CASE NO.

7522

APPlication,
Transcripts,
Small Exhibits,

ETC.

STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT OIL CONSERVATION DIVISION STATE LAND OFFICE BLDG. SANTA FE, NEW HEXICO 31 March 1982

EXAMINER HEARING

IN THE MATTER OF:

Application of Santa Fe Exploration Company for an unorthodox gas well location, Eddy County, New Mexico.

CASE 7522

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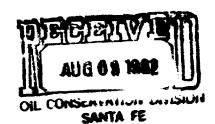
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BEFORE: Daniel S. Nutter



TRANSCRIPT OF HEARING

APPEARANCES

Por the Oil Conservation

Division:

W. Perry Pearce, Esq. Legal Counsel to the Division State Land Office Bldg.

Santa Fe, New Mexico 87501

For the Applicant:

Ernest L. Padilla, Esq. P. O. Box 2523

Santa Fe, New Mexico 87501

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Dan Chan		
For Chama	Ex. Co.: William F. Carr, Esq. CAMPBELL, BYRD, & BI	
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MR. NUTTER: Call next Case Number 7522.

MR. PEARCE: Application of Santa Fe

Exploration Company for an unorthodox gas well location,

Eddy County, New Mexico.

MR. PADILLA: Mr. Examiner, Ernest L.

Padilla, Santa Fe, New Mexico, on behalf of the applicant,

Santa Fe Exploration Company, and I have possibly two witnesses who have been previously sworn and one has been qualified.

I would only use the one witness again on rebuttal, if necessary.

MR. NUTTER: All right, let the record show that those witnesses are still under oath.

How about your ---

MR. CARR: Mr. Examiner, my name is
William F. Carr, appearing on behalf of Chama Production
Company. We have one witness who has previously been sworn.

MR. NUTTER: Let the record show that witness is still under oath.

You may proceed, Mr. Padilla.

MR. PADILLA: Call Mr. Barnhill.

WILLIAM B. BARNHILL

being called as a witness and being previously sworn upon his

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oath, testified as follows, to-wit:

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DIRECT EXAMINATION

BY MR. PADILLA:

Mr. Barnhill, for the record would you please state your name and by whom you're employed?

A My name is William Barnhill. I'm a consultant geologist from Roswell, New Mexico.

Mr. Barnhill, what's the purpose of this case?

The purpose of this is an unorthodox location in the north half of 14, Township 20 South, Range 25 East, Eddy County.

Mr. Barnhill, referring to what has been marked as Exhibit Number One, would you please identify what that is and what it contains?

A This is the same Isopach map we visited on the last session. It's proposed that a well be drilled 660 feet from the north and west lines of Section 14, and it's an Isopach map of the Morrow and I think we thoroughly discussed this a few minutes ago.

But if you'd like to have --

Q Go ahead, Mr. Barnhill. This is a different case and for the record state --

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2	A.	All right. This is a Morrow channel	
3	that runs slightly s	outheast through Township 20 South, 25	
4	East.		
5		To the south of the proposed location	
6	there is production	in what is known as Bubbling Springs	
7	Morrow and I believe	that this channel will run run through	
8	and as depicted up i	nto the north part of that township and	
•	to the south half of	19, 25.	
10	Q	Mr. Barnhill, the area colored in yellow	
11	is the proposed pror	ation unit?	
12	A.	Yes, it is.	
13	Ω	And you would dedicate the well, your	
14	proposed well, to the	e north half of Section 14?	
15	A.	Yes.	
16	Q	What is the yellow or the red line that	
17	is crossing the Isop	ach?	
18	A.	The red line is an A-A' cross section,	
19	which is included in	the material.	
20	Q.	Is that Exhibit Number Two, Mr. Barnhill?	
21	A .	Yes.	
22	Q	Would you please refer to that and to	
23	Exhibit Number One a	nu explain the cross section?	
24	A.	If you'll notice in Exhibit Number One,	
25	well, we really shou	ld start at A', which we've already visite	đ

with that well on another cross section, we've got the -- in

Section 1 of 20, 25, the Gulf Shugart Well would be to the

right of this cross section, showing very poor development

of sands, no sands, actually. They're on the west bank of

7 The center electric log is the Amoco

this proposed channel.

Rio Siete Well, which has a very, very poor section. They also, in my interpretation, are on the -- they're on the east bank of this Boyd Channel. They did complete a well in the very basal part of the B Sand.

That cross section, then, is projected to the proposed location, the unorthodox location in 14, down to Section 23 with the Southern Union-Exxon Federal 2, that would be the last log on the left. There again you can see that the Morrow channel A and B Sand with a shale split in the middle is prevalent.

The reason for this proposed location is that we need to get away from the Amoco Rio Siete in Section 11. We need to go to the south and to the west to get into the channel proper.

That's essentially what this is supposed to represent.

Mr. Barnhill, referring to what has been marked as Exhibit Number Three, please tell us what that is

2 and what it contains?

Lexhibit Three is a survey plat of a pipeline that runs through Section 14 of Township 20 South, Range
25 East. A standard location in 14, 1980 from the north and
1980 from the west, would fall within -- it looks like on
this plat would fall right on top of that pipeline, but I
was out there with a surveyor and looked at it and it's 30
feet away.

Q So you actually have a geographical obstruction to the exact -- to the standard location?

A. We wouldn't be -- well, yes. Yes, that geographical, I guess, would be the right term to use there. It's -- the pipeline runs right through the center of that 1980/1980.

Q But your proposed location is based primarily on geology, is that correct?

Would be to, repeating myself, would be to get south and west of the Amoco Rio Siete, which did complete out of the basal B part, thinking that a better channel sand is found in the well like in 23 and the well in -- the wells in 26 and 25, very, very similar. We have Isopach values in there which -- which would indicate that that, the best part of that channel is -- would be to the, for instance, like in

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Section 24, there is an American Quazar Well there. It's on the bank. It goes from just nothing into 50 and 60 foot sands in the Bubbling Springs area.

That sand bank in there would be in that channel and the Amoco Rio Siete in 11, as I said, is on theit's on the east bank. We want to get south and west of that to try to encounter a better sand deposition in the channel.

Mr. Barnhill, you really in this case have even less well control than you had in the previous case, is that correct?

That's correct. We can from Section 1, the Gulf Shugart, to 11 there and to the Amoco well, and it's a very poorly developed sand section. If that sand section in the channel is going to be present at all, it's going to be south and to the west, and we only really had one well in there that's close enough, and that would be the Rio Siete Well in 11; very poor well.

Mr. Barnhill, can you tell us something about the production of some of the wells in the area, and in this regard please refer to what has been marked as Exhibit Number Four?

A. The Rio Siete Well in 1980 had produced 93 -- 94-million cubic feet of gas. The attached November statement shows that the last producing date was October of

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'81. It's not producing at the present time. And that's the well in Section 11, is 3 that correct? That's correct. How about the other wells, the Southern Union Well in Section 23? 7 The Southern Union Well in 23 is a dry hole and you'll notice on the cross section there, the sands are far superior in development as to the Amoco Well in 11. 10 There again the sands are tight there; they did not produce. 11 The same sands, almost identical, are 12 found in 26 and 25, and they do produce. 13 Mr. Barnhill, do you -- what's the lease 14 expiration on Section 14? What's the land status? 15 We have a critical lease in Section 14. 16 17 The north half of the northwest goes out the 21st of next 18 month. 19 Do you have a rig scheduled to drill a 29 well at the proposed location? 21 Yes, we do. When is your rig date? 22 Q. 23 The 14th. Do you request an expeditious decision 24 25 in this case by the Division?

1		11
2	A. Ye	es.
3	Q. R	eferring to what has been marked as
*	Exhibit Number Five, M	r. Barnhill, would you please tell us
5	what that is and what	it contains?
6	A. W	ell, that is a certified copy of a
7	top lease on Gulf's tr	act there in the north half of the
	northwest on which Cha	rles Nearburg, or Chama Petroleum, hav
9	a top lease of that are	ea.
10	g. 0	n expiration of your lease who would
11	own the lease on the n	orth half of the northwest?
13	A. C	harles Nearburg.
13	a T	urning to what has been marked as Ex-
14	hibit Number Six, woul	d you tell us what that is and what
15	it contains?	
16	A. W	ell, Six, in 14 the north half of 14
17	is the 320-acre wou	ld be a 320-acre proration unit with
18	the proposed location	unorthodox from 660 from the north and
19	west.	
20	A	nd Section 2 is Santa Fe Exploration's
21	proration unit, which	there currently is a well drilling
22	1980 from the south an	d 660 from the west.
13	0 м	r. Bar hill, would drilling of this
24	well help in developin	g and proving up the acreage in the

area of Section 14 and possibly Section 15?

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I think so. If this Boyd Channel, what is identified as the Boyd Channel, should come through there and in the north half of 15 and also parts of 10, it belongs to Chama.

It will certainly tell you if there is something, if you're in the middle of a channel or anywhere in the channel, wouldn't it?

Yes, it would.

We do know that the well, the Amoco well in 11 is very poor -- the sand is very poorly developed and the production is corresponding. We feel that by going to the south and west better sands in the channel could be encountered.

Mr. Barnhill, do you think that the proposed location is the optimum location to test the area between the southern development of the channel and the northern development of the channel?

Yes, I do. On the southern development, or Bubbling Springs, down in Sections 25 and 26, those sands are, as you can well see, they're -- there's a good pod of sand or thick sand in there, and it will continue, in my estimation, it will continue in that channel to the west, certainly wouldn't want to go east towards the American Quazar Well in Section 24, and there again, we'd like to stay away

from the Amoco Rio Siete in 11; if it's in there, it's going 2 3 to be in that direction. What's the risk associated with drilling the well in Section 14 as you propose? 5 The risk is fantastic. I mean it's just 7 very risky at best. How much will the well cost to drill? How much will it cost to drill a well in 14? 10 \$800,000. 11 Do you have any dry hole contributions 12 from anyone? 13 No, sir. 14 Do you think a penalty should be assessed 15 against the well? 16 No, I don't. 17 Do you think that drilling the well there 18 would allow you to recover, and assuming that it's a producing 19 well, that it would allow Santa Fe Exploration to recover 29 their equitable and fair share of production? 21 Yes. 22 Do you believe that drilling the well 23 at that location would impair correlative rights? 24 No, I den't. 25 Why do you --Q.

1	. 14
2	A Well
3	Q think that?
4	A The first thing, it is really a spooky
5	deal from the standpoint that we don't know, we've just got
6	one point there in 11 in the Amoco Rio Siete. Rights, we
7	don't know, this could be very easily a dry hole, but hope-
8	fully it would fall within the channel. If it feel within
9	the channel as I've got it drawn, it would be to the benefit
10	of any other leaseholder out there.
11	Q They could then drill offsets, is that
12	the idea?
13	A They could drill offsets.
14	MR. PADILLA: Mr. Examiner, I have no-
15	thing further, and we would tender Exhibits One through Six.
16	MR. NUTTER: Applicant's Exhibits One
17	through Six will be admitted in evidence.
j8	Are there any questions of the witness?
19	MR. CARR: Yes, sir.
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21	CROSS EXAMINATION
22	BY MR. CARR:
23	Q Mr. Barnhill, I direct your attention

to Exhibit Number One, which is the Isopach.

Right.

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1		15
2	Q	Was this Isopach prepared for purposes
3	of this hearing toda	ay?
4	A.	Yes, it was.
5	Q	And had you previously prepared Isopachs
5	for this area?	
7	A.	Yes.
8	Ø.	I'd like to hand you what has been marke
9	Chama Exhibit Number	Three and ask if you recognize that in-
10	terpretation?	
11	A.	Yes, I recognize it as my work.
12	Q	And that interpretation differs somewhat
13	from the interpretat	cion in your Exhibit Number One?
14	A.	Yes, it does.
15	Q	And was Exhibit Number Three prepared
16	an Isopach prepared	by you of this area last year?
17	 	This is Three?
18	Q	Yes, sir.
19	A.	Well, I prepared an Isopach. Is that
20	what your question	is?
21	À .	Yes, sir. If you compared what has been
22	marked as Exhibit N	umber Three and the Isopach which you of-
23		e you've offered here today show less
24		er Section 15 that had previously been

indicated?

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MR. NUTTER: Can we see the exhibit?

MR. CARR: Oh, I'm sorry, Mr. Nutter.

A. Yes, it does. You see, in getting this original Chama Well drilled here in Three, which would be 1980 from the north and the east of Section 3, to be optimistic again, this is a possibility of the way it could have been. You you get back to actual facts, when you get down here to 14 you've got one well, the same well that's on this original Isopach, of 25 feet, in the Amoco well. You go from 25, I've got, of course, a 60-foot Isopcah going through Sections 14, a corner of 14 there. That's just supposition. We only have one point there, 25 feet. We do know that the Bubbling Springs area to the south is thicker, but this would never be -- this Isopach here, the only way you'd ever find that out would be to drill a hole there.

If you were looking just at the two
Isopachs, would it be fair to say that the Isopach offered
today paints a less optimistic picture for the south -- for
the north half of 15 than the original?

A I think it paints a more realistic picture.

Is it more or less optimistic?

It's very realistic. This is very opti-

25 mistic.

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You considered the original one optimistic. Would you consider the one you have offered today more pessimistic in the north half of 15?

A. Well, this is, as I say, in all seriousness, this is a very, very optimistic --

You're referring to Exhibit Three?

A To this exhibit.

Yes, sir.

No We have one point out there. I would like to think that this is possibly correct, but when you get down to the basic fact, we have one well in 11, a very poor well, very poor sand development, better sand development at Bubbling Springs to the south, possibly this channel will go through there and it will be good sands to the south, to the west of the Amoco well.

Q The new Isopach, though, doesn't look as good as the first one.

A No, but it's -- it's much more realistic because we've just got one point.

Now, somebody else could draw this and they could put 200 feet in there, but this is actual based on, you might say, if you want to be conservative or what.

Q You have really very little control down here, don't you?

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2	A Yes, we have very little control.	
3	And standard geological approaches to	
4	an area like this, you take the data that you have and you	
5	from that data interpret how the sands would be or the for	ma-
6	tions would be, is that correct?	
7	A That's right.	
8	And so based on the data that you have	e
,	different geologists could interpret this in different way	s,
10	is that a fair statement?	
11	A. That's a fair statement. You can get	
12	ten geologists and get ten interpretations.	
13	And this is really very poor control	
14	data. Is that a fair statement, do you think?	
15	A. It is poor control data.	
16	Q When you look at this it seems to me	tha
17	you have a sand body developed down here in the Exxon well	
16	in Section 23. Is it possible that's a completely separat	е
19	sand body?	÷
20	A. This this is the same Morrow Sands	
21	that continue all through the Boyd Channel going two town-	
22	ships to the north and it will continue going to the south	•
23	A Looking at this Isopach, would it not	
24	be possible for you to move the well to the the propose	đ
25	well to the east and still be in the main portion of this	

channel?

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of 15?

A Well, theoretically; however, the most optimum area would be to get as far south and west from one control point, the Amoco Rio Siete in 11.

Would it be possible to move this in any way to the east without jeopardizing your position in terms of the sand?

A. In my honest opinion, the 1980 there, as I said, falls right on top of a high pressure gas line. That could be altered and move to the west, but the optimum place would be to get as far away to the west and south, rather than to the east.

Q So if you moved to the east you feel like you are increasing the risk of having a dry hole, is that fair to say?

A. That is fair to say.

Now I don't have any idea what Chama's plans might be in the area, but would you have an objection to their offsetting at 660 from the common lease line following completion of this well?

A. You mean like 660 out of 15 there?

Yes, sir, out of the northeast corner

I think that would depend on the -- on

the well. If it was a well like the Amoco Rio Siete in 11, it would be hard to get your money back. Then I wouldn't look with great favor on somebody drilling a 660 to something that is economically probably very poor.

But, in other words, it would just be, if it was a poor economic return, a 660 out of there would just make it that much poorer. I wouldn't look with great favor upon it.

I believe you indicated the north half of the northwest quarter was under a lease that was about to expire.

A. The 21st.

Is that a State, Federal, or fee lease?

A Fee.

So you won't have the problems that you would have had with the USGS on this one?

A Possibly. If we can get the -- we could on that by going up the west line of 14, that would be on fee lands and you could -- we could, if you'd look at this land plat here, the south half of the northwest is a Pederal lease. There's a highway goes right through the center of Section 14 and kind of bends up there and goes right through the 1980 location.

If you go to the west line of 14 and be

on fee land, you can come up north and get back on fee lands, 660 from the north and west. The highway is essentially right there in the center of 14. To cross -- to go directly from the highway north to this proposed location you have to cross 80 acres of Federal land, which would require archaeological and BLM, et cetera.

So by virtue of having a fee lease just on the north half of the northwest, you still possibly would be dealing with BLM?

A. That's correct.

Have you requested dry hole contribution
 from any offsetting operator?

A. No, I haven't.

Now I believe you testified that you believe that a penalty would be inappropriate on a well drilled at this location. Was it your testimony that the benefit to the offsetting operators would be additional data that could be acquired from this well?

