



NEW MEXICO ENERGY, MINERALS  
& NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION  
2040 South Pacheco Street  
Santa Fe, New Mexico 87505  
(505) 827-7131

ADMINISTRATIVE ORDER NO. WFX-735

***APPLICATION OF TEXACO EXPLORATION & PRODUCTION, INC. TO EXPAND ITS  
WATERFLOOD PROJECT IN THE VACUUM POOL IN LEA COUNTY, NEW MEXICO***

ADMINISTRATIVE ORDER  
OF THE OIL CONSERVATION DIVISION

Under the provisions of Division Order Nos. R-3008 and R-4234 as amended, Texaco Exploration & Production, Inc. has made application to the Division on December 10, 1997 for permission to expand its West Vacuum Unit Waterflood Project in the Vacuum Pool in Lea County, New Mexico.

THE DIVISION DIRECTOR FINDS THAT:

- (1) The application has been filed in due form.
- (2) Satisfactory information has been provided that all offset operators have been duly notified of the application.
- (3) No objection has been received within the waiting period as prescribed by Rule 701(B).
- (4) The proposed injection wells are eligible for conversion to injection under the terms of Rule 701.
- (5) The proposed expansion of the above referenced waterflood project will not cause waste nor impair correlative rights.
- (6) The application should be approved.

IT IS THEREFORE ORDERED THAT:

The applicant, Texaco Exploration & Production, Inc., be and the same is hereby authorized to inject water into the Queen, Grayburg and San Andres formations at approximately 4482 feet to approximately 4880 feet through 2 3/8-inch plastic lined tubing set in a packer located within 100 feet of the uppermost injection perforations in the wells described on Exhibit "A" attached hereto, for purposes of secondary recovery.

IT IS FURTHER ORDERED THAT:

The operator shall take all steps necessary to ensure that the injected water enters only the proposed injection interval and is not permitted to escape to other formations or onto the surface.

Prior to commencing injection operations into the wells, the casing shall be pressure tested from the surface to the packer setting depth to assure the integrity of said casing.

The casing-tubing annulus shall be loaded with an inert fluid and equipped with a pressure gauge at the surface or left open to the atmosphere to facilitate detection of leakage in the casing, tubing or packer.

The injection wells or system shall be equipped with a pressure limiting device which will limit the wellhead pressure on the injection wells to .2 psi per foot of depth to the uppermost injection perforations of each well as indicated on Exhibit 'A'.

The Director of the Division may authorize an increase in injection pressure upon a proper showing by the operator of said wells that such higher pressure will not result in migration of the injected fluid from the Queen, Grayburg or San Andres formations. Such proper showing shall consist of a valid step-rate test run in accordance with and acceptable to this office.

The operator shall notify the supervisor of the Hobbs district office of the Division of the date and time of the installation of injection equipment and of the mechanical integrity tests so that the same may be inspected and witnessed.

The operator shall immediately notify the supervisor of the Hobbs district office of the Division of the failure of the tubing, casing or packer in said wells and shall take such steps as may be timely and necessary to correct such failure or leakage.

The subject wells shall be governed by all provisions of Division Order No. R-3008 and R-4234, as amended and Rules 702-706 of the Division Rules and Regulations not inconsistent herewith.

PROVIDED FURTHER THAT, jurisdiction is retained by the Division for the entry of such further orders as may be necessary for the prevention of waste and/or protection of correlative rights or upon failure of the operator to conduct operations (1) to protect fresh water or (2) consistent with the requirements in this order, whereupon the Division may, after notice and hearing, terminate the injection authority granted herein.

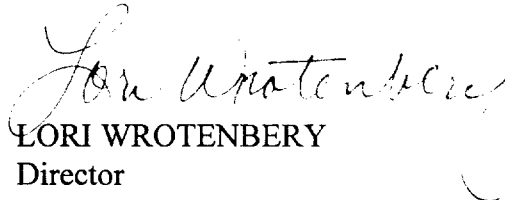
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The injection authority granted herein shall terminate one year after the effective date of this order if the operator has not commenced injection operations into the subject wells, provided however, the Division, upon written request by the operator, may grant an extension thereof for good cause shown.

DONE at Santa Fe, New Mexico, on this 5th day of March, 1998.

STATE OF NEW MEXICO  
OIL CONSERVATION DIVISION

  
LORI WROTENBERY  
Director

S E A L

LW/BES/kv

cc: Oil Conservation Division - Hobbs  
Case File No.4634

**EXHIBIT "A"**  
DIVISION ORDER NO. WEX-735  
**WEST VACUUM UNIT WATERFLOOD PROJECT**  
APPROVED INJECTION WELLS

<i>Well Name</i>	<i>Well No.</i>	<i>Location</i>	<i>Unit</i>	<i>S-T-R</i>	<i>Injection Interval</i>	<i>Packer Depth</i>	<i>Tubing Size</i>	<i>Pressure Gradient</i>	<i>Injection Pressure</i>
West Vacuum Unit	57	75' FSL & 1305' FEL	P	34-17S-34E	4482'-4800'	4475'	2 3/8"	.2 psi/ft	896 PSIG
West Vacuum Unit	58	1330' FNL & 1330' FEL	B	3-18S-34E	4562'-4770'	4555'	2 3/8"	.2 psi/ft	912 PSIG
West Vacuum Unit	60	2470' FSL & 1100' FEL	I	34-17S-34E	4494'-4880'	4490'	2 3/8"	.2 psi/ft	899 PSIG
West Vacuum Unit	64*	1045' FSL & 1100' FEL	P	34-17S-34E	4500'-4850'	4495'	2 3/8"	.2 psi/ft	900 PSIG
West Vacuum Unit	68	1045' FNL & 1118' FEL	A	34-17S-34E	4560'-4876'	4555'	2 3/8"	.2 psi/ft	912 PSIG

All wells located in Lea County, New Mexico

\* New Well to be Drilled.