BEFORE THE OIL CONSERVATION COMMISSION SANTA FE, NEW MEXICO

IN THE MATTER OF:

CASE No. 1588

TRANSCRIPT OF HEARING

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February 4, 1959

BEFORE THE OIL CONSERVATION COMMISSION SANTA FE. NEW MEXICO

IN THE MATTER OF:

Application of Atlantic Refining Company to commingle the production from several separate oil pools. Applicant, in the above-styled cause, seeks an order authorizing it to commingle the production from the Ellenburger, McKee, Fusselman, Montoya, Blinebry, Drinkard, and Queen formations on its State "Y" Lease comprising the N/2 NE/4 and the SE/4 NE/4 of Section 25, Township 25 South, Range 37 East, Lea County, New Mexico. Applicant proposes to separately meter the production from each formation except the Queen prior to being commingled.

BEFORE:

Elvis A. Utz, Examiner.

TRANSCRIPT OF HEARING

MR. UTZ: The next case will be Case No. 1588.

Application of Atlantic Refining Company MR. PAYNE: to commingle the production from several separate oil pools.

MR. BRATTON: Howard Bratton, Hervey, Dow, and Hinkle, Roswell, New Mexico, appearing on behalf of the applicant.

We have one witness in the case this morning.

(Witness sworn.)

MR. UTZ: Are there any other appearances to be made

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in this case? If not, you may continue.

H. T. FROST, a witness called by and on behalf of the Applicant, being first duly sworn, was examined and testified as follows:

DIRECT EXAMINATION

BY: MR. BRATTON:

- Q Will you state your name and by whom you are employed and where?
- A H. T. Frost, Jr., employed by the Atlantic Refining Company in Midland.
 - Q In what capacity?
 - A As assistant regional production engineer.
- Q Have you ever appeared before this Commission before as an expert witness?
 - A No, sir, I have.
- Q Will you state briefly to the Commission your educational and professional background?
- A I received a BS degree in petroleum engineering from the University of Tulsa and have been production engineer for Atlantic Refining for the past twelve years.
- And in your capacity as production engineer, have you dealt with matters similar to the matter under consideration in this case?
 - A Yes, I have.

MR. BRATTON: Are the witness' qualifications acceptable?

MR. UTZ: His qualifications are acceptable.

- Q (By Mr. Bratton) Now, Mr. Frost, are you familiar with the application in Case 1588?
 - A I am.
 - Q And with the area covered by the application?
 - A I am.
 - And the proposed installation?
 - A I am.
- I refer you to what has been marked as Atlantic's Exhibit 1 and ask you to explain what that exhibit is and what it shows?
- the Atlantic State "Y" lease. We have shown on there the wells which we have completed and two locations which are in the process of drilling right now. This lease is the E/2 and the NW/4 of the NE/4 of Section 25, Township 25 South, Range 37 East. We have two Queen wells; the No. 1, a gas well, and No. 2, oil well. These two wells are not a part of this proposal, and the No. 3 is completed in the Montoya and Ellenberger formations. The No. 4, we are anticipating another Montoya and Ellenberger completion, and the No. 5, a Drinkard and Fussleman. Our legend at the bottom shows the six formations and the approximate tops of these various formations.
- Q Turning now to Atlantic's Exhibit 2, 3, and 4, will you explain in order what those exhibits are and what they show?

A These exhibits, 2, 3, and 4, show various stages of development of common storage batteries as the lease is developed. Exhibit 2 is for the first well, which is completed in two zones. Each zone is equipped with a separator and orifice meter for measurement of gas and a dump-type oil meter. Then, there will be commingled the oil, the production will be commingled into common storage after being measured by the dump-type meters. The tanks to be used will be manually gauged to run the oil to the pipeline.

Exhibit 3 shows the completion of a second well completed in the same two zones. Here we've added a test separator so that any zone of each well can be individually tested with the same dump-type meter and orifice meter. At any time on these that the wells start producing water, we propose to install a heater treater between the separator and the dump meter so that the oil still is metered at all times with the dump meter.

Exhibit 4 shows the third well completed in one of the previous zones and an additional third zone. Here we have added another separator and the metering equipment for the third zone. We have two lines coming off of each meter so that a meter can be calibrated at any time without interfering with production from other zones, from other separators.

Now, Mr. Frost, your legend on each exhibits shows each installation in the proposed system, is that correct?

A That's right.

- Is this system and the type of equipment which you propose to install, is it similiar to or identical with any equipment and system which has previously been approved by this Commission?
- A This is similar to the system approved for the Gulf McBuffington lease in the Justis Field. However, this one which we are proposing is not an automatic custody transfer, it is simply common storage for the oil.
- Q Otherwise, the equipment is similar except for these automatic custody transers?
- A Other than that, it is the same type as approved for Gulf.
- Now, this proposal does not cover the Queen formation that will go into a separate battery?
 - A That's correct, the Queen has a separate battery.
- And you are willing to test the equipment, calibrate it periodically as may be required by the Commission?
 - A That's correct.
- Are there provisions for metering the gas from the separator?
 - A The gas will be metered from each reservoir separately.
 - Q Where is this tank battery located, Mr. Frost?
- A It's in the NE/4 of the NE/4. In fact, the SW/4 of that Quarter Quarter.
 - Q What section would that be?

