

Casa No.

302

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Application, Transcript,  
Small Exhibits, Etc.

BEFORE THE  
OIL CONSERVATION COMMISSION  
STATE OF NEW MEXICO

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TRANSCRIPTION OF HEARING

CASE NO. 302

August 21, 1951  
(DATE)

E. E. GREESON  
COURT REPORTER  
UNITED STATES COURT HOUSE  
TELEPHONE 2-0872  
ALBUQUERQUE, NEW MEXICO

BEFORE THE  
OIL CONSERVATION COMMISSION  
STATE OF NEW MEXICO

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In re:  
Application of Howard Hogan,  
et al, for permission  
to dually complete (gas-oil)  
their No. 1 Jack well, SW NW 8-24-  
37E, NMPM, Lea County, New Mexico

Case No. 302

TRANSCRIPT OF HEARING

August 21, 1951

ADA DEARNLEY, COURT REPORTER

MR. SHEPARD: Case No. 302.

(Mr. Graham reads the Notice of Publication.)

MR. SPURRIER: Let the record show Exhibits 1, 2, 3 and 4 have been marked.

MR. PADDLEFORD: My name is J. T. Paddleford, geological engineer from Oklahoma City, representing Howard Hogan, of Dallas, Texas. This application has to do with the lease described as the Jack lease which is the northwest quarter of Section 8, 24 South, 37 East, Lea County, New Mexico. This lease was procured by Mr. Hogan on a farm-out from the Continental Oil Company, on which a well was drilled in the center of the southwest-northwest of this quarter. This well was completed in the Queen section for an oil well. The producing horizon being from 3477 to 3600 total depth. The well was completed January 10, -- completed November 20, 1950. The initial production on this well was 40 barrels per day. At present the well is producing an average of 17 barrels of oil per day, flowing through an intermitter. At the time this well was drilled it was noticed that there was available a very prolific dry gas section in the Yates Sand. It is our desire to ask the Commission to allow us to dually complete this well and produce the oil through the tubing and the gas through the annulus.

The United States Geological Survey has approved our application and I am asking the Commission to approve it too. That is all. Here is the log on the well. The Commission has already the procedure that we are going to follow.

MR. SPURRIER: Can you outline briefly how you will set your packer?

MR. PADDLEFORD: Yes, sir. Here is the procedure we will follow. Number 1 we will kill the well at present with oil. Then pull the tubing and set a packer modeled production packer on an electric line at approximately 3400 feet. Then we will run the tubing back, the packer will be set naturally below the gas section and then we will come out with the tubing and load the hole with ten pounds of salt water so as to take care of the gas after we perforate the pipe opposite the Yates gas section. We will then go back in with the tubing and unload the hole of the salt water and screw back into the tubing nipple which is above the packer and allow the well to flow through the casing. Then swab the well back in through the tubing from the Queens. That in short is the procedure. The reason that we would like to do it in this manner is because of the unavailability of tubular goods and otherwise we would drill a gas well, but we can't get the pipe.

MR. SPURRIER: Any further questions?

MR. GRAHAM: We presume that there is a ready market for the gas.

MR. PADDLEFORD: Yes, we have a contract with El Paso. We will make a connection immediately.

MR. GRAHAM: Ordinarily there is submitted in previous cases, drawings of the pools.

MR. PADDLEFORD: You mean a diagram?

MR.

MR. GRAHAM: Diagram.

MR. PADDLEFORD: I can do that and I will if it please the Commission.

MR. GRAHAM: The idea is we have been confronted with changes after the hearing and before completion.

MR. PADDLEFORD: Yes, sir.

MR. GRAHAM: We have heretofore required information on how your general procedure would be after you have actually completed the project then you are required to file a sketch and plan of what you actually had to do.

MR. PADDLEFORD: We will do that.

MR. GRAHAM: You will be prepared to do that?

MR. PADDLEFORD: Yes, sir.

MR. SPURRIER: It will <sup>be</sup> taken under advisement.

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STATE OF NEW MEXICO )

COUNTY OF BERNALILLO )

I HEREBY CERTIFY that the foregoing and attached transcript of hearing in Case No. 302 before the Oil Conservation Commission taken on August 21, 1951 at Santa Fe, is a true and correct record of the same to the best of my knowledge, skill and ability.

DATED at Albuquerque, New Mexico this 15<sup>th</sup> day of Sept. 1951.

Ada Dearnley  
REPORTER

Check with  
R.P.S.

12/11/51

Copy of Order R-121  
sent to Paddelford (for Hogan)  
12-19-51

*Aug 21 hearing*

*Case 302*

*107*

J. T. PADDLEFORD  
801 CRAVENS BUILDING  
OKLAHOMA CITY 2, OKLAHOMA

GEOLOGICAL  
ENGINEER

OFFICE 79-1551  
RES. 79-2103

July 17, 1951.

New Mexico Oil Conservation Commission  
Santa Fe, New Mexico.  
Attention: Mr. Spurrier

Re: Las Cruces 032326B ( Nw  $\frac{1}{4}$  Sec. 8-24S-37E )  
Howard Hogan Etal #1 Jack  
C SwNw 8-24S-37E  
Lea County, New Mexico.

