

STATE OF NEW MEXICO

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

October 7, 1989

GARREY CARRUTHERS
GOVERNOR

Hondo Oil & Gas Company
Box 2208
Roswell, New Mexico 88202

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

Attention: Ron Brown

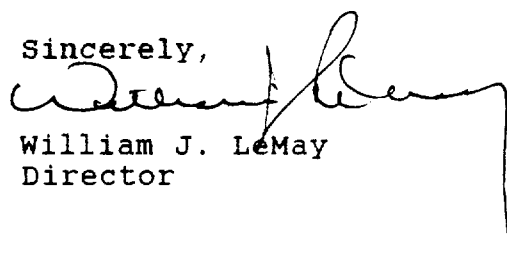
Dear Mr. Brown:

Reference is made to your request dated September 13 and 21, 1989, to reactivate the injection status on the H.E. West "A" Well Nos. 8 and 9 located respectively 1980 feet from the North line and 660 feet from the West line (Unit E) of Section 3 and 1980 feet from the South line and 660 feet from the East line (Unit I) of Section 4, both in Township 17 South, Range 31 East, NMPM, Eddy County, New Mexico. It is our understanding that both of these wells were previously approved for injection by Division Order No. R-2268, dated June 21, 1962, for use as water injection wells within the Keel West Waterflood Project, but have subsequently been plugged and abandoned. It appears that sufficient information has been provided and that both wells qualify for injection.

You are therefore authorized to utilize the H.E. West Well Nos. 8 and 9, as described above, to inject water into the Grayburg/San Andres formation, Keel West Waterflood Project, subject to the following conditions:

1. The casing in each of the subject wells shall be pressure tested from the surface to the proposed packer setting depth to assure the integrity of such casing.
2. Both of the subject wells shall be limited to a maximum surface injection pressure not to exceed 672 psi.
3. The applicant shall notify the supervisor of the Division's Artesia district office of the date and time of installation of injection equipment and of the mechanical integrity test in order that the same may be witnessed.
4. The subject wells shall be equipped and operated in accordance with Division Rule Nos. 702-706.

Sincerely,



William J. LeMay
Director

xc: OCD-Artesia
T. Gallegos, Case File-2576

Hondo Oil & Gas Company

P.O. 2206
Roswell, New Mexico 88201
(505)625-8700

RECEIVED

SEP 15 1989

OIL CONSERVATION DIV.
SANTA FE



September 13, 1989

Oil Conservation Division
P. O. Box 2088
Santa Fe, NM 87501

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 8
1980' FNL & 660' FWL, Section 3, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

Please find enclosed Hondo Oil & Gas Company's application for permit to convert the above captioned well into a water injection well.

Copies have been submitted to the surface owner, the offset operators and the NMOCD district office in Artesia.

If you should have any questions, please contact Ron Brown at (505)625-6735.

Sincerely,



Lisa Bohannon
Engineering Technician

Encl.

Hondo Oil & Gas Company

Box 2208
Roswell, New Mexico 88202
(505)625-8700



September 13, 1989

Bureau of Land Management
P. O. Box 1778
Carlsbad, NM 88220

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 8
1980' FNL & 660' FWL, Section 3, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

According to the Oil Conservation Division Rule 701, a copy of any injection well permit application must be sent to the offset operators and surface owner. Enclosed is a copy of our application for administrative approval to convert the above captioned well to a water injection well.

If you should have any questions, please contact Ron Brown at (505)625-6735.

Sincerely,

A handwritten signature in cursive script that reads "Lisa Bohannon".

Lisa Bohannon
Engineering Technician

Encl.

Hondo Oil & Gas Company

Box 2208
Roswell, New Mexico 88202
(505)625-8700



September 13, 1989

Yates Petroleum Corp.
105 S. 4th St.
Artesia, NM 88210

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 8
1980' FNL & 660' FWL, Section 3, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

According to the Oil Conservation Division Rule 701, a copy of any injection well permit must be sent to the offset operators and surface owner. Enclosed is our application for administrative approval to convert the above captioned well to a water injection well.

If you should have any questions, please contact Ron Brown at (505)625-6735.

Sincerely,

A handwritten signature in black ink that reads 'Lisa Bohannon'. The signature is written in a cursive, flowing style.

Lisa Bohannon
Engineering Technician

Encl.

APPLICATION FOR AUTHORIZATION TO INJECT

- I. Purpose: ☒ Secondary Recovery ☐ Pressure Maintenance ☐ Disposal ☐ Storage
Application qualifies for administrative approval? ☒ yes ☐ no
- II. Operator: Hondo Oil & Gas Company
Address: P. O. Box 2208, Roswell, NM 88202
Contact party: Ron Brown Phone: (505)625-6735
- III. Well data: Complete the data required on the reverse side of this form for each well proposed for injection. Additional sheets may be attached if necessary.
- IV. Is this an expansion of an existing project? ☒ yes ☐ no
If yes, give the Division order number authorizing the project R-2268 & WFX-585.
- V. Attach a map that identifies all wells and leases within two miles of any proposed injection well with a one-half mile radius circle drawn around each proposed injection well. This circle identifies the well's area of review.
- * VI. Attach a tabulation of data on all wells of public record within the area of review which penetrate the proposed injection zone. Such data shall include a description of each well's type, construction, date drilled, location, depth, record of completion, and a schematic of any plugged well illustrating all plugging detail.
- VII. Attach data on the proposed operation, including:
1. Proposed average and maximum daily rate and volume of fluids to be injected;
 2. Whether the system is open or closed;
 3. Proposed average and maximum injection pressure;
 4. Sources and an appropriate analysis of injection fluid and compatibility with the receiving formation if other than reinjected produced water; and
 5. If injection is for disposal purposes into a zone not productive of oil or gas at or within one mile of the proposed well, attach a chemical analysis of the disposal zone formation water (may be measured or inferred from existing literature, studies, nearby wells, etc.).
- *VIII. Attach appropriate geological data on the injection zone including appropriate lithologic detail, geological name, thickness, and depth. Give the geologic name, and depth to bottom of all underground sources of drinking water (aquifers containing waters with total dissolved solids concentrations of 10,000 mg/l or less) overlying the proposed injection zone as well as any such source known to be immediately underlying the injection interval.
- IX. Describe the proposed stimulation program, if any.
- * X. Attach appropriate logging and test data on the well. (If well logs have been filed with the Division they need not be resubmitted.)
- * XI. Attach a chemical analysis of fresh water from two or more fresh water wells (if available and producing) within one mile of any injection or disposal well showing location of wells and dates samples were taken.
- XII. Applicants for disposal wells must make an affirmative statement that they have examined available geologic and engineering data and find no evidence of open faults or any other hydrologic connection between the disposal zone and any underground source of drinking water.
- XIII. Applicants must complete the "Proof of Notice" section on the reverse side of this form.
- XIV. Certification
- I hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.
- Name: Ron Brown Title: Petroleum Engineer
Signature: *Ron Brown* Date: 9/13/89
- * If the information required under Sections VI, VIII, X, and XI above has been previously submitted, it need not be duplicated and resubmitted. Please show the date and circumstance of the earlier submittal. Copies of current well logs are attached.

III. WELL DATA

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

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

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

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

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

XIV. PROOF OF NOTICE

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

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

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

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

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

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL #8

ITEM:

III. Well Data

- A. (1) Well Name: H. E. West "A" #8
1980' FNL & 660' FWL
Section 3, T17S, R31E
Eddy County, New Mexico
- (2) Casing Data: (Also see Exhibit "B".)
- Surface Casing:
8 5/8" set @ 769', cemented with 100 sx.
- Production Casing:
5 1/2" set @ 3246', cemented with 200 sx., TOC @
2093' (CBL)
- Liners:
4" set from 2985-3902', circulated 75 sx. cement
2 3/8" set from 3022-3901'
1 jt. 1" drill pipe @ 3810'
- (3) Injection Tubing:
2 3/8", 4.7#, 8rd EUE, plastic coated tubing set @
±2975'.
- (4) Packer:
Packer set @ ±2975'.
- B. (1) Injection Formation:
The injection formation will be the Grayburg San Andres.
- (2) Injection Interval:
The injection interval is to be from perforations @ 3360-
3795'.
- (3) Original Purpose of Well:
This well was originally drilled, completed and tested in
the Grayburg San Andres as a producer from the OH interval
3246-3404'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
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- (4) Added Perforated Intervals: (Also see Exhibit "B".)
This well was deepened to 3901' and used as an injector through the OH interval 3246-3901'. New perforations were added from 3360-3795' for injection purposes.
- (5) Higher/Lower Oil Zones:
The top of the Seven Rivers is @ $\pm 2300'$, and there is no lower oil zone.

V. Map:
See Exhibit "A".

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
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VI. Wells in Area of Review:

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #6

Location: 2005' FNL & 660' FWL, (E) Section 4, T17S, R31E

Completion Date: 2/55

Surface Casing: 8 5/8" set @ 740', cemented with 100 sx.

Production Casing: 7" set @ 3220', cemented with 200 sx.,
TOC @ 1800' (calc.)

Total Depth: 3870'

Completion: Completed as a producer in the Grayburg San Andres through OH 3220-3369'. Deepened to 3870' and produced through OH interval 3220-3870'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #23

Location: 1980' FSL & 1980' FWL, (K) Section 3, T17S, R31E

Completion Date: 9/59

Surface Casing: 8 5/8" set @ 797', cemented with 100 sx.

Production Casing: 5" set @ 3456', cemented with 100 sx.,
TOC @ 2670' (CBL)

Completion: Completed as a Grayburg San Andres producer through perforations 3413-3421' & 3429-3435'. Deepened well to 3557', perforated 3374-3384', and converted to dual injection through new perforations and OH interval 3456-3557'. P&A'd 4/82.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
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Operator: Hondo Oil & Gas Company

Well_Name: H. E. West "B" #37

Location: 1980' FSL & 1980' FEL, (J) Section 3, T17S, R31E

Completion_Date: 12/88

Surface_Casing: 8 5/8" set @ 627', cemented wwith 400 sx.

Production_Casing: 5 1/2" set @ 4082', cemented with 1350 sx.,
TOC @ 1762' (CBL)

Total_Depth: 4082'

Completion: Completed as a producer in the Grayburg Jackson through perforations 3911-4009', 3653-3881' and 3410-3614'.

Operator: Hondo Oil & Gas Company

Well_Name: H. E. West "B" #16

Location: 660' FSL & 660' FWL, (M) Section 3, T17S, R31E

Completion_Date: 8/58

Surface_Casing: 10 3/4" set @ 765', cemented with 100 sx.

Production_Casing: 5 1/2" set @ 3673', cemented with 100 sx.,
TOC @ 2660' (CBL)

Liner: 4" set from 3264-3978', cemented with 75 sx.

Total_Depth: 3978'

Completion: Completed in the Grayburg San Andres as a producer from perforations 3370-3384' and 3570-3578'. Added perforation from 3333-3341', 3394-3397', 3439-3497' and 3501-3520'. Deepened, ran liner and converted to injection through perforations 3792-3961', 3546-3742' and 3333-3523'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
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Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #7

Location: 660' FNL & 660' FEL, (A) Section 4, T17S, R31E

Completion Date: 6/55

Surface Casing: 8 5/8" set @ 760', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3234', cemented with 200 sx.,
TOC @ 2400' (calc.)

Total Depth: 3883'

Completion: Completed as a producer in the Grayburg San Andres through the OH interval 3234-3386'. Converted to injection through OH interval 3234-3386'. Deepened well to 3883' and injected through OH interval 3234-3883'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #10

Location: 660' FNL & 660' FWL, (D) Section 3, T17S, R31E

Completion Date: 3/56

Surface Casing: 8 5/8" set @ 788', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3261', cemented with 200 sx.,
TOC @ 2070' (CBL)

Total Depth: 3670'

Completion: Completed as a producer in the Grayburg OH interval 3261-3670'. P&A'd well 2/81.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
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Operator: Yates Petroleum Corp.

Well Name: Johnson #10

Location: 660' FSL & 660' FWL, (M) Section 34, T16S, R31E

Completion Date: 11/46

Surface Casing: 8 5/8" set @ 745', cemented with 45 sx.

Production Casing: 5 1/2" set @ 3395', cemented with 100 sx.,
TOC @ 2900 (calc.)

Total Depth: 3703'

Completion: Completed as a producer in the Grayburg San Andres
OH interval 3395-3703'. Converted to injection
through OH interval 3395-3703'. Converted to pro-
ducer through OH interval 3395-3703'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #11

Location: 1980' FNL & 1980' FEL, (G) Section 3, T17S, R31E

Completion Date: 11/59

Surface Casing: 8 5/8" set @ 817', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3500', cemented with 100 sx.,
TOC @ 2650' (CBL)

Liner: 4 1/2" set with top @ 3246' (19 jts.)

Total Depth: 3986'

Completion: Completed as a producer in the Grayburg San Andres
through perforations 3445-3452'. Deepened well to
3650', squeezed existing perforations, and made a
producer through OH 3550-3650'. Deepened well to
3986', ran liner and converted to injection through
perforations from 3439-3570', 3602-3749' and 3812-
3973'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8

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Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #16

Location: 1980' FNL & 1980' FWL, (F) Section 3, T17S, R31E

Completion Date: 1/89

Surface Casing: 8 5/8" set @ 644', cemented with 400 sx.

Production Casing: 5 1/2" set @ 4076', cemented with 1250 sx.,
TOC @ surf. (circ.)

Total Depth: 4076'

Completion: Completed as a producer in the Grayburg San Andres
through perforations 3415-3953'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #13

Location: 990' FNL & 2310' FWL, (C) Section 3, T17S, R31E

Completion Date: 10/64

Surface Casing: 8 5/8" set @ 555', cemented with 220 sx.

Production Casing: 4 1/2" set @ 3700', cemented with 320 sx.,
TOC @ 1820' (temp. survey)

Total Depth: 4010'

Completion: Completed as an injector in the Grayburg San Andres
through perforations 3419-3686'. Squeezed perfora-
tions 3419-3428' and injected through remaining
perforations. Deepened well and will add new
injection interval.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
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Operator: Hondo Oil & Gas Company

Well_Name: H. E. West "A" #4

Location: 1980' FNL & 1980' FEL, (G) Section 4, T17S, R31E

Completion_Date: 9/54

Surface_Casing: 8 5/8" set @ 706', cemented with 100 sx.

Production_Casing: 7" set @ 3169', cemented with 200 sx.,
TOC @ 2000' (calc.)

Liner: 4 1/2" set from 3068-3841', cemented with 95 sx.

Total_Depth: 3842'

Completion: Completed in the Grayburg as a producer from the
OH interval 3326-3336'. Deepened well, ran liner
and converted to dual injector through perforations
from 3331-3822'. Converted to triple injector with
the addition of perforations from 3242-3398'. Re-
turned to single injector through 3242-3822'.

Operator: Hondo Oil & Gas Company

Well_Name: H. E. West "B" #33

Location: 1980' FSL & 660' FWL, (L) Section 3, T17S, R31E

Completion_Date: 8/88

Surface_Casing: 8 5/8" set @ 625', cemented with 300 sx.

Production_Casing: 5 1/2" set @ 4057', cemented with 1300 sx.,
TOC @ 2262' (CBL)

Total_Depth: 4057'

Completion: Completed as a producer in the Grayburg San Andres
through perforations 3367-3994'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -9-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #9

Location: 1980' FSL & 660' FEL, (I) Section 4, T17S, R31E

Completion Date: 11/55

Surface Casing: 8 5/8" set @ 719', cemented with 100 sx.

Production Casing: 7" set @ 3198', cemented with 200 sx.,
TOC @ 2000' (calc.)

Liner: 4 1/2" set from 3000-3964', cemented with 80 sx.

Total Depth: 3964'

Completion: Completed as a producer in the Grayburg San Andres from the OH interval 3198-3375'. Converted to injection through OH interval 3198-3375'. Deepened to 3868' and continued use as an injector through OH interval 3198-3868'. Plugged back to 3700'. P&A'd 4/82. Re-entered well, deepened to 3964', ran liner and will perforate new interval for injection.

Operator: Repollo

Well Name: H. E. West #1

Location: 660' FNL & 1980' FWL, (C) Section 3, T17S, R31E

Completion Date: 9/20/46

Surface Casing: 10 3/4" set @ 815', cemented with 75 sx.

Intermediate Casing: 8 5/8" set @ 2885'

Production Casing: 7" set @ ?

Total Depth: 3690'

Completion: Well P&A'd 9/28/46.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8

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VII. Proposed Operations Data:

- (1) Average daily injection rate - 150 BWPD
Maximum daily injection rate - 200 BWPD
- (2) Type of system - closed
- (3) Average injection pressure - 1900 psi
Maximum injection pressure - 2200 psi
- (4) Source of injection water - water produced from the Keel West plus make-up water from the Keel West fresh water system.

VIII. Geological Data:

The proposed injection zone is in the Grayburg San Andres from perforations @ 3360-3795'. The Grayburg formation consists primarily of quartz sand with cementation. The San Andres formation consists primarily of dolomite with intermingled stringers of quartz sand with dolomite cementation.

Surface formation is cretaceous and has no known source of drinking water. Also, there are no known underground sources of drinking water overlying or underlying the proposed injection zone.

IX. Stimulation Program:

Acidized perforations 3360-3795' with 10,000 gal. 15% NEFE acid.

X. Well Logs:

Copies of the current well logs are attached.

XI. Chemical Analysis of Fresh Water:

There are no known producing fresh water wells within one mile of the proposed injection well.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
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XII. Upon examination of the available geologic and engineering data, no evidence of open faults or any other hydrologic connection between the disposal zone and any underground source of drinking water was found.

