site is:

Laguna Gatuna, Incorporated Post Office Box 2158 Hobbs, New Mexico 88240

The surface landowners of record within one-half (1/2) mile of the facility are:

United States of America Bureau of Land Management Post Office Box 1449 Santa Fe, NM 87504 ATTN: Larry Woodard

Jim Baca Commissioner of Public Lands State of New Mexico Post Office Box 1148 Santa Fe, NM 87504

William C. Smith Post Office Box 727 Lovington, NM 88260

Kenney Smith Post Office Box 764 Carlsbad, NM 88220

### VI. Description

Laguna Gatuna, Inc. seeks Oil Conservation Division (OCD) correction of prior approval of an existing facility at it gathering line terminal site in the NW/4NW/4 of Section 18, Township 29 South, Range 33 East of Lea County by constructing additional skim settling pits and utilizing an existing embankment to create another holding pond where water could be collected and allowed to stand before being discharged into the Laguna Gatuna. Up to four new pits will be constructed as shown on enclosed Drawing Number 1. As shown all pits will be covered by netting. The new pits will be manifolded to allow bypassing any pit including the existing pit. The discharge line from all skim pits will be constructed so as to allow waters to be directed to another holding pond behind the now unused embankment to the west of the existing pond. All pit and tank areas will be fenced.

Approval is also being sought to utilize and modify an existing site in the SW/4SW/4 of Section 17 and NW/4 NW/4 of Section 20 of Township 20 South, Range 33 East, Lea County so that produced waters may be trucked and piped into that site and treated in settling tanks and pits before being discharged into the Laguna Gatuna. This facility is diagramed on Drawing Number 2.

A berm will be constructed to divert any fluids lost onto the unloading pad itself form entering directly into the Laguna Gatuna. An Automatic security system will be installed to control unloading into the facility. The site is fenced on three sides which connect with the fencing on the north side of U.S. Highway 62-180. The access gate to the site will remain locked at all times. Total water disposed into the Laguna Gatuna will not exceed 30,000 barrels per day as per OCD Order R-3725 and R-3725-A.

Approval is also being sought to utilize a portion of the area originally permitted as the Pollution Control, Inc. facility in the NW/4 of Section 18, Township 20 South, Range 33 East whereby an area on the north side of the site will be used to construct pits to treat and bury solids derived from the settling and skim pits of the above. Pits will be constructed in this area as needed and will be similar to the pit shown on Drawing Number 3. This area will be secured by fencing and a locked gate on the north fence line. As solids and liquids are separated they will be

covered or mixed with soils derived from the pits. Any pits containing liquid will be netted. Berms will be constructed to prevent escapes of any contaminated liquids from the area. Drawing Number 4 shows all facilities and their location relative to the Laguna Gatuna.

Approval is also being sought to utilize previously undeveloped areas in the W/2 Section 18, Township 20 South, Range 33 East for the purposes of treating and disposing of solids derived from any of the above facilities or solids that may be transported in on a commercial basis. Specific design and operation guidelines of such pits would be submitted to the Oil Conservation Division for administrative approval prior to construction.

### VII. Systems Design

The attached drawings show the design of the pits, ponds and piping systems. All pits or ponds will not be lined as there is no usable ground water and ultimate disposal is into the Laguna Gatuna. An electronic security system using assigned access codes will be used only on the south facility in Section 17.

# VIII. Contingency Plan for Reporting Cleanup of Spills and Releases

Spills or releases of 25 barrels or more of hydrocarbons or spills or releases of 100 barrels or more of produced waters, other than to the Laguna Gatuna, will be reported as per Rule 116 of the OCD Rules and Regulations. Spilled fluids will be recovered and returned to the appropriate treating facility. Contaminated soils will be covered or removed to a pit in the area shown on Drawing Number 3 if it is deemed necessary to prevent pollution of lands outside the areas or the Laguna Gatuna.

### IX. Routine Inspection and Maintenance Plan

All sites will be monitored and inspected daily for fluid volume entry as well as spills, leaks and accumulations of solids and hydrocarbons in skim and settling pits and tanks. Records of all data collected will be maintained as well as records of all leaks and spills.

### X. Closure Plan

If operations cease at any site in the facility, all pits, tankage or piping will be drained and waste fluids or solids removed to an appropriate remaining site at the facility or to an Oil Conservation Division approved disposal. All pits will be closed and covered in accordance with Oil Conservation Division guidelines and other facility equipment such as tanks, piping and fencing will be removed from the sites.

### XI. <u>Hydrological Evidence</u>

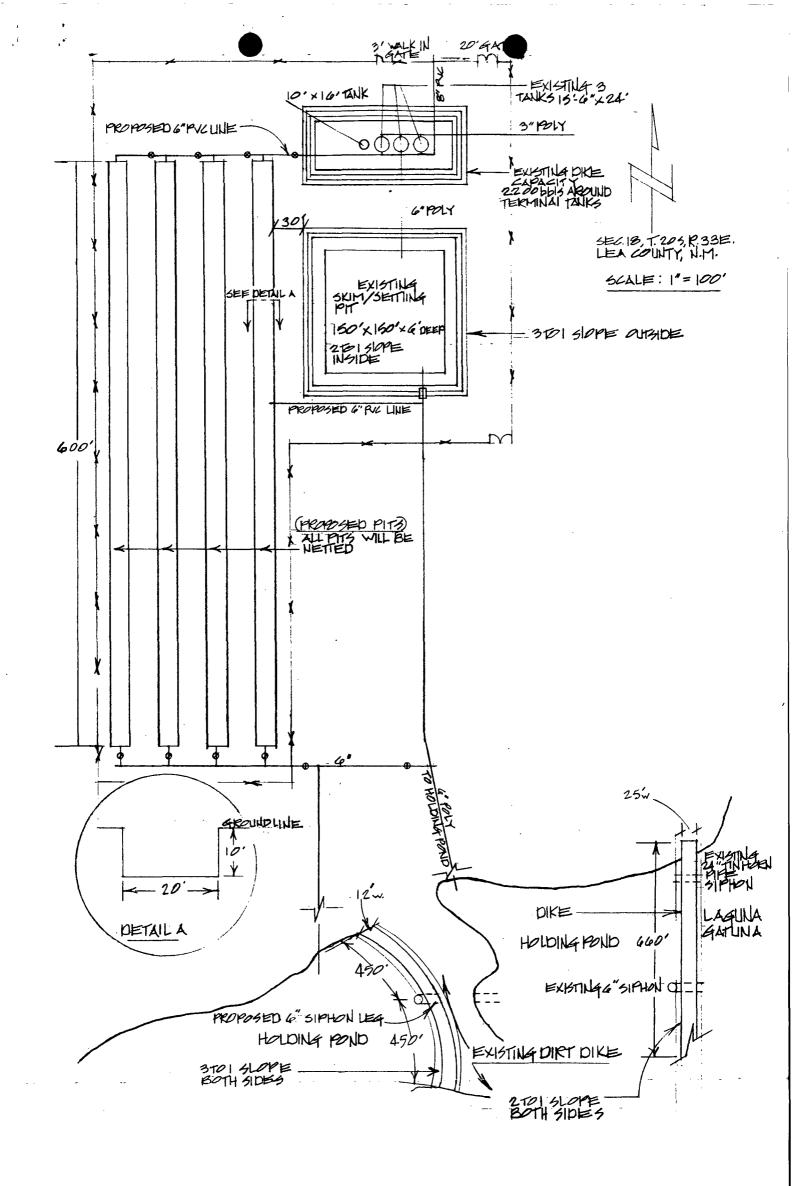
Hydrological assessments and testimony were presented before the Commission before issuance of Division Orders R-3725 and R-3725-A which indicate that disposal of oil field wastes will not adversely effect fresh waters. This is concluded due to two points: 1.) All useable freshwater in the area were found in strata above the surface of Laguna Gatuna. These waters were depleted with no use being made or available at present. 2.) All lower shallow aguifers exhibit brackish character. Springs at the Laguna Gatuna contain chloride concentrations of 7,400 parts per million (ppm) to 27,600 ppm and sulfate concentrations of 11,000 ppm to 38,000 ppm. Aguifers do outcrop at the Laguna Gatuna as evidenced by presence of the brackish springs. Enclosed is a copy of a hydrologic assessment of the area.

### XII. H<sub>2</sub>S Release Contingency Plan

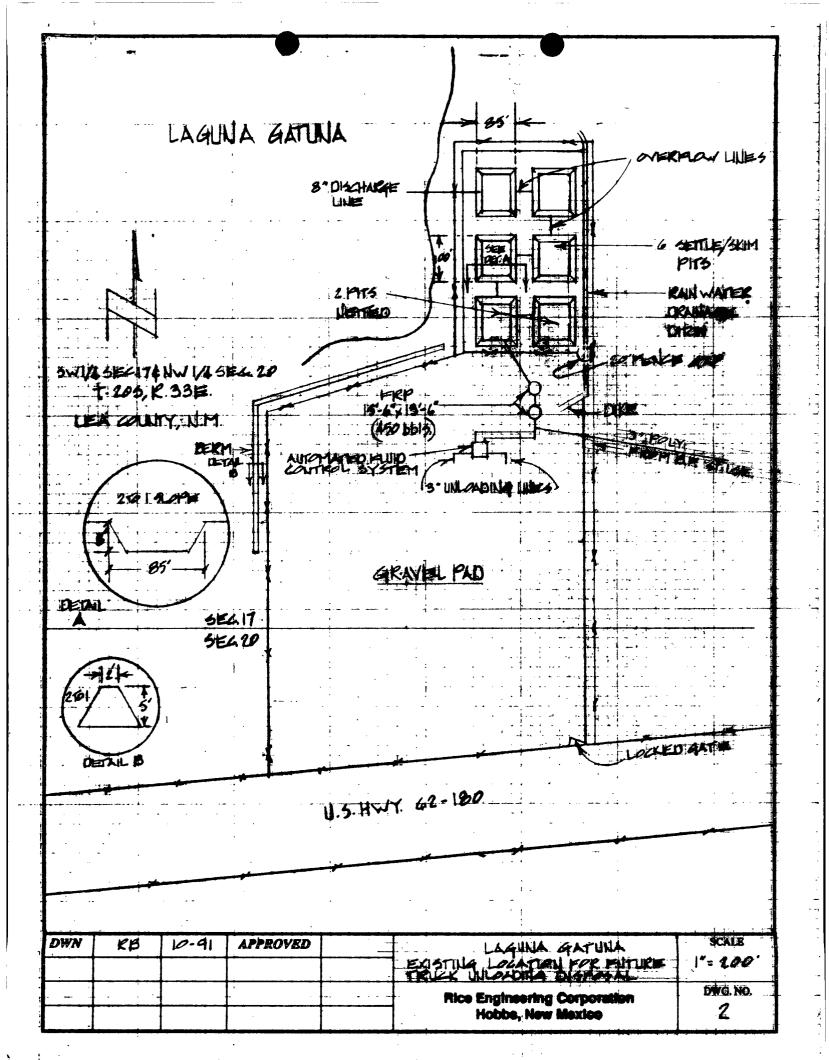
In the event of a detected release of  $H_2S$  which causes concentrations to exceed 50 ppm at the facility boundary, the truck unloading facility in Section 7 will be closed until considered safe. The line terminal facility and pit disposal areas in Section 18 will be monitored and in the event of a release causing concentrations to exceed 50 ppm at the boundary, all persons will be directed to stay away from the area until the area is considered safe for entry. Any company personnel entering into the area will be equipped with necessary monitoring and/or protection devices. No public buildings or domiciles are within one mile radius of any facility.

All personnel assigned to any site will be trained in  $H_2S$  safety and rescue. Such personnel will be equipped with  $H_2S$  monitoring devices.

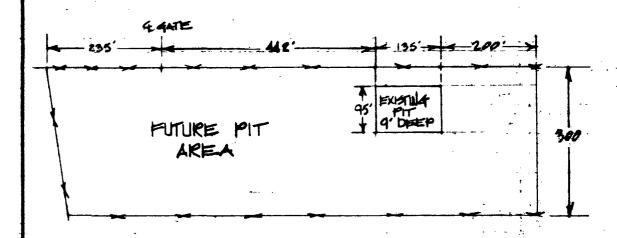
enct305.638



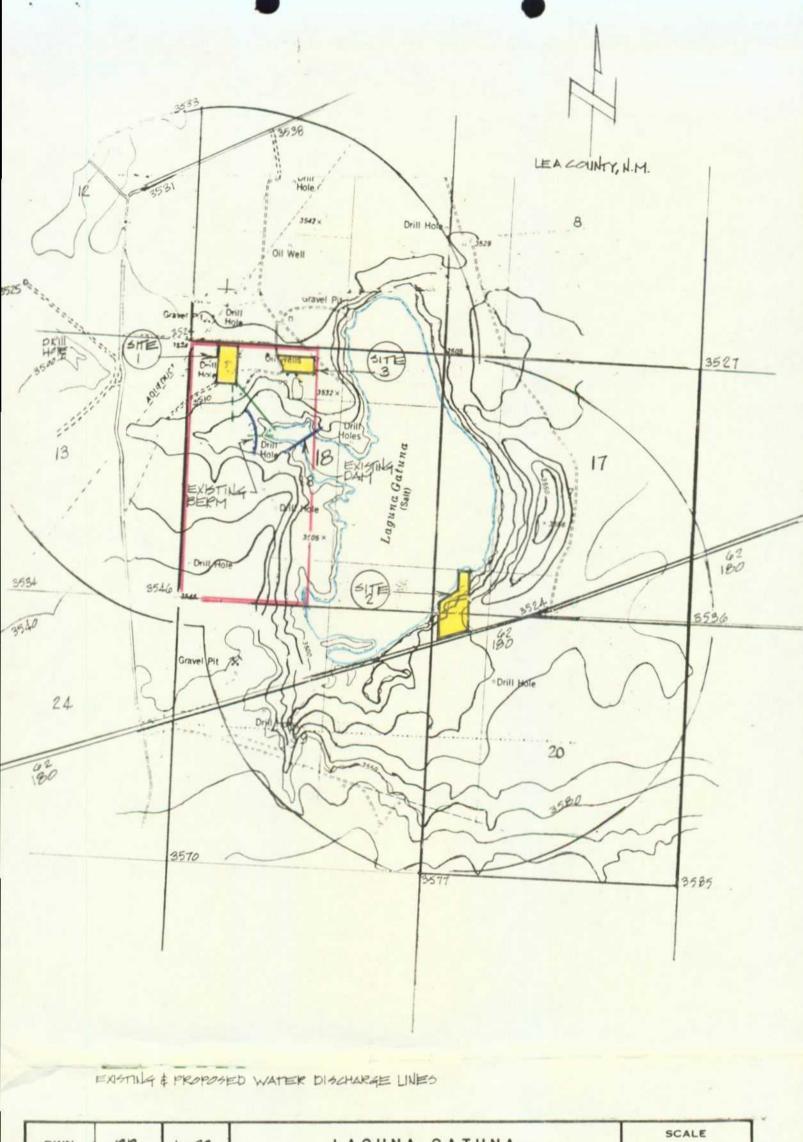
DWH RB	10-9	LAGUNA GATUNA TERMINAL FACILITY	Dug. He
		RICE EVAINEERING CORPORATION	



962.10, T. 20 3, R. 33E LEA COUNTY, N.M.



DWN	1-92	KB	APPROVED	LA	LAGUNA GATUNA	SCALE
				SOLIDS TR	EATING & BURIAL AREA	" = 200°
				Rice E	ngineering Corporation	DWG. NO.
					Great Bend, Kaneas	3



DWN.	KB	1-92	LAGUNA GATUNA	SCALE
	-		TERMINAL & UNLOADING FACILITIES	
			RICE ENGINEERING CORPORATION	DWG. NO.
			HOBBS, NEW MEXICO	4

ROUGH DRAFT

# HYDROLOGIC ASSESSMENT OF THE SALT LAKES AREA WESTERN LEA COUNTY, NEW MEXICO

for

Pollution Control, Inc. Lovington, New Mexico

bу

Geohydrology Associates, Inc. Albuquerque, New Mexico.

T. E. Kelly

May 1984

### CONTENTS

CONTENTS	DRAFT
ROUGE	Page
INTRODUCTION	1
GEOLOGY OF THE PROJECT AREA	2
Geologic Structure	2
Dewey Lake Redbeds	15
Dockum Group, Undifferentiated (Triassic)	16
Alluvium and Playa Deposits	<b>1</b> 7
Ogallala Formation	17
GROUND-WATER MOVFMENT	19
WATER-QUALITY DATA	26
SITE SUITABILITY	27
CONCLUSIONS	30
REFERENCES	32
APPENDICES	34

ILLUSTRATIONS

ROUGH DRAFT Figure 1.--Map of southern Lea County showing location of project area----3 2.--Diagrammatic section of Laguna Gatuna showing geologic features-----3.--Water-table contour map in vicinity of Laguna Gatuna and other salt lakes-----25

4.--Detailed map of Laguna Gatuna showing location

of Pollution Control, Inc., facilities-----

28

### PLATE

Salt Lakes area, western Lea County, prepared by Ed. L. Reed, consulting hydrologist, 2-69.

### TABLES

ROUGH DRAFT

Рa	ge
70	X-

Table	1Sample logs and descriptions of test holes in the project area			
	2Records of wells in vicinity of Laguna Gatuna	20		

HYDROLOGIC ASSESSMENT OF THE SALT LAKES THEA,
WESTERN LEA COUNTY, NEW MEXICO

· by

### Geohydrology Associates, Inc.

In February 1969, Pollution Control, Inc., of Hobbs, New Mexico, requested that a hydrologic study be conducted in the vicinity of the salt lakes in western Lea County, New Mexico. The study was conducted by Ed L. Reed of Midland, Texas. The purpose of this study was to determine the suitability of Laguna Gatuna, Laguna Plata, and Laguna Tonto as sites for disposal of oil-field brine. The results of the work by Mr. Reed were presented on a single illustration (Plate 1), and his interpretations were largely contained in his testimony before the New Mexico Oil Conservation Commission. This testimony and cross examination were presented at the March 19, 1969, regular hearing of the Commission, Case No. 4047.

Approval of the application was granted by the Commission on April 16, 1969, as Order No. R-3725 (Appendix A).

In December 1983, Pollution Control, Inc., requested that Geohydrology Associates, Inc., of Albuquerque, New Mexico, review that original work of Mr. Reed and prepare an update of that work. The purpose of this study was (1) to provide documentation for expansion of the original disposal system, and (2) to request a variance in order to dispose of other oil field waste products in addition to brine.

The present study was based on a thorough literature and file search of existing data; it also drew heavily from earlier reports by Geohydrology Associates, Inc. (GAI) which were prepared for the Bureau of Land Management, the Sandia Corporation, and other clients. A field reconnaissance was made which included a visual inspection of the area of Ts. 19 and 20 S., Rs. 32 and 33 E. Well data was collected for a somewhat larger area (fig. 1). An analysis of these data and the resulting conclusions are presented in this report.

### GEOLOGY OF THE PROJECT AREA

A number of studies of the geology of western Lea County have been made. These include the work by King (1942), Vine (1963), and Brokaw and others (1972). Studies related to water resources in the area include Hendrickson and Jones (1952), Nicholson and Clebsch (1961), and Geohydrology Associates, Inc. (1978, 1978a, 1979). Mercer and Gonzalez (1981) and Mercer (1983) evaluated the hydrologic conditions in the vicinity of the Waste Isolation Pilot Plant (WIPP) which is located only a few miles south of the project area.

There are three formations in the vicinity of the salt lakes and Laguna Gatuna that are directly concerned by this study. These are the Dewey Lake Redbeds, the Triassic deposits, and the surficial alluvial material (fig. 2). In addition, imported water from the Ogallala Formation is widely used in the project area.

Logs of test holes drilled in the area are included in Table 1.

### Geologic Structure

The basic tectonic structure of the salt lakes area is a simple homoclinal dip of about 20 to the east which developed mainly in pre-Pliocene

# ROUGH DRAFT

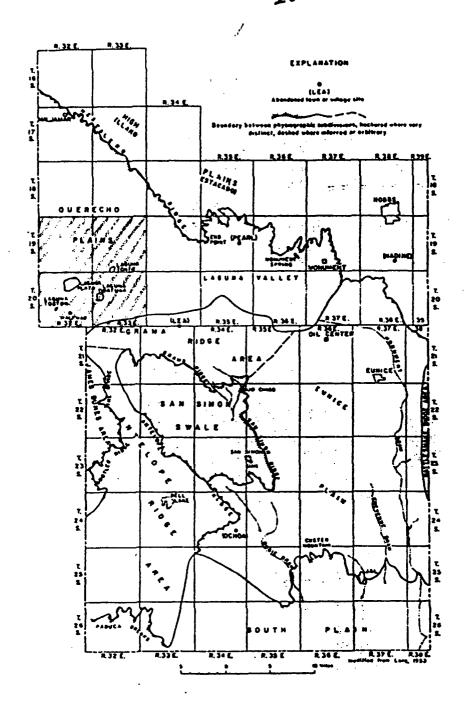


Figure 1.--Map of southern Lea County showing location of project area.

ROUGH DRAFT

A.

The Debusin Log. meight Broken. Log. Rallede.

Figure 2, - Diagrammatic section of Laguna Gatuna showing geologic features

Table 1.--Sample logs and descriptions of test holes in project area.

Top and Thickness figures are given in feet.

### Well 19.21.29.32; drilled November 8, 1978.

Тор	Thickness	Description
0	11	caliche, white, moderate to strong formation
11	19	<pre>sand, brown-buff, unconsolidated aeolian, medium to fine texture</pre>
30	10	sand, buff, fine texture, weakly consolidated
40	10	as above, but lighter in color and has some silty laminae, small caliche nodules
50 _	10	shale, maroon, clayey, has greenish gray inclusions (elongated), concentrated along bedding, slightly moist
<b>60</b>	10	as above, but fewer greenish inclusions and contains rounded limestone fragments (aphanitic, red)
70	10	shale, varigated red-buff, very clayey, also has limestone fragments mentioned above
80	10	limestone, crystalline (fine), mottled maroon to gray, has a few laminae of grayish-green, silty shale
90	10	limestone, fine crystalline, silty, maroon, has some greenish gray silty shale laminae and some minor clayey shale (red) laminae

### Total Depth - 100'

Wet sediments encountered at 50'
Bailing test - dry?
Casing perforated - 80-100' below LSD
Footage subtotal - 2,610'
Footage subtotal - 2,510'
Dry, March 15, 1979

Table 1, continued.

Well 20.31.2.34; drilled November 13, 1978.

