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ROSWELL, NEW MEXICO 88201

TELEPHONE 622-8432
AREA CODE 505

November 16, 1977

New Mexico Oil Conservation Commission
P. O. Box 2088
Santa Fe, New Mexico 87501

Attention: Mr. Dan Nutter

Re: Shugart Waterflood Project
Order R-3431

Dear Mr. Nutter:

Enclosed in triplicate is Shenandoah's Application for administrative approval of an additional injection well in connection with the captioned. A copy of this Application, together with its exhibits, is furnished herewith to Mr. Bill Gressett of the Commission at Artesia, New Mexico.


We would thank the Commission for its consideration of the enclosed Application.

Respectfully,

JENNINGS, CHRISTY & COPPLE

SBC/jy
Encl.

By


S. B. Christy IV

cc: Shenandoah Oil Corporation
(C. W. Downey, Jr., Operations Superintendent)

cc: Mr. Bill Gressett

11/21/77 : Copy to Herb Hall and Memo 3-77 sent

BEFORE THE NEW MEXICO OIL CONSERVATION COMMISSION

STATE OF NEW MEXICO

APPLICATION OF SHENANDOAH OIL CORPORATION
FOR ADMINISTRATIVE APPROVAL TO THE CON-
VERSION OF A WELL TO A WATER INJECTION WELL IN THE SHENANDOAH SHUGART WATERFLOOD
PROJECT, EDDY COUNTY, NEW MEXICO. NOV 14 1977 NO. _____

APPLICATION

COMES NOW Shenandoah Oil Corporation, Operator of the
Shenandoah Shugart Waterflood Project in Eddy County, New Mexico,
and pursuant to Rule 701-E-5 of the New Mexico Oil Conservation
Rules and Regulations, respectfully requests administrative
approval to the conversion of a well to a water injection well
in said waterflood project, and would respectfully show unto
the Commission:

1. By Order No. R-3431, the Commission authorized Shenandoah
to initiate waterflood injection in its properties in the Yates,
Seven Rivers, Queen and Grayburg formations and designated the
waterflood project as the Shenandoah Shugart Waterflood Project,
Eddy County, New Mexico.

2. That in 1972, the Commission gave administrative approval
for the converting of the injection of five (5) wells to water injection
wells in Unit "E", Section 28, and Units "D", "F", "G" and "O",
Section 32, Township 18 South, Range 31 East, N.M.P.M.

3. The present Application relates to, and approval is sought
for, injection of water into Shenandoah's Shugart "D" #10 Well that
was originally drilled as an infill producing well. Formations in
the Penrose, Upper Grayburg and Lower Grayburg have been found to
already have been swept clean of oil and produce only water. As

Shenandoah needs some additional water injection into the Penrose formation, it is requested that Shenandoah's Shugart "D" #10 Well be used for water injection in the Penrose formation. The Shugart "D" #10 Well is located in Unit "G", 1,650 feet from the North line and 1,650 feet from the East line of Section 20, Township 18 South, Range 31 East, N.M.P.M., Eddy County, New Mexico.

4. New plastic coated tubing with new plastic coated Baker "AD" tension packer has been installed in the proposed injection pipe string in the Shugart "D" #10 Well.

5. There is attached as exhibits to this Application the following:

Exhibit A -- Plat of the leases within the project showing the location of current injection wells and the proposed injection well.

Exhibit B -- Sketch of the proposed injection well, showing cement tops, perforations, depths and tubing and packer arrangements.

Exhibit C -- Logs on the proposed injection well.

6. The offset operators who are hereby notified of this Application are:

Yates Petroleum Corporation	R. G. Silverthorne
Yates Building	P. O. Drawer 10
207 South Fourth Street	Plainview, Texas 79072
Artesia, New Mexico 88210	

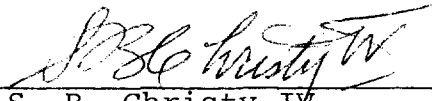
7. Both fresh and produced water will be injected into the Shugart "D" #10 Well and in the opinion of Applicant there is sufficient capacity and capability in the well bore and underground facilities to handle both fresh and produced water. No new rights of way for injection lines are necessary for this well.

8. The injection rate into the Shugart "D" #10 Well to the Penrose formation will be controlled at approximately 300-400 BWPD at a well injection pressure of 1,200-1,400 pounds.

WHEREFORE, Shenandoah Oil Corporation prays for administrative approval to the foregoing injection proposal. In the event such administrative approval is not given, then Shenandoah Oil Corporation further prays, after notice and hearing, that the matter be set for the next available Examiner Hearing.