SURFACE OWNER:

Federal land

OFFSET OPERATOR:

Yates Petroleum Corp.
105 S. 4th
Artesia, NM 88210

● **SENDER:** Complete Items 1 and 2 when additional services are desired, and complete Items 3 and 4.
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1. ☒ Show to whom delivered, date, and addressee's address. ☐ Restricted Delivery
↑(Extra charge)↑

3. Article Addressed to: Oil Conservation Division P. O. Box 2088 Santa Fe, NM 87501	4. Article Number P663397691 Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input type="checkbox"/> COD <input type="checkbox"/> Express Mail Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature — Addressee X	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature — Agent X	
7. Date of Delivery	

PS Form 3811, Mar. 1987

★ U.S.G.P.O. 1987-178-268

DOMESTIC RETURN RECEIPT

● **SENDER:** Complete Items 1 and 2 when additional services are desired, and complete Items 3 and 4.
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1. ☒ Show to whom delivered, date, and addressee's address. ☐ Restricted Delivery
↑(Extra charge)↑

3. Article Addressed to: Bureau of Land Management P. O. Box 1778 Carlsbad, NM 88220	4. Article Number P663397692 Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input type="checkbox"/> COD <input type="checkbox"/> Express Mail Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature — Addressee X	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature — Agent X	
7. Date of Delivery	

PS Form 3811, Mar. 1987

★ U.S.G.P.O. 1987-178-268

DOMESTIC RETURN RECEIPT

● **SENDER:** Complete Items 1 and 2 when additional services are desired, and complete Items 3 and 4.
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1. ☒ Show to whom delivered, date, and addressee's address. ☐ Restricted Delivery
↑(Extra charge)↑

3. Article Addressed to: Yates Petroleum Corp. 105 S. 4th St. Artesia, NM 88210	4. Article Number P663397690 Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input type="checkbox"/> COD <input type="checkbox"/> Express Mail Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature — Addressee X	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature — Agent X	
7. Date of Delivery	

PS Form 3811, Mar. 1987

★ U.S.G.P.O. 1987-178-268

DOMESTIC RETURN RECEIPT

● SENDER: Complete items 1 and 2 when additional services are desired, and complete items 3 and 4.

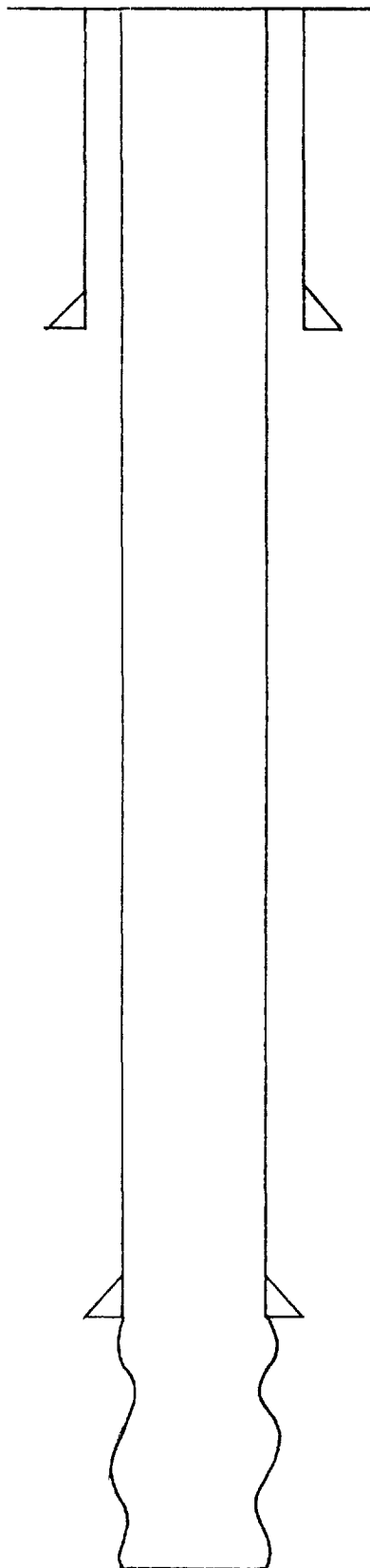
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1. ☒ Show to whom delivered, date, and addressee's address. ☐ Restricted Delivery
↑(Extra charge)↑

<p>3. Article Addressed to:</p> <p>NMOCD P. O. Drawer DD Artesia, NM 88210</p>	<p>4. Article Number</p> <p>P663397693</p> <p>Type of Service:</p> <table border="0"><tr><td><input type="checkbox"/> Registered</td><td><input type="checkbox"/> Insured</td></tr><tr><td><input checked="" type="checkbox"/> Certified</td><td><input type="checkbox"/> COD</td></tr><tr><td><input type="checkbox"/> Express Mail</td><td></td></tr></table> <p>Always obtain signature of addressee or agent and <u>DATE DELIVERED</u>.</p>	<input type="checkbox"/> Registered	<input type="checkbox"/> Insured	<input checked="" type="checkbox"/> Certified	<input type="checkbox"/> COD	<input type="checkbox"/> Express Mail	
<input type="checkbox"/> Registered	<input type="checkbox"/> Insured						
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<input type="checkbox"/> Express Mail							
<p>5. Signature — Addressee</p> <p>X</p>	<p>8. Addressee's Address (ONLY if requested and fee paid)</p>						
<p>6. Signature — Agent</p> <p>X</p>							
<p>7. Date of Delivery</p>							

H. E. WEST #3
330' FNL & 330' FEL
Sec.3-T17S-R31E
Eddy Co., NM

RECEIVED
SEP 25 1989
OIL CONSERVATION DIV.
SANTA FE

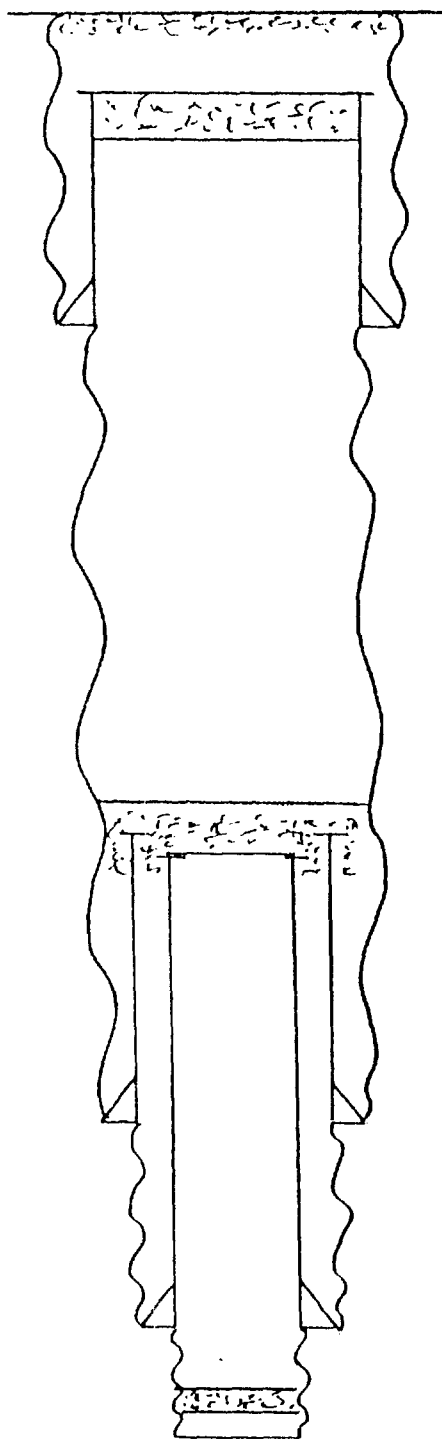


8 5/8" csg. set @ 887',
cmt. w/50 sx.

7" csg. set @ 3663',
cmt. w/200 sx.

TD 4483'

REPOLLO
H. E. WEST #1
660' FNL & 1980' FWL, Sec.3-T17S-R31E
Eddy Co., NM



10 sx. cmt. @ Surface

10 3/4" csg. knocked off @ 202'

20 sx. cmt. plug @ 202'

10 3/4" csg. set @ 815', cmt. w/75 sx.

8 5/8" csg. knocked off @ 2115'

7" csg. knocked off @ 2130'

15 sx. cmt. plug @ 2170' thru tubing

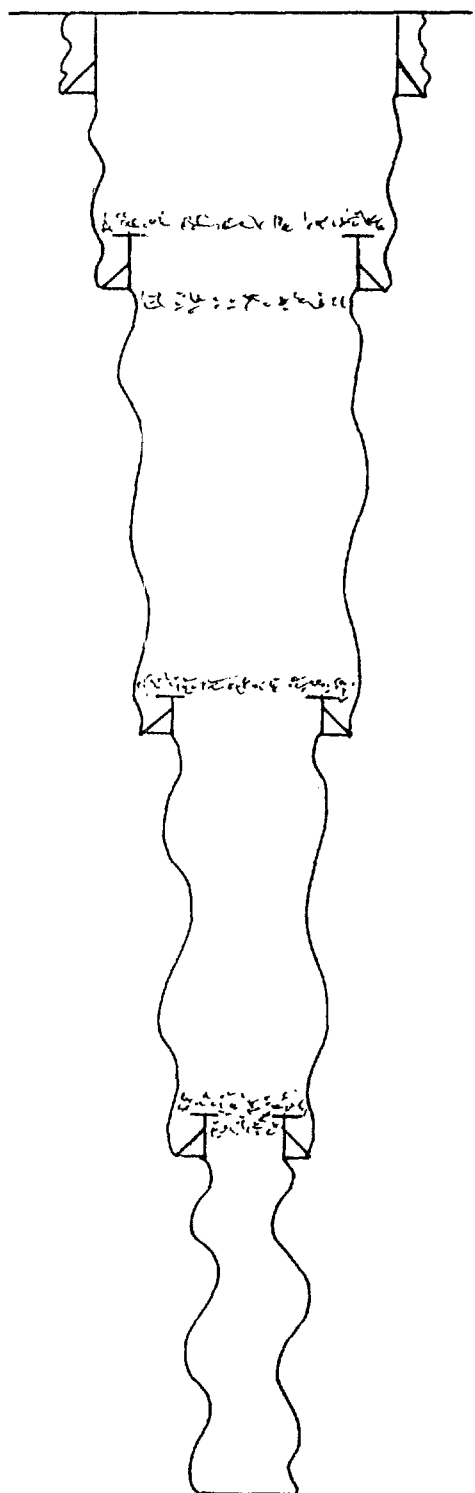
8 5/8" csg. set @ 2885', no cement

7" csg. set @ 3270', cmt. w/80 sx.

10 sx. cmt. plug @ 3380'

TD 3690'

KEEL #1
 315' FSL & 330' FEL
 Sec.10-T17S-R31E
 Eddy Co., NM



Left 40' 15 1/2" csg. in hole
 15 1/2" csg. set @ 41', cmt. w/3 sx.

Left 98' 12 1/2" csg. in hole w/cmt. on top
 and mudded hole
 12 1/2" csg. set @ 680', cmt. w/10 sx.
 Cement cap @ 725'

Left 58' 10" csg. in hole w/cmt. cap on top
 10" csg. set @ 1823', cmt. w/10 sx.

Mudded hole to 1900'

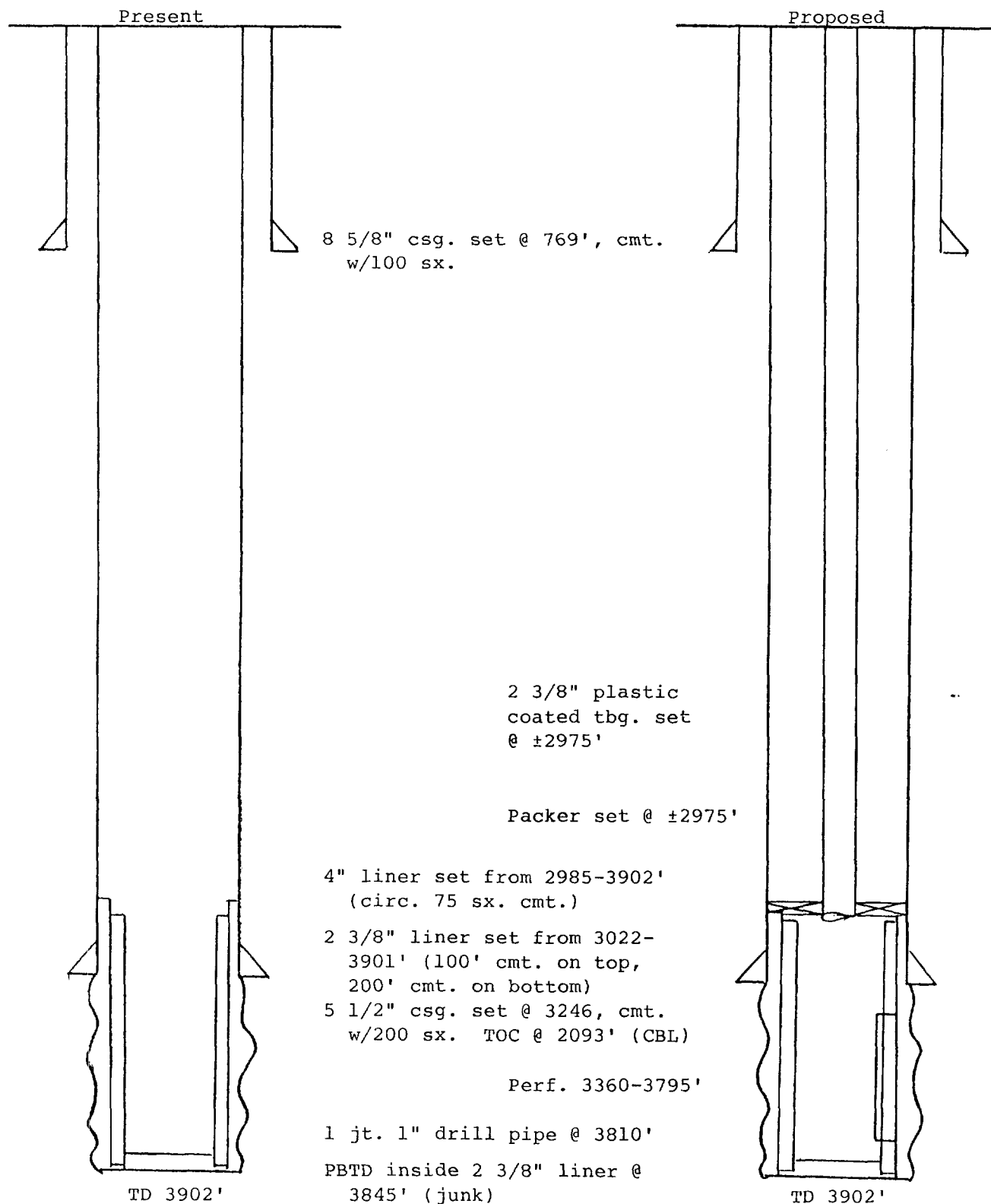
8 sx. cement
 Cement cap @ 2885'
 Mudded hole from 2970-2885'
 Left 70' 8 1/4" csg. in hole
 8 1/4" csg. set @ 2953', no cmt.
 Cement cap from 2970-2975'

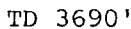
Mudded hole from 3500-2970'

TD 3872'

EXHIBIT "A"
Hondo Oil & Gas Company
H. E. West "A" #8
Sec.3-T17S-R31E
Eddy Co., NM

HONDO OIL & GAS COMPANY
 H. E. WEST "A" #8
 1980' FNL & 660' FWL, Sec.3-T17S-R31E
 Eddy Co., NM





10 3/4" csg. knocked off @ 202'

10 3/4" csg. set @ 815', cmt. w/75 sx.

8 5/8" csg. knocked off @ 2115'

7" csg. knocked off @ 2180'

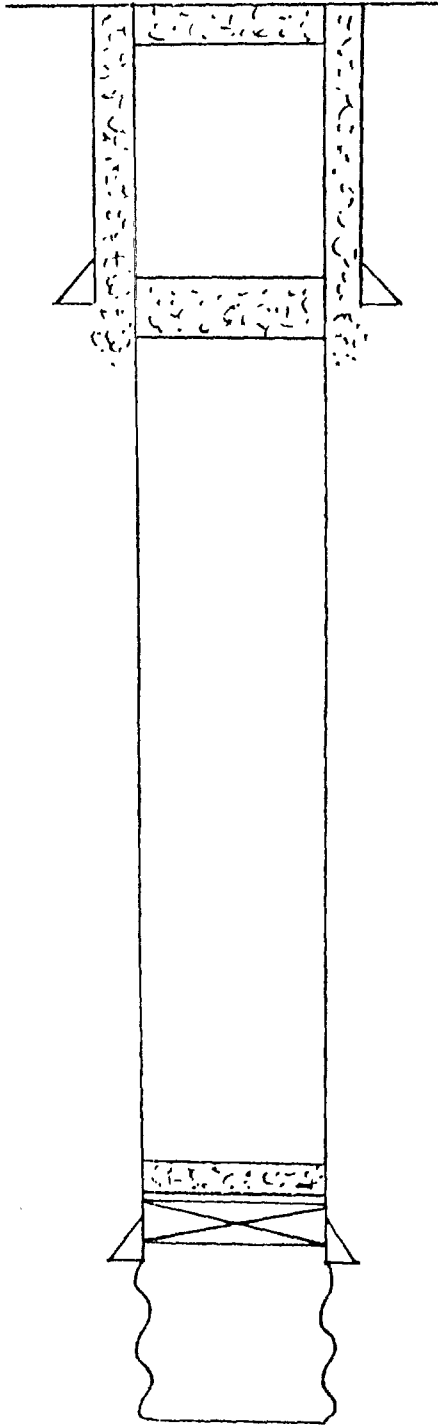
15 sx. cmt. plug @ 2170' thru tubing

8 5/8" csg. set @ 2885', cmt. w/?

7" csg. set @ ?

10 sx. cmt. plug @ 3580'

HONDO OIL & GAS COMPANY
H. E. WEST "A" #10
660' FNL & 660' FWL, Sec.3-T17S-R31E
Eddy Co., NM



cmt. plug set from 90'-surf.

17 1/2 sx. cmt. plug set from 850-700'

8 5/8" csg. set @ 788', cmt. w/100 sx.

circ. 184 sx. cmt. between 8 5/8" csg. & 5 1/2" csg.
from 894'-surf.

