

STATE OF NEW MEXICO  
 ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT  
 OIL CONSERVATION DIVISION

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

CASE NO. 12,740

APPLICATION OF SEELY OIL COMPANY )  
 TO EXPAND THE VERTICAL LIMITS OF )  
 THE UNITIZED FORMATION, LEA COUNTY, )  
 NEW MEXICO )

ORIGINAL

REPORTER'S TRANSCRIPT OF PROCEEDINGS

EXAMINER HEARING

BEFORE: MICHAEL E. STOGNER, Hearing Examiner

October 18th, 2001

Santa Fe, New Mexico

This matter came on for hearing before the New Mexico Oil Conservation Division, MICHAEL E. STOGNER, Hearing Examiner, on Thursday, October 18th, 2001, at the New Mexico Energy, Minerals and Natural Resources Department, 1220 South Saint Francis Drive, Room 102, Santa Fe, New Mexico, Steven T. Brenner, Certified Court Reporter No. 7 for the State of New Mexico.

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Examiner Hearing  
CASE NO. 12,740

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## A P P E A R A N C E S

## FOR THE DIVISION:

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## FOR THE APPLICANT:

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 Artesia, New Mexico 88211-1720  
 By: ERNEST L. CARROLL

\* \* \*

1 WHEREUPON, the following proceedings were had at  
2 9:40 a.m.:

3 EXAMINER STOGNER: At this time I'll call Case  
4 Number 11,740, which is the Application of Seely Oil  
5 Company to expand the vertical limits of the unitized  
6 formation, Lea County, New Mexico. This concerns the  
7 Central EK Queen Unit.

8 Call for appearances.

9 MR. CARROLL: Mr. Examiner, my name is Ernest  
10 Carroll of the Losee, Carson, Haas and Carroll law firm of  
11 Artesia, New Mexico, and I'm here appearing on behalf of  
12 the Applicant Seely Oil Company, and I have two witnesses.

13 EXAMINER STOGNER: Any other appearances?

14 Will the two witnesses please stand to be sworn  
15 at this time?

16 (Thereupon, the witnesses were sworn.)

17 MR. CARROLL: I would call as my first witness  
18 Clarence Stumhoffer. May I proceed, Mr. Examiner?

19 EXAMINER STOGNER: Please.

20 CLARENCE W. STUMHOFFER,  
21 the witness herein, after having been first duly sworn upon  
22 his oath, was examined and testified as follows:

23 DIRECT EXAMINATION

24 BY MR. CARROLL:

25 Q. Mr. Stumhoffer, would you state your full name

1 and address for the record?

2 A. I'm Clarence Stumhoffer, S-t-u-m-h-o-f-f-e-r.

3 I'm from Fort Worth, Texas.

4 Q. How are you employed, Mr. Stumhoffer?

5 A. I'm a consulting petroleum engineer for Seely Oil  
6 Company.

7 Q. Now, Mr. Stumhoffer, have you had an opportunity  
8 to testify prior to today's date before the Oil  
9 Conservation Division of New Mexico and have your  
10 credentials accepted as a petroleum engineer?

11 A. Yes, I have.

12 Q. Now, Mr. Stumhoffer, are you familiar with and  
13 knowledgeable about the Application of Seely Oil Company to  
14 expand the vertical limits of unitized formation for the  
15 Central EK Queen Unit?

16 A. Yes, I am.

17 MR. CARROLL: I would tender Mr. Stumhoffer as an  
18 expert, a petroleum expert, engineer expert, with respect  
19 to this case.

20 EXAMINER STOGNER: Mr. Stumhoffer is so qualified  
21 as all three experts.

22 Q. (By Mr. Carroll) Mr. Stumhoffer, are you  
23 familiar with the Central EK Queen Unit, located in Lea  
24 County, New Mexico?

25 A. Yes, I am.

1 Q. Have you been involved with this unit since it  
2 was first approved by the OCD back in 1993?

3 A. Yes, I have.

4 Q. Did you testify at the original hearing, Mr.  
5 Stumhoffer?

6 A. Yes, I did.

7 Q. Mr. Stumhoffer, I would ask you to turn to  
8 Exhibit Number 1. Would you identify what that exhibit is  
9 for the record?

10 A. Exhibit Number 1 is a copy of the unit agreement  
11 for the development and operation of the Central EK Queen  
12 Unit area, located in Lea County, New Mexico, and it's the  
13 complete document, approved document, showing the unit area  
14 and...

15 Q. All right. Now, Mr. Stumhoffer, on page 2 of the  
16 unit agreement there are some definitions, are there not?

17 A. That's correct.

18 Q. There is a definition for "unitized formation";  
19 is that correct?

20 A. That is correct.

21 Q. And this is the "unitized formation" definition  
22 that this unit has been operated under since its inception;  
23 is that correct?

24 A. That is the original unitized "unitized  
25 formation" definition.

1 Q. The Seely Oil Company seeks to expand that, does  
2 it not?

3 A. Yes.

4 Q. Would you read into the record the new "unitized  
5 formation" definition which Seely Oil seeks to have  
6 adopted?

7 A. Yes, I will. "Unitized formation" is defined as  
8 that stratigraphic interval occurring between a point from  
9 the top of the Yates sand at approximately 3240 feet, to  
10 100 feet below the base of the Queen sand, said interval  
11 occurring between 3240 feet and 4770 feet in the General  
12 Operating Company Santa Fe State Well Number 2, located 330  
13 feet from the north line and 990 feet from the east line of  
14 Section 18, Township 18 South, Range 34 East, NMPM, Lea  
15 County, New Mexico, as recorded on the Welex compensated  
16 density dual spaced neutron log of said well dated January  
17 20th, 1986.