- A Section 25.
- Q That's Township 25 South, Range 37 East?

 MR. UTZ: What was that location again?
- A The NE/4 of the NE/4.
- Q (By Mr. Bratton) Approximately in the Southwest corner of the NE/4 of the NE/4?
 - A Yes.
- Q Is there anything further which you wish to state in connection with this application, Mr. Frost?
 - A No, I don't believe so.
- In your opinion, Mr. Frost, will the granting of this application prevent waste and protect correlative rights?
 - A Yes, I believe it will.
- Q If the application is allowed, in your opinion, will the installation of this system allow for a somewhat longer life of the lease before abandonment?
 - A Yes, I think it will, definitely.
- Were Exhibits 1 through 4 prepared by you or under your supervision and direction?
 - A Yes, they were.
- MR. BRATTON: I would like to offer in evidence Atlantic's Exhibits 1 through 4 inclusive.
 - MR. UTZ: Without objection, they will be received.
 - MR. BRATTON: We have no further questions, Mr.

Examiner.

CROSS EXAMINATION

BY: MR. UTZ:

- Q Mr. Frost, how many of these zones that you are requesting actually are productive at the present time?
- A Two, at the present time; Montoya and Ellenberger. We are presently producing those two.
 - Q And your project well into the Fusselman, right?
 - A At the present time.
- Q And you don't have any production in the Drinkard as yet?
- A Not as yet. We are anticipating that the No. 5 will be a Drinkard-Fusselman producer.
- Q In addition to the two producing zones and the two that you are projected to, you are asking for the same thing for the McKee and the Blinebry in addition, is that correct?
 - A That's correct.
- © Do you know what type of crudes the Montoya and Ellenberger are producing?
 - A They are intermediate.
- Q Do you have any idea of what the Fusselman and Drinkard will be?
- A Only that the pipeline company has said that they would all go in the intermediate line.
 - Q Even the Drinkard?
 - A Even the Drinkard so far. That is one thing, if one

one of these zones that we haven't produced as yet turns out to be a sour zone, we would not want to put it in this battery, we would put it in the battery with the Queen, or another battery.

- Q You will keep the sweet intermediate and sour crude separately?
 - A Separately, that's true.
- Q And how about the McKee and Fusselman, what do you expect?
 - A We expect them to be intermediate.
 - Q The Blinebry?
 - A Expect it to be intermediate.
 - © The Blinebry in some instances is sweet?
 - A I believe so.
 - © In some instances it is sour?
 - A Yes.

MR. UTZ: Are there any other questions of the witness?

MR. PAYNE: Yes.

MR. UTZ: Mr. Payne.

EXAMINATION BY MR. PAYNE:

- I would like to clarify one point nere. Did you say if the Drinkard is the only formation that appears to be sour, you will commingle it with the Queen production?
- A Well, I did say that. It would either be commingled with the Queen or in a separate battery by itself.
 - Q If it were to be commingled with the Queen -- I notide

in your application you don't propose to separately meter the Queen production.

A The Queen is presently producing in a battery by itself and is not to be produced into this common tank battery. The Queen is sour.

But if you did find it necessary to commingle the Queen and the Drinkard and perhaps the Blinebry in one battery, you would separately meter the production from each prior to commingling?

A That's true.

MR. PAYNE: Thank you.

A It would be another battery similar to this.

MR. BRATTON: I believe, Mr. Payne, if the production from the Drinkard were such that we had to put it in with the Queen or commingle it otherwise, we would have to come before the Commission with a new application.

MR. UTZ: In other words, the Queen is entirely outside of the scope of this hearing?

MR. BRATTON: That is correct.

THE WITNESS: That's right.

MR. UTZ: Any other questions? If not, the witness may be excused.

(Witness excused.)

MR. UTZ: Case 1588 will be taken under advisement.

STATE OF NEW MEXICO)

COUNTY OF BERNALILLO)

I, Joseph A. Trujillo, Notary Public in and for the County of Bernalillo, State of New Mexico, do hereby certify that the foregoing and attached Transcript of Hearing before the New Mexico Oil Conservation Commission was reported by me in Stenotype and reduced to typewritten transcript, and that the same is a true and correct record, to the best of my knowledge, skill and ability.

WITNESS my Hand and Seal this 5th day of February, 1959, in the City of Albuquerque, County of Bernalillo, State of New Mexico.

NOTARY PUBLIC

My Commission Expires:
October 5, 1960

I do hereby certify that the foregoing is a complete record of the proceedings in

Examiner Conservation Commission