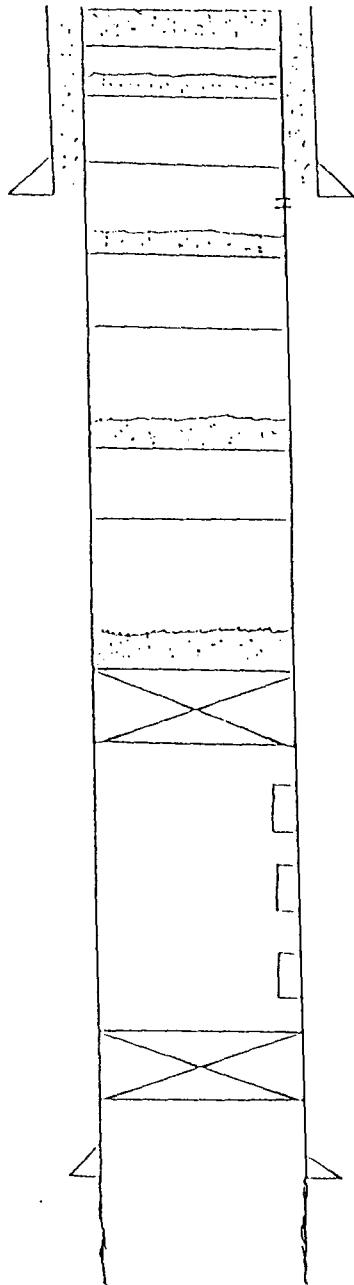
12 sx. cmt. plug set from 3108-3006'

CIBP set @ 3110'

5 1/2" csg. set @ 3261', cmt. w/200 sx.
TOC @ 2070' (CBL)

TD 3670'

HONDO OIL & GAS COMPANY
H. E. WEST "B" #23
1980' FNL & 1980' FWL
Section 3, T-17S, R-31E



Set 150' Surface Plug

Set retainer @ 750' w/100 sxs cmt on top

8 5/8", 24#, set @ 797', cmt w/100 sxs

Perf 2 shots @ 800'

TOC @ 1070'

Set retainer @ 1155'

Set retainer @ 1627' w/100 sxs cmt on top

TOC @ 2670'

Set CIBP @ 2978'

Perf @ 3374'-3384'

Perf @ 3413'-3421'

Perf @ 3429'-3435'

CIBP @ 3451'

5", 11.5#, set @3456', cmt w/100 sxs

TD @ 3557'

Hondo Oil & Gas Company

Box 2208
Roswell, New Mexico 88202
(505)625-8700



September 13, 1989

Oil Conservation Division
P. O. Box 2088
Santa Fe, NM 87501

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 8
1980' FNL & 660' FWL, Section 3, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

Please find enclosed Hondo Oil & Gas Company's application for permit to convert the above captioned well into a water injection well.

Copies have been submitted to the surface owner, the offset operators and the NMOCD district office in Artesia.

If you should have any questions, please contact Ron Brown at (505)625-6735.

Sincerely,

A handwritten signature in cursive script that reads 'Lisa Bohannon'. The signature is fluid and written in dark ink.

Lisa Bohannon
Engineering Technician

Encl.

Hondo Oil & Gas Company

Box 2208
Roswell, New Mexico 88202
(505)625-8700



September 13, 1989

Bureau of Land Management
P. O. Box 1778
Carlsbad, NM 88220

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 8
1980' FNL & 660' FWL, Section 3, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

According to the Oil Conservation Division Rule 701, a copy of any injection well permit application must be sent to the offset operators and surface owner. Enclosed is a copy of our application for administrative approval to convert the above captioned well to a water injection well.

If you should have any questions, please contact Ron Brown at (505)625-6735.

Sincerely,

A handwritten signature in cursive script that reads "Lisa Bohannon".

Lisa Bohannon
Engineering Technician

Encl.

Hondo Oil & Gas Company

Box 2208
Roswell, New Mexico 88202
(505)625-8700



September 13, 1989

Yates Petroleum Corp.
105 S. 4th St.
Artesia, NM 88210

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 8
1980' FNL & 660' FWL, Section 3, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

According to the Oil Conservation Division Rule 701, a copy of any injection well permit must be sent to the offset operators and surface owner. Enclosed is our application for administrative approval to convert the above captioned well to a water injection well.

If you should have any questions, please contact Ron Brown at (505)625-6735.


Sincerely,

A handwritten signature in cursive script that reads 'Lisa Bohannon'. The signature is fluid and written in dark ink.

Lisa Bohannon
Engineering Technician

Encl.

APPLICATION FOR AUTHORIZATION TO INJECT

- I. Purpose: ☒ Secondary Recovery ☐ Pressure Maintenance ☐ Disposal ☐ Storage
Application qualifies for administrative approval? ☒ yes ☐ no
- II. Operator: Hondo Oil & Gas Company
Address: P. O. Box 2208, Roswell, NM 88202
Contact party: Ron Brown Phone: (505)625-6735
- III. Well data: Complete the data required on the reverse side of this form for each well proposed for injection. Additional sheets may be attached if necessary.
- IV. Is this an expansion of an existing project? ☒ yes ☐ no
If yes, give the Division order number authorizing the project R-2268 & WFX-585.
- V. Attach a map that identifies all wells and leases within two miles of any proposed injection well with a one-half mile radius circle drawn around each proposed injection well. This circle identifies the well's area of review.
- * VI. Attach a tabulation of data on all wells of public record within the area of review which penetrate the proposed injection zone. Such data shall include a description of each well's type, construction, date drilled, location, depth, record of completion, and a schematic of any plugged well illustrating all plugging detail.
- VII. Attach data on the proposed operation, including:
1. Proposed average and maximum daily rate and volume of fluids to be injected;
 2. Whether the system is open or closed;
 3. Proposed average and maximum injection pressure;
 4. Sources and an appropriate analysis of injection fluid and compatibility with the receiving formation if other than reinjected produced water; and
 5. If injection is for disposal purposes into a zone not productive of oil or gas at or within one mile of the proposed well, attach a chemical analysis of the disposal zone formation water (may be measured or inferred from existing literature, studies, nearby wells, etc.).
- *VIII. Attach appropriate geological data on the injection zone including appropriate lithologic detail, geological name, thickness, and depth. Give the geologic name, and depth to bottom of all underground sources of drinking water (aquifers containing waters with total dissolved solids concentrations of 10,000 mg/l or less) overlying the proposed injection zone as well as any such source known to be immediately underlying the injection interval.
- IX. Describe the proposed stimulation program, if any.
- * X. Attach appropriate logging and test data on the well. (If well logs have been filed with the Division they need not be resubmitted.)
- * XI. Attach a chemical analysis of fresh water from two or more fresh water wells (if available and producing) within one mile of any injection or disposal well showing location of wells and dates samples were taken.
- XII. Applicants for disposal wells must make an affirmative statement that they have examined available geologic and engineering data and find no evidence of open faults or any other hydrologic connection between the disposal zone and any underground source of drinking water.
- XIII. Applicants must complete the "Proof of Notice" section on the reverse side of this form.
- XIV. Certification
- I hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.
- Name: Ron Brown Title: Petroleum Engineer
Signature:  Date: 9/13/89
- * If the information required under Sections VI, VIII, X, and XI above has been previously submitted, it need not be duplicated and resubmitted. Please show the date and circumstance of the earlier submittal. Copies of current well logs are attached.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL #8

ITEM:

III. Well Data

- A. (1) Well Name: H. E. West "A" #8
1980' FNL & 660' FWL
Section 3, T17S, R31E
Eddy County, New Mexico
- (2) Casing Data: (Also see Exhibit "B".)
- Surface Casing:
8 5/8" set @ 769', cemented with 100 sx.
- Production Casing:
5 1/2" set @ 3246', cemented with 200 sx., TOC @
2093' (CBL)
- Liners:
4" set from 2985-3902', circulated 75 sx. cement
2 3/8" set from 3022-3901'
1 jt. 1" drill pipe @ 3810'
- (3) Injection Tubing:
2 3/8", 4.7#, 8rd EUE, plastic coated tubing set @
±2975'.
- (4) Packer:
Packer set @ ±2975'.
- B. (1) Injection Formation:
The injection formation will be the Grayburg San Andres.
- (2) Injection Interval:
The injection interval is to be from perforations @ 3360-
3795'.
- (3) Original Purpose of Well:
This well was originally drilled, completed and tested in
the Grayburg San Andres as a producer from the OH interval
3246-3404'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -2-

- (4) Added Perforated Intervals: (Also see Exhibit "B".)
This well was deepened to 3901' and used as an injector through the OH interval 3246-3901'. New perforations were added from 3360-3795' for injection purposes.
- (5) Higher/Lower Oil Zones:
The top of the Seven Rivers is @ $\pm 2300'$, and there is no lower oil zone.

V. Map:
See Exhibit "A".

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -3-

VI. Wells in Area of Review:

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #6

Location: 2005' FNL & 660' FWL, (E) Section 4, T17S, R31E

Completion Date: 2/55

Surface Casing: 8 5/8" set @ 740', cemented with 100 sx.

Production Casing: 7" set @ 3220', cemented with 200 sx.,
TOC @ 1800' (calc.)

Total Depth: 3870'

Completion: Completed as a producer in the Grayburg San Andres through OH 3220-3369'. Deepened to 3870' and produced through OH interval 3220-3870'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #23

Location: 1980' FSL & 1980' FWL, (K) Section 3, T17S, R31E

Completion Date: 9/59

Surface Casing: 8 5/8" set @ 797', cemented with 100 sx.

Production Casing: 5" set @ 3456', cemented with 100 sx.,
TOC @ 2670' (CBL)

Completion: Completed as a Grayburg San Andres producer through perforations 3413-3421' & 3429-3435'. Deepened well to 3557', perforated 3374-3384', and converted to dual injection through new perforations and OH interval 3456-3557'. P&A'd 4/82.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -4-

Operator: Hondo Oil & Gas Company

Well_Name: H. E. West "B" #37

Location: 1980' FSL & 1980' FEL, (J) Section 3, T17S, R31E

Completion_Date: 12/88

Surface_Casing: 8 5/8" set @ 627', cemented wwith 400 sx.

Production_Casing: 5 1/2" set @ 4082', cemented with 1350 sx.,
TOC @ 1762' (CBL)

Total_Depth: 4082'

Completion: Completed as a producer in the Grayburg Jackson through perforations 3911-4009', 3653-3881' and 3410-3614'.

Operator: Hondo Oil & Gas Company

Well_Name: H. E. West "B" #16

Location: 660' FSL & 660' FWL, (M) Section 3, T17S, R31E

Completion_Date: 8/58

Surface_Casing: 10 3/4" set @ 765', cemented with 100 sx.

Production_Casing: 5 1/2" set @ 3673', cemented with 100 sx.,
TOC @ 2660' (CBL)

Liner: 4" set from 3264-3978', cemented with 75 sx.

Total_Depth: 3978'

Completion: Completed in the Grayburg San Andres as a producer from perforations 3370-3384' and 3570-3578'. Added perforation from 3333-3341', 3394-3397', 3439-3497' and 3501-3520'. Deepened, ran liner and converted to injection through perforations 3792-3961', 3546-3742' and 3333-3523'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -5-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #7

Location: 660' FNL & 660' FEL, (A) Section 4, T17S, R31E

Completion Date: 6/55

Surface Casing: 8 5/8" set @ 760', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3234', cemented with 200 sx.,
TOC @ 2400' (calc.)

Total Depth: 3883'

Completion: Completed as a producer in the Grayburg San Andres through the OH interval 3234-3386'. Converted to injection through OH interval 3234-3386'. Deepened well to 3883' and injected through OH interval 3234-3883'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #10

Location: 660' FNL & 660' FWL, (D) Section 3, T17S, R31E

Completion Date: 3/56

Surface Casing: 8 5/8" set @ 788', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3261', cemented with 200 sx.,
TOC @ 2070' (CBL)

Total Depth: 3670'

Completion: Completed as a producer in the Grayburg OH interval 3261-3670'. P&A'd well 2/81.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -6-

Operator: Yates Petroleum Corp.

Well Name: Johnson #10

Location: 660' FSL & 660' FWL, (M) Section 34, T16S, R31E

Completion Date: 11/46

Surface Casing: 8 5/8" set @ 745', cemented with 45 sx.

Production Casing: 5 1/2" set @ 3395', cemented with 100 sx.,
TOC @ 2900 (calc.)

Total Depth: 3703'

Completion: Completed as a producer in the Grayburg San Andres
OH interval 3395-3703'. Converted to injection
through OH interval 3395-3703'. Converted to pro-
ducer through OH interval 3395-3703'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #11

Location: 1980' FNL & 1980' FEL, (G) Section 3, T17S, R31E

Completion Date: 11/59

Surface Casing: 8 5/8" set @ 817', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3500', cemented with 100 sx.,
TOC @ 2650' (CBL)

Liner: 4 1/2" set with top @ 3246' (19 jts.)

Total Depth: 3986'

Completion: Completed as a producer in the Grayburg San Andres
through perforations 3445-3452'. Deepened well to
3650', squeezed existing perforations, and made a
producer through OH 3550-3650'. Deepened well to
3986', ran liner and converted to injection through
perforations from 3439-3570', 3602-3749' and 3812-
3973'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -7-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #16

Location: 1980' FNL & 1980' FWL, (F) Section 3, T17S, R31E

Completion Date: 1/89

Surface Casing: 8 5/8" set @ 644', cemented with 400 sx.

Production Casing: 5 1/2" set @ 4076', cemented with 1250 sx.,
TOC @ surf. (circ.)

Total Depth: 4076'

Completion: Completed as a producer in the Grayburg San Andres
through perforations 3415-3953'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #13

Location: 990' FNL & 2310' FWL, (C) Section 3, T17S, R31E

Completion Date: 10/64

Surface Casing: 8 5/8" set @ 555', cemented with 220 sx.

Production Casing: 4 1/2" set @ 3700', cemented with 320 sx.,
TOC @ 1820' (temp. survey)

Total Depth: 4010'

Completion: Completed as an injector in the Grayburg San Andres
through perforations 3419-3686'. Squeezed perfora-
tions 3419-3428' and injected through remaining
perforations. Deepened well and will add new
injection interval.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -8-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #4

Location: 1980' FNL & 1980' FEL, (G) Section 4, T17S, R31E

Completion Date: 9/54

Surface Casing: 8 5/8" set @ 706', cemented with 100 sx.

Production Casing: 7" set @ 3169', cemented with 200 sx.,
TOC @ 2000' (calc.)

Liner: 4 1/2" set from 3068-3841', cemented with 95 sx.

Total Depth: 3842'

Completion: Completed in the Grayburg as a producer from the
OH interval 3326-3336'. Deepened well, ran liner
and converted to dual injector through perforations
from 3331-3822'. Converted to triple injector with
the addition of perforations from 3242-3398'. Re-
turned to single injector through 3242-3822'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #33

Location: 1980' FSL & 660' FWL, (L) Section 3, T17S, R31E

Completion Date: 8/88

Surface Casing: 8 5/8" set @ 625', cemented with 300 sx.

Production Casing: 5 1/2" set @ 4057', cemented with 1300 sx.,
TOC @ 2262' (CBL)

Total Depth: 4057'

Completion: Completed as a producer in the Grayburg San Andres
through perforations 3367-3994'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -9-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #9

Location: 1980' FSL & 660' FEL, (I) Section 4, T17S, R31E

Completion Date: 11/55

Surface Casing: 8 5/8" set @ 719', cemented with 100 sx.

Production Casing: 7" set @ 3198', cemented with 200 sx.,
TOC @ 2000' (calc.)

Liner: 4 1/2" set from 3000-3964', cemented with 80 sx.

Total Depth: 3964'

Completion: Completed as a producer in the Grayburg San Andres from the OH interval 3198-3375'. Converted to injection through OH interval 3198-3375'. Deepened to 3868' and continued use as an injector through OH interval 3198-3868'. Plugged back to 3700'. P&A'd 4/82. Re-entered well, deepened to 3964', ran liner and will perforate new interval for injection.

Operator: Repollo

Well Name: H. E. West #1

Location: 660' FNL & 1980' FWL, (C) Section 3, T17S, R31E

Completion Date: 9/20/46

Surface Casing: 10 3/4" set @ 815', cemented with 75 sx.

Intermediate Casing: 8 5/8" set @ 2885'

Production Casing: 7" set @ ?'

Total Depth: 3690'

Completion: Well P&A'd 9/28/46.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -10-

VII. Proposed Operations Data:

- (1) Average daily injection rate - 150 BWPD
Maximum daily injection rate - 200 BWPD
- (2) Type of system - closed
- (3) Average injection pressure - 1900 psi
Maximum injection pressure - 2200 psi
- (4) Source of injection water - water produced from the Keel West plus make-up water from the Keel West fresh water system.

VIII. Geological Data:

The proposed injection zone is in the Grayburg San Andres from perforations @ 3360-3795'. The Grayburg formation consists primarily of quartz sand with cementation. The San Andres formation consists primarily of dolomite with intermingled stringers of quartz sand with dolomite cementation.

Surface formation is cretaceous and has no known source of drinking water. Also, there are no known underground sources of drinking water overlying or underlying the proposed injection zone.

IX. Stimulation Program:

Acidized perforations 3360-3795' with 10,000 gal. 15% NEFE acid.

X. Well Logs:

Copies of the current well logs are attached.

XI. Chemical Analysis of Fresh Water:

There are no known producing fresh water wells within one mile of the proposed injection well.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 8
Page -11-

XII. Upon examination of the available geologic and engineering data, no evidence of open faults or any other hydrologic connection between the disposal zone and any underground source of drinking water was found.