18 Q. Mr. Stumhoffer, for clarification, Seely Oil  
19 Company seeks only to offer this "unitized area" definition  
20 and seeks no other modifications of the unit agreement or  
21 the waterflood or anything else; is that correct?

22 A. That is correct.

23 Q. I'd ask you to turn to the second exhibit,  
24 Exhibit Number 2. Would you identify that exhibit for the  
25 record?

1           A.     Exhibit Number 2 is a map of the Central EK Queen  
2     Unit on which we've shown the waterflood development of the  
3     property, with the injection well shown with a blue  
4     triangle and the existing producing wells, which are in the  
5     Queen Reservoir, with green circles.

6           Q.     Could you give us a brief history of this unit so  
7     as to familiarize the Examiner with what's going on out  
8     there?

9           A.     The Central EK Queen Unit was formed during 1993  
10    for the waterflood development of the Queen sand under a  
11    group of leases covering 988.40 acres of State of New  
12    Mexico land, located in Sections 7, 8, 9, 17 and 18 of  
13    Township 18 South, Range 34 East, Lea County, New Mexico.  
14    This Queen sand waterflood is located in the EK Yates-Seven  
15    Rivers-Queen field that produces from the Yates, Seven  
16    Rivers and Queen reservoirs.

17                 During the development of the Queen sand  
18    waterflood, a thin but potentially oil-productive zone in  
19    the Yates was encountered, and it is our desire to produce  
20    this zone by primary means with the existing Queen sand  
21    waterflood operation.

22           Q.     Now, Mr. Stumhoffer, I believe you mentioned that  
23    the sole mineral owner and royalty-receiving party in this  
24    entire unit is the State of New Mexico; is that correct?

25           A.     That is correct.



1 Q. Is there anything else that you would like to  
2 offer to the Examiner with respect to Exhibit Number 2?

3 A. Well, not at this time. I just -- It's pretty  
4 straightforward. It shows the wells that -- This is a  
5 complete waterflood development map of the Central EK Queen  
6 Unit.

7 Q. Would you then turn to your Exhibit Number 3?

8 A. Okay.

9 Q. Would you identify for the record and then give  
10 your thoughts on how this particular exhibit relates to the  
11 Application?

12 A. Exhibit Number 3 is a progress report for the  
13 Central EK Queen Unit performance for the months of May  
14 through July of 2001. It shows the oil production.

15 In July -- I might want to point out, in July the  
16 unit produced 263 barrels of oil per day and 295 barrels of  
17 water per day. And cumulative waterflood all to date is  
18 288,233 barrels.

19 This includes a copy of -- shows all the  
20 production his- -- tests on the wells within the unit area,  
21 water injection data, reinjecting -- We've injected  
22 2,064,500 barrels of water, and in July we injected 29,448  
23 barrels of water.

24 The last page -- There are four pages to this  
25 exhibit. The last page is a performance curve of the

1 project from the original date when it was formed. And as  
2 you can see, it's done pretty well.

3 Q. Mr. Stumhoffer, in looking at your exhibits this  
4 appears that the development of this particular unit is  
5 completed. In other words, the wells that are going to be  
6 drilled, or which were proposed when this unit was first  
7 presented to the OCD, they have all been drilled; is that  
8 correct?

9 A. That's correct.

10 Q. And however, there is still -- While this unit  
11 has been in existence, approximately eight years, this  
12 thing still has some productive life or history left; is  
13 that correct?

14 A. That is correct. And we'd like to produce the  
15 other oil, which -- Well, this will be discussed at a  
16 later --

17 Q. Mr. Charles Seely is also a petroleum engineer,  
18 will be the other witness on behalf of that --

19 A. That's correct.

20 Q. All right. I would ask you to pull the last  
21 exhibit, it's Exhibit Number 11, off of your exhibit stack.  
22 It will be right on the bottom, the certificate of mailing  
23 and compliance.

24 A. Right.

25 Q. Mr. Examiner, you have the original of my

1 affidavit. I would note that with respect to the -- I  
2 think there are some 37 individuals that we gave notice,  
3 the green cards have been attached except for one, and it's  
4 on page 3, it's a McInnes Resources Company. That is a  
5 small company which is run by one of my partners. We hand-  
6 delivered the notice to him, and there is an affidavit to  
7 that effect attached to the back of this -- along with the  
8 return green cards.

9 We have received no notices of objection or,  
10 frankly, any inquiries to what -- with respect to our  
11 Application. And with respect to that, Mr. Stumhoffer,  
12 this group of 37 people that we have listed here, these are  
13 the people that were the original participants in this unit  
14 agreement, are they not?

15 A. That is correct.

16 Q. Okay. And Seely oil has managed this unit from  
17 beginning till the present time?

18 A. From the original date.

19 MR. CARROLL: Mr. Examiner, at this time I would  
20 move admission of Exhibits 1, 2, 3 and 11.

21 EXAMINER STOGNER: Exhibits 1, 2, 3 and 11 will  
22 be admitted into evidence.

23 Q. (By Mr. Carroll) Mr. Stumhoffer, is there  
24 anything that I may have overlooked with respect to the  
25 testimony you desire to give in connection with this

1 Application?

2 A. I believe we've covered it pretty well.

3 MR. CARROLL: I would pass the witness, then, Mr.  
4 Examiner.

5 EXAMINER STOGNER: Thank you.

6 EXAMINATION

7 BY EXAMINER STOGNER:

8 Q. Mr. Stumhoffer, did you receive your notice?

9 A. Yes.

10 Q. Okay, because I notice your name is on there.

11 In referring to the map -- that's your exhibit  
12 Number 2?

13 A. Right.

14 Q. And you stated that this is fully developed.

15 A. Yes.

16 Q. When did the last injection well come on line,  
17 roughly? I mean, you started in 1993 --

18 A. 1993, and it has been spread out over the last  
19 eight years. It has been just within the last year or two.  
20 It's been a long development period, because we had to  
21 drill a lot of wells.

