CASE NO.

6358

APPlication, Transcripts, Small Exhibits,

ETC.

STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENT
OIL CONSERVATION DIVISION
State Land Office Building
Santa Fe, New Mexico
25 Gctober 1978

EXAMINER HEARING

IN THE MATTER OF: Application of Jake L. Hamon CASE 6358 for salt water disposal, Lea County, New Mexico.

BEFORE: Daniel S. Nutter

TRANSCRIFT OF HEARING

APPEARANCES

For the Oil Conservation Lynn Teschendorf, Esq. Legal Counsel for the Division Division: State Land Office Bldg. Santa Fe, New Mexico 87501

Conrad E. Coffield, Esq. For the Applicant: HINKLE, COX, EATON, COFFIELD & HENSLEY

> P. O. Box 3580. Midland, Texas

SALLY WALTON BOYD
CERTIFIED SHORTHAND REPORTER
3020 Plaza Blanca (605) 471-3463
Santa Fe, New Mexico 87601

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CECIL H. BARTON

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MR. NUTTER: Call next Case Number 6358.

MS. TESCHENDORF: Case 6358. Application of Jake L. Hamon for salt water disposal, Lea County, New Mexico.

MR. COFFIELD: Conrad Coffield, with the Hinkle law firm of Midland, Texas, appearing on behalf of Jake L. Hamon. I have one witness.

(Witness sworn.)

CECIL H. BARTON

being called as a witness and having been duly sworn upon his oath, testified as follows, to-wit:

DIRECT EXAMINATION

BY MR. COFFIELD:

- Q Please state your name, address, occupation, and employer.
- A. My name is Cecil Barton. I live in Midland, Texas. I'm employed by Jake L. Hamon as a petroleum engineer.
- Q. Are you familiar with the application of Jake L. Hamon in this case, Mr. Barton?
 - A. Yes, sir, I am.
- Q. Have you previously testified before the Oil Conservation Division?

A. No, I have not			_	
	. T	i. N	T have	a not

As a petroleum engineer? Would you please state for the Examiner and the record a resume of your educational and work background?

A. I graduated from Oklahoma University as a petroleum engineer in 1950, with a degree, Bachelor of Science.

I have been employed by Jake L. Hamon in the capacity of petroleum engineer since that time. I have been in the West Texas-New Mexico District for the last sixteen years.

I am a registered professional engineer for the State of Texas, in the State of Texas.

MR. COFFIELD: Are the witness' qualifications considered acceptable?

MR. NUTTER: Yes, they are.

Q (Mr. Coffield continuing.) Mr. Barton, would you please state what Jake L. Hamon seeks by this application?

A. Jake L. Hamon seeks authority to dispose of produced salt water into the Devonian Formation in the State K33 No. 2 Well in the Shoe Bar East-Devonian Pool, Lea County, New Mexico.

Q All right, Mr. Barton, would you please refer to what's been marked as Exhibit One and explain to the

Examiner what this represents?

A. Yes, sir. This is a location plat showing the location of the proposed injection well and the location of all other wells within a radius of two miles which penetrated the Devonian Formation; also showing depths.

Also, is shown all leasees within the area of one-half mile of the proposed well.

- Q Mr. Barton, what is the designation and location of this proposed injection well?
- A. This is the State K33 No. 2 in Unit "N", 554 feet from the south line and 1983.7 feet from the west line of Section 30, Township 16 South, Range 36 East, Lea County.
 - Q Is Jake L. Hamon the operator of this --
 - A. Yes.
- Q -- well? Mr. Barton, would you please state for the record and the Examiner the history of this injection well?
- A. This well was spudded on January 20th, 1969. It was completed as a Devonian oil well with perforations from 12,997 to 13,036 feet.

The well potentialed for 285 barrels of oil and 239 barrels of water on May, 1969. Since this time the oil production has steadily decreased until now the well makes no oil and 550 barrels of water per day.

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OPLEA BENCE (605) 471-2462

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The cumulative production from this well is 173,381 barrels of oil and 34,372 Mcf of gas.

MR. NUTTER: What was that cum oil again?

A. 173,381.

MR. NUTTER: Thank you.

Q Do you have anything further to offer on that history of the well?

A. No.

Q All right, Mr. Barton, refer to what has been marked there as Exhibit Two and I ask you to state what this represents?

A. This is a gamma ray neutron log which was ran on this well. The hole drilled to a depth of 13,053 feet and casing was -- 5-1/2 casing was set on bottom. Cement was drilled out to a depth of 13,043 feet inside the 5-1/2 casing and the gamma ray neutron log was ran in the cased hole.

The TD by the log was 13,040 feet. The top of the Devonian is at 12,977 feet and indicates good porosity from 13,006 feet to the total depth of this log. The log does not indicate any shallower zones which may be productive of oil or gas, which has not been investigated by either samples in this well or drill stem tests or perforations in other wells in this pool.

Q Anything further on that exhibit?

SALLY WALTON BOYK CERTIFIED SHORTHAND REPORTE 3020 Plaza Blanca (505) 471-346 Santa Fe, New Moxico 87501

A. No.

Q. Please refer to what has been marked as Exhibit Three and state what this reveals.

A. This is a schematic sketch of the proposed injection well showing all casing strings, tubing, cement tops, perforations, and total depth.

Injection will be by way of 2-7/8ths plastic lines tubing, which will be set on packer at 12,860 feet with injection to be through the perforations from 12,997 to 13,036 feet.