A. Yeah, and they have substantial amounts of acreage to the -- to the west and north.

Q If this was a good commercial Morrow well, do you believe it would be draining reserves off of Section 15? To the west?

A. Yeah, I think it would probably drain

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witness?

some off to the west because you can't go very far to the north and east because you run into that Amoco well, and it's just extremely poor; just very marginal.

To protect themselves from drainage by with counter drainage, wouldn't Chama have to drill 660 out of the northeast corner of 15 to protect themselves?

If the sands are developing, which I think they possibly could be, the better part of the channel may be through 15 and 10. We just don't have the control out there, but we do know that the sands at Bubbling Springs to the south is developed and it should run right in a northwesterly direction, slightly, almost north/south, but we know it's not in the Amoco well in 11, and it -- the channel could be right out there in the -- right in the middle of Section 10 and 15. There's no way I can predict that.

MR. CARR: Mr. Nutter, at this time I have no further questions of Mr. Barnhill, and would offer into evidence Chama Exhibit Number Three, which is a portion of the other Isopach.

MR. NUTTER: Chame Exhibit Three will be admitted into evidence.

Are there any other questions of the

MR. PADILLA: Mr. Examiner, I have a

couple.

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BY MR. PADILLA:

Mr. Barnhill, looking at the Chama Exhibit Number Three, which is the Isopach, and looking at the Exhibit Number One that you prepared for today's hearing, aren't they both still consistent in that you would have to move south and west in order to somehow get in the middle or try to hit the channel?

REDIRECT EXAMINATION

In my interpretation, I'd say definitely, And in this Exhibit Three of Chama the -- it could be as optimistic as this one was whether the -- part of it goes right through the -- through Section 10, which would be all Chama acreage, and down into -- down into 15. We know it can't go over into 11 because of the Amoco Rio Siete.

And this one, our Exhibit One, is just showing that you need to get south and as far west as you can from that well in 11, and it could be as drawn here on Exhibit Three. If so, it would really put Chama in an excellent position, and the operator of this thing, Santa Fe, in a poor position, just depending how it worked out.

Well --

But to go back to the facts, we only

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2	had one well to base it on, and that's the Amoco Rio Siete
3	in 11, and we know that's not the way to go.
4	Q You're really dealing with the best in-
5	formation available, even though it's very poor information.
6	A That's true.
7	Q Do you have idea what the reserves under
8	a Morrow well in this area might be?
9	A No. They would they just vary tremen
10	dously and I couldn't come up with a realistic figure with
11	meaning today.
12	MR. PADILLA: Mr. Nutter, I have nothing
13	else.
14	MR. NUTTER: Are there any other ques-
15	tions of the witness? He may be excused.
16	Mr. Carr, will you call your witness?
17	MR. CARR: I call Mr. Montgomery.
18	
19	JAMES H. MONTGOMERY
20	being called as a witness and being duly sworn upon his oath,
21	testified as follows, to-wit:
22	
23	DIRECT EXAMINATION
24	BY MR. CARR:
25	0. Will you state your name and place of

1			25
2	residence?		
3		A	James H. Montgomery, Dallas, Texas.
4		Č	By whom are you employed and in what
5	capacity?		
6		A.	I'm a consulting geologist/engineer, re-
7	presenting	Chama Pet	roleum.
		Q	Have you previously testified before this
•	Commission	and had ye	our credentials accepted and made a matter
16	of record?		
11		A.	Yes, sir.
12		Q.	Are you familiar with the application of
13	Santa Fe E	kploration	filed in this case?
14		A.	Yes, sir, I am.
15		Q	Are you familiar with the subject acreage?
16	· .	A	Yes, sir.
17	·	•	MR. CARR: Are the witness: qualifica-
18	tions accep	ptable?	
19			MR. NUTTER: They are.
20		Q	Will you briefly state the reason for
21	Chama Produ	action Com	pany Petroleum Company appearing in this
22	proceeding	today?	
23		A.	We're here again to oppose an unorthodox
24	location wi	ithout a pe	enalty.
25	<u>.</u>	Q.	Will you please refer to what has been

26 marked for identification as Chama Exhibit Number One, ident-2 ify this and explain what it shows? 3 Again it's a land plat showing Chama's acreage cross hatched. It shows the 320-acre proration unit in the north half of Section 14. It shows the standard location and the proposed location. What would be a standard location? 1980 from the west and 660 from the north. 10 11 So by how many feet is Santa Fe proposing 12 to advance on the Chama property to the west? 13 1320 feet. 14 Will you now refer to what has been 15 marked for identification as Exhibit Number Two and review 16 this? 17 Yes, I will. This is a topographic map 18 for the area, which topographically shows no reason for the 19 location to be other than standard. I was unaware of the 20 pipeline being there; however, 100 foot move will take them 21 off the pipeline. 22 Have you seen what has previously been 23 admitted into evidence as Chama Exhibit Number Three, being

a portion of the Isopach prepared by Mr. Barnhill?

Yes, sir, I have. It was submitted to

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to you on the Antweil well? A. Yes, sir. Would you brid. It is a very million total. Have you, from you independent of the data from M Isopach of this area? A. Yes, sir, I h Q. And is that w identification as Exhibit Number F A. Yes, sir, it Q. Would you ple what this Isopach shows? A. Again I have the Amoco Rio Siete and we do have side in the King Resources well in feet of sand in it.	27
to you on the Antweil well? A. Yes, sir. Would you brid. It is a very million total. Have you, from you independent of the data from M Isopach of this area? A. Yes, sir, I h Q. And is that w identification as Exhibit Number F A. Yes, sir, it Q. Would you ple what this Isopach shows? A. Again I have the Amoco Rio Siete and we do have side in the King Resources well in feet of sand in it.	
Mould you brider Mould you brider Million total. Markeyou, from Mould you, ple	reviewed the data available
Mould you brid. A It is a very million total. May you, from you independent of the data from Market Isopach of this area? A Yes, sir, I have you, from you independent of the data from Market Isopach of this area? A Yes, sir, I have you, from you independent of the data from Market Isopach of the data from Market Isopach of the Amother Isopach shows idea in the King Resources well in feet of sand in it.	
million total. Mayou independent of the data from Magnetic process. Mayou ple mand is that was identification as Exhibit Number Factorial process. Mayould you ple mand the Magnetic process. Ma	
## Million total. Mayou independent of the data from Million total. Mayou independent of the data from Million indepe	efly review what that is?
9 Q. Have you, from you independent of the data from M. Isopach of this area? A. Yes, sir, I h. Q. And is that w. identification as Exhibit Number F. A. Yes, sir, it Q. Would you ple what this Isopach shows? A. Again I have the Amoco Rio Siete and we do have side in the King Resources well in feet of sand in it.	poor well. It's made 97-
you independent of the data from M Isopach of this area? A Yes, sir, I h A And is that w identification as Exhibit Number F A Yes, sir, it Would you ple what this Isopach shows? A Again I have the Amoco Rio Siete and we do have side in the King Resources well in feet of sand in it.	
Isopach of this area? A Yes, sir, I h A And is that w identification as Exhibit Number F A Yes, sir, it Would you ple what this Isopach shows? A Again I have the Amoco Rio Siete and we do have side in the King Resources well in feet of sand in it.	m your data available to
12 A. Yes, sir, I h Q. And is that w 14 identification as Exhibit Number F 15 A. Yes, sir, it Q. Would you ple 17 what this Isopach shows? A. Again I have 19 the Amoco Rio Siete and we do have 20 side in the King Resources well in 21 feet of sand in it.	r. Barnhill, prepared an
13 Q And is that w identification as Exhibit Number F 15 A Yes, sir, it Q Would you ple 17 What this Isopach shows? A Again I have 19 the Amoco Rio Siete and we do have 20 side in the King Resources well in feet of sand in it.	
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A. Yes, sir, it O. Would you ple What this Isopach shows? A. Again I have the Amoco Rio Siete and we do have side in the King Resources well in feet of sand in it.	hat has been marked for
Would you ple what this Isopach shows? A. Again I have the Amoco Rio Siete and we do have side in the King Resources well in feet of sand in it.	our?
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A. Again I have the Amoco Rio Siete and we do have side in the King Resources well in feet of sand in it.	ase explain to the Examine
the Amoco Rio Siete and we do have side in the King Resources well in feet of sand in it.	
side in the King Resources well in feet of sand in it.	picked 22 feet of sand in
21 feet of sand in it.	some control on the west
	Section 9. There is 8
I agree with	Mr. Barnhill that the con-
23 trol is very limited and we've bas	ically got one well that
could lie on either the east or th	e west side of the bar. A

this time I think it's on the east side of the bar.

1		28
2	Q	In your opinion is your interpretation
3	as valid as that	prepared by Mr. Barnhill based on the data
4	available to you?	?
5	A.	Yes, sir.
6	Q .	Is it possible that the Exxon well to
7	the south of the	proposed location could be in an entirely
	separate sand boo	ly?
9	A.	Yes, sir, I feel that it sure may be in
10	a different sand	body.
11	Q	Now, as has been testified to here pre-
12	viously this afte	ernoon, what you're really looking for, is i
13	not, is sand thic	ckness?
14	A.	Yes, sir.
15	Ç.	And the more sand you would encounter
16	the better the c	nances of making a commercial well.
17	A .	And the better the reserves.
18	Q	Now in your opinion would the well a
19	well drilled at	the proposed location tend to drain reserves
29	from the offsett	ing property to the west?
21	A.	Yes, sir, it will.
22	Ω	Would you now refer to what has been
23	marked for ident	ification as Exhibit Number Five, identify
24	this and explain	what it shows?
25	A .	Again this is a planimeter study made

I

29 2 of the net acre feet in the north half of Section 14 as compared with the net acre feet in the north half of Section 15. And based on your calculations what is 3 that comparison? 59 percent of the net acre feet is under 7 the north half of Section 15 and 41 percent under the north half of 14. In your opinion will a well drilled at 19 the proposed location drain the entire north half of 15? 11 No, sir, it probably wouldn't. It would 12 drain probably half ot three-quarters of it. 13 Based on your study, can you make a 14 recommendation to the Examiner as to the penalty that should 15 be imposed on a well drilled at the proposed location? 16 I would recommend a 59 percent penalty. 17 And that penalty would be applied against 12 what? 19 Semi-annual deliverability test. 29 In your opinion could Chama Petroleum 21 Company protect its acreage drilling a well 660 out of the 22 northeast corner of Section 15? 23 Again, it depends on he sand conditions. 24 It might be possible in this case to protect it. Control is 25 so limited, I don't know.

30 If the entire north ha f of 15 were pro-3 ductive of gas from the Morrow, do you believe a well 660 out of the northeast quarter -- northeast corner, would drain that entire spacing unit? A. No, sir, I don't. 7 In your opinion, if that was the case, how would the other reserves have to be produced? By drilling a second well. Would that be a necessary well? 11 Yes, sir, it would be unnecessary and 12 it would be waste. 13 In your opinion is a penalty required to 14 protect the correlative rights of Chama? 15 Yes, sir, it is. 16 Were Exhibits One through Five prepared 17 either by you or under your direction and supervision? 18 Yes, sir. 19 Can you testify of your own knowledge Q. 20 to their accuracy? 21 Yes, sir. 22 MR. CARR: At this time we would offer 23 into evidence Exhibits One, Two, Four, and Five. 24 MR. NUTTER: Exhibits One -- Chama's Exhibits One, Two, Four, and Five will be admitted in evidence

31 MR. CARR: I have nothing further on 3 direct. MR. NUTTER: Are there any questions of 5 the witness? MR. PADILLA: Yes, Mr. Nutter. CROSS EXAMINATION BY MR. PADILLA: Mr. Montgomery, would you drill a well Q 11 at a standard location in the north half of Section 14 based 12 upon your Isopach? 13 No, sir, I wouldn't. I don't think it 14 would be commercial. That's the reason, I think, Mr. Barn-15 hill doesn't want to drill it. Based upon your Isopach do you think 17 that you would recommend drilling a well in Section 15? 15 Yes, sir, I would. 19 Where would you drill the well in Sec-20 tion 15? 21 Probably 1980 from the east line, 660 22 from the north. 23 How about in Section 10? Q. 24 Again, probably a standard locations 25 and laydown 320's through the center of 10, spaced just like

geology, isn't it?

Yes, sir, and mine, yes.

This is consistent with Mr. Barnhill's

Chama-Huber Well; stay in the thick part of the channel.

Wells drilled in Section 10 and 15 would still have an opportunity to drain reserves underlying Section 14, would they not?

10 and 15 if they're drilled at an ordinary pattern, a regular pattern, they probably would not. A well drilled at a standard location

660 from the -- on the laydown unit, 660 from the north line of 15 and 1980 from 15 -- or the east line wouldn't drain it?

No, it would not drain 14. If it's as depicted, the sand will be so thick there it would drain all of 15, the north half of 15.

How did you compute your drainage? How did you make your drainage computation that the well at the proposed location would drain Sections 15 and 10? Into Sections 15 and 10?

Oh, I'm assuming they will drain 320 acres, standard locations through the center of 15 and 10, if that's the thick part of the channel.

I really made no computation on that.

12

11

13 14

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2 In this case your testimony seems to 3 indicate, then, that drilling a well at center locations are actually better locations than the proposed location of Santa Fe Exploration, is that correct? Yes, a Santa Fe location is an unorthodok 7 one. If they drilled at a regular location I don't think they could make a commercial well, which is usually the reason for an unorthodox location, to drain somebody else's acreage. And still -- well, strike that. 11 With regard to your Exhibit Number Two. 12 Mr. MOntgomery, you haven't made a field report, have you? 13 You haven't been out at the location? 14 No, sir, I have not. I wasn't aware, 15 as I said, of the pieline was there. 16 What would you estimate an average re-17 serve for a well in this area would be? 12 In the thick part up to 10-million, if 19 the sand is thick enough, 10 Bcf. 29 But you don't know whether that's true 21 or not? 22 Sure don't. 23 Could be a dry hole. 24 Could be erratic, you know, could be a 25 sorry little well.

```
34
                 Q
                           And that's a characteristic of the
     Norrow?
3
                           Morrow channels, right.
                           MR. PADILLA: One moment, Mr. Examiner.
     Nothing else, Mr. Examiner.
                           CROSS EXAMINATION
     BY MR. NUTTER:
10
                           Mr. Montgomery, what your stated penalty
11
     should be imposed on this location?
12
                           59 percent.
13
                           59 percent. I believe the last case it
14
     was 69.
15
                           69, right.
16
                           Okay, I realize that you are not Chama
17
     Petroleum Company, Mr. Montgomery.
18
                           Yes, sir.
19
                           But you did mention that you weren't
20
     aware of the pipeline and that you thought that moving 100
21
      feet would get it off the pipeline. You're not in a position
22
     where you could waive Chama's objections to the well if it
23
     were moved off the pipeline in a north and west direction,
24
      are you?
```

No, I'm not, no.

A.

~ J		
2	Ø.	It would appear by examination, Mr.
3	Montgomery, of Mr	. Barnhill's Exhibit Number One, have you
4	got it there?	
5	A.	Yes, sir.
6	ø	Now if you would spot a location 1980
7	from the north and	d 1980 from the west.
8	A.	Yes, sir.
,	Q	And then move that approximately 200
10	feet to the north	and 200 feet to the west to clear the pipe-
11	line, would that	change the structural position insofar as
12	the channel, as is	t's depicted on this exhibit?
13	A.	Yes, sir, it would. According to Mr.
14	Barnhill's geolog	y that would put it at, you know, a much
15	thicker position	in the sand body.
16	Q.	I mean it wouldn't be a detrimental move
17	would it?	
18	A.	No, not according to his information.
19	Q	Okay.
20	A.	And if it moved, it would improve his
21	position on my Is	opach, yes, sir.
22	Q	Would it be a position where it would
23	severely impair t	he rights of the owners in Sections 10 and
24	15?	
25	-ti - i	No, sir, I don't think so.
	=	are a manual management of the contract of the

36 MR. NUTTER: Why don't we take a 15 minute recess and see if we could -- or a ten minute recess and see 3 if you'd be in a position where maybe you could waive an alternate location. Yes, sir. Uh-huh. (Thereupon a recess was taken.) MR. NUTTER: The hearing will come to 11 order. Mr. Montgomery, I believe we closed the 12 session a moment ago with an inquiry as to whether you thought 13 14 that Chama Industries -- of Chama Company could waive objection 15 to the location approximately 1730/1780. 16 Yes, sir, I think we could do that with 17 no penalty. We would like to --18 As a possible alternative location --19 Yes, sir. 20 -- or an alternative to the proposed 21 location with a penalty. 22 Right. 23 I see. I would like to get a log on the well

and certain information from it, which I think they would

25

2 furnish us anyway.

MR. NUTTER: Are there any other questions of Mr. Montgomery?

MR. PADILLA: None, Mr. Examiner.

MR. CARR: I have no further questions.

MR. NUTTER: He may be excused. Does

either of you have any more witnesses to put on?