SURFACE OWNER:

Federal land

OFFSET OPERATOR:

Yates Petroleum Corp.
105 S. 4th
Artesia, NM 88210

● **SENDER:** Complete Items 1 and 2 when additional services are desired, and complete Items 3 and 4.
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1. ☒ Show to whom delivered, date, and addressee's address. 2. ☐ Restricted Delivery
↑(Extra charge)↑ ↑(Extra charge)↑

3. Article Addressed to: Oil Conservation Division P. O. Box 2088 Santa Fe, NM 87501	4. Article Number P663397691 Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input type="checkbox"/> COD <input type="checkbox"/> Express Mail Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature — Addressee X	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature — Agent X	
7. Date of Delivery	

PS Form 3811, Mar. 1987 ★ U.S.G.P.O. 1987-178-268 **DOMESTIC RETURN RECEIPT**

● **SENDER:** Complete Items 1 and 2 when additional services are desired, and complete Items 3 and 4.
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1. ☒ Show to whom delivered, date, and addressee's address. 2. ☐ Restricted Delivery
↑(Extra charge)↑ ↑(Extra charge)↑

3. Article Addressed to: Bureau of Land Management P. O. Box 1778 Carlsbad, NM 88220	4. Article Number P663397692 Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input type="checkbox"/> COD <input type="checkbox"/> Express Mail Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature — Addressee X	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature — Agent X	
7. Date of Delivery	

PS Form 3811, Mar. 1987 ★ U.S.G.P.O. 1987-178-268 **DOMESTIC RETURN RECEIPT**

● **SENDER:** Complete Items 1 and 2 when additional services are desired, and complete Items 3 and 4.
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1. ☒ Show to whom delivered, date, and addressee's address. 2. ☐ Restricted Delivery
↑(Extra charge)↑ ↑(Extra charge)↑

3. Article Addressed to: Yates Petroleum Corp. 105 S. 4th St. Artesia, NM 88210	4. Article Number P663397690 Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input type="checkbox"/> COD <input type="checkbox"/> Express Mail Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature — Addressee X	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature — Agent X	
7. Date of Delivery	

PS Form 3811, Mar. 1987 ★ U.S.G.P.O. 1987-178-268 **DOMESTIC RETURN RECEIPT**

● **SENDER:** Complete items 1 and 2 when additional services are desired, and complete items 3 and 4.

Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

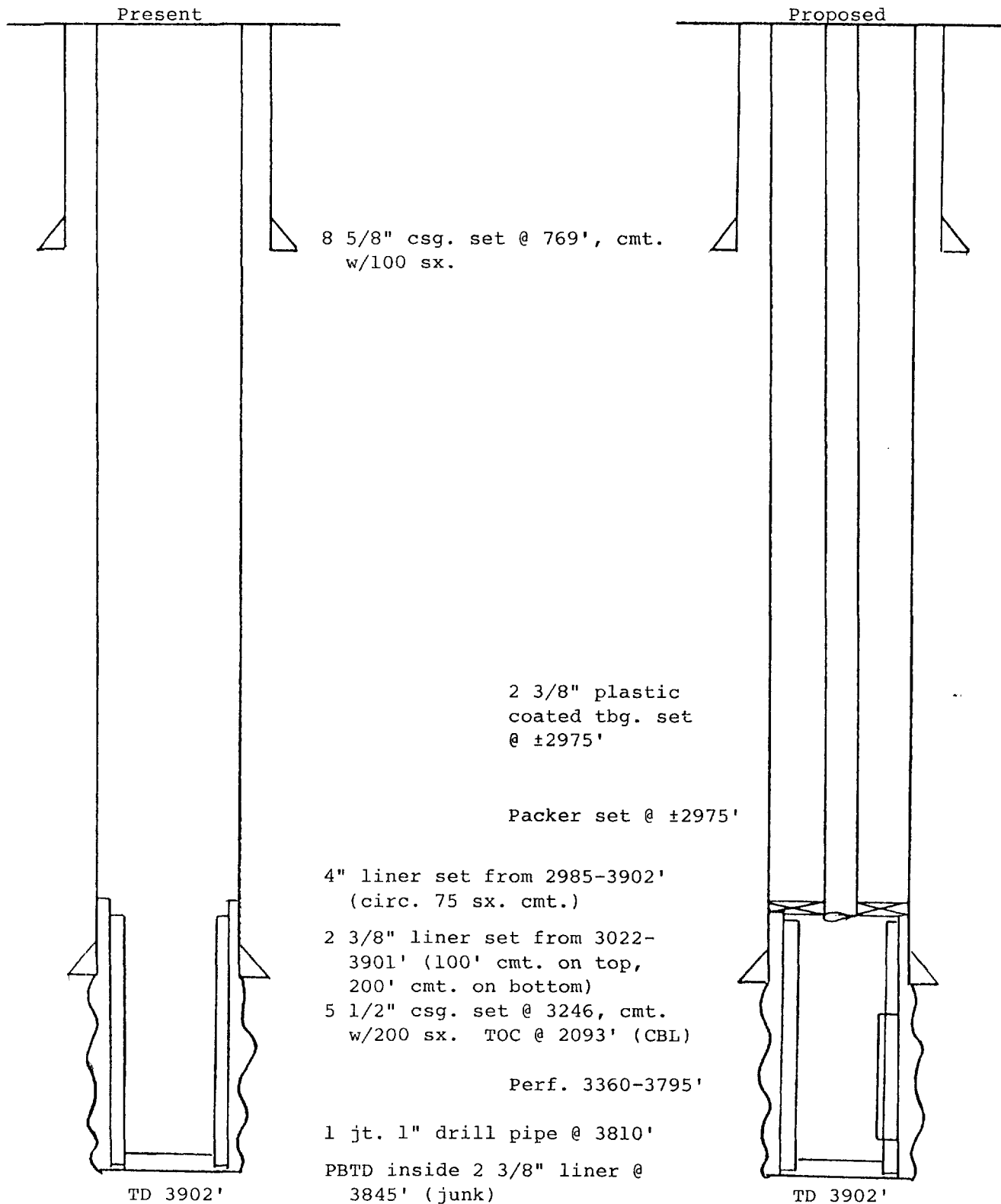
1. ☒ Show to whom delivered, date, and addressee's address. 2. ☐ Restricted Delivery
↑(Extra charge)↑ ↑(Extra charge)↑

<p>3. Article Addressed to:</p> <p>NMOCD P. O. Drawer DD Artesia, NM 88210</p>	<p>4. Article Number</p> <p>P663397693</p> <p>Type of Service:</p> <p><input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input type="checkbox"/> COD <input type="checkbox"/> Express Mail</p> <p>Always obtain signature of addressee or agent and DATE DELIVERED.</p>
<p>5. Signature — Addressee</p> <p>X</p>	<p>8. Addressee's Address (ONLY if requested and fee paid)</p>
<p>6. Signature — Agent</p> <p>X</p>	
<p>7. Date of Delivery</p>	

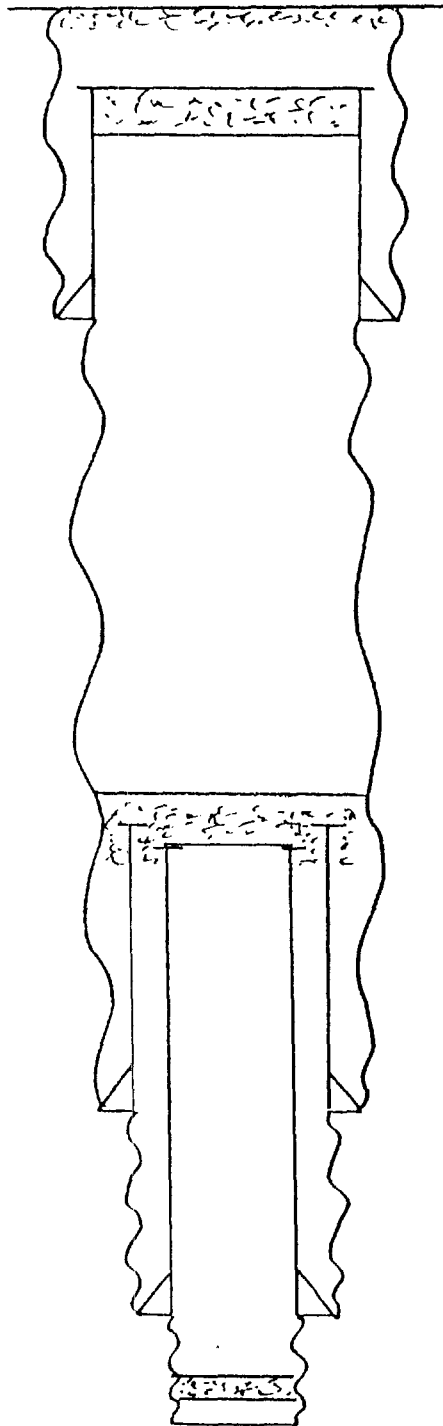
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EXHIBIT "A"
Hondo Oil & Gas Company
H. E. West "A" #8
Sec.3-T17S-R31E
Eddy Co., NM

HONDO OIL & GAS COMPANY
 H. E. WEST "A" #8
 1980' FNL & 660' FWL, Sec.3-T17S-R31E
 Eddy Co., NM



REPOLLO
H. E. WEST #1
660' FNL & 1980' FWL, Sec.3-T17S-R31E
Eddy Co., NM



10 sx. cmt. @ Surface

10 3/4" csg. knocked off @ 202'

20 sx. cmt. plug @ 202'

10 3/4" csg. set @ 815', cmt. w/75 sx.

8 5/8" csg. knocked off @ 2115'

7" csg. knocked off @ 2180'

15 sx. cmt. plug @ 2170' thru tubing

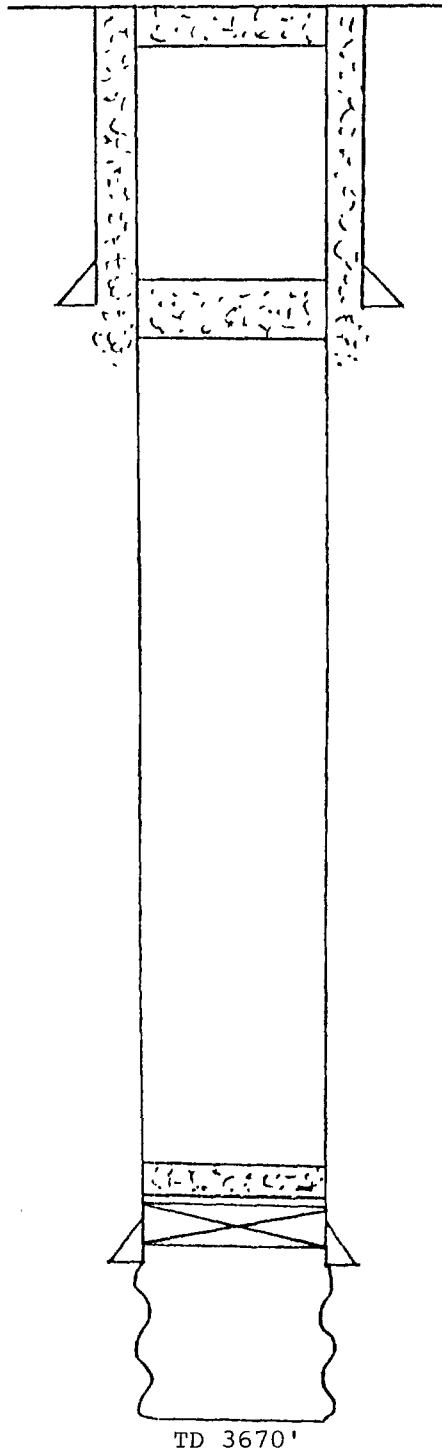
8 5/8" csg. set @ 2885', cmt. w/?

7" csg. set @ ?

10 sx. cmt. plug @ 3580'

TD 3690'

HONDO OIL & GAS COMPANY
H. E. WEST "A" #10
660' FNL & 660' FWL, Sec.3-T17S-R31E
Eddy Co., NM



cmt. plug set from 90'-surf.

17 1/2 sx. cmt. plug set from 850-700'

8 5/8" csg. set @ 788', cmt. w/100 sx.

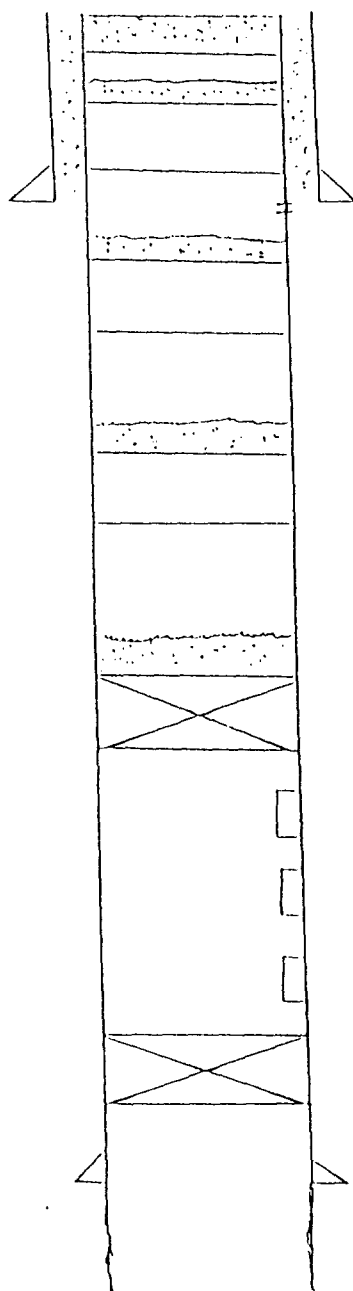
circ. 184 sx. cmt. between 8 5/8" csg. & 5 1/2" csg.
from 894'-surf.

12 sx. cmt. plug set from 3108-3006'

CIBP set @ 3110'

5 1/2" csg. set @ 3261', cmt. w/200 sx.
TOC @ 2070' (CBL)

HONDO OIL & GAS COMPANY
 H. E. WEST "B" #23
 1980' FNL & 1980' FWL
 Section 3, T-17S, R-31E



Set 150' Surface Plug

Set retainer @ 750' w/100 sxs cmt on top

8 5/8", 24#, set @ 797', cmt w/100 sxs

Perf 2 shots @ 800'

TOC @ 1070'

Set retainer @ 1155'

Set retainer @ 1627' w/100 sxs cmt on top

TOC @ 2670'

Set CIBP @ 2978'

Perf @ 3374'-3384'

Perf @ 3413'-3421'

Perf @ 3429'-3435'

CIBP @ 3451'

5", 11.5#, set @3456', cmt w/100 sxs

TD @ 3557'

Hondo Oil & Gas Company

P.O. Box 2208
Fowler, New Mexico 87728
(505) 625-6735



September 21, 1989

Oil Conservation Division
P. O. Box 2088
Santa Fe, NM 87501

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 9
1980' FSL & 660' FEL, Section 4, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

Please find enclosed Hondo Oil & Gas Company's application for permit to convert the above captioned well into a water injection well.

Copies have been submitted to the surface owner, the offset operators and the NMOCD office in Artesia.

If you should have any questions, please contact Ron Brown at (505) 625-6735.

Sincerely,

A handwritten signature in cursive script that reads "Lisa Bohannon". The signature is written in black ink.

Lisa Bohannon
Engineering Technician

Encl.

Hondo Oil & Gas Company

Box 2208
Roswell, New Mexico 88202
(505)625-8700



September 21, 1989

Bureau of Land Management
P. O. Box 1778
Carlsbad, NM 88220

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 9
1980' FSL & 660' FEL, Section 4, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

According to the Oil Conservation Division Rule 701, a copy of any injection well permit application must be sent to the offset operators and surface owner. Enclosed is a copy of our application for administrative approval to convert the above captioned well to a water injection well.

If you should have any questions, please contact Ron Brown at (505)625-6735.

Sincerely,

A handwritten signature in cursive script that reads "Lisa Bohannon".

Lisa Bohannon
Engineering Technician

Encl.

APPLICATION FOR AUTHORIZATION TO INJECT

- I. Purpose: ☒ Secondary Recovery ☐ Pressure Maintenance ☐ Disposal ☐ Storage
Application qualifies for administrative approval? ☒ yes ☐ no
- II. Operator: Hondo Oil & Gas Company
Address: P. O. Box 2208, Roswell, NM 88202
Contact party: Ron Brown Phone: (505)625-6735
- III. Well data: Complete the data required on the reverse side of this form for each well proposed for injection. Additional sheets may be attached if necessary.
- IV. Is this an expansion of an existing project? ☒ yes ☐ no
If yes, give the Division order number authorizing the project R-2268 & WFX-585.
- V. Attach a map that identifies all wells and leases within two miles of any proposed injection well with a one-half mile radius circle drawn around each proposed injection well. This circle identifies the well's area of review.
- * VI. Attach a tabulation of data on all wells of public record within the area of review which penetrate the proposed injection zone. Such data shall include a description of each well's type, construction, date drilled, location, depth, record of completion, and a schematic of any plugged well illustrating all plugging detail.
- VII. Attach data on the proposed operation, including:
1. Proposed average and maximum daily rate and volume of fluids to be injected;
 2. Whether the system is open or closed;
 3. Proposed average and maximum injection pressure;
 4. Sources and an appropriate analysis of injection fluid and compatibility with the receiving formation if other than reinjected produced water; and
 5. If injection is for disposal purposes into a zone not productive of oil or gas at or within one mile of the proposed well, attach a chemical analysis of the disposal zone formation water (may be measured or inferred from existing literature, studies, nearby wells, etc.).
- *VIII. Attach appropriate geological data on the injection zone including appropriate lithologic detail, geological name, thickness, and depth. Give the geologic name, and depth to bottom of all underground sources of drinking water (aquifers containing waters with total dissolved solids concentrations of 10,000 mg/l or less) overlying the proposed injection zone as well as any such source known to be immediately underlying the injection interval.
- IX. Describe the proposed stimulation program, if any.
- * X. Attach appropriate logging and test data on the well. (If well logs have been filed with the Division they need not be resubmitted.)
- * XI. Attach a chemical analysis of fresh water from two or more fresh water wells (if available and producing) within one mile of any injection or disposal well showing location of wells and dates samples were taken.
- XII. Applicants for disposal wells must make an affirmative statement that they have examined available geologic and engineering data and find no evidence of open faults or any other hydrologic connection between the disposal zone and any underground source of drinking water.
- XIII. Applicants must complete the "Proof of Notice" section on the reverse side of this form.
- XIV. Certification
- I hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.
- Name: Ron Brown Title Petroleum Engineer
Signature: *Ron Brown* Date: 9/21/89
- * If the information required under Sections VI, VIII, X, and XI above has been previously submitted, it need not be duplicated and resubmitted. Please show the date and circumstance of the earlier submittal. Copies of current well logs are attached.