Q And you've stated, then, that the interval is 12,997 to 13,036, and that is in the --

A. This will be in the Devonian Formation.

Q All right, Mr. Barton, please refer to what's been marked as Exhibit Four and explain what this represents.

A. This is a schematic sketch of a plugged well within a half a mile distance from the proposed well. It is the State B2330 No. 1. It's location was 560 feet from the north line, 1977.7 feet from the west line of Section 31, Township 16 South, Range 36 East. This well was plugged on October 21st, 1974.

Q. Mr. Barton, is this, then, the only plugged well within this half a mile radius, rather the only one --

A. Yes, it is.

Q. All right, go on to what has been marked as Exhibit Five, which consists of a two-page exhibit, and please explain what that represents.

A. This is a tubular summary of all the producing wells within a half a mile radius of the proposed well.

This shows the -- all the casing strings, the setting depths, amount cement used, cement tops, total depth, producing interval, and legal description of the locations.

Q. And there are only four wells which fall within this classification?

A. Yes, sir.

Q All right. Mr. Barton, what type of fluid do you anticipate be injected and what's the source of the fluid?

A. The fluid will be produced salt water from the Devonian Formation, which will be re-injected into the Devonian.

We have analysis on some of the water. The chlorides run from 17,000 to, I think, 29,000 parts per million.

Q Okay, as far as the source is concerned, though, is it true that the source of your injected fluid will be from the four wells shown on Exhibit Five?

A. Yes, this is true.

Q. What volume of salt water do you anticipate

being injected?

A. We anticipate a volume of 2000 barrels per day.

Q Now, Mr. Barton, refer to what's been marked as Exhibit Six and please explain what this exhibit represents.

A. This is a water analysis of produced water from the proposed well and a water analysis from two offset wells. The chlorides on the proposed well produced water is 17,000 parts per million. It runs from that to a maximum of 29,000 parts per million.

Iron content is 1.12 parts per million. There is an error on the third column, second line. The iron content as typed is 11.2; it should be 1.12.

Okay, Mr. Barton, all of the source wells for produced fluids to be injected are not included on this analysis, but is it your opinion that the -- if analyses were run on the other wells that they would be substantially similar to what is shown here?

A. Yes, they would be. All of it is Devonian water.

Q. Accordingly, then, is it your opinion that the fluids involved are compatible?

A. Yes, they are.

Q Do you anticipate you will inject this water

by pressure?

A. Yes, we do.

Q And have you already secured equipment necessary to inject this water under pressure?

A. Yes, we have. The pump will be a Wheatly Quintiplex Model 5P323 pulled by 75 horsepower electric motor. This pump is equipped with 2-1/2 plungers. It has a capacity of 2280 barrels per day at a pressure of 1815 pounds.

Q Mr. Barton, will the casing tubing and the annulus in this proposed injection well be filled with an inert fluid?

A. Yes. We plan to use a fresh water packer fluid with bacteriacide oxygen scavenger and a corrosion inhibitor.

And what about a pressure gauge? Do you propose to attach a pressure gauge to the annulus?

A. Yes. A pressure gauge will be attached to the annulus.

Q. Are you aware of the requirement of the Oil Conservation Division that there is to be no surface injection pressure in a project of this sort which is greater than .2 psi per foot of depth to the top of the injection well?

A. Yes, I am aware of it.

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	Q.	Are th	ese	press	sures		are	the	pressures
which	you	anticipate	in	this	well	wit	hin	this	requirement?

- A. Yes, they are.
- Q Okay, Mr. Barton, refer to what's been marked as Exhibit Seven, which is a five-page exhibit, and explain what this reveals.
- A. All the operators within an area of half a mile from this disposal well were notified of this application. Copies of the Commission Form C-108 were mailed to them with explanation of our application. We asked these operators and the surface owners to respond if they had an objection or if they did not.

We have received responses from all of the operators and surface owners stating that they have no objection to this application.

- Q And that's what the exhibit is, is copies of the correspondence?
 - A. Yes, these are copies of their responses.
- Mr. Barton, in your opinion is the well, the proposed injection well, cased and cemented in such a manner that there is no danger to oil, gas, or fresh water reservoirs which might be encountered by this well?
 - A. Yes.
- Q. Mr. Barton, were these exhibits prepared by you or under your supervision?

SALLY WALTON BOYD	CERTIFIED SHORTHAND REPORTER	\$020Plaza Blanca (505) 471-2462	Santa Fe, New Mexico 87501
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A.	Yes,	they	were
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Q In your opinion is the approval of this application in the interests of conservation and will it prevent waste and protect correlative rights?

A. Yes, it will.

MR. COFFIELD: Mr. Examiner, I move the admission of the exhibits.

MR. NUTTER: Applicant's Exhibits One through Seven will be admitted in evidence.

MR. COFFIELD: I have no further questions of the witness on direct.

CROSS EXAMINATION

BY MR. NUTTER:

Q Mr. Barton, what do you expect to inject in the way of volumes here?

A. Daily?

Q. Yes.

A. 2000 barrels.

Q. And what pressure do you think is going to be necessary to dispose of that amount of water?

A. We anticipate approximately 1200 pounds.

Q. Now how many producing wells are currently in this pool, Mr. Barton?

A. There are four.

And that would be three Hamon wells and the

MR. NUTTER: Are there any further questions

Q.

A.

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one MGF well.

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of this witness? He may be excused.

Do you have anything further, Mr. Coffield? MR. COFFIELD: No, sir, I do not.