MR. PADILLA: No, sir.

MR. NUTTER: I guess we'll call for closing statements, then. Mr. Padilla, being applicant, you may go last.

MR. CARR: Mr. Nutter, as Mr. Montgomery stated, Chama would be agreeable to a 1780/1780 location out of the northwest corner of the section in which they propose to locate this well, and would request that the data from the well be made available to them.

They have money tied up in a top lease and that stands to be lost. They've also at Mr. Cooter's request, who was earlier involved with this, not delayed the hearing and intentionally come forward today because of the lease expiration. We'd be happy to work with them in this regard.

If, however, that isn't acceptable and something goes astray, we do think that what we have here is

a case seeking an unorthodox location where there is very
little control and two interpretations, both within the realm
of possible at least. One person wants to rely on this sketchy
data and move 1320 feet toward his offsetting owner, and we

feel that that advantage should be penalized and we've given

you an appropriate way to assess that penalty.

The best quality of the sand body, even by Mr. Barnhill's interpretation, is in the west of 14 and by our interpretation is 14 and 15, and they're asking for your permission to move two-thirds of the distance toward us.

Now if they did that, to protect ourselves from counter drainage we would have to locate a well 1660 feet from that common lease line and Mr. Barnhill naturally opposes that because we would be preventing him from draining reserves from our tract and protecting our rights to produce our just and fair share of the reserves under our tract.

But it isn't that simple, because we would run the risk of creating an ineffective drainage situation whereby an unnecessary well, which is waste, would have to be drilled.

We've had a lot of testimony about the problem is in this area there's a lot of risk involved. Well, if it's too risky, don't drill the well. Risk is not a reason to steal from your offsetting operator and it has nothing to

do with it, and they don't have to drill at an unorthodox location; they can just not drill at all.

And we would submit that if the application is approved at the proposed unorthodox location 660 out of the corner, that the only way you can carry out your statutory responsibilities of preventing waste and protecting correlative rights is to assess a 59 percent penalty on the semi-annual deliverability from that well.

MR. NUTTER: Thank you. Mr. Padilla?

MR. PADILLA: Mr. Nutter, I think, first of all, that this is not a place to allege stealing. That goes to the criminal courts and that would be resolved at that point. Certainly in that kind of a form.

We're talking about 660 from the east -or from the west line of Section 14 here; a standard location
for a standup unit would be 660 from that line.

We're also dealing with a very, in Mr.

Carr's words, sketchy area, and the testimony from both sides

has been that the area is certainly very risky and certainly

the applicant is not in the business of drilling dry holes

and that is why they have asked for a nonstandard location.

This is a location to test the Morrow formation and the Morrow formation is, as you know, typical in this part of Eddy County, is very diverse and all through-

out southeast New Mexico. Whether or not you encounter the Morrow, and once you encounter it, whether or not the reservoir characteristics would dictate a penalty would be something entirely different.

But at this stage of the game I certainly don't know what's down there and we certainly don't know what the extent of the reservoir are -- is.

I think for that reason we would ask that the application be approved.

MR. NUTTER: Thank you, Mr. Padilla.

Does anyone else have anything they wish to offer in case Number 7522?

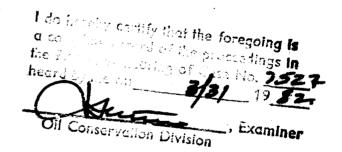
We'll take the case under advisement.

(Hearing concluded.)

CERTIFICATE

I, SALLY M. BOYD, C.S.R., DO HEREBY CERTIFY that
the foregoing Transcript of Hearing before the Oil Conservation Division was reported by me; that the said transcript
is a full, true, and correct record of the hearing, prepared
by me to the best of my ability.

Shaly W. Bogs COR





ALLA A. HOTO, C.S.R. Rt. 1 lbs 1958 Sant Pt. No House 7791 Plane (509-655-709



STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT OIL CONSERVATION DIVISION

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Sec 34, T-19-S, R-25-E			***	
660' PSL, 1980' FWL of			C9-4~9	
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13 3/8" at 485' ⊌/325 *x				
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PLUGGED & ABANDONED

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	Delta		JJE"	JUJ		7,700	1105 000

F.R. 2-25-74
(Morrow)

3-14-74 MIRT

3-20-74 Drlg 535'

3-27-74 Drlg 2958' lm

4-3-74 Drlg 4710' lm

4-10-74 Drlg 7060' lm & sh

4-17-74 Drlg 8865' lm & sh

4-24-74 TD 9600' P/P & A

DST 9300-9410', open 1 hr,

Rec 60' DM (Spl 840 cc's DM + 1 CFG)

1 hr ISIP 608#, FP 87-62#

2 hr FSIP 1839#, HP 4808-4808#

Well COQUENA OIL CORP. 1 Pan Canadian (OWWO)

Result GAS

Loca: 7 mi W/Lakewood, 1980' FNL 1980' FWL Sec 34-195-25E.

Re-Spad: 4-28-77; Re-Comp: 5-5-77; Elev: 3521' grd; TD: 9640' Miss; PB: 9177'
Casing: 13 3/8" 472'/550 ss, 8 5/8" 1320'/600 ss, 5 1/2" 9640'/325 ss
Frod Zone: (Atoka) T/Pay 8838', prod thru perfs 8838-8922'
PCAOF: 1, 251,000 CFGPD, GOR 270-1, Grav (gas) .645, (cond) NR, SIWHP 3163#
Comp into: (Orig. #1 Pan Canadian, Comp 1-17-74 thru (Morrow) perfs 9236-9318'; OTD
9640'); PB to 9177'; Perf (Atoka) 8838-41', 8866-80', 8917-22' w/2 SPF; natural;
(Atoka) Four Pcint Gauges: F/444 MCFGPD, 1" orifice, 120 mis, TP 2811#; F/567
MCFGPD, 1" orifice, 120 mis, TP 2610#; F/636 MCFGPD, 1" orifice, 120 min, TP
2444#; F/943 MCFGPD, 1" orifice, 120 min, 1P 2031#; C/NR.

Tops: NR API No.: 30-015-20997



COPYAIGHTED 1977 REPRODUCTION PROHIBITI

Petroleum Informations

Date: 6-22-77 Cord No.: 3 rm

EDDY HUBER, J. M. CORP.

Undesignated 1 Irami Federal "Com." Page 2 Sec 34, T19S, R25E

4-29-74

TD 9600'; PLUGGED & ABANDONED

LOG TOPS: Welfcamp 6552', Claco 7702',

Canyon 8237

Strawn 8512', Atoka 8895', Horrow 9244', Chester 9572'

5-4-74

COMPLETION REPORTED

(i) he	troleum inf	ormation.				6 Consistent 6 :	
	EUDY	PELD	Wildca	E		STATE NO	
	COQUINA	OIL CORP.			····	30-	015-20997
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CONTR WEK

F.R. 10-22-73 (Morrow) Drlg 1050'
Drlg 3421' lm
Drlg 5733' lm
Drlg 7885' 10-29-73 11-5-73 11-12-73 11-19-73 DST 6420-6460', open 1 hr, rec 2400' GIDP, 1 hr ISIP 758#, FP 25-25#, 2 hr FSIP 343#, HP 2892-2875#, BHT 118 deg TD 8856'; On DST (8805-56') DST (NA), Miss Run DST (NA), Miss Run 11-26-73

12-3-73 Drig 9110' DST 8805-56', open 2 hrs 15 mins, GTS in 13 mins @ 70 MCFGPD, incr to 282 MCPCPD, rec 15' H, 1 hr ISIP 4455#, IFP 313-521#, FFP 146-208#, 4 hr FSIP 4455#, HP 4824-4721#, BHT 140 deg

12-11-73 Dr 1g 94561 DST 8870-8908', open 1 hr 10 mins, GTS in 5 min @ 195 MCFGPD, incr to 458 MCFGPD, rec 90' SGCM, 1 hr ISIP 4853#, FP 45-87#, 2 hr FSIP 4903#, HP 4934-4880#, BHT 133 deg DST 9208-9289', open 1 hr 45 mins, GTS in 2 mins@ 15,000 MCFGPD (Max), Aver 5500

12-11-73 Continued MCFGPD, rec 100' F (70' Cond + 30' SGCM), 1 hr ISIP 3840#, FP 1455-1396#, 4 hr YSIP 3840#, HP 5129-5069#

TD 9640'; WCC 12-17-73 DST 9289-9347', open 2 hrs 10 mins, GTS in 1 min @ 8500 MCFGPD (Max 14,000 MCFGPD), rec 10' Cond, 1 hr ISIP 3820#, FP 1697-1861#, 2 hr 30 min FSIP 3820#, HP 5069-5049#, BHT 152 deg

12-25-73

TD 9640'; WOCU
TD 9640'; Prep Run Tbg
TD 9640'; Rng Tbg 12-31-73

1-7-74

1-14-74

TD 9640'; Prep Perf TD 9640'; SI WO Test Equip 1-15-74 Perf 9326-9318' w/104 shots (overall) Flwd 7550 MCFGPD thru 24/64" chk, TP 2450# **EDDY** COQUINA OIL CORP. Wildcat l Pan Canadian Sec 34, T19S, R25E MM Page #3

1-22-74 TD 9640'; WO Pipeline Conn

3-11-74

CAOF 28,462 MCFGPD TD 9640'; COMPLETE (Morrow) FOUR POINT GAUGES: Flwd 1197 MCFGPD, 1.75" orifice, 1 hr, TP 3000# Flwd 1606 MCFGPD, 1.75" orifice, 1 hr, TP 2967# Flwd 1946 MCFGPD, 1.75" orifice, 1 hr, TP 2939# Flwd 2526 MCFGPD, 1.75" orifice, 1 hr, TP 2889# LOG TOPS: Grayburg 520', San Andres 812', Glorieta 2365', Tubb 3170', Abo 3775', Third Bone Spring Sand 6175' Wolframe 6422

Bone Spring Sand 6175', Wolfcamp 6422, Canyon 7868', Strawn 8295', Atoka 8568', Morrow 8938', Barnett 9348', Chester 9573'

34-19-25 EDDY, N.M. Pan American - #1 - A. L. Worthlem.

Swb. 11/4 bbls. 1.W & 24 BAW/24 hrs. w/30; reA/2000 swb. 48 BAW & 134 BLW/53 hrs. & swb. dry w/sli. blow & fas, TSTM; blow down well; SITr 2950% to 1500%, 20/64" ch. 30" blow to 200% 45.64" ch. next 30"

20/64" ch. 30" blew to 200# 45.64" ch. next 30"
end of blow down had attendy blow of gas.
30,000 SWF (10,500' sd) swb. 200 5LW/li hrs. F. rate
S40 MCFGPD + 2 bbls. LW/l hrs., 25/64" ch.; PTP 300
FCP 800#; F. 390 MCF + 4 BLW/l hrs., 30/64" ch.;
PTP 100#; FCF 600#; SI 12 hrs., TP 2000#; CP 2300#;
P. 47 BLW/9 hrs. 25/64" ch., gas & 750 MCF to 384
MCFG; P. 23 BLW/12 hrs., 30/64" ch. no gas gge.,
PTP 150#; CP 500#.

PB 9537'; 5ge. 600 MCFG/12 hrs., 30/64" ch.; FTF 110-150#
CP 500#; F. 18 bbls. LW/12 hrs., 30/64" ch.; TP 145#;
CP 500#; SI 12 hrs.; CP 2200#; TP 2200#.

Perf. 24/9442-46
Perf. 24/9442-4

K-2223-53 34-19-25 BAY, NEW MEXICO AGE 3 Sterolind #1 - Lakewood Unit.

DST 10273-423 op 3 hrs. Rec. 225 mid. PP 120 20 mim SIP 180# DST 10433-466 op 4 hrs. Rec. 2701 mud / 10030 black brackish wtr. PP 4275 SIP 4475

EDDY, NEW MEXICO 34-19-25 Stanoline - #1 - Lekewood Unit A G3 2

DST 810-861 op 2 hrs. rec. 105' 30MGCM. PP 55 31P-0DST 2610-42 op 2 hrs. rec. 135' SOMMOND.
DST 7770-2850 op 1 hr. 45 mins rec. 108' SOCM
DST 5310-3585 op 2 hrs. rec. 64' mmi.
DST 6605-6700 op 4 hrs. 10 mins Gas 2 hrs. 15 mins Rec.
270' mmd. 2615' XW. P. 1465 20 mins SIP 2605/
DST 7030-\$123 op 4 hrs. Gas 35 mins rec. 60' SGCM,
PP 130 20 mins SIP 175/
DST 7836-78 op 3 hrs. Rec. 39' mmd, W.S.
DST 9397-9500 op 5 hrs. rec. gas 35 mins 47000 CPGPD,
Rec. 284' HCCM, PP 115 80 mins SIP 2936/
DST 9407-9540 op 3 hrs. rec. gas 55 mins 315' HGCM, PP 20
20 mins SIP 1810/
DST 10,350-351 op 1 hr. 30 mins Rec. 20' mmd.
DST 10,350-373 op 1 hr. 22 mins rec. 15' mmd.
DST 10370-598 op 3 hrs. rec. 90' mmd.
CONT'D ON PAO' \$

... EDDY

Cook WILDCAT

STATE N.N. KROENLED: 2223-53

(CMD) TO: Pen American - #1 - A. D. Worthion, S. T. Long 660' FEL & 1980' PSL of sec. CARD #2223+59 for Sec. 34, T-19-3; B-25-E 0000)

Acid de Shot	CASING RECORD	i To	Pri:	
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-	EDDY	ldcat			
0==	HULLIARD OIL & GAS CO.			30-	015-21066
	1 Gulf Federa			\$4 ***a1	
	Sec. 35, T-19-S, R-25-F			440	
	1980' FNL, 1980' FWL o			co o=o	
			SOW sees	464	
200 I -	30-74 cm 4-11-74	700MA110M	Datim	* 000-0110m	DATUN
C14					
13	3/8" at 305' w/250 sx				
8	5/8" at 1300' w/700 sx		1	!	
4	1/2" at 9810' w/500 sx			!	
			İ		
		10 9835' (C	STR)	reo 9705'	

IP (Morrow) Perfs 9437-9563' CAOF 2639 MCFGPD. GOR (NR); Grav (gas) .596; SIWHP 3020#

CONTR Capitan Orms elev 3503' GL #0 9900' TYPE RT

F.R. 12-17-73 (Herrow) 12-31-73 AMEND OPERATOR: Formerly reported as Barnhill-Richardson Drlg 1095' im & anhy Drig 3015' im & dolo Drlg 3865' im & dolo 2-5-74 2-12-74 2-15-74 DST 2801-3052', open 1 hr 15 mins, rec 600' GIDP + 20' OG&SWCDF, 1 hr 15 min ISIP 333#, FP 166-150#, 2 hr 30 min FSIP 416#, HP 1279-1279#, BHT 100 deg Drlg 5280' Lm Drlg 7880' Lm & sh Drlg 9183' 2 19-74 2-25-74 3-4-74 3-11-74 TD 9633'; Prep to drill

**: 10

Wildcat

NM Page #2

HILLIARD OIL & GAS CO. l Gulf Federal Sec 35, T19S, R25E

3-11-74

Cont'd DST 9383-9467', open 1 hr 45 mins, GTS in 18 mins @ 95 MCFGPD, Flwd after 30 mins @ 160 MCFGPD thru 1/2" chk, rec 140' SGCM (Sampler rec 1.2 CFG), 1 hr 15 min ISIP 3811#, FP 150-213#, 3 hr FSIP 3879#, HP 4523-4523# DST 9506-9573', open 4 hr 15 mins, GTS in 12 mins @ 250 MCFGPD thru 1/2" chk, FTP 24#, rec 270' GCM (Sampler rec 1.5 CFG @ 375#), 1 hr 30 min ISIP 3924#, FP 113-151#, 6 hr FSIP 3847#, HP 4551-4551#
DST 9561-9633#, open 1 hr 15 mins, rec 500' GIDP + 180' GCM (Sampler rec 3.56 CFG +

3-11-74	Cont 'd
	2006 cc's GCH @ 1650#), 1 hr 30 min ISIP
	2746#, FP 57-75#, 3 hr FSIP 3391#, HP
	4589 - 4570 #
3-18-74	TD 9835'; MORT
3-26-74	TD 9835'; WOCU
4-15-74	TD 9835'; PBD 9705'; Tstg
	Perf 9437-9563' w/15 shots (overall)
	Acid (9437-9563') 6000 gals (7½% MSA)
4-29-74	TD 9835'; PBD 9705'; SI PBU
5-7-74	TD 9835'; PBD 9705'; Tstg
6-16-74	TD 9835'; PBD 9705'; WO Fot
	CAOF 2639 HCFGPD
6-17-74	TD 9835'; PBD 9705'; COMPLETE

EDDY

Wildcat 1 Gulf Federal HILLIARD OIL & GAS CO.

