CASE 4013: Application of REDFERN DEVELOPMENT CORP. & WIL-MAC OIL CORP. FOR SALT WATER DISPOSAL.

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-dSe Number

Application Transcripts.

Small Exhibits

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IALIZING IN: DEPOSITIONS, HEARINGS, STATEMENTS, EXPERT TESTIMONY, DAILY COPY,

1120 SIMMS BIDG. . P. (). BOX 1092 . PHONE 243-6691 . AIBUQUERQUE, NEW MEXICO

BEFORE THE

NEW MEXICO OIL CONSERVATION COMMISSION

Santa Fe, New Mexico

January 8, 1969

EXAMINER HEARING

IN THE MATTER OF:

Application of Redfern )
Development Corporation )
and Wil-Mc Oil Corporation )
for salt water disposal, )
Lea County, New Mexico. )

Case No. 4013

BEFORE: Daniel S. Nutter, Examiner

TRANSCRIPT OF HEARING



MR. HATCH: Case 4013, continued from December 27, 1968, Examiner Hearing, Application of Redfern Development Corporation and Wil-Mc Oil Corporation for salt water disposal, Lea County, New Mexico.

MR. KELLAHIN: Jason Kellahin, Kellahin & Fox, for the applicant, and I have one witness.

(Witness sworn.)

(Whereupon, Applicant's Exhibits Numbers 1, 2, 3, 4, 5, inclusive, were marked for identification.)

#### WILLIAM J. LEMAY

called as a witness on behalf of the Applicant, having been first duly sworn, was examined and testified as follows:

# DIRECT EXAMINATION

### BY MR. KELLAHIN:

- Q State your name, please?
- A William J. LeMay.
- Q Are you the same William J. LeMay who testified earlier?
- A Yes, I am.

MR. KELLAHIN: Are the witness's qualifications as a geologist acceptable?

MR. NUTTER: Yes.

Q Mr. LeMay, in connection with your work as a consulting geologist, have you done any work with Redfern Development

Corporation and Wil-Mc Oil Corporation in connection with Case 4013?

- A Yes, I have.
- Q What is proposed in this application?
- A The applicant proposes to dispose of the produced salt water from the San Andres Formation into the San Andres Formation in the interval from approximately 4,042 feet to 4,179 feet.

  This is in lieu of what was previously advertised, 4,200 feet to 4,300 feet. They propose to dispose of this salt water in the Wil-Mc State K Well No. 1, located in Unit 0 of Section 11,

  Township 10 South, Range 32 East, in the East Mescalero-San Andres Pool of Lea County, New Mexico.
- Q Referring to what has been marked as Exhibit Number 1, would you identify that exhibit, please?
- A Exhibit Number 1 is a land location map of the Mescalero Pool, showing the ownership of land surrounding the Mescalero Field, and the Mescalero Field, and also color coated according to productive formations. The Pennsylvanian, San Andres, and Devonian are the main producers in the Mescalero Field, with the San Andres Formation being the predominant formation producing in the vicinity of the proposed injection well.

Land ownership is noted within a radius of two miles,

and also the wells are designated whether they are dry holes, oil or gas producers.

Q Referring to what has been marked as Exhibit Number 2, would you identify that exhibit?

A Exhibit Number 2 is a structure map of the Mescalero-San Andres Field, with the datum being the top of the Slaughter pay zone of the San Andres encountered approximately 700 feet below the top of the San Andres Formation. As indicated by the typed log on the right, production is from the gross Slaughter interval comprising approximately 150 feet.

The steep dip is to be noted flanking the field on the east, and also isopach figures indicating net pay, which are dashed in on the map.

What should be noted is the fact that the proposed disposal well in Section 11 is a down dip well on the Mescalero Structure.

Q Referring to Exhibit 3, would you identify that exhibit?

A Exhibit 3 is the application to dispose of the salt water. On this application, the casing program is noted and the amount of the cement; also the perforated interval from 4,042 to 4,179, and the previous perforations on this present dry hole.

Previously it was a Pennsylvanian producer, and plugged back to

the San Andres Formation, which was non commercial. Wil-Mc tried to complete from this formation, I think in about 1965, and they pumped nine barrels of oil and twenty-six barrels of water from the existing perforations.

It indicates the anticipated daily volume of fluid salt water injected into this well, which will be between 100 and 500 barrels of water per day. They do plan to pressure up on the system in order to inject this amount of fluid in the formation with approximately 2,000 pounds PSI.

- Q And it will be a closed type of system?
- A That is correct.
- O Referring to Exhibit 4, will you please explain that exhibit?

A Exhibit 4 is a diagrammatic sketch of the Wil-Mc Oil Corporation's State K well, and it shows the casing program and the proposed completion of the system. There is a thirteen and three-eighths-inch surface casing set at 359 feet, and circulated to the surface, the cement is circulated to the surface with 365 sacks. The intermediate casing being eight and five-eighths-inch set at 3,480, and circulated to the surface with 2,800 sacks, and the production string being five and a half-inch casing set at 10,270, with the top of the cement calculated at 7,400 feet, with 500 sacks in the production string.

The proposed system will include a packer set above the perforations, and this packer will be set on two and three-eighths-inch plastic coated tubing. The annulus will be filled with inert fluid, and will be monitored at the surface with a pressure gauge.

- Q Now, referring to what has been marked as Exhibit Number 5, would you identify that exhibit?
- A Exhibit Number 5 is an analysis of the San Andres water as taken from the tank battery on the lease. It indicates the character of the water, being typically San Andres water.
- Q Is it your understanding that the San Andres water is the water that will be injected?
  - A That is correct.
- Q And this is the same zone that is being injected into, is it not?
  - A That is correct.
- Q So would you anticipate any problems in connection with the injection of the San Andres water into the San Andres Fermation?
  - A No, I would not.
- O In your opinion, taking into consideration the volume of water being injected and the location of the injection well, will the use of this well for water disposal cause any adverse

effect on producing wells in the area?

A No. I say this because of the south offset in Section 14, being a San Andres well, the production of this well, even though it is higher than the proposed injection well, the south offset being Unit B, Section 14, on the October production was pumping 143 barrels of oil, plus 1,287 barrels of water, being quite marginal.

MR. KELLAHIN: If the Examiner please, I believe a log of this well was submitted with the application.

MR. NUTTER: Yes, we do have that.

Q Mr. LeMay, have you examined Exhibits 1 through 5, and in your opinion do they correctly reflect the proposals that have been made by Redfern and Wil-Mc?

A Yes.

MR. KELLAHIN: At this time I offer into evidence Exhibits 1 through 5, inclusive.

MR. NUTTER: Applicant's Exhibits 1 through 5 will be admitted in evidence.

(Whereupon, Applicant's Exhibits Numbers 1, 2, 3, 4, and 5 were admitted in evidence.)

MR. KELLAHIN: That is all I have on direct examination.

MR. NUTTER: Any questions of Mr. LeMay?

#### CROSS EXAMINATION

#### BY MR. NUTTER:

- Q Mr. LeMay, where will the water come from that will be disposed of?
- A It will come from the San Andres production in the area. Both Wil-Mc and Redfern are operators of this salt water disposal system, and I don't know if any Bough C water will be put in that system or not. It is my understanding it will not.
- Q But Redfern and Wil-Mc are two separate companies, and they are jointly installing this disposal well?
  - A Right.
- Q To handle their own production of water, or will the well be available to other producers?
- A This I don't know. I know they are having their water first, and depending upon the capacity of the injection well and the pressure system, they might expand it.
- Ω Well, Exhibit 3 indicates that they anticipate from 100 to 500 barrels of water a day?
  - A That is correct.
- Q And you stated that the Mobil BB No. 1, which is immediately south, is making 1,500 barrels a month?
  - A Of water.
  - O Is this a high water production for the pool, or is

it a typical well?

- A It is fairly high for the well. It is a down dip well.
- O And you did want to make a point, also, that the Mobil well making 1,300 barrels a day is still structurally higher than the proposed disposal well?
  - A That is correct.

MR. NUTTER: Any further questions? Mr. LeMay, you may be excused. Do you have anything further?

MR. KELLAHIN: That is all.

MR. NUTTER: Does anyone have anything they wish to offer in Case 4013? We will take the case under advisement, and recess until one fifteen o'clock this afternoon.

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| EXHIBITS                                 | MARKED | OFFERED AND ADMITTED |
|------------------------------------------|--------|----------------------|
| Applicant's Exhibits Numbers 1 through 5 | 2      | 7                    |

STATE OF NEW MEXICO )
) ss.
COUNTY OF BERNALILLO )

I, SAMUEL MORTELETTE, Court Reporter in and for the County of Bernalillo, State of New Mexico, do hereby certify that the foregoing and attached Transcript of Hearing before the New Mexico Oil Conservation Commission was reported by me, and that the same is a true and correct record of the said proceedings, to the best of my knowledge, skill and ability.