Gentlemen:

It is the desire of Mr. Howard Hogan etal, owners of the #1 Jack, located C SwNw 8-24S-37E, Lea County New Mexico to dually complete this well from the Queen and the Yates gas sand.

The well is now producing from the Queen section (5482-5600 ). The owners wish to produce the Yates gas section (2864-2988 ) together with the Queen oil horizon.

The Yates gas will be produced in the annulus between the casing and tubing.

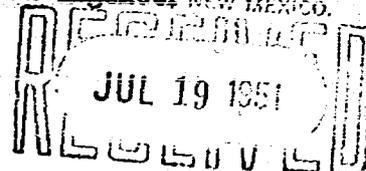
The owners ask that a hearing be scheduled in Santa Fe so that their problem may be presented and discussed.

The shortage of tubular goods influence the owners to a great extent in asking the commission for a granting of this application. This dual completion of the Yates will be the only dry gas well the owners will complete on the quarter section they own.

Yours very truly,

*J. T. Paddleford*

J. T. Paddleford  
GEOLOGICAL ENGINEER  
Agent



Chas 302

J. T. PADDLEFORD  
801 CRAVENS BUILDING  
OKLAHOMA CITY 2, OKLAHOMA

GEOLOGICAL  
ENGINEER

OFFICE 79-1651  
RES. 79-2103

July 17, 1951.

New Mexico Oil Conservation Commission  
Santa Fe, New Mexico.

Re: Nw  $\frac{1}{4}$  Sec. 8-24S-37E  
Howard Hogan Etal #1 Jack  
CSwNw 8-24S-37E  
Lea County, New Mexico.

The following information pertinent to this well is herewith presented together with an outline of procedure that will be followed should the Commission see fit to grant the owner permission to perform this work.

----- Well Data -----

Well commenced drilling 11/2/50  
Well completed drilling 11/20/50  
On Production 1/10/51

Casing:

10 3/4" 40# at 323 ft. cemented with 200 Sks. circulated to surface  
5 1/2" 15.5 # at 3460 ft. cemented Two Stage 150 Sks @ 1300 ft. 150 sks @ 3460 ft.

Formation Data:

Salt 1300-2500 Cement at (6.76 x 150 Sks equals 1014 ft. fillup)  
Brown Lime 2700 1300 ft. minus 1014 ft equals 286 ft.  
Yates Sand 2864-2988 3460 ft. minus 1014 ft equals 2346 ft.  
Queen 3477-3600 T.D.

Completion and Production:

Well was shot with 200 Qts. Nitro 3477-3590.  
Well was cleaned out with Cable Tools 3460-3600 T.D.  
Well was swabbed in and put on production. The well was completed for 40 Bbls.  
Oil per day flow with 1070 M.C.F. Bottom Hole Pressure was 440 ps. Gravity 36.  
The well at this writing is averaging 17 B.O.P.D. flow thru lateral.

OIL CONSERVATION COMMISSION  
SANTA FE, NEW MEXICO  
JUL 19 1951

Case 302

J. T. PADDLEFORD  
201 CRAVENS BUILDING  
OKLAHOMA CITY 2, OKLAHOMA

GEOLOGICAL  
ENGINEER

OFFICE 79-1551  
RES. 79-2103

July 17, 1951.

New Mexico Oil Conservation Commission  
Santa Fe, New Mexico.

Re: Nw  $\frac{1}{4}$  Sec. 8-24S-37E  
Howard Hogan Etal #1 Jack  
CSWnw 8-24S-37E  
Lea County, New Mexico.

----- Dual Completion Procedure -----

Problem: To dually complete #1 Jack from Yates Gas Sand and Queen Oil Zone.  
Yates Gas Sand 2864 ft. to 2988 ft. ( Dry Gas )  
Queen Oil Pay 3492 ft. to 3570 ft. ( Oil and Wet Gas )

Data: ( Yates Gas Pay Bottom Hole Pressure 1150# to 1300#  
Queen Oil Pay Bottom Hole Pressure 440# ( Note: This zone is dolomite  
and sand with thin streaks of Bentonite. Salt water or oil only  
should be allowed to contact. 10# Salt water will hold Yates gas  
after perforating. )

1. Pull tubing after killing present production with oil.
2. Go back in hole and set Baker Model "D" production packer below Yates gas section. Have backoff joint and tubing blind below Yates section.
3. Backoff tubing at backoff joint after packer is set. ( A tubing disc will be placed in joint below backoff joint -- To eliminate water contamination in Queen oil section. )
4. Load hole with 10# salt water above packer.
5. Perforate Yates sand section while hole is loaded three holes per foot 2864-2988.
6. Go back in hole with tubing and engage backoff joint. Pull tubing high enough thru packer so that perforations of tubing are above packer. Knock disc out of tubing and swab load water from Yates zone. When Yates section has unloaded and is clean, lower tubing perforations below packer and produce Yates thru annulus and Queen thru tubing.