Тор	Thickness	Description
0	6	sand, buff, medium-fine texture (aeolian)
0 6	6 6 8	caliche, white medium formation
12	8	sand, brownish-buff medium-fine texture, secondary carbonate cement
20	10	shale, reddish brown, clayey
30	10	shale, brown, silty, has a bed of green silty shale
40	10	shale, reddish brown, silty
50	10	shale, brown, silty, has greenish gray inclusions
60	. 10	shale, maroon, silty, has clayey laminae, greenish gray laminae
70	10	shale, brown, silty
80	15	shale, maroon-brown, silty
95	8	limestone, mottled gray-white, red, fine crystalline
103	8 7	shale, brown, clayey-silty greenish gray inclusions
110	20	shale, brown, clayey
130	10	as above, but with minor laminae of green silty shale
140	10	shale, reddish brown, silty-sandy, has a bed of green silty shale, slightly moist
150	10	sandstone, brown, medium-fine texture, calcareous cement

Total Depth - 160'

Bailing test - estimates less than 1 gpm Encountered moist sediments - 145' below LSD Water level - 150' below LSD Measurement: January 19, 1979: Water level - 137.0' below LSD

Table 1, continued.

Well 20.31.17.33; drilled November 14, 1978.

Top	Thickness	Description
0	12	caliche, white-gray medium to strong formation
12	9	sand, brown, medium-fine texture, calcareous cement
21	11	shale, reddish brown silty
32	8	shale, brown, silty with clayey laminae
40	9	shale, brownish red, clayey, with silty laminae and greenish gray silty laminae
49	11	shale, brown, clayey, has greenish gray laminae and is fissile with micaceous partings
60	. 10	shale, reddish brown, clayey
70	18	shale, dark brown, very clayey, has chloritic partings, has laminae of green clayey shale
88	20	shale, brown, silty, has greenish gray inclusions
108	20	as above, but more clay
128	20	as above, but has laminae of greenish-gray silty- clayey shale
148	12	shale, reddish brown, silty, has clayey laminae
160	10	as above, but no clay
170	10	shale, brown, silty, has clayey laminae, has green clayey laminae, has fine crystalline gray anhydrite laminae
180	10	shale, reddish brown, silty has some green inclusions has some laminae of clear satin spar gypsum
190	10	shale, reddish brown, clayey, has some fine crystalline gray anhydrite
200	10	shale, reddish brown, silty, has greenish gray
210	20	as above but has some gray time crystalline annyulice
230	10	as above, but has some greenish gray inclusions and some clayey laminae

Total Depth - 240'

Bailing results - estimates ½ gpm Casing perforations - 220-240' below LSD

Measurement: March 1, 1979: Water level - 227.0' below LSD

Well 20.31.27.24; drilled November 1, 1978.

Тор	Thickness	Description
0	4	sand, brownish-buff, fine to medium
0 4	8	strong caliche formation forms thick continuous bed
12	16	sand, dark brown, medium texture, slightly calcareous from overlying carbonate mineralization
28	12	as above, but less calcareous and finer texture
40	11	shale, dark reddish brown, very clayey
51	10	sandstone, greenish gray, fine to medium texture, with a lens of very clayey green shale
61	10	as above, but with lenses of mottled brown and green fine sandstone
71	9	shale, reddish brown, texture mostly coarse silt but with lenses of very clayey brown shale
80	10	as above, but with no clayey lenses
90	20	shale, silty, reddish brown. minor clayey laminae
110	14	shale, brownish red, silty with clayey laminae
124	7	shale, reddish brown, clayey, slightly silty
131	10	shale, reddish brown, silty
141	9	shale, reddish brown, silty with some clayey laminae and some greenish gray silty laminae

Total Depth - 150'

Casing perforated - 130-150' below LSD

Bailing test - 3-4' water in hole after casing placement-bailer removed it in 4 trips (producing less than 1 gpm)

Measurement: February 28, 1979: Water level - 114' below LSD

Well 20.31.30.44; drilled October 31, 1978.

Top	Thickness	Description
С	10	<pre>sand, caliche, very strong, constituting major volume of sample, buff</pre>
10	10	sandstone, reddish brown, calcareous, calcite cement from strong caliche profile above
20	7	sandstone, fine to medium texture, mottled brownish red to gray (gray grains inside red) non- calcareous
27	21	as above, but containing minor lenses of red silty shale and greenish-white siltstone
48	3	shale, silty, bluish-green
51	3 8	resumes characteristics of silty sandstone, see above
59	11	dolomitic sandstone, silty, mottled brown to greenish gray; thin lenses show vigorous effervescense
70	.10	silt, reddish brown, unconsolidated except minor lenses which have some clay and are darker in color, slightly calcareous
80	20	siltstone, reddish brown, slightly calcareous, moderate consolidation
100	10	shale, red, silty, with some minor laminae of greenish gray shale (silty)
110	8	shale, mottled brown to gray, silty with notable laminae of dark reddish brown zones of very clayey composition
118	17	silt, reddish brown, very loosely consolidated
135	3	shale, brown, very clayey
143	7	shale gravish, green, clayey, loosely consolidated in silt strata
150	50	shale, reddish brown, very clayey
200	10	shale, dark brown subequal amounts of silt and clay with some thin layers of green claystone
210	10	shale, brown, silty
220	10	as above, but containing minor lenses of green siltstone
230	10	shale, brown, silty
240	10	as above, but with minor lenses of green siltstone
250	20	shale reddish brown, clayey thin lenses of green siltstone, traces of satin spar gypsum concentrated in bedding (white to clear)
270	10	as above, but with traces of selinite gypsum (clear)
280	20	shale, reddish brown, clayey, laminae of satin spar gypsum, has a small number of limestone fragments (white)
300	8	shale, red, silty has thickish laminae of satin spar gypsum and minor amounts of greenish gray anhydrite, fine crystalline
308	12	shale, brownish red, clayey small amounts of greenish gray anhydrite
Total	Depth - 320'	3. 4. 4.m. 4. 4. 4. 4. 4. 4. 4. 4. 4. 4. 4. 4. 4.

Casing perforated - 300-320' below LSD Water standing in well upon completion - 3-4' (316' below LSD) Bailing test - negligible

Measurement: February 27, 1979: Water level - 228' below LSD

Well 20.32.17.13; drilled November 8, 1978.

Top	Thickness	Description
0	3	sand, fine buff-brown aeolian, 3" organics
3	10	calcareous ooze, white (lacustrine)
13	7	as above, but with sand laminae, calcified (caliche)
20	15	sandstone, brown, fine texture, loosely consolidated
35	5	shale, brown, sandy, silty, has gypsum, selenite and fine crystalline (gray)
40	10	shale, reddish brown, clayey with silt, has green clayey laminae
50	10	shale, reddish brown, silty with clay, has green silty laminae
60	23	as above, but reddish color
83	7 .	shale, brown, silty, has greenish-gray silty laminae
90	10	shale, brown, sand (fine)

Total Depth - 100'

Casing perforated - 20-40' below LSD Bailing test - estimates 15 gpm Encountered water at 18' below LSD Water very salty (maybe with potassium)

Measurement: February 28, 1979; Water level - 9' below LSD

Well 20.32.22.33; drilled November 8, 1978.

Top	Thickness	Description
0	3	sand, brownish-buff, medium-fine texture (aeolian) 6" organic profile
3	9	caliche, white, medium to strong formation
12	18	sand, pinkish buff, medium-fine texture, calcareous cement
30	10	shale, brown, clayey with laminae of greenish-gray medium crystalline, anhydrite
40	20	shale, brown, silty
60	. 10	shale, red-brown, silty, clayey, has minor amount thin laminae of green silty shale
70	10	as above, but no green shale
80	20	shale, red-brown, clayey with laminae of green clayey-silty shale
100	1 <b>C</b> -	as above, but no green shale
110	30	shale, brown, silty
140	10	shale, brown-silty, clayey, has laminae of gray silty shale
150	10	shale, brown, clayey, has laminae of greenish gray silty shale
160	10	shale, reddish brown, silty-clayey, has greenish gray inclusions, has small nodules of maroon limestone

### Total Depth - 170'

Driller encountered water at 35' (probably perched brine from Laguna Toston)

Casing perforated - 150-179' below LSD Bailing results - estimates 12-15 gpm

Tastes fresh

Measurement: February 28, 1979: Water level - 30' below LSD

Table 1, continued.

Well 20.32.31.13; drilled November 8, 1978

<u> 100</u>	Thickness	Description
Ó	10	sand, buff medium to fine texture, moderate caliche formation
10	13	sand, brown-buff, fine to medium texture, leached carbonate
23	13	shale, reddish brown, silty with clayey laminae
36	4	shale, greenish gray, silty, sandy
40	. 30	shale, brown, silty-clayey shale, reddish brown
70	10	silty-clayey, has a bed of greenish-gray siltstone
80	. 20	shale, brown, clayey
100	20	as above, but more silt
120	30	shale, brown, clayey, interbedded with limestone, brown, fine crystalline
150	10	shale, brown, clayey-silty
160	10	as above, but reddish brown
170	. 10	shale, brown, silty-clayey, has zones of superior cementation along bedding, probably calcite
180	10	shale, brown, clayey, fairly cohesive from cementation
190	10	shale, brown, varigated clayey to silty, has greenish gray inclusions
200	20	shale, greenish to gray, silty, interbedded with brown silty shale
220	20	shale, reddish brown silty zones of calcite cementation along bedding
240	10	shale, reddish brown, clayey

### Total Depth - 250'

Water level-drilled dry, never encountered moist sediments Casing perforated - 230-250' below LSD Bailing results - bailing showed about 8' water in hole (probably residual from drilling) - dry; DTW 135.12' March 15, 1979

Well 21.29.2.14; drilled November 16, 1978.

Top	Thickness	Description
0	5	sand, brown-buff, medium-fine texture (aeolian) has 3-6" of organics
5	15	caliche, white, formed in sand, medium formation
20	10	sand, brownish buff, medium-fine texture, sub- angular to rounded quartz grains
30	10	as above, but has some pebbles (quartz) 6 mm in diameter
40	20	as above, but pebbles increase in size to 1.5 cm
60	10	sand, reddish brown medium-fine small quartz pebbles
70	10	shale, red clayey
80	· 20	shale, red, clayey-silty, has laminae of greenish gray clayey shale and greenish gray inclusions
100	20	as above, but no inclusions green-gray laminae
120	10	shale, red, silty with clayey laminae
130	20	as above, but has greenish gray inclusions
150	10	shale, brownish-red, silty, clayey
160	10	shale, reddish brown, clayey, has greenish gray inclusions
170	10	as above, but silty
180	10	shale, brown, clayey, has greenish gray inclusions
190	20	as above, but reddish brown and silty
210	10	shale, brown, silty, has same greenish gray inclusions
220	10	as above, but very loosely consolidated
230	10	shale, red, silty
240	20	as above, but has some clay, has greenish gray inclusions
260	34	gypsum, light gray, fine crystalline
294	21	shale, red, silty-clayey, has greenish gray inclusions
315	25	gypsum, white, aphanitic, has laminae of silty red shale
340	10	as above, but gypsum is light gray
350	16	above, but no shale
366	24	shale, light red, silty, has laminae of gypsum, light gray to white, fine crystalline, gypsum in small rounded fragments, well mixed
390	40	as above, but redder in color (mixture of red clayey shale and gypsum)
430	30	mixture of red shale, silty-clayey, gypsum, soft dark gray, fine crystalline, also has selenite gypsum in small amounts

Total Depth - 460'

Bailing results - estimates more than 20 gpm Casing perforated - 420-460' below LSD Water level - 350' below LSD Water tastes salty

Measurement: March 1, 1979: Water level 273.0' below LSD

Well 21.31.3.22; drilled November 9, 1978.

Top	Thickness	Description
. 0	18	caliche, white, moderate to strong formation
18	12	sand, brown-buff, medium-fine texture,
		calcareous cement
30	10	shale, buff-red, silty, calcareous laminae
40	<sup>-</sup> 10	shale, red, clayey with some silt
50	10	shale, mottled red, greenish gray, has sandy laminae but mostly silt
60	. 10	shale, brown, silty, with clayey laminae, has greenish gray inclusions
70	10	shale, reddish, brown, silty, has good cement, some laminae (calcite) (these laminae are gray-red)
80	- 10	as above, but subequal amounts of silt and clay
90	10	shale, red, silty, ahs clayey laminae
100	20	shale, brownish red, silty, has laminae with
		calcite cement
120	10	as above, but more calcite zones (mineralized
		with crystalline calcite)
130	10	shale, brownish red, silty
140	10	as above, but has clayey laminae
150	10	shale, brownish red, silty, has calcite mineralized laminae
160	10	shale, red, clayey, has laminae of silty greenish gray shale
170	10	shale, reddish brown, silty
180	10	as above, but has laminae of greenish gray shale
190	10	shale, brownish red, subequal amounts of silt and clay, has greenish gray laminae, silty

Total Depth - 200'

Driller encountered water at 150' below LSD Casing perforated 140-160' below LSD Bailing results - estimates 8 gpm Water level on completion - 128' below LSD Measurement: February 28, 1979: Water level - 142' below LSD

time. It is superimposed on Permian and Delaware basins. The more complex surficial structure near Nash Draw exerts a more immediate effect on the hydrology of the area. This area is typified by collapse of the Rustler Formation and overlying beds due to solution within the Rustler and at the top of the Salado Formation. Beds of the Rustler generally dip toward the larger depressions (Vine, 1963). In addition, hydration of anhydrite to gpysum causes localized doming. Sinkholes and domes influence the direction of ground-water movement, which in turn controls the development of collapse structures.

It is possible that the salt lakes of Laguna Gatuna, Laguna Plata,

Laguna Tonto, and Laguna Toston occupy collapse structures associated with a
northeastward extension of the "brine aquifer". Robinson and Lang (1938)

described the "brine aquifer" as an important conduit of natural brine beneath
Nash Draw. However, recent work at the WIPP site has shown that ". . . along
the eastern side, the boundary is very irregular and in places extends farther east than previously indicated by Robinson and Lang " (Mercer, 1983, p. 50).

Likewise, these depressions are located in a geographic location very similar
to other depressions, sinks, and collapse structures in southeastern New Mexico
and west Texas (Anderson, 1981, fig. 2). A hydraulic connection between the
"brine aquifer" and the salt lakes would explain the origin of the depressions
and the presence of highly mineralized spring discharge along the boundary of
Laguna Gatuna and Laguna Plata.

### Dewey Lake Redbeds

The Dewey Lake Redbeds underlie all of the project area (Brokaw and others, 1972), but they have not been identified in surface exposures. These deposits consist entirely of siltstone and fine-grained sandstone. The reddish-orange

to reddish-brown sandstone and siltstone are thinly laminated with very small scale cross-laminae. Ripple marks are present in the upper part of the formation. No evaporite deposits have been reported in the Dewey Lake sequence which is locally 500 feet thick. Although the Redbeds are not generally considered to be an aquifer, it is possible that some wells located north and east of the salt lakes may produce small quantities of water from these deposits.

### Dockum Group, Undifferentiated (Triassic)

The Dockum Group unconformably overlies the Dewey Lake Redbeds (Brokaw and others, 1972). In some areas this Group is divisible into the Santa Rosa Sandstone and the Chinle Formation; however, the distinction cannot be made in western Lea County because of lithologic similarities and poor exposures (Nicholson and Clebsch, 1961, p. 35). Reed simply referred to these deposits as "Triassic" (plate 1).

Coarse-grained clastic deposits in the Dockum Group are generally fine to coarse-grained sandstone with minor shale layers. Locally these deposits range from siltstone to conglomerate. Although red is the predominant color, white, gray, and greenish-gray sands are present. Red and green claystone may be present in the eastern part of the project area.

The Dockum Group is exposed at several locations around the perimeter of Laguna Gatuna. Some of these were originally mapped by Reed; others have subsequently been exposed by highway construction, particularly on the south and east sides of the playa.

According to Hendrickson and Jones (1952, p. 75), the Dockum Group and underlying Dewey Lake Redbeds produce water to wells in eastern Eddy County.

Also, Reed (1969) assumed that most of the wells in the vicinity of the salt lakes produce from the Triassic rocks.

### Alluvium and Playa Deposits

The surficial deposits are composed mostly of locally derived sediments, including reworked Dockum and fragments of caliche and gypsum. Dune sands are common in the northern part of the project area and along the boundaries of the salt lakes. The sand is fine to medium grained and unconsolidated; it is present throughout the area, but in most areas has been stabilized by mesquite and other vegetation.

Playa deposits generally consist of fine sand, silt, and clay that has been reworked by intermittent lakes that are present after heavy rainfall.

The interior of Laguna Gatuna and Laguna Plata contain abundant gypsum crystals and other salt deposits.

There is no evidence that the alluvium or playa deposits are water bearing. According to Nicholson and Clebsch (1961, p. 59), "... there does not seem to be a continuous saturated zone in the thin cover of alluvium. .. " of western Lea County. They attribute this to the limited precipitation in the area, and to the permeability of the Dockum Group which underlies the alluvium.

### Ogallala Formation

The Ogallala is the principal water-bearing formation in southeastern New Mexico and much of eastern Lea County. The western edge of the formation is locally known as The Caprock or Mescalero Ridge which is approximately 11 miles northeast of Laguna Gatuna (fig. 1). Although the Ogallala Formation is not present in the vicinity of salt lakes, water from the Formation is piped across the area by potash refineries located in Nash Draw.

As a concession for right-of-way for the pipelines, most ranch owners obtained the right to tap these water lines for normal ranching operations. The

Snyder Ranches have made extensive use of this water source north of Highway 62-180. According to Mr. Smith at the Bingham Ranch, all of the water used south of the highway is obtained from the Kerr-McGee pipeline. Consequently, many of the windmills in the area are no longer in use and have fallen into disrepair. Some of the wells in use during Reed's 1969 study are no longer serviceable.

Potable water was reported by Reed near Halfway in section 23, T. 20 S., R. 32 E., and also from two wells located in sections 17 and 18, T. 19 S., R. 33 E. However it should be noted that the wells at Halfway have been abandoned since the Reed report has been completed. The two wells in sections 17 and 18 are used only for stock watering.

In his testimony before the Oil Conservation Division, Case No. 4047 on March 19, 1969, Mr. Larry C. Squires stated that there was no fresh water in the vicinity of the salt lakes.

Although somewhat brackish water can be used for stock watering, most of the water near Laguna Gatuna would be classified as brine. Spring samples collected by Reed contained sulfate concentrations greater than 11,000 ppm (parts per million) and chloride concentrations greater than 7,400 ppm. One spring at Laguna Gatuna (Reed's No. 55) contained 37,979 ppm sulfate and 27,657 ppm chloride. A 1969 sample from the bed of the playa contained 125,000 ppm sulfate and 158,000 ppm chloride.

The origin of these brines in Laguna Gatuna are difficult to explain. Although potash refiners dispose of saturated brines in Williams' Sink, Laguna Plata, and Laguna Toston, the direction of ground-water flow would carry the potash waste away from Laguna Gatuna. Laguna Gatuna is more than 20 feet higher than Laguna Toston and at least 60 feet higher than Laguna Plata and Williams' Sink.

#### GROUND-WATER MOVEMENT

The regional flow systems in Nash Draw, west of the project area, have been described by numerous workers, including Robinson and Lang (1938), Cooper and Glanzman (1971), Brokaw and others (1972), and Geohydrology Assoc., Inc. (1978, 1982), and Mercer (1983). Most of these studies conclude that, with some local variation, the ground-water flow in the shallow aquifers is from north toward the south. Nash Draw is one of the major flow paths. Recharge areas are the sand dunes of Chaves and Lea Counties; ground-water discharges into the Pecos River along most of its length (Geohydrology Assoc., Inc., 1978, p. 16).

Data were collected from a variety of sources in order to determine the local flow systems in Ts. 19-20 S., Rs. 32-33 E. A number of test-hole logs and water levels were obtained from an earlier study (Geohydrology Assoc., Inc., 1979) and are included in Tables 1 and 2 of this report. Land-surfacing elevations were used at well-documented springs located at Laguna Gatuna and Laguna Plata. These data were used to construct the water-level contours shown in Figure 3. Existing contour maps from outside the area were used for control where appropriate.

Most of the water-level data in T. 20 S, which includes Laguna Gatuna and other playas, shows a well defined flow system. The highest water-level elevations are present south to Highway 62-180 and in the vicinity of Laguna Tonto. The 3425-foot contour defines this area. Ground-water movement away from this contour would be west-northwest towards Laguna Plata and Williams' Sink.

This flow system is within the Dockum Group. The alluvial sediments are quite thin, as described in the preceeding section of this report. The

Table 2. -- Records of wells in vicinity of Laguna Gatuna.

Depth of Well and Depth to Water-Reported depths are given to nearest foot; measured depths are given to nearest tenth or hundredth of a foot. Aquifer-Qtal=Quaternary; Ogll=Ogallala; Trsc=Triassic; Rslr=Rustler; Dckm=Dockum; Remarks-S.C. \*Specific Conductance; est \* est \* est \* minute Location-See Introduction for explanation of well-numbering system. Trcl-Tertiary; Cplm-Capitan lime. Explanation:

Location	Well Status	Altitude (feet)	Depth of Well (feet)	Depth to Water(ft)	Aquifer	Date of Measurement	Remarks	}
18.31. 1.44432	Windmill Stock	3797	+087	460.42	Trcl	04/07/71		
12.23144		3775	. 009	435.34	Trcl	04/07/71		
14.22133		3731	400	377.30	Trel	04/06/71		
35.31324		3631	300	261.08	Trcl	04/05/71		
18.32.16.22433	Uncased open hole	3793	100	84.18	0811	03/18/68		
20.13311			270.0	179.35	Trc1	02/23/71		
22.3232	011 test	3763		434.41	Trcl	04/06/71		
34.22241	Windmill	3721		117.46	Trel	04/06/71		
18.33. 3.34133	Open cased hole	4015		60.10	Qtal	04/05/66		
3.343		4012	79	59.18	Qtal	02/19/71		-
10.23244	Domestic	4005	75	41.64	Qtal	02/09/71		-
10.44211		3985	09	41.64	0811	02/09/11		
11.4433		3986		42.40	Qtal	,02/09/71		
12,44211	Windmill	4089		137.48	Qtal	02/05/71		
13.13144	Open cased hole	3968		31.85	Qtal	02/08/71		
13.44244		3973		99.97	Qtal	02/08/71		
14.111		3965	0.04	35.8	Qtal	06/03/24		
14.1114	Windmill	3976		35.20	Qtal	02/09/71		
14.11140	Stock	3976	0.94	35.84	Qtal	03/06/68		
19.142	Stock	3820		140+	Trsc?	12/09/58		
23.23140	Open cased hole	3881	58	45.65	Qtal	02/09/71		
34.133	None	3760	200.0	177.4	Trsc	12/09/58		

Table 2, continued.