MINISTER REPORTER

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1120 SIMMS BLOG. . P. O. BOX 1092 . PHONE 243-6691 . ALBUQUERQUE, NEW MEXICO

## BEFORE THE NEW MEXICO OIL CONSERVATION COMMISSION Santa Fe, New Mexico January 22, 1969

#### EXAMINER HEARING

IN THE MATTER OF:

Application of Redfern Development ) Corp. and Wil-McOil Corp. for salt ) water disposal, Lea County, N. M. )

Case No. 4013

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BEFORE: Elvis A. Utz, Examiner.

TRANSCRIPT OF HEARING



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#### NEW MEXICO OIL CONSERVATION COMMISSION

EXAMINER HEARING

SANTA FE , NEW MEXICO

Hearing Date JANUARY 22, 1969 TIME: 9 A.M. NAME LOCATION REPRESENTING Him & Duldarme RW Byrum & Co. Suntu de Missersono

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MR. UTZ: The hearing will come to order, please. The first case on the docket will be 4013.

MR. HATCH: Case 4013, continued and re-advertised. Application of Redfern Development Corporation and Wil-Mc Oil Corporation for salt water disposal, Lea County, New Mexico.

If the Examiner please, this case was first set or. the docket for December 27, 1968, but there was an error in the footage, so it was re-advertised, and it was heard on January 8, 1969, and it has been re-advertised for the purposes of giving the people an opportunity to appear in the case.

MR. UTZ: Any appearances in this case?

MR. KELLAHIN: If the Examiner please, I believe the record is complete on this application. I move that you enter an order approving it.

MR. UTZ: We will take your recommendation under advisement, Mr. Kellahin.

| STATE    | OF   | NEW   | MEXICO       | ) |    |
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|          |      |       |              | ) | SS |
| COLIMITS | 7 01 | r agr | O.T.TT.TAINS | 1 |    |

I, SAMUEL MORTELETTE, Court Reporter in and for the County of Bernalillo, State of New Mexico, do hereby certify that the foregoing and attached Transcript of Hearing before the New Mexico Oil Conservation Commission was reported by me, and that the same is a true and correct record of the said proceedings, to the best of my knowledge, skill and ability.

SUMUL SOLETATE
COURT REPORTER

I do hereby cortify that the foregoing is a compact result of the production in the standard of the product of the foregoing of the first to the firs

1120 SIRMS BIDG. . F. O. BOX 1092 . PHONE 243-6691 . AIBUQUERQUE, NEW MEXICO

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BEFORE THE

NEW MEXICO OIL CONSERVATION COMMISSION

Santa Fe, New Mexico

December 27, 1968

EXAMINER HEARING

IN THE MATTER OF:

Application of Redfern Development Corporation and Wil-Mc Oil Corporation for salt water disposal, Lea County, New Mexico.

Case No. 4013

BEFORE: Daniel S. Nutter, Examiner

TRANSCRIPT OF HEARING



MR. NUTTER: Case 4013.

MR. HATCH: Case 4013, application of Redfern

Development Corporation and Wil-Mc Oil Corporation for salt
water disposal, Lea County, New Mexico.

If the Examiner please, we have had a request to continue this and hear it on January 8; it will have to be re-advertised, though, to correct the disposal interval, and will be re-advertised for the 22nd.

MR. NUTTER: Case 4013 will be continued to January 8th. It will also be heard on January 22nd, after re-advertisement.

STATE OF NEW MEXICO SS. COUNTY OF BERNALILLO

I, SAMUEL MORTELETTE, Court Reporter in and for the County of Bernalillo, State of New Mexico, do hereby certify that the foregoing and attached Transcript of Hearing before the New Mexico Oil Conservation Commission was reported by me, and that the same is a true and correct record of the said proceedings, to the best of my knowledge, skill and ability.

I do hereby sorbify that the foregoing is a complete moment of the providings in the large me is sain; of the large in the large me is sain; of the large in 1968.

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New Mexico Gil Conservation Commission

DAVID F. CARGO CHAIRMAN

# State of New Dexico

# Bil Conservation Commission

LAND COMMISSIONER GUYTON B. HAYS MEMBER



STATE GEOLOGIST A. L. PORTER, JR. SECRETARY - DIRECTOR

SANTA FE

January 24, 1969

Mr. Jason Kellahin Kellahin & Fox Attorneys at Law Post Office Box 1769 Santa Fe, New Mexico Re: Case No. 4013
Order No. R-3663
Applicant:

Redfern Development Corp. & Wil-Mc Oil Corporation

Dear Sir:

Enclosed herewith are two copies of the above-referenced Commission order recently entered in the subject case.

Very truly yours,

A. L. PORTER, Jr. Secretary-Director

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| ztec OCC                          |
| ther State Engineer Office        |

# 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. 4013 Order No. R-3663

APPLICATION OF REDFERN DEVELOPMENT CORPORATION AND WIL-MC OIL CORPORATION FOR SALT WATER DISPOSAL, LEA COUNTY, NEW MEXICO.

#### ORDER OF THE CONNISSION

#### BY THE COMMISSION:

This cause came on for hearing at 9 a.m. on January 22, 1969, at Santa Fe, New Mexico, before Examiner Elvis A. Utz.

NOW, on this 24th day of January, 1969, the Commission, a quorum being present, 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 Commission has jurisdiction of this cause and the subject matter thereof.
- (2) That the applicants, Redfern Development Corporation and Wil-Mc Oil Corporation, are the owners and operators of the Wil-Mc State "K" Well No. 1, located in Unit O of Section 11, Township 10 South, Range 32 East, NMPM, Mescalero-San Andres Pool, Lea County, New Mexico.
- (3) That the applicants propose to utilize said well to dispose of produced salt water into the San Andres formation, with injection into the perforated interval from approximately 4042 feet to 4179 feet.
- (4) That the injection should be accomplished through 2 3/8-inch plastic-lined tubing installed in a packer set just above said perforations; that the casing-tubing annulus should be

-2-CASE No. 4013 Order No. R-3663

filled with an inert fluid; and that a pressure gauge should be attached to the annulus at the surface in order to determine leakage in the casing, tubing, or packer.

(5) 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 applicants, Redfern Development Corporation and Wil-Mc Oil Corporation, are hereby authorized to utilize the Wil-Mc State "K" Well No. 1, located in Unit O of Section 11, Township 10 South, Range 32 East, NMPM, Mescalero-San Andres Pool, Lea County, New Mexico, to dispose of produced salt water into the San Andres formation, injection to be accomplished through 2 3/8-inch tubing installed in a packer just above the disposal interval, with injection into the perforated interval from approximately 4042 feet to 4179 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 at the surface in order to determine leakage in the casing, tubing, or packer.

- (2) That the applicants shall submit monthly reports of the disposal operations in accordance with Rules 704 and 1120 of the Commission Rules and Regulations.
- (3) 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 MEN MEXICO
OIL COMSERVATION COMMISSION

DAVID F. CARGO, Chairman

ALEX J ARMIJO, Member

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

est

#### DOCKET: EXAMINER HEARING - WEDNESDAY - JANUARY 22, 1969

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

The following cases will be heard before Elvis A. Utz, Examiner, or Daniel S. Nutter, Alternate Examiner:

CASE 4013:

(Continued and Readvertised)
Application of Redfern Development Corporation and Wil-Mc Oil Corporation for salt water disposal, Lea County, New Mexico. Applicants, in the above-styled cause, seek authority to dispose of produced salt water into the San Andres formation in the interval from approximately 4042 feet to 4179 feet in the Wil-Mc State K Well No. 1 located in Unit O of Section 11, Township 10 South, Range 32 East, Mescalero-San Andres Pool, Lea County, New Mexico.

CASE 4029:

Application of General American Oil Company for a waterflood expansion, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks authority to expand its pilot waterflood project in the Grayburg zone of the San Andres formation in the Grayburg-Jackson Pool, Eddy County, New Mexico, authorized by Order No. R-2324, by the conversion to water injection of 13 additional injection wells located in Township 17 South, Ranges 29 and 30 East, Eddy County, New Mexico.

CASE 4030:

Application of Argus 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 Seven Rivers formation in the perforated and open-hole interval from approximately 3554 feet to 3775 feet in its J. T. Lynn A-28 Well No. 3, located 2310 feet from the South line and 1650 feet from the East line of Section 28, Township 23 South, Range 36 East, Jalmat Yates-Seven Rivers Pool, Lea County, New Mexico.

CASE 4031:

Application of Texaco Inc. for salt water disposal, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the Yates-Seven Rivers formations in the open-hole interval from approximately 2964 feet to 3119 feet in its C. W. Shepherd Federal "B" Well No. 5 located in Unit I of Section 1, Town-ship 26 South, Range 36 East, Jalmat Yates-Seven Rivers Pool, Lea County, New Mexico.

