

6/1/84

Please set for Division hearing

Memo

From

MICHAEL STOGNER

Petroleum Engineer M.S.

To Florine

D.T. Stogner, Jr. (telephoned)

Vice-President

Consolidated Oil & Gas Inc.

Denver, Colorado

303-861-5252

Amendment to Division Order No. R-6943-A

which authorized the Midway State Well No. 1, located 330' FS+EL of Sec. 8, Twn. 17-S, Rng. 37-E, to dispose of produced salt water into the Glorieta Formation, provided in part that 4 Midway Abs. producing wells, all within a $\frac{1}{2}$ mi. radius of the SWD well, were not adequately cemented through the injection interval. Consolidated now request that the stipulation to have these four wells properly cemented be amended to now let these wells be closely monitored to insure that S.W. does not reach these well bores.

Oil Conservation Santa Fe, New Mexico

STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENT
OIL CONSERVATION DIVISION

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

CASE NO. 8093
Order No. R-6943-A

APPLICATION OF CONSOLIDATED OIL
& GAS INC. FOR SALT WATER DISPOSAL,
LEA COUNTY, NEW MEXICO

*See Also
Order
No. R-6943*

ORDER OF THE DIVISION

BY THE DIVISION:

This cause came on for hearing at 8 a.m. on February 29, 1984, at Santa Fe, New Mexico, before Examiner Michael E. Stogner.

NOW, on this 9th day of May, 1984, the Division Director, having considered the testimony, the record, and the recommendations of the Examiner, and being fully advised in the premises,

FINDS:

(1) That due public notice having been given as required by law, the Division has jurisdiction of this cause and the subject matter thereof.

(2) That the applicant, Consolidated Oil & Gas Inc., is the owner and operator of the Midway State Well No. 1, located 330 feet from the South and East lines of Section 8, Township 17 South, Range 37 East, NMPM, Lea County, New Mexico.

(3) That Division Order No. R-6943, dated April 29, 1982, authorized the applicant to dispose of produced salt water into the Abo formation through said Midway State Well No. 1, with injection into the perforated interval from 8688 feet to 8856 feet.

(4) That the applicant proposes to abandon injection into the Abo formation by installing a cast iron bridge plug in said well at approximately 8600 feet.

(5) That the applicant now proposes to utilize said well to dispose of produced salt water into the Glorieta formation, with injection into the perforated interval from approximately 6585 feet to 6690 feet.

(6) That the operator should take all steps necessary to ensure that the injected water enters only the proposed injection interval and is not permitted to escape to other formations or onto the surface from nearby producing or plugged and abandoned wells.

(7) That the following described previously abandoned wells are located within one-half mile of said Midway State Well No. 1 and may not be plugged in such a manner that will assure that they will not serve as channels for disposed water to migrate from the Glorieta formation to other formations or to the surface:

| <u>WELL NAME AND NO.</u> | <u>FOOTAGE LOCATION</u> | <u>SECTION</u> |
|--|-------------------------|----------------|
| Hondo Drilling CO. Midway-State "A" Well No. 1 | 1650' FSL- 710' FEL | 8 |
| David Fasken, Consolidated State Well No. 1 | 2310' FNL-330' FWL | 9 |
| Supron Energy Corp. Lovington "9" State Well No. 1 | 500' FS & WL | 9 |

All in Township 17 South, Range 37 East, NMPM, Lea County,
New Mexico.

(8) That the following described Midway Abo producing wells are also located within one-half mile of said Midway State Well No. 1 and may not be adequately cemented through the Glorieta formation and could allow the migration of disposed water from the disposal interval to other formations or to the surface if injection is permitted in said Midway State Well No. 1:

| <u>WELL NAME AND NO.</u> | <u>FOOTAGE LOCATION</u> | <u>SECTION</u> |
|---|-------------------------|----------------|
| Apollo Oil Company Lovington "16" State Well No. 1 | 440' FNL-1980' FWL | 16 |
| Consolidated Oil & Gas, Inc. Southern Union State Well No. 1 | 660' FN & WL | 16 |

| | | |
|----------------------|-------------------|----|
| Gulf Oil Corporation | 990' FNL-330' FEL | 17 |
| Lea "KN" State Well | | |
| No. 1 | | |

| | | |
|----------------------|--------------------|----|
| Gulf Oil Corporation | 990' FNL-1650' FEL | 17 |
| Lea "KN" State Well | | |
| No. 2 | | |

All in Township 17 South, Range 37 East, NMPM, Midway Abo Pool, Lea County, New Mexico.