III. WELL DATA

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

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

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

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

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

XIV. PROOF OF NOTICE

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

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

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

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

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

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL #9

ITEM:

III. Well Data

- A. (1) Well Name: H. E. West "A" #9
1980' FSL & 660' FEL
Section 4, T17S, R31E
Eddy County, New Mexico
- (2) Casing Data: (Also see Exhibit "B".)
Surface Casing:
8 5/8" set @ 719', cemented with 100 sx.
Production Casing:
7" set @ 3198', cemented with 200 sx., TOC @
1684' (CBL)
Liners:
4 1/2" set from 2968-3856', cemented with 175 sx.
- (3) Injection Tubing:
2 3/8", 4.7#, 8rd EUE, plastic coated tubing set @
±3185'.
- (4) Packer:
Packer set @ ±3185'.
- B. (1) Injection Formation:
The injection formation will be the Grayburg San Andres.
- (2) Injection Interval:
The injection interval is to be from perforations @ 3360-
3795'.
- (3) Original Purpose of Well:
This well was originally drilled, completed and tested in
the Grayburg San Andres as a producer from the OH interval
3198-3375'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -2-

- (4) Added Perforated Intervals: (Also see Exhibit "B".)
This well was deepened to 3964' and new perforations were added from 3360-3795' for injection purposes.
- (5) Higher/Lower Oil Zones:
The top of the Seven Rivers is @ ±2300', and there is no lower oil zone.

V. Map:
See Exhibit "A".

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -3-

VI. Wells in Area of Review:

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #6

Location: 2005' FNL & 660' FWL, (E) Section 4, T17S, R31E

Completion Date: 2/55

Surface Casing: 8 5/8" set @ 740', cemented with 100 sx.

Production Casing: 7" set @ 3220', cemented with 200 sx.,
TOC @ 1800' (calc.)

Total Depth: 3870'

Completion: Completed as a producer in the Grayburg San Andres through OH 3220-3369'. Deepened to 3870' and produced through OH interval 3220-3870'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #23

Location: 1980' FSL & 1980' FWL, (K) Section 3, T17S, R31E

Completion Date: 9/59

Surface Casing: 8 5/8" set @ 797', cemented with 100 sx.

Production Casing: 5" set @ 3456', cemented with 100 sx.,
TOC @ 2670' (CBL)

Completion: Completed as a Grayburg San Andres producer through perforations 3413-3421' & 3429-3435'. Deepened well to 3557', perforated 3374-3384', and converted to dual injection through new perforations and OH interval 3456-3557'. P&A'd 4/82.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -4-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #2

Location: 660' FNL & 1980' FEL, (B) Section 4, T17S, R31E

Completion Date: 3/48

Surface Casing: 10 3/4" set @ 649', cemented with 125 sx.

Production Casing: 7" set @ 3338', cemented with 150 sx.,
TOC @ 2200' (calc.)

Total Depth: 3494'

Completion: Completed as a producer in the Grayburg from the OH interval 3338-3492'. Added OH perforations from 3340-3365'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #16

Location: 660' FSL & 660' FWL, (M) Section 3, T17S, R31E

Completion Date: 8/58

Surface Casing: 10 3/4" set @ 765', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3673', cemented with 100 sx.,
TOC @ 2660' (CBL)

Liner: 4" set from 3264-3978', cemented with 75 sx.

Total Depth: 3978'

Completion: Completed in the Grayburg San Andres as a producer from perforations 3370-3384' and 3570-3578'. Added perforations from 3333-3341', 3394-3397', 3439-3497' and 3501-3520'. Deepened, ran liner and converted to injection through perforations 3792-3961', 3546-3742' and 3333-3523'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -5-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #7

Location: 660' FNL & 660' FEL, (A) Section 4, T17S, R31E

Completion Date: 6/55

Surface Casing: 8 5/8" set @ 760', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3234', cemented with 200 sx.,
TOC @ 2400' (calc.)

Total Depth: 3883'

Completion: Completed as a producer in the Grayburg San Andres through the OH interval 3234-3386'. Converted to injection through OH interval 3234-3386'. Deepened well to 3883' and injected through OH interval 3234-3883'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #10

Location: 660' FNL & 660' FWL, (D) Section 3, T17S, R31E

Completion Date: 3/56

Surface Casing: 8 5/8" set @ 788', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3261', cemented with 200 sx.,
TOC @ 2070' (CBL)

Total Depth: 3670'

Completion: Completed as a producer in the Grayburg OH interval 3261-3670'. P&A'd well 2/81.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -6-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #5

Location: 1980' FNL & 1980' FWL, (F) Section 4, T17S, R31E

Completion Date: 10/50

Surface Casing: 10 3/4" set @ 682', cemented with 150 sx.

Production Casing: 7" set @ 3186', cemented with 150 sx.,
TOC @ 2100' (calc.)

Liner: 4 1/2" set from 3105-3794', cemented with 500 sx.

Total Depth: 3841'

Completion: Completed as a producer in the Grayburg San Andres from the OH interval 3186-3487'. Deepened to 3841' and produced from OH interval 3186-3841'. Ran liner and completed through perforations 3393-3425', 3472-3483' and 3548-3558'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #28

Location: 660' FNL & 660' FEL, (A) Section 9, T17S, R31E

Completion Date: 12/63

Surface Casing: 8 5/8" set @ 550', cemented with 240 sx.

Production Casing: 5 1/2" set @ 3850', cemented with 300 sx.,
TOC @ 1600' (calc.)

Total Depth: 3850'

Completion: Completed in the Grayburg San Andres as an injector through perforations 3289-3849'. Added new perforations from 3270-3823'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -7-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #11

Location: 1980' FSL & 1980' FWL, (K) Section 4, T17S, R31E

Completion Date: 2/54

Surface Casing: 8 5/8" set @ 683', cemented with 100 sx.

Production Casing: 7" set @ 3146', cemented with 200 sx.,
TOC @ 1000' (calc.)

Liner: 4 1/2" set from 3071-3574', cemented with 540 sx.

Total Depth: 3574'

Completion: Completed in the Grayburg San Andres as a producer from the OH interval 3146-3574'. Converted to injector through OH. Ran liner and converted to dual injector with the addition of perforations from 3206-3566'. Returned to single injection through existing perforations.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #14

Location: 720' FSL & 1980' FEL, (O) Section 4, T17S, R31E

Completion Date: 12/88

Surface Casing: 8 5/8" set @ 542', cemented with 350 sx.

Production Casing: 5 1/2" set @ 3935', cemented with 1900 sx.,
TOC @ surf. (circ.)

Total Depth: 3935'

Completion: Completed in the Grayburg San Andres as a producer from perforations 3214-3467', 3492-3678' and 3709-3863' (CIBP set @ 3828'). Converted to injection through existing perforations.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -8-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #4

Location: 1980' FNL & 1980' FEL, (G) Section 4, T17S, R31E

Completion Date: 9/54

Surface Casing: 8 5/8" set @ 706', cemented with 100 sx.

Production Casing: 7" set @ 3169', cemented with 200 sx.,
TOC @ 2000' (calc.)

Liner: 4 1/2" set from 3068-3841', cemented with 95 sx.

Total Depth: 3842'

Completion: Completed in the Grayburg as a producer from the OH interval 3326-3336'. Deepened well, ran liner and converted to dual injector through perforations from 3331-3822'. Converted to triple injector with the addition of perforations from 3242-3398'. Re-turned to single injector through 3242-3822'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #33

Location: 1980' FSL & 660' FWL, (L) Section 3, T17S, R31E

Completion Date: 8/88

Surface Casing: 8 5/8" set @ 625', cemented with 300 sx.

Production Casing: 5 1/2" set @ 4057', cemented with 1300 sx.,
TOC @ 2262' (CBL)

Total Depth: 4057'

Completion: Completed as a producer in the Grayburg San Andres through perforations 3367-3994'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -9-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #5

Location: 1980' FSL & 1980' FEL, (J) Section 4, T17S, R31E

Completion Date: 12/54

Surface Casing: 8 5/8" set @ 695', cemented with 100 sx.

Production Casing: 7" set @ 3169', cemented with 200 sx.,
TOC @ 1000' (calc.)

Total Depth: 3650'

Completion: Completed as a producer in the Grayburg San Andres
through OH 3169-3650'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #8

Location: 1980' FNL & 660' FWL, (E) Section 3, T17S, R31E

Completion Date: 9/55

Surface Casing: 8 5/8" set @ 769', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3246', cemented with 200 sx.,
TOC @ 2093' (CBL)

Liners: 4" set from 2985-3902', circulated 75 sx.
2 3/8" set from 3022-3901', 100' cmt. on top and 200'
cmt. on bottom

Total Depth: 3902'

Completion: Completed as a producer from the Grayburg San Andres
OH interval 3246-3404'. Converted to injection
through OH interval 3246-3396'. Deepened to 3902'
and injected through OH interval 3246-3902'. Plugged
back to 3750' with a sand bridge plug. P&A'd 4/82.
Re-entered well, ran liners and returned to injection
through perforations 3360-3795'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -10-

VII. Proposed Operations Data:

- (1) Average daily injection rate - 150 BWPD
Maximum daily injection rate - 200 BWPD
- (2) Type of system - closed
- (3) Average injection pressure - 1900 psi
Maximum injection pressure - 2200 psi
- (4) Source of injection water - water produced from the Keel West plus make-up water from the Keel West fresh water system.

VIII. Geological Data:

The proposed injection zone is in the Grayburg San Andres from perforations @ 3360-3795'. The Grayburg formation consists primarily of quartz sand with cementation. The San Andres formation consists primarily of dolomite with intermingled stringers of quartz sand with dolomite cementation.

Surface formation is cretaceous and has no known source of drinking water. Also, there are no known underground sources of drinking water overlying or underlying the proposed injection zone.

IX. Stimulation Program:

Will acidize perforations 3360-3795' with 10,000 gal. 15% NEFE acid.

X. Well Logs:

Copies of the current well logs are attached.

XI. Chemical Analysis of Fresh Water:

There are no known producing fresh water wells within one mile of the proposed injection well.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -11-

XII. Upon examination of the available geologic and engineering data, no evidence of open faults or any other hydrologic connection between the disposal zone and any underground source of drinking water was found.

SURFACE OWNER:

Federal land

OFFSET OPERATORS:

None

SENDER: Complete Items 1 and 2 when additional services are desired, and complete Items 3 and 4.
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1. ☒ Show to whom delivered, date, and addressee's address. 2. ☐ Restricted Delivery
↑(Extra charge)↑ ↑(Extra charge)↑

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5. Signature — Addressee <div style="text-align: center;">X</div>	8. Addressee's Address (ONLY if requested and fee paid)
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PS Form 3811, Mar. 1987

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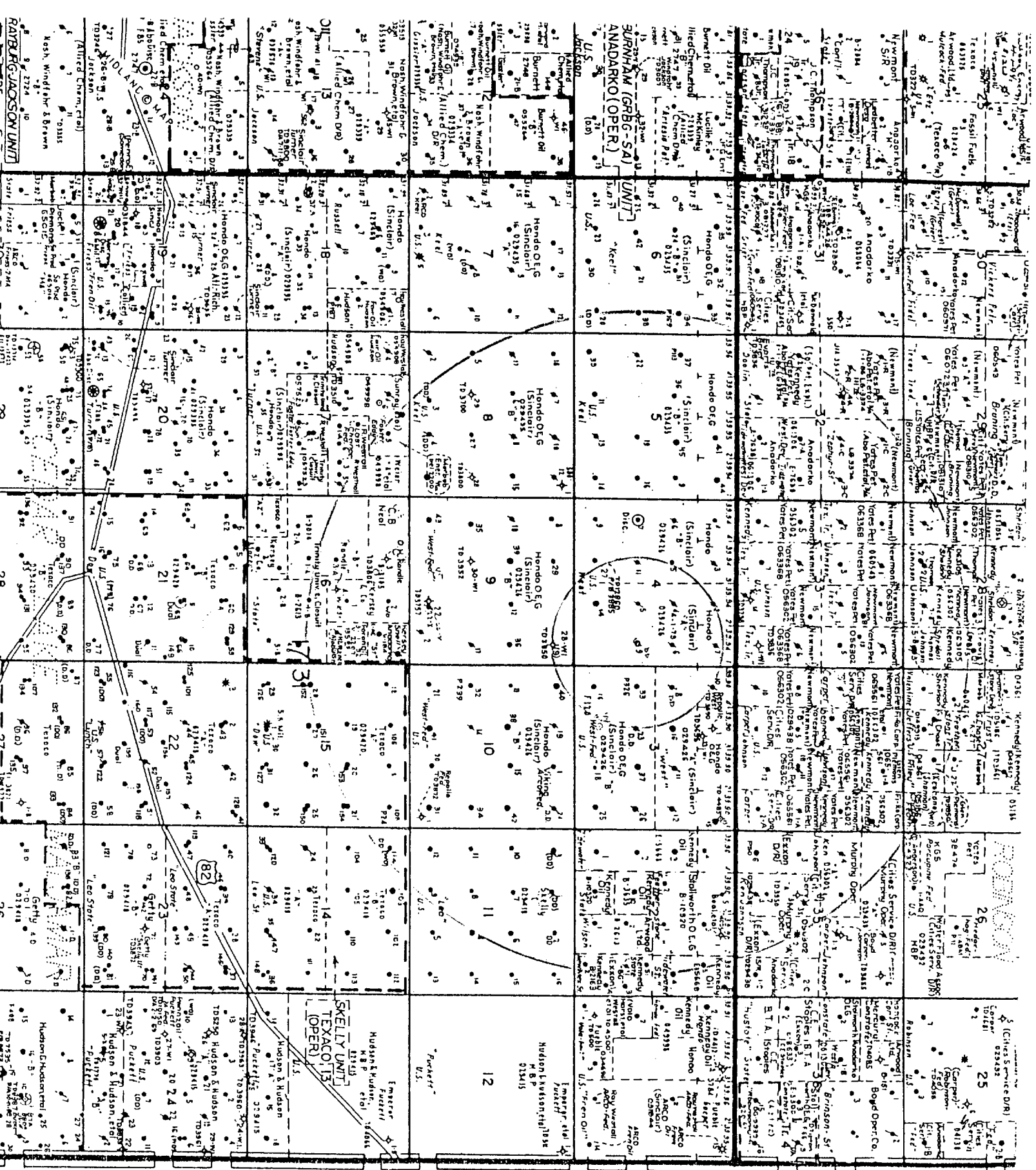
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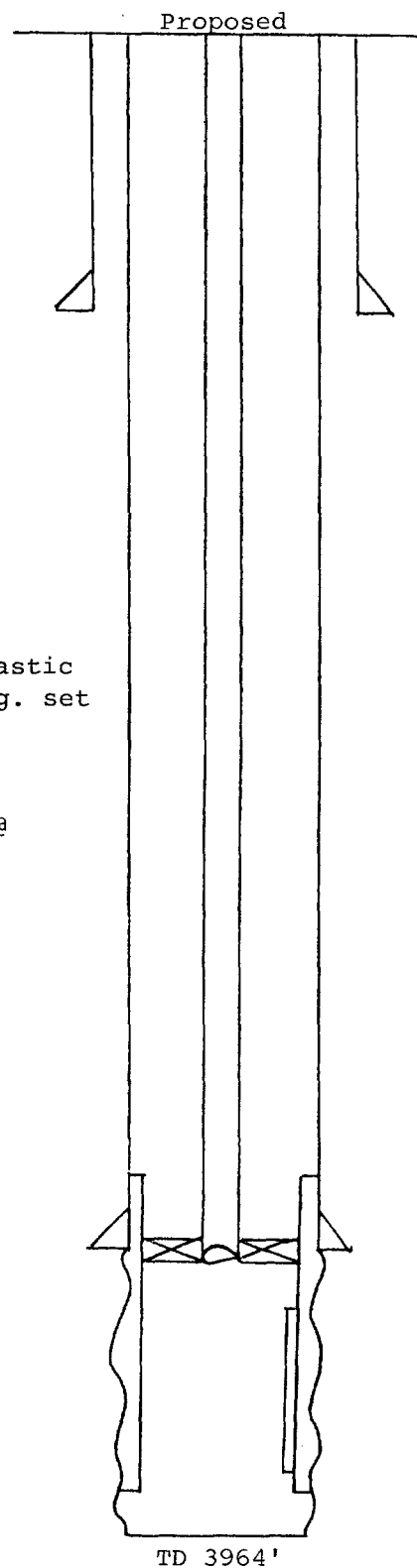
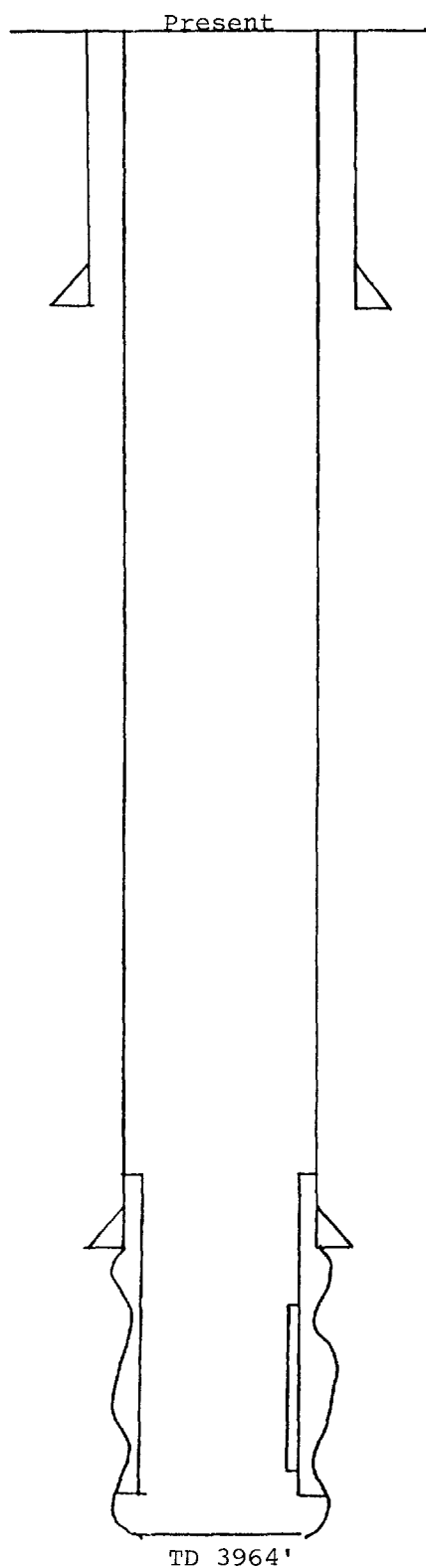
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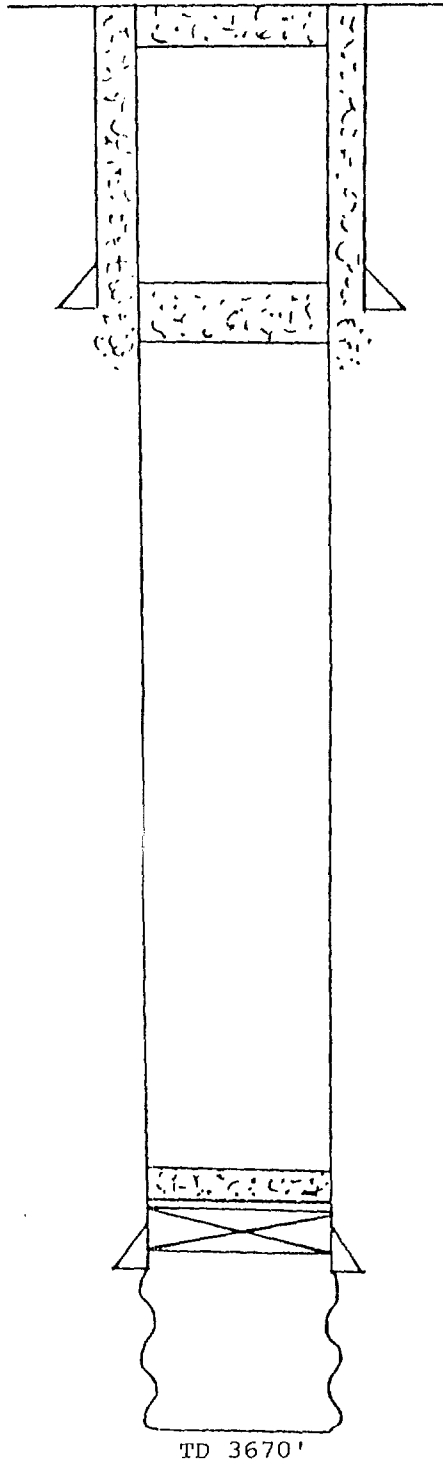