Examiner Hearing - Wednesday - January 22, 1969

- CASE 4032: In the matter of the hearing called by the Oil Conservation Commission upon its own motion to consider the establishment of non-standard gas proration units and unorthodox gas well locations, where necessary, in the Aztec and Blanco-Pictured Cliffs Gas Pools in Sections 6, 7, 18, 19, 30, and 31, Townships 29 and 30 North, Ranges 8 and 9 West, San Juan County, New Mexico. Said non-standard units and locations being necessitated by variations in said legal subdivisions of the U. S. Public Land Surveys.
- CASE 4033: Application of Phillips Petroleum 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 Yates-Seven Rivers formations in the perforated interval from 3606 feet to 3740 feet in its Cruces Federal Well No. 5 located in Unit P of Section 26, Township 20 South, Range 34 East, Lynch Yates-Seven Rivers Pool, Lea County, New Mexico.
- CASE 4034: Application of Phillips Petroleum 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 Yates-Seven Rivers formations in the open-hole interval from 3360 feet to 3520 feet in its C. D. Woolworth Well No. 9 located in Unit B of Section 27, Township 24 South, Range 36 East, Jalmat Yates-Seven Rivers Pool, Lea County, New Mexico.
- CASE 4035: Application of Phillips Petroleum Company for a waterflood project, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to institute a waterflood project by the injection of water into the Grayburg-San Andres formations through its Philmex Well No. 5 located in Unit N of Section 27, Township 17 South, Range 33 East, Maljamar Grayburg-San Andres Pool, Lea County, New Mexico.

## DUBATETS EXAMINER GEARING - PRIDAY - DESEMBER 21, 1968

9 A.M. - CIL CONSERVATION COMMISSION CONSERENCE ROOM, STATE LAND COSTOE BUILDING - SANTA RE, NEW MEXICO

The following cases will be heard before Daniel S. Nutter, Examiner, or Elvis A. Utz, Alternate Examiner:

- case 4005: Application of Petroleus : plastics of Texas for ealt water disposal, lea county, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the Pennsylvanian formation in the perforated interval from 9783 to 9946 feet in its State HTB Well No. 1 located in Unit D of Saction 31, Township 12 South, Range 34 East, East Hightower-Opper Pennsylvanian Fool, Lea County, New Mexico.
- CASE 4006: Application of Pathy sound Corporation of Bexas for a water-flood project, Eddy dounty, New Wexland Applicant, in the above-styled cause, seeks authority to institute a waterflood project by the injection of water into the San Andres formation through its Pathon Wederal Well No. 2 located in Unit N of Section 6, Township 18 South, Bange 17 East, Red Lake Pool, Eddy County, New Mexico.
- CASE 4007: Application of Paul Dealeva : or a dual completion and sait water disposal, les doubty, New Mexico. Applicant, in the above-styled course, seeks authority to dually complete his Bagley State Well No. 1 in sated in the NW/4 NW/4 of Section 34, Nownship 13 South, Range So East, less Jounty, New Mexico, in such a member at to produce did for the Bagley-Fennsylvanian Fool and to dispose of produced soit weter down the annulus between the production assing and the intermediate sasing into the dual Ardors. So state, and possibly other formations in the intermediate from approximately 370% for the 1358 feet.
- CASE 4008: Appul tion is Foul Declaration and Completion and Galumater displace, less tourty. New May, it is appulled to the above-styled sause, seeks enthrolly to durally complete his Shell State Well No. 1 is sated in the NW/4 NL/4 of Second no. 19, Township it beauti, hange of it to the low turny, New Maximum, in each a manner as a produce of it is not to indicate the consylvation fool and to displace of its dural soundation dwo to consults between the product of a sample and the constitute of inglitude to an Abdress duration and possibly their invasting of in the interior in approximately 174 into the could into

- CASE 4009: Application of Humble Oil & Refining Company for salt water disposal, Chaves County, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the San Andres formation in the perforated interval from approximately 4273 feet to 4329 feet in its New Mexico "BX" State Well No. 3 located in Unit G of Section 16, Township 8 South, Range 33 East, Chaveroo-San Andres Pool, Chaves County, New Mexico.
- CASE 4010: Application of John H. Trigg for a waterflood project, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks authority to institute a waterflood project by the injection of water into the Grayburg-San Andres formations through his Empire "J" Federal Well No. 1 located in Unit P of Section 1, Township 18 South, Range 26 East, Red Lake Grayburg-San Andres Pool, Eddy County, New Mexico.
- CASE 4011: Application of Sam D. Ares for salt water disposal, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the Yates-Seven Rivers formation in the open-hole interval from approximately 3520 feet to 3639 feet in his Charles Whitten Well No. 5 located in Unit B of Section 4, Township 24 South, Range 36 East, Jalmat Pool, Lea County, New Mexico.
- CASE 4012: Application of Sam D. Ares for salt water disposal, Lea County, New Mexico. Applicant, in the above-styled cause, seeks the amendment of Order No. R-3602 to authorize the disposal of produced salt water into the Yates-Seven Rivers formations in the open-hole interval from approximately 3363 feet to 3650 feet in his Everett Well No. 4, located in Unit M. Section 35, Township 24 South, Range 36 East, Jalmat Pool, Lea County, New Mexico. The subject disposal well would be in lieu of the Everett Well No. 2, previously authorized for disposal by Order No. R-3602.
- CASE 4013: Application of Redfern Development Corporation and Wil-Mc Oil Corporation for salt water disposal, Lea County, New Mexico. Applicants, in the above-styled cause, seek authority to dispose of produced salt water into the San Andres formation in the interval from approximately 4200 feet to 4300 feet in the Wil-Mc State Well No. 1-K, located in Unit O of Section 11, Township 10 South, Range 32 East, Mescalero-San Andres Pool, Lea County, New Mexico.

Docket No. 41-68

CASE 4014: Application of Ralph Lowe for salt water disposal, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the Lower Devonian formation in the perforated interval from approximately 12,350 feet to 12,455 feet in his "C" Devonian Unit Well No. 1 located in Unit O of Section 16, Township 10 South, Range 36 East, South Crossroads-Devonian Pool, Lea County, New Mexico.

# CASE 3991: (Continued and Readvertised)

Application of Roger C. Hanks, Ltd., for salt water disposal, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the lower Devonian formation in the open-hole interval from approximately 10,804 feet to 10,885 feet in its Monterey State Well No. 1 located in Unit A of Section 11, Township 10 South, Range 32 East, Mescalero Field, Lea County, New Mexico.

CASE 4015: Application of Wilson Oil 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 Yates-Seven Rivers formations, Wilson Yates-Seven Rivers Pool, Lea County, New Mexico, through the following six wells:

TOWNSHIP 21 SOUTH, RANGE 34 EAST
Wilson State Well No. 9 located in Unit F of Section 13;

Shell State Well No. 13 located in Unit H of Section 13;

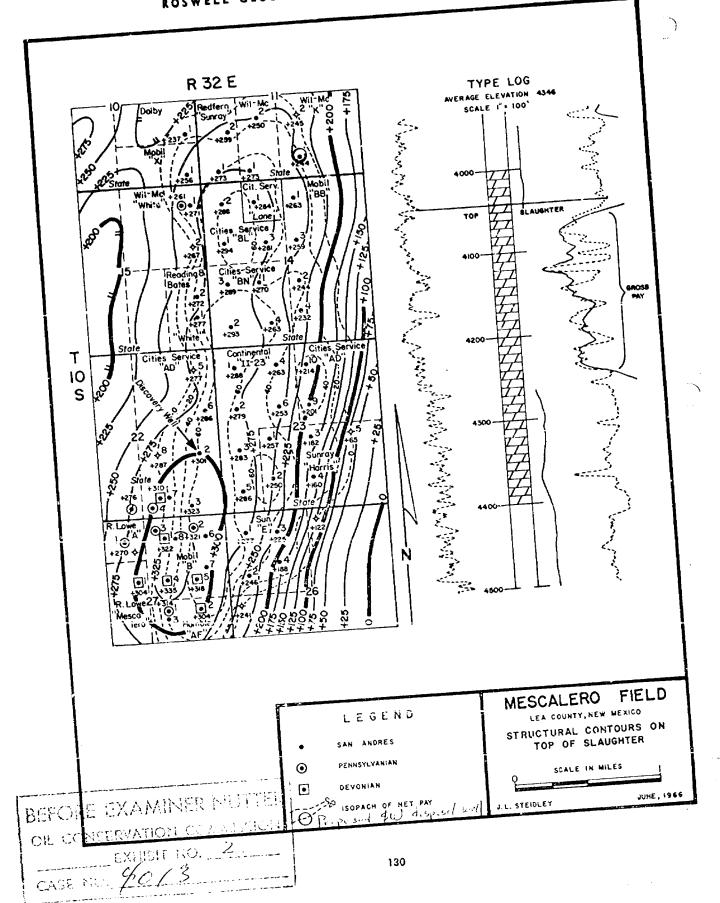
Wilson State Well No. 8 located in Unit O of Section 13;

Wilson State Well No. 20 located in Unit B of Section 23;

Wilson State Well No. 21 located in Unit J of Section 23;

TOWNSHIP 21 SOUTH, RANGE 35 EAST
Wilson State Well No. 1-A located in Unit G of Section 7;

Applicant further seeks an administrative procedure whereby other wells in said pool may be approved for disposal purposes without the requirement of notice and hearing.