22 Q. You had to drill a lot of injection wells or --

23 A. A lot injection wells and producing wells.

24 Q. Okay. Now, your --

25 A. We drilled -- of the wells we drilled -- we

1 drilled a well in the northwest quarter of the southwest  
2 quarter of Section 8, an injection well. We drilled an  
3 injection well in the southeast of the southwest of Section  
4 7, and we drilled a well in an unorthodox location in the  
5 northeast of the northeast of Section 18, Well Number 8-3,  
6 we drilled the well in the northeast northeast of Section  
7 17, which is Well Number 11-2, we drilled -- that's a total  
8 of four injection wells we drilled.

9 And producers we drilled were three wells that  
10 are located with the green, located in Section 7, more  
11 specifically the Well Number 16 located in the northwest of  
12 the southeast of 7, the Well Number 17 located in the  
13 southwest of the southwest of 7, and the Well Number 14  
14 located in the southeast of the southeast of Section 7.

15 So we've drilled a total of seven wells over the  
16 last eight-year period. I can't remember the exact date  
17 when we did the last one.

18 Q. Does Seely plan to drill any more producing  
19 wells?

20 A. No.

21 Q. At least not at this time?

22 A. Not at this time.

23 Q. Okay. Do you know what the rates and pressures  
24 of injection -- the injection pressures and injection rates  
25 are out there?

1           A.    We're injecting right at 1000 barrels a day, and  
2   the average pressure is running about 2100 pounds.  It  
3   varies a little bit per well, on the individual well.  And  
4   we have done this through the step-rate test procedure to  
5   get the pressures up to that point.

6           Q.    Is that pretty indicative -- that 2100, 2200  
7   pounds pressure, pretty indicative of the pressure of the  
8   entire reservoir across that area?

9           A.    Yes, yes.  It requires that much pressure to get  
10  the water in the formation.

11          Q.    Now, are there other injection projects around  
12  the Central EK Queen Unit?

13          A.    Yes, there were some old projects to the  
14  southwest in the EK Queen Field.  There was the Mobil EK  
15  Queen Unit, and it was formed back in 1966 and it's still  
16  active, although it's very reduced operation, but Seely Oil  
17  Company also operates it.

18                And then there was the Murphy Baxter North -- I  
19  think it was the North -- the EK Queen Unit, north of the  
20  Central EK Queen Unit.  That's been plugged and abandoned.  
21  I think -- The unit has been dissolved, but there are a few  
22  of the producing wells still in existence.

23          Q.    Now, the injection has always been and still is  
24  the Queen formation within that original unitized formation  
25  interval?

1 A. Yes, it is, Mr. Examiner.

2 Q. And at this time the injection interval is not to  
3 change or -- I don't have the copies of the previous orders  
4 in front of me, so I don't know what it actually said.

5 A. The new zone that we're proposing to expand the  
6 unitized formation to include will not be waterflooded. We  
7 just want to be allowed to produce this zone while we're  
8 operating this waterflood, because the zone is very thin,  
9 and it's not going to be economically feasible. I'm  
10 getting into some testimony that Mr. Seely is going to  
11 give.

12 EXAMINER STOGNER: Okay, then I'll wait and hear  
13 from him then.

14 Okay, I don't believe I have any other questions  
15 of Mr. Stumhoffer. You may be excused.

16 MR. CARROLL: Thank you, yes.

17 Mr. Seely? May I proceed, Mr. Examiner?

18 EXAMINER STOGNER: Please.

19 CHARLES W. SEELY,  
20 the witness herein, after having been first duly sworn upon  
21 his oath, was examined and testified as follows:

22 DIRECT EXAMINATION

23 BY MR. CARROLL:

24 Q. Mr. Seely, would you state your full name,  
25 residence and occupation?

1           A.    I'm Charlie Seely in Fort Worth, Texas.  I'm a  
2   petroleum engineer and the owner of Seely Oil Company.

3           Q.    All right.  The Applicant in today's hearing; is  
4   that correct?

5           A.    Correct.

6           Q.    Mr. Seely, you have had occasion over numerous  
7   times to testify and have your credentials accepted as a  
8   petroleum engineer, have you not?

9           A.    In the State of New Mexico since 1963.

10          Q.    And Mr. Seely, you are familiar with this  
11   Application being made on behalf of Seely Oil?

12          A.    That's correct.

13               MR. CARROLL:  I tender Mr. Seely as an expert in  
14   the field of petroleum geology [*sic*], Mr. Examiner.

15               EXAMINER STOGNER:  Mr. Seely is so qualified.

16          Q.    (By Mr. Carroll)  All right, Mr. Seely, would you  
17   give kind of a brief overlook, if you will, a statement of  
18   why this Application has been made to the OCD?  And if you  
19   need to, I would ask that -- if you need to refer to your  
20   Exhibit Number 4, please do.  And when you do refer to it,  
21   please identify it for the record as to exactly what  
22   Exhibit 4 is.