Page #3

Sec 35, T19S, R25E

6-17-74

Coat 'd

(Morrow) FOUR POINT GAUGES:

(Morrow) FOUR POINT GAUGES:
Flud 472 MCFGPD, .5" Orifice, 1 hr, TP 2901#
Flud 799 MCFGPD, .5" Orifice, 1 hr, TP 2740#
Flud 1295 MCFGPD, 1.0" Orifice, 1 hr, 2423#
Flud 2119 MCFGPD, 1.0" Orifice, 1 hr, 1481#
LOG TOPS: Yeso 2455', Second Bone Spring
Sand 3285', Third Bone Spring Sand 6364',
Wolfcamp 6635', Cisco 7879'; Canyon 8139',
Strawn 8558', Atoka 9016', Horrow 9325',
Chester 9795'
COMPLETION PEPOPPED

6-22-74

COMPLETION REPORTED

COUNTY EDDY MELON	ildeat		© Copyrighted Res	reduction Probables
OFF GULF OIL CORP.			~~30-01	5-20820
no. 1 sees Shugart, Re			BETWE	
Sec_1. T-20-S. R-25-E			MAP	
660' FNL, 1980' FWL o	f Sec		CO-ORD	
		LASS	aev. 34	726
ero 3-11-73 cur 4-23-73	PORMATION	DATUM	FORMATION	DATUM
13 3/8" at 299' w/320 sx 8 5/8" at 2090' w/1245 sx				
	ro 97561			

PLUGGED & ABANDONED

COMTR McVay Drig. OPER CLEV 3411 GL, 3429 KB PO

3-19-73 (Morrow) TD 2090' lm; WOC 3-19-73 3-26-73 Drig 4310' lm & sd Dr 1g 6643' 1m 4-2-73 Drig 8430' im & sh 4-9-73 DST (Cisco) 7878-7903', open 1 hr 30 mins, rec 130' DM, 1 hr ISIP 1570#, FP 43-85#, 1 hr 30 min PSIP 2139#, HP 3815-3772#, BHT 84 deg Drlg 9595' sd & cht 4-16-73 DST 8538-8644', open 1 hr, rec 272' mud + 1589' salt wtr, 1 hr ISIP 3309#, FP 415-739#, 1 hr FSIP 3264#, HP 4199-4154#, BHT 160 deg 4-23-73 TD 9756'; P&A 4-23-73 (Hold for Tops) DST (Morrow) 9565-9631', open 1 hr 30 mins, GTS in 63 mins @ TSTM, rec 210' DM, 1 hr 2 min ISIF 1122#, FP 94-140#, 3 hr FSIP 2963#, HP 4256-4256#, BHT 154 deg

EDDY GULF OIL CORP.

Wildcat NM Sec 1, T20S,R25E l Shugart, Rena Com

4-23-73 Continued DST 9672-9756', open 1 hr, rec 480' mud, 1 hr ISIP 3489#, FP 237-237#, 1 hr FSIP 2546#, HP 4739-4762#, BHT 162 deg

SP-DST 2830-2910', open 1 hr, rec 335' DM, 1 hr ISIP 836#, FP 198-209#, 2 hr FSIP 773#, HP 1349-1370#

TD 9756'; PLUGGED & ABANDONED 4-30-73 LOG TOPS: San Andres 1002', Third Bone Spring Sand 6535', Wolfcamp 6887', Cisco 7858', Strawn 8525', Atoka 9080', Morrow 9440' 5-5-73

COMPLETION REPORTED

MARK PRODUCTION CO.	lesignated		30 - 0	015-21141
Sec 4, T-20-5, R-25-E 660' FNL, 1980' FEL of	Sec	• • - •	70 #161 WAR CC- D71	
		D	tit.	448
6-20-74 - 7-20-74	* (hours 700s	Detur	· Comment of the	DATUW
12 3/4" at 305' w/200 sx 8 5/8" at 1205' w/600 sx				
· · · · · · · · · · · · · · · · · · ·	re 9550'	(MSSP)	•••	

PLUGGED & ABANDONED

<u> </u>	Cactus	 ***** 3592' GL	<u>~10,000'</u>	TA PER

M. 35 . .

WILDCAT

AMOCO PROD. CO. I Rios Siete

CAS WED

5 ml SW/12kewood_1980' FS1 2310' FEL Sec 11-205-25E.

Spud: 11-13-78; Comp: 1-19-79; Elev: 3366' grd; TD: 9865' (Barnett); PB: 9825'
Casing: 13 3/8" 333'/325 tx, 8 5/8" 1500'/750 tx, 5\footnote{5}" 9865'/250 tx
Frod Zone: (Morrow) T/Pay 9448', prod thru peris 9448-9660'
[FF: 750 MCFCPD, 14/64" ch, GOR NR, Grav NR, C? plor, TP 525#
Comp Info: DST (Morrow) 9457-9530', op 3 hrs 45 min, GTS 30 min @ 70 MCFCPD, 3/8"
ch, TP 12#, incr to 220 MCFCPD, 3/8" ch, TP 52#, rec 3106' sli GCDF, 1 hr 30 min,
ISIP 3902#, HP 4565-4520#; wellsold to Amooc Prod Co.; Perf (Morrow) 9448-68',
9510-14', 9528-32', 9636-60' w/ISPF; 5/1 8W/9 hrs; A/5000 gals (7½%); F/750 MCFCPD/24 hrs, 14/64" ch, TP 525#; ran DILL, MICL & CNDL logs; C/Moranco #9.
Tops: (EL) Third Bone Sprg 6423', Wolfe 7052', Claco 7743', Caay 8256', Atoka 8992',
Morrow 9406', Barnett 9661'
API No.: 30-015-22729 PROHIBI

Petroleum Information

Date: 3-7-79

Cord No.: 16 rm

EDDY COUNTY

NEW MEXICO

UNDESIGNATED FIELD

Well: SOUTHERN UNION EXPL. CO. 2 Exxxxx Federal

Result DGA

D

Loc'n: 6 mt 5W/Lakewood, 660' FSL 1980' FEL Sec 23-205-25E,

Spud: 6-3-78; Comp: 9-6-78; Elev: 3491' grd; TD: 10,200' Barnett;

Casing: 13 3/8" 353'/375 sx, 8 5/8" 2223'/1450 sx, 4½" 3730'/450 sx

Comp Info: Perf (Bone Sprg) 3584-3526' w/1 SPC; A/6000 gals (15% MCA); S/sulf wtr;

squd w/75 sx; Perf (Bone Sprg) 3562-76' w/1 SPF; A/1000 gals (7½%); S/kd w/NS; ran

DILL, CNL 6 FDC logs; C/Big West.

Tops: (EL) San And 750', Bone Sprg 3665', 3rd Bone Sprg 6660', Wolfe 7050', Cisco

7874', Cany 8288', Strawn 8560', Atoka 9205', Morrow Lm 9500', Morrow Clastic

9645', Morrow Sh 9840', Barnett Sh 9970'

API No.: 30-015-22546

C.COPYRIGHTED 1978
REPRODUCTION PRO

Petroleum Informatione

Date: 11-1-78

Cord No.: 10 mm

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. 7522 Order No. R-6933

APPLICATION OF SANTA FE EXPLORATION CO. FOR AN UNORTHODOX GAS WELL LOCATION, EDDY COUNTY, NEW MEXICO.

ORDER OF THE DIVISION

BY THE DIVISION:

This cause came on for hearing at 9 a.m. on March 31, 1982, at Santa Fe, New Mexico, before Examiner Daniel S. Nutter.

NOW, on this 5th day of April, 1982, 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, Santa Fe Exploration Co., seeks approval of an unorthodox gas well location 660 feet from the North line and 660 feet from the West line of Section 14, Township 20 South, Range 25 East, NMPM, to test the Permo-Penn, Strawn, Atoka and Morrow formations, Eddy County, New Mexico.
- (3) That the N/2 of said Section 14 is to be dedicated to the well.
- (4) That the applicant requested said unorthodox location on the grounds that it will improve its structural position with respect to the so-called "Boyd Channel," a north/south trending Morrow zone of higher than usual porosity and permeability traversing the western half of said Section 14, thereby increasing its chances of obtaining strong commercial production.
- (5) That a standard location for a well in the western half of the N/2 of Section 14 would be in either the NE/4 NW/4 or the SE/4 NW/4 of said Section 14.

-2-Case No. 7522 Order No. R-6933

- (6) That a non-commercial well has been drilled in the S/2 of Section 11 immediately to the north, and applicant is seeking to move as far as possible away from said well, thereby making the NE/4 NW/4 of Section 14 undesirable as a location for the proposed well.
- (7) That a high pressure pipe line traverses Section 14, and a portion of said line passes in a northeast/southwest direction through the middle of the SE/4 NW/4 of the section.
- (8) That a standard location for the N/2 of Section 14 in the SE/4 NW/4 of the section would be in the center of said quarter-quarter section at a point 1980 feet from the North line and 1980 feet from the West line of the section.
- (9) That an unorthodox location 200 feet north and 200 feet west of the aforesaid location, or 1780 feet from the North line and 1780 feet from the West line should provide adequate clearance from the aforementioned high pressure pipe line and would, according to applicant's exhibits, be as geologically attractive as the proposed unorthodox location.
- (10) That an offset operator appeared at the hearing and opposed approval of the proposed unorthodox location without assessment of a penalty against production from the proposed well, but waived objection to the unorthodox location described above, i.e., 1780 feet from the North line and 1780 feet from the West line of Section 14.
- (11) That the applicant should be given the choice of drilling either of the aforesaid locations, the proposed unorthodox location 660 feet from the North line and 660 feet from the West line of Section 14, or 1780 feet from the North line and 1780 feet from the West line of Section 14.
- (12) That in order to protect correlative rights and to offset the advantage gained over the offsetting operators, a well drilled at the 660/660 location described above should be penalized by the imposition of a production limitation factor.
- (13) That a well at said proposed location is 100 percent of the standard distance from the north boundary of the spacing and proration unit, but is only 33 percent of the standard distance from the western boundary of the unit permitted by the Division Rules and Regulations.
- (14) That a well at said proposed location will have an area of drainage which extends 66.7 more acres outside its proration unit than a well at a standard location, being 21 percent of a 320 acre unit and leaving 79 percent of the area of

-3-Case No. 7522 Order No. R-6933

drainage within the assigned unit or the permissible drainage area outside the unit.

- (15) That the production limitation factor should be based upon the variation of the location from a standard location and the 66.7-acre encroachment described in Finding No. (14) above, and should be calculated by averaging the north/south location factor (100 percent), the east/west location factor (33 percent) and the acreage encroachment factor (79 percent), which yields a production limitation factor of 0.71.
- (16) That in the absence of any special rules and regulations for the prorationing of production from the subject well, the aforesaid production limitation factor should be applied against the well's ability to produce into the pipe line as determined by periodic tests.
- (17) That in order to avoid premature abandonment and subsequent loss of recoverable reserves, provision should be made for a reasonable minimum allowable for the subject well, and 500,000 cubic feet of gas per day is a reasonable figure for a minimum allowable.
- (18) That approval to drill the proposed well at the unorthodox location described in Finding No. (2) above, subject to the Production Limitation Factor described in Finding No. (15) above, or in the alternative, to drill at the unorthodox location described in Finding No. (9) above, will not impair but will protect correlative rights, will not cause waste, and should be given.

IT IS THEREFORE ORDERED:

- (1) That the applicant, Santa Fe Exploration Co., is hereby authorized to drill a well to test the Permo-Penn, Strawn, Atoka and Morrow formations at a point 660 feet from the North line and 660 feet from the West line of Section 14, Township 20 South, Range 25 East, NMPM, Eddy County, New Mexico, subject to a Production Limitation Factor of 0.71 applicable as described below, or, in the alternative, to drill said well at an unorthodox location 1780 feet from the North line and 1780 feet from the West line of said Section 14 without penalty, in either case to be dedicated to the N/2 of said Section 14.
- (2) That in the absence of any Special Rules and Regulations prorating production from the subject well, the following Special Rules and Regulations for a non-prorated gas well shall apply, if the well is drilled at the location first described in Paragraph (1) above:

-4-Case No. 7522 Order No. R-6933

SPECIAL RULES AND REGULATIONS FOR THE APPLICATION OF A "PRODUCTION LIMITATION FACTOR" TO A NON-PROPATED GAS WELL

APPLICATION OF RULES

RULE 1. These rules shall apply to the Santa Fe Exploration Co. Morrow formation gas well located 660 feet from the North line and 660 feet from the West line of Section 14, Township 20 South, Range 25 East, NMPM, Eddy County, New Mexico, which well's Production Limitation Factor of 0.71 shall be applied to the well's deliverability (as determined by the hereinafter set forth procedure) to determine its maximum allowable rate of production.

ALLOWABLE PERIOD

- RULE 2. The allowable period for the subject well shall be six months.
- RULE 3. The year shall be divided into two allowable periods commencing at 7:00 o'clock a.m. on January 1 and July 1.

DETERMINATION OF DELIVERY CAPACITY

- RULE 4. Immediately upon connection of the well the operator shall determine the open flow capacity of the well in accordance with the Division "Manual for Back-Pressure Testing of Natural Gas Wells" then current, and the well's initial deliverability shall be calculated against average pipeline pressure in the manner described in the last paragraph on Page I-6 of said test manual.
- RULE 5. The well's "subsequent deliverability" shall be determined twice a year, and shall be equal to its highest single day's production during the months of April and May or October and November, whichever is applicable. Said subsequent deliverability, certified by the pipeline, shall be submitted to the appropriate District Office of the Division not later than June 15 and December 15 of each year.
- RULE 6. The Division Director may authorize special deliverability tests to be conducted upon a showing that the well has been worked over or that the subsequent deliverability determined under Rule 5 above is erroneous. Any such special test shall be conducted in accordance with Rule 4 above.
- RULE 7. The operator shall notify the appropriate district office of the Division and all offset operators of the date and

-5-Case No. 7522 Order No. R-6933

time of initial or special deliverability tests in order that the Division or any such operator may at their option witness such tests.

CALCULATION AND ASSIGNMENT OF ALLOWABLES

- RULE 8. The well's allowable shall commence upon the date of connection to a pipeline and when the operator has complied with all appropriate filing requirements of the Rules and Regulations and any special rules and regulations.
- RULE 9. The well's allowable during its first allowable period shall be determined by multiplying its initial deliverability by its production limitation factor.
- RULE 10. The well's allowable during all ensuing allowable periods shall be determined by multiplying its latest subsequent deliverability, as determined under provisions of Rule 5, by its production limitation factor. If the well shall not have been producing for at least 60 days prior to the end of its first allowable period, the allowable for the second allowable period shall be determined in accordance with Rule 9.
- RULE 11. Revision of allowable based upon special well tests shall become effective upon the date of such test provided the results of such test are filed with the Division's district office within 30 days after the date of the test; otherwise the date shall be the date the test report is received in said office.
- RULE 12. Revised allowables based on special well tests shall remain effective until the beginning of the next allowable period.
- RULE 13. In no event shall the well receive an allowable of less than 500,000 cubic feet of gas per day.

BALANCING OF PRODUCTION

- RULE 14. January 1 and July 1 of each year shall be known as the balancing dates.
- RULE 15. If the well has an underproduced status at the end of a six-month allowable period, it shall be allowed to carry such underproduction forward into the next period and may produce such underproduction in addition to its regularly assigned allowable. Any underproduction carried forward into any allowable period which remains unproduced at the end of the period shall be cancelled.

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- RULE 16. Production during any one month of an allowable period in excess of the monthly allowable assigned to the well shall be applied against the underproduction carried into the period in determining the amount of allowable, if any, to be cancelled.
- RULE 17. If the well has an overproduced status at the end of a six-month allowable period, it shall be shut in until such overproduction is made up.
- RULE 18. If, during any month, it is discovered that the well is overproduced in an amount exceeding three times its average monthly allowable, it shall be shut in during that month and during each succeeding month until it is overproduced in an amount three times or less its monthly allowable, as determined hereinabove.
- RULE 19. The Director of the Division shall have authority to permit the well, if it is subject to shut-in pursuant to Rules 17 and 18 above, to produce up to 500 MCF of gas per month upon proper showing to the Director that complete shut-in would cause undue hardship, provided however, such permission shall be rescinded for the well if it has produced in excess of the monthly rate authorized by the Director.
- RULE 20. The Division may allow overproduction to be made up at a lesser rate than permitted under Rules 17 or 18 above upon a showing that the same is necessary to avoid material damage to the well.

GENERAL

RULE 21. Failure to comply with the provisions of this order or the rules contained herein or the Rules and Regulations of the Division shall result in the cancellation of allowable assigned to the well. No further allowable shall be assigned to the well until all rules and regulations are complied with. The Division shall notify the operator of the well and the purchaser, in writing, of the date of allowable cancellation and the reason therefor.

