

BEFORE THE  
OIL CONSERVATION COMMISSION  
STATE OF NEW MEXICO  
Santa Fe, New Mexico  
July 2, 1958

TRANSCRIPT OF HEARING

Case 1475

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BEFORE THE  
OIL CONSERVATION COMMISSION  
STATE OF NEW MEXICO  
Santa Fe, New Mexico  
July 2, 1958

-----:  
IN THE MATTER OF: :

Application of Sinclair Oil and Gas Company for :  
permission to commingle oil from two separate :  
pools in common storage. Applicant, in the :  
above-styled cause, seeks an order authorizing :  
it to commingle the Kemnitz-Wolfcamp Pool and : Case  
Kemnitz-Pennsylvanian Pool production from its : 1475  
State Lea 692 Well No. 1 located 660 feet from :  
the South lines of Section 24, Township 16 :  
South, Range 33 East, Lea County, New Mexico. :  
-----:

BEFORE:

Mr. Daniel S. Nutter, Examiner

TRANSCRIPT OF HEARING

MR. PAYNE: Case 1475. Application of Sinclair Oil and  
Gas Company for permission to commingle oil from two separate pools  
in common storage.

MR. BURTON: Mr. Examiner, I am Horace Burton from Midland,  
Texas, representing Sinclair Oil and Gas Company, and Mr. Powers  
will be our engineering witness in support of this application.

(Witness sworn.)

RICHARD E. POWERS

called as a witness, having been first duly sworn, testified as  
follows:

DIRECT EXAMINATION

By MR. BURTON:

Q Give your name and employment.

A Richard E. Powers. I am employed as Division Engineer with Sinclair in Midland, Texas.

Q Have you previously testified before the Commission?

A No, sir.

Q Will you state your training and experience in the field of petroleum engineering?

A I received a B. S. degree in petroleum engineering from Louisiana State University in 1947. Following graduation I was employed by Arkansas Natural Companies which included the Arkansas Field Oil and Arkansas-Louisiana Natural Gas Company as a Junior Petroleum Engineer. Subsequent jobs were as Foreman, District Engineer and as Chief Production Engineer up until 1952, at which time I accepted employment with Southern Production Company as Senior Engineer. At the time of the sale of Southern Production Company to Sinclair in November, 1956, I accepted employment with Sinclair and was transferred to Midland as Division Engineer at that time and have been there since.

Q You have been working in the West Texas-New Mexico area for about the last year, year and a half?

A Year and a half.

MR. BURTON: Are there any objections to the qualification

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of the witness?

MR. NUTTER: The witness is qualified.

Q The records of the Commission will show, will they not, that an order has been issued you for the dual completion of this well that is the subject of this application?

A Yes, sir, I believe it was Order No. 1200, dated June 18, 1958.

Q Have you made a study of the facts concerning the commingling into common storage that is concerned with this hearing?

A I have.

Q Will you proceed with your testimony in narrative form and inform the Examiner as to the status of the well at the present time, and explain the method of commingling and the separate measurement that you propose and state whether or not it will be accurate, and explain the savings in cost that will be accomplished.

A Well 692 No. 1, which this application concerns, is a proposed dual completion in the Wolfcamp and the Pennsylvanian zones of the Kemnitz Field. At the current time the well is drilling at approximately 11,200 feet. It's anticipated that the well will be completed within the next two weeks. Our application request is to permit commingling the production from the Wolfcamp-, Kemnitz-Wolfcamp and Kemnitz-Pennsylvanian Pools into common storage.

~~Under our proposal we would like to use either a P. D. or~~

metering separator measuring the production from one zone into the common storage, subtracting that total production from the measurement device from the total production into common storage to obtain the production from the other zone. Both means of measurement have been proven satisfactory in other areas and acceptable. The equipment that we propose to use at this time as a metering separator gives a thousand barrel capacity. We have costed out our various means of effecting this manner of measuring in the area.

Q Do you have a plat of the lease and adjoining leases?

A Yes, sir, marked Exhibit 1. On Exhibit 1 is the area showing the Kemnitz Field area. There are the present time 33 Wolfcamp wells, one Pennsylvanian well in the Kemnitz Pool, and in the Kemnitz Cisco Pool there are two Pennsylvanian wells. The Well No. 1, 692 No. 1 is located in the Southwest Quarter, Section 24, Township 16 South, Range 33 East.

Exhibit 2 is a cost analysis of the proposed means of measuring and commingling the production into common storage. The first item is cost of the metering separator, regular separator, cost of 500 barrel tanks, thousand barrel tanks, cost of separate battery for each zone to handle 200 barrels per day production, cost of commingling both zones with 400 barrels per day production into 2,000, two 1,000 barrel tanks using one regular separator, one metering separator, using the two 1,000 barrel tanks, two metering separators, using the same tankage, using two separators,

one P. D. meter, two separators and two P. D. meters. Savings in cost proposal of measuring one zone would be \$1792. Measuring both zones, \$1583 dollars. A difference of around \$209.00.