#### NEW MEXICO OIL CONSERVATION COMMISSION

#### APPLICATION TO DISPOSE OF SALT WATER BY INJECTION INTO A POROUS FORMATION

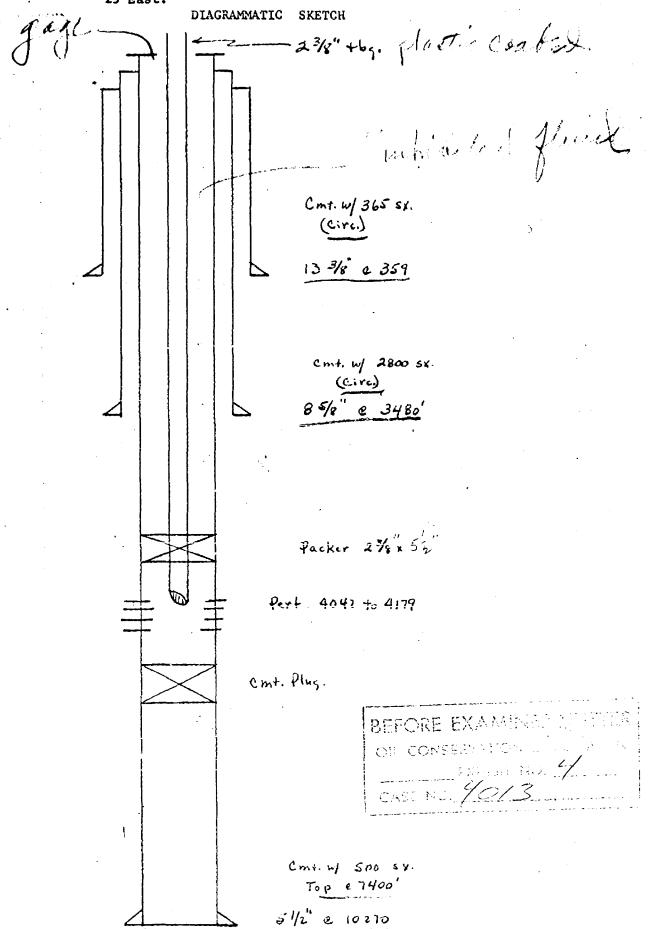
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                                                                                                                                                                      | 7-38 69.  IS INJECTION T PRESSURE?  PRESSURE?  NATUALL WATE SAL JONE YE.  OIL CO.  OR WITHIN ONCH. | 2 100 ex, ZONE TION  2 100 ex, ZONE TION  2 100 ex, ZONE EX TOOL EX TO | APPROX. PRESSURE (PST 2000) WATER ANALYSES ATTACHED?                                                        |

| Drille Histman | Production Hanager | December 19, 1968 |
|----------------|--------------------|-------------------|
| (Signature)    | (Title)            | (Date)            |

NOTE: Should waivers from the State Engineer, the surface owher, and all operators within one-half mile of the proposed injection well. not accompany this application, the New Mexico Oil Conservation Commission will hold the application for a period of 15 days from the date of receipt by the Commission's Santa Fe office. If at the end of the 15-day weiting period no protest has been received by the Santa Fe office, the application will be processed. If a protest is received, the application will be set for hearing, if the opplicant so requests. SEE RULE 701.

\* Wil-Mc Oil Corporation is the owner of this well, but Redfern Development will act as Operator,

REDFERN DEVELOPMENT CORPORATION-OPERATOR WIL-MC OIL CORPORATION'S NEW MEXICO STATE "K" 660 feet from south line, & 1980 feet from the east line, Section 11, Township 10South, Range 23 East.



# HALLIBURTON DIVISION LABORATORY

HALLIBURTON COMPANY MIDLAND DIVISION

|                                  | LABORATORY V          | ATER ANALYSIS No. W1-525-68                                 |                                        |
|----------------------------------|-----------------------|-------------------------------------------------------------|----------------------------------------|
| To Redfern Developene            | nt CO.                | Date 12-24-68                                               |                                        |
|                                  | •                     | or disclosed without first securing the express written app | olished<br>proval<br>in the<br>oncern  |
| Submitted by                     |                       | Date Rec. 12-23-63                                          |                                        |
| Well No. Redfern Sunr            | ay St. Dend           | Formation                                                   |                                        |
|                                  |                       | Source Tank Battery                                         |                                        |
|                                  | Treater               |                                                             |                                        |
| Resistivity                      | .056 @ 66 F.          |                                                             |                                        |
| Specific Gravity                 | 3 305                 |                                                             | ······································ |
| pH                               | 7.3                   |                                                             |                                        |
| Calcium (Ca)                     | 2,600                 | *                                                           | MPL                                    |
| Magnesium (Mg)                   | 750                   |                                                             |                                        |
| Chlorides (CI)                   | 161,000               |                                                             |                                        |
| Sulfates (SO <sub>4</sub> )      | ,                     |                                                             |                                        |
| Bicarbonates (HCO <sub>3</sub> ) | 260                   |                                                             |                                        |
| Soluble Iron (Fe)                | Nil                   |                                                             |                                        |
|                                  |                       |                                                             |                                        |
|                                  | NAME OF THE PROPERTY. |                                                             |                                        |
| Remarks: BEFORE EX OIL CONSERV   | VATION COMMISSION     | *Milligrams per liter                                       | r                                      |
| -                                | Rospectiv             | ly submitted,                                               |                                        |
| Analyst: Whitfield               |                       | HALLIBURTON COMPANY                                         |                                        |
| CC:                              |                       | & Jacop Will Till                                           |                                        |
|                                  |                       | DIVISION CHEMIST                                            |                                        |

NOTICE

This report is limited to the described sample tested. Any user of this report agrees that Halliburton shall not be liable for any loss or damage, whether it be to act or omission, resulting from such report or its use.

December 19, 1968

New Mexico Oil Conservation Commission Chief Engineer P. O. Box 2088 Santa Fe, New Mexico

Re: Waiver for Redfern Development Corporation Application for Disposal of Salt Water into The Wil-Mc Oil Corp. New Mexico State "K" Mescalero San Andres Field Lea County, New Mexico

# Dear Sir:

The undersigned, being an authorized representative operator, offsetting Wil-Mc Oil Corp.'s Lease, has been duly informed by Redfern Development Corporation of its intention to make application to dispose of produced salt water into the New Mexico State "K" No. 1 located on the Wil-Mc Oil Corp. lease in the Mescalero San Anres Field. The subject well is located 660 from the South line and 1980 from the East line of Section 11, Township 10-South, Range 32-East, Lea County, New Mexico.

This is to advise that we approve of their application and waive notice of hearing.

READING & BATES

Manager, Production & Engineering

Date: 12-23-68

## REDFERN DEVELOPMENT CORPORATION

حد

WILCO BUILDING MIDLAND, TEXAS 79701

POST OFFICE BOX 1749
BIF CODE TOTAL
THERPHONE MUTUAL 8-8184

December 9, 1968

IN REPLY REPER TO PILE: 60/017L Lea

Continental Oil Company P. O. Box 431 Midland, Texas

> Re: Salt Water Disposal Waiver Mescalero San Andres Field Lea County, New Mexico

Please Note
H.M.N.
J.E.F.
W.R.H.
D.D.C.
T.C.O'D.

File Noted

#### Gentlemen:

Redfern Development Corporation has made application to the New Mexico Oil Conservation Commission to dispose of produced salt water into the Wil-Mc Oil Corp.'s New Mexico State "K" No. 1. The hearing has been set for December 27, 1968, at the Commission office in Santa Fe, New Mexico.

Disposal will consist of approximately 100 to 500 barrels per day of produced salt water into the New Mexico State "K" No. 1 which Redfern Development Corporation operates. It is requested that you approve our application for this salt water disposal. Attached for your file is a copy of the application which has been presented to the Commission.

For your convenience, two copies of a letter of waiver are attached. If you approve of the use of this well for salt water disposal, please sign the original and mail to the New Mexico Oil Conservation Commission.

Yours very truly,

FAS:lm Enc Fred A. Skidmore, Jr.

Production Manager

Chief Engineer
New Mexico Oil Conservation Commission
P. O. Box 2088
Santa Fe, New Mexico

Re: Waiver for Redfern Development
Corporation Application for Disposal
of Salt Water into The Wil-Mc Oil
Corp. New Mexico State "K"
Mescalero San Andres Field
Lea County, New Mexico

Dear Sir:

The undersigned, being an authorized representative operator, offsetting Wil-Mc Oil Corp.'s Lease, has been duly informed by Redfern Development Corporation of its intention to make application to dispose of produced salt water into the New Mexico State "K" No. 1 located on the Wil-Mc Oil Corp. lease in the Mescalero San Anres Field. The subject well is located 660 from the South line and 1980 from the East line of Section 11, Township 10-South, Range 32-East, Lea County, New Mexico.

This is to advise that we approve of their application and waive notice of hearing.