Respectfully,

JENNINGS, CHRISTY & COPPLE

By 
S. B. Christy IV,
Attorney for Shenandoah Oil Corporation
P. O. Box 1180
Roswell, New Mexico 88201
(505) 622-8432

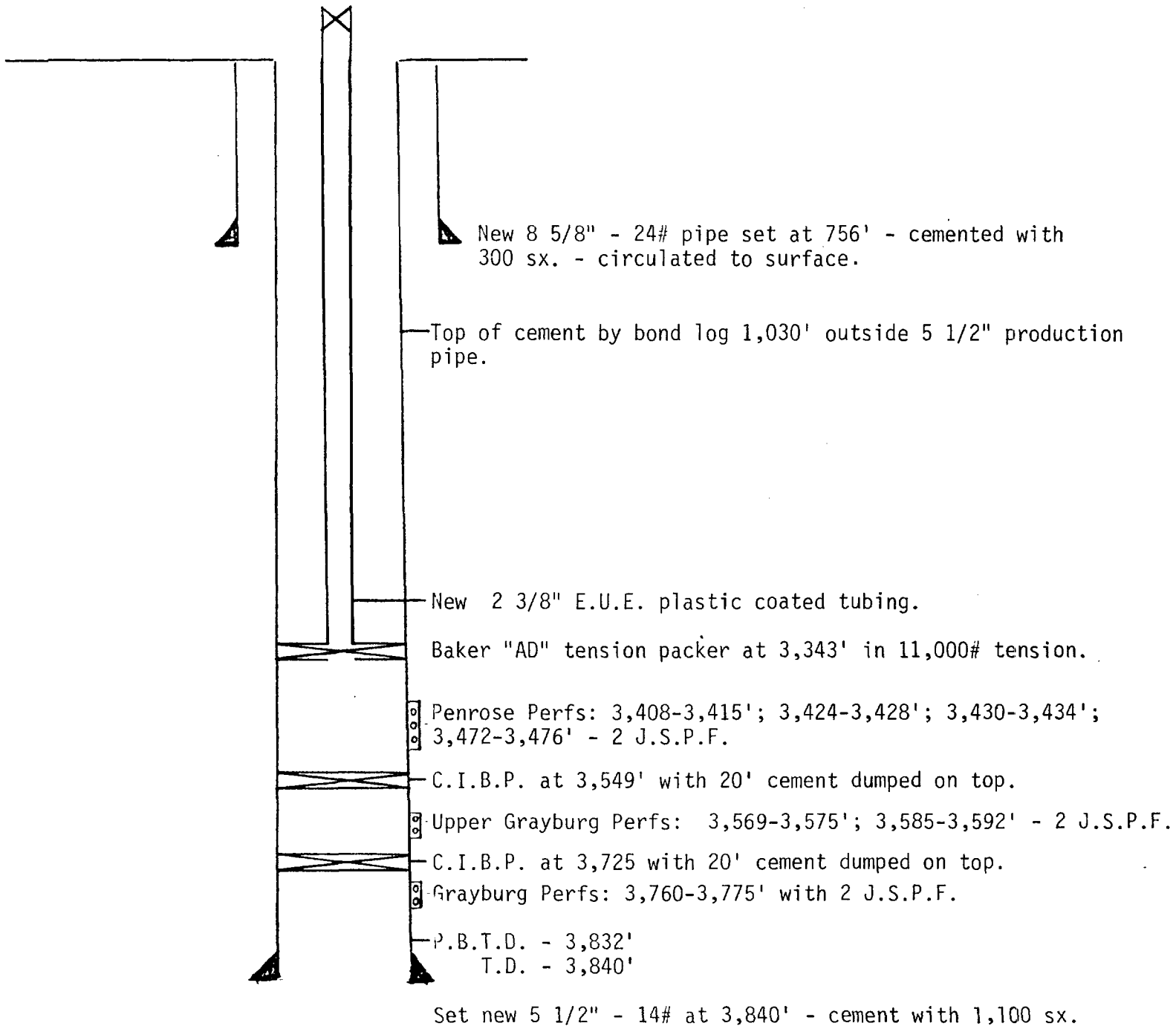
cc via certified mail:
Yates Petroleum Corporation
Yates Building
207 South Fourth Street
Artesia, New Mexico 88210

