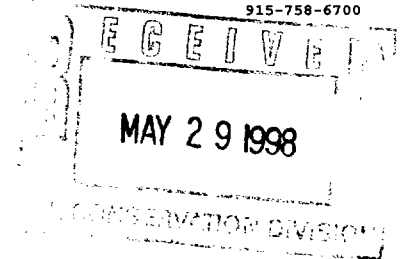


WFX

6/15/98

AMERADA HESS CORPORATION

P. O. BOX 840
SEMINOLE, TEXAS 79360
915-758-6700



May 26, 1998

Attn: Lori Wrotenbery
State of New Mexico
Energy, Minerals and Natural Resources Department
Oil Conservation Division
2040 South Pacheco Street
Santa Fe, New Mexico 87505-5472

Re: Application for Injection Permit
North Monument Grayburg San Andres Unit
Order No. R-9596

Dear Ms. Wrotenbery,

Amerada Hess Corporation respectfully request administrative amendment to Exhibit "A" of Division Order No. R-9596 on North Monument Grayburg San Andres Unit adding NMGSAU Well No. 629 to order.

Enclosed is Form C-108 and supporting documents for your review.

If additional information is needed, please contact Mr. Chad McGehee at the above address or phone number at your earliest convenience.

Your consideration in this matter is appreciated.

Sincerely,


Roy L. Wheeler, Jr.

Xc: Mr. Chris Williams, NMOCD - Hobbs

CASE 10252

CHECKLIST for ADMINISTRATIVE INJECTION APPLICATIONS

Operator: AMANDA HESS Well: NMGS AU # 629
Contact: CHAD MCGUIRE Title: P.E. Phone: 915-758-6700
DATE IN 5-29-98 RELEASE DATE 6-15-98 DATE OUT 8-10-98

Proposed Injection Application is for: ☒ **WATERFLOOD** ☒ Expansion ☐ Initial

Original Order: R- 9596 ☐ Secondary Recovery ☐ Pressure Maintenance

SENSITIVE AREAS

☐ **SALT WATER DISPOSAL** ☐ Commercial Well

☐ WIPR ☐ Capitan Reef

Data is complete for proposed well(s)? YES Additional Data Req'd NO

AREA of REVIEW WELLS

18 Total # of AOR

5 # of Plugged Wells

☒ Tabulation Complete

☒ Schematics of P & A's

☒ Cement Tops Adequate

☐ AOR Repair Required

INJECTION FORMATION

Injection Formation(s) _____ Compatible Analysis _____

Source of Water or Injectate _____

PROOF of NOTICE

☒ Copy of Legal Notice

☒ Information Printed Correctly

☒ Correct Operators

☒ Copies of Certified Mail Receipts

NO Objection Received

☐ Set to Hearing _____ Date

NOTES:

* ALL INFO SUBMITTED PREVIOUSLY.

APPLICATION QUALIFIES FOR ADMINISTRATIVE APPROVAL? YES

COMMUNICATION WITH CONTACT PERSON:

1st Contact: _____ Telephoned _____ Letter _____ Date _____ Nature of Discussion _____

2nd Contact: _____ Telephoned _____ Letter _____ Date _____ Nature of Discussion _____

3rd Contact: _____ Telephoned _____ Letter _____ Date _____ Nature of Discussion _____