Date: 12-23-68

December 19, 1968

Chief Engineer
New Mexico Oil Conservation Commission
P. O. Box 2088
Santa Fe, New Mexico

Re: Waiver for Redfern Development
Corporation Application for Disposal
of Salt Water into The Wil-Mc Oil
Corp. New Mexico State "K"
Mescalero San Andres Field
Lea County, New Mexico

Dear Sir:

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\*69 JAN 6 AN 8 24

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December 19, 1968

Chief Engineer
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P. O. Box 2088
Santa Fe, New Mexico

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Corporation Application for Disposal
of Salt Water into The Wil-Mc Oil
Corp. New Mexico State "K"
Mescalero San Andres Field
Lea County, New Mexico

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This is to advise that we approve of their application and waive notice of hearing.

R. C. HANGS

BY:

Date:

168 Nec 23 AM S 515

December 19, 1968

Chief Engineer
New Mexico Oil Conservation Commission
P. O. Box 2088
Santa Fe, New Mexico

Re: Waiver for Redfern Development Corporation for Disposal of Salt Water into the Wil-Mc Oil Corp. New Mexico State "K", Mescalero San Andres Field Lea County, New Mexico

Dear Sir:

The undersigned, being the surface owner of the Wil-Mc Oil Corp. lease, has been duly informed by Redfern Development Corporation of its intention to make application to dispose of produced salt water into the New Mexico State "K" No. 1 located on the Wil-Mc Oil Corporation lease in the Mescalero San Andres Field, 660 from the south line and 1980 from the east line of Section 11, Township 10-South, Range 32-East, Lea County, New Mexico.

| John  | McGuffin, | Surface | Owner |
|-------|-----------|---------|-------|
| Date: |           |         |       |

63 DEC 23 AM & SS

December 19, 1968

Chief Engineer
New Mexico Oil Conservation Commission
P. O. Box 2088
Santa Fe, New Mexico

Re: Waiver for Redfern Development
Corporation Application for Disposal
of Salt Water into The Wil-Mc Oil
Corp. New Mexico State "K"
Mescalero San Andres Field
Lea County, New Mexico

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| MOR   | IL OIL CORPORATION |
|-------|--------------------|
| BY:   |                    |
|       |                    |
| Date: |                    |
| 2000. |                    |

\*68 DEC 23 \$M € \$

December 19, 1968

Chief Engineer
New Mexico Oil Conservation Commission
P. O. Box 2088
Santa Fe, New Mexico

Re: Waiver for Redfern Development
Corporation Application for Disposal
of Salt Water into The Wil-Mc Oil
Corp. New Mexico State "K"
Mescalero San Andres Field
Lea County, New Mexico

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| CITI  | ES SERVICE OIL COMPANY |
|-------|------------------------|
| BY:   |                        |
|       |                        |
| Date: |                        |
|       |                        |

December 19, 1968

Chief Engineer
New Mexico Oil Conservation Commission
P. O. Box 2088
Santa Fe, New Mexico

Re: Waiver for Redfern Development
Corporation Application for Disposal
of Salt Water into The Wil-Mc Oil
Corp. New Mexico State "K"
Mescalero San Andres Field
Lea County, New Mexico

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| AA 7 T**.     | - MC OIL CORPORATION |
|---------------|----------------------|
| BY:           |                      |
|               |                      |
| <b>75</b> - 4 |                      |
| Date:         |                      |

REDFERN DEVELOPMENT CORPORATION TO

WILCO BUILDING
MIDLAND, TEXAS 79701

7571 XOS SOLUTIO TROP

40767 SACO SIR

4818-8 LAUTUM SHORMALST

510 SACO ASSA

January 18, 1969

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IN REPLT REPER 10
PILE. 60/017L
Lea Co.

Car 46/3

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

Re: Permit to Dispose of Produced Water

Application to Dispose of Salt Water by
Injection into a Porous Formation Productive
of Oil or Gas.

The Wil-Mc Oil Corp. - New Mexico State "K"
Well No. 1 - 660 from S line and 1980 from E
line of Section 11, Township 10-S, Range 32-E,
Mescalero San Andres Field
Lea County, New Mexico

Gentlemen:

On December 19, 1968, we requested permission to dispose of lease produced water into the Mescalero San Andres Field, San Andres Formation interval 4042-4179, as defined by the Wil-Mc Oil Corp. N. M. State "K" No. 1.

Please advise us the status of our application. If there is any additional information required, please advise.

Yours very truly

Fred A. Skidmore, Jr.

Production Manager

FAS:lm

DEFORE THE

#### OIL CONSERVATION COMMISSION OF NEW MEXICO

Care 4013

APPLICATION OF REDFERN DEVELOPMENT CORPORATION AND WIL-MAC OIL CORPORATION FOR SALT WATER DISPOSAL, MESCALERO POOL, LEA COUNTY, NEW MEXICO

## APPLICATION

Come now REDFERN DEVELOPMENT CORPORATION and WIL-MAC OIL CORPORATION, and apply to the Oil Conservation Commission of New Mexico for approval of underground disposal of produced water in a producing formation, in the Mescalero-San Andres Pool, Lea County, New Mexico, and in support thereof would show the Commission:

- 1. Applicants propose to complete the Wil-Mac State Well No. 1-K, located 660 feet from the South line, and 1980 feet from the East line of Section 11, Township 10 South, Range 32 East, N.M.P.M., Lea County, New Mexico, for disposal of produced water in the interval from 4200 to 4300 feet, in the San Andres formation.
- 2. The San Andres is a producing formation in the vicinity of the subject well, and therefore the disposal system requires a hearing before the Commission or the Commission's duly appointed examiner.
- 3. Applicants propose to dispose of produced water through tubing, under a packer, with continuous use of coupons for the purpose of determining if corrosion is occurring or apt to occur, or, in the alternative, to complete said well as directed by the Commission.
- 4. The water to be disposed of at the present time is produced from the San Andres pool, and approximately 100 barrels

DOCKET MARKED

12-17-68

per day will be disposed of initially. It is further proposed to utilize said well for water disposal from other wells in the vicinity in the future.

WHEREFORE, applicants pray that this application be set for hearing before the Commission or the Commission's duly appointed examiner, and after notice and hearing as required by law the Commission enter its order approving the disposal system as prayed for.

Respectfully submitted,

REDFERN DEVELOPMENT CORPORATION WIL-MAC OIL CORPORATION

W. Kellahin

Post Office Box 1769 Santa Fe, New Mexico

ATTORNEYS FOR APPLICANTS

## REDFERN DEVELOPMENT CORPORATION

WILCO BUILDING MIDLAND, TEXAS 79701

POST OFFICE BOX 1747

ZIP CODE 79701

IZLEPHONE MUTUAL 3-5184

AREA CODE 915

December 19, 1968

in REPLY REFER TO

FILE 60/017L

Lea Co.

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Ox 4013

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

Re: Permit to Dispose of Produced Water
Application to Dispose of Salt Water by
Injection into a Porous Formation Productive
of Oil or Gas.

The Wil-Mc Oil Corp.-New Mexico State
Well No. 1 - 660 from S line and 1980 from E
Line, Section 11, Township 10-S, Range 32-E,
Mescalero San Andres Field
Lea County, New Mexico

## Gentlemen:

We request permission to dispose of lease produced water into the Mescalero San Andres Field, San Andres Formation interval 4042-4179, as defined by the Wil-Mc Oil Corp. N. M. State "K" No. 1. This well is currently uneconomical and temporarily shut-in. It is our intention to re-enter the well and inject produced water through tubing below a packer into the interval from 4042-4179. We have included the following:

- 1. From C-108 "Application to Dispose of Salt Water By Injection into a Porous Formation".
- 2. Log on the N. M. State "K" with injection interval marked.
- 3. Plat of Area.
- 4. Copy of Waiver to offset operators
- 5. Copy of Waiver to surface owner.
- 6. Diagrammatic sketch of well.

DOCKET MAILED

Dela

New Mexico Oil Conservation Commission

December 19, 1968

If any additional information is required, please advise us.

Yours very truly,

FAS:lm

Enc

Fred A. Skidmore, Jr.