Location	Well Status	Altitude (feet)	Depth of Well (feet)	Depth to Water (ft)	Aquifer	Date of Measurement	Remarks
18.34. 1.12222 2.223333 4.11124 8.23213 11.43212 12.42333 15.24130 18.413212 20.323323 20.323333 20.323333 22.343 25.13111 25.13111 25.13111 25.13232 27.33311 25.13232	Industrial Jandustrial Copen cased hole Mindmill Industrial Industrial Mindmill Industrial Windmill Industrial	3991 4064 4064 4064 4000 3982 4015 4015 4015 4015 4020 8 3947 8 3994 3972 3955	211.0	79.70 98.03 126.78 104.20 110.78 111.01 103.28 143.30 98.92 100.19 109.92 94.88 97.16 110.42 60.40	0g11 0g11 0g11 0g11 0g11 0g11 0g11 0g11	03/06/61 02/04/71 02/04/71 02/04/71 02/19/71 02/19/71 02/05/71 02/05/71 03/09/66 01/08/75 03/09/66 02/05/71	-
19.31.27.21144 27.23344 28.330 28.333 28.3332 28.33433 31.132 33.110 33.142 19.32. 8.200 34.421424 34.42322	4 Open cased hole 6 011 test Domestic 7 Stock Abandoned Domestic/Stock Stock Stock Stock Community Domestic/Stock Domestic/Stock	3573 3480 3442 3442 3442 3450 3455 3550 3560 3560 3565	200.0 180 4103 160 250 250 4190 575 575 485	142.71 143 180 110.07 186.87 108.21 632.55 100.7 140 365.3 651.25 252.49	Trsc Trsc Cplm Dckm Trsc Cplm Trsc Trsc Trsc Trsc Trsc Trsc Trsc	02/01/71 02/01/71 11/29/48 12/15/77 02/01/71 05/ /73 11/29/48 09/30/59 12/09/58 09/ /74 01/28/71	Abandoned S.C. 2200 Abandoned North well of 3

Table 2, continued.

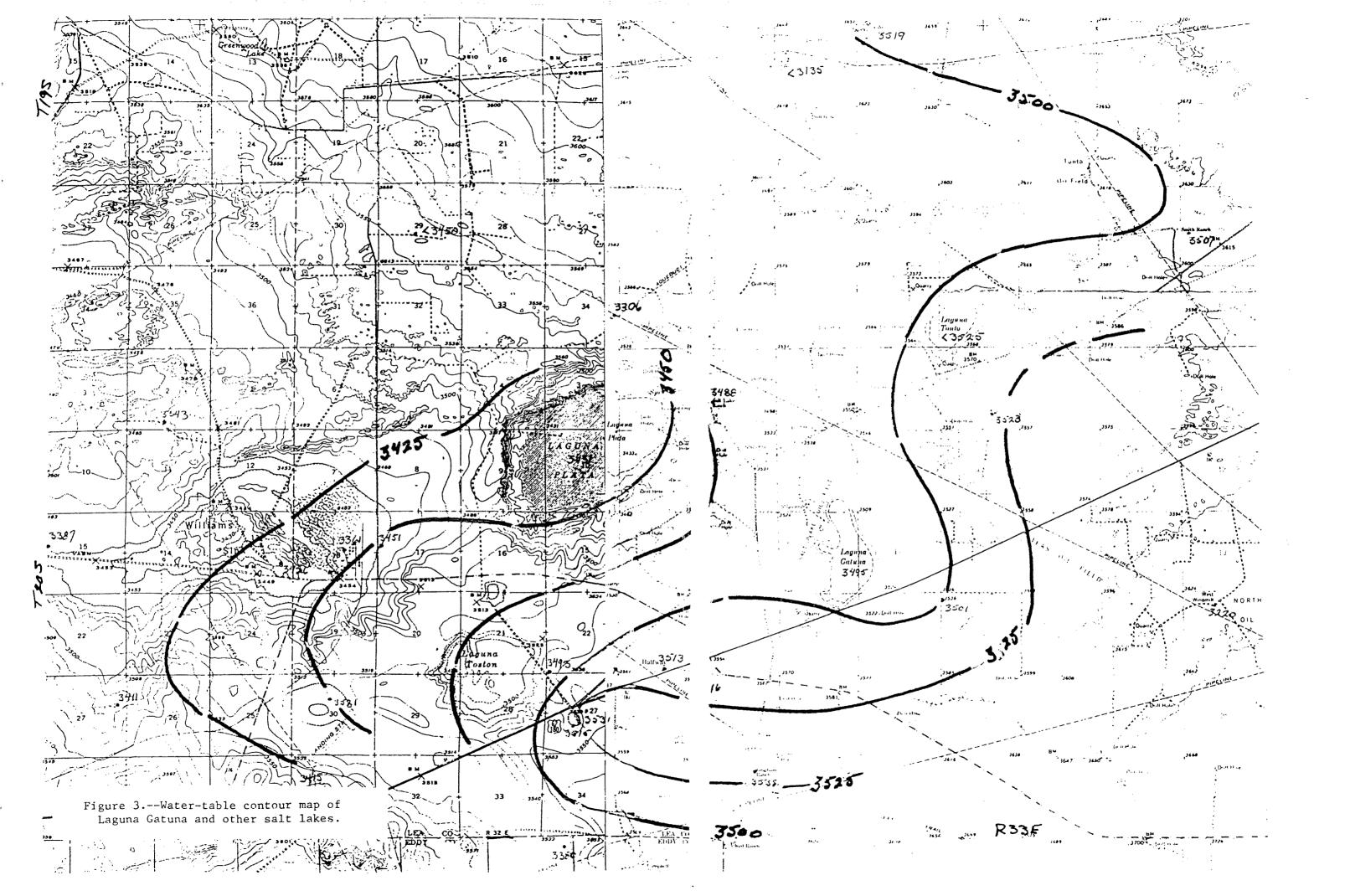
Location	Well Status	Altitude (feet)	Depth of Well (feet)	Depth to Water (ft)	Aquifer	Date of Measurement	Remarks
19.33. 5.12322 17.11224 18.133223 26.244	Stock Stock Oil test Stock/Domestic	3710 3650 3635 3600	131.0 800 101	299+ 117.67 211.86 92.9	Trsc Trsc Trsc Qtal	12/09/58 01/28/71 01/28/71 07/01/54	Abandoned
19.34. 6.34143 9.114 16.33410 31.131	Stock windmill Stock Oil test Stock	37777 3790 3755 3625	33	234.71 28.6 243.91 58.6	Trsc? Qtal	03/18/68 06/03/54 03/19/68 11/17/65	Abandoned Abandoned Yield-6gpm est; Reported dry 01/12/71
20.31.13.42 13.440 15.130 16.24	Stock;abandoned Stock Stock Stock	3427 3450 3458	32.5 70.7 110.0	203.8 63.1 61.0	Dckm? Dckm? Dckm?	10/05/77 12/22/48 12/22/48 10/05/77	S.C. >8000; 70°F Abandoned
20.32. 1.322 18.233 23.43312	Stock Industrial Commercial	3510 3450 3551	30 400	21.8 89.2 38.03	Qtal Trsc Trsc	01/25/84 03/24/54 01/25/84	Water not potable
24.33333 25.111 27.144 27.32322	Windmill Windmill None Stock Stock	3555 3555 3543 3530 3530	65 67.5 25 75	38.72 35.07 12.3 15.30 16.55	0g11 Qtal 0g11 0g11	01/25/84 12/16/77 06/11/54 03/29/65 02/02/71	Abandoned .
30.142 36.214 36.21424 36.221	None Domestic Windmill	3530 3588 3588 3588	60 65 53.7	9.9 46.6 48.46 45.31	Qtal Qtal Qtal	06/11/54 06/06/55 01/25/84 12/16/77	Abandoned Abandoned; S.C. 2000

Table 2, continued.

Location W	Well Status	Altitude (feet)	Depth of Well (feet)	Depth to Water (ft)	Aquifer	Date of Measurement	Remarks
20.33. 4.43211 5.34321 18.12322 21.111 24.122 24.121	Used windmill Oil test Open hole Windmill Stock	3556 3550 3520 3536 3630 3633	58 .680 47.5 700 <del>+</del> 676	33.19 278.57 249.88 35.42 300+ 413.55	Og11 Trsc Trsc Trsc Trsc	03/19/68 02/02/71 03/19/68 01/25/84	Plugged 1/25/84 Abandoned Inoperative Used
20.34. 4.44434 17.334 22.222333 22.223 21.31. 2.221 7.331 18.411	Stock Stock Stock Stock Abandoned	3635 3635 3656 3656 3559 3350	200+ 200 250 235 31.87 367.0	172.19 140 214.98 30.15 192.1 158+	Trsc Trsc Trsc Trsc Rslr	02/03/71 07/01/54 02/03/71 10/19/77 09/14/72 03/17/76	S.C. 3500 S.C. 3200
21.32. 6.11131 21.33. 2.231 2.24233 2.42234 2.42233 2.42233 2.42233 2.4223 11.11144 18.112 18.11410 18.11410	Stock Domestic Domestic Open hole Open cased hole Used windmill Stock/Domestic Stock	3597 3810 3792 3785 3785 3768 3800 3900 3892 3855	1150 120 100 100 195 123	44.04 104.01 104.01 85.32 79.13 83.20 72.9 144.52 148.43 117.50	0g11 Trsc. Trsc. Trsc. Trsc. Og11 0g11 0g11	02/03/71 11/16/65 11/16/65 02/04/71 06/28/54 06/21/54 11/16/65 02/04/71	Used windmill Abandoned Abandoned

Table 2, concluded.

Date of Remarks Measurement	02/04/71 02/04/71	02/10/71 06/30/54 02/10/71 Used windmill	1943 02/10/71 1954	09/ //4 02/10/71 02/19/71 02/04/71
Aquifer Dat	021 Trsc 02/	Trsc 02, 0g11 06, 0g11 02,	Trsc 02/ 0811	
Depth to Water (ft)	58.95 178.62	68.92 105.8 105.64	200 99.61 150	1151.96 99.61 64.45
Depth of Well (feet)	224	120	335 196 220	125 196 92
Altitude (feet)	3666 3688	3662 3705 3706	3655 3677 t1c3660	3717 3655 3677 3641
Well Status	Used windmill Used windmill	Used windmill Stock Stock	Domestic 3655 Open cased hole 3677 Industrial/Domestic3660	Domestic Open cased hole Used windmill
Location W	21.33.25.42322 28.12443	21.34. 1.24122 8.422 8.42341	13.324 21.13141 23.223	23.310 24.222 25.13141 33.233441



ground-water movement would occur through the more permeable zones in the Dockum deposits, and in particular through the Santa Rosa sandstone.

Laguna Gatuna and Laguna Plata are natural ground-water discharge areas.

Both lakes have intermittent springs along their borders, indicating that
the bed of each lake is below the natural water table. No springs have been
found at Laguna Tonto.

A second flow system is indicated by some of the water levels in the area north of Laguna Plata in T. 19 S. These water levels seem to be associated with a deeper flow system, perhaps in the Rustler Formation. Anomalous depths also were reported for wells in section 24, T. 20 S., R. 33 E. and section 3, T. 21 S., R. 32 E.

Water-quality data indicate that a deep, brine flow system exists also.

This is discussed in the following section of this report.

### WATER-QUALITY DATA

Reed (1969) collected chemical data at 14 different sites (Appendix B).

These included samples from wells, springs, and soil samples from playas.

The electrical conductivity was measured at several sites also. From these data, Reed concluded that there was very little potable water in the region.

The concentration of brine cannot be attributed to contamination from oil wells located near Laguna Gatuna. Work by Reed has shown that a water sample from a nearby oil well contained only 2,250 ppm sulfate and 5,900 ppm chloride, considerably less than found in springs and the lake itself. Evaporation of fresh water runoff into the playa would result in an increase in salt concentration, however this could not explain the high mineralization in the springs at higher elevations than the lake bottom. Also, there is no known source of brine up-gradient (or southeast) of Laguna Gatuna.

In the preceding section describing Geologic Structure, the similarity of Laguna Gatuna with other collapse structures in the region was pointed out. If Laguna Gatuna and the other playas in the area are the result of collapsing strata, normal faulting would be a consequence. These fault zones would serve as conduits for highly mineralized water in the brine aquifer. This seems to be the most plausible explanation for brine in Laguna Tonto. Inasmuch as there are no springs discharging into that lake, and it has a relatively small drainage area from which surface drainage would enter, a deep-seated brine source with movement along fault zones could account for brine on the lake surface.

#### SITE SUITABILITY

As shown in Appendix A (page 4), the original authorization for disposal of oil-field brines was granted to Mr. Larry C. Squires for the use of Laguna Plata and Laguna Gatuna. The application to utilize Laguna Tonto was denied. Since that time Pollution Control, Inc., has operated at a facility constructed on the northwest side of Laguna Gatuna in the north half of section 18, T. 20 S., R. 32 E. (fig. 4). Mr. Squires is President of Pollution Control, Inc. An additional facility has now been proposed for the SW4, SW4 of section 17, T. 20 S., R. 32 E. on land currently held by the Snyder Ranches under Bureau of Land Management lease BL-745.

Laguna Gatuna is a natural playa which has a surface area of approximately 383 acres within the lowest closing contour. The elevation of the bed is about 3,495 feet above mean sea level; the upper perimeter of the playa is generally defined by the 3,510-foot contour. The total drainage area for Laguna Gatuna is less than two square miles. One tributary channel enters the playa from the west directly south of the Pollution Control facility. A shorter tributary

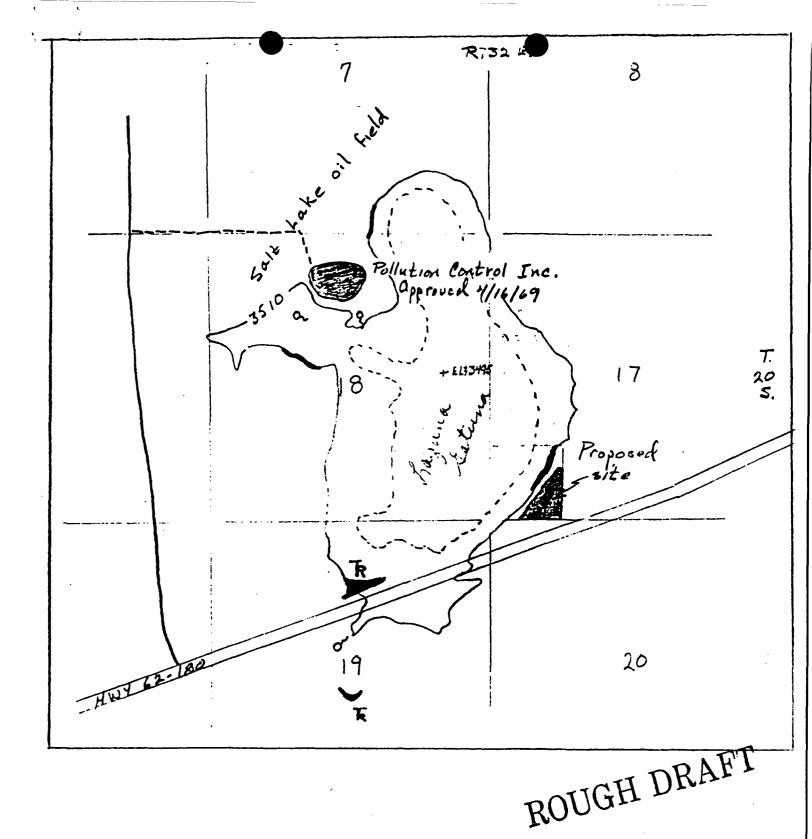


Figure 4.--Detailed map of Laguna Gatuna showing location of Pollution Control, Inc., facilities.

enters from the south in section 19. Assuming that only 10 percent of the annual precipitation enters the playa as runoff, Laguna Gatuna would entrapabout 8,000 gallons of precipitation annually.

In most areas the steep-sided walls are covered by unconsolidated alluvium and slope wash; however there are at least five exposures of the Dockum Group. These unconsolidated sediments are composed primarily of hard reddish-brown shale and siltstone; thin laminae of very fine grained sandstone is locally present. Two exposures in sections 17 and 19 were developed by roadwork associated with Highway 62-180. These exposures show that the alluvial material is very thin; around the perimeter of the playa, the alluvial cover probably does not exceed five feet in thickness. Figure 2 is a generalized cross section of Laguna Gatuna.

The presence of well-defined springs and seeps on the rim of the playa established that Laguna Gatuna is a natural ground-water discharge point. However the springs probably fluctuate with seasonal temperatures. According to Mr. Steve Foster, Vice President of Pollution Control, Inc., the playa remains dry except during periods of heavy rainfall and runoff.

Evaporation studies have been conducted in Nash Draw to determine the loss of water from a brine solution exposed on a free water surface (Geohydrology Assoc., Inc., 1979, p. 71). These studies showed that the summer evaporation rate was 6.69 gpm (gallons per minute) per acre or 229 barrels per acre per day. The winter loss was 0.37 gpm per acre or about 13 barrels per acre per day. Inasmuch as Laguna Gatuna has a minimum surface area of 383 acres, the seasonal evaporation from the playa would be about 87,700 barrels per day during the summer and about 5,000 barrels per day during the winter.

These evaporation rates support the original estimate by Reed (1969, p. 30) that Laguna Gatuna has a disposal rate of 30,000 barrels per day. During the

winter of 1983-1984, Pollution Control, Inc., disposed of an average of about 50,000 barrels per month, and the playa remained totally dry throughout the period, according to Mr. Steve Foster. Also, the maximum disposal to date occurred in 1981 when disposal of 150,000 barrels per month was not uncommon, but this is less than 20 percent of the recommended maximum suggested by Reed and approved by the Oil Conservation Division.

During the recent field investigations conducted for this study, several wells measured in 1969 were again measured. A well located in the northwest corner of section 21, T. 20 S., R. 33 E. has shown a decline of 0.82 feet between 1969 and 1984. This well is located about one mile east of Laguna Gatuna. The water level in a well located in the northwest corner of section 25, T. 20 S., R. 32 E. declined 0.12 feet during the same period. This second well is located about one and a half miles southwest of the lake. The elevation of these water levels is higher than the elevation of Laguna Gatuna; nevertheless, this indicated that 15 years of operation by Pollution Control, Inc., has not affected the water table in the immediate vicinity of the disposal site.

#### CONCLUSIONS

- 1. Laguna Gatuna is a natural ground-water discharge point. The playa probably occupies a collapse structure associated with Nash Draw and others in the region. There is a thin blanket of alluvium covering the less permeable Dockum Group below.
- 2. The salt springs and brine associated with Laguna Gatuna are more highly mineralized than water collected from oil wells in the immediate area. There are no known salt deposits in the Dockum Group or in shallow deposits up-gradient from the playa. It is possible that the brine originates in the Rustler Formation at depth with the fault zones associated with collapse

structures acting as the conduit to the surface.

- 3. Laguna Gatuna is a suitable disposal site for as much as 30,000 barrels of brine per day.
- 4. There is no evidence to show that 15 years of operation by Pollution Control, Inc., has adversely impacted the hydrologic system in the vicinity of Laguna Gatuna. Continued operation of the existing facilities will not endanger the pre-1969 conditions.
- 5. Laguna Gatuna is a satisfactory repository for solid oil-field waste products, such as drill cuttings and drilling mud. Oil-contaminated waste products should be contained by earthern structures in order to maintain the aesthetic quality of the playa.
- 6. The proposed facility in the SW½, SW½ of section 17, T. 20 S., R. 32 E. will not adversely impact the hydrologic conditions in Laguna Gatuna provided that the combined discharge from both sites does not exceed 30,000 barrels of brine per day.

#### REFERENCES

- Anderson, R. Y., 1981, Deep-seated salt dissolution in the Delaware Basin, Texas and New Mexico: New Mexico Geological Society Special Publication No. 10, p. 133-146.
- Brokaw, A. L., Jones, C. L., Cooley, M. E., and Hays, W. H., 1972, Geology and hydrology of the Carlsbad potash area, Eddy and Lea Counties, New Mexico: U. S. Geological Survey Open-File Report 4339-1.
- Geohydrology Associates, Inc., 1978, Collection of hydrologic data, Eastside Roswell Range EIS Area, New Mexico: consultant report prepared for the Bureau of Land Management, 97 p.
- , 1978a, Ground-water study related to proposed expansion of potash mining near Carlsbad, New Mexico: consultant report prepared for the Bureau of Land Management, 127 p.
- , 1979, Water-resources study of the Carlsbad potash area, New Mexico: consultant report prepared for the Bureau of Land Management, 91 p.
- Mexico: consultant report prepared for B&E, Inc., Carlsbad, New Mexico, 11 p.
- Hendrickson, G. E. and Jones, R. S., 1952, Geology and ground-water resources of Eddy County, New Mexico: New Mexico Bureau of Mines and Mineral Resources Ground-Water Report 3, 169 p.
- King, P. B., 1942, Permian of west Texas and southeastern New Mexico, American Association of Petroleum Geologists Bulletin, v. 26, no. 4, p. 535-763.
- Mercer, J. W., 1983, Geohydrology of the proposed Waste Isolation Pilot Plant site, Los Medaños area, southeastern New Mexico: U. S. Geological Survey Water-Resources Investigative Report 83-4016, 113 p.
- Mercer, J. W. and Gonzalez, D. D., 1981, Geohydrology of the proposed Waste Isoloation Pilot Plant in southeastern New Mexico: New Mexico Geological Society Special Publication No. 10, p. 123-131.
- Nicholson, Alexander, Jr. and Clebsch, Alfred, Jr., 1961, Geology and ground-water conditions in southern Lea County, New Mexico: New Mexico Bureau of Mines and Mineral Resources Ground-Water Report 6, 123 p.
- Reed, E. L., 1969, Transcript of testimony in Case No. 4047 presented bofore the New Mexico Oil Conservation Commission on March 19, 1969, 99 p.

- Robinson, T. W. and Lang, W. B., 1938, Geology and ground-water conditions of the Pecos River valley in the vicinity of Laguna Grande de la Sal, New Mexico: New Mexico State Engineer 12th and 13th Biennial Report, 1934-1938, p. 77-100.
- Vine, J. D., 1963, Surface geology of the Nash Draw quadrangle, Eddy County, New Mexico: U. S. Geological Survey Bulletin 1141-B, p. B1-B46.

### APPENDIX A

Order of the Oil Conservation Commission, No. R-3725, Case No. 4047, dated April 16, 1969.

# BEFORE THE OIL CONSERVATION COMMISSION OF THE STATE OF NEW MEXICO

IN THE MATTER OF THE HEARING CALLED BY THE OIL CONSERVATION COMMISSION OF NEW MEXICO FOR THE PURPOSE OF CONSIDERING:

> CASE No. 4047 Order No. R-3725

APPLICATION OF LARRY C. SQUIRES FOR AN EXCEPTION TO ORDER NO. R-3221, AS AMENDED, LEA COUNTY, NEW MEXICO.