APPLICATION FOR AUTHORIZATION TO INJECT

- I. Purpose: ☒ Secondary Recovery ☐ Pressure Maintenance ☐ Disposal ☐ Storage
Application qualifies for administrative approval? ☐ yes ☐ no
- II. Operator: Amerada Hess Corporation
Address: P. O. Box 840, Seminole, Texas 79360
Contact party: Chad McGehee Phone: 915 758-6700
- III. Well data: Complete the data required on the reverse side of this form for each well proposed for injection. Additional sheets may be attached if necessary.
- IV. Is this an expansion of an existing project? ☒ yes ☐ no
If yes, give the Division order number authorizing the project R-9596.
- V. Attach a map that identifies all wells and leases within two miles of any proposed injection well with a one-half mile radius circle drawn around each proposed injection well. This circle identifies the well's area of review.
- * VI. Attach a tabulation of data on all wells of public record within the area of review which penetrate the proposed injection zone. Such data shall include a description of each well's type, construction, date drilled, location, depth, record of completion, and a schematic of any plugged well illustrating all plugging detail.
- VII. Attach data on the proposed operation, including:
1. Proposed average and maximum daily rate and volume of fluids to be injected;
 2. Whether the system is open or closed;
 3. Proposed average and maximum injection pressure;
 4. Sources and an appropriate analysis of injection fluid and compatibility with the receiving formation if other than reinjected produced water; and
 5. If injection is for disposal purposes into a zone not productive of oil or gas at or within one mile of the proposed well, attach a chemical analysis of the disposal zone formation water (may be measured or inferred from existing literature, studies, nearby wells, etc.).
- *VIII. Attach appropriate geological data on the injection zone including appropriate lithologic detail, geological name, thickness, and depth. Give the geologic name, and depth to bottom of all underground sources of drinking water (aquifers containing waters with total dissolved solids concentrations of 10,000 mg/l or less) overlying the proposed injection zone as well as any such source known to be immediately underlying the injection interval.
- IX. Describe the proposed stimulation program, if any.
- * X. Attach appropriate logging and test data on the well. (If well logs have been filed with the Division they need not be resubmitted.)
- * XI. Attach a chemical analysis of fresh water from two or more fresh water wells (if available and producing) within one mile of any injection or disposal well showing location of wells and dates samples were taken.
- XII. Applicants for disposal wells must make an affirmative statement that they have examined available geologic and engineering data and find no evidence of open faults or any other hydrologic connection between the disposal zone and any underground source of drinking water.
- XIII. Applicants must complete the "Proof of Notice" section on the reverse side of this form.
- XIV. Certification
- I hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.
- Name: Chad McGehee Title Petroleum Engineer
Signature: Chad McGehee Date: 5-15-98
- * If the information required under Sections VI, VIII, X, and XI above has been previously submitted, it need not be duplicated and resubmitted. Please show the date and circumstance of the earlier submittal. August 2, 1991, original C-108 submitted by Amerada Hess

Corporation on North Monument Grayburg San Andres Unit.

DISTRIBUTION: Original and one copy to Santa Fe with one copy to the appropriate Division district office.

III. WELL DATA

A. The following well data must be submitted for each injection well covered by this application. The data must be both in tabular and schematic form and shall include:

- (1) Lease name; Well No.; location by Section, Township, and Range; and footage location within the section.
- (2) Each casing string used with its size, setting depth, sacks of cement used, hole size, top of cement, and how such top was determined.
- (3) A description of the tubing to be used including its size, lining material, and setting depth.
- (4) The name, model, and setting depth of the packer used or a description of any other seal system or assembly used.

Division District offices have supplies of Well Data Sheets which may be used or which may be used as models for this purpose. Applicants for several identical wells may submit a "typical data sheet" rather than submitting the data for each well.

B. The following must be submitted for each injection well covered by this application. All items must be addressed for the initial well. Responses for additional wells need be shown only when different. Information shown on schematics need not be repeated.

- (1) The name of the injection formation and, if applicable, the field or pool name.
- (2) The injection interval and whether it is perforated or open-hole.
- (3) State if the well was drilled for injection or, if not, the original purpose of the well.
- (4) Give the depths of any other perforated intervals and detail on the sacks of cement or bridge plugs used to seal off such perforations.
- (5) Give the depth to and name of the next higher and next lower oil or gas zone in the area of the well, if any.

XIV. PROOF OF NOTICE

All applicants must furnish proof that a copy of the application has been furnished, by certified or registered mail, to the owner of the surface of the land on which the well is to be located and to each leasehold operator within one-half mile of the well location.

Where an application is subject to administrative approval, a proof of publication must be submitted. Such proof shall consist of a copy of the legal advertisement which was published in the county in which the well is located. The contents of such advertisement must include:

- (1) The name, address, phone number, and contact party for the applicant;
- (2) the intended purpose of the injection well; with the exact location of single wells or the section, township, and range location of multiple wells;
- (3) the formation name and depth with expected maximum injection rates and pressures; and
- (4) a notation that interested parties must file objections or requests for hearing with the Oil Conservation Division, P. O. Box 2088, Santa Fe, New Mexico 87501 within 15 days.