Production Manager

## NEW MEXICO OIL CONSERVATION COMMISSION

Ca4013

## APPLICATION TO DISPOSE OF SALT WATER BY INJECTION: INTO A POROUS FORMATION

| OPERATOR                                                                                                       |                                        |                      | ADDRESS                    | က္                     |                   |                                                                       |
|----------------------------------------------------------------------------------------------------------------|----------------------------------------|----------------------|----------------------------|------------------------|-------------------|-----------------------------------------------------------------------|
| REDFERN DEVELOPMENT C                                                                                          | ORPORATION                             | <b>*</b>             | P. O.                      | BOX 1747               | , MIDLAND,        | TEXAS 79701                                                           |
| LEASE NAME                                                                                                     |                                        | WELL NO.             | FIELD                      | Ed                     |                   | COUNTY                                                                |
| NEW MEXICO STATE "K"                                                                                           |                                        | 1                    | MESCALI                    | RO SAN A               | NDR <b>ES</b>     | LEA                                                                   |
| LOCATION                                                                                                       |                                        |                      | - 3                        | 37                     |                   |                                                                       |
| UNIT LETTER                                                                                                    | 0 ; we                                 | ELL IS LOCATED       | 60 FEET FR                 | OM THE SO              | uth LINE AN       | D 1980 FEET FROM THE                                                  |
| east Line, SECTION 11                                                                                          | - тох                                  | YNSHIP 10South       | L RANGE 32 E               | ast NMPM.              |                   |                                                                       |
|                                                                                                                |                                        | CASING               | AND TUBING DAT             | Α                      |                   |                                                                       |
| NAME OF STRING                                                                                                 | SIZE                                   | SETTING DEPTH        | SACKS CEMER                | ¥T 10                  | P OF CEMENT       | TOP DETERMINED BY                                                     |
| SURFACE CASING                                                                                                 | 13 3/8                                 | 359                  | 365                        |                        | circ.             | -                                                                     |
| INTERMEDIATE                                                                                                   | 8 5/8                                  | 3480                 | 2800                       |                        | circ.             | Calc-est.                                                             |
| LONG STRING                                                                                                    | 10                                     | 10.000               | 500                        |                        | 24.00             |                                                                       |
| TUBING                                                                                                         | 5 1/2                                  | 10,270               | 500<br>NAME, MODEL AND D   | EPTH OF TUBING         | 7400              | Calc.                                                                 |
| Į<br>Į                                                                                                         | 2 3/8                                  | 3950                 |                            | retricui               |                   |                                                                       |
| NAME OF PROPOSED INJECTION FORMAT                                                                              |                                        | 4                    | TOP OF FORM                | ATION                  | aor               | OM OF FORMATION                                                       |
| SAN ANDRES                                                                                                     |                                        | Today - Co           | 3400'                      |                        |                   | 4400 est.                                                             |
| IS INJECTION THROUGH TUBING, CASING                                                                            | OR ANNULUS?                            |                      |                            |                        |                   |                                                                       |
| Tubing IS THIS A NEW WELL DRILLED FOR DISPOSAL?                                                                | IF ANSWER IS                           | NO. FOR WHAT PURPO   |                            | 4042 to                |                   | WELL EVER BEEN PERFORATED IN ANY.<br>E OTHER THAN THE PROPOSED INJEC- |
|                                                                                                                | ma hand                                | t the Domenia        |                            |                        | ZONI              | ZONE?                                                                 |
| NO LIST ALL SUCH PERFORATED INTERVALS                                                                          | AND SACKS OF CE                        | MENT USED TO SEAL O  | II<br>OFF OR SQUEEZE EACH  | (                      |                   | Yes                                                                   |
| 355 plus 8750-8430,                                                                                            | Perf. 4397                             | -98 sa. 2 W/         | 275 sx., 41                | 37 <b>-</b> 38 sa.     | 2 100 sx.         | 4039-40 sq. w/40sw.                                                   |
| DEPTH OF BOTTOM OF DEEPEST<br>FRESH WATER ZONE IN THIS AREA                                                    | <u> </u>                               | DEPTH OF BOTTOM OF   | F NEXT HIGHER<br>THIS AREA | 1                      | DEPTH OF TOP OF N | EXT LOWER                                                             |
| 1500                                                                                                           |                                        | 8900-89              | 950                        |                        | 8900-             | 8950                                                                  |
| ANTICIPATED DAILY MINIMUM INJECTION VOLUME   (BBLS.) 500   100                                                 | I MAXIMUM                              | OPEN OR CLOS         | ED TYPE SYSTEM             | IS INJECTION PRESSURE? | TO BE BY GRAVITY  |                                                                       |
| 500   100                                                                                                      | <u> </u>                               | Clos                 |                            | Press                  |                   | 2000                                                                  |
| ANSWER YES OR NO WHETHER THE FOLL<br>ERALIZED TO SUCH A DEGREE AS TO BE<br>STOCK, IRRIGATION, OR OTHER GENERAL | UNFIT FOR DOMES                        | E MIN- WATER         |                            | SAL ZONE               |                   | WATER ANALYSES ATTACHED?                                              |
| NAME AND ADDRESS OF SURFACE OWNER                                                                              | 169                                    |                      | Yes                        | <u>_</u>               | es                | No                                                                    |
| McGuffin - Tatum,                                                                                              | New Mexico                             |                      |                            |                        |                   |                                                                       |
| LIST NAMES AND ADDRESSES OF ALL OF                                                                             |                                        | ONE-HALF ( ) MILE OF | THIS INJECTION WEL         | L                      |                   |                                                                       |
| SEE ATTACHED                                                                                                   |                                        |                      |                            |                        |                   |                                                                       |
|                                                                                                                |                                        |                      | <u>, </u>                  |                        |                   |                                                                       |
|                                                                                                                |                                        |                      |                            |                        |                   |                                                                       |
|                                                                                                                |                                        |                      |                            |                        |                   |                                                                       |
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|                                                                                                                |                                        |                      |                            |                        |                   | :                                                                     |
| HAVE COPIES OF THIS APPLICATION BES                                                                            | N SURFACE OWN                          | VER                  | EACH OPERAT                | OR WITHIN ONE-         | HALF MILE THE     | NEW MEXICO STATE ENGINEER                                             |
| SENT TO EACH OF THE FOLLOWING?  Yes                                                                            | 12-19                                  |                      | OF THIS WELL               | 12-19-6                | _ 1               | 12-19-68                                                              |
| ARE THE FOLLOWING ITEMS ATTACHED                                                                               | 1                                      |                      | ELECTRICAL                 |                        |                   | RAMMATIC SKETCH OF WELL                                               |
| THIS APPLICATION (SEE RULE 701-8)                                                                              | Yes                                    |                      | Ye                         | :S                     | 1<br>1            | Yes                                                                   |
| I hereby con                                                                                                   |                                        | formation above is   | true and complete          | to the hest            | of my knewledge   | and belief.                                                           |
| i meneral cen                                                                                                  | ,                                      |                      | The same complete          |                        | , rreage          | =                                                                     |

| (A = el)         |                    |                   |
|------------------|--------------------|-------------------|
| Freda Statemanto | Production Manager | December 19, 1968 |
| (Signature)      | (Title)            | (Date)            |

NOTE: Should waivers from the State Engineer, the surface owner, and all operators within one-half mile of the proposed injection well.

not accompany this application, the New Mexico Oil Conservation Commission will hold the application for a period of 15 days from the date of receipt by the Commission's Santa Fe office. If at the end of the 15-day waiting period no protest has been received by the Santa Fe office, the application will be processed. If a protest is received, the application will be set for hearing, if the applicant so requests. SEE RULE 701.

<sup>\*</sup> Wil-Mc Oil Corporation is the owner of this well, but Redfern Development will act as Operator