#### ORDER OF THE COMMISSION

#### BY THE COMMISSION:

This cause came on for hearing at 9 a.m. on March 19, 1969, at Santa Fe, New Mexico, before the Oil Conservation Commission of New Mexico, hereinafter referred to as the "Commission."

NOW, on this 16th day of April, 1969, the Commission, a quorum being present, having considered the testimony presented and the exhibits received at said hearing, and being fully advised in the premises,

#### FINDS:

- (1) That due public notice having been given as required by law, the Commission has jurisdiction of this cause and the subject matter thereof.
- (2) That effective January 1, 1969, Order (3) of Commission Order No. R-3221, as amended, prohibits in that area encompassed by Lea, Eddy, Chaves, and Roosevelt Counties, New Mexico, the disposal, subject to minor exceptions, of water produced in conjunction with the production of oil or gas, or both, on the surface of the ground, or in any pit, pond, lake, depression, draw, streambed, or arroyo, or in any watercourse, or in any other place or in any manner which would constitute a hazard to any fresh water supplies and said disposal has not previously been prohibited.
- (3) That the aforesaid Order No. R-3221 was issued in order to afford reasonable protection against contamination of fresh

-2-CASE No. 4047 Order No. R-3725

water supplies designated by the State Engineer through disposal of water produced in conjunction with the production of oil or gas, or both, in unlined surface pits.

- (4) That the State Engineer has designated, pursuant to Section 65-3-11 (15), N.M.S.A., 1953 Compilation, all underground water in the State of New Mexico containing 10,000 parts per million or less of dissolved solids as fresh water supplies to be afforded reasonable protection against contamination; except that said designation does not include any water for which there is no present or reasonably foreseeable beneficial use that would be impaired by contamination.
- (5) That the applicant, Larry C. Squires, seeks an exception to the provisions of the aforesaid Order (3) to permit the disposal of water produced in conjunction with the production of oil or gas, or both, in three natural salt lakes located in Lea County, New Mexico, as follows:

Laguna Plata, sometimes referred to as Laguna Grande, located in Sections 2, 3, 9, 10, and 11, Township 20 South, Range 32 East, NMPM;

Laguna Gatuna, sometimes referred to as Salt Lake, located in Sections 7, 17, 18, 19, and 20, Township 20 South, Range 33 East, NMPM;

Laguna Tonto, located in Sections 32 and 33, Township 19 South, Range 33 East, and Section 4, Township 20 South, Range 33 East, NMPM.

- (6) That the subject lakes are situated within the confines of a synclinal feature.
- (7) That the water in the aforesaid three lakes is not fresh water.
- (8) That that portion of the Triassic red beds underlying said three lakes is virtually impermeable and therefore prevents seepage from said lakes into the sand stringers within said red beds which may contain fresh water.
- (9) That as to sands that are in communication with said lakes, the evidence indicates that the major flow of surface and subsurface water within the boundaries of said synclinal feature is toward the subject lakes.

- (10) That the evidence indicates that there is no leakage of water from said Laguna Plata and Laguna Gatuna into the adjoining formations.
- (11) That the evidence indicates that there may be some leakage of water from said Laguna Tonto into the adjoining formations to the southeast, thence southwestward toward Laguna Gatuna.
- (12) That the utilization of Laguna Plata and Laguna Gatuna for the disposal of water produced in conjunction with the production of oil or gas, or both, will not constitute a hazard to fresh water supplies that may exist in the vicinity of said lakes.
- (13) That the utilization of Laguna Tonto for the disposal of water produced in conjunction with the production of oil or gas, or both, may constitute an additional threat of contamination of fresh water supplies as designated by the State Engineer existing to the southeast of said lake.
- (14) That the evidence indicates that commercial deposits of sodium sulphate (Na<sub>2</sub> SO<sub>4</sub>) may exist in and/or near the three subject lakes.
- (15) That disposal of produced salt water into Laguna Plata and Laguna Gatuna will not interfere with the testing required to determine if there are commercial deposits of sodium sulphate in and/or near the said three lakes.
- (16) That said disposal prior to actual mining operations will not impair the value of said sodium sulphate nor render its recovery more difficult.
- (17) That this case should be reopened upon the motion of the Commission or any other interested party whenever tests have been conducted which indicate to a substantial degree that commercial deposits of sodium sulphate probably exist in and/or near the subject lakes, at which time all interested parties should be prepared to appear and show cause why continued disposal in said lakes should or should not be allowed.
- (18) That the applicant should be authorized to utilize Laguna Plata and Laguna Gatuna for the disposal of water produced in conjunction with the production of oil or gas, or both.

-5-CASE No. 4047 Order No. R-3725

whereupon the Commission shall give notification for the reopening of this case.

(6) That jurisdiction of this cause is retained for the entry of such further orders as the Commission may deem necessary.

DONE at Santa Fe, New Mexico, on the day and year hereinabove designated.

STATE OF NEW MEXICO
OIL CONSERVATION COMMISSION

DAVID F. CARGO, Chairman

ALEX J. ARMIJO, Member

SEAL

A. L. PORTER, Jr., Member & Secretary

### A P P E N D I X B

Chemical analyses of samples collected by Ed L. Read, February 1969.

# SO HWESTERN LABORATCHES FORT WORTH DALLAS HOUSTON MIDLAND BEAUMENT TEXARKANA

## CONSULTING, ANALYTICAL CHEMISTS AND TESTING ENGINEERS

Married Williams	Midland,	_ Texas_	2-13-69	File No. C-190	2-R1
Report of tests on	Water				
То	Mr. Ed L.	Reed	·	Date Re	ec'd. 2-12-69
Received from	Mr. Ed L.	Reed			
Identification Marks		, Sec.		y Squires, sampl E, from waste tr	•

Chloride ----- 85
Sulfate ----- 82

Conductivity ----- 837 Micromhos/cm @ 25° C.

Mg/L

Copies: 3cc Nr. Ed L. Reed

SOUTHWESTERN LABORATORIES

Lab. No. C-5120

Our letters and reports are for the exclusive use of the clients to whom they are addressed. The use of our names must receive our prior written approval. Our letters and reports apply only to the samples tested and are not necessarily indicative of the qualities of identical or similar products.

### SOOTHWESTERN LABORATICES

FORT WORTH DALLAS HOUSTON MIDLAND BEAUTHON TEXARKANA

### CONSULTING, ANALYTICAL CHEMISTS AND TESTING ENGINEERS

Midland,	Texas 2-13-69	File NoC	-1902-R1
	1 6277		

Report of tests on

Water

To

Mr. Ed L. Reed

Date Rec'd. 2-12-69

Received from

Mr. Ed L. Reed

Identification Marks

Lea County, New Mexico, Larry Squires, by Joe Reed, Spring #3, just North of #2, 200 ft., at head water.

Mg/L

Chloride ----- 7446

Sulfate -----11755

Conductivity -----10,000 / Micromhos/cm @ 25° C.

Copies: 3cc Mr. Ed L. Reed

SOUTHWESTERN LABORATORIES

Lab. No. C-5124

e use of our names must receive our prior written approval. Our letters

- CRM NO. 130-8

### SO THWESTERN LABORATOLIES

FORT WORTH DALLAS - HOUSTON MIDLAND BEAUM

## CONSULTING, ANALYTICAL CHEMISTS AND TESTING ENGINEERS

Midland, Texas 2-13-69 File No C-1902-R1

Report of tests on

Water

To

Mr. Ed L. Reed

Date Rec'd. 2-12-69

Received from

Mr. Ed L. Reed

Identification Marks

Lea County, New Mexico, Larry Squires, sampled by Joe Reed, Spring #1, SE end of Laguna Plata at head water.

Mg/L

Chloride ----- 8864

Sulfate -----11930

Conductivity ----- 10,000 / Micromhos/cm @ 25° C.

Copies: 3cc Mr. Ed L. Reed

SOUTHWESTERN LABORATORIES

Lab. No. C-5122

Our letters and reports are for the exclusive use of the clients to whom they are addressed. The use of our names must receive our prior written approval. Our letters and approval apply only to the samples tented and are not necessarily indicative of the qualities of identical or similar products.

# SO HWESTERN LABORATCHES FORT WORTH DALLAS HOUSTON MIDLAND BEAUT TEXARKANA

### CONSULTING. ANALYTICAL CHEMISTS AND TESTING ENGINEERS

Midland, Texas 2-13-69 File No C-1902-R1

Report of tests on

Water

To

Mr. Ed L. Reed

Date Rec'd. 2-12-69

Received from

Mr. Ed L. Reed

Identification Marks

Lea County, New Mexico, Larry Squires, sampled by Joe Reed, Spring #2, due East of Laguna Plata at head water.

Mg/L

Chloride ---- 7446

Sulfate ----- 12743

Conductivity ----- 10,000 / Micromhos/cm @ 25° C.

Copies: 3cc Mr. Ed L. Reed

Lab. No. C-5123

SOUTHWESTERN LABORATORIES

the letters and reports are for the exclusive use of the ellents to whom they are addressed. The use of our names must receive our prior written approval. Our letters and reports apply only to the samples tested and are not necessarily indicative of the qualities of identical or similar products.

### SOMETHWESTERN LABORATCHIES

FORT WORTH DALLAS HOUSTON MIDLAND BEAUTINT TEXARKANA

## CONSULTING, ANALYTICAL CHEMISTS AND TESTING ENGINEERS

Midland,	Texas	2-13-69	File No	C-1902-R1

Report of tests on

Water

To

Mr. Ed L. Reed

Date Rec'd. 2-12-69

Received from

Mr. Ed L. Reed

Identification Marks

Lea County, New Mexico, Larry Squires, sampled by Joe Reed, Halfway Bar, from tap, 2 wells, WL. - 42.5'.

Mg/L

Chloride ----- 362

Sulfate ----- 309

Conductivity ----- 1861 Micromhos/cm @ 25° C.

Copies: 3cc Mr. Ed L. Reed

SOUTHWESTERN LABORATORIES

Lab. No. C-5121

Our letters and reports are for the exclusive use of the clients to whom they are addressed. The use of our names must receive our prior written approval. Our letters and reports apply only to the samples tested and are not necessarily indicative of the qualities of identical or similar products.

# SCOTHWESTERN LABORATERS FORT WORTH DALLAS HOUSTON MIDLAND BEAUMONT TEXARKAN

### CONSULTING, ANALYTICAL CHEMISTS AND TESTING ENGINEERS

Midland, Texas 2-25-69 File No. C-1902-R1

Report of tests on

Water

To

Mr. Ed L. Reed

Date Rec'd. 2-18-69

Received from

Mr. Ed L. Reed

Identification Marks

As Shown

IAh. No.	Sample Description	Mg/L Chloride	Mg/L Sulfate
110.	Damp 20 2000 Company	<u> </u>	
C-5151	No. 1-A, Soil sample, N end of Tonto		
•	(1:1 extract)	48931	37698
C-5152	No. 2, Spring, SW Gatuna, S of Highway	163105	24594
C-5153	No. 3, South side of Gatuna	66660	29728
C-5154	No. 4, Gatuna, in draw N of Highway	72333	24273
C-5155	No. 5, Gatuna, NW end at oil well, NW of well		
	in Ravine	27657	37979
C-5156	No. 6, Gatuna, NW end, NE of oil well, ravine		-
	flowing South	10992	13771
C-5157	No. 7, Spring No. 4, Plata	7978	12643
C-5158	No. 1, Salt crystals, Tonto (Moist):		
	Chloride (C1) 4.20% by weight		
	Sulfate (SO <sub>4</sub> ) 29.23% by weight		
	No. 1-A No Sulfide or Sulfite detected.		

Copies: 3cc Mr. Ed L. Reed

SOUTHWESTERN LABORATÓRIES

Lab. No.

Our letters and reports are for the exclusive use of the clients to whom they are addressed. The use of our names must receive our prior written approval. Our letters and reports apply unly to the samples tested and are not necessarily indicative of the qualities of identical or similar products.

March \_\_\_, 1992

#### DRAFT OF LETTER OF APPROVAL

Mr. Larry Squires
POLLUTION CONTROL, INC.
P. O. Box 2158
Hobbs, New Mexico 88241

Re: Laguna Gatuna Inc.
Surface Waste Disposal Facilities
Amended Compliance Approval
NMOCD Rule 711

Dear Mr. Squires:

Reference is made to Laguna Gatuna Inc.'s request dated March 6, 1992, submitted by W. Thomas Kellahin, attorney, to obtain the Division's correction of its August 31, 1988 administrative approval of the Laguna Gatuna surface waste disposal facilities to include approval of commerical discharge of produced water at Site #2 as both a supervised truck terminal discharge point and a two pipeline discharge point. Site #2 is identified as "PCI-3" being located in the SW/4SW/4 of Section 17, T2OS, R33E, NMPM, Lea County, New Mexico.

As a result of inadvertence, the request for approval of Site #2 was erroneously deleted from the August 31, 1988 approval letter. The applicant withdrew only its request to use Site #2 for automated-unsupervised truck discharge. As amended, Site #2 met all of the OCD criteria for approval at that time.

Based upon the foregoing, the Division Director, effective August 31, 1988, hereby approves the existing discharge facility located in the SW/4SW/4 of said Section 17 known as Site #2 and identified as "PCI-3" for receiving water by either of its two existing piplines or by truck under supervised conditions into a tank and then discharged into a processing facility before being discharged into Laguna Gatuna SUBJECT to

Mr. Larry Squires March \_\_\_, 1992 Page Two

the terms and conditions set forth in the August 31, 1988 approval letter.

Sincerely,

William J. LeMay Director

xc: OCD-Hobbs

W. Thomas Kellahin

1trt305.638

4 . \*\*



### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

#### BRUCE KING GOVERNOR

### MEMORANDUM

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

TO:

**ALL OPERATORS** 

FROM:

WILLIAM J. LEMAY, Director, Oil Conservation Division

SUBJECT:

RECENT FEDERAL ENVIRONMENTAL ACTION REGARDING

**EXPLORATION AND PRODUCTION WASTES** 

DATE:

APRIL 25, 1991

This memo summarizes and provides information on three recent federal actions involving oil and gas exploration and production wastes.

- 1. On February 25, 1991, EPA Region 6, Dallas, issued final Clean Water Act NPDES General Permits for oil and gas facilities in the Onshore Subcategory of the Oil and Gas Extraction Point Source Category for the States of Louisiana, New Mexico, Oklahoma and Texas. These permits prohibit all discharges of pollutants to waters of the U.S. from these facilities consistent with the requirements codified at 40 CFR Part 435, Subpart C. The permits became effective on March 27, 1991. Under the New Mexico permit (NMG 320000), discharges to "waters of the United States" (e.g. watercourses, rivers, streams, lakes, and playas, etc.) are prohibited, and operators are directed to operate in accordance with OCD Rules and Regulations. The permit does not require the operator to make application or contact EPA unless a discharge actually occurs. In the event of bypass or upset discharge, 24-hour reporting to EPA is required. (Note: Discharges specifically authorized by EPA-issued NPDES permits under the Agriculture and Wildlife Water Use, or Stripper Subcategories are not affected by this rule).
- 2. In a legal opinion issued by letter from EPA Region 6 on March 26, 1991, Laguna Gatuna (a natural playa salt lake in western Lea County) is now considered to be a "water of the United States" for purposes of regulation under the Federal Clean Water Act, and discharges of oil and gas wastes to the playa are prohibited without a federal NPDES permit. The opinion was requested by the NM Environment Department as a result of information provided by the US Fish and Wildlife Service. In the opinion, EPA states that under EPA's current definition of "waters of the U.S.", "even potential use by migratory birds is sufficient to show a specific surface water is subject to federal jurisdiction under the Clean Water Act." As a result of this action and the effect of the new NPDES General Permit discussed above, facilities discharging oilfield wastes to

MEMORANDUM April 25, 1991 Page -2-

playas may not be in compliance with the federal Clean Water Act even though they have OCD-approved state permits. All operators discharging to such playas should review these developments with legal counsel familiar with federal environmental law and be prepared to modify discharge methods if necessary. This action does not change the status of OCD-approved permits; these permits remain in effect. Any modification to operations would be as a result of the requirements of federal law.

3. On April 2, 1991, EPA Washington, by letter, issued a preliminary determination that wastes generated by crude oil and tank bottom reclamation facilities are exempt from Subtitle C (Hazardous Waste) provisions of RCRA. This opinion was requested by several operators in southeast New Mexico and west Texas as a result of EPA's action, effective last fall, listing certain production-related wastes containing naturally occurring benzene as hazardous wastes. The April 2nd determination will be made final when published in the Federal Register, likely within the next 60 days. In the meantime, OCD believes the EPA letter serves as notification to treating plants and other reclamation facilities that they can again receive and treat these wastes under current OCD-approved permits. However, facilities can receive only production wastes for treatment (i.e. no used motor oils, or refined product tank bottoms) and no RCRA-regulated solvents may be used to treat production wastes (e.g. no chlorinated solvents or solvent mixtures containing xylenes, toluene and other mixtures as listed in 40 CFR Part 261.31).

Copies of all EPA documents mentioned in this memorandum are available at OCD district offices or through the Environmental Bureau in Santa Fe.

WJM/DGB/sl

Director New Mexico Department of Fish and Game



## UNITED STATES ENVIRONMENTAL PROTECTION AGENCY WASHINGTON, D.C. 20460

AFR 2 (99)

OFFICE 17-SCUID WASTE AND EMERICAND FIRST NOS.

Mr. Paul M. Bohannon, Esq. Porter & Clements
NCNB Center
7000 Louisiana, Suite 3500
Houston, Texas 77002-2730

Dear Mr. Bohannon:

This is to inform you that we have concluded our review of the September 18, 1990 Request by Waste Crude Oil Reclaimers concerning the applicability of Subtitle C of the Resource Conservation and Recovery Act (RCRA) to crude oil reclaimer wastes. This letter continues with a summary of our tentative conclusions from the review of the request and our course of action for responding to the request.

In light of your request, and based upon our communications with various state regulatory authorities and industry representatives, it appears both necessary and appropriate at this time to clarify the Regulatory Determination for Oil and Gas and Geothermal Exploration. Development and Production Wastes (see 53 FR 25446; July 6, 1988) with respect to crude oil reclaimer wastes. The Agency plans to respond to your request in the form of an interpretive notice that will be published in the Federal Register. The notice would explain and clarify the intended meaning of the language concerning wastes from crude oil and tank bottom reclaimers that appeared in the Agency's Regulatory Determination. Specifically, the forthcoming notice would identify those reclaimer wastes that are and are not exempt from Subtitle C of RCRA.

While the Agency plans to detail its explanation of exempt and non-exempt wastes in the forthcoming notice, following is a brief summary of our preliminary position on reclaimers' wastes. Generally, 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 requirements of Subtitle C. For example, wastes generated from the process of recovering crude oil from tank bottoms obtained from product storage facilities at primary field operations are exempt from Subtitle C because the product storage tank bottoms are exempt. This is based largely on the long held principle that, generally, wastes derived from exempt wastes remain exempt.

14:18

04/10/81

-2-

However, there are also solid and liquid wastes from raclaimer operations that are not exempt from Subtitle C to which the Agency intended to refer in its 1988 notice. Generally, those raclaimer wastes derived from non-exempt cilfield wastes or that otherwise contain materials which are not uniquely associated with or intrinsic to primary exploration and production field operations would not be exempt. An example of these non-exempt wastes would be waste solvent generated from the solvent cleaning of tank trucks that are used to transport oil field tank bottoms. Such wastes would not be exempt from Subtitle C because the use of solvent is neither unique nor intrinsic to the production of crude oil.

The Agency plans to issue the notice as a clarification to a past Agency action -- the Regulatory Determination process -- which was subjected to public review and comment procedures. As such, the Agency would not solicit comments or additional information on the forthcoming notice. However, the Agency's public docket on the Regulatory Determination will be supplemented with materials you supplied, as well as other materials obtained by the Agency during the course of evaluating your September 18, 1990 request.

The Agency realizes the significant role that waste crude oil reclaimers can play in contributing to its waste minimization policy and goals. Our upcoming interpretive notice will allow us to avoid the inequities that would be imposed if we were to classify wastes that are exampt at primary field operations as non-exempt when generated off-site by commercial reclaimers. We trust that this letter, and the forthcoming Federal Register notice will be responsive to the concerns you and others have raised. Meanwhile, if you have any questions, please contact Mr. Bob Tonetti at (703) 308-8426.

Sincerely,

Don R. Clay

Assistant Administrator



## UNITED STATES PNVIRONMENTAL PROTECTION AGENCY

91 APR 7 Fill Man Ross Avenue, Suite 1200
DALLAS, TEXAS 75202-2733

March 26, 1991

RECEIVED

Mr. Jim Piatt
Acting Bureau Chief
Surface Water Bureau
Environmental Improvement Division
New Mexico Health and Environment Department
Harold Runnels Building
1190 St. Francis Drive
Santa Fe, New Mexico 87503

SURFACE WATER QUALITY BUREAU

APR 0 2 1991

Re: Jurisdictional Status of Laguna Gatuna under the Clean Water Act

Dear Mr. Piatt:

This responds to your March 11, 1991, inquiry on the jurisdictional status of Laguna Gatuna, a playa lake located in Lea County, New Mexico. As pointed out in your letter, EPA responded to an earlier request for jurisdictional advice on Laguna Gatuna on August 13, 1987, concluding that the information provided with that request did not indicate it a "water of the United States." Significantly, the information on which that conclusion was based included a statement that Laguna Gatuna "supports no wildlife...of any kind."

In essence, we regard your inquiry as a request for reconsideration of that advice on the basis of information recently provided by the Bureau of Land Management (BLM) and the U.S. Fish & Wildlife Service (USFWS). In contrast to the basis for EPA's August 13, 1987 advice, that information indicates Laguna Gatuna is in fact used as a feeding and loafing area by migratory birds during their spring and fall migrations and as a nesting area during the breeding season. Although neither BLM or USFWS specifically identifies the species using the playa, their letters suggest they may include listed threatened and endangered species, including the Aplomado Falcon and Snowy Plover, and clearly show Laguna Gatuna is susceptible to use by those migratory species.

EPA Region 6 has regarded use by migratory birds as a use in interstate commerce since at least 1979. See, e.g., "Lake Whalen -- 'Navigable Waters' Determination," 1 Gen. Couns. Ops. 165 (January 26, 1979). Under the Agency's current definition of "waters of the United States" at 40 CFR §122.2, even potential use by migratory birds is sufficient to show a specific surface water is subject to federal jurisdiction under the Clean Water Act. Accordingly, the information submitted by BLM and USFWS compels a conclusion that Laguna Gatuna is indeed a water of the United States. Section 301(a) of the Clean Water Act, 33 U.S.C. §1311(a), thus prohibits

discharges of pollutants to Laguna Gatuna in the absence of an authorizing National Discharge Elimination System (NPDES) Permit.