23          A.    Okay, we will refer to Exhibit 4, and it is a  
24   Yates formation data map, production data map.

25               There have been three wells in the general area



1 of the Central EK Queen Unit that have produced from the  
2 Yates formation, and they've averaged about 24,000 barrels  
3 per well. You can see that two immediately offset the  
4 Central EK Queen Unit to the west, and there's one that's  
5 in the unit.

6 Current production from the wells, we've  
7 converted the one in the unit to a water injection well in  
8 the Queen sand. The other two combined produce about five  
9 or six barrels a day.

10 Q. When you look at your exhibit, I think the two  
11 wells you're talking about, the top one has got a 3 by it  
12 and a red --

13 A. They're shown in red, yes --

14 Q. Red --

15 A. -- circled in red, that's correct.

16 Q. And then the number by it is 3 for the top one  
17 and 5 for the bottom one?

18 A. That's correct.

19 Q. There's a rectangular box, and it has -- as for  
20 the 3 well, the 25,697, and then the bottom half of the box  
21 has a 2. Is not the upper number the total production of  
22 oil from that well and the bottom number the daily  
23 production?

24 A. That's correct, as shown in the legend on the  
25 map.

1 Q. The 3-1 well, which is actually in the unit, you  
2 had a short productive period, did you not, and then this  
3 was a -- this well had been intended to be an injection  
4 well, was it not?

5 A. That's correct.

6 Q. And so you have now put it on as an injection  
7 well?

8 A. That's right.

9 Q. All right. Would you then continue on with your  
10 testimony as to how this stringer was discovered and why  
11 you believe it is necessary to amend the unitized formation  
12 interval with respect to this unit?

13 A. Before I get into that, in Exhibits 5, 6 and 7  
14 are detailed curves of the oil and gas and water production  
15 from those three wells.

16 Q. All right. If I might just clarify for the  
17 record, we have the State DW Number 3. That is the well  
18 that has on Exhibit 4 the Number 3 by it; is that correct?

19 A. That's correct, that's correct.

20 Q. And then the State DW Number 5, which is Exhibit  
21 6 --

22 A. That's correct.

23 Q. -- is the 5 well --

24 A. Uh-huh.

25 Q. And then the State OG 2414 Number 1, that would

1 be the well that we were just talking about, the 3-1, which  
2 briefly produced in this Yates formation but has now been  
3 put on injection --

4 A. That's correct.

5 Q. -- injection status?

6 A. That's --

7 Q. All right --

8 A. -- correct.

9 Q. -- and that's Exhibit Number 7. All right, sir.

10 A. This zone is very thin, two to four feet. We  
11 thought it probably was the Yates sand to begin with, and I  
12 guess most of the other operators did too, because when  
13 they perforated the Yates interval they perforated  
14 everything, including the Yates sand. And naturally they  
15 thought that's where it was coming from.

16 We have since found with our additional drilling  
17 that it actually is coming from a thin dolomite section  
18 just immediately below the Yates sand. And with this  
19 additional drilling we found that it extends pretty much  
20 throughout most of the unit. We have logs and sample shows  
21 and cores and that type thing to back this up.

22 We had a show in Well Number 16, which -- in the  
23 unit, which we thought probably came from the Yates sand.  
24 We sidewall cored the Yates sand and thought we cored in  
25 the wrong place because it was not productive. But that

1 told us that we might need to look a little bit farther.

2 So in Well Number 17, which is located in the --  
3 and that's the last well we drilled -- located in the  
4 southwest southwest of Section 7, we ran a conventional  
5 core through the whole Yates section and --

6 Q. Mr. Seely, with respect to the two wells you were  
7 just talking about, the sections -- the Well Number 16 that  
8 you were referring to has the red notation, said "good show  
9 in samples", and a red arrow pointing to it; is that  
10 correct?

11 A. Yeah, and then --

12 Q. And the one that you cored is the "4' thick..."

13 A. That's correct.

14 Q. -- notation, and points to a well marked 17?

15 A. That's correct.

16 Q. And you actually have presented as an exhibit the  
17 core sample as Exhibit Number 8; is that correct?

18 A. That's correct.

19 Q. Okay, if you'll continue your testimony, then,  
20 about the --

21 A. And on this Exhibit Number 8 you'll see the first  
22 seven samples are -- it doesn't say there, but that is from  
23 the Yates sand. And samples 9 through 12 are from this  
24 dolomitic section. And you can see that it exhibits good  
25 porosity and permeability, fluorescence, oil saturation and

1 so forth to probably be a productive well.

2 To further indicate that early drilling missed  
3 this, there was a well drilled in the northwest of the --  
4 northeast of the southwest of Section 7, by Sun Ray Mid-  
5 Continent, called the State G Number 3. It's shown on the  
6 map as a dryhole. It's in location K in Section 7. The  
7 Yates sand only was perforated and fracture treated, but it  
8 didn't make a well. This was a cable-tool hole drilled  
9 back in around 1955, and I'm sure it had a show where they  
10 wouldn't have set pipe and tried it.

11 Then looking across the unit, there are a couple  
12 of cross-sections.

13 Q. The first is Exhibit Number 9, is it not?

14 A. That's correct, which is cross-section A-A. And  
15 you'll see it goes from the State "DW" Number 3, which did  
16 produce, across the unit and down to 883 [sic], which is  
17 down in Section 18.

18 You can see on there it shows the Yates. The  
19 zone is so thin if I had put a top and a bottom on it, we  
20 wouldn't have been able to see it, so... But I do have it  
21 highlighted in yellow so that you can trace it through all  
22 of those wells down to 83 [sic].