NO ACTION WILL BE TAKEN ON THE APPLICATION UNTIL PROPER PROOF OF NOTICE HAS BEEN SUBMITTED.

NOTICE: Surface owners or offset operators must file any objections or requests for hearing of administrative applications within 15 days from the date this application was mailed to them.

INDEX

C-108 ATTACHMENT	PAGE
A. Section's III & IX - Well Data	1
North Monument G/SA Unit Well No. 629.	
A. Section V	2
Area Map of North Monument Grayburg San Andres Unit Identifying Proposed Injection Well.	
C. Section VII– Data on Proposed Operation.	3
D. Section's XIII & XIV – Proof of Notice.	4
1. Surface Owner Listing	
2. Leasehold Operator Listing	
3. Publication	

Note: C-108 – Item No.'s VI, VIII & XI were submitted with original C-108 filed August 2, 1991.

Item No. X – Logs & test data have previously been submitted.

C-108 ATTACHMENT

A. Section III - Well Data – NMGSAU Well No. 629.

a. (1) Lease Name/Well Number/Legal

North Monument Grayburg San Andres Unit Well No. 629
Unit M, (530' FSL & 730' FWL), Sec. 20, T19S, R37E.

(2) Casing in Well

CASING	DEPTH	SKS./CEMENT	HOLE	TOC	METHOD
9-5/8" 36#	480'	330	12-1/4"	0	Circulated
7" 23#	3915'	1050	8-3/4"	0	Circulated

(3) Injection Tubing

2-3/8" Polyethylene Lined Tubing set at 3703'.

(4) Packer

7" 1XS Arrowset Packer set at 3703'.

b. (1) Injection Information

Field Name: Eunice Monument Grayburg San Andres.
Formation Name: Grayburg San Andres.

(2) Injection Interval

7" csg. perfs. fr. 3746' – 3898'.

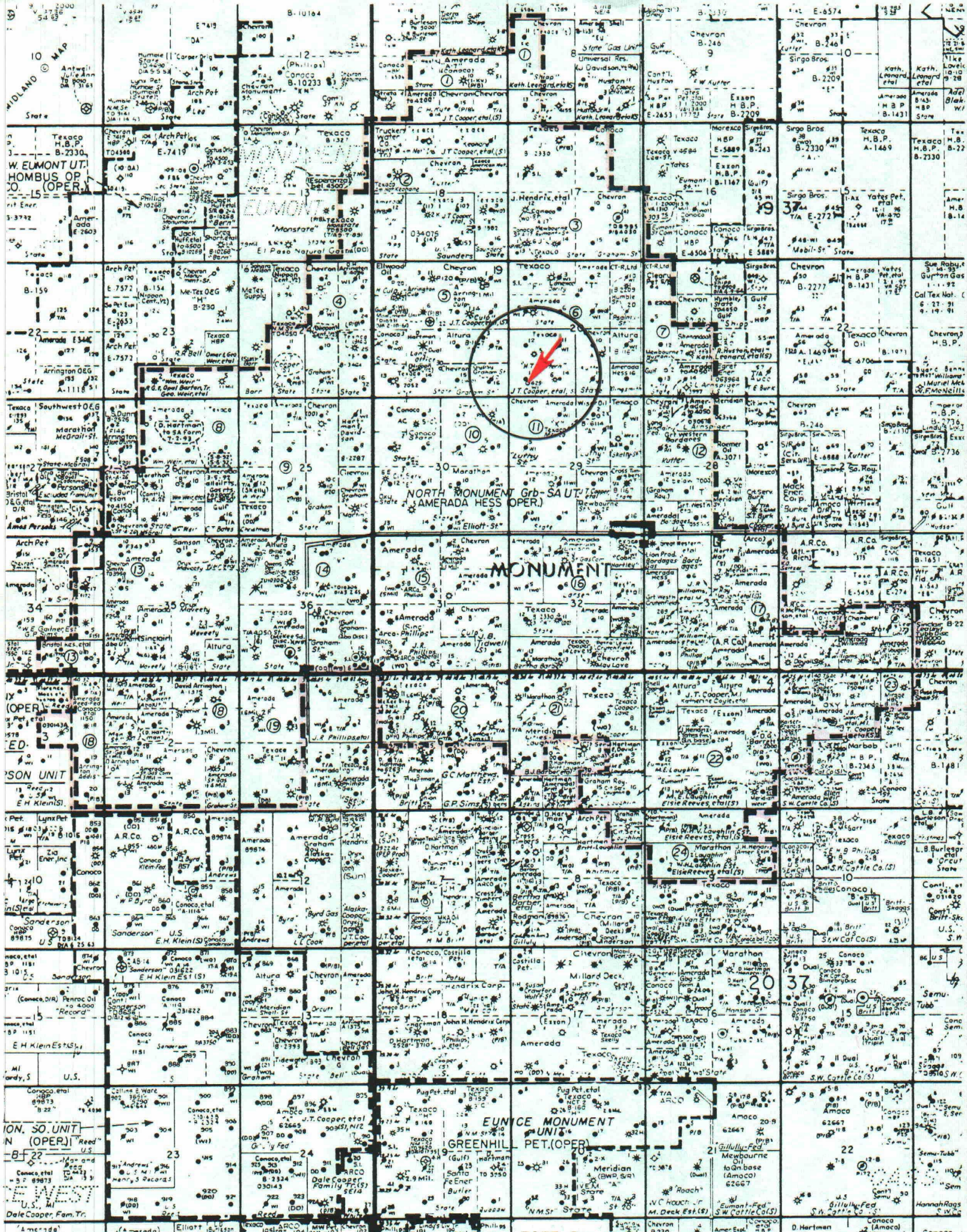
(3) Well drilled as water injection well.