IT IS FURTHER ORDERED:

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

Case No. 7522 Order No. R-6933

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

STATE OF NEW MEXICO
OLL CONSERVATION DIVISION

JOE D. RAMEY, Director

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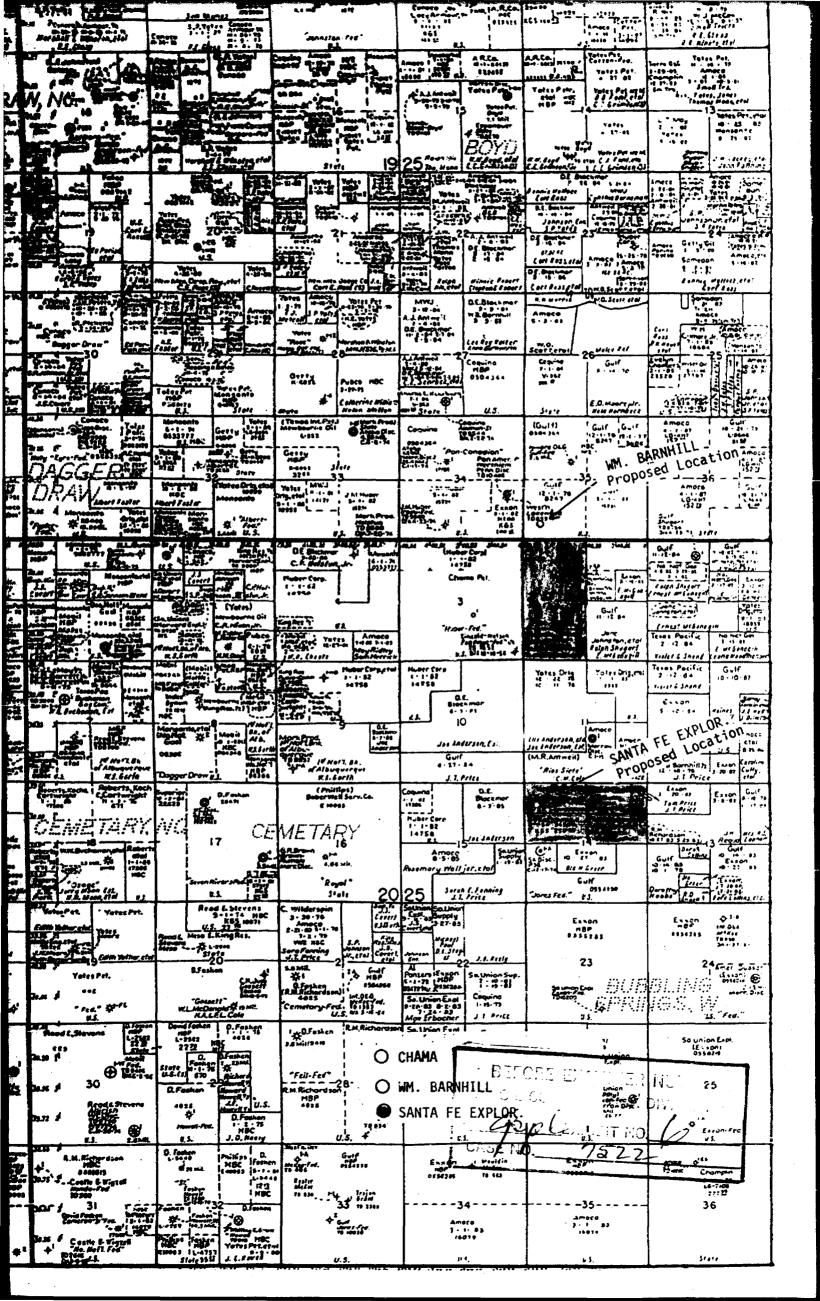
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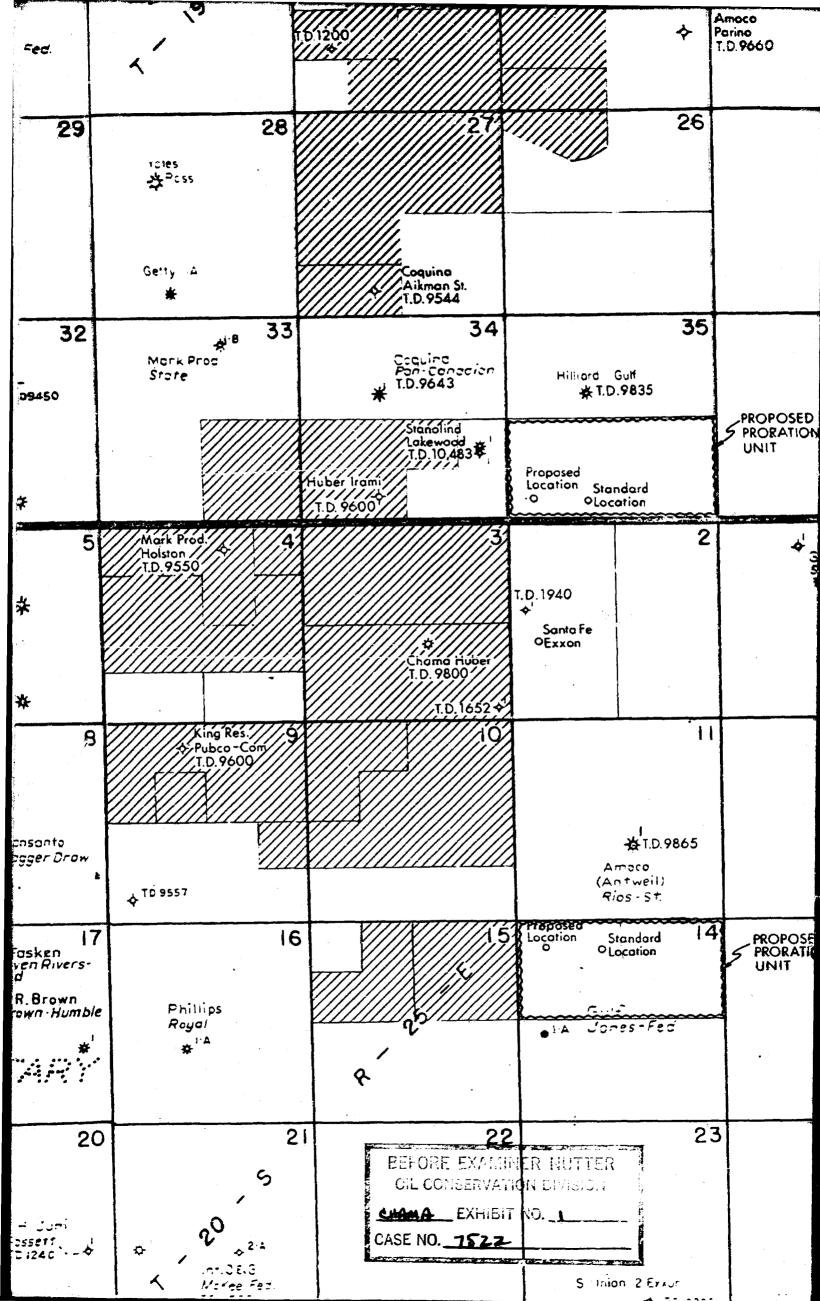
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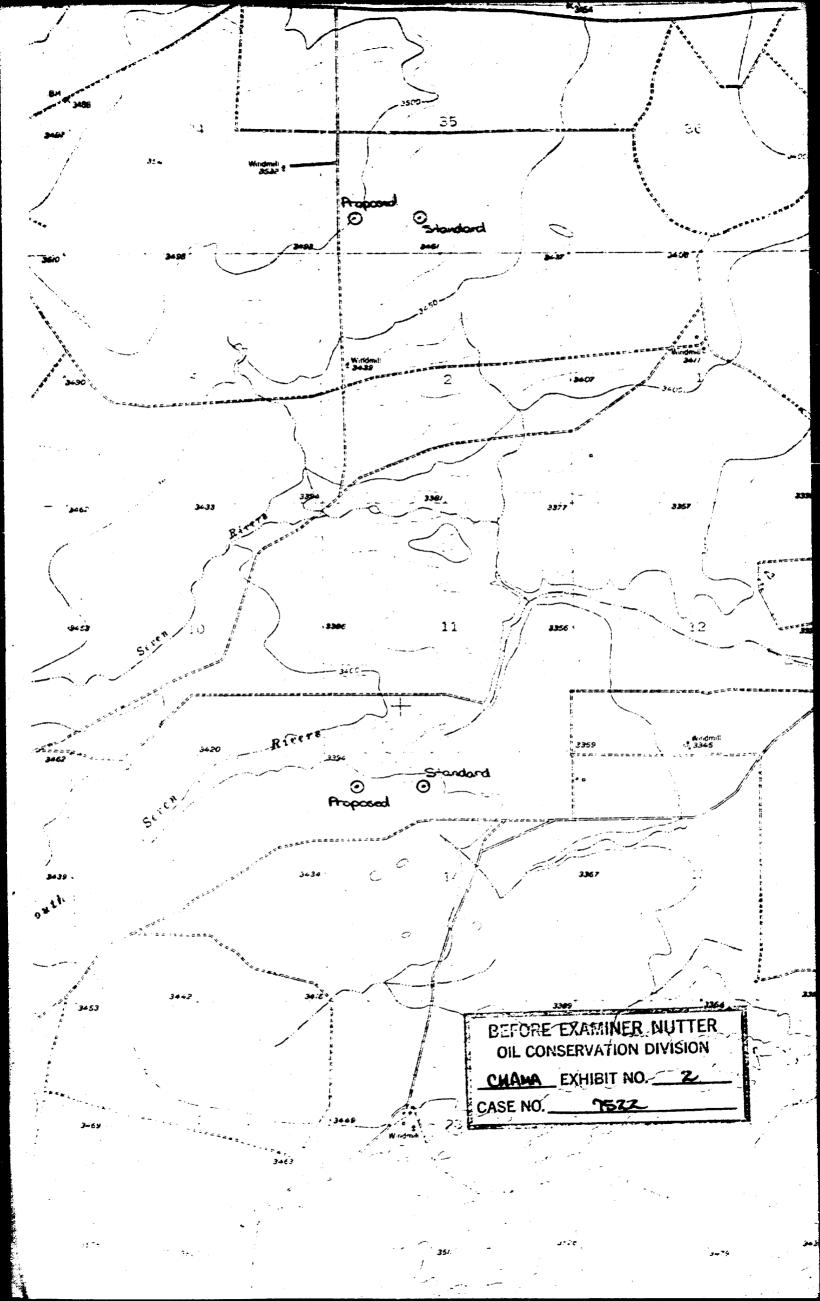
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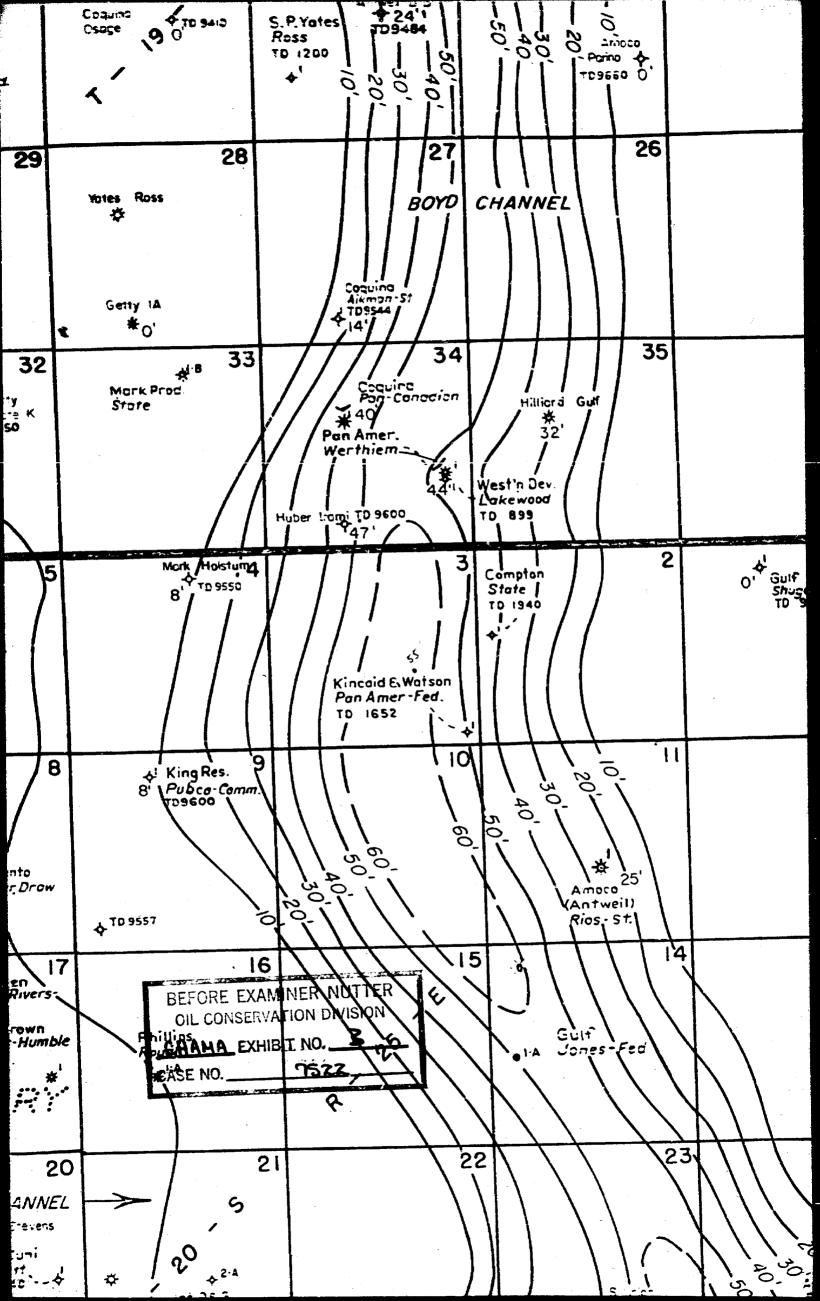
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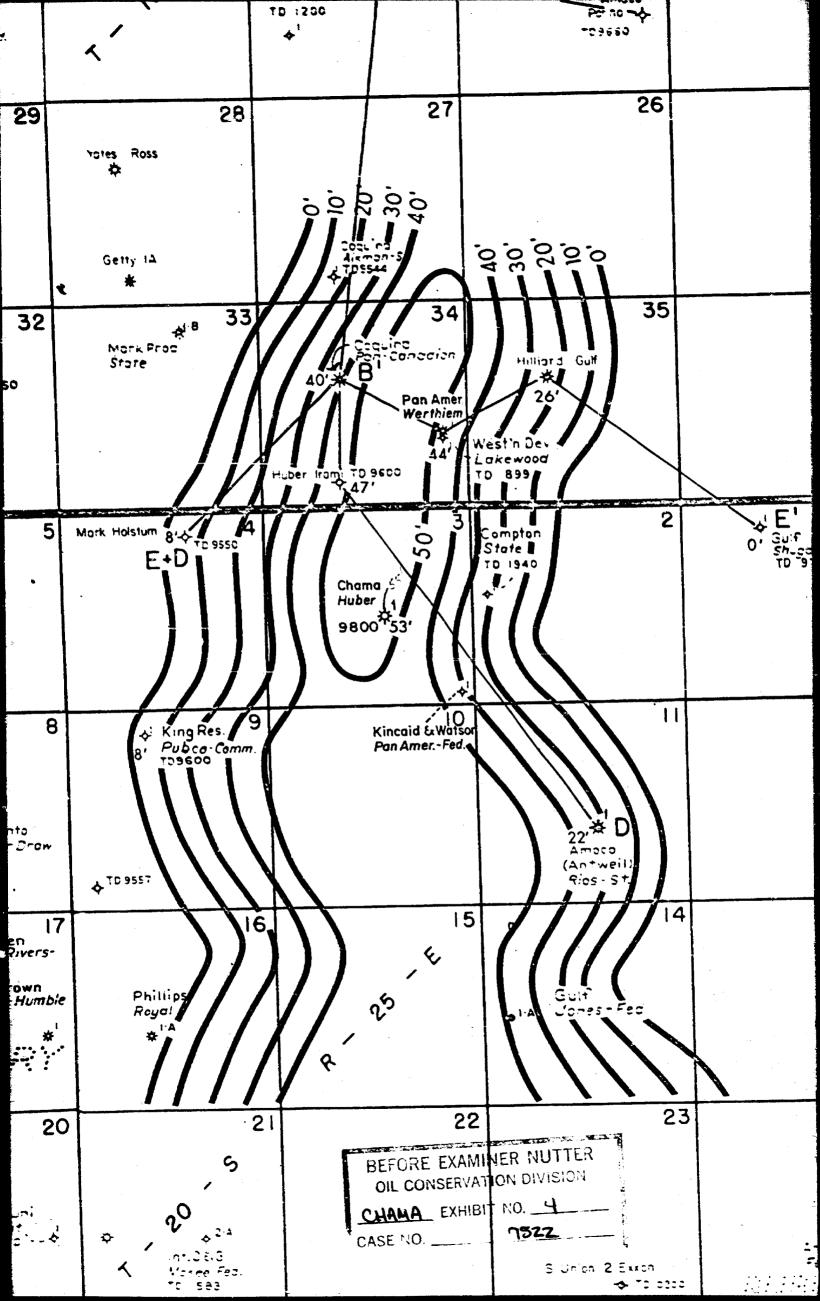
The foregoing instrument was acknowledged before me this AUGUST	ATE OF	INDIVIDUAL AC		January	
ATLOR CALL COUNTY ATLOR CALL Forcia INDIVIDUAL ACKNOWLERGMENT (No. Mexico Short Form) To force one introduction as acknowledged before me this 22th day of JANUARY SAN JOAQUIN COUNTY Commission experts AUGUST 30, 385 INDIVIDUAL ACKNOWLERGMENT (No. Mexico Short Form) INDIVIDUAL ACKNOWLERGMENT (No. Mexico Short Form) ATLOR CALL CALL SAN JOAQUIN COUNTY SAN JOAQUIN COUNTY AUGUST 30 INDIVIDUAL ACKNOWLERGMENT (No. Mexico Short Form) INDIVIDUAL ACKNOWLERGMENT (No. Mexico				\$ 1.01, 14	1.50
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INDIVIDUAL ACKNOWLEDGMENT (No. Marine Short Form) The forecome instrument was acknowledged before me this 22. 15. Clot it less Aurelia. Siovannoni The forecome instrument was acknowledged before me this 22. 15. Clot it less Aurelia. Siovannoni Tare of Elifornia The forecome instrument was acknowledged before me this 25. NO JANUEL GRAVES SAR. JOAQUILL The forecome instrument was acknowledged before me this 25. NO JANUEL GRAVES Commission expert. August 30. 15. 85 INDIVIDUAL ACKNOWLEBGMENT (No. Marine Short Form) The foregoing instrument was acknowledged before me this 48. And August 20. 15. 85 INDIVIDUAL ACKNOWLEBGMENT (No. Marine Short Form) The foregoing instrument was acknowledged before me this 48. And August 20. 15. 85 INDIVIDUAL ACKNOWLEBGMENT (No. Marine Short Form) The foregoing instrument was acknowledged before me this 48. And August 20. 15. 85 INDIVIDUAL ACKNOWLEBGMENT (No. Marine Short Form) Account of the formation of the form	· · · · · · · · · · · · · · · · · · ·		4 11 11 11	*************************************	***************************************
The foreyong instrument was acknowledged before me this 29.5 day of JRIUGE CRAYES SAN JOAQUIR COUNTY SAN JOA		INDIVIDUAL AC	KNOWLEDGME	NT (New Mexic	o Short Form)
Commission expires August 30. AUGUST 30. AUGUST 30. AUGUST 30. AUGUST CALIFORNIA INDIVIDUAL ACKNOWLEBRINETT (Now Mexico Short Form) AUGUST 30.	The foregoing instrument was acknowledged before me the		day of	January	بسيين
SAN JOACHIE COUNTY OF SEN. JOACHIE COUNTY OF					
INDIVIDUAL ACKNOWLEDGENT (New Mexice Short Form) The foregoing instrument was arknowledged before me this 29th day of January See by Joe F. Garibaldi. OF ANGLES SAN JOSUIN CUMP INDIVIDUAL ACKNOWLEBGENT (New Mexice Short Form) TATE OF SAN JOSUIN CUMP INDIVIDUAL ACKNOWLEBGENT (New Mexice Short Form) The foregoing instrument was arknowledged before me this day of San Josuin County			14.16.		
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30-40	23	23	23		23	51.2	35	1,792.0
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Interval	Trial l	Trial 2	Trial 3	Trial 4	Area Used	Acres	Ave. H.	Acre Fee
0-30	17	17	17		17	37.8	25	945
0-40	24	23	23		23.3	51.8	35	1,813
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PAGE 1 of 1 EXAMINER HEARING - MEDNESDAY - MARCH 31, 1982