Your March 11 inquiry indicates your Agency is contemplating issuance of a State permit for a surface brine disposal facility proposed by Petro-Thermo Corporation. It did not, however, indicate the location or nature of the wells producing the brine or whether the contemplated permit would authorize its discharge to Laguna Gatuna. If any of the wells producing that brine fall within the Onshore Subcategory of the Oil and Gas Extraction Point Source, its discharge to Laguna Gatuna is presumably prohibited by NPDES General Permit NMG320000. See 56 Fed. Reg. 7698 (February 25, 1991). Moreover, Section 510 of the Clean Water Act. 33 U.S.C. §1370, preempts New Mexico's authority to authorize discharges of Onshore Subcategory produced water to any water of the United States, including Laguna Gatuna.

Please note that we do not here determine that Petro-Thermo's proposed discharge would necessarily be prohibited by NPDES Permit NMG320000. Possibly, it would be subject to another subcategory of the Oil and Gas Extraction Point Source Category and might thus be authorized to discharge through issuance of an individual NPDES permit with effluent limitations reflecting appropriate levels of control for that subcategory, New Mexico's water quality standards, and other applicable State and federal law. Making a decision on that issue would, however, require substantially more information on the proposed facility and discharge.

We are providing a copy of this letter to the attorneys which requested the 1987 jurisdictional advice and to Laguna Gatuna, Inc., which we understand may now be discharging wastewater to Laguna Gatuna without an NPDES permit. If there are further questions in this matter, please call Assistant Regional Counsel Pat Rankin at (214) 655-2106.

Sincerely yours,

Myron Knudson, P.E.

Director

Water Management Division

Mym O. Knuden

cc:

·-

Mr. Tom O'Brien

USFWLS

Mr. T. Kreager

BLM

Petro-Thermo Corporation

Laguna Gatuna, Inc.

Michael R. Comeau, Esq. Stephenson, Carpenter, Crout & Olmsted

Paul Watler, Esq. Jenkins & Gilchrist

600 A

# United States District Court 311 01500

DISTRICT OF New Mexico

LAGINA GATUNA, INC.,
a New Mexico corporation,

SUMMONS IN A CIVIL ACTION

Plaintiff,

V.

CASE NUMBER:

CAROL M. BROWNER, Administrator of the Environmental Protection Agency; JOE D. WINKLE, Acting Director of Region VI of T T O O TO THE Environmental Agency; and the Environmental PROTECTION AGENCY.

Defendants.

TO: (Name and Address of Defendant)

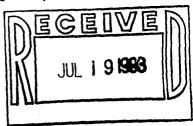
Joe D. Winkle
Acting Regional Administrator
Region VI of the Environmental Protection Agency
1445 Ross Ave.
Dallas, TX 75202

YOU ARE HEREBY SUMMONED and required to file with the Clerk of this Court and serve upon

PLAINTIFF'S ATTORNEY (name and adorss)

William Perry Pendley Todd S. Welch MOUNTAIN STATES LEGAL FOUNDATION 1660 Lincoln St., Suite 2300 Denver, CO 80264 J.W. Neal, P.C. P.O. Box 278 Hobbs, NM 88240

an answer to the complaint which is herewith served upon you, within sixty (60) days after service of this summons upon you, exclusive of the day of service. If you fail to do so, judgment by default will be taken against you for the relief demanded in the complaint.



RODERT M. MARCH, Clerk

DATE

FOR THE DISTRICT NOTO NEW MEXICO

LAGUNA GATUNA, INC., A New Mexico Corporation, 93 JUN 24 FIT 2: 24

Plaintiff,

VS

Civil Action No:

CAROL M. BROWNER, Administrator, of the Environmental Protection, Agency, JOE D. WINKLE, Acting Regional Administrator, Region VI of the Environmental Protection Agency, and the ENVIRONMENTAL PROTECTION AGENCY,

WILLIAM W. DEATON-WWD

Defendants.

### COMPLAINT AND JURY DEMAND

#### PARTIES

- 1. Plaintiff Laguna Gatuna, Inc. (Plaintiff Gatuna) is a corporation, organized and existing under the laws of the State of New Mexico and is currently in good standing. Plaintiff Gatuna's principle place of business is in Hobbs, Lea County, New Mexico. Plaintiff Gatuna holds an ownership interest in 400 acres of real property located in Sections 17 & 18, Range 32 East, Township 20 South, Lea County, New Mexico.
- 2. Defendant Carol M. Browner is the Administrator for the Environmental Protection Agency (EPA) and is sued in her official capacity.
- 3. Defendant Joe D. Winkle is Acting Regional Administrator for Region VI of the EPA and is sued in his official capacity. The State of New Mexico is located in EPA Region VI.

4. The Environmental Protection Agency is an independent agency of the United States of America charged with the duty to enforce laws protecting the environment.

#### JURISDICTION AND VENUE

- 5. Jurisdiction is proper in this Court pursuant to 28 U.S.C. § 1331.
- 6. Venue is proper in the United States District Court for the District of New Mexico pursuant to 28 U.S.C. § 1391(e)(3), in that the real property which is involved in this action is located in the State of New Mexico.

#### FACTS

- 7. Plaintiff Gatuna is in the business of disposing of oil field production waters produced in the area around Laguna Gatuna (Laguna). Plaintiff Gatuna has constructed the necessary facilities to operate its business at Laguna Gatuna. Plaintiff Gatuna has invested \$1,000,000.00 in the construction of said facilities.
- 8. Laguna Gatuna is a "sinkhole" located in sections 7,
  17, 18, and 19 of Township 20 South, Range 33 East N.M.P.M., Lea
  County, New Mexico. No streams empty into Laguna Gatuna; no
  streams drain out of Laguna Gatuna; and there are no surface or
  groundwater connections between Laguna Gatuna and any other water
  body. Laguna Gatuna consists of approximately 398 acres, of
  which a portion is owned by the Federal Government and managed by
  the Bureau of Land Management (BLM). Another portion is owned by

the State of New Mexico. The remainder is owned or held with sufficient legal interest by Plaintiff Gatuna.

9. The land owned by the Federal Government and managed by the BLM is legally described as follows:

S\( \) of the SE\( \) of Section 7; W\( \) of the NW\( \) of the NW\( \), SW\( \) of the NW\( \), and NW\( \) of the SW\( \) of Section 17, NE\( \) and N\( \) of the SE\( \) of Section 18, N\( \) of the NE\( \) of the NE\( \) of the NE\( \) of the NE\( \) of Section 19, and that part of the S\( \) of the NE\( \) of the NE\( \) of Section 19, lying North of U.S. Highway 62-180, Township 20 South, Range 33 East N.M.P.M., Lea County, New Mexico.

10. The land owned or held with sufficient legal interest by Plaintiff Gatuna is legally described as follows:

SW\(\frac{1}{2}\) of the SW\(\frac{1}{2}\) of Section 17; S\(\frac{1}{2}\) of the SE\(\frac{1}{2}\), SW\(\frac{1}{2}\), E\(\frac{1}{2}\) of the NW\(\frac{1}{2}\), and the SW\(\frac{1}{2}\) of the NW\(\frac{1}{2}\) of Section 18, Township 20 South, Range 33 East N.M.P.M., Lea County, New Mexico.

11. The land leased by Plaintiff Gatuna from the State of New Mexico for the purpose of disposing of oilfield brine is legally described as follows:

That portion of the NWA of the NEA and NA of the SEA of Section 18, NA of the NEA of the NEA of Section 19, and that part of the SA of the NEA of the NEA of Section 19, lying North of U.S. Highway 62-180, Township 20 South, Range 33 East N.M.P.M., Lea County, New Mexico.

- 12. The nearest stream to Laguna Gatuna is the Pecos River, located approximately 40 miles away.
- 13. In 1969, Pollution Control Inc., the predecessor company of Plaintiff Gatuna, obtained a permit from the BLM and a business lease from the State of New Mexico to dispose of brine water produced during oil extraction activities. In 1979, the BLM permit was reissued for a thirty (30) year period. In 1988 the permit and leases were transferred to Plaintiff Gatuna and

Plaintiff Gatuna owned and operated same until they were canceled by the BLM, as hereinafter stated.

- 14. In 1987, Plaintiff Gatuna's predecessor in interest, Snyder Ranches, Inc., approached the EPA and requested a ruling concerning whether Laguna Gatuna was "waters of the United States" and, therefore, subject to the provisions of the Clean Water Act 33 U.S.C. §1311 et seg. On or about August 13, 1987, EPA sent a letter to Plaintiff Gatuna indicating that Laguna Gatuna was not "waters of the United States" and disposal was allowed without a permit.
- 15. Plaintiff Gatuna alleges upon information and belief that in the spring of 1991, the United States Fish and Wildlife Service (FWS) stated in a letter that birds might use Laguna Gatuna.
- 16. Plaintiff Gatuna alleges upon information and belief that based on the information from the FWS, the EPA indicated Laguna Gatuna may be "waters of the United States" 33 U.S.C. § 1362(8) and subject to the Clean Water Act. Plaintiff Gatuna contacted the EPA, Region VI, and requested a meeting to provide information on the status of Laguna Gatuna as waters of the United States. At the meeting EPA indicated it was necessary to make additional studies to ascertain the status of Laguna Gatuna. Plaintiff Gatuna alleges on information and belief that the promised studies were never completed.
- 17. After the meeting, FWS and EPA, in the course of studying all of the playa lakes in New Mexico, discovered dead

birds in the vicinity of Laguna Gatuna and without further study or discussion ordered Plaintiff Gatuna to cease operations.

- 13. In May of 1992, EPA sent to Plaintiff Gatuna an Administrative Order requiring Plaintiff Gatuna to cease all operations involving the disposal of production waters at Laguna Gatuna or face the possibility of criminal or civil penalties pursuant to the Clean Water Act.
- 19. As a result of the Administrative Order, Plaintiff Gatuna contacted EPA, Region VI, to present evidence clearly refuting that Laguna Gatuna was "waters of the United States" subject to the Clean Water Act.
- 20. During the course of the meeting, Plaintiff Gatuna showed EPA that:
  - a. 1992 was an abnormally wet year with rain in the Hobbs area being more than 300% of normal;
  - b. surveys in the spring of 1991 showed no sign that

    Laguna Gatuna was being used by any wildlife, migratory

    or otherwise;
  - c. that the dead birds found at Laguna Gatuna in the spring of 1992 died of "salt poisoning" according to the autopsy;
  - an independent water analysis conducted in June of 1992
     showed the water of Laguna Gatuna to have 263,000 mg/l
     of sodium chloride and a natural spring flowing into
     Laguna Gatuna had 251,000 mg/l of sodium chloride;

- e. the produced water Plaintiff Gatuna was placing in
  Laguna Gatuna had only 35,000 mg/l of sodium chloride
  and, therefore, was doing more to prevent the salt
  poisoning of the birds than it was to cause it;
- f. birds do not nest or feed on or near Laguna Gatuna;
- g. Laguna Gatuna, under normal circumstances, is dry;
- h. Laguna Gatuna has no shelter or food source for migratory birds; and
- i. the presence of water fowl in the spring of 1992 was an aberration not likely to reoccur under normal circumstances.
- 21. Pursuant to the criminal penalty provisions of the Clean Water Act, a person "who willfully or negligently violates [the CWA] . . . shall be punished by a fine . . . or imprisonment . . . or by both." 33 U.S.C. § 1319(c)(1).
- Water Act, any person "who violates [the CWA] . . . or violates any order issued by the Administrator . . . shall be subject to a civil penalty not to exceed \$25,000 per day . . . . " 33 U.s.c. § 1319(d).
- 23. Subsequently, the BLM revoked the permit previously held by Plaintiff Gatuna and Plaintiff Gatuna is now out of business as a result of the decision of the EPA and the BLM.
- 24. The issuance of the Administrative Order is final agency action and this matter is ripe for judicial review pursuant to the Administrative Procedure Act (APA) 5 U.S.C. §706

et seg. and because of the due process claims under the United States Constitution.

#### COUNT I

## DECLARATORY JUDGMENT AS TO CLEAN WATER ACT JURISDICTION

- 25. Plaintiff Gatuna realleges and incorporates by reference herein each and every allegation contained in paragraphs 1 through 21 of its complaint.
- 26. Section 301 of the Clean Water Act, 33 U.S.C. § 1311, provides that the discharge of any "pollutant" into "navigable waters" is unlawful unless authorized by a permit. The Clean Water Act defines "navigable waters" as the "waters of the United States, including the territorial seas." 33 U.S.C. § 1362(8).
- 27. The EPA has promulgated certain regulations, which purport to "define" "waters of the United States." Pursuant to 40 C.F.R. § 230.3(s) "waters of the United States" are defined to include:
  - all waters which are currently used or were used in the past, or may be susceptible to use in interstate or foreign commerce; all . . . playa lakes . . . the use, degradation or destruction of which could affect interstate or foreign commerce including . . . waters which are or could be used by interstate or foreign travelers for recreational or other purposes . . . [and waters] which are used or could be used for industrial purposes by industries in interstate commerce."
- 28. As a result of the regulations, the United States Government, through the EPA, has asserted Clean Water Act jurisdiction over the property owned by Plaintiff Gatuna and the property managed by the BLM for which Plaintiff Gatuna has a permit.

- 29. The property owned by Plaintiff Gatuna and the property owned by the BLM for which Plaintiff Gatuna holds a permit contain no "waters of the United States" subject to the regulations of the Clean Water Act.
- 30. The EPA regulations provide that the only administrative process which would allow Plaintiff Gatuna to challenge the decision of the EPA that Laguna Gatuna is "waters of the United States" is if Plaintiff Gatuna violates the cease and desist order and subjects itself to the criminal and civil penalties authorized by the Clean Water Act which amount to the possibility of going to jail or \$25,000 per day as a civil penalty.
- 31. Additionally, the United States Government and the EPA are precluded from asserting Clean Water Act jurisdiction over the property of Plaintiff Gatuna and the BLM property for which Plaintiff Gatuna holds a permit for one or more of the following reasons:
  - a. The EPA's purported "interpretation" and/or "construction" of "waters of the United States" as applied to Plaintiff Gatuna's property exceeds the scope of the EPA's statutory authority;
  - b. As applied, the EPA's purported "interpretation" and/or "construction" of "waters of the United States" would exceed Congress' power to regulate interstate commerce under Article 1, Section 8 of the United States

    Constitution;

- c. The EPA's actions in expanding, and in effect amending, "waters of the United States" under the guise of purported "interpretation" and/or "construction" of "waters of the United States" constitutes rulemaking and as such is invalid because the rulemaking was and is being carried out in violation of the public notice and comment provisions of the Administrative Procedures Act, 5 U.S.C. § 553; and
- d. The Government's assertion of Clean Water Act jurisdiction as applied violates Plaintiff Gatuna's rights of due process and equal protection under the law.
- 32. Gatuna has suffered irreparable harm as a result of the decision by the EPA. If the declaratory judgment sought herein is not granted, Plaintiff Gatuna will continue to suffer irreparable harm in that:
  - a. Plaintiff Gatuna will be forced to choose between exercising its rights to use its private property and "violating" the Clean Water Act;
  - b. BLM has revoked the permit held by Plaintiff Gatuna as a result of the decision made by the EPA that Laguna Gatuna is "waters of the United States;"
  - c. If Plaintiff Gatuna does continue its permitted operation, the government will accuse Plaintiff Gatuna of being a "flagrant and multiple violator;"

d. Plaintiff Gatuna has been and continues to be harmed, if not destroyed, by the "impending charges" threatened explicitly and implicitly in the EPA's cease and desist order, in that Plaintiff Gatuna's business reputation has been diminished;

NEW YOURSEL

- e. Plaintiff Gatuna may be subjected to criminal liability even though the question as to whether Laguna Gatuna is "waters of the United States" has not been established and is based on reasonable differences of opinion; and
- f. Plaintiff Gatuna's credit relationship with lenders has been impaired.
- 33. A declaration as to the rights and other legal relations with respect to the property owned by Plaintiff Gatuna and the ability of the United States Government and the EPA to assert Clean Water Act jurisdiction over this property is required.
- 34. Plaintiff Gatuna is entitled to a plenary trial on the merits before this Court on the issue of whether the United States Government has Clean Water Act jurisdiction over Laguna Gatuna.

#### COUNT II

## PROCEDURAL DUE PROCESS VIOLATION (Taking of a liberty interest)

35. Plaintiff Gatuna realleges and incorporates by reference herein each and every allegation contained in paragraphs 1 through 21 of its complaint.

- Plaintiff Gatuna the opportunity to challenge, before an unbiased decision maker, that Laguna Gatuna is "waters of the United States," unless Plaintiff Gatuna is willing to violate the "cease and desist order" and subject itself and its employees, directors, officers and representatives to possible civil and criminal penalties of the Clean Water Act.
- 37. Plaintiff Gatuna has a constitutional liberty interest in its ability to contract and to engage in the business of disposing of production waters within the bounds established by the law.
- 38. Since the actions of the EPA affect the above described liberty interest of Plaintiff Gatuna, Plaintiff Gatuna is guaranteed the right to a procedure to determine the factual basis and legality of the decision of the EPA to declare Laguna Gatuna "waters of the United States."
- 39. Whether Laguna Gatuna is "waters of the United States" is a factual dispute in need of resolution.
- 40. The actions of the EPA deprive Plaintiff Gatuna of constitutional liberties without due process of law as guaranteed by the Fifth Amendment and, as such, are unconstitutional actions.

#### COUNT III

## PROCEDURAL DUE PROCESS VIOLATION (Taking of a property interest)

- 41. Plaintiff Gatuna realleges and incorporates by reference herein each and every allegation contained in paragraphs 1 through 21 of its complaint.
- 42. EPA is an independent agency of the United States. The actions of the EPA in declaring Laguna Gatuna "waters of the United States" are state actions, subject to the due process protections of the Fifth Amendment to the United States

  Constitution.
- 43. The actions of the EPA in declaring Laguna Gatuna "waters of the United States" deprives Plaintiff Gatuna of a property right without due process as guaranteed by the Fifth Amendment to the United States Constitution.
- 44. Whether Laguna Gatuna is "waters of the United States" is a factual dispute in need of resolution.
- 45. Actions of the EPA in depriving Plaintiff Gatuna of a constitutionally protected property right without due process is unconstitutional state action.

#### COUNT IV

SUBSTANTIVE DUE PROCESS VIOLATION (Violation of constitutional equal protection guarantees)

46. Plaintiff Gatuna realleges and incorporates by reference herein each and every allegation contained in paragraphs 1 through 21 of its complaint.

47. The Clean Water Act and its implementing regulations are an arbitrary and invidious use of government power in that Plaintiff Gatuna has no opportunity to challenge the decision without subjecting itself to the civil and criminal penalties of the Clean Water Act and as such is an unconstitutional exercise of authority.

### PRAYER FOR RELIEF

WHEREFORE, Plaintiff Gatuna respectfully requests:

- 1. An Order of Declaratory Judgment declaring that Laguna Gatuna, as described above, is not "navigable water," is not "water of the United States," and is not in any way subject to jurisdiction under the Clean Water Act by the United States Government, including the Army Corps of Engineers and the EPA;
- 2. An order declaring that EPA must provide due process before constitutionally guaranteed liberty and property interests are taken;
- 3. An order declaring that the actions of EPA are an unconstitutional exercise of authority;
- 4. Plaintiff Gatuna's costs and attorneys' fees incurred in bring this action; and
- 5. Such other and further relief as to the court seems just and equitable in the premises.

#### JURY DEMAND

PLAINTIFF GATUNA DEMANDS A TRIAL BY JURY OF ANY AND ALL ISSUES IN THIS ACTION TRIABLE OF RIGHT BY A JURY.

DATED this day 22 nd

\_ of June, 1993.

WILLIAM PERRY PENDLEY

TODD S. WELCH

MOUNTAIN STATES LEGAL FOUNDATION

1660 Lincoln Street

Suite 2300

Denver, Colorado 80264

(303) 861-0244

AND

J.W.\NEAL

J.W. NEAL, P.C.

Box 278

Hobbs, New Mexico 88240

(505) 397-3614

Attorneys for Plaintiff Laguna Gatuna, Inc.

#### STATE OF NEW MEXICO





### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

**OIL CONSERVATION DIVISION** 

BRUCE KING GOVERNOR

August 30, 1991

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

Ms. Zilla Padilla, Director Commercial Resources New Mexico State Land Office P. O. Box 1148 Santa Fe, New Mexico 87504-1148

RE: Status of Laguna Gatuna Facilities

Dear Ms. Padilla:

Attached is a copy of a letter to Mr. Larry Squires regarding the Laguna Gatuna disposal facility located in Section 17, Township 20 South, Range 33 East. The letter discusses the background and current regulatory status of the site.

The site is not permitted under OCD Rule 711 as a commercial surface waste disposal facility. However, Mr. Squires is authorized, under OCC Order No. R-3725 to dispose of produced salt water at the location provided such water is only from leases operated by Mr. Squires.

I apologize for the delay in completing this analysis and providing you with this information. If you have any questions, please contact me at 827-5812.

Sincerely yours,

David G. Boyer, Hydrogeologist

Environmental Bureau Chief

Enclosure

DGB/sl

#### STATE OF NEW MEXICO



### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

#### OIL CONSERVATION DIVISION

BRUCE KING GOVERNOR

August 30, 1991

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

## CERTIFIED MAIL RETURN RECEIPT NO. P-756-666-146

Mr. Larry Squires Laguna Gatuna, Inc. Box 2158 Hobbs, New Mexico 88240

RE: Status of Laguna Gatuna Facilities

Dear Mr. Squires:

As a result of discussions earlier this summer, I have reviewed the status of your Laguna Gatuna facility with respect to application of OCD Rule 711 (Commercial Surface Waste Disposal Facilities) at that location. The review was complicated because the facility was approved in stages over several years under separate OCC orders. Because of this approval sequence, I will review these orders and explain their relationship to current operation of the facility under Rule 711.

- 1. After a showing that fresh water would not be impacted, OCC Order No. R-3725 (3-19-69) approved an exception to OCC Order No. R-3221 to allow disposal of produced water into Laguna Gatuna. Subsequently, a facility was established in the NE/4 NW/4 of Section 18, Township 20 South, Range 33 East.
- 2. Order No. R-3725-A (8-8-84) authorized a second facility on Laguna Gatuna in the SW/4 SW/4 of Section 17, Township 20 South, Range 33 East and also authorized disposal of solid oil-field waste products, including drilling mud and cuttings, at either the Section 17 or Section 18 facility.
- 3. Order No. R-6718 (6-17-81) approved installation and operation of an oil-treating (reclamation) plant at the Section 18 facility.