23 I did the same thing with this other cross-  
24 section, B-B --

25 Q. Which is Exhibit 10, is it not?

1           A.     Exhibit 10, and it goes from west to east all the  
2 way across the unit. And you see this first well there,  
3 which is the State "DW" Number 5, is a producer. It's made  
4 29,000 barrels.

5                     Then coming on over to the next well is Number  
6 17, which is the one that we had the core on, and you can  
7 see it's got a pretty good looking section there.

8                     Then you can also follow that same zone all the  
9 way across the unit.

10           Q.     Mr. Seely, with respect to this Application, why  
11 do you feel it is necessary that you get approval to amend  
12 the vertical limits of this producing -- or unitized  
13 formation?

14           A.     Well, if you had to -- The wells that we have out  
15 there we're presently using, there are maybe one or two or  
16 so that will free up as we keep producing and as the  
17 project goes along. But the reserves on this, each one of  
18 these wells, is -- at least the three that we have there,  
19 they average like 24,000 barrels. I did a volumetric  
20 calculation and I pretty much supported that with a four-  
21 foot thickness, I came up with about 24,000 barrels, using  
22 the porosity off of the core data.

23                     Then with a three-foot section which -- some of  
24 this is going to be three and maybe even less than that --  
25 be about 18,000 barrels. And if it were two foot, it would

1 be like 12,000.

2 The cost to drill a Yates producer would be  
3 something over \$300,000. We've estimated with an AFE of  
4 \$309,000, operate the well for eight years and that's  
5 another \$96,000.

6 Income from like an average of 24,000 barrels,  
7 we've estimated \$355,000. This is -- as you can see, would  
8 result in a loss. It's based on \$20 oil, 80-percent net  
9 revenue interest, and a 7-1/2-percent state and local tax.

10 The reserves themselves just don't support  
11 drilling new wells, but by granting permission to expand  
12 the unit to include the Yates, the wells could be  
13 recompleted, and by granting this vertical expansion there  
14 could be a possible increased reserves of, say, the 18  
15 wells that we have, average of 24,000 barrels, something  
16 over 400,000 barrels, and the State has the royalty on this  
17 so this would be an additional 50,000 barrels to the State  
18 at a value of about a million dollars.

19 Q. With respect to this request, I take it, then,  
20 from your testimony that if we're not allowed to produce  
21 this as we go -- as we're still continuing the unit  
22 operations, this stringer would become uneconomic; is that  
23 correct? And by what I'm saying is that the cost of doing  
24 all this, if it can be included during the operations and  
25 become part of the --

1 A. Oh, sure.

2 Q. -- operations of the overall unit --

3 A. Right.

4 Q. -- it becomes economic --

5 A. Yeah.

6 Q. -- whereas otherwise it would not be economic?

7 A. Yeah, because at this time and for the next  
8 probably eight years or so, I think we'll have probably  
9 economic operation of this unit.

10 Q. Okay, and that will allow you to keep staff out  
11 there and the production equipment and what have you --

12 A. Sure.

13 Q. -- to collect this -- while this -- overall  
14 reserves are close to a half million barrels of oil,  
15 400,000, that's still not enough to justify going in and  
16 trying to produce this particular small interval?

17 A. No, it's not enough to justify drilling 18 wells  
18 to get that type reserve.

19 Q. Okay. Now, with respect to this Application, do  
20 you feel that it would be in the best interest of the Oil  
21 Conservation Division to approve it with respect to the  
22 issue of protection of correlative rights?

23 A. Oh, absolutely. The zone is -- looks like pretty  
24 much the same throughout there, so I cannot see that there  
25 would be a problem with correlative rights at all. And



1 with the -- it would protect the owners of the unit,  
2 correlative rights, if we were allowed to go ahead and do  
3 this.

4 Q. With respect to the issue of waste, do you feel  
5 that it is in the best interest of the prevention of waste  
6 of the oil that is located in this Yates formation to  
7 approve this Application?

8 A. I don't think that it will -- I know I certainly  
9 can't drill, and I don't know of anyone else who can  
10 drill --

11 Q. So --

12 A. -- to lose money.

13 Q. So in your --

14 A. I think --

15 Q. -- in your opinion --

16 A. -- you'll lose --

17 Q. -- this oil would be lost?

18 A. I think it would be lost, yes.

19 Q. With respect to the production out here in the  
20 Yates, Seven Rivers and Queen formation, this has always  
21 been considered by the OCD as one field, has it not?

22 A. As one field, that's correct.

23 MR. CARROLL: Okay. Mr. Examiner -- Well, at  
24 this time I would move the admission of Exhibits 4 through  
25 10.

1 EXAMINER STOGNER: Exhibits 4 through 10 will be  
2 admitted into evidence.

3 Q. (By Mr. Carroll) Mr. Seely, is there any further  
4 comments that you would like to make with respect to this  
5 Application or the exhibits that have just been admitted?

6 A. Well let me just say, we absolutely do not intend  
7 to waterflood this, not at this time. But I don't want to  
8 say forever that we wouldn't, but if we do, that's a  
9 different story.

10 Q. And that would be the subject of a --

11 A. Of a different --

12 Q. -- subsequent Application --

13 A. That's correct.

14 Q. -- to the OCD, and you recognize --

15 A. That's correct.

16 Q. -- the necessity for that before you would ever  
17 attempt --

18 A. Sure.

19 Q. -- any type of --

20 A. Sure.

21 Q. -- waterflood operations?

22 Anything further, Mr. Seely?

23 A. No.

24 MR. CARROLL: Mr. Examiner, I would pass the  
25 witness.

1 EXAMINER STOGNER: Thank you, Mr. Carroll.

2 EXAMINATION

3 BY EXAMINER STOGNER:

4 Q. Mr. Seely, what language will be utilized to  
5 replace the unitized formation?

6 MR. CARROLL: Mr. Stumhoffer, that language -- We  
7 utilized that language in the Application, Mr. Stogner, but  
8 I have a -- what Mr. Stumhoffer read into the record right  
9 here for you. It's this typewritten -- right there, that's  
10 what Mr. Stumhoffer read into the record during his  
11 testimony.