EXHBIT "A"
Hondo Oil & Gas Company
H. E. West "A" #9
Sec.4-T17S-R31E
Eddy County, New Mexico

H. E. WEST "A" WELL NO. 9
 1980' FSL & 660' FEL
 Section 4, T-17S, R-31E
 Eddy County, New Mexico



HONDO OIL & GAS COMPANY
H. E. WEST "A" #10
660' FNL & 660' FWL, Sec.3-T17S-R31E
Eddy Co., NM



cmt. plug set from 90'-surf.

17 1/2 sx. cmt. plug set from 850-700'

8 5/8" csg. set @ 788', cmt. w/100 sx.

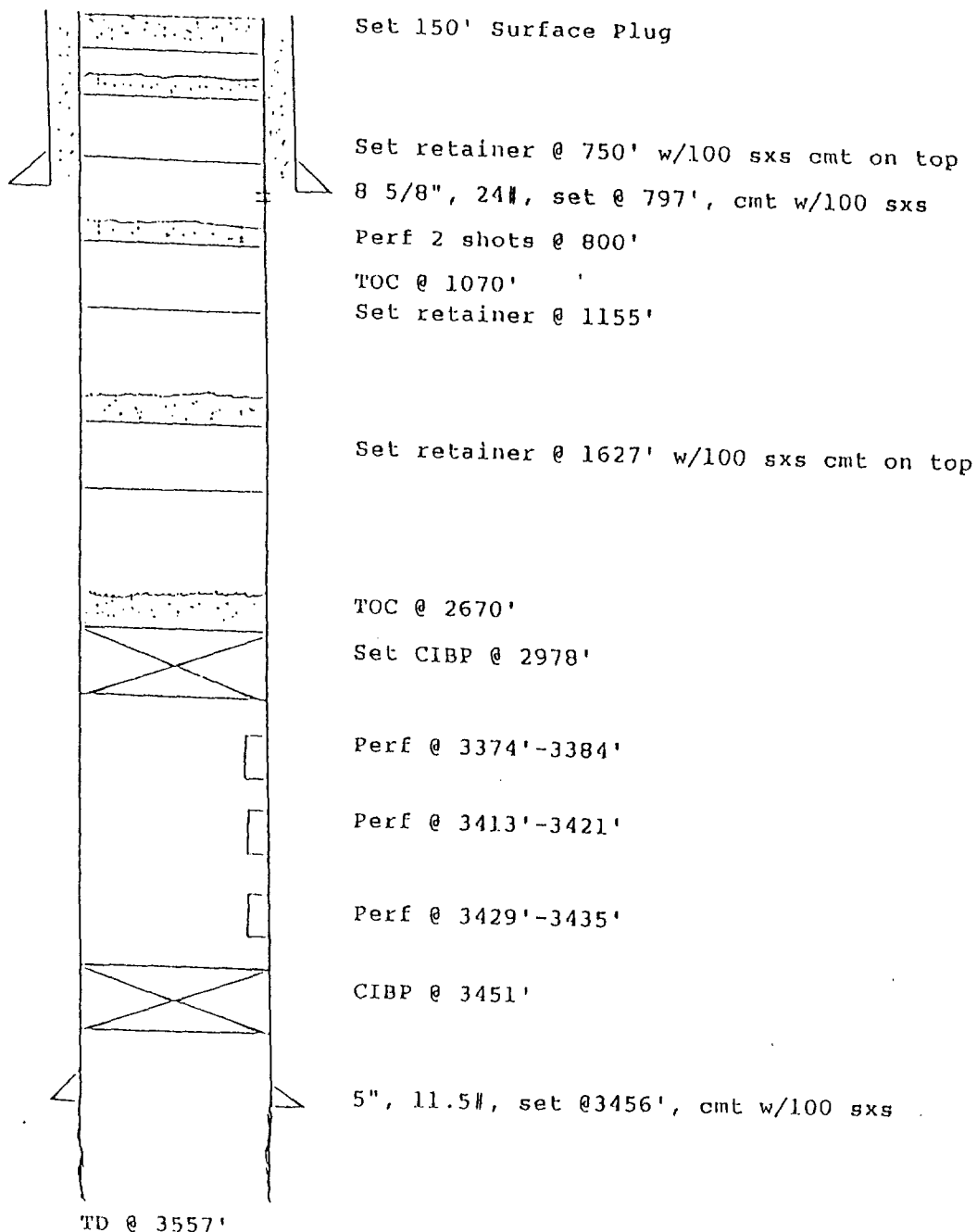
circ. 184 sx. cmt. between 8 5/8" csg. & 5 1/2" csg.
from 894'-surf.

12 sx. cmt. plug set from 3108-3006'

CIBP set @ 3110'

5 1/2" csg. set @ 3261', cmt. w/200 sx.
TOC @ 2070' (CBL)

HONDO OIL & GAS COMPANY
H. E. WEST "B" #23
1980' FNL & 1980' FWL
Section 3, T-17S, R-31E



Hondo Oil & Gas Company

Box 2208
Roswell, New Mexico 88202
(505)625-8700



September 21, 1989

Oil Conservation Division
P. O. Box 2088
Santa Fe, NM 87501

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 9
1980' FSL & 660' FEL, Section 4, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

Please find enclosed Hondo Oil & Gas Company's application for permit to convert the above captioned well into a water injection well.

Copies have been submitted to the surface owner, the offset operators and the NMOCD office in Artesia.

If you should have any questions, please contact Ron Brown at (505)625-6735.

Sincerely,

A handwritten signature in black ink that reads 'Lisa Bohannon'. The script is cursive and fluid, with the first letters of the first and last names being capitalized and prominent.

Lisa Bohannon
Engineering Technician

Encl.

Hondo Oil & Gas Company

Box 2208
Roswell, New Mexico 88202
(505)625-8700



September 21, 1989

Bureau of Land Management
P. O. Box 1778
Carlsbad, NM 88220

RE: Application for Permit to Convert to Water Injection
H. E. West "A" Well No. 9
1980' FSL & 660' FEL, Section 4, T-17S, R-31E
Eddy County, New Mexico

Gentlemen:

According to the Oil Conservation Division Rule 701, a copy of any injection well permit application must be sent to the offset operators and surface owner. Enclosed is a copy of our application for administrative approval to convert the above captioned well to a water injection well.

If you should have any questions, please contact Ron Brown at (505)625-6735.

Sincerely,

A handwritten signature in black ink that reads "Lisa Bohannon". The script is cursive and fluid, with the first letters of the first and last names being capitalized and prominent.

Lisa Bohannon
Engineering Technician

Encl.

APPLICATION FOR AUTHORIZATION TO INJECT

- I. Purpose: ☒ Secondary Recovery ☐ Pressure Maintenance ☐ Disposal ☐ Storage
Application qualifies for administrative approval? ☒ yes ☐ no
- II. Operator: Hondo Oil & Gas Company
Address: P. O. Box 2208, Roswell, NM 88202
Contact party: Ron Brown Phone: (505)625-6735
- III. Well data: Complete the data required on the reverse side of this form for each well proposed for injection. Additional sheets may be attached if necessary.
- IV. Is this an expansion of an existing project? ☒ yes ☐ no
If yes, give the Division order number authorizing the project R-2268 & WFX-585.
- V. Attach a map that identifies all wells and leases within two miles of any proposed injection well with a one-half mile radius circle drawn around each proposed injection well. This circle identifies the well's area of review.
- * VI. Attach a tabulation of data on all wells of public record within the area of review which penetrate the proposed injection zone. Such data shall include a description of each well's type, construction, date drilled, location, depth, record of completion, and a schematic of any plugged well illustrating all plugging detail.
- VII. Attach data on the proposed operation, including:
1. Proposed average and maximum daily rate and volume of fluids to be injected;
 2. Whether the system is open or closed;
 3. Proposed average and maximum injection pressure;
 4. Sources and an appropriate analysis of injection fluid and compatibility with the receiving formation if other than reinjected produced water; and
 5. If injection is for disposal purposes into a zone not productive of oil or gas at or within one mile of the proposed well, attach a chemical analysis of the disposal zone formation water (may be measured or inferred from existing literature, studies, nearby wells, etc.).
- *VIII. Attach appropriate geological data on the injection zone including appropriate lithologic detail, geological name, thickness, and depth. Give the geologic name, and depth to bottom of all underground sources of drinking water (aquifers containing waters with total dissolved solids concentrations of 10,000 mg/l or less) overlying the proposed injection zone as well as any such source known to be immediately underlying the injection interval.
- IX. Describe the proposed stimulation program, if any.
- * X. Attach appropriate logging and test data on the well. (If well logs have been filed with the Division they need not be resubmitted.)
- * XI. Attach a chemical analysis of fresh water from two or more fresh water wells (if available and producing) within one mile of any injection or disposal well showing location of wells and dates samples were taken.
- XII. Applicants for disposal wells must make an affirmative statement that they have examined available geologic and engineering data and find no evidence of open faults or any other hydrologic connection between the disposal zone and any underground source of drinking water.
- XIII. Applicants must complete the "Proof of Notice" section on the reverse side of this form.
- XIV. Certification
- I hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.
- Name: Ron Brown Title Petroleum Engineer
Signature: *Ron Brown* Date: 9/21/89
- * If the information required under Sections VI, VIII, X, and XI above has been previously submitted, it need not be duplicated and resubmitted. Please show the date and circumstance of the earlier submittal. Copies of current well logs are attached.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL #9

ITEM:

III. Well Data

- A. (1) Well Name: H. E. West "A" #9
1980' FSL & 660' FEL
Section 4, T17S, R31E
Eddy County, New Mexico
- (2) Casing Data: (Also see Exhibit "B".)
Surface Casing:
8 5/8" set @ 719', cemented with 100 sx.
Production Casing:
7" set @ 3198', cemented with 200 sx., TOC @
1684' (CBL)
Liners:
4 1/2" set from 2968-3856', cemented with 175 sx.
- (3) Injection Tubing:
2 3/8", 4.7#, 8rd EUE, plastic coated tubing set @
±3185'.
- (4) Packer:
Packer set @ ±3185'.
- B. (1) Injection Formation:
The injection formation will be the Grayburg San Andres.
- (2) Injection Interval:
The injection interval is to be from perforations @ 3360-
3795'.
- (3) Original Purpose of Well:
This well was originally drilled, completed and tested in
the Grayburg San Andres as a producer from the OH interval
3198-3375'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -2-

- (4) Added Perforated Intervals: (Also see Exhibit "B".)
This well was deepened to 3964' and new perforations were added from 3360-3795' for injection purposes.
- (5) Higher/Lower Oil Zones:
The top of the Seven Rivers is @ ±2300', and there is no lower oil zone.

V. Map:
See Exhibit "A".

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -3-

VI. Wells in Area of Review:

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #6

Location: 2005' FNL & 660' FWL, (E) Section 4, T17S, R31E

Completion Date: 2/55

Surface Casing: 8 5/8" set @ 740', cemented with 100 sx.

Production Casing: 7" set @ 3220', cemented with 200 sx.,
TOC @ 1800' (calc.)

Total Depth: 3870'

Completion: Completed as a producer in the Grayburg San Andres through OH 3220-3369'. Deepened to 3870' and produced through OH interval 3220-3870'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #23

Location: 1980' FSL & 1980' FWL, (K) Section 3, T17S, R31E

Completion Date: 9/59

Surface Casing: 8 5/8" set @ 797', cemented with 100 sx.

Production Casing: 5" set @ 3456', cemented with 100 sx.,
TOC @ 2670' (CBL)

Completion: Completed as a Grayburg San Andres producer through perforations 3413-3421' & 3429-3435'. Deepened well to 3557', perforated 3374-3384', and converted to dual injection through new perforations and OH interval 3456-3557'. P&A'd 4/82.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -4-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #2

Location: 660' FNL & 1980' FEL, (B) Section 4, T17S, R31E

Completion Date: 3/48

Surface Casing: 10 3/4" set @ 649', cemented with 125 sx.

Production Casing: 7" set @ 3338', cemented with 150 sx.,
TOC @ 2200' (calc.)

Total Depth: 3494'

Completion: Completed as a producer in the Grayburg from the OH interval 3338-3492'. Added OH perforations from 3340-3365'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #16

Location: 660' FSL & 660' FWL, (M) Section 3, T17S, R31E

Completion Date: 8/58

Surface Casing: 10 3/4" set @ 765', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3673', cemented with 100 sx.,
TOC @ 2660' (CBL)

Liner: 4" set from 3264-3978', cemented with 75 sx.

Total Depth: 3978'

Completion: Completed in the Grayburg San Andres as a producer from perforations 3370-3384' and 3570-3578'. Added perforations from 3333-3341', 3394-3397', 3439-3497' and 3501-3520'. Deepened, ran liner and converted to injection through perforations 3792-3961', 3546-3742' and 3333-3523'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -5-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #7

Location: 660' FNL & 660' FEL, (A) Section 4, T17S, R31E

Completion Date: 6/55

Surface Casing: 8 5/8" set @ 760', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3234', cemented with 200 sx.,
TOC @ 2400' (calc.)

Total Depth: 3883'

Completion: Completed as a producer in the Grayburg San Andres through the OH interval 3234-3386'. Converted to injection through OH interval 3234-3386'. Deepened well to 3883' and injected through OH interval 3234-3883'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #10

Location: 660' FNL & 660' FWL, (D) Section 3, T17S, R31E

Completion Date: 3/56

Surface Casing: 8 5/8" set @ 788', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3261', cemented with 200 sx.,
TOC @ 2070' (CBL)

Total Depth: 3670'

Completion: Completed as a producer in the Grayburg OH interval 3261-3670'. P&A'd well 2/81.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -6-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #5

Location: 1980' FNL & 1980' FWL, (F) Section 4, T17S, R31E

Completion Date: 10/50

Surface Casing: 10 3/4" set @ 682', cemented with 150 sx.

Production Casing: 7" set @ 3186', cemented with 150 sx.,
TOC @ 2100' (calc.)

Liner: 4 1/2" set from 3105-3794', cemented with 500 sx.

Total Depth: 3841'

Completion: Completed as a producer in the Grayburg San Andres from the OH interval 3186-3487'. Deepened to 3841' and produced from OH interval 3186-3841'. Ran liner and completed through perforations 3393-3425', 3472-3483' and 3548-3558'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #28

Location: 660' FNL & 660' FEL, (A) Section 9, T17S, R31E

Completion Date: 12/63

Surface Casing: 8 5/8" set @ 550', cemented with 240 sx.

Production Casing: 5 1/2" set @ 3850', cemented with 300 sx.,
TOC @ 1600' (calc.)

Total Depth: 3850'

Completion: Completed in the Grayburg San Andres as an injector through perforations 3289-3849'. Added new perforations from 3270-3823'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -7-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #11

Location: 1980' FSL & 1980' FWL, (K) Section 4, T17S, R31E

Completion Date: 2/54

Surface Casing: 8 5/8" set @ 683', cemented with 100 sx.