MR. NUTTER: Does anyone have anything they wish to offer in Case Number 6358?

We'll take the case under advisement.

(Hearing concluded.)

REPORTER'S CERTIFICATE

I, SALLY WALTON BOYD, a Court Reporter, DO HEREBY
CERTIFY that the foregoing and attached Transcript of
Hearing before the Oil Conservation Division was reported
by me; that the said transcript is a full, true, and correct
record of the hearing, prepared by me to the best of my
ability, knowledge, and skill, from my notes taken at the
time of the hearing.

Sally W. Boyd, CSR

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Examiner

Oil Conservation Division

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STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT OIL CONSERVATION DIVISION

JERRY APODACA

NICK FRANKUN SECRETARY November 15, 1978

POST OFFICE BOX 2088 STATE LAND OFFICE BUILDING SANTA FE, NEW MEXICO 87501 (505) 827-2434

Re: Mr. Conrad Coffield Hinkle, Cox, Eaton, Coffiel	CASE NO. 6358 ORDER NO. R-5848
& Hensley Attorneys at Law P. O. Box 3580	Applicant:
Midland, Texas 79702	Jake L. Hamon
Dear Sir:	
Enclosed herewith are two continuous Division order recently ent	opies of the above-referenced ered in the subject case.
Yours very truly, MINOU JOE D. RAMEY Director	
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JDR/fd	
Copy of order also sent to:	•
Hobbs OCC x Artesia OCC x Aztec OCC	• • • • • • • • • • • • • • • • • • •
Other	

STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT OIL CONSERVATION DIVISION

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

CASE NO. 6358 Order No. R-5848

APPLICATION OF JAKE L. HAMON FOR SALT WATER DISPOSAL, LEA COUNTY, NEW MEXICO.

ORDER OF THE DIVISION

BY THE DIVISION:

This cause came on for hearing at 9 a.m. on October 25, 1978, at Santa Fe, New Mexico, before Examiner Daniel S. Nutter.

NOW, on this 14th day of November, 1978, the Division Director, having considered the testimony, the record, 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, Jake L. Hamon, is the owner and operator of the State K-33 Well No. 2, located in Unit N of Section 30, Township 16 South, Range 36 East, NHPM, East Shoe Bar-Devonian Pool, Lea County, New Mexico.
- (3) That the applicant proposes to utilize said well to dispose of produced salt water into the Devonian formation, with injection into the perforated interval from approximately 12,997 feet to 13,036 feet.
- (4) That the injection should be accomplished through 2 7/8-inch plastic lined tubing installed in a packer set at approximately 12,860 feet; that the casing-tubing annulus should be filled with an inert fluid; and that a pressure gauge or approved leak detection device should be attached to the annulus in order to determine leakage in the casing, tubing, or packer.

-2-Case No. 6358 Order No. R-5848

- (5) That the injection well or system should be equipped with a pop-off valve or other acceptable device which will limit the wellhead pressure on the injection well to no more than 2500 psi.
- (6) That the operator should notify the supervisor of the Hobbs district office of the Division of the date and time of the installation of disposal equipment so that the same may be inspected.
- (7) That the operator should take all steps necessary to ensure that the injected water enters only the proposed injection interval and is not permitted to escape to other formations or onto the surface.
- (8) That approval of the subject application will prevent the drilling of unnecessary wells and otherwise prevent waste and protect correlative rights.

IT IS THEREFORE ORDERED:

(1) That the applicant, Jake L. Hamon, is hereby authorized to utilize its State K-33 Well No. 2, located in Unit N of Section 30, Township 16 South, Range 36 East, NMPM, East Shoe Bar-Devonian Pool, Lea County, New Mexico, to dispose of produced salt water into the Devonian formation, injection to be accomplished through 2 7/8-inch tubing installed in a packer set at approximately 12,860 feet, with injection into the perforated interval from approximately 12,997 feet to 13,036 feet;

PROVIDED HOWEVER, that the tubing shall be plastic-lined; that the casing-tubing annulus shall be filled with an inert fluid; and that a pressure gauge shall be attached to the annulus or the annulus shall be equipped with an approved leak detection device in order to determine leakage in the casing, tubing, or packer.

- (2) That the injection well or system shall be equipped with a pop-off valve or other acceptable device which will limit the wellhead pressure on the injection well to no more than 2500 psi.
- (3) That the operator shall notify the supervisor of the Hobbs district office of the Division of the date and time of the installation of disposal equipment so that the same may be inspected.