(4) No other perforated or cemented intervals in wellbore.

(5) Oil & Gas Zones: Lower Oil Zone – Paddock at 4900'.
Higher Gas Zone – Eumont at 3500'.

Section IV - Stimulation

Acidized 7" csg. perfs. fr. 3746' – 3898' w/6000 gal. 15% HCL 0.6% Fercheck SC
Acid.



C-108 ATTACHMENT

C. Section VII – Data on Proposed Operation.

1. Proposed Average & Maximum Daily Rate of Volume of Fluids to be Injected;

Average Daily Rate: 750 B.W./D.

Maximum Daily Rate: 1000 B.W./D.

The injection volume is expected to reach 196,000,000 barrels of water at 100% Fillup. This volume may reach 620,000,000 barrels of water by abandonment.

2. Open or Closed System:

Injection system is a closed system.

3. Proposed Average & Maximum* Injection Pressures:

Average injection pressure: 350 PSI

Maximum injection pressure: 710 PSI

*Until a fracture gradient is determined, maximum injection pressure will be based on a .2 PSI/foot gradient.

4. Sources and appropriate analysis of injection fluid:

The source of injection water will be from San Andres water supply wells and Produced water from existing North Monument Grayburg San Andres Unit producers. The San Andres formation is compatible with the produced water from the Unit wells.

C-108 ATTACHMENT

D. Sections VIII & XIV – Proof of Notice.

1. Surface Owners – Application mailed by Certified Mail to following:

- Ray B. Powell, Jr., Land Commissioner
State of New Mexico
State Land Office Bldg.
P. O. Box 1148
Santa Fe, New Mexico 87501
- Jimmie T. Cooper
P. O. Box 55
Monument, New Mexico 88265

2. Leasehold Operators within ½ mile of proposed injection well – application mailed by Certified mail to following:

- Arrington, David H., Oil & Gas, Inc.
P. O. Box 2071
Midland, Texas 79702
- Chevron U.S.A., Inc.
Claydesta Plaza, 15 Smith Road
Midland, Texas 79705
- Conoco, Inc.
10 Desta Drive, Ste. 100W
Midland, Texas 79705
- Doyle Hartman
500 N. Main
Midland, Texas 79701
- Marathon Oil Company
P. O. Box 552
Midland, Texas 79702
- Texaco Exploration & Production, Inc.
205 E. Bender
Hobbs, New Mexico 88240
- The Wiser Oil Company
8115 Preston Rd., Ste. 400
Dallas, Texas 75225

3. Publication – (Attached)

AFFIDAVIT OF PUBLICATION

State of New Mexico,
County of Lea.