Q That is the difference between using one metering separator and two metering separators?

A That is correct. We feel that this proposal would not impair the protection of correlative rights and would result in economic saving.

Q What is the total savings here as shown on your Exhibit 2 under your proposal? Did you state that?

A Total savings measuring one zone, metering one zone, would be \$1792 over separate installations.

Q Do you believe that the granting of this application would be in the interest of waste prevention?

A Economic waste prevention.

Q You don't have a well yet in either zone, do you?

A No, sir. We have drillstem tested in the Wolfcamp. Recoveries were not too favorable. However the pressure data indicated the possibility of production. The well is offset to the southwest by Forest Oil Company's well which was productive in both zones. They had an application for dual completion which the Commission denied. They are currently producing from the Wolfcamp Zone at this time.

Q Which well is that?

A The Forest Oil State A No. 1 in Section 26. It was originally completed and produced from the first of this year to May, I believe it was, in the Pennsylvanian Zone, and was then plugged back to the Wolfcamp. The well is offset to the East by the Seeman Unit No. 5 which Sinclair operates which is producing from the Wolfcamp Zone.

Q What are the gravities of the oil from those two zones, pretty much the same or do you know?

A The gravity of the oil from the Pennsylvanian is approximately 39. From the Wolfcamp around 41 A.P.I. gravity. In that connection I might mention that there is a slight price differential which commingling these oils 50-50 would put it above the 40 gravity breaking point, approximately two cents per barrel additional revenue.

Q This well is located on a State lease, is it not?

A That is correct.

Q If the Commission feels that two metering separators should be used, you are willing to make that installation?

A Yes, sir. However, we feel that the method we are proposing is adequate and will result in accurate measurement of the production from both zones.

Q What kind of production in quantity do you expect to encounter in the Wolfcamp?

~~A We anticipate to that allowable well which at the current~~

time is 188 barrels per day.

MR. BURTON: That's all.

CROSS EXAMINATION

By MR. NUTTER:

Q What did you say the depth is of your well?

A Approximately 11,200. I don't have that exactly.

Q You stated that you expected it to be completed in two weeks?

A Yes, sir.

Q For both zones?

A Yes, sir, if we don't run into any difficulties in the completion techniques.

Q I note down here at the bottom of your Exhibit No. 2, you show a savings of approximately \$209.00, being the difference of measuring one zone and subtracting the difference of the total, or measuring both zones separately, is that correct?

A Yes, sir. That is the difference in the cost of a P. D. meter or the difference in cost approximately between a regular separator and a metering separator.

Q Is there that much difference in the cost --

A (Interrupting) The regular separator complete is approximately \$935.00. The metering separator is approximately \$1161.00 installed.

Q In either case, it is going to be just slightly more than \$200.00?



A Yes, sir, it happens to work out that way. There are a number of separators, P. D. meters, metering separators on the market today, they're pretty competitive and the prices run approximately the same for the same size.

Q By commingling the oils here, the value of the average is not going to be the average of the gravities, it's going to be in excess of that average. You will make money on this commingling besides saving money?

A It depends on what the gravities run, the Pennsylvanian runs 39 plus a little bit, and some of the Wolfcamp runs 41 plus, some of it is down below, but the average is around 39 to 41. So it just happens to fall on that and it might or might not, it depends on the amount of production if we get top allowable wells.

Q Has your purchaser offered a waiver in this case?

A Well, I imagine that they wouldn't mind. I don't imagine they would mind.

MR. NUTTER: Does anyone have any questions of Mr. Powers? If not, he will be excused.

(Witness excused.)

MR. BURTON: Applicant offers these Exhibits 1 and 2.

MR. NUTTER: Without objection, Sinclair's Exhibits will be received in Case 1475. Does anyone have anything further they wish to offer in the case? If not we will take the case under advisement and take 1477 next.

C E R T I F I C A T E

STATE OF NEW MEXICO   )  
   :   SS  
 COUNTY OF BERNALILLO   )

I, ADA DEARNLEY, Court Reporter, do hereby certify that the foregoing and attached transcript of proceedings before the New Mexico Oil Conservation Commission at Santa Fe, New Mexico, is a true and correct record to the best of my knowledge, skill and ability.

IN WITNESS WHEREOF I have affixed my hand and notarial seal this 7<sup>th</sup> day of July, 1958.

*Ada Dearnley*  
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 Notary Public-Court Reporter

My commission expires:

June 19, 1959.

I do hereby certify that the foregoing is a complete record of the proceedings in the Examiner hearing of Case No. 1478 heard by me on 7-2, 1958.

*William* Examiner  
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 New Mexico Oil Conservation Commission

MAIN OFFICE OCC

1958 JUL 17 AM 9:00