-3-Case No. 6358 Order No. R-5848

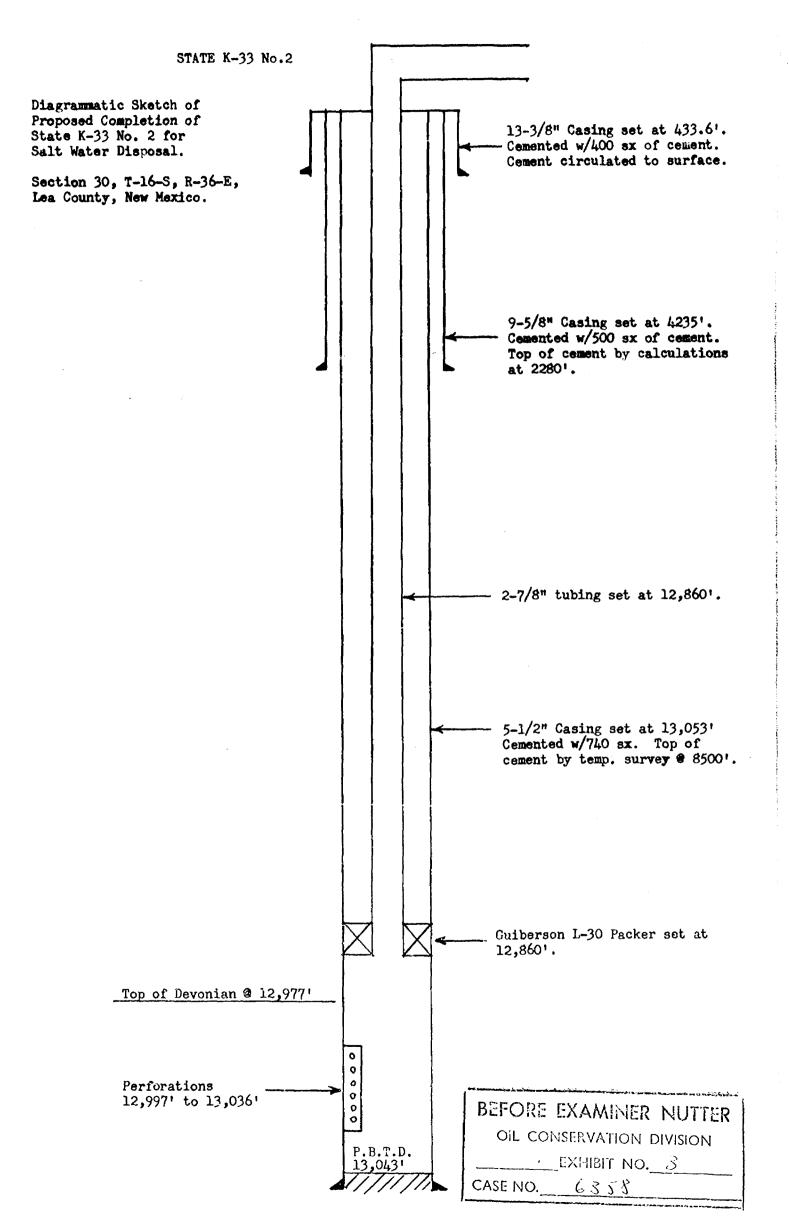
- (4) That the operator shall immediately notify the supervisor of the Division's Hobbs district office of the failure of the tubing, casing, or packer, in said well or the leakage of water from or around said well and shall take such steps as may be timely and necessary to correct such failure or leakage.
- (5) That the applicant shall submit monthly reports of its disposal operations in accordance with Rules 704 and 1120 of the Division Rules and Regulations.
- (6) 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 herein-above designated.

STATE OF NEW MEXICO OIL CONSERVATION DIVISION

JOE D. RAMEY

SEAL



Exhibits 1 through > complete set

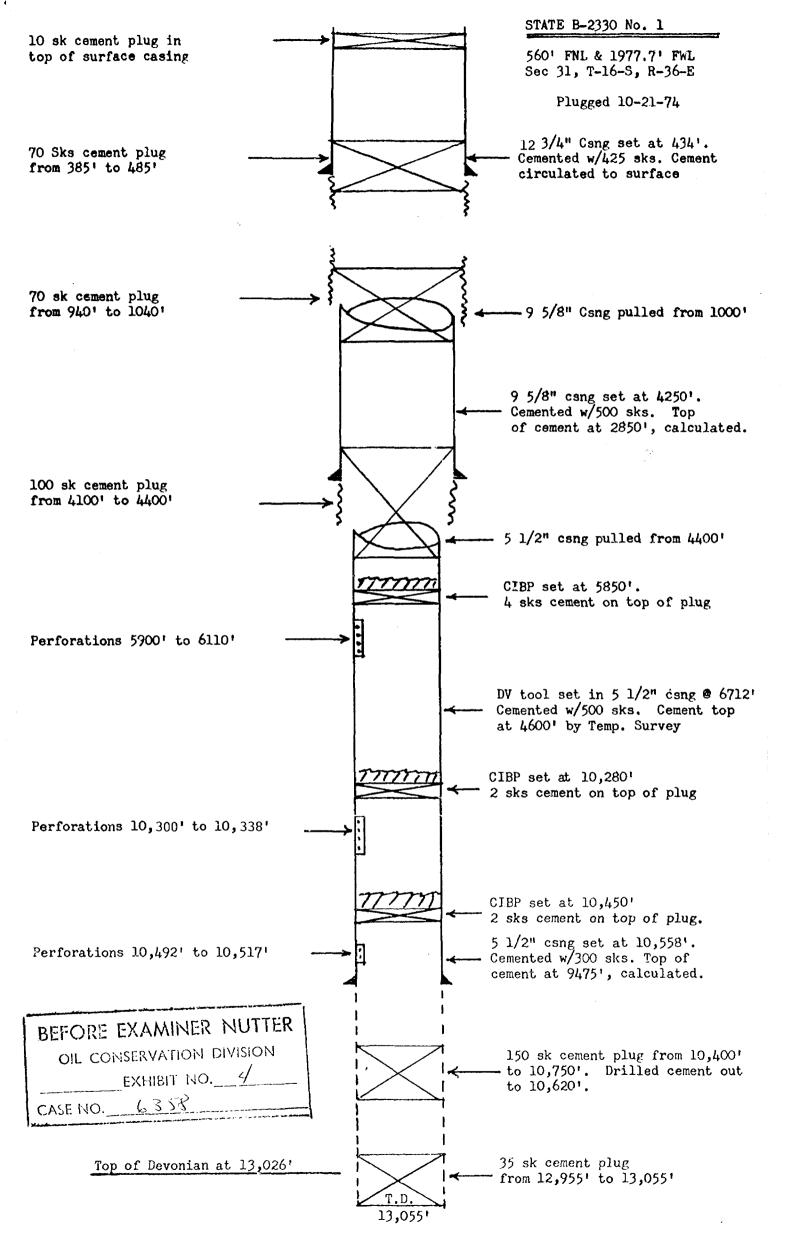


Exhibit 4

Operator:

Jake L. Hamon

Well Name:

State A-1320 No. 1

Location:

510' FNL & 1980' FEL

Section 31, T-16-S, R-36-E

Lea County

Total Depth:

13,005

Producing Formation: Devonian

Top of Devonien:

12,940'

Perforations:

12,991' to 13,001'

Casing and Tubing Record

Casing Size	Depth Set	Cementing Record	Cement Tops
13~3/8"	4151	400 Sks	Surface
9 ~ 5/8"	4,250'	500 sks	2400' (Calculated)
5-1/2"	13,005'	740 sks	9000" (Temp Survey)
2-7/8" tubing 1	2,949'	Packer set at 12,949'	

Operator:

Jake L. Hamon

Well Name:

State K-33 No. 1

Location:

1980' FSL & 1980' FWL

Section 30, T-16-S, R-36-E

Lea County

Total Depth:

13,1301

Producing Formation: Devonian

Top of Devonian:

13,013'

Perforations:

13,050' to 13,058'

Casing and Tubing Record

Casing Size	Depth Set	Cementing Record	Cement Tops
13-3/8"	418'	400 sks	Surface
9-5/8"	4,191'	500 sks	2340' (Calculated)
5-1/2"	13,122	740 sks	9000' (Temp Survey)

2-7/8" tubing 12,930"

Packer set at 12,930'

Exhibit 5 - page 1

CASE NO.

BEFORE EXAMINER NUTTER

OIL CONSERVATION DIVISION

EXHIBIT NO. 5

Operator:

Jake L. Hamon

Well Name:

State K-33 Com No. 3

Location:

1830' FEL & 660' FSL

Section 30, T-16-S, R-36-E

Lea County

Total Depth:

12,9821

Producing Formation: Devonian

Top of Devonian:

12,895'

Perforations:

12,909' to 12,946

Casing and Tubing Record

Casing Size	Depth Set	Cementing Record	Cement Tops
12-3/4"	4301	400 sks	Surface
8-5/8"	4,300'	500 sks	3240' (Calculated)
5-1/2"	12,982'	500 sks	9500' (Temp Survey)
2-7/8" tubing 1	2,877'	Packer set at 12,877'	

Operator:

MGF Oil Corporation

Well Name:

Mobil State Com No. 1

Location:

660' FSL & 660' FEL Section 30, T-16-S, R-36-E

Lea County

Total Depth:

12,962'

Producing Formation: Devonian

Perforations:

12,915' to 12,962'

Casing and Tubing Record

Casing Size	Depth Set	Cementing Record	Cement Tops
11-3/4" 8-5/8" 5-1/2"	445' 4,250' 12,915'	375 sks 400 sks 300	Surface 2,714' (Calculated) 11,315' (Calculated)
2-3/8" tubing	12,900'	Packer set at 12,810'	





BOX 4513 ODESSA, TEXAS 79760

SERVICE LABORATORY: Odessa, Texas Phone [915] 362-2353 & 563-0863 RESEARCH LABORATORY: Houston, Texas Phone [713] 431-2561 PLANT: Odessa, Texas Phone [915] 362-2353 & 563-0863

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	Barton		DATE SAMPLED_			
cc Bill Cozart			DATE REPORTED_	9/13/77		
	: Harrison		FIELD, LEASE, OR	weu as list	ed below	
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laka	L. Hamon					· · · · · · · · · · · · · · · · · · ·
	E. Ramott					
ADDRESS	Gladdon		DEPTH	Troy Clad	don	
SERVICE ENGINEER Troy	urauuell		SUBMITTED BY	Troy Glad	ucii	
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		•	Field, Lec	ise, or We	lf	
Chemical	State K 33	State K 33	State A			1
Component	#1	#2	1320	1		
	<u> </u>		<u> </u>			
Chloride (CI)	29,000	17,000	20,000			
Iron (Fe)	1.12	1.12	11.2			
Total Hardness (Ca CO ₃) Calcium (Ca)	21,900	6,900	6,700	 		
Magnesium (Mg)	5,800	2,680	2,600			
Bicarbonate (HCO ₃)	1798.2 60	48.6	48,6		 	
Carbonate (CO%)	neq.	neg.	neg.	 	 	
Sulfate (SO ₄)	1,400	1,700	1,800	 		
Hydrogen Sulfide (H ₂ S)	very mild	very mild	mild			<u> </u>
Specific Gravity	12.7	I III I I				
Density, lb./gal.						
pH - Beckman [X Strip []	6.2	7.5	7.6			
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Exhibit 6

Re: Application to Dispose of Salt Water Jake L. Hamon, State K-33 No. 2 Shoebar, East Devonian Field Lea County, New Mexico

Sirs:

I have received the notice from Jake L. Hamon of the application to dispose of salt water into the Devonian formation on the referenced well.