(9) That no disposal of salt water should be permitted into the Glorieta formation through said Midway State Well No. 1 until the operator has demonstrated that the wells described in Finding Paragraph No. (7) above have either been re-plugged or have been previously plugged and abandoned in such a manner as to ensure that they do not provide an avenue of escape for waters from the proposed injection zone and in accordance with a program that is satisfactory to the supervisor of the Division's district office at Hobbs; and the operator should also demonstrate that all of the Midway Abo producing wells described in Finding Paragraph No. (8) above either have adequate cement across and above the proposed injection interval or have been re-cemented through such interval all in accordance with a program to be approved by the supervisor of the Division's district office at Hobbs.

(10) That the injection should be accomplished through 2 7/8-inch internally plastic lined tubing installed in a packer set at approximately 6530 feet; that the casing-tubing annulus should be filled with an inert fluid; and that a pressure gauge or approved leak detection device should be attached to the annulus in order to determine leakage in the casing, tubing, or packer.

(11) That the injection well or system should be equipped with a pressure limiting switch or other acceptable device which will limit the wellhead pressure on the injection well to no more than 1200 psi.

(12) That the Director of the Division should be authorized to administratively approve an increase in the injection pressure upon a proper showing by the operator that such higher pressure will not result in migration of the injected waters from the Glorieta formation.

(13) That the operator should notify the supervisor of the Hobbs district office of the Division of the date and time

of the installation of disposal equipment so that the same may be inspected.

(14) That approval of the subject application will prevent the drilling of unnecessary wells and otherwise prevent waste and protect correlative rights.

IT IS THEREFORE ORDERED:

(1) That the applicant, Consolidated Oil & Gas Inc., is hereby authorized to utilize its Midway State Well No. 1, located 330 feet from the South and East lines of Section 8, Township 17 South, Range 37 East, NMPM, Lea County, New Mexico, to dispose of produced salt water into the Glorieta formation, injection to be accomplished through 2 7/8-inch tubing installed in a packer set at approximately 6530 feet, with injection into the perforated interval from approximately 6585 feet to 6690 feet;

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

PROVIDED FURTHER, that injection into the Glorieta formation through said Midway State Well No. 1 shall not commence until the wells described in Finding Paragraph No. (7) of this Order have either been re-plugged or are shown to have been adequately plugged and abandoned in a manner that is satisfactory to the supervisor of the Division's district office at Hobbs; nor until the Midway Abo producing wells described in Finding Paragraph No. (8) of this Order have either been shown to have adequate cement across and above the proposed injection interval or have been re-cemented across and above such interval in a manner that is satisfactory to the supervisor of the Division's district office at Hobbs.

(2) That the injection well or system shall be equipped with a pressure limiting switch or other acceptable device which will limit the wellhead pressure on the injection well to no more than 1200 psi.

(3) That the Director of the Division may authorize an increase in injection pressure upon a proper showing by the operator of said well that such higher pressure will not result in migration of the injected fluid from the Glorieta formation.

(4) That the operator shall notify the supervisor of the Hobbs district office of the Division of the date and time of the installation of disposal equipment so that the same may be inspected.

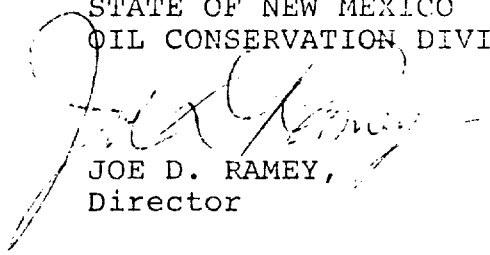
(5) That the operator shall immediately notify the supervisor of the Division's Hobbs district office of the failure of the tubing, casing, or packer, in said well or the leakage of water from or around said well and shall take such steps as may be timely and necessary to correct such failure or leakage.

(6) That the applicant shall conduct disposal operations and submit monthly reports in accordance with Rules 702, 703, 704, 705, 706, 708, and 1120 of the Division Rules and Regulations.

(7) That jurisdiction of this cause is retained for the entry of such further orders as the Division may deem necessary.

DONE at Santa Fe, New Mexico, on the day and year hereinabove designated.

STATE OF NEW MEXICO
OIL CONSERVATION DIVISION


JOE D. RAMEY,
Director

S E A L