Docket No. 9-82

Dockets Nos. 10-82 and 11-82 are tentatively set for April 14 and April 28, 1982. Applications for hearing must be filed at least 22 days in advance of hearing date.

DOCKET: EXAMINER HEARING - WEDNESDAY - MARCH 31, 1982 9 A.M. - OIL COMSERVATION DIVISION CONFERENCE ROOM STATE LAND OFFICE BUILDING, SANTA FE, NEW MEXICO

The following cases will be heard before Daniel S. Mutter, Examiner, or Richard L. Stamets, Alternate Examiner:

CASE 7469: (Continued from March 3, 1982, Examiner Searing)

In the matter of the hearing called by the Oil Conservation Division on its own motion to parmit H. N. Bailey & Associates, Commercial Union Insurance Company, and all other interested parties to appear and show cause why the following wells on the H. M. Bailey Lease, Township 21 South, Range 1 West, Dona Ana County, should not be plugged and abandoned in accordance with a Division-approved plugging program: In Section 10: Nos. 9 in Unit A, 9, 11, 12, and 13 in Unit B, 10 and 14 in Unit C; and No. 15 in Unit C of Section 9.

CRSE 7497: (Continued and Readvertised)

Application of Parabo, Inc. for an oil treatment plant permit, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority for the construction and operation of an oil treating plant for the purpose of treating and reclaiming sediment oil at its salt pater disposal site in the SM/4 of Section 29, Township 21 South, Range 38 East.

- CASE 7516: Application of Benson-Montin-Greer for a unit agreement, Rio Arriba County, New Mexico.

 Applicant, in the above-styled cause, seeks approval for the North Canada Ojitos Unit Area, comprising 12,361 acres, more or less, of Jicarilla Apache Indian lands in Township 27 North, Range 1 West.
- CASE 7517: Application of Anadarko Production Company for an unorthodox oil well location, Lea County, New Maxico.

 Applicant, in the above-styled cause, seeks approval of an unorthodox location 1450 feet from the South

 line and 1400 feet from the West line of Section 15, Township 22 South, Range 37 East, Penrose Skelly

 Pool, the NE/4 SW/4 of said Section 15 to be dedicated to the well.
- CASE 7518: Application of Consolidated Oil & Gas Inc., for salt water disposal, Lea County, New Marico.

 Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the Abo formation in the perforated interval from 8688 feet to 8856 feet in its Midway State Well No. 1, located in Section 8, Township 17 South, Range 37 East, Midway-Abo Pool.
- CASE 7519: Application of S & J Oil Company for special pool rules, McKinley County, New Mexico.

 Applicant, in the above-styled cause, seeks the promulgation of special pool rules for the Seven

 Lakes-Menafee Oil Pool to provide for wells to be located not nearer than 25 feet to the quarter-quarter section line nor nearer than 165 feet to lands owned by an offset operator.
- CASE 7510: (Continued from March 16, 1982, Examiner Hearing)

Application of Union Oil Company of California for compulsory pooling, Lea County, New Mexico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests in the Wolfcamp and Penn formations underlying the W/2 of Section 10, Township 22 South, Range 32 East, to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well, and a charge for risk involved in drilling said well.

CASE 7511: (Continued from March 16, 1982, Examiner Hearing)

Application of Buffton Oil & Gas Inc. for compulsory pooling, Lea County, New Mexico.

Applicant, in the above-styled cause, seeks an order pooling all mineral interests in the Wolfcamp through Devomian formations underlying the W/2 of Section 35, Township 16 South, Range 35 East, to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well, and a charge for risk involved in drilling said well.

CASE 7520: Application of Lewis B. Burleson Inc. for compulsory pooling and a non-standard proration and spacing unit, Lea County, New Mexico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests in the Jalmat Pool underlying a 160-acre non-standard proration unit comprising the NM/4 of Section 15, Township 24 South, Range 36 East, to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.

- CASE 7521: Application of William B. Barnhill for an unorthodox gas well location, Eddy County, New Nexico.

 Applicant, in the above-styled cause, seeks approval of an unorthodox location 660 feet from the South and West lines of Section 35, Township 19 South, Range 25 East, Permo-Penn, Strawn, Atoka and Morrow formations, the S/2 of said Section 35 to be dedicated to the well.
- Application of Santa Pe Emploration Co. for an unorthodox gas well location, Eddy County, New Mexico.

 Applicant, in the above-styled cause, seeks approval of an unorthodox location 660 feet from the

 North and West lines of Section 14, Township 20 South, Range 25 East, Perso-Penn, Strawn, Atoka

 and Norrow formations, the N/2 of said Section 14 to be dedicated to the well.
 - CASE 7523: Application of Robert W. Enfield for compulsory pooling and an unorthodox gas well location, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests in the Wolfcamp-Penn formations underlying the E/2 of Section 18, Township 19 South, Range 27 East, to be dedicated to a well to be drilled at an unorthodox location 660 feet from the Worth and East lines of said Section 18. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.
 - CASE 7524 THEU 7535: Application of Jack J. Grynberg for compulsory pooling, Chaves County, New Mexico.

 Applicant, in each of the following 12 cases, meeks an order pooling all mineral interests down through the Abo formation underlying the lands specified in each case, each to form a standard 160-acre gas spacing and proration unit to be dedicated to a well to be drilled at a standard location thereon. Also to be considered in each case will be the cost of drilling and completing said wells and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the wells and a charge for risk involved in drilling said wells:
 - CASE 7524: SE/4 Section 2, Township 5 South, Range 24 East
 - CASE 7525: SW/4 Section 3, Township 5 South, Range 24 East
 - CASE 7526: WM/4 Section 3, Township 5 South, Range 24 East
 - CASE 7527: SE/4 Section 3, Township 5 South, Range 24 East
 - CASE 7528: NW/4 Section 4, Township 5 South, Range 24 East
 - CASE 7529: NE/4 Section 4, Township 5 South, Range 24 East
 - CASE 7530: NW/4 Section 11, Township 6 South, Range 24 East
 - CASE 7531: SW/4 Section 11, Township 6 South, Range 24 East
 - CASE 7532: SE/4 Section 27, Township 6 South, Range 24 East
 - CASE 7533: SW/4 Section 27, Township 6 South, Range 24 East
 - CASE 7534: HW/4 Section 34, Township 6 South, Range 24 East
 - CASE 7535: SW/4 Section 17, Township 6 South, Range 25 East
 - CASE 7515: (Continued and Readvertised)

Application of Four Corners Gas Producers Association for designation of a tight formation, San Juan County, Hew Mexico. Applicant, in the above-styled cause, seeks the designation of the Dakota formation underlying all or portions of Townships 26 and 27 North, Ranges 12 and 13 West, Township 26 North, Ranges 13 through 15 West, and Township 30 North, Ranges 14 and 15 West, containing 164,120 acres, more or isse, as a tight formation pursuant to Section 107 of the Matural Gas Policy Act and 18 CFR Section 2.1. 701-705.

ERNEST L. PADILLA ATTORNEY AND COUNSELOR AT LAW

P.O. Box 2523 Santa Fe, New Mexico 87501 (505) 988-7577

March 30, 1982

Mr. Joe D. Ramey Director Oil Conservation Division Post Office Box 2088 Santa Fe, New Mexico 87504

Re: Case Nos. 7521 and 7522

Dear Mr. Ramey:

Enclosed for filing in the above-referenced cases is our SUBSTITUTION OF COUNSEL, the purpose of which is to enter the appearance of Roger L. Copple and myself as attorneys of record in both cases and the withdrawal of the law firm of Atwood, Malone, Mann & Cooter. Thank you for your assistance.

ery truly, yours,

Ernest I. Padilla

ELP:pfm Enclosures

cc: Roger L. Copple, Esq.
Paul Cooter, Esq.

STATE OF NEW MEXICO

DEPARTMENT OF NATIONAL RESOURCES

OIL CONSERVATION DIVISION

IN THE MATTER OF THE APPLICATION OF SANTA FE EXPLORATION CO. FOR AN UNORTHODOX LOCATION, EDDY COUNTY, NEW MEXICO.

CASE NO. 7522

SUBSTITUTION OF COUNSEL

COME NOW Atwood, Malone, Mann & Cooter and withdraw as counsel for the Applicant Santa Fe Exploration Co., and Roger L. Copple and Ernest L. Padilla enter their appearance for it herein.

ATWOOD, MALONE, MANN & COOTER, P.A.

P. O. Drawer 700

Roswell, New Mexico 88201

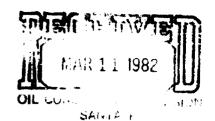
Roger L. Copple

P. O. Box 40 Santa, New Mexico 8750

Z. Padilla

Box 2088

Santa Fe, New Mexico 87501



STATE OF NEW MEXICO

DEPARTMENT OF NATURAL RESOURCES

OIL CONSERVATION DIVISION

IN THE MATTER OF THE APPLICATION OF SANTA FE EXPLORATION CO. FOR AN UNORTHODOX LOCATION, EDDY COUNTY, NEW MEXICO.

CASE NO. 7972

APPLICATION

COMES NOW Santa Fe Exploration Co. and hereby makes application for an unorthodox location for the drilling of a well to test the Permo-Penn, Strawn, Atoka and Morrow formations at a location 660 feet from the north and west lines of Section 14, Township 20 South, Range 25 East, N.M.P.M., Eddy County, New Mexico, and as grounds therefor states:

- 1. The N's of said Section 14 would be dedicated to that well.
- 2. A well at that unorthodox location will better enable Applicant to produce the gas underlying the proration unit, and afford the Applicant the opportunity to produce its just and equitable share of gas in the undesignated pool, prevent economic loss caused by the drilling of unnecessary wells, avoid the augmentation of risk arising from the drilling of an excessive number of wells and otherwise prevent waste and protect correlative rights.

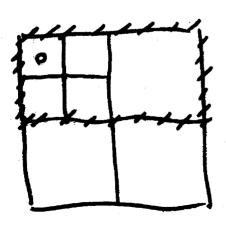
Respectfully submitted,
SANTA FE EXPLORATION CO.

By

for ATWOOD, MALONE, MANN & COOTER

P. O. Drawer 700

Roswell, New Mexico 88201



ORDERS

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. 7522 Order No. R-6933

APPLICATION OF SANTA FE EXPLORATION

CO. FOR AN UNORTHODOX GAS WELL

LOCATION, EDDY COUNTY, NEW MEXICO.

ORDER OF THE DIVISION

BY THE DIVISION:

This cause came on for hearing at 9 a.m. on March 31, 1982, at Santa Fe, New Mexico, before Examiner Daniel S. Nutter.

NOW, on this _____day of April, 1982, 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.
- (3) That the N/2 of said Section 14 is to be dedicated to the well.

- (4) That the applicant reguested said emortholog beatin on the gearned that it will in from its structural position with knopped to the so-called Baife Channel," a known!

 South trending leaven your of higher than usual foresist and schwaahlile transvery he township that section its thereby increasing its thances of obtaining strong commercial production
- (5) That a standard location for a well in the western half of the Who of Section 14 ground be in either the the the staff of NU/4 of Said Section 14.
- (6) That a non-commercial with has been drilled in the 5th of 5zchion !! immedial, to the north, and applicant is recking to move as for as possible to away from said (well, thereby making he NE/4 NW/4 of Section 14 underivable as a fit beating for the proposed well.
- (1) That a high pressure pipe line traverses the Setim 14, and a portion of said line passes in a northeast/southerst direction through the middle of the SE/HW/4 of see the section.

(8) That a standard location for the off I Section 14 in the SE/A NWH of the section would tel, 1980 feet from the north line and 1980 feet from the West line of the E section.

(9) That an location 200 north and 200 feet wint of the aforesaid location, or 1780 feet from the worth line and '180 feet from the wisst line should the provide adequate clearance from the aforement mad high pressure pipe line and would, according to applicant's exhibits, he as geologically detraction in the proposed hunoritodays foration.

(D) That an appear appeared appeared of the hearing and appeared approved appropriate of the heart levels against production from the prepared will, but waird abjection to the unortholog lection described above, i.e., 1780 feet from the horth line and 1780 feet from the horth line and 1780 feet from the hist line of Section 14.

(11) That the applicant should be guten
The Chaice of dricking either of the aformid
locations, the proposed unorthoday location
Goo for from the horth line and 660 feet from

the West line of Section 14, ar 1780 feet from the west line of Section 14.

(12) That in order to protect carrelative right 5 and to Hour the agranting games would be the 660/668 location described above should be plustingly the imposition of a production limitation factor. (13) That a world at said proposed Location is 100 person of the Manderd distance from the worth boundary of the prosent spacing and year of the soil but is at 12 person diver of the western boundary of the seint that

Las gemitted by the Division Reces and Regulations.

(4) That a well at said proposed location & will have an area of draining it thour which extends 66.7 more acreas outside its proration with than a well at a chardard location, being 21 rescent of the a series of the dreat of the dreat of the dreat of the dreat of the dreated the mind on the phonesiste drainage (15) That the production limitation fector should be based upon the variation of the location from a standard Location and the 66.7-acre encrosch-ment described in Finding No. (14) acove, and may best be accomplished by arriging Dhauld be calculated by surraying the worth / South location factor (100 percent) the East/West location factor (33 percent) and the agreege encroachment foctor (79 percent), which

yields a production limitation focker of

(16) That in the absence of any special and and algoritations for the protestioning of production from the subject well, the sportsaid production limitation befor whenel be applied against the wells elility to produce into the peipe line as determined by possible texts.