I, KATHI BEARDEN

Publisher

of the Hobbs Daily News-Sun, a
daily newspaper published at
Hobbs, New Mexico, do solemnly
swear that the clipping attached
hereto was published once a
week in the regular and entire
issue of said paper, and not a
supplement thereof for a period.

of 1
_____ weeks.

Beginning with the issue dated

May 17 1998

and ending with the issue dated

May 17 1998

Kathi Bearden by JH

Publisher

Sworn and subscribed to before

me this 18th day of

May 1998

Jodi Benson

Notary Public.

My Commission expires
October 18, 2000
(Seal)

This newspaper is duly qualified
to publish legal notices or adver-
tisements within the meaning of
Section 3, Chapter 167, Laws of
1937, and payment of fees for
said publication has been made.

LEGAL NOTICE

May 17, 1998

Amerada Hess Corporation, operator of record for the North Monument Grayburg/San Andres Unit. (NMGSAU), hereby notifies of their desire to inject water into NMGSAU Well No. 629, located in Unit M, Sec. 20, T19S, R37E, Lea County, N.M. The NMGSAU "Authorization to Inject" is covered under State of New Mexico, Energy, Minerals and Natural Resources Department, Oil Conservation Division Case No. 10252, Division Order No. R-9596. Amerada Hess Corporation hereby gives notice that application has been made for administrative regulatory amendment of Exhibit "A" of said division order to include the aforementioned well to inject water into Grayburg San Andres formation, Eunice Monument Grayburg/San Andres pool through the gross perforated and/or open hole interval from approximately 3720 feet to 3965 feet with a maximum injection pressure of 710 PSI. Contact Mr. Chad McGehee, Amerada Hess Corporation, P.O. Box 840, Seminole, Texas 79360, Phone 915 758-6700 concerning questions regarding application. Objections or requests for hearing concerning this application should be filed with the State of New Mexico, Energy, Minerals and Natural Resources Department, Oil Conservation Division, 2040 South Pacheco Street, Santa Fe, New Mexico 87505-5472 within 15 days of this publication.
#15944

01100986000

02516125

AMERADA HESS CORPORATION
PO BOX 840
SEMINOLE, TX 79360

Z 437 801 549

US Postal Service

Receipt for Certified Mail

No Insurance Coverage Provided.

Do not use for International Mail (See reverse)

Sent to	
Arrington, David H, Oil & Gas	
Street & Number	
P.O. Box 2071	
Post Office, State, & ZIP Code	
Midland, Texas 79702	
Postage	\$.78
Certified Fee	1.35
Special Delivery Fee	
Restricted Delivery Fee	
Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, & Addressee's Address	
TOTAL Postage & Fees	\$ 2.13
Postmark or Date	
1998 PM 7:00	

Z 437 801 548

US Postal Service

Receipt for Certified Mail

No Insurance Coverage Provided.

Do not use for International Mail (See reverse)

Sent to	
Jimmie T. Cooper	
Street & Number	
P.O. Box 55	
Post Office, State, & ZIP Code	
Monument, N.M. 88265	
Postage	\$.78
Certified Fee	1.35
Special Delivery Fee	
Restricted Delivery Fee	
Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, & Addressee's Address	
TOTAL Postage & Fees	\$ 2.13
Postmark or Date	
1998 PM 7:00	

Z 437 801 547

US Postal Service

Receipt for Certified Mail

No Insurance Coverage Provided.

Do not use for International Mail (See reverse)

Sent to	
Ray B. Russell, Jr. Land Comm.	
Street & Number	
P.O. Box 1148	
Post Office, State, & ZIP Code	
San Fe, N.M. 87501	
Postage	\$.78
Certified Fee	1.35
Special Delivery Fee	
Restricted Delivery Fee	
Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, & Addressee's Address	
TOTAL Postage & Fees	\$ 2.13
Postmark or Date	
1998 PM 7:00	

Z 437 801 552

US Postal Service

Receipt for Certified Mail

No Insurance Coverage Provided.