12 EXAMINER STOGNER: Okay, he read what was to be  
13 changed?

14 MR. CARROLL: Yes, sir, the new language that we  
15 are seeking.

16 EXAMINER STOGNER: Okay.

17 MR. CARROLL: I apologize, I should have  
18 presented that as an exhibit but I did not. If the  
19 Examiner would like, I can do that as a subsequent exhibit,  
20 but it is in the Application.

21 EXAMINER STOGNER: Well, I guess I need to ask  
22 Mr. Stumhoffer, because I did have some questions  
23 concerning that, but I'll call him later. Okay, let's see.

24 Q. (By Examiner Stogner) Now, are any of these  
25 wells -- and I'm referring to your Exhibit Number -- which

1 map do you have in front of you?

2 MR. CARROLL: Four.

3 THE WITNESS: Four, I think it is.

4 Q. (By Examiner Stogner) Exhibit Number 4?

5 A. Yes.

6 Q. Are any of these wells currently producing from  
7 that upper Yates --

8 A. Yes.

9 Q. -- Yates sand?

10 A. The two not in the unit but offsetting the unit.

11 Q. Okay, how about wells within the unit?

12 A. No, there's no production.

13 Q. Okay, what are your plans on completion within  
14 the Yates formation within this unit? Will they be the  
15 producing wells, the injecting wells?

16 A. No. For instance, there's one injection well  
17 that we don't think that we need, that was used in the  
18 Murphy Baxter flood that we re-entered and restored the  
19 injection into it. Instead of having to plug this well --  
20 and this is one of the reasons we need this, because with  
21 these orphan-well-type things occurring we either need to  
22 plug it or we need to make it productive. And that's  
23 probably the first well that we would submit for an  
24 application to recomplete.

25 Q. And which one --

1           A.    There's also another well that essentially has  
2   watered out, which is Well Number 2-2 over in Section 8.  
3   It's in the southeast of the southeast of Section 8. That  
4   well has essentially watered out, and we would probably  
5   work on it within the very near future. Either that or  
6   we'd have to plug it.

7           Q.    Okay, let's talk about that 2-2 well.

8           A.    Okay.

9           Q.    How will that be recompleted? Will the Queen  
10   formation be --

11          A.    Completely shut off.

12          Q.    -- squeezed or -- Completely shut off?

13          A.    That's correct.

14          Q.    And that's the way -- and that would -- any other  
15   completion to the Yates would also be like that where the  
16   Queen was shut off completely; is that what I'm hearing?

17          A.    Well, certainly if that's the case in this 2-2,  
18   in this injection well, it would certainly be true in the  
19   recompletion of all injection wells.

20                For example, Well Number 16, the one that had the  
21   good show in the samples, that well could be recompleted at  
22   this time in the Yates, but it's a very tight well in the  
23   Queen, but we really don't want to -- we don't want to  
24   squeeze it off because we think that we may be getting some  
25   response at a later date.

1 Q. Well, Mr. Seely --

2 A. It's not very close to water injection, and it's  
3 just going to take some time, probably, for it to get  
4 there.

5 Q. Okay. Well, bear with me here, I --

6 A. Sure.

7 Q. -- I don't have copies of the old orders, but  
8 you're familiar with the operations out there. So as I  
9 understand it now, the waterflood goes into this unitized  
10 Queen formation --

11 A. That's correct.

12 Q. -- and interval? Also contained within that  
13 waterflood order, which as you stated is not your plans  
14 today, there is a deal in there or a statement in there in  
15 which you are to contain all injected intervals, all  
16 injected fluids into that formation or that injected  
17 interval. So how can you do that if you come in here and  
18 open some of these producing wells up to the Yates  
19 formation if that's not a part of the waterflood? I'm  
20 confused.

21 A. Well, obviously the ones that we are going to  
22 work on, at least first, are going to be the ones that have  
23 already watered out, and we'll squeeze it off or we'll set  
24 a bridge plug, whatever is required with the State.

25 Q. Okay, so it will -- What you're telling me then,

1 either you plan to, or if required, which is --

2 A. Okay.

3 Q. -- required under the current procedures --

4 A. Okay.

5 Q. -- you are to seal off that Queen interval from  
6 any of these Yates formations, so therefore you won't have  
7 any commingling of those fluids into the --

8 A. No.

9 Q. -- interval which has not been covered by the  
10 waterflood; is that correct?

11 A. That's correct.

12 Q. Okay. Now, when I'm looking at the unit  
13 agreement, has this proposed expansion gone to the Land  
14 Office for preliminary approval? What have they said about  
15 it?

16 MR. CARROLL: Mr. Examiner, it has gone, they're  
17 aware of the Application. In fact, I have at their request  
18 submitted more copies of it, and at least preliminarily  
19 they have no objection.

20 EXAMINER STOGNER: Do you have written  
21 confirmation?

22 MR. CARROLL: I have no written confirmation of  
23 that.

24 EXAMINER STOGNER: But they have -- Seely has  
25 presented this, either through the mail or in person, to

1 the State Land Office?