# NEW MEXICO OIL CONSERVATION COMMISSION

Ca

APPLICATION TO DISPOSE OF SALT WATER BY INJECTION INTO A POROUS FORMATION 40/3

| RATOR                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  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| PERSON DEVELOPMENT CO                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          | RPORATION                                                                                                                                              | WELL NO.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       | P. C                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | . 24X 17                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       | 47, NIKA                    | ID, TXX                                                                | 19701<br>- COUNTY                                                         |                |
| WHITICO STATE "K"                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      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| ION                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    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| UNIT LETTER                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            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                                                                                                                                                                                                                                                                                                                                                     | south ,                     | LINE AND                                                               | 1980 FEE                                                                  | T FROM         |
| eset LINE, SECTION 11                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  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| CASE LINE, SECTION 11                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  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| ALL SUCH PERFORATED INTERVALS  ALL SUCH PERFORATED INTERVALS  ATTENDATION OF DEEPENT H WATER ZONE IN THIS AREA                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         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DEPTH OF TO OIL OR GAS | SE, 403 DP OF NEXT L ZONE IN THIS                                      | Yes<br>19-40 sq. W                                                        |                |
| ALL SUCH PERFORATED INTERVALS  ALL SUCH PERFORATED INTERVALS  A OF BOTTOM OF DEEPEST H WATER ZONE IN THIS AREA  CIPATED DAILY   MINIMUM TION VO.UME                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            | TO KOSE AND SACKS OF CE                                                                                                                                | DEPTH OF BOTTOM COLL OR GAS ZONE IN                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            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W<br>OWER<br>AREA<br>APPROX. PRESSUR                            | /40e           |
| ALL SUCH PERFORATED INTERVALS  ALL SUCH PERFORATED INTERVALS  A OF BOTTOM OF DEEPEST H WATER ZONE IN THIS AREA  EIRATED DAILY MINIMUM TION VO.UME  5.1  500 100                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        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W<br>OWER<br>AREA<br>APPROX. PRESSUR<br>2000             | / <b>40e</b> t |
| ALL SUCH PERFORATED INTERVALS  ALL SUCH PERFORATED INTERVALS  A PROTOM OF DEEPEST H WATER ZONE IN THIS AREA  LIPATED DAILY MINIMUM  SLID TO THE STATE OF THE FOLLO  FER YES OR NO WHETHER THE FOLLO  FIZED TO SUCH A DEGREE AS TO BE IT                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                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W<br>OWER<br>AREA<br>APPROX. PRESSUR<br>2000                    | / <b>40s</b> 1 |
| ALL SUCH PERFORATED INTERVALS  ALL SUCH PERFORATED INTERVALS  B PLUS 8750-8430, PLUS 8750-8430 | TO ROSE AND SACKS OF CE WAS A 197- MAXISUM SOO DWING WATERS AR UNEIT FOR DOMES USE                                                                     | DEPTH OF BOTTOM COLL OR GAS ZONE IN SPEN OR CLO                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | OFF OR SQUEEZE E  OFF OR SQUEEZE E  OF NEXT HIGHER N THIS AREA  DEED TYPE SYSTEM  OF NEXT HIGHER  OF NEXT HIGH | IS INJECT PRESSURE                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | DEPTH OF TO OIL OR GAS      | SX, 403 DP OF NEXT L ZONE IN THIS OO-8950 AVITY OR                     | Yes<br>19-40 sq. W<br>OWER<br>AREA<br>APPROX. PRESSUR<br>2000             | / <b>40e</b> t |
| ALL SUCH PERFORATED INTERVALS  ALL SUCH PERFORATED INTERVALS  ATTOM OF DEEPEST H WATER ZONE IN THIS AREA  CIPATED DAILY I MINIMUM STON TO JUME 1 S.)  SOO 100  IER YES OR NO WHETHER THE FOLIOR TO SUCH A DEGREE AS TO BE IN K, IRRIGATION, OR OTHER GENERAL  AND ADDRESS OF SURFACE OWNER                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     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| ALL SUCH PERFORATED INTERVALS  IPATED DAILY I MINIMUM  TION YO. UME  S.)  500  100  ER YES OR NO WHETHER THE FOLLO IZED TO SUCH A DEGREE AS TO BE IN K, IRRIGATION, OR OTHER GENERAL  AND ADDRESS OF SURFACE OWNER  CALIFITA  TATUS, TO                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            | MAXIMUM  SOO  DWING WATERS AR UNFIT FOR DOMES  USE 108  (OR LESSEE, IF S                                                                               | DEVICE LA PURPLE DE LA PURPLE D | OFF OR SQUEEZE E  OF NEXT HIGHER  OF NEXT HIGH | IS INJECT PRESSURE                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | DEPTH OF TO OIL OR GAS      | SX, 403 DP OF NEXT L ZONE IN THIS OO-8950 AVITY OR                     | 19-40 Sq. W<br>OWER<br>AREA<br>APPROX. PRESSUR<br>2000                    | / <b>40e</b> t |
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| ALL SUCH PERFORATED INTERVALS  | MAXIMUM  SOO  DWING WATERS AR UNFIT FOR DOMES  USE 108  (OR LESSEE, IF S                                                                               | DEVICE LA PURPLE DE LA PURPLE D | OFF OR SQUEEZE E  OF NEXT HIGHER  OF NEXT HIGH | IS INJECT PRESSURE                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | DEPTH OF TO OIL OR GAS      | SX, 403 DP OF NEXT L ZONE IN THIS OO-8950 AVITY OR                     | 19-40 Sq. W<br>OWER<br>AREA<br>APPROX. PRESSUR<br>2000                    | / <b>40e</b> t |
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| ALL SUCH PERFORATED INTERVALS  ALL SUCH PERFORATED INTERVALS  A OF BOTTOM OF BEEPEST H WATER ZONE IN THIS AREA  EIRATED DAILY   MINIMUM TION VO.UME    SOO   100  TEA YES OR NO WHETHER THE FOLLO TEAD TO SUCH A DEGREE AS TO BE INTERVALS  K, IRRIGATION, OR OTHER GENERAL  AND ADDRESS OF SURFACE OWNER  CASES AND ADDRESSES OF ALL OPI                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      | MAXIMUM  SOO  DWING WATERS AR UNFIT FOR DOMES  USE 108  (OR LESSEE, IF S                                                                               | DEVICE LA PURPLE DE LA PURPLE D | OFF OR SQUEEZE E  OF NEXT HIGHER  OF NEXT HIGH | IS INJECT PRESSURE                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | DEPTH OF TO OIL OR GAS      | SX, 403 DP OF NEXT L ZONE IN THIS OO-8950 AVITY OR                     | 19-40 Sq. W<br>OWER<br>AREA<br>APPROX. PRESSUR<br>2000                    | / <b>40e</b> t |
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| ALL SUCH PERFORATED INTERVALS  ALL SUCH PERFORATED INTERVALS  IN OF BOTTOM OF DEEPEST SH WATER ZONE IN THIS AREA  ICIPATED DAILY   MINIMUM   MINIM | MAXIMUM  SOO  DIVING WATERS AR UNFIT FOR DOMES  USE TOO  (OR LESSEE, IF S  EN HERICO  ERATORS WITHIN O                                                 | DEPTH OF BOTTOM COLL OR GAS ZONE IN SPEN OR CLO CIO                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      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WOWER AREA  APPROX. PRESSUR:  2000  R ANALYSES ATTAC  NO          | /40er          |
| TALL SUCH PERFORATED INTERVALS  THE OF BOTTOM OF DEEPEST SH WATER ZONE IN THIS AREA  ICIPATED DAILY   MINIMUM CATION SUCH A DEGREE AS TO BE LIZED TO SUCH A DEGREE AS TO BE CALLED TO SUCH AS TO SUCH  | MAXIMUM  SOO  DIVING WATERS AR UNFIT FOR DOMES  USE TOO  (OR LESSEE, IF S  EN HERICO  ERATORS WITHIN O                                                 | S NO. FOR WHAT PURP  THE PROPERTY OF SEAL  OBJECT OF BOTTOM COLL OR GAS ZONE IN  SPEN OR CLO  CIO  RE MIN- STIC.  STATE OR FEDERAL LA  ONE-HALF (1) MILE O                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     | OFF OR SQUEEZE E  OFF OR SQUEE | IS INJECT PRESSURE THE SAL ZONE                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | DEPTH OF YOUR ONE-HALF MILE | SE. 403 DP OF NEXT L ZONE IN THIS DO - 8950 AVITY OR ARE WATER         | P-40 Sq. W<br>OWER<br>AREA<br>APPROX. PRESSUR<br>2000<br>R ANALYSES ATTAC | /40er          |
| TALL SUCH PERFORATED INTERVALS  THE STATE STATE INTERVALS  THE STATE STATE INTERVALS  THE PROTTOM OF DEEPEST SH WATER ZONE IN THIS AREA  ICIPATED SAILY   MINIMUM (S.)   500   100    WER YES OR NO WHETHER THE FOLIC (LIZED TO SUCH A DEGREE AS TO BE INC.) (CK, IRRIGATION, OR OTHER GENERAL INTERVALS OF SURFACE OWNER IN AMES AND ADDRESSES OF ALL OF STATE STATE OF SURFACE OWNER IN THE SAIL OWNE | TO KORE AND SACKS OF CE  ATT. 4397-  I MAXIMUM  SOO  OWING WATERS AR UNET FOR DOMES  USE YOU  (OR LESSEE, IF S  LEW MAZICO  ERATORS WITHIN OR  1 12-19 | DEPTH OF BOTTOM COLL OR GAS ZONE IN B900-8  CTATE OR FEDERAL LA  ONE-HALF ( ) MILE O                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | OF OF SQUEEZE E  OF NEXT HIGHER  OF NEXT HIGHER  OF NEXT HIGHER  OF THIS AREA  SEE  AND)  OF THIS INJECTION  FRACH OFF                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         | IS INJECT PRESSURE PR | DEPTH OF YOUR ONE-HALF MILE | SE, 403 DP OF NEXT L ZONE IN THIS DO—8950 AVITY OR ARE WATER THE NEW N | PAD SQ. WOWER AREA  APPROX. PRESSUR:  2000  R ANALYSES ATTAC  NO          | /40ex          |

| The Golfmany | Production Hanager                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | December 19, 1968 |
|--------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| (Signature)  | (Title)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | (Date)            |
|              | The second secon |                   |

NOTE: Should waivers from the State Engineer, the surface owher, and all operators within one-half mile of the proposed injection well.

not accompany this application, the New Mexico Oil Conservation Commission will hold the application for a period of 15 days

from the date of receipt by the Commission's Santa Fr office. If at the end of the 15-day waiting period no protest has been received by the Santa Fe office, the application will be processed. If a protest is received, the application will be set for hearing,

if the applicant so requests. See Rule 701.