I have no objection to this application.

Company <u>MGF 01/ (0RP</u>

By <u>Hugh L Bast</u>

Date <u>10/12/28</u>

BEFORE EXAMINER NUTTER
OIL CONSERVATION DIVISION
EXHIBIT NO. 7
CASE NO. 6358

Exhibit 7 - page 1

Re: Application to Dispose of Salt Water Jake L. Hamon, State K-33 No. 2 Shoebar, East Devonian Field Lea County, New Mexico

Sirs:

I have received the notice from Jake L. Hamon of the application to dispose of salt water into the Devonian formation on the referenced well.

I have no objection to this application.

By Gudra B. Cang

Date 18-13-72

Exhibit 7 - page 2

> Re: Application to Dispose of Salt Water Jake L. Hamon, State K-33 No. 2 Shoebar, East Devonian Field Lea County, New Mexico

Sirs:

I have received the notice from Jake L. Hamon of the application to dispose of salt water into the Devonian formation on the referenced well.

I have no objection to this application.

Company

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Re: Application to Dispose of Salt Water Jake L. Hamon, State K-33 No. 2 Shoebar, East Devonian Field Lea County, New Mexico

Sirs:

I have received the notice from Jake L. Hamon of the application to dispose of salt water into the Devonian formation on the referenced well.

I have no objection to this application.

Company HLLEN K. TROBBUGH

By Cllenk Nohaus C

Date 10/19/78

Re: Application to Dispose of Salt Water Jake L. Hamon, State K-33 No. 2 Shoebar, East Devonian Field Lea County, New Mexico

Sirs:

I have received the notice from Jake L. Hamon of the application to dispose of salt water into the Devonian formation on the referenced well.

I have no objection to this application.

Company	EXXON CORPORATION
Ву	Lex Regul
Date	OCTOBER 20, 1978

Dockets Nos. 35-78 and 36-78 are tentatively set for hearing on November 8 and 21, 1978. Applications for hearing must be filed at least 22 days in advance of hearing date.

DOCKET: EXAMINER HEARING - WEDNESDAY - OCTOBER 25, 1978

9 A.M. - OIL CONSERVATION DIVISION CONFERENCE ROOM, STATE LAND OFFICE BUILDING, SANTA FE, NEW MEXICO

The following cases will be heard before Daniel S. Nutter, Examiner, or Richard L. Stamets, Alternate Examiner:

CASE 6290: (Continued from September 13, 1978, Examiner Hearing)

In the matter of the hearing called by the Oil Conservation Division on its own motion to permit R. A. Crane, Jr., Great American Insurance Co., and all other interested parties to appear and show cause why the Donella Well No. 1 located in Unit P of Section 3, Township 29 North, Range 15 West, San Juan County, New Mexico, should not be plugged and abandoned in accordance with a Division-approved plugging program.

CASE 6339: (Continued from October 11, 1978, Examiner Hearing)

Application of Amoco Production Company for compulsory pooling, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests in the Pennsylvanian formation underlying the S/2 of Section 22, Township 23 South, Range 28 East, Eddy County, New Mexico, to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision. Also to be considered will be the designation of applicant as operator of the well and a charge for risk involved in drilling said well.

Application of Amoco Production Company for two unorthodox well locations, Lea County, New Mexico.

Applicant, in the above-styled cause, seeks approval of the unorthodox locations of its South Mattix
Unit Well No. 32 located 1535 feet from the North line and 330 feet from the East line and its

South Mattix Unit Well No. 34 located 1650 feet from the North line and 2310 feet from the West line,
both in Section 22, Township 24 South, Range 37 East, Fowler-Upper Yeso Pool, Lea County, New Mexico,
the S/2 NE/4 and the E/2 NW/4 of Section 22 to be dedicated, respectively, to the wells.

CASE 6356: Application of Amoco Production Company for salt water disposal, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the Abo formation through the perforated interval from 8391 feet to 9100 feet in its State "E" Tract 18 Well No. 21 located in Unit B of Section 2, Township 17 South, Range 36 East, Lovington-Abo Pool, Lea County, New Mexico.

CASE 6357: Application of Enserch Exploration, Inc., for pool creation and special pool rules, Roosevelt County, New Mexico. Applicant, in the above-styled cause, seeks an order creating a new oil pool in the Pennsylvanian formation for its Lambirth Well No. 4 located in Unit O of Section 31, Township 5 South, Range 33 East, Roosevelt County, New Mexico, and for promulgation of special pool rules, including provision for 80-acre spacing and special well location requirements.

CASE 6358: Application of Jake L. Hamon for salt water disposal, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the Devonian formation through the perforated interval from 12,997 feet to 13,036 feet in his State K-33 Well No. 2 located in Unit N of Section 30, Township 16 South, Range 36 East, East Shoe Bar-Devonian Pool, Lea County, New Mexico.

CASE 6359: Application of Getty Oil Company for downhole commingling, Rio Arriba County, New Mexico. Applicant, in the above-styled cause, seeks approval for the downhole commingling of Gallup and Dakota production in the wellbore of its Jicarilla "C" Well No. 27 located in Unit E of Section 33, Township 25 North, Range 5 West. Applicant further seeks provision for administrative approval for downhole commingling of the Gallup and Dakota formations in others of its wells on its Jicarilla "B" and Jicarilla "C" leases in Sections 5 and 6, Township 24 North, Range 5 West, and Sections 21, 22, 27, 28 and 31 thru 34, Township 25 North, Range 5 West, all in Rio Arriba County, New Mexico.