Production Casing: 7" set @ 3146', cemented with 200 sx.,
TOC @ 1000' (calc.)

Liner: 4 1/2" set from 3071-3574', cemented with 540 sx.

Total Depth: 3574'

Completion: Completed in the Grayburg San Andres as a producer from the OH interval 3146-3574'. Converted to injector through OH. Ran liner and converted to dual injector with the addition of perforations from 3206-3566'. Returned to single injection through existing perforations.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #14

Location: 720' FSL & 1980' FEL, (O) Section 4, T17S, R31E

Completion Date: 12/88

Surface Casing: 8 5/8" set @ 542', cemented with 350 sx.

Production Casing: 5 1/2" set @ 3935', cemented with 1900 sx.,
TOC @ surf. (circ.)

Total Depth: 3935'

Completion: Completed in the Grayburg San Andres as a producer from perforations 3214-3467', 3492-3678' and 3709-3863' (CIBP set @ 3828'). Converted to injection through existing perforations.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -8-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #4

Location: 1980' FNL & 1980' FEL, (G) Section 4, T17S, R31E

Completion Date: 9/54

Surface Casing: 8 5/8" set @ 706', cemented with 100 sx.

Production Casing: 7" set @ 3169', cemented with 200 sx.,
TOC @ 2000' (calc.)

Liner: 4 1/2" set from 3068-3841', cemented with 95 sx.

Total Depth: 3842'

Completion: Completed in the Grayburg as a producer from the OH interval 3326-3336'. Deepened well, ran liner and converted to dual injector through perforations from 3331-3822'. Converted to triple injector with the addition of perforations from 3242-3398'. Returned to single injector through 3242-3822'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "B" #33

Location: 1980' FSL & 660' FWL, (L) Section 3, T17S, R31E

Completion Date: 8/88

Surface Casing: 8 5/8" set @ 625', cemented with 300 sx.

Production Casing: 5 1/2" set @ 4057', cemented with 1300 sx.,
TOC @ 2262' (CBL)

Total Depth: 4057'

Completion: Completed as a producer in the Grayburg San Andres through perforations 3367-3994'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -9-

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #5

Location: 1980' FSL & 1980' FEL, (J) Section 4, T17S, R31E

Completion Date: 12/54

Surface Casing: 8 5/8" set @ 695', cemented with 100 sx.

Production Casing: 7" set @ 3169', cemented with 200 sx.,
TOC @ 1000' (calc.)

Total Depth: 3650'

Completion: Completed as a producer in the Grayburg San Andres
through OH 3169-3650'.

Operator: Hondo Oil & Gas Company

Well Name: H. E. West "A" #8

Location: 1980' FNL & 660' FWL, (E) Section 3, T17S, R31E

Completion Date: 9/55

Surface Casing: 8 5/8" set @ 769', cemented with 100 sx.

Production Casing: 5 1/2" set @ 3246', cemented with 200 sx.,
TOC @ 2093' (CBL)

Liners: 4" set from 2985-3902', circulated 75 sx.
2 3/8" set from 3022-3901', 100' cmt. on top and 200'
cmt. on bottom

Total Depth: 3902'

Completion: Completed as a producer from the Grayburg San Andres
OH interval 3246-3404'. Converted to injection
through OH interval 3246-3396'. Deepened to 3902'
and injected through OH interval 3246-3902'. Plugged
back to 3750' with a sand bridge plug. P&A'd 4/82.
Re-entered well, ran liners and returned to injection
through perforations 3360-3795'.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -10-

VII. Proposed Operations Data:

- (1) Average daily injection rate - 150 BWPD
Maximum daily injection rate - 200 BWPD
- (2) Type of system - closed
- (3) Average injection pressure - 1900 psi
Maximum injection pressure - 2200 psi
- (4) Source of injection water - water produced from the Keel West plus make-up water from the Keel West fresh water system.

VIII. Geological Data:

The proposed injection zone is in the Grayburg San Andres from perforations @ 3360-3795'. The Grayburg formation consists primarily of quartz sand with cementation. The San Andres formation consists primarily of dolomite with intermingled stringers of quartz sand with dolomite cementation.

Surface formation is cretaceous and has no known source of drinking water. Also, there are no known underground sources of drinking water overlying or underlying the proposed injection zone.

IX. Stimulation Program:

Will acidize perforations 3360-3795' with 10,000 gal. 15% NEFE acid.

X. Well Logs:

Copies of the current well logs are attached.

XI. Chemical Analysis of Fresh Water:

There are no known producing fresh water wells within one mile of the proposed injection well.

HONDO OIL & GAS COMPANY
APPLICATION FOR AUTHORITY TO INJECT
H. E. WEST "A" WELL NO. 9
Page -11-

XII. Upon examination of the available geologic and engineering data, no evidence of open faults or any other hydrologic connection between the disposal zone and any underground source of drinking water was found.

SURFACE OWNER:

Federal land

OFFSET OPERATORS:

None

SENDER: Complete Items 1 and 2 when additional services are desired, and complete Items 3 and 4.
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3. Article Addressed to: <div style="text-align: center;">Bureau of Land Management P. O. Box 1778 Carlsbad, NM 88220</div>	4. Article Number <div style="text-align: center;">P663397698</div> Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input type="checkbox"/> COD <input type="checkbox"/> Express Mail Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature — Addressee X	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature — Agent X	
7. Date of Delivery	

PS Form 3811, Mar. 1987

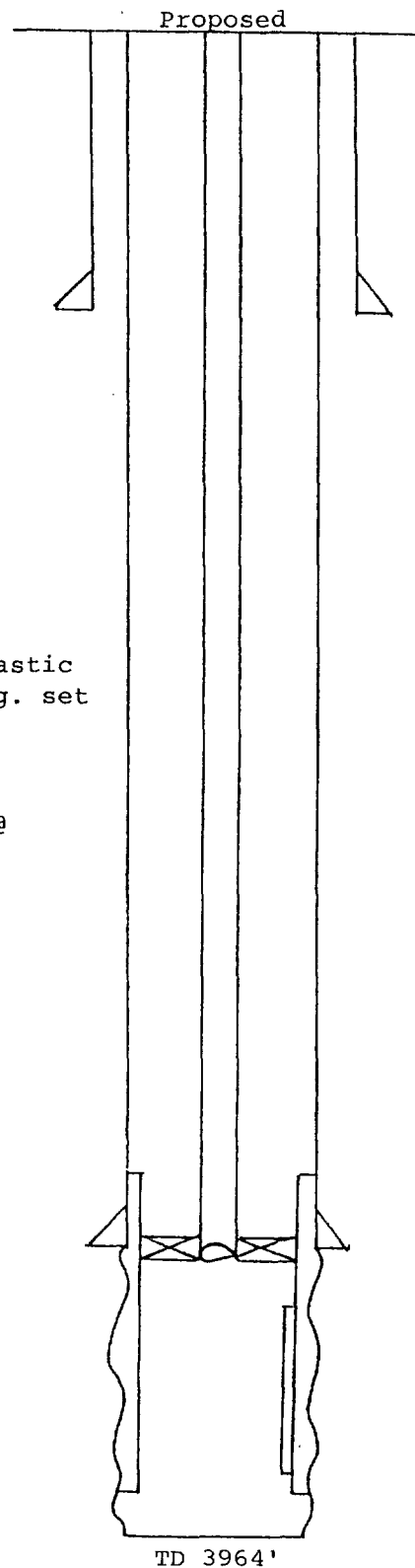
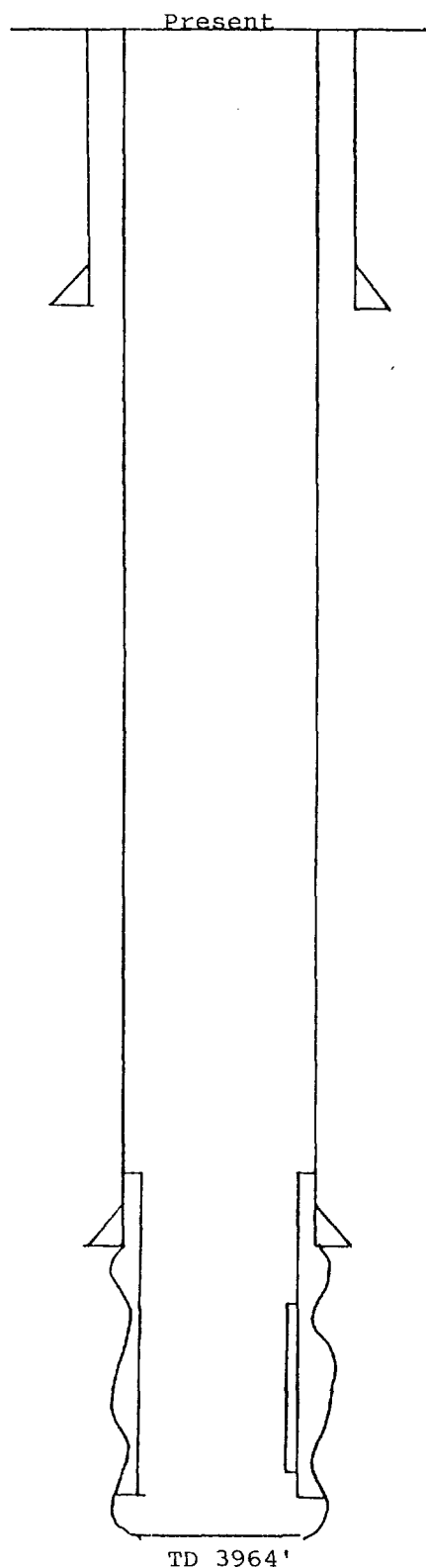
* U.S.G.P.O. 1987-178-268

DOMESTIC RETURN RECEIPT

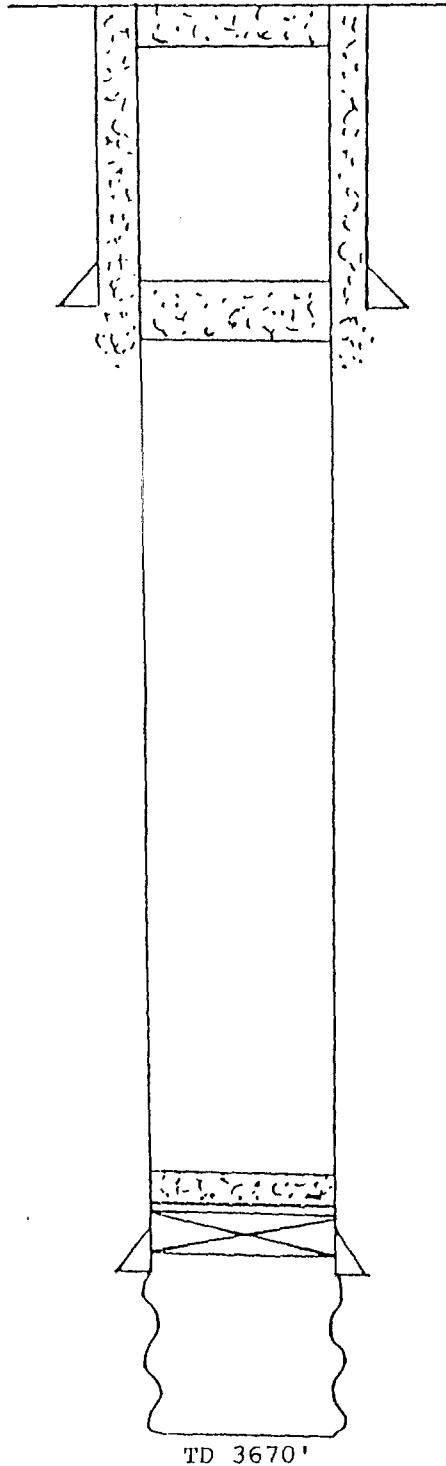


EXHBIT "A"
Hondo Oil & Gas Company
H. E. West "A" #9
Sec.4-T17S-R31E
Eddy County, New Mexico

H. E. WEST "A" WELL NO. 9
1980' FSL & 660' FEL
Section 4, T-17S, R-31E
Eddy County, New Mexico



HONDO OIL & GAS COMPANY
H. E. WEST "A" #10
660' FNL & 660' FWL, Sec.3-T17S-R31E
Eddy Co., NM



cmt. plug set from 90'-surf.

17 1/2 sx. cmt. plug set from 850-700'

8 5/8" csg. set @ 788', cmt. w/100 sx.

circ. 184 sx. cmt. between 8 5/8" csg. & 5 1/2" csg.
from 894'-surf.

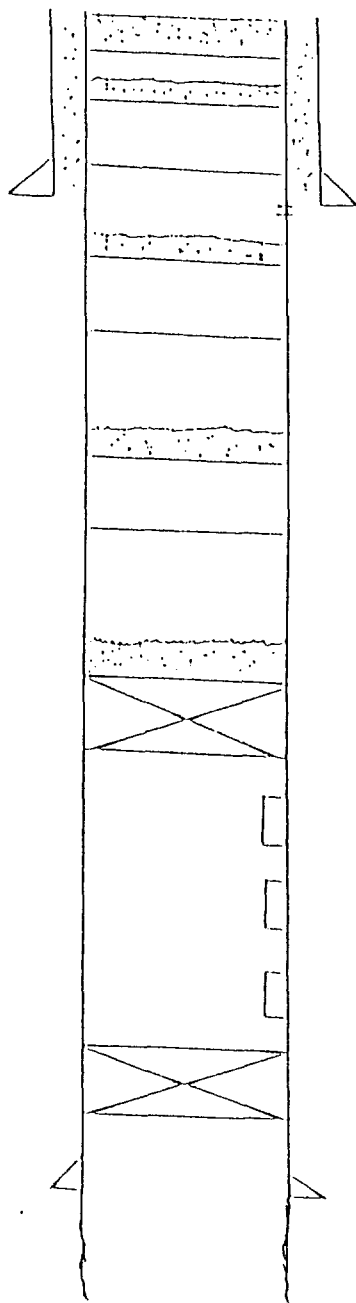
12 sx. cmt. plug set from 3108-3006'

CIBP set @ 3110'

5 1/2" csg. set @ 3261', cmt. w/200 sx.

TOC @ 2070' (CBL)

HONDO OIL & GAS COMPANY
 H. E. WEST "B" #23
 1980' FNL & 1980' FWL
 Section 3, T-17S, R-31E



Set 150' Surface Plug

Set retainer @ 750' w/100 sxs cmt on top
 8 5/8", 24#, set @ 797', cmt w/100 sxs

Perf 2 shots @ 800'

TOC @ 1070'

Set retainer @ 1155'

Set retainer @ 1627' w/100 sxs cmt on top

TOC @ 2670'

Set CIBP @ 2978'

Perf @ 3374'-3384'

Perf @ 3413'-3421'

Perf @ 3429'-3435'

CIBP @ 3451'

5", 11.5#, set @ 3456', cmt w/100 sxs

TD @ 3557'



STATE OF NEW MEXICO

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

OCTOBER 7, 1989

GARREY CARRUTHERS
GOVERNOR

Hondo Oil & Gas Company
Box 2208
Roswell, New Mexico 88202

OCT 12 '89

O. C. D.
ARTESIA, OFFICE

POST OFFICE BOX 2088
STATE LAND OFFICE BUILDING
SANTA FE, NEW MEXICO 87504
(800) 827 2888

Attention: Ron Brown

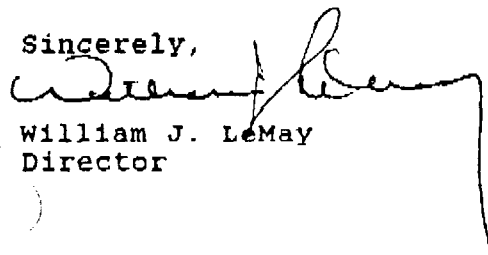
Dear Mr. Brown:

Reference is made to your request dated September 13 and 21, 1989, to reactivate the injection status on the H.E. West "A" Well Nos. 8 and 9 located respectively 1980 feet from the North line and 660 feet from the West line (Unit E) of Section 3 and 1980 feet from the South line and 660 feet from the East line (Unit E) of Section 1, both in Township 17 South, Range 31 East, NMPM, Eddy County, New Mexico. It is our understanding that both of these wells were previously approved for injection by Division Order No. R-2268, dated June 21, 1962, for use as water injection wells within the Keel West Waterflood Project, but have subsequently been plugged and abandoned. It appears that sufficient information has been provided and that both wells qualify for injection.

You are therefore authorized to utilize the H.E. West Well Nos. 8 and 9, as described above, to inject water into the Grayburg/San Andres formation, Keel West Waterflood Project, subject to the following conditions:

1. The casing in each of the subject wells shall be pressure tested from the surface to the proposed packer setting depth to assure the integrity of such casing.
2. Both of the subject wells shall be limited to a maximum surface injection pressure not to exceed 672 psi.
3. The applicant shall notify the supervisor of the Division's Artesia district office of the date and time of installation of injection equipment and of the mechanical integrity test in order that the same may be witnessed.
4. The subject wells shall be equipped and operated in accordance with Division Rule Nos. 702-706.

Sincerely,


William J. LeMay
Director

xc: OCD-Artesia
T. Gallegos, Case File-2576



TONEY ANAYA
GOVERNOR

STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENT
OIL CONSERVATION DIVISION

50 YEARS



1935 - 1985

March 27, 1985

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

line 2576

N. H. Truitt, Area
Production Superintendent
ARCO Oil and Gas Company
P. O. Box 1710
Hobbs, New Mexico 88240

Dear Mr. Truitt:

Your letter of March 15, 1985, to Mr. Les Clements relative to temporary shut-in of Keel West Area Waterflood injection wells has been forwarded to me for reply.

As this shut-in period is for a period of one year and is for the purpose of evaluating how and if the waterflood project should be continued, this will not be considered as a shut-in period under Division Rule 705B. However, prior to April 1, 1986, ARCO must contact the supervisor of the Division's Artesia district office with a plan for restarting the project, extending the shut-in period, or the plugging of injection wells which are not to be used for injection or production.