R. G. Silverthorne
P. O. Drawer 10
Plainview, Texas 79072

cc: Shenandoah Oil Corporation

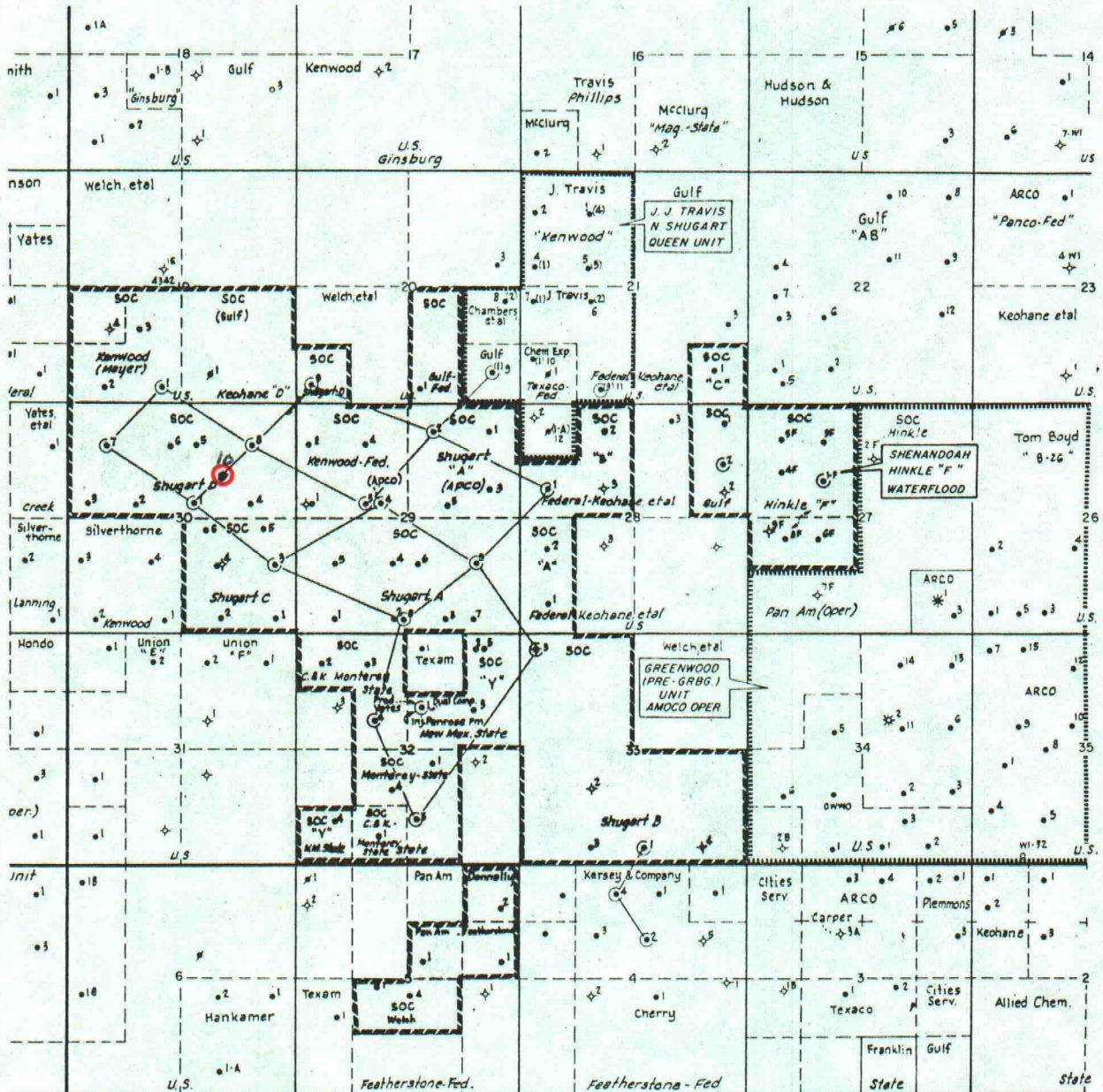
SHUGART "D" NO. 10
Unit "G" - 1,650' FNL and 1,650' FEL
Section 30 - T18S - R31E
Eddy County, New Mexico

LC-029387



EXHIBIT

R 31 E



-LEGEND-

- Lease Boundaries
- Injection Well
- Injection Pattern

SOC
SHENANDOAH OIL CORPORATION

FLOOD NO. 4
SHUGART
EDDY COUNTY, NEW MEXICO

SCALE
0 1/2 1 MI
AUGUST 1972

EXHIBIT A

SHENANDOAH OIL CORPORATION
FORT WORTH, TEXAS