2 MR. CARROLL: Through the mail, yes, sir.

3 EXAMINER STOGNER: Okay. Now, I have some  
4 questions about the unit agreement in this unitized  
5 formation. Do I need to ask Mr. Stumhoffer or Mr. Seely?

6 MR. CARROLL: I would suspect Mr. Seely has --

7 EXAMINER STOGNER: Okay.

8 MR. CARROLL: -- as good a feel --

9 THE WITNESS: I would hope so.

10 MR. CARROLL: -- he's been in it since the  
11 beginning too.

12 Q. (By Examiner Stogner) Okay, Mr. Seely, in  
13 looking at the unit agreement --

14 MR. CARROLL: That's Exhibit -- It's there on  
15 your right.

16 Q. (By Examiner Stogner) Okay, now this Yates  
17 formation portion is essentially -- how would you classify  
18 it? A wildcat unit or development unit, or how would you  
19 classify this unit as far as the Yates formation goes?

20 A. Well, it certainly wouldn't be a wildcat unit.  
21 It would be a development unit.

22 Q. Okay, because there's wording in there, and that  
23 sixth paragraph, "...it is the purpose of the parties  
24 hereto to enable institution and consummation of  
25 secondary...enhanced oil recovery operations..." But



1     you're telling me the Yates formation is not part of that  
2     waterflood agreement, so how can we --

3             A.     Well, we just don't plan on flooding it at this  
4     time, but we probably do plan to put some water into it  
5     before it's over.

6             Q.     Okay.

7             A.     If the zone doesn't make water, it's very thin,  
8     it should be very susceptible to waterflooding, that should  
9     be an additional oil recovery.

10            Q.     Okay, I --

11            A.     But I have to have several wellbores completed in  
12    there before I can really get in with the flood.

13            Q.     Well, I'm sorry, I must have misunderstood Mr.  
14    Stumhoffer's testimony, and he told me it will not be  
15    waterflooded and would not be waterflooded, and now you're  
16    telling me --

17            A.     No, I'm telling you --

18            Q.     -- it is, so I guess I misunderstood --

19            A.     No.

20            Q.     -- and I apologize about that.

21            A.     Well, I apologize for that too, but I'm not going  
22    to say that it's not going to be waterflooded. The first  
23    thing I did when I sat down was that.

24            Q.     Okay, so we're going to expand this unit under  
25    this unit agreement; is that correct?

1           A.     That's right.

2           Q.     Okay, and it's to be included in the secondary  
3 enhanced recovery type of a unit agreement that's filed  
4 with the State Land Office, and as I understand you have  
5 received preliminary approval for this expansion, verbally?

6           A.     Refer to --

7           MR. CARROLL: I think that's the fair  
8 characterization, yes, Mr. Examiner. I have communicated  
9 all of this stuff to them. They have indicated, take it to  
10 the hearing, see if you get approval, then we'll give you  
11 the final approval. And I -- you know, maybe that's the  
12 way they do it, maybe that's not the way. This is a first  
13 for me, I have not expanded a unitized area like this  
14 before, and that seems to be my luck of the draw lately, is  
15 to get some- -- everything that's new.

16           But it is -- we feel that it would still fit  
17 under a second -- as Mr. Seely has testified, is that since  
18 there has been no production other than these two wells  
19 outside of the unit, this is a pristine reservoir which  
20 could not be waterflooded at this stage. We have to get  
21 the production. So we're looking at down the road, then it  
22 will come into play. And at such time, as Mr. Stumhoffer  
23 said, we will then make the appropriate application to the  
24 OCD to allow us then to inject water into this Yates trend.  
25 And that is our full intentions.

1           But again, Mr. Examiner, this is a fluke. No one  
2       knew about it, other than they thought it was the sand, and  
3       only through the core testing that Mr. Seely authorized  
4       when they drilled these last couple of wells were they able  
5       to actually identify the productive interval, which no one  
6       had a clue about.

7           And I suspect that after the word of this hearing  
8       gets out, you're going to see some further activity outside  
9       of this unit with respect to people that already have  
10      wells, that they could allow to go back in and do some  
11      recompletion work.

12           And then this is a typical problem too, Mr.  
13      Examiner. We're coming here with a new find. We control  
14      considerable amounts of this acreage, but we wanted to  
15      bring it so that we can start taking the proper steps in  
16      order to save money, because this is not an economic  
17      project in and of itself, but we're also having to put  
18      everybody on notice that there's a new play out there. And  
19      I've probably said more than Mr. Seely wanted me to say  
20      about that, but that's an explanation. So he's pointing a  
21      finger at me, so I don't know, maybe I should shut up.

22           Q.     (By Examiner Stogner) Okay, I've got a question  
23      here related back to the business that we're here for.

24                   When the original Queen Unit and waterflood was  
25      formed, was there a reason why the whole pool limits were

1 not included in the waterflood and just the Queen?

2 A. We had no reason to even have a foggy idea that  
3 we would ever want to include the Yates in this.

4 Q. Okay, it's usually better in the initial stage to  
5 unitize the whole pool as opposed to just a small portion  
6 of a formation within a big pool, unless there's some  
7 reason, and that's --

8 A. Well --

9 Q. -- the reason I was asking that question, so what  
10 reason was it that it limited to the Queen? But you said  
11 you don't know or that you have no knowledge --

12 A. Well, we have no reason to think that we would  
13 ever use that.

14 Q. Okay, one other question here concerning these  
15 limits. Now when I read the original one it said 100 feet  
16 above the top of the Queen. And you want to change that  
17 now to the top of the Yates --

18 A. That's correct.

19 Q. -- at approximately 3240. Okay, that's --

20 A. In that well, yes.

21 Q. Now then, and this is the same well that you  
22 propose to use the type log, and that's that General  
23 Operating Company Santa Fe State Well Number 2; is that  
24 correct?