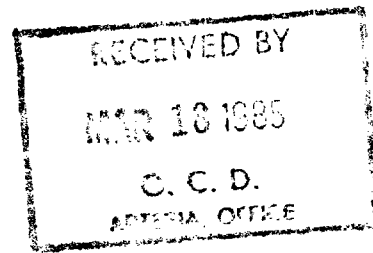
Sincerely,

R. L. STAMETS
Director

RLS/fd

cc: Prentiss Childs
Les Clements

ARCO Oil and Gas Company
Permian District - West Area
P.O. Box 1710
Hobbs, New Mexico 88240
Telephone 505 392 3551



March 15, 1985

Mr. Les Clements
New Mexico Oil Conservation Division
Drawer DD
Artesia, New Mexico 88210

Re: Keel West Waterflood
Sections 3, 4, 5, 6, 7, 8, 9
T17S, R31E, Eddy County, New Mexico

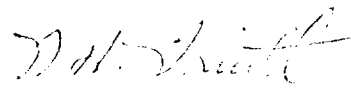
Dear Mr. Clements:

ARCO Oil and Gas Company respectfully requests approval to shut-in the water injection wells of the Keel West Waterflood for a test period of one year beginning April 1, 1985. During this test period, ARCO will monitor the inactive injectors to ensure the integrity of the casing. If any problems arise, ARCO will address them immediately. After one year, each injection well will either be returned to injection, converted to a producer or plugged and abandoned.

The proposed test period will allow ARCO to fully evaluate the effectiveness of this waterflood and complete its current reservoir study of this flood. Currently, the Keel West Waterflood operations are not profitable due to declining production rates and high operating costs. Terminating the injection should return the leases to a profitable status. The granting of this request will allow ARCO to determine the most efficient way to recover the maximum amount of oil from this field without waste.

If you should have any questions or need further information regarding this proposal, please feel free to contact me.

Very truly yours,


N. H. Truitt
Area Production Supt.

NHT/JRL:jc



100-2576

SINCLAIR OIL & GAS COMPANY

520 East Broadway
Albuquerque, New Mexico

APR 26 1963
APR 26 1963

New Mexico Oil Conservation Commission
P. O. Drawer D D
Artesia, New Mexico

Re: Keel-West Waterflood Project
Grayburg Jackson Pool
Eddy County, New Mexico

Gentlemen:

Response to water injection has been received on our H. E. West "A" and "B" leases. The present total project allowable is 71 Barrels per day. Present production is 125 barrels per day and appears to be increasing rapidly. The maximum allowable which this project will be eligible to receive according to Rule 701-E-3 is 798 barrels per day.

An allowable increase of 130 barrels per day is requested on the following wells.

<u>Well Name</u>	<u>Present Allowable</u>	<u>Requested Increase</u>
H. E. West "A" #2	9	45
" " #5	5	20
" " #6	2	35
" " #10	15	5
H. E. West "B" #4	4	10
" " #5	3	10
" " #7	3	5
Total	41	130

Yours very truly,

SINCLAIR OIL & GAS COMPANY

Fred Burns,
Dist. Supt.

cc: OCC - Santa Fe
cc: Eng. File, File

DOCKET: EXAMINER HEARING - THURSDAY - JUNE 7, 1962

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

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

CASE 2571: Application of Randall F. Montgomery for an exception to
Order R-111-A, or in the alternative for three unorthodox
oil well locations, Lea County, New Mexico. Applicant,
in the above-styled cause, seeks exception to the pro-
visions of Order R-111-A, insofar as it pertains to the
re-entry and casing program on five plugged and abandoned
wells in the Salt Lake Pool, four of which are located in
Section 7, and one of which is located in Section 18, all
in Township 20 South, Range 33 East, Lea County, New Mexico.
Applicant further seeks permission, as an alternative
request, to drill three new wells at unorthodox locations
in the Salt Lake Pool as follows:

- (1) Brooks - 7 Well No. 6, to be located 10 feet from
the South line and 2310 feet from the East line;
- (2) Brooks - 7 Well No. 7, to be located 330 feet from
the South line and 1320 feet from the West line;
- (3) Brooks - 7 Well No. 8, to be located 1320 feet from
the South line and 1980 feet from the West line;

all in Section 7, Township 20 South, Range 33 East, Lea
County, New Mexico.

CASE 2572: Application of Tenneco Oil Company for an exception to
Rule 21-a of Order No. R-1670, Basin-Dakota Gas Pool, San
Juan County, New Mexico. Applicant, in the above-styled
cause, seeks permission to commingle the gas production
from two wells in the Basin-Dakota Gas Pool located on the
H. O. Watson Lease in Section 22, Township 27 North, Range
12 West, San Juan County, New Mexico, as an exception to
the provisions of Rule 21-a of the Rules for the prorated
gas pools of Northwestern New Mexico, Order No. R-1670.
Applicant proposes to install one common tank battery and
separating facility and to allocate monthly gas production
to each well on the basis of deliverability tests and
average flowing tubing pressures.

- CASE 2573: Application of Phillips Petroleum Company for approval of an unorthodox oil well location, Lea County, New Mexico. Applicant, in the above-styled cause, seeks approval to locate its Santa Fe Well No. 68 at an unorthodox oil well location in the Vacuum-Abo Pool, 1650 feet from the North line and 1090 feet from the East line of Section 34, Township 17 South, Range 35 East, Lea County, New Mexico.
- CASE 2574: Application of J. Gregory Merrion and Associates for compulsory pooling, Rio Arriba County, New Mexico. Applicant, in the above-styled cause, seeks an order of the Commission force pooling all interests in the Basin-Dakota Pool in the W/2 of Section 35, Township 25 North, Range 6 West, Rio Arriba County, New Mexico.
- CASE 2575: Application of Val R. Reese & Associates, Inc. for the creation of a new oil pool and for special pool rules, Rio Arriba County, New Mexico. Applicant, in the above-styled cause, seeks the creation of a new oil pool for Gallup production in Township 23 North, Range 7 West, Rio Arriba County, New Mexico, and further seeks the adoption of special rules and regulations for said pool similar to the special rules presently governing the Escrito-Gallup Oil Pool which provide for 320-acre gas proration units and 80-acre oil proration units (Order No. R-1793-A).
- CASE 2576: Application of Sinclair Oil & Gas Company for approval of a waterflood project, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of a waterflood project in the Grayburg-Jackson Pool, Eddy County, New Mexico, with the injection of water to be through seven wells located on the H. E. West "A" and "B" leases in Sections 3 and 4, Township 17 South, Range 31 East; applicant proposes to operate the waterflood project under the provisions of Rule 701.
- CASE 2577: Application of Newmont Oil Company for approval to drill a water injection well, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks permission to drill the State "A" Well No. 3, to be located 1295 feet from the South line and 2615 feet from the East line of Section 36, Township 17 South, Range 29 East, Eddy County, New Mexico, for use as a water injection well in the Loco Hills Pool Waterflood Project.
- CASE 2578: Application of Newmont Oil Company for approval of a development plan for the Loco Hills Waterflood Project, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of a plan of development for the Loco Hills Waterflood Project, Eddy County, New Mexico, which would permit

CASE 2578: (Continued)

the conversion of wells to water injection by stages. The applicant proposes to operate said waterflood project under the terms and conditions of Order No. R-2178 which established a buffer zone in a portion of the project area.

CASE 2579:

Application of Neil E. Salsich for approval of a waterflood project, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of a waterflood project in the Square Lake Pool with the injection of water into the Grayburg formation of the Square Lake Pool through five wells located in Section 36, Township 16 South, Range 29 East, Eddy County, New Mexico. Applicant requests that the waterflood be governed by Rule 701 except that administrative approval is sought to allow expansion of the waterflood by the conversion of one additional well in Unit H of Section 35 prior to response from water injection.

CASE 2580:

Application of Waterflood Associates, Inc., for approval of a waterflood project, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of a waterflood project in the Robinson Pool with the injection of water to be through six wells located in Section 35, Township 16 South, Range 31 East, Eddy County, New Mexico; applicant requests that the waterflood project be governed by Rule 701.

CASE 2581:

Application of Waterflood Associates, Inc. for approval of a waterflood project, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of a waterflood project in the Square Lake Pool by the injection of water to be through two wells located in the NE/4 of Section 3, Township 17 South, Range 30 East, Eddy County, New Mexico; applicant requests that the waterflood project be governed by Rule 701.

CASE 2582:

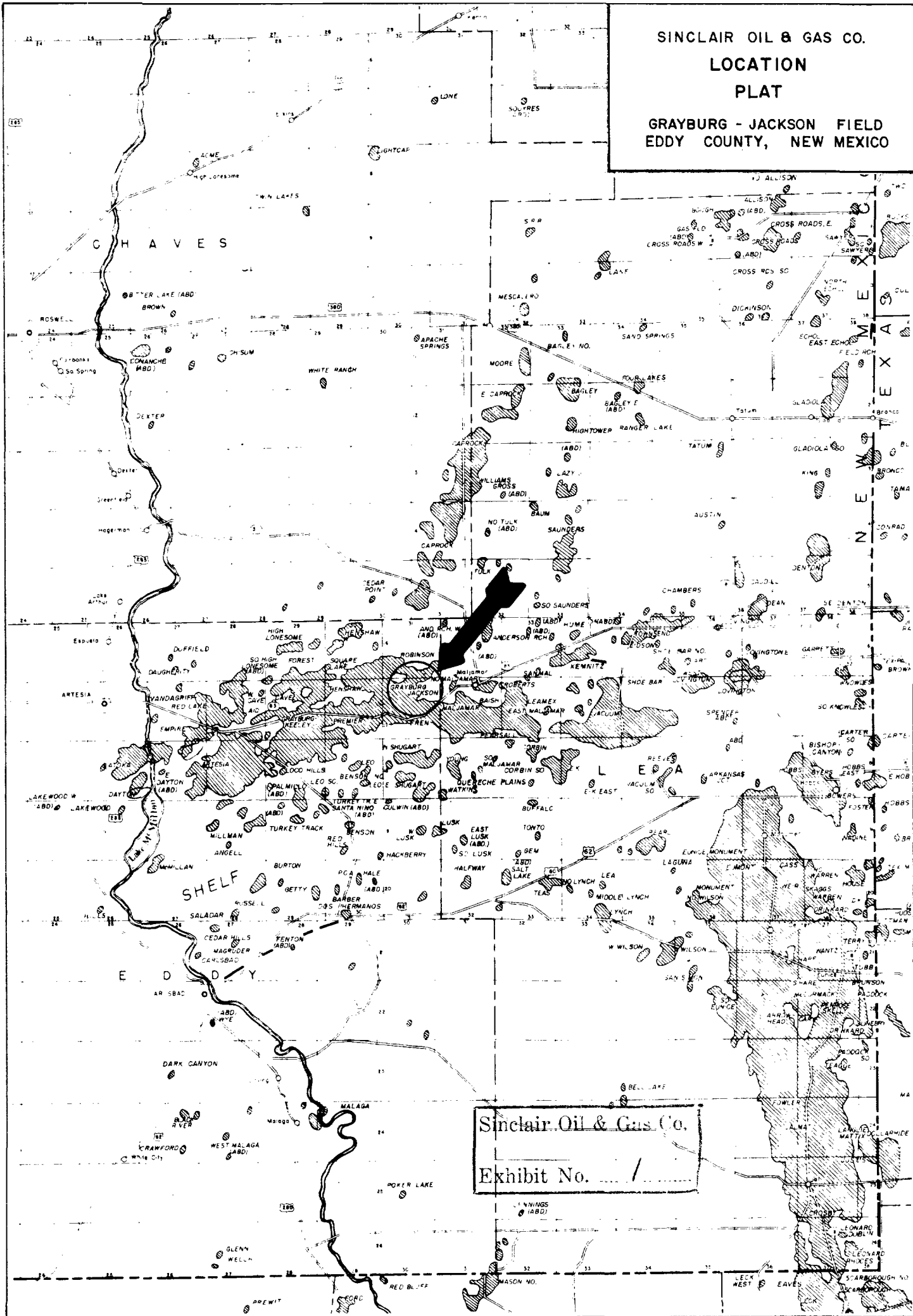
Applicant of Waterflood Associates, Inc., for approval of a waterflood project, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of a waterflood project in the Artesia Pool by the injection of water to be through one well located in the W/2 NW/4 of Section 21, Township 18 South, Range 28 East, Eddy County, New Mexico; applicant requests that the waterflood project be governed by Rule 701.

SINCLAIR OIL & GAS CO.

LOCATION

PLAT

GRAYBURG - JACKSON FIELD
EDDY COUNTY, NEW MEXICO



Sinclair Oil & Gas Co.

Exhibit No. 1



SINCLAIR OIL & GAS COMPANY

P.O. BOX 1470

MIDLAND, TEXAS

Mutual 3-2761

R. L. ELSTON
VICE PRES. & DIVISION MANAGER

June 8, 1962

*File
Case 576*

State Engineer's Office
Santa Fe, New Mexico

Attention: Mr. Frank Irby

Gentlemen:

At the hearing in Santa Fe, New Mexico, on June 7, 1962, on Sinclair's application to start a waterflood project on our H. E. West "A" and H. E. West "B" leases, Grayburg-Jackson Pool, Eddy County, New Mexico, Mr. Frank Irby asked if cement was circulated to the surface on the surface casing on the seven proposed injection wells listed on our Exhibit 3.

A check of our progress reports on the wells in question shows that no mention is made of whether or not the cement circulated on six of the wells. Only on the H. E. West "B" Well No. 11 is mention made that the cement definitely did circulate. However, our general procedure is to circulate the cement on surface casing as a matter of routine practice.

It is therefore my opinion that the cement did circulate to surface on the surface casing in these wells.

Yours very truly,

Douglas Cunningham

Douglas Cunningham

DWC:esa

CC: New Mexico Oil Conservation Commission
P. O. Box 871
Santa Fe, New Mexico
Attention: Mr. D. S. Nutter

GOVERNOR
EDWIN L. MECHEM
CHAIRMAN

State of New Mexico
Oil Conservation Commission



LAND COMMISSIONER
E. S. JOHNNY WALKER
MEMBER

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

P. O. BOX 871
SANTA FE

June 21, 1962

Mr. Booker Kelly
Gilbert, White & Gilbert
Attorneys at Law
Box 787
Santa Fe, New Mexico

Re: Case No. 2576
Order No. R-2268
Applicant:
Sinclair Oil & Gas Company

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

ir/

Carbon copy of order also sent to:

Hobbs OCC x

Artesia OCC x

Aztec OCC

OTHER

Note: Letter advising you the allowable which this project will be eligible to receive under provisions of Rule 701-E-3, will

OIL CONSERVATION COMMISSION

P. O. BOX 871

SANTA FE, NEW MEXICO

December 5, 1962

**Mr. R. M. Anderson
Sinclair Oil & Gas Company
Post Office Box 1470
Midland, Texas**

Dear Sir:

Reference is made to Order No. R-2268, Case No. 2576, entered by the Commission approving Sinclair's Keel-West Waterflood Project, Grayburg-Jackson Pool, Eddy County, New Mexico.

According to our calculations, when all of the authorized injection wells have been placed on active injection, the maximum allowable which this project will be eligible to receive under the provisions of Rule 701-E-3 is 798 barrels per day.

Please report any error in this calculated maximum allowable immediately, both to the Santa Fe office of the Commission and the appropriate district proration office.

In order that the allowable assigned to the project may be kept current, and in order that the operator may fully benefit from the allowable provisions of Rule 701, it behooves him to promptly notify both of the aforementioned Commission offices by letter of any change in the status of wells in the project area, i. e., when active injection commences, when additional injection or producing wells are drilled, when additional wells are acquired through purchase or unitization, when wells have received a response to water injection, etc.

OIL CONSERVATION COMMISSION

P. O. BOX 871

SANTA FE, NEW MEXICO

-2-

Your cooperation in keeping the Commission so informed as to the status of the project and the wells therein will be appreciated.

Very truly yours,

A. L. PORTER, Jr.
Secretary-Director

ALP/ir

cc: Oil Conservation Commission
Artesia, New Mexico

Memo

From

D. S. Nutter
Chief Engineer

Bx 1470

To R. M. Anderson
Sinclair Oil & Gas Co
Midland

Reference is made to
Order no R-2268, Case no
2576, entered by the
Commission approving
Sinclair's Keel-West
Water Flood Project,
Mayburg Jackson Pool
Edley County, de mef

198 BPD

198



SINCLAIR OIL & GAS COMPANY

520 East Broadway
Hobbs, New Mexico

September 25, 1962

New Mexico
Oil Conservation Commission
P.O. Drawer DD
Artesia, New Mexico

RECEIVED

OCT 1 1962

attn: Mr. M. L. Armstrong
District Supervisor

O. C. C.
ARTESIA, OFFICE

Dear Sir:

As authorized by the New Mexico Oil Conservation Commission Order No. P-2268, this Company has commenced the operation of a waterflood project in the Grayburg-Jackson Pool, Eddy County, New Mexico.

Water injection into the below listed wells was started on September 19, 1962.

H.E. West "A" Well No. 7, A-4-17S-31E

H.E. West "A" Well No. 8, E-3-17S-31E

H.E. West "A" Well No. 9, I-4-17S-31E

H.E. West "B" Well No. 6, E-4-17S-31E

H.E. West "B" Well No. 11, K-4-17S-31E

Request the allowable assigned each of the above listed wells in the proration schedule be canceled and they be classified as water injection wells effective September 19, 1962.

Water injection into the H.E. West "A" No. 4 and the H.E. West "B" No. 3 has not yet commenced. These two wells are being worked over and water injection will start in the near future. Your office will be notified by letter when injection into these wells is started.

A plat of this Grayburg-Jackson waterflood project is attached.

Yours truly,


Fred Burns
District Superintendent

FB/DNW/dnw

Orig&cc: OCC-Artesia w/2 copies plat
2cc: OCC-Hobbs w/2 copies plat
cc: HFD, JM, File