- 4. Order No. R-8662 (5-19-88) established Rule 711 and required that such facilities comply with the provisions of Rule 711 within 120-days of notification from OCD. On August 17, 1988, Pollution Control, Inc. submitted its Rule 711 application to OCD for review and approval.
- 5. Item 4 of the application states, in part,: "An existing discharge facility located in the SW/4 SW/4 of Section 17 will receive water by pipeline and by approved truckers (See Dwg PCI-3) into a tank and then discharged into a number of skim/settling pits before being discharged into Laguna Gatuna."
- 6. Following review of the application, an approval letter dated August 31, 1988, was sent via certified mail to you. The approval was only for the existing and proposed facility in Section 18. Regarding the Section 17 operation, the undated notes of the application reviewer state that the Section 17 facility was not undergoing permitting at this time, and the approval letter contained following statement: "At this time approval for modification of the truck terminal in the SW/4 of Section 17 and NW/4 of Section 20, Township 20 South, Range 33 East is not being sought." This statement was not challenged in subsequent correspondence with Pollution Control (now Laguna Gatuna, Inc.).
- 7. Current activity at the Section 17 facility as reported by our Hobbs District Office appears limited to disposal of produced water from one or more nearby leases operated by you.

Based on the review of the above documents, I believe the available information supports the following conclusions regarding the status of the Section 17 facility:

- 1. The Section 17 facility is not authorized for commercial surface waste disposal pursuant to OCD Rule 711.
- 2. Under Order No. R-3725 water produced from wells operated by Laguna Gatuna, Inc., only, may be disposed of in Laguna Gatuna at Section 17. You may not accept water from any other source at that location.

If in the future you wish to resume commercial disposal at the Section 17 facility, you must apply for a permit for that facility. Since the facility is not contiguous with the Section 18 facility OCD has determined that a separate application is necessary. As such it will be necessary to comply with the public notice and bonding provisions of Rule 711.

Mr. Larry Squires August 30, 1991 -3-

If you have any questions regarding the legal status of the facility, please contact Robert Stovall, OCD General Counsel, or Roger Anderson of my staff for technical questions.

Sincerely yours,

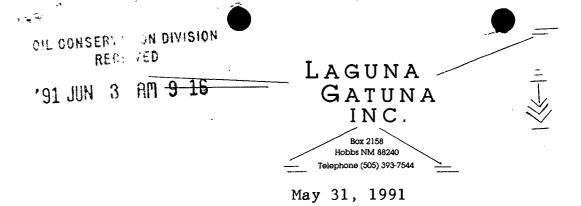
David G. Boyer, Hydrogeologist Environmental Bureau Chief

DGB/sl

cc: Robert Stovall

OCD Hobbs Office

Z. Padilla, State Land Office



Minerals and Natural Resources Department Post Office Box 2088 Santa Fe, New Mexico 87504

Attention: David Boyer

Dear Mr. Boyer:

I am sure that you have heard of the possible decision by EPA, based upon a letter from the U. S. Fish and Wildlife Service, that Laguna Gatuna maybe a "water of the United States." EPA's decision in this matter is a complete reversal of their prior determination in 1987 that Laguna Gatuna was not a water of the United States. A copy of their letter is enclosed.

We, of course, strongly disagree with EPA's recent flip-flop, and particularly the statements made in the letter from the U. S. Fish and Wildlife Service and, consequently, we are actively seeking to have EPA re-adopt their original decision. However, until and unless we are able to have EPA's present indication withdrawn, either at the agency level or by a federal court, the determination that Laguna Gatuna is a water of the United States poses serious problems for our Company and our valued customers. Our contacts with EPA personnel on this matter have been cordial and cooperative, and we do not believe that EPA is going to take any punitive enforcement action against us or our customers. From our conversations, it seems that EPA does not regard Laguna Gatuna is a problem of major proportions.

Our best information is that EPA indicated Laguna Gatuna may be a water of the United States based on a letter from the U.S. Fish and Wildlife Service asserting, without evidence, that Laguna Gatuna provided habitat for the Aplomado

falcon and the snowy plover -- a migratory bird. We are in the process of engaging a wildlife biologist to determine if these allegations are true. We do not believe they are. In any event, our lawyers tell us that the isolated presence of a migratory bird should not result in the determination that a playa with no other connection to interstate commerce is a water of the United States. This is especially so if it is our discharge that is creating the habitat that makes Laguna Gatuna attractive to a snowy plover.

EPA has agreed to meet with us to discuss this problem and we will do so promptly once our bird study is completed. We will keep you informed of any developments or changes in EPA's attitude.

In the meantime, we want to thank you for your business and for your support in this exasperating situation. If you have any questions, please give us a call.

Sincerely,

OMA

LARRY/C. SQUIRES

## FACSIMILE LEAD SHEET

## RICE Engineering Corporation

122 WEST TAYLOR

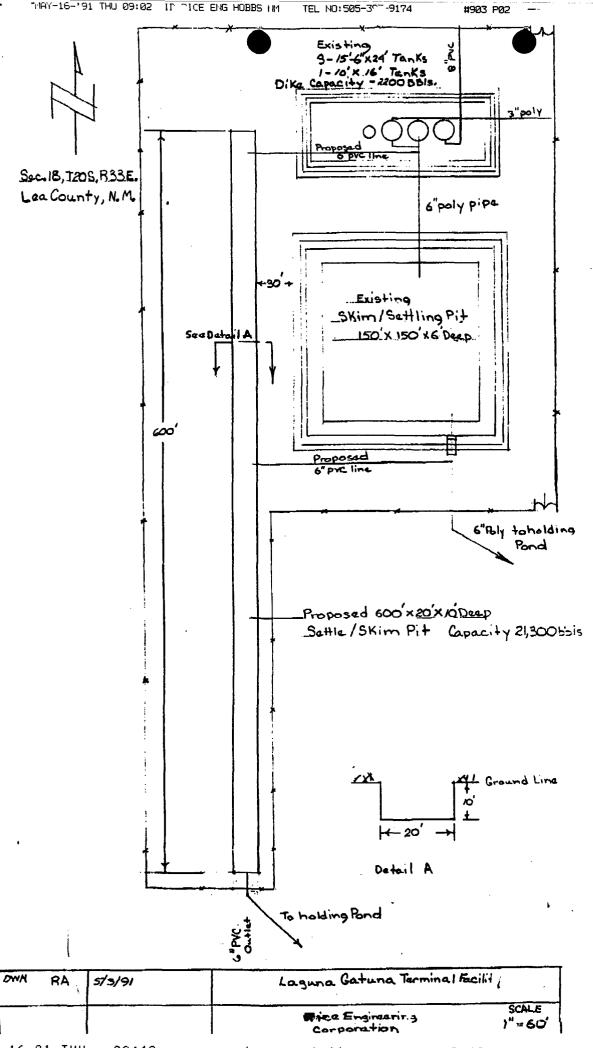
TELEPHONE (505) 393-9174

HOBBS. NEW MEXICO 88240
FACSIMILE NO. 505-397-1471

DATE: May 16, 1991

TIME: 10100 Am

10: Rogar Andarson
ROM: Ron Anderson
TUMBER OF SHEETS: / Plus Cover Sheet
UBJECT: Laguna Gatuna Tarminal Facility
PECIAL INSTRUCTIONS: This Drawing that shows our
naw pit proposal. If you hove any suastions
plasa giva ma a calle
Than Ks.
Thanks,
·
والواقة والمائية والم



Y-16-91 THU 09:49

rice eng hobbs nm

P.02



#### UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION 6

1445 ROSS AVENUE, **SUITE** 1200 DALLAS, TEXAS 75202-2733

March 26, 1991

Mr. Jim Piatt
Acting Bureau Chief
Surface Water Bureau
Environmental Improvement Division
New Mexico Health and Environment Department
Harold Runnels Building
1190 St. Francis Drive
Santa Fe, New Mexico 87503

Re: Jurisdictional Status of Laguna Gatuna under the Clean Water Act

Dear Mr. Piatt:

This responds to your March 11, 1991, inquiry on the jurisdictional status of Laguna Gatuna, a playa lake located in Lea County, New Mexico. As pointed out in your letter, EPA responded to an earlier request for jurisdictional advice on Laguna Gatuna on August 13, 1987, concluding that the information provided with that request did not indicate it a "water of the United States." Significantly, the information on which that conclusion was based included a statement that Laguna Gatuna "supports no wildlife...of any kind."

In essence, we regard your inquiry as a request for reconsideration of that advice on the basis of information recently provided by the Bureau of Land Management (BLM) and the U.S. Fish & Wildlife Service (USFWS). In contrast to the basis for EPA's August 13, 1987 advice, that information indicates Laguna Gatuna is in fact used as a feeding and loafing area by migratory birds during their spring and fall migrations and as a nesting area during the breeding leason. Although neither BLM or USFWS specifically identifies the species using the playa, their letters suggest they may include listed threatened and endangered species, including the Aplomado Falcon and Snowy Plover, and clearly show Laguna Gatuna is susceptible to use by those migratory species.

EPA Region 6 has regarded use by migratory birds as a use in interstate commerce since at least 1979. See, e.g., "Lake Whalen -- 'Navigable Waters' Determination," 1 Gen. Couns. Ops. 165 (January 26, 1979). Under the Agency's current definition of "waters of the United States" at 40 CFR §122.2, even potential use by migratory birds is sufficient to show a specific surface water is subject to federal jurisdiction under the Clean Water Act. Accordingly, the information submitted by BLM and USFWS compels a conclusion that Laguna Gatuna is indeed a water of the United States. Section 301(a) of the Clean Water Act, 33 U.S.C. §1311(a), thus prohibits

permit for a surface brine disposal facility proposed by Petro-Thermo Corporation. It did not, however, indicate the location or nature of the wells producing the brine or whether the contemplated permit would authorize its discharge to Laguna Gatuna. If any of the wells producing that brine fall within the Onshore Subcategory of the Oil and Gas Extraction Point Source, its discharge to Laguna Gatuna is presumably prohibited by NPDES General Permit NMG320000. See 56 Fed. Reg. 7698 (February 25, 1991). Moreover, Section 510 of the Clean Water Act, 33 U.S.C. §1370, preempts New Mexico's authority to authorize discharges of Onshore Subcategory produced water to any water of the United States, including Laguna Gatuna.

Please note that we do not here determine that Petro-Thermo's proposed discharge would necessarily be prohibited by NPDES Permit NMG320000. Possibly, it would be subject to another subcategory of the Oil and Gas Extraction Point Source Category and might thus be authorized to discharge through issuance of an individual NPDES permit with effluent limitations reflecting appropriate levels of control for that subcategory, New Mexico's water quality standards, and other applicable State and federal law. Making a decision on that issue would, however, require substantially more information on the proposed facility and discharge.

We are providing a copy of this letter to the attorneys which requested the 1987 jurisdictional advice and to Laguna Gatuna, Inc., which we understand may now be discharging wastewater to Laguna Gatuna without an NPDES permit. If there are further questions in this matter, please call Assistant Regional Counsel Pat Rankin at (214) 655-2106.

Sincerely yours,

Mipr O. Kunds-Myron Knudson, P.E.

Director

Water Management Division

cc:

Mr. Tom O'Brien

**USFWLS** 

Mr. T. Kreager

BLM

Petro-Thermo Corporation

Laguna Gatuna, Inc.

Michael R. Comeau, Esq. Stephenson, Carpenter, Crout & Olmsted

Paul Watler, Esq. Jenkins & Gilchrist Director
New Mexico Department of Fish and Game

HOIVISION

: 50 78 P MA

## UNITED STATES DEPARTMENT OF THE INTERIOR

## FISH AND WILDLIFE SERVICE

Ecological Services Suite D, 3530 Pan American Highway, NE Albuquerque, New Mexico 87107

March 8, 1991

Certified Mail P 453 015 706

Mr. David Boyer State of New Mexico Energy, Minerals and Natural Resources Department Oil Conservation Division P.O. Box 2088 Santa Fe, New Mexico 87504-2088

Dear Mr. Boyer:

Per your request in a conversation with Scott Hamilton-McLean on March 7, 1991, we are providing you a copy of our February 27, 1991, letter to the Director regarding our comments on the Petro-Thermo Corporation's proposal to construct and operate a commercial surface disposal facility for brine water generated in conjunction with the production of oil and gas in Lea County, New Mexico.

If you have any questions or need additional information, please call Richard Roy or Thomas O'Brien at (505) 883-7877.

Thomas 70 Brien

Jennifer Fowler-Propst
Field Supervisor

Enclosure

cc: (wo/enc)

Regional Director, U.S. Fish and Wildlife Service, Fish and Wildlife Enhancement, Albuquerque, New Mexico



## UNITED STATES DEPARTMENT OF THE INTERIOR

### FISH AND WILDLIFE SERVICE

Ecological Services
Suite D, 3530 Pan American Highway, NE
Albuquerque, New Mexico 87107

February 27, 1991

Cons. #2-22-91-I-081

Mr. William Lemay, Director
State of New Mexico Energy, Minerals
and Natural Resources Department
Oil Conservation Division
P. O. Box 2088
Santa Fe, New Mexico 87504-2088

Dear Mr. Lemay:

We have reviewed the public notice issued January 16, 1991, regarding the Petro-Thermo Corporation proposal to construct and operate a commercial surface disposal facility for brine water generated in conjunction with the production of oil and gas. The location of the proposed facility is the NW 1/4, NE 1/4 of Section 19, T2OS, R33E, NMPM, Lea County, New Mexico. Produced water (brine) received at the facility for disposal will be processed in a mechanical oil/water separator to remove any incidental oil prior to final disposal into a natural playa, Laguna Gatuna.

The U.S. Fish and Wildlife Service (Service) objects to the issuance of this permit for the following reasons.

1. The U.S. Bureau of Land Management, Carlsbad Resource Area, has documented the occurrence of the endangered Aplomado falcon in the area near Laguna Gatuna. Nesting activity of the candidate Category II snowy plover in playas near Laguna Gatuna (Jesse Juen, Personal Communication, 1989) has also been documented. There is a possibility that organic and inorganic contaminants originating from this facility may accumulate in food chain organisms such as brine shrimp and brine flies. These organisms may then be consumed by migratory birds such as the snowy plover and other shorebirds. The Aplomado falcon may become exposed to and affected by contaminants present in its prey which is primarily small birds.

If migratory birds or endangered species become exposed to or accumulate harmful levels of contaminants, this may constitute "take" under the Migratory Bird Treaty Act (MBTA) (16 USC 701-708) or the Endangered Species Act (ESA) (16 USC 1531 et seq.). Section 703 of the MBTA makes it unlawful for anyone at anytime or in any manner to "kill" any migratory bird unless permitted by regulation promulgated under it. "Any person, association,

partnership, or corporation who shall violate any provision of the MBTA or Sections 703 to 711 of the Act . . . shall be deemed guilty of a misdemeanor and . . . shall be fined not more than \$500 or imprisoned for not more than 6 months."

while the MBTA does not directly address the killing of migratory birds by resource contaminants, the courts have interpreted the MBTA as doing so. The courts have also stated that the MBTA can be constitutionally applied to impose criminal penalties on persons who did not intend to kill migratory birds (Legislative Authorities, U.S. Fish and Wildlife Service, 12 ESM 80, January 25, 1984). The term "take" under the ESA is defined as meaning to harm, harass, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to attempt to engage in any such conduct (Section 1532 (19)). The ESA also contains elaborate civil and criminal penalty sections in Section 11 (Section 1540). The civil penalties range from fines of \$500-\$10,000 for each violation of the ESA (Section 1540(a)). Criminal penalties range from \$10,000 or 6 months imprisonment or both, to \$20,000 or 1 year imprisonment or both (Section 1540(b)).

- 2. The Service asserts that Laguna Gatuna is a surface water of the United States. Under the Clean Water Act (CWA) (40 CFR Ch I, Part 122, Section 122.2(c) Definitions), waters of the United States means . . . "all other waters such as intrastate lakes, rivers, streams (including intermittent streams), mudflats, sandflats, 'wetlands,' sloughs, prairie potholes, wet meadows, playa lakes, or natural ponds, the use, degradation, or destruction would affect or could affect interstate or foreign commerce . . . " Laguna Gatuna is used by migratory birds for feeding and loafing areas during spring and fall migration and for nesting during the breeding season. Therefore, Petro-Thermo Corporation must apply for and be granted a National Pollution Discharge Elimination System (NPDES) permit prior to the commencement of disposal activities at the site. The NPDES program requires a permit for the discharge of "pollutants" from any "point source" into the "waters of the United States" (40 CFR Ch I, Part 122.1(A)(b)). The CWA does not make a distinction between saline and freshwater in the definition of "Surface Waters of the United States."
- 3. The permit application references geological and hydrological evidence intended to demonstrate that the disposal of oil field wastewater into Laguna Gatuna will not adversely impact freshwater. This information must be provided to the Service before a determination that aquatic life criteria for organisms under our jurisdiction are not exceeded. Furthermore, the Service believes that periodic monitoring for hydrogen sulfide and dissolved sulfides along the lakeshore is inadequate to protect surface water quality. There is no mention in the permit application regarding monitoring of the discharge for organic or

inorganic toxic pollutants, nor is evidence presented that the disposal of oil field wastewater will not adversely impact surface water resources of Laguna Gatuna.

4. The overflow pit located immediately west of the unloading pad that will be utilized to contain overflow from T-3 and T-4 should be lined to prevent hydrocarbon contamination to groundwater and netted to prevent migratory bird access.

Thank you for the opportunity to comment on this public notice. If there are any questions, please call Richard Roy or Thomas O'Brien at (505) 883-7877 or FTS 474-7877.

Sincerely,

Jennifer Fowler-Propst

Field Supervisor

cc:

Mr. Glenn Saums, New Mexico Environmental Improvement Division, Santa Fe, New Mexico

Regional Administrator, U.S. Environmental Protection Agency, Dallas, Texas Director, New Mexico Department of Game and Fish, Santa Fe, New Mexico District Manager, U.S. Bureau of Land Management, Roswell District, Roswell, New Mexico

Regional Director, U.S. Fish and Wildlife Service, Fish and Wildlife Enhancement, Albuquerque, New Mexico



### New Mexico Health and Environment Department

Bruce King Governor

OENNIS BOYD

MICHAEL J. BURKHART

RICHARD MITZELFELT

March 7, 1991

Mr. Myron O. Knudson, P.E. Director Water Management Division (6W) USEPA 1445 Ross Avenue Dallas, TX 75202-2733

Attention: Jane Fontenot

RE: Waters of the United States

Dear Mr. Knudson:

We would like to request the Environmental Protection Agency's review of its 1987 decision regarding the status of the Laguna Gatuna located in Lea County, New Mexico as a water of the United States. The EPA has previously gone on record that the Laguna Gatuna, a playa lake, was not a water of the U.S. (see attachment A). The New Mexico Oil Conservation Division (OCD) has been proceeding with a state permit for Petro-Thermo Corporation's proposal for a surface brine water disposal facility with consideration of the EPA's 1987 decision. In response to OCD's public notice, both the U.S. Fish and Wildlife Service and the U.S. Bureau of Land Management have indicated their opinions that: Laguna Gatuna should be a "water of the United States"; discharges to the lake should be regulated through an NPDES permit; and endangered species are involved. (See attachments B & C).

In order to resolve this issue, we request EPA's prompt consideration of this matter. If you have any questions, please contact Glenn Saums of my staff at 827-2827.

Mr. Myron O. Knudson, P.E. March 7, 1991
Page Two

Sincerely,

Jim Piatt

Acting Bureau Chief

Surface Water Quality Bureau

JP:GES:lo

Attachments

xc: David Boyer, Oil Conservation Division

Jennifer Fowler-Propst, USF & WS, Albuquerque T. Kreager, Bureau of Land Management, Roswell



## United States Department of the Interior

### **BUREAU OF LAND MANAGEMENT**

Roswell District Office P.O. Box 1397 Roswell, New Mexico 88202-1397



IN REPLY REFER TO: 1703 (064)

FEB 24 100

William J. LeMay New Mexico Oil Conservation Division P.O. Box 2088 Santa Fe, New Mexico 87501

Dear Mr. LeMay:

The Bureau of Land Management (BLM) wishes to bring to your attention environmental issues related to an application for construction and operation of a produced water disposal facility in Eddy County, New Mexico. We received notification from Petro-Thermo Corporation on January 4, 1991, regarding their intention to construct a surface waste disposal facility at Laguna Gatuna. Petro-Thermo's plan raises concern over the possible effect of their proposed activities on adjacent public land and the associated BLM administered resources.

Our major concern is with Petro-Thermo's plans to discharge produced water into Laguna Gatuna. The environmental impact of produced water disposal is a critical issue. The BLM is particularly concerned with the introduction of hazardous materials to the lake environment from this operation. We believe there is serious potential for contamination of public land and resources from this type of activity.

In addition to being highly saline, produced waters may contain petrogenic hydrocarbons, radionuclides, and volatile and semi-volatile organic hydrocarbon contaminants. Some of the EPA priority pollutants commonly found in produced waters include toluene, phenol, benzene, antimony, arsenic, zinc, and naphthalene. Produced waters also may contain acids. These include aromatic acids, aliphatic fatty acids, acetic acid, formic acid, hydrochloric acid, and ethylene diamine tetracide acid.

Discharge of these types of materials into Laguna Gatuna could have a negative impact on the lake, including that portion of the lake that is administered by the BLM. If the hydrologic conditions at Laguna Gatuna were changed, there is potential for adverse impact on several threatened and endangered species. The U.S. Fish and Wildlife Service lists the Aplomado Falcon, snowy plovers, and brine shrimp among the T&E species in this area.

According to the Clean Water Act (CWA) and 40 CFR 122, the National Pollutant Discharge Elimination System (NPDES) requires a permit for the discharge or proposed discharge of pollutants into any surface water of the United States. Any material added to water (or in some cases a change in the characteristics of water, such as a change in pH or temperature) constitutes a pollutant. Playa lakes such as Laguna Gatuna were included as surface waters of the United States in the July 1, 1987 amendments to the CWA (40 CFR 122.2). Based on these definitions, we believe a NPDES permit is required for this facility. Operation of the proposed facility without a NPDES permit would violate the Clean Water Act.

The BLM is also concerned with possible pollutant migration from unlined pits and potential groundwater contamination. These concerns are magnified by the potential for flooding. The proposed facility is located less than three feet above the lake bed. The BLM is not convinced Petro-Thermo's plans provide adequate protection during flood conditions.

The potential affect on wildlife in the area, including migratory waterfowl, is another BLM concern. To help define the problem, we have requested an opinion from the U.S. Fish and Wildlife Service on the subject.

The BLM feels a detailed environmental analysis is needed to address the potential for pollution of the area from this facility. This assessment would determine the capability of the site and adjacent lands to withstand the effects of the proposal. A review and analysis of the chemical constituents and relative hazards of the disposal product should be included in the assessment.

We understand that the OCD application requires geologic and hydrologic reports. We feel that this information should be reviewed by all affected parties before any decision is made authorizing construction of this project. We therefore request that you make copies of these reports available to interested parties.