25 A. That's correct.

1 Q. Okay. Now, the old agreement said 100 feet below  
2 the base of the Queen sand --

3 A. Correct.

4 Q. -- and it correlated to be 4426. Now, your  
5 change says 100 feet below the base of the Queen sand,  
6 which is identical to the wording up there, but now it's  
7 dropped to 4770. What's the reason there, and what --

8 A. I think -- I know exactly, probably wanting to  
9 include the Penrose, which is lower Queen, and I really  
10 don't see -- Here again, we might come back with it, but I  
11 don't think so. I don't see any reason at all for  
12 including that. I think 100 feet below the existing Queen  
13 sand is sufficient, with the original unit.

14 MR. CARROLL: I think, Mr. Examiner, because Mr.  
15 Haas in my office actually prepared that definition prior  
16 to my being involved in this, I think he was trying to do  
17 what you suggested ought to have been done in the first  
18 place --

19 THE WITNESS: Get the whole --

20 MR. CARROLL: -- get the whole field in there.  
21 And that was the sole purpose, in other words, to keep us  
22 from having to come back here and do another one of these  
23 piecemeal applications, which at the time in 1993 Mr. Carr  
24 did this and Mr. Stumhoffer and Mr. Seely, they did it  
25 based on the best information available to them, and they

1 just thought, you know, there's been so much drilling out  
2 there that that zone was -- that there was no other  
3 productive zone, they thought it was a conclusive proof to  
4 that.

5 And then they've now found out that even our best  
6 guesses are subject to review.

7 Q. Okay, well, maybe the Queen sand here is getting  
8 me confused. When I see the word "from the base of the  
9 Queen sand", I'm thinking that that Queen sand is the base  
10 of the Queen formation; is that true or not true?

11 A. Well, I think it can be either way. But yes, I  
12 agree with you, and that would be the 4700, plus or minus,  
13 feet.

14 Q. Okay, 4770 is --

15 A. Would be the base of the Queen.

16 Q. -- is the base of the Queen?

17 A. That's correct.

18 Q. I would suggest that we drop that 100 feet below  
19 the base of the Queen sand and go with just that 4770.

20 THE WITNESS: Okay.

21 MR. CARROLL: We have no objection to that, Mr.  
22 Examiner.

23 Q. (By Examiner Stogner) So I'd suggest that we go  
24 from the top of the Yates, and then you can show that at  
25 4240, to the base of the Queen, just say Queen, at 4770.

1 And I am assuming with what I am saying that 4770 is within  
2 the Queen --

3 A. Uh-huh.

4 Q. -- or at the base of the Queen, it does not  
5 extend down into the San Andres formation; is that true?

6 MR. CARROLL: Mr. Stumhoffer did confirm that.

7 EXAMINER STOGNER: Okay, all right. With those  
8 changes, Mr. Carroll, is there anything further at this  
9 time with --

10 MR. CARROLL: No, sir.

11 EXAMINER STOGNER: -- Mr. Seely?

12 MR. CARROLL: This would conclude our entire  
13 presentation, unless there's some other questions you'd  
14 like to ask of Mr. Stumhoffer.

15 EXAMINER STOGNER: No, because we're just talking  
16 about the unitized formation, and you set me straight on  
17 the waterflood portion when that comes later and when that  
18 zones are opened up and -- then that order could be  
19 expanded too.

20 MR. CARROLL: Yes, sir.

21 MR. BROOKS: Could I ask a couple --

22 EXAMINER STOGNER: Oh, I'm sorry, yes.

23 MR. BROOKS: Normally I wouldn't, but just to  
24 clarify what we're doing here, because I have not looked at  
25 the file.

## EXAMINATION

BY MR. BROOKS:

Q. Is this a statutory unitization of -- this unit agreement pursuant to a statutory unitization, or is it just a voluntary unit agreement?

A. Just a voluntary unit.

MR. BROOKS: Okay, that was really all I had.

Thank you.

EXAMINER STOGNER: If there's nothing further, then we'll take this case under advisement.

MR. CARROLL: Thank you, your Honor.

(Thereupon, these proceedings were concluded at 10:36 a.m.)

\* \* \*

10-18-01  
12740  
18 October 2001  
*Michael P. Kelly*  
Clk. Clerk, Federal District Court



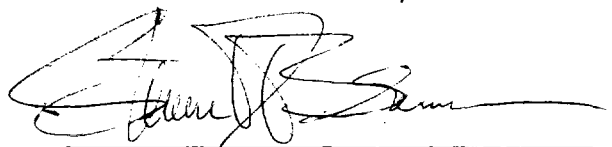
## CERTIFICATE OF REPORTER

STATE OF NEW MEXICO    )  
                                  )   ss.  
COUNTY OF SANTA FE    )

I, Steven T. Brenner, Certified Court Reporter and Notary Public, HEREBY CERTIFY that the foregoing transcript of proceedings before the Oil Conservation Division was reported by me; that I transcribed my notes; and that the foregoing is a true and accurate record of the proceedings.

I FURTHER CERTIFY that I am not a relative or employee of any of the parties or attorneys involved in this matter and that I have no personal interest in the final disposition of this matter.

WITNESS MY HAND AND SEAL October 22nd, 2001.



STEVEN T. BRENNER  
CCR No. 7

My commission expires: October 14, 2002