(1) That in order to avoid premative abandonment and subsequent loss of personada provision should be suade for a leaden wasce minimum elawate for the subject will, and soc,000 chair feet of gas per day is a resonada figure for a minimum. Olloware.

(1) That approval to drill the proposed well at the imorthodop location described in Finding No. (2) above, subject to the Production himitation tactor described in Finding no. (15) above, or in the alternation, to drill at the unorthodop location described in Finding No. (4) above, with mal impair but will protect correlation rights, will not cause waste, and should be given.

IT IS THEREFORE ORDERED:

(1) That the applicant, Fauta Te Exploration
Co., is hereby anthorized to drill a well
to the test the Permo-Penn, Strawa, Atoka
and morrow farmations at a paint
660 feet from the hork line and 660
feet from the liest line of Section 14 Townthip 20 South, Range 25 East, NMPM, Eddy
Chinly how heries, susject 2 Production
Prinitation Factor of 0.71 applicates as
Described below, or in the alternation,
to drill said well at an unorthology
Irestion 1780 feet from the hort line and
1780 feet from the liest line of said Section
14 without renally, in either last to be delicaled to the N/r of said Section 14.

(2) That in the sounce of any Epocal
Ruser and Sequelations providing production from the surgical wird, the
fallowing Special Area and figulating
for a mon-provoked gas assertion
lapply, if the use in thristal at the
lastin first alearised for in Passagraph(1)
ofone:

SPECIAL RULES AND REGULATIONS

FOR THE

APPLICATION OF A "PRODUCTION LIMITATION FACTOR"

TO A NON-PRORATED GAS WELL

APPLICATION OF RULES

RULE 1. These rules shall apply to the Wiking Potroloum,

Co. Morrow

Inc. Abo formation gas well located 62 feet from the South line

and 1994 feet from the Bact line of Section 39, Township 5

Fdd.

South, Range 24 East, NMPM, Chares County, New Mexico, which

0.71

well's Production Limitation Factor of 9.41 shall be applied to
the well's deliverability (as determined by the hereinafter set
forth procedure) to determine its maximum allowable rate of
production.

ALLOWABLE PERIOD

RULE 2. The allowable period for the subject well shall be six months.

RULE 3. The year shall be divided into two allowable periods commencing at 7:00 o'clock a.m. on January 1 and July 1.

DETERMINATION OF DELIVERY CAPACITY

- RULE 4. Immediately upon connection of the well the operator shall determine the open flow capacity of the well in accordance with the Division "Manual for Back-Pressure Testing of Natural Gas Wells" then current, and the well's initial deliverability shall be calculated against average pipeline pressure in the manner described in the last paragraph on Page I-6 of said test manual.
- RULE 5. The well's "subsequent deliverability" shall be determined twice a year, and shall be equal to its highest single day's production during the months of April and May or October and November, whichever is applicable. Said subsequent deliverability, certified by the pipeline, shall be submitted to the appropriate District Office of the Division not later than June 15 and December 15 of each year.
- RULE 6. The Division Director may authorize special deliverability tests to be conducted upon a showing that the well has been worked over or that the subsequent deliverability determined under Rule 5 above is erroneous. Any such special test shall be conducted in accordance with Rule 4 above.
- RULE 7. The operator shall notify the appropriate district office of the Division and all offset operators of the date and time of initial or special deliverability tests in order that the Division or any such operator may at their option witness such tests.

CALCULATION AND ASSIGNMENT OF ALLOWABLES

- RULE 8. The well's allowable shall commence upon the date of connection to a pipeline and when the operator has complied with all appropriate filing requirements of the Rules and Regulations and any special rules and regulations.
- RULE 9. The well's allowable during its first allowable period shall be determined by multiplying its initial deliverability by its production limitation factor.
- RULE 10. The well's allowable during all ensuing allowable periods shall be determined by multiplying its latest subsequent deliverability, as determined under provisions of Rule 5, by its production limitation factor. If the well shall not have been producing for at least 60 days prior to the end of its first allowable period, the allowable for the second allowable period shall be determined in accordance with Rule 9.
- RULE 11. Revision of allowable based upon special well tests shall become effective upon the date of such test provided the results of such test are filed with the Division's district office within 30 days after the date of the test; otherwise the date shall be the date the test report is received in said office.
- RULE 12. Revised allowables based on special well tests shall remain effective until the beginning of the next allowable period.
- RULE 13. In no event shall the well receive an allowable of less than 100,000 cubic feet of gas per day.

BALANCING OF PRODUCTION

- RULE 14. January 1 and July 1 of each year shall be known as the balancing dates.
- RULE 15. If the well has an underproduced status at the end of a six-month allowable period, it shall be allowed to carry such underproduction forward into the next period and may produce such underproduction in addition to its regularly assigned allowable. Any underproduction carried forward into any allowable period which remains unproduced at the end of the period shall be cancelled.
- RULE 16. Production during any one month of an allowable period in excess of the monthly allowable assigned to the well shall be applied against the underproduction carried into the period in determining the amount of allowable, if any, to be cancelled.
- RULE 17. If the well has an overproduced status at the end of a six-month allowable period, it shall be shut in until such overproduction is made up.
- RULE 18. If, during any month, it is discovered that the well is overproduced in an amount exceeding three times its average monthly allowable, it shall be shut in during that month and during each succeeding month until it is overproduced in an amount three times or less its monthly allowable, as determined hereinabove.

RULE 19. Reserved Re-insert Parce 19

RULE 19. The Director of the Division shall have authority to permit the week, if it is subject to shut-in pursuant to Rules 17 and 18 above, to produce up to 500 MCF of gas per month upon proper showing to the Director that complete shut-in would cause undue hardship, provided however, such permission shall be rescinded for the week if it has produced in excess of the monthly rate authorized by the Director.

RULE 20. The Division may allow overproduction to be made up at a lesser rate than permitted under Rules 17 or 18 above upon a showing that the same is necessary to avoid material damage to the well.

GENERAL

RULE 21. Failure to comply with the provisions of this order or the rule's contained herein or the Rules and Regulations of the Division shall result in the cancellation of allowable assigned to the well. No further allowable shall be assigned to the well until all rules and regulations are complied with. The Division shall notify the operator of the well and the purchaser, in writing, of the date of allowable cancellation and the reason therefor.

IT IS FURTHER ORDERED:

- (1) That the Director of the Division shall rescind the application of the production limitation factor and of the special rules contained in this order upon a proper showing that the State Land Office has withdrawn objection to the unorthodox gas well location granted by this order.
- (1) 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

DK NOVO NAT 17, 1982

CASE NO.

7522 DE NOUD

APPlication, Transcripts, Small Exhibits,

ETC.

CASE

7522

2 STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT 3 OIL CONSERVATION DIVISION STATE LAND OFFICE BLDG. SANTA FE, NEW MEXICO 25 June 1982 COMMISSION HEARING 6 7 IN THE MATTER OF: 8 Application of Santa Fe Exploration Co. for an unorthodox gas well location, Eddy County, New Mexico. 10 11 12 13 BEFORE: Commissioner Ramey Commissioner Arnold 14 15 TRANSCRIPT OF HEARING 16 17 APPEARANCES 18 19 For the Oil Conservation W. Perry Pearce, Esq. Division: Legal Counsel to the Division 20 State Land Office Bldg. Santa Fe, New Mexico 87501 21 22 For the Applicant: Ernest L. Padilla, Esq. 23 P. O. Box 2523 Santa Fe, New Mexico 87501 24

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2	APPEARANCES	
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4	For Chama Petroleum: William F. Carr, Esq	
5	CAMPBELL, BYRD, & BI Jefferson Place	
6	Santa Fe, New Mexico	87501
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9		
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Mr. Carr.

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MR. RAMEY: We'll call next Case 7522.

MR. PEARCE: That is the application of Santa Fe Exploration Company for an unorthodox gas well location, Eddy County, New Mexico.

MR. PADILLA: Mr. Chairman, I'm Ernest L. Padilla, Santa Fe, New Mexico, on behalf of the applicant in this case.

I have one witness who has been previously sworn and would request that the record reflect that he was sworn and qualified.

MR. RAMEY: Let the record so reflect. Mr. Carr, do you have an appearance?

MR. CARR: Yes, sir, Mr. Ramey. William F. Carr, with the law firm Campbell, Byrd, and Black, P. A., in Santa Fe, appearing on behalf of Chama Petroleum Company.

I have one witness. I'd like the record to reflect that our witness has been sworn and qualified as an expert witness in petroleum engineering and petroleum geology.

MR. RAMEY: The record will so reflect,

You may proceed, Mr. Padilla.

WILLIAM B. BARNHILL

being called as a witness and being previously sworn upon his oath, testified as follows, to-wit:

DIRECT EXAMINATION

BY MR. PADILLA:

Mr. Barnhill, for the record, would you please state where you reside? Your name and where you reside, I'm sorry.

My name is William Barnhill and I reside A. in Roswell, New Mexico.

> What's the purpose of this case? Q.

A. The purpose of this case is to review an unorthodox location, located in the north half of Section 14, Township 20 South, Range 25 East, Eddy County, New Mexico.

This unorthodox location was filed by Santa Fe Exploration.

What's your connection with Santa Fe Ex-Q. ploration?

I'm just their technical witness for to-A. day.

Mr. Barnhill, would you refer to what has Q. been marked as Exhibit One and identify what it is and what

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Exhibit One is a land plat. Colored in green is the proration unit consisting of the north half of 14, and the unorthodox location of 660 feet from the north and west of Section 14 applied for by Santa Fe Exploration.

The acreage in yellow is Chama Petroleum, who are protesting the unorthodox location.

Q. What's the location of the unorthodox location?

It's 660 feet from the north and west of A. Section 14.

Would you go now to what has been marked Q. Exhibit Number Two and tell us what that is and what it contains?

Exhibit Number Two is an Isopach map, or A. thickness map, of the Morrow sands in question, showing the Boyd Channel as coming through this particular area, and the Isopach values run on 10 feet.

> What is the area colored in red? Q.

That is the same proration unit as colored in green on the land plat.

And what does the red line that t rends Q. or crosses --

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A That red line is a cross section, which is going to be attempting to show that these wells that we do have electric logs on, and all, are along the east bank of a channel, the channel proper being to the west.

Q Going now to what has been marked as Exhibit

Number Three-A and Three-B, would you explain their significance to this case?

A Three-A is a cross section. On the far left is electric log of the Hilliard Well, located in the north half of Section 35. Then this cross section comes down to a newly drilled well, the Santa Fe Exxon State, in the west half of Section 2. Then on the far right it goes through Section 11, which is the Amoco Rio Siete, originally drilled by Antweil, then southwest to the proposed location in 14.

If we might just because of not taking too much time, skip to the log on the far left, the Hilliard Well, I think everybody is reasonably familiar with that, but go down to the Santa Fe Well in Section 2, which we're also familiar with, and compare it to the Amoco Well in Section 11.

You can see that the sand in question in the Amoco Well is broken up and it's one of the poorer wells as far as sand development and the sand in question as far as this Boyd Channel is concerned. We are talking about the

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same reservoir, the same sand. The Amoco took a test in the top portion of this sand in question and they have a shut-in pressure of 3902, which is only 6 pounds different than a well drilled by Chama Petroleum in Section 3. This supplemental log here is the Chama log, located in Section 3, shut-in pressure being 6 pounds different from the Amoco Well, located in 6 and going to Section 11.

The Amoco Well is a very, very poor producer. If you'll notice on the log at 9510 to 14, that is the only part of the Boyd Channel sand in question that they have perforated, and maybe are producing from.

If we go on down to 9636 to 60, I've colored it in in red there and showing the porosity colored in red on the right and the yellow on the left being the sand, that is the sand that I think is the only thing that's probably contributing anything to production of the Amoco Well.

This sand is not even present in the Chama Well. If you'd lay -- put the Chama log on against the Amoco Well, on what we're calling the "C" marker there, possibly a limit of it would be, in the Chama Well, would be about 9600 feet, whereas it's, in the Amoco Well, it's really you might say, kind of a stray sand; however, that sand will correlate with the most furtherest most well, the Hilliard

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Gulf up in Section 35, in the north half of 35, which is that last sand just above the "C" marker colored in green, which would be at 96 -- about 9610 to 25.

That sand is present in the Hilliard Well in 35 and it's the same as the Amoco, what Amoco has completed, but it's a completely different sand than what we're talking about from this Boyd Channel.

So we have a lot of things going on here and this is a very, very production. This lower sands are usually pretty tough to complete in and --

Q Which well are you talking about, Mr. Barnhill? All the wells in general or one specific well?

A These lower sands just don't amount to a great deal, that is -- and as I said, what I think is contributing to the production here of the Amoco Well is this lower section at 9636 to 60, which isn't present, or if so, it's got a remnant present in the Chama Well.

But it is present about three miles north in the Hilliard Well, so that's kind of a stray sand that comes and goes, but we're really talking about this upper sand, this real good upper channel sand that Chama has discovered in Section 3. Amoco doesn't have it. Santa Fe Exploration in Section 2 doesn't have it. Hilliard Oil in Section 35, the sand, we're talking about the same reservoir

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but the -- they won't produce anything due to tightness of porosity and permeability just right there, and the Rio Siete, the cumulative production through 1981 has been 131,000,000. It's producing roughly about, maybe, a million and a half per month, maybe two million a month.

But they're on the -- they're on the east bank of this Boyd Channel, which comes through the middle of Section 10, the middle of Section 15, and the unorthodox location of 14 is 660 from the north and west of 14, and there has been assessed a penalty on that, and I'd like to have the Commission, with the new evidence here of the sequence on the east bank of this channel, to possibly reconsider that penalty.

The Amoco Well in Section 11 has no way whatsoever of getting into this channel that Chama Petroleum has. It's completed out of a much lower sand, and it's very important for this unorthodox -- on this unorthodox location is to drill at this location.

A Santa Fe, no, it's, as of this week, as of yesterday, they were setting up a pulling unit and were going to go in and perforate and acidize. I don't have the

in this proration unit than the one in the earlier case in

23 A. Yeah.

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Q -- your assessment?

A. Yes.

the south half of 35, is that --

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How does this, your Isopach, as depicted Q. on Exhibit Number Two, compare with that that you presented at the March hearing?

It's somewhat similar. The new control, of course, is the Santa Fe Exxon State in Section 2. Amoco Well was there and that was essentially it. The Hilliard Well was there, and of course, the Chama Well was drilled in Section 3, and the only really additional evidence would be on the Santa Fe, showing that low on the east bank, and Amoco down here in 11 is even in a worse position for the geological standpoint. That's completed out of completely different irrelevant sand.

Have you shifted the main sand channel Q. with respect to Section 14 to the west this time around?

Yes, I had to.

Now, you've touched on the production of these wells on the east bank of the channel, and those are depicted in Exhibits Four-A and Four-B, but can you elaborate some more on the potential payout of some of those wells?

The Amoco Well won't pay out in Section A. It's -- it just won't do it. 11.

The Santa Fe Exxon State, located in 2, there's no way that it's going to -- can get into the -- this Boyd Channel to the west, and the Hilliard Well, although

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these pressures and all, I think are all tied into the same, possibly the same reservoir, the permeability and porosity, they just -- they have no deliverability factor, and they just don't -- don't have it.

Amoco, as well, all the way three miles south of Section II, and their main completion, as I've explained on this log, is in a lower sand, which is kind of incidental to the question.

Mr. Barnhill, would your testimony at this in this case be consistent with the earlier testimony in Case 7521, that permeability and porosity are going to differ within the channel as you move eastward outside of the main pay section?

A. Well, definitely. Now going back to Section 11, the Amoco, they just -- they didn't even get the sands except what I've colored in and shown the perforations and everything in a 4-foot stringer there. They just -- they just missed the channel they were so far east of the channel.

And you can get closer to the channel but if you're still in that shaley facies from coming out of the channel onto the bank, you're going -- your effective porosity and permeability is gone; you just don't get any deliverability.

The Amoco well in 11 actually missed the

channel and had to complete out of a lower sand.

Q Mr. Barnhill, going on to what has been marked Exhibit Number Five, tell us what that is and what it

contains.

A Exhibit Five is completion records of the wells of the immediate area and is the well control here, just the immediate area.

Q Mr. Earnhill, do you have anything further to add to your testimony at this time?

A. Not really. The bottom hole pressure data is very similar. It's -- I don't know how to explain it but only have six pounds difference in the Amoco Well from the Chama Well that had a very, very good channel sand.

I don't know how to explain it. We're talking about the same reservoir. The Amoco Well does not have it at all but what little stringers they got indicate the same bottom hole pressures that appeared out of a lower zone that is just a -- irrelevant to this particular conversation because it doesn't pertain to the main channel sand

21 in question.

And we'd have to, on the Santa Fe Exploration's unorthodox location, I feel that they are definitely located on the -- the nearness of an east bank situation and you know, a certain amount of money has been spent. I don't

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believe it would be further recommended that that well be arilled for approximately \$800,000 with the risk factor involved and a large penalty being made to it.