Protection of the environment is a priority of the BLM. Every action that impacts or has the potential to impact public lands is examined by the BLM for compliance with environmental laws. These include the Comprehensive Emergency Response Compensation and Liability Act (CERCLA), the Migratory Bird Treaty Act, the Endangered Species Act, the Resource Conservation and Recovery Act (RCRA), and the Clean Water Act (CWA). It is important to point out that we are required by law to pursue action against Petro-Thermo Corporation should their operation adversely affect public lands or resources.

Please keep us informed of any further meetings and opportunities to review and comment on information regarding this project.

Sincerely Yours

V. R. Kunger

District Manager





#### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

GARREY CARRUTHERS
GOVERNOR

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

#### **MEMORANDUM**

TO:

Joan Maestas thru Zilla Porter Padilla

State Land Office, Commercial Resources

FROM:

Bob Stovall

SUBJECT:

Transferable Salt Water Disposal Permit

DATE:

February 23, 1990

I am responding to your request for an opinion from this agency regarding the possibility of the SLO obtaining a permit from OCD for a salt water disposal facility which could then be transferred to a purchaser of the property.

As I understand the situation, Larry Squires, who is the owner of Laguna Gatuna, Inc., currently operates a disposal facility on lands which he has leased from the SLO. He wishes to purchase the land, and SLO is willing to sell, but under state law SLO cannot negotiate a private sale with Mr. Squires. The land has to be publicly offered and sold to the highest bidder. SLO would like to offer as part of the package a disposal facility permit.

Under our rule 711, SLO could apply for a facility permit by following all the application requirements in that rule. Those permits are issued to a specific operator for a specific facility, and the OCD looks at the qualifications of the operator as well as the design of the facility. In addition, there is a bonding requirement, and it is not clear whether that can be waived for another state agency.

Once a permit has been issued, it can be transferred upon application of the transferee. The new operator would have to post a new bond to replace that of the transferor, and the OCD would have to approve the new operator and any proposed changes to the facility.

The situation in the case is somewhat different. According to the OCD Environmental Bureau, Mr. Squires currently has three different facilities at Laguna Gatuna. One is a permitted treating plant facility in section 18 in the name of Laguna Gatuna which is no longer being used and which is in need of major cleanup and restoration. The second is a salt water disposal facility in section 18 permitted in the name of Laguna Gatuna which is currently being used. Both facilities appear to be covered by a bond which covers all of section 18. The third is a facility in section 17 which Squires has filed some information on but has not yet actually applied for a permit; that facility

slopermt.mem

Joan Maestas February 23, 1990 Page 2

should not be in use at this time.

It is unclear from your request whether SLO would be seeking to permit the existing facility in the name of SLO or whether it would be applying for a new facility yet to be designed and built. In the former case, SLO could apply for a transfer of the permit which Mr. Squires currently holds. He would have to agree to that. In the latter case SLO would have to provide all of the information required under Rule 711 (attached). Upon the sale of the property, there will probably be some concerns about who is responsible for clean up of the two existing sites.

In summation, the answer to your question is a very definite: it depends. If you wish to pursue the possibilities, either I or our environmental people would be more than happy to talk to you and trying to come up with a workable solution.



November 3, 1988

Ms. Jamie Bailey Oil Conservation Division PO Box 2088 Santa Fe, NM 87504

Dear Ms. Bailey,

After receiving notification from your office that the name change on the treating plant bond, changing the name from Pollution Control, Inc. to Laguna Gatuna, Inc., has been approved, the following name changes need to also be made.

> Order No. R-6718 Change from Pollution Control to Laguna Gatuna Order No. R-3725-A Change from Pollution Control to Laguna Gatuna Order No.R-3725 Change from Larry Squires to Laguna Gatuna

If you have any questions, please free to call me. Thank you for your assistance in this matter.

Larry C/ Squires

President



#### ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

GARREY CARRUTHERS
GOVERNOR

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

August 31, 1988

# CERTIFIED MAIL RETURN RECEIPT REQUESTED

Mr. Larry Squires
POLLUTION CONTROL, Inc.
P. O. Box 2158
Hobbs, New Mexico 88241

RE: Compliance with OCD Rule 711

Dear Mr. Squires:

The Oil Conservation Division (OCD) has reviewed your application dated August 17, 1988 requesting administrative approval for the existing facility in the NE/4 NW/4 of Section 18, Township 20 South, Range 33 East NMPM, Lea County, New Mexico, and the proposed construction and disposal system detailed in drawings numbered PCI-4 and PCI-4A in the application. At this time approval for modification of the truck terminal in the SW/4 of Section 17 and NW/4 of Section 20, Township 20 South, Range 33 East is not being sought.

The application was submitted pursuant to OCD Rule 711 and is hereby approved with the following conditions:

- 1. A plan for initial and periodic integrity testing of the pipelines leading to the facility will be submitted for approval by the OCD within 60 days. A commitment for repair of the pipelines in the event of any leaks must also be furnished.
- 2. In the event of closure of the facility, the pipelines must be plugged to prevent further disposal of fluids at the facility.

Mr. Larry Squires August 31, 1988 Page 2

- 3. The eastern and western pit areas detailed in drawing number PCI-2 of the application will be closed by filling and mounding with soil by August 30, 1990.
- 4. All water discharged from the gunbarrels will be directed into the settle/skim pit where a minimum 2-1/2 foot freeboard will be maintained to prevent overtopping of the berm. No fluid will be allowed to be discharged or leaked on to the surrounding terrain prior to discharge through pipe into Laguna Gatuna.

Please be advised that the approval of this facility, proposed construction and disposal system does not relieve you of liability should your operation result in actual pollution of surface or ground waters which may be actionable under other laws and/or regulations.

Sincerely,

William J. LeMay

Director

WJL:JB:sl

cc: OCD - Hobbs



August 17, 1988

New Mexico Oil Conservation Division P. O. Box 2088
Santa Fe, New Mexico 87504

Attention: David Boyer

Re: Compliance w/OCD Order R-8662 and Rule #711 (L. C. Squires & Pollution Control, Inc.)

#### Gentlemen:

Larry C. Squires and Pollution Control, Inc. have obtained OCD Order Nos. R-3725 and R-3725-A, which authorizes disposal of oil field waters and wastes into the Laguna Gatuna natural salt lake, and R-6718, which authorizes the treatment and reclaiming of sediment oil at the Laguna Gatuna disposal facility. A \$25,000.00 bond as required in OCD Order No. R-8662 has been secured along with an additional \$10,000.00 bond which is required by the BLM.

The following information is furnished in compliance with Rule No. 711 and we are respectfully requesting administrative approval for this previously permitted facility.

- 1. A plat and topographic map showing the location of the facility located in the NW/4 of Section 18 and SW/4 of Section 17, T20S, R33E, NMPM, Lea County, New Mexico (Dwg PCI-1). There are no dwellings or water wells within one mile of the facility.
- 2. The landowners of record are the Bureau of Land Management (USA), State of New Mexico and Snyder Ranches, Inc., P. O. Box 2158, Hobbs, New Mexico. Snyder Ranches, Inc. owns or has the surface grazing leases from the Bureau of Land Management and State of New Mexico for all lands surrounding the Laguna Gatuna disposal facility and controls all access to the site.
- 3. Diagrams with land descriptions are enclosed. See Drawings PCI-2 and PCI-3 which shows existing disposal facilities in the SW/4 SW/4 of Section 17 and NE/4 NW/4 of Section 18. Drawings PCI-4 and 4-A show proposed new site located in the NW/4 NW/4 of Section 18.



#### Page 2 - New Mexico Oil Conservation Division - 8-17-88

- The plan for disposal of oilfield brines at an additional Laguna Gatuna disposal site located in the NW/4 NW/4 of Section 18 is to transport the water by pipeline to a series of terminal tanks where any hydrocarbons can be removed; from these terminal tanks the water will be circulated through an unlined surface pit for additional skimming and settling (see Dwg PCI-4), and from that pit the water will be transported by pipeline to a second holding area for final skimming and settling before being discharged into the Laguna Gatuna for evaporation. An existing discharge facility located in the SW/4 SW/4 of Section 17 will receive water by pipeline and by approved truckers (see Dwg PCI-3) into a tank and then discharged into a number of skim/ settling pits before being discharged into the Laguna Gatuna. A minimum of solid wastes will be accepted at existing facilities located in the NE/4 NW/4 of Section 18 (see Dwg PCI-2). This material will be properly identified and placed in eathern pits, allowed to cure and when adequately cured the pits will be closed. Any water will be pulled off and disposed into the Laguna Gatuna and any oil will be reclaimed and sold to a certified oil reclaiming facility.
- 5. Any significant spills will be routinely reported to the OCD and appropriate clean up will be accomplished at the earliest possible time.
- 6. The Laguna Gatuna facilities will be checked on a daily schedule by qualified personnel to ensure permit compliance and maintenance will be accomplished on a regular basis.
- 7. Several old pits at the present facilities located in the NE/4 NW/4 of Section 18 are scheduled to be closed within the next two years as water and recoverable hydrocarbons are removed. This will be done on a continuing basis and as pits are adequately cured they will be closed. Flood control dikes will be constructed around the old pits to prevent invasion of rain waters into the pit area.



- Page 3 New Mexico Oil Conservation Division 8-17-88
  - Geological and hydrological evidence demonstrating that disposal of oil field wastes will be adversely impact fresh water was done by Geohydrology Associates, Inc. and is enclosed. This was furnished at previous OCD hearing in 1969 and 1984.
  - Notice requirements were previously given before the 1969 and 1984 hearings.

I certify that the information submitted is true, accurate and complete to the best of my knowledge.

Respectfully submitted

Larry C. **S**quires President

LCS/jp

Encls: OCD Order No. R-3725

OCD Order No. R-3725-A OCD Order No. R-6718

Report/Hydrologic Assessment

Dwgs. PCI-1

PC1-2 PCI-3

PCI-4

PCI-4A

cc: OCD-Hobbs





REGION VI

ALLIED BANK TOWER AT FOUNTAIN PLACE 1445 ROSS AVENUE DALLAS, TEXAS 75202

August 13, 1987



STEPHENSON, CARPENTER, CROUT & OLMSTED

Attorneys at Law Post Office Box 669 Santa Fe, New Mexico 87504-0669

Date: May 19, 1988

Ms. Jami Bailey

Oil Conservation Division

Re: Pollution Control, Inc.

#### COMMENT:

- 1. For your information.
- 2. Other:

Dear Ms. Bailey:

Larry Squires asked that I deliver copies of the following correspondence:

- Letter to K. Huffman dated July 29, 1987, 1. from myself; and
- Letter to me dated August 13, 1987, from James L. Collins.

Michael R. Comeau C

MRC:cyc Enclosures

STEPHENSON. CARPENTER, CROUT, & OLMSTED

in which you t "waters of

onsider the that term is aters of the ate or foreign creational, erce, and that the United es that Laguna If you have

sel

Attorneys at Law
Coronado Building, 141 E. Palace Avenue
Post Office Box 669
Santa Fe, New Mexico 87504-0669

Telephone (505) 982-4611 Telecopier (505) 988-2987

Donnan Stephenson
Of Counsel

Richard N. Carpenter G. Stanley Crout Charles D. Olmsted Michael R. Comeau Larry D. Maldegen Michael W. Brennan Sunny J. Nixon William P. Templeman C. Mott Woolley Jon J. Indall Stephen J. Lauer Michael S. Yesley
Lindsay A. Lovejoy, Jr.
Patricia J. Turner
Richard S. Mackenzie
Joseph E. Manges
Candace Kern
Rebecca Dempsey
Paula A. Johnson
Nicholas F. Persampieri
Grey W. Handy

July 29, 1987

Mr. Ken Huffman Chief, Industrial Permits Section Region VI United States Environmental Protection Agency 1445 Ross Avenue Dallas, Texas 75202-2733

Re: Pollution Control, Inc.

Brine Disposal Project in Lea County, New Mexico

Dear Mr. Huffman:

This letter is in response to your suggestion at our meeting on July 16, 1987, that Pollution Control, Inc. ("Pollution Control"), submit a letter with appropriate documentation setting forth the reasons why we believe the playa in which Pollution Control proposes to dispose produced oil well brine is not a "water of the United States" as that term is used in the Clean Water Act ("CWA") and applicable regulations. At the outset, we would like to express our appreciation for the opportunity to discuss this matter with you and to submit this letter. We hope that a prompt resolution of the issue will be achieved.

Pollution Control is a New Mexico corporation owned and operated by Larry Squires, a resident of Lea County, New Mexico. Mr. Squires is also the owner and operator of Snyder Ranches, a large cattle ranching property located in Lea County. The Snyder Ranches operation consists of fee land and land leased from the State of New Mexico and the Bureau of Land Management. The operations of Pollution Control are confined to Snyder Ranch property and property leased from the State and the BLM.

For approximately fifteen years, Pollution Control has operated a surface salt water disposal facility at a playa known as "Laguna Gatuna" located on Sections 17 and 18, Township 20 South, Range 32 East, N.M.P.M., under orders issued by the Oil Conservation Division of the New Mexico Energy and Minerals Department. The most recent Order of the Division (In the Matter of the Hearing Called by the Oil Conservation Division for the Purpose of Considering: Application of Pollution Control, Inc. for an Amendment to Division Order No. R3725, Lea County, New Mexico ("1984 Order"), Case No. 8292, Order of the Division (August 20, 1984)) is

attached to the enclosed "Hydrologic Assessment of the Salt Lakes Area, Western Lea County, New Mexico" prepared by Geohydrology Associates, Inc. in 1984 ("Hydrologic Assessment").\*

In its 1984 Order, which authorized an expansion of Pollution Control's disposal facilities, the Oil Conservation Division made the following findings:

- (5) That the geohydrologic evidence presented in this case reaffirms or establishes that:
- (a) Laguna Gatuna is sited within the confines of a collapse structure;
- (b) naturally occurring highly mineralized springs are located on the periphery of Laguna Gatuna:
- (c) the water in Laguna Gatuna is not fresh water;
- (d) that portion of the Triassic red beds underlying said Laguna Gatuna is virtually impermeable and therefore prevents seepage from said lake into the sand stringers within said red beds which may contain fresh water;
- (e) as to sands that are in communication with said lake, the major flow of surface and subsurface water within the boundaries of said collapse structure is towards Laguna Gatuna;
- (f) the evidence indicates that there is no leakage of water from Laguna Gatuna into the adjoining formations containing fresh waters;
- (g) the salt springs and brine associated with Laguna Gatuna are more highly mineralized than water collected from oil wells in the immediate area;

<sup>\*</sup> We have also enclosed the Business Lease between the State of New Mexico and Pollution Control, dated October 28, 1984; the Decision, dated October 19, 1979, of the Bureau of Land Management, United States Department of the Interior, to grant a right-of-way to Pollution Control for the operation of the salt water disposal facility; and a detailed map of Laguna Gatuna showing the land ownership and leases in the vicinity of Pollution Control's facilities.

- (h) Laguna Gatuna is a suitable disposal site for as much as 30,000 barrels of brine per day;
- (i) there is no evidence that the fifteen years of operation by Pollution Control Inc [sic] has adversely impacted the hydrological system in the vicinity of Laguna Gatuna and that continued operations as proposed will not endanger the pre-1969 conditions;
- (j) Laguna Gatuna is a satisfactory repository for solid oil-field waste products; and,
- (k) the utilization of Laguna Gatuna for the disposal of water produced in conjunction with the production of oil or gas, or both, and oil field waste products, including drill cuttings and drilling muds will not constitute a hazard to fresh water supplies that may exist in the vicinity of said lake.

1984 Order, page 37.

The evidence on which the Oil Conservation Division based these findings included the Hydrologic Assessment, which concluded inter alia that

There is no evidence to show that 15 years of operation by Pollution Control, Inc., has adversely impacted the hydrologic system in the vicinity of Laguna Gatuna. Continued operation of the existing facilities will not endanger the pre-1969 conditions.

Hydrologic Assessment, page 33.

Although Pollution Control's disposal activities are authorized by the Oil Conservation Division, the question has recently been raised whether those activities constitute disposal into "waters of the United States" for the purposes of the CWA. Section 502(7) of the Federal Water Pollution Control Act ("FWPCA"), 33 U.S.C.A. § 1362(7), defines "navigable waters" as "the waters of the United States, including the territorial seas." To implement the FWPCA, EPA has adopted a detailed definition of "waters of the United States" in 40 C.F.R. § 122.2. We believe that a careful examination of EPA's definition demonstrates that Pollution Control's activities do not involve the "waters of the United States."

EPA's definition of "waters of the United States" must of course be read in the light of the many cases that have determined the constitutional limits of federal jurisdiction under the CWA. Those cases make it clear that the particular conditions of a disposal property govern the application of the definition, and so we turn next to a description of the property involved.

Pollution Control proposes to dispose of oil-field brines entirely on property that is owned or leased by Pollution Control or Mr. Squires or to which a right-of-way has been granted by the BLM for the purpose of the disposal activities. The produced water that will be disposed of is not considered a "hazardous waste" by EPA and contains no hazardous waste constituents regulated by the EPA. See letter dated June 3, 1987, from Jami Bailey, Oil Conservation Division, to Larry Squires (attached to Hydrologic Assessment), page 39A. The property is a playa that remains dry except during periods of heavy rainfall. The area is a collapse structure that drains less than two square miles. Through two precipitation tributaries, about 8000 gallons of precipitation runoff are entrapped annually. See Hydrologic Assessment, pages 27-30.

The playa is a natural groundwater discharge point, with naturally occurring, highly mineralized, intermittent springs on the periphery of Laguna Gatuna. *Id.* at page 26. The stratum underlying the area is virtually impermeable and therefore prevents seepage. There is no evidence that previous operation of the facility for fifteen years has had any adverse impact on the hydrological system in the vicinity. To the contrary, the evidence indicates no leakage of water into adjoining formations. 1984 Order at page 37.

The water of Laguna Gatuna is not fresh, id., and it supports no wildlife or agriculture of any kind. (Fresh water needs in the area are supplied by pipeline.) No recreation of any sort --hunting, hiking, boating or fishing -- occurs in the area; its natural conditions do not attract visitors. There is no evidence of use by migratory waterfowl.

Essentially, the playa is a natural depression with water that, when intermittently present, is not fresh and does not flow to or reach any other body of water on the surface or underground, regularly or intermittently. There is no use of the water by interstate travelers or for interstate commercial purposes, since it has no recreational value of any kind and is unsuited for agricultural production. Finally, the discharge is entirely contained on property that is owned or leased by Pollution Control.

Under EPA's definition, a property is a "water of the United States" if it is included in any one of several categories. We believe that none of the categories applies to the playa proposed to be used by Pollution Control. The first category is "all waters which are currently used, were used in the past, or may be susceptible to use in interstate or foreign commerce." As noted above, the playa is unsuitable for any recreational or agricultural use and supports no wildlife. Thus, the playa has no attraction for visitors in interstate commerce and supports no agricultural or other production that might go into interstate commerce.

The second category -- "all interstate waters, including interstate wetlands" -- is inapplicable because the playa is located entirely within Lea County, New Mexico.

The third category of EPA's definition is:

All other waters such as intrastate lakes, rivers, streams (including intermittent streams), mudflats, sandflats, "wetlands," sloughs, prairie potholes, wet meadows, playa lakes, or natural ponds the use, degradation, or destruction of which would affect or could affect interstate or foreign commerce including any such waters

- (1) Which are or could be used by interstate or foreign travelers for recreational or other purposes;
- (2) From which fish or shellfish are or could be taken and sold in interstate or foreign commerce; or
- (3) Which are used or could be used for industrial purposes by industries in interstate commerce[.]

The area used by Pollution Control for disposal of brine is clearly a "playa lake," but its use has no effect, and can have no effect, on interstate or foreign commerce. Taking the subcategories in order, the playa has no attraction for travelers since it is devoid of any recreational possibilities, it does not support any fish or shellfish, and the waters that collect occasionally after heavy precipitation are not suitable for any industrial use. Further, there is no agricultural or other use that might affect interstate or foreign commerce, and no way in which the degradation or destruction of the playa could affect interstate or foreign commerce.

The fourth category -- "impoundments of waters otherwise defined as waters of the United States" -- is inapplicable because the playa does not impound any "waters of the United States." The only waters present are precipitation after a heavy rainfall. The fifth category -- "tributaries" of waters of the United States -- is inapplicable because the playa has no flow to any other water system, either on the surface or in groundwater. The next category -- "the territorial sea" -- is obviously inapplicable. The final category -- "wetlands" adjacent to waters of the United States -- is inapplicable because there are no waters of the United States in the vicinity of the playa.

We note that Laguna Gatuna might be considered a "waste treatment system," which EPA's definition specifically excludes from "waters of the United States." The provision that limits this exclusion to man-made bodies of water is currently under suspension. See 45 Federal Register 48620 (July 21, 1980); 48 Federal Register 14146 (April 1, 1983). If EPA does not fully agree with our position

that the playa is not a "water of the United States," we request that the agency determine whether this exclusion is applicable.

The case law relating to the definition of "waters of the United States" supports our position that the playa is not covered by the CWA. The federal courts have upheld CWA coverage for discharges that are not directly into navigable waterways, but in no case has a court approved coverage of a discharge that does not have a tributary relationship to a navigable-in-fact waterway or to a water with a significant effect on interstate commerce.

In U.S. v. City of Fort Pierre, S.D., 747 F.2d 464, 21 ERC 2054 (8th Cir. 1984), the Eight Circuit concluded that the Fort Pierre Slough is not a wetland as contemplated by Congress in passing the Clean Water Act. The court noted that the Slough is located in a privately owned area and has no hydrological connection with the nearby Missouri River. Any standing water in the Slough resulted only from rains and runoff, until certain actions by the Corps of Engineers trapped the surface water in the Slough. The Slough "is now devoid of wildlife, supports no fish or fowl, and is not conducive to recreation or other significant use by the public." 747 F.2d at The quoted language is an accurate description of the playa used by Pollution Control for brine disposal. Although the court in City of Fort Pierre limited its holding to the situation resulting from the Corps' intervention, the characteristics of the site which the court found persuasive in determining that the Slough was not a "water of the United States" would lead to the same result in the case of Laguna Gatuna.

The cases that have upheld coverage under the CWA are easily distinguishable on their facts. CWA coverage has been found by the Tenth Circuit in cases involving tributaries -- regular or intermittent -- of waters of the United States, see Ward v. Coleman, 598 F.2d 1187 (10th Cir. 1979), reversed on other grounds, 448 U.S. 242 (1980), and U.S. v. Texas Pipe Line Co., 611 F.2d 345 (10th Cir. 1979); a non-navigable stream, located entirely within one county, which supported trout and beaver and was used for agricultural irrigation, see U.S. v. Earth Sciences, Inc., 599 F.2d 368 (10th Cir. 1979); and an arroyo which might connect with navigable-in-fact streams during times of intense rainfall and through underground acquifers, see Quivira Min. Co. v. U.S.E.P.A., 765 F.2d 126 (10th Cir. 1985). Other courts have upheld coverage under the CWA in cases where discharges to normally dry arroyos could reasonably end up in a body of water in which there is some public interest, U.S. v. Phelps Dodge Corp., 391 F. Supp. 1181 (D. Ariz. 1975); and where destruction of wetlands surrounding a lake would reduce the lake's attraction to the many out-of-state visitors who came for recreation, see U.S. v. Byrd, 609 F.2d 1204 (7th Cir. 1979).