\* Wil-Mc Oil Corporation is the owner of this well, but Redfern Development will act as Operator

## NEW MEXICO OIL CONSERVATION COMMISSION

OPERATOR

APPLICATION TO DISPOSE OF SALT WATER BY INTECTION INTO A POROUS FORMATION 40/3

ADDRES

| EDERN DEVELOPMENT                                                                                                          | CORPORATION              | WELL NO.               | FIELD C         | . BOX 1747, HID                              | LAND, TRY               | AS 79701                                         |
|----------------------------------------------------------------------------------------------------------------------------|--------------------------|------------------------|-----------------|----------------------------------------------|-------------------------|--------------------------------------------------|
| EV MEXICO STATE "K"                                                                                                        | 1                        | 1 MESCALERO SAN ANDRES |                 |                                              | LRA                     |                                                  |
| CATION                                                                                                                     |                          | * Ç                    |                 |                                              |                         |                                                  |
| UNIT LETTER                                                                                                                | ; we                     | LL IS LOCATED          | 50 FEET         | FROM THE SOUTH                               | LINE AND                | 1980 FEEL FROM TO                                |
| east LINE, SECTION 1                                                                                                       | 1 100                    |                        | RANGE 32        |                                              |                         |                                                  |
| NAME OF STRING                                                                                                             | SIZE                     | CASING A               | SACKS CEN       |                                              | FLIENT                  | TOP DETERMINED BY                                |
| RFACE CASING                                                                                                               |                          | 3211111                |                 |                                              |                         | TOP SETERMINES BY                                |
|                                                                                                                            | 13 3/8                   | 359                    | 365             | circ                                         |                         |                                                  |
| ERMEDIATE                                                                                                                  |                          | 3490                   | 2800            | 2470                                         |                         | Calazas                                          |
| GSTRING                                                                                                                    | 8 5/8                    | 3480                   | 2000            | circ                                         | -                       | Calc-est.                                        |
|                                                                                                                            | 5 1/2                    | 10,270                 | 500             | 7400                                         | )                       | Calc.                                            |
| ING                                                                                                                        | 2 2/0                    |                        |                 | DEPTH OF TUBING PACKER                       | Lun                     |                                                  |
| E OF PROPOSED INJECTION FORMAT                                                                                             | 2 3/8                    | 3950                   | TOP OF FO       | " retricuible p                              | BOTTOM O                | FORMATION                                        |
| AN ANDRES                                                                                                                  |                          |                        | 3400            | 'est.                                        |                         | 4400 est.                                        |
| NJECTION THROUGH TUBING, CASING                                                                                            | GOR ANNULUS?             | PERFORATIONS           | OR OPEN HOLE!   | PROPOSED INTERVAL(S) OF                      | INJECTION               |                                                  |
| TUBING THIS A NEW WELL DRILLED FOR POSAL?                                                                                  | IF ANSWER IS             | NO, FOR WHAT PURPOSE   | WAS WELL ORIG   | 4042 to 4179                                 | HAS WELL                | EVER BEEN PERFORATED IN A                        |
| Yo                                                                                                                         | To tes                   | t the Devonis          | r               |                                              | TION ZONE               | Yes                                              |
| TH OF BOTTOM OF DEEPEST SH WATER ZONE IN THIS AREA 1500 ICIPATED DAILY   MINIMUM ISS.) 500   100                           | 500                      | 8900-89                | SO TYPE SYSTEM  | IS INJECTION TO BE BY PRESSURE? Pressure     | 8900-8950<br>GRAVITY OR | APPROX. PRESSURE (PSI)  2000                     |
| WER YES OR NO WHETHER THE FOLI<br>LIZED TO SUCH A DEGREE AS TO BE<br>CK, IRRIGATION, OR OTHER GENERA                       | E UNFIT FOR DOMES        | TIC.                   | TO BE DISPOSED  | OF INSTURAL WATER IN DIS<br>SAL ZONE<br>Tes  | PC- ARE WATE            | NALYSES ATTACHED?                                |
| CGUFFIN - Tatum, T NAMES AND ADDRESSES OF ALL O SEE ATTACHED                                                               |                          | ONE-HALF ( ) MILE OF T | MIS INJECTION W | SEL                                          |                         |                                                  |
|                                                                                                                            |                          |                        |                 |                                              |                         |                                                  |
| TE COPIES OF THIS APPLICATION AE TO EACH OF THE FOLLOWING?  THE FOLLOWING ITEMS ATTACKED IN APPLICATION (SEE BUL F 701-B). | 12-19                    | -68                    | EACH OPER       | 12-19-68                                     | 1                       | EXICO STATE ENGINEER 2-19-68 ATIC SKETCH OF WELL |
| IT TO EACH OF THE FOLLOWING?  Yes THE FOLLOWING ITEMS ATTACHED                                                             | 12-19                    | -68                    | OF THIS W       | 12-19-68                                     | 1                       | 2-19-68                                          |
| T TO EACH OF THE FOLLOWING? YES THE FOLLOWING ITEMS ATTACHED IS APPLICATION (SEE RULE 701-B)                               | 12-19 TO PLAT OF ARE YES | -68                    | ELECTRICA       | 12-19-68                                     | DIAGRAMM                | 2-19-68<br>ATIC SKETCH OF WELL<br>Yes            |
| T TO EACH OF THE FOLLOWING? YES THE FOLLOWING ITEMS ATTACHED S APPLICATION (SEE RULE 701-B)                                | 12-19 TO PLAT OF ARE YES | ormation above is tr   | ELECTRICA       | 12-19-68 It tos Yes tte to the best of my kn | DIAGRAMM                | 2-19-68<br>ATIC SKETCH OF WELL<br>Yes            |

NOTE: Should waivers from the State Engineer, the surface owher, and all operators within one-half mile of the proposed injection well.

not accompany this application, the New Mexico Oil Conservation Commission will hold the application for a period of 15 days
from the date of receipt by the Commission's Santa Fe office. If at the end of the 15-day waiting period no protest has been received by the Santa Fe office, the application will be processed. If a protest is received, the application will be set for hearing,
if the applicant so requests. See Rule 701.

<sup>\*</sup> Wil-Mc Oil Corporation is the owner of this well, but Redfern Development will act as Operator

GMH/esr

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

| •   |                                                                                                                                                                                                                 |
|-----|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|     | IN THE MATTER OF THE HEARING CALLED BY THE DIL CONSERVATION COMMISSION OF NEW MEXICO FOR THE PURPOSE OF CONSIDERING:                                                                                            |
| vnd | Sald Order No. R-                                                                                                                                                                                               |
| ØM. | APPLICATION OF REDFERN DEVELOPMENT CORPORATION AND WIL-MC OIL CORPORATION FOR SALT WATER DISPOSAL, LEA COUNTY, NEW MEXICO.                                                                                      |
|     | ORDER OF THE COMMISSION                                                                                                                                                                                         |
|     | BY THE COMMISSION:                                                                                                                                                                                              |
| ٠   | This cause came on for hearing at 9 a.m. on January , 1969 at Santa Fe, New Mexico, before Examiner Daniel S. Nutber                                                                                            |
|     | NOW, on this <u>day of January</u> , 1969, the Commission, quorum being present, 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 Commission has jurisdiction of this cause and the subject matter thereof.                                                                  |
|     | Redfern Development Corporation (2) That the applicants, and Wil-Mc Oil Corporation,                                                                                                                            |
| ć   | are yy the ownersand operators of the Wil-Mc State "K" Well No. 1                                                                                                                                               |
|     | located in Unit O of Section 11, Township 10 South, Range                                                                                                                                                       |
|     | 32 East, NMPM, Mescalero-San Andres Pool , Lea                                                                                                                                                                  |
|     | County, New Mexico.                                                                                                                                                                                             |
|     | (3) That the applicantsproposes to utilize said well to                                                                                                                                                         |
|     | dispose of produced salt water into theSan Andres                                                                                                                                                               |
|     | formation, with injection into the periodic interval                                                                                                                                                            |
|     | from approximately 4042 feet to 4179 feet.                                                                                                                                                                      |
|     | (4) That the injection should be accomplished through                                                                                                                                                           |
|     | 278 -inch plastic-lined tubing installed in a packer set at                                                                                                                                                     |

approximately feet; that the casing-tubing annulus should be filled with an inert fluid; and that a pressure gauge should be attached to the annulus or the annulus left open at the surface in order to determine leakage in the casing, tubing, or packer.

(5) 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:

Redfern Development Corporation
(1) That the applicants, and Wil-Mc Oil Corporation

are
is/hereby authorized to utilize its the Wil-Mc State "K" Well No. 1,

located in Unit O of Section 11, Township 10 South, Range

32 East, NMPM, Mescalero-San Andres Pool, Lea

County, New Mexico, to dispose of produced salt water into the

San Andres formation, injection to be accomplished through

interval

from approximately 4042 feet to 4179 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 left open at the surface in order to determine leakage in the casing, tubing, or packer.

- (2) That the applicants shall submit monthly reports of /// the disposal operations in accordance with Rules 704 and 1120 of the Commission Rules and Regulations.
- (3) That jurisdiction of this cause is retained for the entry of such further orders as the Commission may deem necessary.

DONE at Santa Pe. New Mexico, on the day and year temeinables designated.