Do not use for International Mail (See reverse)

Sent to	
Doyle Hartman	
Street & Number	
500 N. Main	
Post Office, State, & ZIP Code	
Midland, Tx 79701	
Postage	\$.78
Certified Fee	1.35
Special Delivery Fee	
Restricted Delivery Fee	
Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, & Addressee's Address	
TOTAL Postage & Fees	\$ 2.13
Postmark or Date	
1998 PM 7:00	

Z 437 801 551

US Postal Service

Receipt for Certified Mail

No Insurance Coverage Provided.

Do not use for International Mail (See reverse)

Sent to	
Conoco, Inc.	
Street & Number	
10 Vista Drive, Ste 100W	
Post Office, State, & ZIP Code	
Midland, TX 79705	
Postage	\$.78
Certified Fee	1.35
Special Delivery Fee	
Restricted Delivery Fee	
Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, & Addressee's Address	
TOTAL Postage & Fees	\$ 2.13
Postmark or Date	
1998 PM 7:00	

Z 437 801 550

US Postal Service

Receipt for Certified Mail

No Insurance Coverage Provided.

Do not use for International Mail (See reverse)

Sent to	
Chevron U.S.A., Inc.	
Street & Number	
Chambers Place, 15 Smith Rd.	
Post Office, State, & ZIP Code	
Midland, Tx 79705	
Postage	\$.78
Certified Fee	1.35
Special Delivery Fee	
Restricted Delivery Fee	
Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, & Addressee's Address	
TOTAL Postage & Fees	\$ 2.13
Postmark or Date	
1998 PM 7:00	

Z 437 801 555

US Postal Service

Receipt for Certified Mail

No Insurance Coverage Provided.

Do not use for International Mail (See reverse)

Sent to <i>The Wiser Oil Company</i>	
Street & Number <i>8115 Preston Blvd. Ste. 400</i>	
Post Office, State, & ZIP Code <i>Dallas, Texas 75225</i>	
Postage	\$ <i>.78</i>
Certified Fee	<i>1.35</i>
Special Delivery Fee	
Restricted Delivery Fee	
Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, & Addressee's Address	
TOTAL Postage & Fees	\$ <i>2.13</i>
Postmark or Date	

Z 437 801 554

US Postal Service

Receipt for Certified Mail

No Insurance Coverage Provided.

Do not use for International Mail (See reverse)

Sent to <i>Texaco Expl & Prod, Inc.</i>	
Street & Number <i>205 E Bender</i>	
Post Office, State, & ZIP Code <i>Hobbs, N.M. 88240</i>	
Postage	\$ <i>.78</i>
Certified Fee	<i>1.35</i>
Special Delivery Fee	
Restricted Delivery Fee	
Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, & Addressee's Address	
TOTAL Postage & Fees	\$ <i>2.13</i>
Postmark or Date	

PS Form 3800 April 1995

Z 437 801 553

US Postal Service

Receipt for Certified Mail

No Insurance Coverage Provided.

Do not use for International Mail (See reverse)

Sent to <i>Martinez Oil Company</i>	
Street & Number <i>P.O. Box 552</i>	
Post Office, State, & ZIP Code <i>Midland, TX 79702</i>	
Postage	\$ <i>.78</i>
Certified Fee	<i>1.35</i>
Special Delivery Fee	
Restricted Delivery Fee	
Return Receipt Showing to Whom & Date Delivered	
Return Receipt Showing to Whom, Date, & Addressee's Address	
TOTAL Postage & Fees	\$ <i>2.13</i>
Postmark or Date	

PS Form 3800 April 1995



STATE OF NEW MEXICO
ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION
HOBBS DISTRICT OFFICE

5/29/98

GOVERNOR

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

OIL CONSERVATION DIVISION
P. O. BOX 2088
SANTA FE, NEW MEXICO 87501

RE: Proposed:

MC	_____
DHC	_____
NSL	_____
NSP	_____
SWD	_____
WFX	<u>X</u>
PMX	_____

Gentlemen:

I have examined the application for the:

<u>Amerada Hess Corp</u>	<u>N. Monument</u>	<u>GB/SA Unit</u>	<u># 629-m</u>
Operator	Lease & Well No.	Unit	S-T-R
			<u>20-195-37e</u>

and my recommendations are as follows:

OK -

Yours very truly,

Chris Williams

Chris Williams
Supervisor, District 1

/ed