None of these factual situations which have supported findings of CWA coverage is present at the playa. No water flows from the playa -- as a tributary or through underground acquifers -- to any other

body of water. The playa does not support any wildlife or agriculture, and it has no attraction for visitors.

Arbuckle et al., Environmental Law Handbook (8th Ed. 1985), state at page 271 that the few exclusions to the definition of "waters of the United States" which have been recognized to date "seem to be limited to situations where the waterway in question is wholly confined on the property of the discharger, does not result in any flow beyond the property line, and is not available for significant public use." The playa where Pollution Control proposes to dispose brine presents all of these elements of an exclusion from the definition of "waters of the United States."

For the reasons set forth above, we submit that Laguna Gatuna is not a "water of the United States." Please advise us if any further information is required to assist your determination.

Very truly yours,

Michael R. Comeau

MRC/jrb Enclosures:

Hydrologic Assessment of the Salt Lakes Area, Western Lea County, New Mexico prepared by Geohydrology Associates, Inc. in 1984

Business Lease between the State of New Mexico and Pollution Control, dated October 28, 1984

The Decision, dated October 19, 1979, of the Bureau of Land Management, United States Department of the Interior, to grant a right-of-way to Pollution Control for the operation of the salt water disposal facility

A detailed map of Laguna Gatuna showing the land ownership and leases in the vicinity of Pollution Control's facilities



## ENERGY AND MINERALS DEPARTMENT

OIL CONSERVATION DIVISION



GARREY CARRUTHERS

POST OFFICE BOX 2088 STATE LAND OFFICE BUILDING SANTA FE, NEW MEXICO 87501 (505) 827-5800

June 3, 1987

Mr. Larry Squires Pollution Control P.O. Box 840 Hobbs, NM 88240

Dear Mr. Squires:

In response to your request for interpretation of laboratory analyses of samples taken at your facility on January 28, 1987, the following observations can be made:

- 1) There are high levels of aromatic hydrocarbons and salts present which are characteristic of produced water. At this time, produced water and drilling fluids are not considered to be "hazardous wastes" by the US EPA.
- 2) No solvents or halogenated hydrocarbons were detected. No hazardous wastes constituents currently regulated by the EPA were found at the facility.

If you have any other questions, please call me at 827-5884.

Sincerely,

Jami Bailey

Field Representative

JB/ag



GOVERNOR

OIL CONSERVATION DIVISION

POST OFFICE BOX 2088 STATE LAND OFFICE BUILDING SANTA FE, NEW MEXICO 87501 (505) 827-5800

March 25, 1987

Mr. Steve Foster Pollution Control 2904 W. Marland Hobbs, New Mexico

POBOX 840

88240

Dear Mr. Foster:

Enclosed are laboratory reports on samples taken at the Pollution Control facilities on January 28, 1987. If you have any questions concerning these reports, please contact me at 827-5884.

Sincerely,

Jami Bailey

Field Representative

JB/cr

XC: OCD-Hobbs

IN THE MATTER OF THE HEARING CALLED BY THE OIL CONSERVATION DIVISION FOR THE PURPOSE OF CONSIDERING:

CASE NO. 8292 Order No. R-3725-A

APPLICATION OF POLLUTION CONTROL INC. FOR AN AMENDMENT TO DIVISION ORDER NO. R-3725, LEA COUNTY, NEW MEXICO.

#### ORDER OF THE DIVISION

#### BY THE DIVISION:

This cause came on for hearing at 8:00 a.m. on August 8, 1984, before Examiner Richard L. Stamets.

NOW, on this 20th day of August, 1984, the Division Director, having considered the testimony, the records, and the recommendations of the Examiner, and being fully advised in the premises,

#### FINDS:

- (1) That due public notice having been given as required by law, the Division has jurisdiction of this cause and the subject matter thereof.
- (2) That the applicant, Pollution Control Inc., has been operating a surface salt water disposal facility at Laguna Gatuna and more specifically at the NE/4 NW/4 of Section 18, Township 20 South, Range 32 East, NMPM, Lea County, New Mexico, as an exception to Division Order No. R-3221, under the terms and conditions of Division Order No. R-3725.
- (3) That the applicant now seeks the amendment of said Order No. R-3725 to permit the use of a second salt water disposal site on Laguna Gatuna in the SW/4 SW/4 of Section 17 in said township and for authorization to dispose of solid oil-field waste products including drilling mud and cuttings at either or both sites.
- (4) That applicant proposes to utilize the expanded facility at a rate combined with its existing Laguna Gatuna facility so that the total combined discharge from both sites does not exceed 30,000 barrels of salt water per day.

- (5) That the geohydrologic evidence presented in this case reaffirms or establishes that:
- (a) Laguna Gatuna is sited within the confines of a collapse structure;
- (b) naturally occurring highly mineralized springs are located on the periphery of Laguna Gatuna;
  - (c) the water in Laguna Gatuna is not fresh water;
- (d) that portion of the Triassic red beds underlying said Laguna Gatuna is virtually impermeable and therefore prevents seepage from said lake into the sand stringers within said red beds which may contain fresh water;
- (e) as to sands that are in communication with said lake, the major flow of surface and subsurface water within the boundaries of said collapse structure is towards Laguna Gatuna;
- (f) the evidence indicates that there is no leakage of water from Laguna Gatuna into the adjoining formations containing fresh waters;
- (g) the salt springs and brine associated with Laguna Gatuna are more highly mineralized than water collected from oil wells in the immediate area;
- (h) Laguna Gatuna is a suitable disposal site for as much as 30,000 barrels of brine per day;
- (i) there is no evidence that the fifteen years of operation by Pollution Control Inc has adversely impacted the hydrological system in the vicinity of Laguna Gatuna and that continued operations as proposed will not endanger the pre-1969 conditions;
- (j) Laguna Gatuna is a satisfactory repository for solid oil-field waste products; and,
- (k) the utilization of Laguna Gatuna for the disposal of water produced in conjunction with the production of oil or gas, or both, and oil field waste products, including drill cuttings and drilling muds will not constitute a hazard to fresh water supplies that may exist in the vicinity of said lake.
- (6) That the applicant should be authorized the proposed expansion of its disposal operations at Laguna Gatuna.

#### IT IS THEREFORE ORDERED:

(1) That the applicant, Pollution Control Inc., is hereby authorized the expansion of its Laguna Gatuna disposal operation by approval of a second disposal site located in the SW/4 SW/4 of Section 17, Township 20 South, Range 32 East, NMPM, Lea County, New Mexico, and for disposal of solid oil-field wastes including drilling mud and cuttings at this and/or the original disposal site.

PROVIDED HOWEVER, that the total disposal rate of salt water into Laguna Gatuna at both sites shall not exceed 30,000 barrels per day.

PROVIDED FURTHER, that the applicant shall not permit any oil from the disposal operations to migrate to the surface of Laguna Gatuna and shall contain any oil contaminated waste products in earthen structures at the disposal sites.

(2) That jurisdiction of this cause is retained for the entry of such further orders as the Division may deem necessary.

DONE at Santa Fe, New Mexico, on the day and year hereinabove designated.

> STATE OF NEW MEXICO OIL CONSERVATION DIVISION

JOE D. RAMEY,

Director

SEAL

IN THE MATTER OF THE HEARING CALLED BY THE OIL CONSERVATION DIVISION FOR THE PURPOSE OF **CONSIDERING:** 

> CASE NO. 7278 Order No. R-6718 为我的事情,我们都有一种的情况,不是不是一个人的情况,我们就被这些一个最后的一个。

> > The state of the s

-೩ಆ೯ ಕ್ರಿಸಿ

APPLICATION OF POLLUTION CONTROL, AND CONTROL INC. FOR AN OIL TREATING PLANT IN THE DESIGNATION OF THE PARTY OF THE PERMIT, LEA COUNTY, NEW MEXICO.

Same transfer in the second

#### ORDER OF THE DIVISION

#### BY THE DIVISION:

This cause came on for hearing at 9 a.m. on June 17, 1981, at Santa Fe, New Mexico, before Examiner Daniel S. Nutter.

NOW, on this <u>lst</u> day of July, **1981**, the Division Director, having considered the testimony, the record, and the recommendations of the Examiner, and being fully advised in the premises, Same of the transfer of the file of the property of Da. The Committee of th

#### FINDS:

- (1) That due public notice having been given as required by law, the Division has jurisdiction of this cause and the subject matter thereof. The Paradian of the the the thereof.
- (2) That the applicant, Pollution Control, Inc., seeks authority to construct and operate a chemical and heat-treatment type oil treating plant in the E/2 NW/4 of Section 18, Township 20 South, Range 33 East, NMPM, Lea County, New Mexico, for the reclamation of sediment oil recovered from waters trucked in to applicant's salt water disposal facilities at Laguna Gatuna, which are operated pursuant to the provisions of Division Order No. R-3725, dated April 16, 1969.
- (3) That dikes, dams and/or emergency pits should be constructed around the plant capable of holding the entire capacity of all tanks and vessels at the plant location in order that sediment oil, reclaimed oil, or waste oil cannot escape from the immediate vicinity of such plant.
- That the proposed plant and method of processing will efficiently process, treat, and reclaim the aforementioned waste oil, thereby salvaging oil which would otherwise be wasted.

(5) That the subject application should be approved as being in the best interests of conservation.

#### IT IS THEREFORE ORDERED:

(1) That the applicant, Pollution Control, Inc., is hereby authorized to install and operate a chemical and heat-treatment type oil treating plant in the E/2 NW/4 of Section 18, Township 20 South, Range 33 East, NMPM, Lea County, New Mexico, for the purpose of treating and reclaiming sediment oil to be obtained from salt water being disposed of in applicant's salt water disposal facilities located at Laguna Gatuna.

PROVIDED HOWEVER, that the continuation of the authorization granted by this order shall be conditioned upon compliance with the laws of the State of New Mexico and the rules and regulations of the New Mexico Oil Conservation Division;

PROVIDED FURTHER, that prior to commencing operation of said plant, the applicant shall file with the Division and obtain approval of a performance bond in the amount of \$10,000.00 conditioned upon substantial compliance with applicable statutes of the State of New Mexico and all rules, regulations and orders of the Oil Conservation Division.

- (2) That the operator of the above-described oil treating plant shall clear and maintain in a condition clear of all debris and vegetation a fireline at least 15 feet in width and encircling the site upon which the plant is located.
- (3) That dikes, dams and/or emergency pits shall be constructed around the plant capable of holding the entire capacity of all tanks and vessels at the plant location and capable of preventing the escape of any sediment oil, reclaimed oil, or waste oil from the immediate vicinity of said plant.
- (4) That jurisdiction of this cause is retained for the entry of such further orders as the Division may deem necessary.

DONE at Santa Fe, New Mexico, on the day and year hereinabove designated.

STATE OF NEW MEXICO

OL CONSERVATION DIVISION

DOE D. RAMEY

Director

S E A L fd/



# ENERGY AND MINERALS DEPARTMENT OIL CONSERVATION DIVISION

TONEY ANAYA

POST OFFICE BOX 2088 STATE LAND OFFICE BUILDING SANTA FE, NEW MEXICO 87501 (505) 827-5800

MEMORANDUM

TO:

R. L. STAMETS, TECHNICAL SUPPORT CHIEF

FROM:

D. G. BOYER, HYDROGEOLOGIST

SUBJECT:

CASE 8292, POLLUTION CONTROL

AMENDMENT TO DIVISION ORDER NO. R-3725

- My main question of Mr. Tim Kelly of Geohydrology Associates, Inc., was directed at clarifying the statement made in Mr. Kelly's report that Laguna Gatuna is a natural groundwater discharge point (P.29, 30). However, the Figure 3 (P.25) water-table contour map could be interpreted as showing groundwater flow from Laguna Gatuna northwest towards Laguna Plata, which would appear to contradict the first statement. Both statements may in fact be correct given the information presented in Figure 2 (P.4). Briny groundwater associated with the collapse features discharges into the lake where it almost always evaporates. These springs are at a higher topographic elevation than the lake. Regional water levels indicate flow (including perhaps some subsurface spring contribution) to the northwest. In other words, a closed contour line (about 3500 feet) might have been drawn around Laguna Gatuna indicating local flow into the lake from springs on the bank walls while regional flow outside this boundary but near the lake is to the north and west. Springs flowing into Laguna Plata from the southeast (from the direction of Laguna Gatuna) are also naturally highly mineralized (in excess of 10,000 mg/l TDS) indicating that subsurface seepage (if any) from additional discharges to Laguna Gatuna would not impact the poor existing water quality in and around Laguna Plata.
- 2. Since the windmill at the well in the NW/2 of Section 21, Township 20 South, Range 33 East, was inoperative, Kelly could not get a sample. However, if a conductivity probe with a long lead (50 feet or so) was available,

Page 2
Memorandum to R. L. Stamets
August 10, 1984

an indication of current water quality in that area could have been obtained. This measurement (and any made at other inoperative windmills near the site) would be useful for comparison with future samples taken after the site has been in operation for some length of time.

3. Regarding the TDS level at which water is protected under WQCC Regulations, if the existing level is between 1,000 and 10,000 TDS, that is the level of protection.

With exception of the clarifying comments and suggestions given above, I support Mr. Kelly's conclusions given in his report on pages 30 to 31.

August 10, 1984 fd/



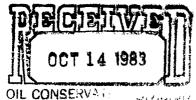


PHONE (505) 393-7544

P.O. BOX 1060

LOVINGTON, NEW MEXICO 88260

October 11, 1983



SANTA FE

LARRY C. SQUIRES STEVE FOSTER Vice President

PAT HENRY

Mr. Joe Ramey Oil Conservation Division P.O. Box 2088 Santa Fe, New Mexico 87501

Dear Mr. Ramey:

This letter is in regards to a conversation I had with Mr. Oscar Simpson approximately August 11, 1983. In the latter part of the afternoon on that date, I received a phone call asking pertinent details of our operations, in which I answered as I would any possible customer. After asking many questions, such as; What materials do you dispose of, Do you dispose of all oil field waste? Mr. Simpson identified himself only after I asked for the third time.

I explained that we were only permitted to dispose of produced water. At that time Mr. Simpson informed me that he was told we were disposing of caustic acid from a gas plant, not telling me of his information source. I imediately conveyed to Mr. Simpson, if this was true it was without our knowledge and definitely without our approval. I asked who the trucking company was and he would not tell me.

Later in the afternoon I found out that he also had a conversation with our plant foreman. This conversation had nearly the same substance.

Mr. Ramey, we feel we have the right of knowing our accusers. Mr. Simpson left me with the feeling our integrity and business standards were less than proper.

Since the time of this conversation and your inspection visit in August, I have tried to find out if any of our customers have hauled us any "hazardous waste", without any success.

October 11, 1983
Page Two

If there is any evidence of someone hauling us any "hazardous waste", without our knowledge or approval, we conscientiously feel we have the justifiable right to know their identity so that we may also rectify the situation from happening again.

Mr. Ramey, we comply with the rules and regulations set forth by the Oil Conservation Division to the best of our ability and would appreciate any assistance in clearing up this matter.

If I may be of any assistance in the future, please feel free to call at any time.

Very truly yours,

POLLUTION CONTROLL, INC.

Steven D. Foster, Vice President

cc: Mr. J.W. Neal
Neal & Neal Attorneys
P.O. Box 278
Hobbs, New Mexico 88240

SDF/agp

# BEFORE THE OIL CONSERVATION COMMISSION OF THE STATE OF NEW MEXICO

IN THE MATTER OF THE HEARING CALLED BY THE OIL CONSERVATION COMMISSION OF NEW MEXICO FOR THE PURPOSE OF CONSIDERING:

CASE No. 4047 Order No. R-3725

APPLICATION OF LARRY C. SQUIRES FOR AN EXCEPTION TO ORDER NO. R-3221, AS AMENDED, LEA COUNTY, NEW MEXICO.

#### ORDER OF THE COMMISMED

#### BY THE COMMISSION:

This cause came on for hearing at 9 a.m. on March 19, 1969, at Santa Fe, New Mexico, before the Oil Conservation Commission of New Mexico, hereinafter referred to as the "Commission."

NOW, on this 16th day of April, 1969, the Commission, a quorum being present, having considered the testimony presented and the exhibits received at said hearing, and being fully advised in the premises,

#### FINDS:

- (1) That due public notice having been given as required by law, the Commission has jurisdiction of this cause and the subject matter thereof.
- (2) That effective January 1, 1969, Order (3) of Commission Order No. R-3221, as amended, prohibits in that area encompassed by Lea, Eddy, Chaves, and Roosevelt Counties, New Mexico, the disposal, subject to minor exceptions, of water produced in conjunction with the production of oil or gas, or both, on the surface of the ground, or in any pit, pond, lake, depression, draw, streambed, or arroyo, or in any watercourse, or in any other place or in any manner which would constitute a hazard to any fresh water supplies and said disposal has not previously been prohibited.
- (3) That the aforesaid Order No. R-3221 was issued in or to afford reasonable protection against contamination of from

water supplies designated by the State Engineer through disposal of water produced in conjunction with the production of oil or gas, or both, in unlined surface pits.

- (4) That the State Engineer has designated, pursuant to Section 65-3-11 (15), N.M.S.A., 1953 Compilation, all underground water in the State of New Mexico containing 10,000 parts per million or less of dissolved solids as fresh water supplies to be afforded reasonable protection against contamination; except that said designation does not include any water for which there is no present or reasonably foreseeable beneficial use that would be impaired by contamination.
- (5) That the applicant, Larry C. Squires, seeks an exception to the provisions of the aforesaid Order (3) to permit the diagram of water produced in conjunction with the production of oil or gas, or both, in three natural salt lakes located in Lea County, New Mexico, as follows:

Laguna Plata, sometimes referred to as Laguna Grande, located in Sections 2, 3, 9, 10, and 11, Township 20 South, Range 32 East, NMPM;

Laguna Gatuna, sometimes referred to as Salt Lake, located in Sections 7, 17, 18, 19, and 20, Township 20 South, Range 33 East, NMPM;

Laguna Tonto, located in Sections 32 and 33, Township 19 South, Range 33 East, and Section 4, Township 20 South, Range 33 East, NMPM.

- (6) That the subject lakes are situated within the confines of a synclinal feature.
- (7) That the water in the aforesaid three lakes is not fresh water.
- (8) That that portion of the Triassic red beds underlying said three lakes is virtually impermeable and therefore prevents seepage from said lakes into the sand stringers within said red beds which may contain fresh water.
- (9) That as to sands that are in communication with said lakes, the evidence indicates that the major flow of surface and subsurface water within the boundaries of said synclinal feature is toward the subject lakes.

-4-CASE No. 4047 Order No. R-3725

(19) That the request of the applicant to utilize Laguna Tonto for the disposal of water produced in conjunction with the production of oil or gas, or both, should be denied.

#### IT IS THEREFORE ORDERED:

(1) That the applicant, Larry C. Squires, is hereby granted an exception to Order (3) of Commission Order No. R-3221, as amended, to dispose of water produced in conjunction with the production of oil or gas, or both, in two natural salt lakes located in Lea County, New Mexico, as follows:

Laguna Plata, sometimes referred to as Laguna Grande, located in Sections 2, 3, 9, 10, and 11, Township 20 South, Range 32 East, NMPM;

Laguna Gatuna, sometimes referred to as Salt Lake, located in Sections 7, 17, 18, 19, and 20, Township 20 South, Range 33 East, NMPM.

- (2) That the application of Larry C. Squires to utilize Laguna Tonto, located in Sections 32 and 33, Township 19 South, Range 33 East, and Section 4, Township 20 South, Range 33 East, NMPM, Lea County, New Mexico, for the disposal of water produced in conjunction with the production of oil or gas, or both, is hereby denied.
- (3) That the Commission may by administrative order rescind such authority whenever it reasonably appears to the Commission that such rescission would serve to protect fresh water supplies from contamination.
- (4) That this case shall be reopened upon the motion of the Commission or any other interested party whenever tests have been conducted which indicate to a substantial degree that commercial deposits of sodium sulphate probably exist in and/or near the aforesaid lakes, at which time all interested parties should appear and show cause why continued disposal in said lakes should or should not be allowed.
- (5) That the first person to determine to a substantial degree by tests that commercial deposits of sodium sulphate probably exist in and/or near said lakes shall so notify the Commission, setting forth in writing the supporting facts,

-3-CASE No. 4047 Order No. R-3725

- (10) That the evidence indicates that there is no leakage of water from said Laguna Plata and Laguna Gatuna into the adjoining formations.
- (11) That the evidence indicates that there may be some leakage of water from said Laguna Tonto into the adjoining formations to the southeast, thence southwestward toward Laguna Gatuna.
- (12) That the utilization of Laguna Plata and Laguna Gatuna for the disposal of water produced in conjunction with the production of oil or gas, or both, will not constitute a hazard to fresh water supplies that may exist in the vicinity of said lakes.
- (13) That the utilization of Laguna Tonto for the disposal of water produced in conjunction with the production of oil or gas, or both, may constitute an additional threat of contamination of fresh water supplies as designated by the State Engineer existing to the southeast of said lake.
- (14) That the evidence indicates that commercial deposits of sodium sulphate ( $Na_2$   $SO_4$ ) may exist in and/or near the three subject lakes.
- (15) That disposal of produced salt water into Laguna Plata and Laguna Gatuna will not interfere with the testing required to determine if there are commercial deposits of sodium sulphate in and/or near the said three lakes.
- (16) That said disposal prior to actual mining operations will not impair the value of said sodium sulphate nor render its recovery more difficult.
- (17) That this case should be reopened upon the motion of the Commission or any other interested party whenever tests have been conducted which indicate to a substantial degree that commercial deposits of sodium sulphate probably exist in and/or near the subject lakes, at which time all interested parties should be prepared to appear and show cause why continued disposal in said lakes should or should not be allowed.
- (18) That the applicant should be authorized to utilize Laguna Plata and Laguna Gatuna for the disposal of water produced in conjunction with the production of oil or gas, or both.

-5-CASE No. 4047 Order No. R-3725

whereupon the Commission shall give notification for the reopening of this case.

(6) That jurisdiction of this cause is retained for the entry of such further orders as the Commission may deem necessary.

DONE at Santa Fe, New Mexico, on the day and year hereinabove designated.

STATE OF NEW MEXICO
OIL CONSERVATION COMMISSION

DAVID F. CARGO, Chairman

ALEX J. ARMIJO, Member

SEAL

A. L. PORTER, Jr., Member & Secretary