CASE 6368: Application of Getty Oil Company for the amendment of Order No. R-5388, Rio Arriba County, New Mexico.

Applicant, in the above-styled cause, seeks the amendment of Order No. R-5388 to provide an administrative procedure to permit the downhole commingling of Pictured Cliffs and Charra production in wells on its Jicarilla "B" and "C" Leases in Sections 21, 22, 27, 28, and 31 thru 34, Township 25 North, Range 5 West, and Sections 5 and 6, Township 24 North, Range 5 West, all in Rio Arriba County, New Mexico.

Application of Continental Oil Company for a non-standard gas proration unit and simultaneous dedication, Lea County, New Mexico. Applicant, in the above-styled cause, seeks approval of a 228-acre non-standard gas proration unit comprising the SW/4 and S/2 SE/4 of Section 18, Township 21 South, Range 36 East, Eumont Gas Pool, Lea County, New Mexico, to be simultaneously dedicated to applicant's Lockhart A-18 Wells Nos. 3 and 4, located in Units K and M, respectively, of said Section 18.

- CASE 6361: Application of Continental Oil Company for special pool rules, Lea County, New Mexico. Applicant, in the above-styled cause, seeks the promulgation of special pool rules for the Buffalo-Pennsylvanian Gas Pool, Lea County, New Mexico, to provide for 320-acre spacing rather than 160 acres. In the absence of objection, this pool will be placed on the standard 320-acre spacing for Wolfcamp and Pennsylvanian gas pools rather than the present 160-acre spacing.
- CASE 6362: Application of Continental Oil Company for an unorthodox gas well location and a non-standard proration unit, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of a 294.9-acre non-standard gas proration unit comprising the S/2 of partial Section 19, Township 17 South, Range 29 East, Eddy County, New Mexico, to be dedicated to a well to be drilled 660 feet from the South line and 3300 feet from the East line of said Section 19 to test the Morrow formation.
- CASE 6363: Application of Phoenix Resources Company for an unorthodox gas well location, Eddy County, New Mexico.

 Applicant, in the above-styled cause, seeks approval for the unorthodox location of a well to be drilled 660 feet from the North and West lines of Section 16, Township 19 South, Range 21 East, Eddy County, New Mexico, to be drilled to the Mississippian formation, the W/2 of said Section 16 to be dedicated to the well.
- CASE 6364: Application of Adobe Oil Company for compulsory pooling, Lea County, New Mexico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests from the surface to the base of the Ellenburger formation underlying the NW/4 SE/4 of Section 23, Township 20 South, Range 38 East, Lea County, New Mexico, to be dedicated to a proposed oil well to be drilled at a standard location thereon. Applicant seeks the pooling of the SE/4 of said Section 23 in the event said drilling results in a gas well. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision. Also to be considered will be the designation of applicant as operator of the well and a charge for risk involved in drilling said well.
- CASE 6365: Application of Michael P. Grace II for compulsory pooling, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests in the Wolfcamp and Pennsylvanian formations underlying the W/2 of Section 25, Township 21 South, Range 26 East, Burton Flat Field, Eddy County, New Mexico, to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision. Also to be considered will be the designation of applicant as operator of the well and a charge for risk involved in drilling said well.
- Application of Phillips Petroleum Company for statutory unitization, Lea County, New Mexico.

 Applicant, in the above-styled cause, seeks an order unitizing, for the purpose of a pressure maintenance project, all mineral interests in the East Vacuum Grayburg-San Andres Unit encompassing 7,025 acres, more or less, underlying all or portions of the following lands in Lea County, New Mexico:

 Section 24, Township 17 South, Range 34 East; Sections 18 thru 29 and 31 thru 35, Township 17 South, Range 35 East; and Sections 4 and 5, Township 18 South, Range 35 East.

The unitized interval would be the Grayburg-San Andres Formation between the depths of 4,050 feet and 5,050 feet in Exxon's NM State "K" Well No. 19, located in Unit P of Section 28, Township 17 South, Range 35 East.

Among the matters to be considered at the hearing will be the necessity of unit operations; the designation of a unit operator; the determination of the horizontal and vertical limits of the unit area; the determination of a fair, reasonable, and equitable allocation of production and costs of production, including capital investment, to each of the various tracts in the unit area; the determination of credits and charges to be made among the various owners in the unit area for their investment in wells and equipment; and such other matters as may be necessary and appropriate for carrying on efficient unit operations, including, but not necessarily limited to, unit voting procedures, selection, removal, or substitution of unit operator, and time of commencement and termination of unit operations.

CASE 6367: Application of Phillips Petroleum Corporation for a pressure maintenance project, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to institute a pressure maintenance project on its East Vacuum Grayburg-San Andres Unit, Lea County, New Mexico, by the injection of water into the Grayburg-San Andres formation; and the establishment of an administrative procedure for approval of injection and producing wells at unorthodox locations.

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ONLY ATTYS: COFFIELD, MARTIN, BOZARTH, BOHANNON, FOSTER, ALLEN & ALLEN LICENSED IN TEXAS

October 6, 1978

Mr. Dan Nutter Chief Engineer Oil Conservation Division Post Office Box 2088 Santa Fe, New Mexico 87501

Dear Dan:

Transmitted herewith you will find triplicate executed copies of an Application for Jake L. Hamon for a salt water disposal well in the SE\(\frac{1}{4}\)SW\(\frac{1}{4}\) of Section 30, Township 16 South, Range 36 East, N.M.P.M., Lea County, New Mexico.