OKLAHOMA OIL CONSERVATION COMMISSION  
SANTA FE, NEW MEXICO.  
JUL 19 1951

Case 3021

J. T. PADDLEFORD  
801 CRAVENS BUILDING  
OKLAHOMA CITY 2, OKLAHOMA

GEOLOGICAL  
ENGINEER

OFFICE 79-1851  
RES. 79-2103

July 17, 1951.

New Mexico Oil Conservation Commission  
Santa Fe, New Mexico.

Re: Nw  $\frac{1}{4}$  Sec. 8-24S-37E  
Howard Hogan #1 Jack  
CSwNw 8-24S-37E  
Lea County, New Mexico.

----- Dual Completion Procedure Continued -----

7. Hook well up and Test.

The above procedure has been thoroly analyzed and it is believed that no communication will result between the Yates and Queen sections. Enclosed with this data is an electric log of the #1 Jack for your examination.

Respectfully submitted,



J. T. Paddleford  
Geological Engineer  
Agent

OKLAHOMA  
JUL 19 1951

BEFORE THE OIL CONSERVATION COMMISSION  
OF THE STATE OF NEW MEXICO

IN THE MATTER OF THE HEARING  
CALLED BY THE OIL CONSERVATION  
COMMISSION OF THE STATE OF NEW  
MEXICO FOR THE PURPOSE OF CON-  
SIDERING:

CASE No. 302  
ORDER No. R-121

THE APPLICATION OF HOWARD HOGAN  
ET AL FOR AN ORDER AUTHORIZING THE  
DUAL COMPLETION (GAS-OIL) OF THEIR  
NO. 1 JACK WELL, LOCATED IN SW/4  
NW/4 SECTION 8, T. 24 S, R. 37 E, NMPM,  
LEA COUNTY, NEW MEXICO

ORDER OF THE COMMISSION

BY THE COMMISSION:

This cause came on for hearing at 10:00 a.m. on August 21, 1951, at Santa Fe, New Mexico, before the Oil Conservation Commission of New Mexico, hereinafter referred to as the "Commission," all members being present.

Now, this 18 day of December, 1951, the Commission, a quorum being present, having considered the testimony adduced and exhibits received at said hearing, and being fully advised in the premises,

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

(2) That although recent experiments tend to show that mechanical packers and other devices are now available for engineering successful dual completions, the Commission finds that specific control of each project should be maintained.

**IT IS THEREFORE ORDERED:**

That effective as of the date of this order, Howard Hogan et al, the applicant herein, be, and they hereby are authorized to dually complete their No. 1 Jack well, located in the SW/4 NW/4 section 8, Township 24 South, Range 37 East, NMPM, Lea County, New Mexico, to produce gas from the Yates sand (2864 to 2988 feet) through the annulus between the casing and the tubing, and oil from the Queen formation (3482 to 3600 feet) through the tubing, by the use of proper perforations and the use of proper packer or packers;

**PROVIDED, HOWEVER,** that said No. 1 Jack well shall be dually completed and produced in such a manner that there will be no commingling within the well-bore of the said well of gas, or oil and gas produced from the two separate strata, and

**PROVIDED FURTHER** that said well shall be equipped in such a manner that reservoir pressures may be determined separately for each of the two separate strata, and further be equipped with all necessary connections required to permit recording meters to be installed and used at any time as may be required by the Commission or its representatives, in order that natural gas, or oil and oil and gas, from each separate stratum may be accurately measured and the gas-oil ratio determined, and

CASE No. 302  
Order No. R-121

PROVIDED FURTHER that the operator shall make any and all tests including segregation tests and tests for leakage outside the casing but not excluding other tests and/or determinations at any time and in such manner as may be deemed necessary by the Commission and remedy any situation reflected.

The original and all subsequent tests shall be witnessed by a representative of the Commission and by representatives of offset operators, if any there be, and the results of each test properly attested to by the applicant and all witnesses and shall be filed with the Commission within ten (10) days after the actual completion of each such test, and,

PROVIDED FURTHER that prior to the time said well is dually completed, the applicant shall supply the Commission, for its approval, with plan or drawing showing the proposed method and manner of completion.

PROVIDED FURTHER that upon the dual completion of the well the applicant shall submit to the Commission a diagrammatic sketch of the mechanical installation which was actually used to produce the seal from both zones or strata, showing tube and location of packers, other devices used, location and extent of perforations, name and depth of each producing zone or strata and special report of production, gas-oil ratio and reservoir pressure determination of each horizon or stratum at the time of completion.

IT IS FURTHER ORDERED that jurisdiction of this case is hereby retained by the Commission for such further order or orders in the premises as may from time to time seem necessary or convenient to the Commission, and this case shall not be considered as establishing a precedent for authorizing general dual completions, and upon failure of the applicant to comply with any provision or provisions of this order, by the authority hereunder shall terminate, upon ten (10) days' written notice by the Commission.

DONE AT SANTA FE, NEW MEXICO, on the day and year hereinabove written.

STATE OF NEW MEXICO  
OIL CONSERVATION COMMISSION

*Edwin L. Mechem*  
EDWIN L. MECHEM, Chairman

*Guy Shepard*  
GUY SHEPARD, Member

*R. R. Spurrer*  
R. R. SPURRIER, Secretary