It is my understanding that the docket setting for October 25 is still available for this matter and accordingly, we request that it be heard on that date.

I trust that the enclosed copies of the Application are all that is needed in order for this to be set for the October 25, 1978 hearing. However, if anything is needed in addition, please let me know.

Very truly yours,

HINKLE, COX, EATON, COFFIELD & HENSLEY

Conrad E. Coffield

CEC:rf Enclosures

xc: Mr. Jake L. Hamon
Petroleum Building
Midland, Texas 79701

APPLICATION FOR HEARING

BEFORE NEW MEXICO OIL CONSERVATION COMMISSION

Case 10358

COMES NOW the undersigned as attorney on behalf of Jake L. Hamon and files this written application for hearing to be set on the docket for October 25, 1978. In connection therewith, the undersigned, on behalf of Jake L. Hamon, submits the following data:

- 1. Name of Applicant: Jake L. Hamon
- 2. Area Affected by the Order Sought:

Township 16 South, Range 36 East, N.M.P.M., Lea County, New Mexico_

Section 30: SE%SW%

The above being the location of the State K-33 #2 Well located 554 feet from the South line and 1983.7 feet from the West line of Section 30.

- 3. General Nature of Order Sought: Applicant seeks to inject produced salt water into the above described well, with the volume of water anticipated to be injected being between 500 barrels and 2000 barrels of water per day. The formation into which Applicant seeks to inject salt water is the Devonian Sand Formation.
- 4. Other Matters to be Noted in Connection with Order Sought: The proposed perforations and injection interval for the foregoing are 12,997 feet to 13,036 feet beneath the surface.

The above well for which Applicant seeks authority from the Commission to inject salt water is located in the Shoebar East Devonian Field.

DATED this 6th day of October, 1978.

Respectfully submitted,

HINKLE, COX, EATON, COFFIELD & HENSLEY

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Conrad E. Coffield

Attorney for Jake L. Hamon

Application of Jake L. Hammon For SWD. Shte K-33 Wall No 2. 1983.7 W se/sw/) 30 . T165-8366 inject prod Salt water into Devenian fun Perts 12997 - 13036 des to East Shoe Bur - Devonian Pool

R15

. STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT OIL CONSERVATION DIVISION

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

APPLICATION OF JAKE L. HAMON FOR SALT WATER DISPOSAL, LEA COUNTY, NEW MEXICO.
ORDER OF THE DIVISION
BY THE DIVISION:
This cause came on for hearing at 9 a.m. on October 25
19 78 , at Santa Fe, New Mexico, before Examiner Daniel S. Nutter NOW, on this day of Cotober , 19 78 , the Division
Director, having considered the testimony, the record, and the
recomendations 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,Jake L. Hamon,
is the owner and operator of the State K-33 Well No. 2
located in Unit N of Section 30 , Township 16 South
Range 36 East , NMPM, East Shoe Bar-Devonian Pool
Lea County, New Mexico.
(3) That the applicant proposes to utilize said well to
dispose of produced salt water into the
formation, with injection into theperforated
interval from approximately 12,997 feet to 13,036 feet.
(4) That the injection should be accomplished through 28
-inch plastic lined tubing installed in a packer set at approxi-
mately 12,860 feet; that the casing-tubing annulus should be
filled with an inert fluid; and that a pressure gauge or approved
leak detection device should be attached to the annulus in order

CASE NO. 6358

Order No. R- 5848

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to determine leakage in the casing, tubing, or packer.

- with a pop-off valve or acceptable substitute which will limit the wellhead pressure on the injection well to no more than 2500 psi.
- (6) That the operator should notify the supervisor of the Hobbs district office of the Division of the date and time of the installation of disposal equipment so that the same may be inspected.
- (7) That the operator should take all steps necessary to ensure that the injected water enters only the proposed injection interval and is not permitted to escape to other formations or onto the surface.
- (8) That approval of the subject application will prevent the drilling of unnecessary wells and otherwise prevent waste and protect correlative rights.

IT IS THEREFORE ORDERED:

(1) That the applicant, Jake L. Hamon
is hereby authorized to utilize itsState K-33 Well No. 2
located in Unit N of Section 30 , Township 16 South
Range 36 East , NMPM, East Shoe Bar-Devonian Pool
Lea County, New Mexico, to dispose of produced salt water
into the Devonian formation, injection to be
into the
accomplished through 278 -inch tubing installed in a

PROVIDED HOWEVER, that the tubing shall be plastic-lined; that the casing-tubing annulus shall be filled with an inert fluid; and that a pressure gauge shall be attached to the annulus

or the annulus shall be equipped with an approved leak detection device in order to determine leakage in the casing, tubing, or packer.

- with a pop-off valve or acceptable substitute which will limit the wellhead pressure on the injection well to no more than 2500psi.
- (3) That the operator shall notify the supervisor of the Hobbs district office of the Division of the date and time of the installation of disposal equipment so that the same may be inspected.
- (4) That the operator shall immediately notify the supervisor of the Division's Hobbs district office of the failure of the tubing, casing, or packer, in said well or the leakage of water from or around said well and shall take such steps as may be timely and necessary to correct such failure or leakage.
- (5) That the applicant shall submit monthly reports of its disposal operations in accordance with Rules 704 and 1120 of the Division Rules and Regulations.
- (6) 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.