So I'm asking the Commission to reconsider the situation here as far as the penalty.

Q As far as the well being a wildcat, how do you compare that with, say, the Santa Fe Exploration, the Santa Fe Exxon State well?

A. Well, it's considerably more of a wildcat than the Santa Fe Exxon State. Santa Fe Exxon State was drilled after the Chama-Huber Well in Section 3 was drilled, and so -- and we saw how close it was, 660 from the line of - the west line of Section 2, and how far away it actually ended up being, irregardless of what the Chama well showed.

They're going to have a difficult time making a commercial producer out of it and getting their money back, as shown on this log, because it corresponds almost identically to a well a mile north in Section 35, which is the Hilliard Well, which has no capacity to produce.

Santa Fe's going to be in that same position. The Amoco Well is even worse, but they are actually completed in a lower sand and getting back to your question about wildcatting, this is much more of a wildcat than drilling the Exxon State in Section 2, because we did have

2 the Chama Huber Well that was down.

MR. PADILLA: Pass the witness, Mr. Exa-

miner. I mean Mr. Chairman.

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CROSS EXAMINATION

BY MR. RAMEY:

Q Mr. Barnhill, I think what you're saying is if you drilled at a standard location you might -- more apt -- you would be more apt to get a well that would approach the Amoco Well to the north in Section 11.

A That's right.

Q. You would lose -- you would lose channel sand and perhaps pick up your lower section, but that is indicated to be not economically productive.

A. That's true. The upper sand has gotten so shaled out over there in the Amoco location, if you just drill a standard over there, you'd just be getting that much closer to that bank condition, and the lower sand, which is very erratic, even if you had it, it's not going to amount to a great deal.

Q You gave that well 16 feet of pay, I notice, on your Isopach.

A. Yes, I counted everything I could in there.

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Q And if you drill at your non-standard location you, hopefully, will -- will find a well that is more near to the channel conditions than you would at the --

A. Yes, sir.

0 -- standard location.

A standard location would put you further away from trying to get into a channel situation. This unorthodox location would be -- is far superior trying to get in a sand development, but you'll notice on the Isopach map, it's right on strike north to south.

The Santa Fe, this unorthodox location in 14 is absolutely due south of the Santa Fe Exxon State in 2, which is not going to make it, and it's right on strike with the Hilliard Gulf in 35, another mile north, it's not going to make it and never will make it. It can't, and will not due to its rough characteristics drain this sand to the west.

Santa Fe's got the same problem and the Santa Fe, unorthodox Santa Fe location in 14 is on a straight line north/south alignment.

Thank you, Mr. Barnhill.

MR. RAMEY: Any other questions of Mr.

Barnhill at this time?

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2		CROSS EXAMINATION
3	BY MR. CARR:	·
4	Q	Mr. Barnhill, what's the status of the
5	lease in 14? Do	you have any problems with it expiring at
6	this point in tim	e?
7	A.	No.
8	Q.	What is the
9	A.	Not as long as operations are maintained.
10	Q	What is the depth of the well on that leas
11	right now?	
12	A.	It's right, don't hold me to this, but it'
13	right around 200	feet.
14	Ĉ.	When did you move the spudder onto this
15	location?	
16	A.	Let's see. Chama leased that lease, you
17	see, and we moved	l in, let me find it here, I guess that's
18	February '82. Ch	nama Petroleum top leased that fee lease in
19	there. That loca	ation was drilled and spudded prior to, I
20	guess it's Februa	ary of '82. Is that a "2" on there?
21		MR. PADILLA: 2-21-82, it says.
22	A.	I think it's February of '82.
23		And that was spudded and continuous oper-

ations have gone on since then. There again, the operator

of that electric (sic) clarified a point of what kind of an

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economic climate he's in drilling on this, what has been presented and shown as pretty edgey stuff on the east bank.

Now if I could direct your attention to your Isopach. How would you characterize the control data that's available to you in constructing the Isopach around Section 14?

A. 14?

Q Yes, sir.

Well, the closest well and the only well to 14 is the Amoco Well in 11.

And would you -- how would you characterize generally the control available for constructing this?

A. Well, going to the south we have some control down in Sections 23 and 26 and then we go up north, we'd go into 3 and 34 and 35, Section 2.

Q Isn't it true that the control really for Section 14 is fairly poor?

A. You bet.

Q And this is a -- all you can do is make your best guess at it.

A. Well, we know that Amoco missed it, the channel, actually, the channel sands except for just a little, thin stringers completed in the lower sand, which is irrelavant to the problem. So you know you can't go that way.

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You've got to go west and with this alignment of this -- with the additional data of the Santa Fe Well in Section 2, the Exxon State, you can -- there's a due north/south alignment, and it is very, very possible that they're going to be on the east bank, but a considerable amount of money has been spent in there. The operator needs to know about the economic climate that's going to prevail.

A No, I don't. These things -- these things are so funny. You can get so close but so far away. As I was trying to point out to you, going back to Section 2, the Santa Fe Exxon State, it's a 660 from the west line. No question it's a standard location the way it was set; close as you can get to the Chama-Huber, but it's in a different

In your opinion would it be possible to

Amoco missed it completely except for these little stringers, thin little stringers.

world. It's a different world. There's no way you could

compare it to this. It's on the bank.

Now if you were at a standard location, how far would you be == have to drill from the west line of Section 14?

A Standard would be, well, you could drill it

1980 - 1980.

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2	Q	So you're advancing 1320 feet from the
3	standard location.	Is that correct?
4	A.	Yes, that's correct.
5	Q	Now, if you look at your cross section
6	and look for a mom	ent at the Amoco, or the Rio Siete Well,
7	was it your testim	ony that most of the production in that
8	well is coming fro	m the lower Morrow sands?
9	A.	I think so.
10	Q.	And is that a different sand body from
11	the Boyd Channel?	
12	A.	Oh, absolutely, yes.
13	Q.	Does this sand produce in any other well
14	in the area?	
15	A.	I've seen it produce. Now, if you look
16	at the cross secti	on and go back to the Hilliard Well up,
17	located in Section	35, you'll notice a lower drill stem test
18	at 9561 to 9633.	That did cover that sand that Amoco is
19	completed in. It'	s stray. It sort of comes and goes, and
20	that's why the pro	duction is extremely poor because it's not
21	a continuous body.	You cannot find that sand in the Chama -
22	Chama Well. You c	an not find it in the Santa Fe Well. It's
23	just gone.	
	I .	

Will you --

Just a little lenticular something down

there, little leds, that is not consistent.

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a Does Santa Fe propose to drill to a depth sufficient to test that zone?

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Santa Fe, and anyone out there drilling, should drill to the top of the Mississippian because of these stray sands.

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Do you have any idea as to the extent of this sand body in the immediate area?

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It's very difficult to correlate, not to correlate, but the Amoco Well has it in 11; you go to Section 2, Santa Fe, you can look right here on this log, which is from -- it's from right to left, colored in on the Amoco Well with a yellow and a red. Coming right across on the top of the Morrow it's all shale and yet Santa Fe Exxon State. Then you go another mile north to 35, that sand is present

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in the Hilliard Well.

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So that's how erratic it is. It would not be a primary target, but that's why most people, and I would highly recommend to any operator, to go to the Mississippian, because you can get these strays and it may not be a complete disaster.

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A lot of people have not gone to the Mississippian and you don't know what's in that last 3 or 400 feet.

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2	MR. CARR: I have no further questions.
3	MR. RAMEY: Any other questions of Mr.
4	Barnhill? He may be excused.
5	Anything further at this time, Mr. Padilla?
6	MR. PADILLA: Nothing further. I offer
7	Exhibits One through Five.
8	MR. RAMEY: Exhibits One through Five, in-
9	cluding Three-A and Three-B and Four-A and Four-B, will be
10	admitted.
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12	JAMES H. MONTGOMERY
13	being called as a witness and being previously sworn upon his
14	oath, testified as follows, to-wit:
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16	DIRECT EXAMINATION
17	BY MR. CARR:
18	Q. Will you state your name, please?
19	A. James H. Montgomery.
20	Q Mr. Montgomery, did you testify in the pre-
21	vious case?
22	A. Yes, sir, I did.
23	Q. And your qualifications as an expert wit-
24	ness were accepted at that time?
25	A. Yes, sir.

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this and explain what it shows?

A Yes, sir. Again, this is a land plat showing the acreage that Chama owns in the area; it's shown cross hatched.

It outlines the proration unit in the north half of Section 14 and shows the standard location and the proposed unorthodox location.

A How much of an advantage in terms of feet is Santa Fe seeking to obtain by approval of this unorthodox location?

A. 1320 feet.

Q Now I'd like to direct your attention for a moment to the north half of Section 15.

A. Yes, sir.

Q And ask you if you could advise the Commission as to Chama's plans for development of this property.

A They plan to drill wells in 15 and in 10 along the line of development coming from both north and south from the Chama-Huber Well in Section 3. It will probably be spread, you know, one well at a time.

Q How soon would you anticipate they would be developing the north half of Section 15?

Oh, within a year, probably.

What acreage would be dedicated to that

2 | well?

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3 A It would be the north half of Section 15,
4 yes.

Q And that would coincide with Chama's ownership position, is that right?

A. Yes, sir, uh-huh.

O. Do you have any idea at this time, Mr.

Montgomery, as to where that well would be located in the north
half of 15?

A. Well, we'd prefer to locate it at a standard location, which would be 660 from the north and 1980 from the east.

Q Structurally, or in terms of -- from a geologic point of view would that be a desireable place to locate the well?

A. Yes, sir, it would be in what we think would be the thick part of the sand.

Q Will you now refer to what has been marked as Chama Exhibit Number Two and review this, please?

A. Yes, sir, again this is a topographic map just showing that there is no topographic reason why the standard location couldn't have been drilled. I do understand that there is a pipeline that runs under the standard location, but by moving 150 feet you'd be off of it.

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Now I believe there's been testimony offered today that structure is not significant in drilling a Morrow well.

A. That's true, yeah.

Q. And what are you looking for when you drill in this area?

A. Looking for thick, productive sand, in the Morrow.

Q And a standard location in the north half of 15, I believe you testified, would, in your opinion, place you over the thick part of the sand?

A. Yes, sir, I think so.

Q I'd like you now to refer to what's been marked Chama's Exhibit Number Three, identify this, and identify this for the Commission.

A. This is an Isopach prepared by Mr. Barn-hill last -- last year. This is his version of the sand channel at that time.

Essentially, it's unchanged. As I say, the Chama-Huber Well has been drilled in the south half of 3. We don't get any 60 foot thickness in the middle. He shows the Amoco Rio State Well to have 25 feet. The Santa Fe Well in Section 2 had not been drilled. He shows it thicker than it was, but still essentially it fits.

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2		The Hilliard Gulf Well, the Santa Fe Well,
3	and the Amoco Well,	, all lie on the east side of the channel.
4		The King Resources Well and the Mark Olsen
5	Well lie on the wes	st side of the channel.
6	Ō.	Was there any data acquired from the Santa
7.	Fe Well in Section	2 that substantially changes the interpre-
8	tation?	
9	A.	Not substantially; it's a little thinner,
10	but it did not char	nge my interpretation.
11	õ	Did you review the data that was available
12	to you from this I	sopach and construct an Isopach of your own
13	,A.	Yes, sir, I did.
14	Q.	And is that what has been marked for ident
15	ification as Exhib	it Number Four?
16	A.	Yes, sir.
17	Q.	Will you please refer to that and explain
18	what it shows?	
19	A.	Again, I show the Amoco Rio State with 22
20	feet of pay. It s	hows the proposed location drilled at the
21	standard location	would have, let's see, it would have about
22	28 feet of pay. T	he unorthodox location would have over 40
23	feet of pay.	
24	Q	Now obviously, the two Isopachs that have

been presented today vary.

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A Yes, sir.

Do you believe there is sufficient control in the area on which you can make a conclusive, fairly conclusive determination, as to the characteristics of the channel in this area?

A Oh, I think that mine is as valid as Mr. Barnhill's. There is a lack of control in the area; there's no doubt about that.

Q With further development, would -- is it possible that the -- your mapping of this channel could be changed dramatically in this area?

A Yes, it could. So far it hasn't, however.

Q In making this interpretation you took into consideration the data available from the Antweil Well, Amoco Well?

A. Yes, sir.

Q In this area could you explain to the Commission how you would anticipate what the drainage pattern would be from wells drilled either at the standard location or unorthodox location?

A I think that the -- any well drilled in 14 is going to drain from Section 15, because I think that's where the thickest part of the sand is. I think it will also drain from Section 10 and it may drain from the southwest quarter

of Section 11.

3

Q Will you now refer to your Exhibit Number
Five, identify this and explain what it shows?

5

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A Yes, sir. Again, this is a blown-up version

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of the previous exhibit.

7

Q That would be your Isopach?

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A. Yeah, of my Isopach, showing with the tracts numbers, Tract D, Tract F, Tract G, and Tract H, plani-

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meter studies of each tract are included with this exhibit.

Based on this, I took the north half of

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Section 14 and the north half of Section 15, the two proration

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units involved. The north half of Section 14 would have 29

13 14

percent of the acre feet. The north half of 16 -- 15 would

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have 71 percent of the acre feet.

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By changing it and taking the southwest

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quarter of 11, the no threst quarter of 14, the northeast quarter of 15, and the southeast or 10, 43 percent of the

18 19

ac e feet would lie within Section 11 and 14, and 57 percent

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would lie in Section 10 and 15.

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Are you prepared to make a recommendation to the Commission as to a penalty which should be imposed on

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the proposed Santa Fe Well?

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23

A. We feel a 63 percent penalty should be

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applied.

1		31
2	Q.	And what should this penalty be applied
3	against?	
4	A.	Against their semi-annual deliverability
5	test.	
6	Q.	In your opinion will penalizing the semi-
7	annual deliverabil	ity be an effective penalty?
8	A.	It depends on the type of well they make.
9	If they make a ver	ry good well, then, as I say, many operators
10	will under produce	e it at 50 percent of its deliverability,
11	the penalty is:	n't very much then, but we think it will be
12	fair.	
13	Q.	And what was the percentage penalty again?
14	A.	63 percent.
15	Q.	Now, Mr. Montgomery, in your opinion could
16	Chama protect its	elf by drilling a well in the north half of
17	Section 15 offset	ting the proposed unorthodox location?
18	A	We would prefer not to. We could we
19	could drill there	. It probably would protect us but it would
20	cause us to drill	other wells on a different pattern to get
21	the gas under tha	t 320 acres.
22	ð	Where would you have to drill in the north
23	half of 15 if the	proposed unorthodox location is approved?
24	A.	If we had to drill two wells there, we'd
25	have to drill, to	oppose them we'd have to drill 660 out of

32 2 the corner of 15. Then we'd probably have to drill one in 3 the northwest quarter of 15 to get the reserves over there. And the same thing applies to the south 5 half of 10, they're going to be draining out of that corner, too. In your opinion would a well in the northwest quarter of 15 be a necessary well? No, sir, it would not be necessary at all 10 if we could drill one at a standard location in there, we'd 11 drain the whole 320. 12 In your opinion would granting this appli-Q. 13 cation without imposing an effective penalty on the production 14 from the proposed well, if this is approved without the pen-15 alty, would that afford Chama an opportunity to produce its 16 just and fair share of the reserves from this -- their tract 17 without waste? 18 No, sir, it would not. 19 Absent a meaningful penalty, would Chama's a 20 correlative rights be protected? 21 With the penalty they would be protected. A. 22 Were Exhibits One through Five prepared a 23 by you or under your direction? 24 Yes, sir, they were. A. 25 Can you testify as to their accuracy?

Q.

1	33
2	MR. CARR: At this time, Mr. Ramey, we
3	would offer into evidence Chama's Exhibits One through Five.
4	MR. RAMEY: Chama's Exhibits One through
5	Five will be admitted.
6	MR. CARR: That concludes our direct exa-
7	mination of this witness.
8	MR. RAMEY: Any questions of Mr. Montgomery
9	Mr. Padilla.
19	
11	CROSS EXAMINATION
12	BY MR. PADILLA:
13	Q. Mr. Montgomery, again, your Exhibit, this
14	time Exhibit Number Five, that assumes a homogeneous reservoi
15	doesn't it?
16	A. Yes, sir. That's the only fair and equit-
17	able way I could find to do it to try to draw all exhibits
18	the same.
19	Q And again, with respect to drilling the
20	well in Section 15, both your geology and Mr. Barnhill's
21	geology would indicate to drill a well at a standard location
22	A. In 15? Yeah, we'd prefer to do that,
23	right.
24	Q. Assuming a standup location in Section 14
25	for the west half, dedicating the west half to a well there,

1980 from the north, right.

25

1		35
2	Ď	So a 660 location would be an unorthodox
3	location also?	
4	A.	Yes.
5		MR. CARR: I have nothing further.
6		MR. RAMEY: Any other questions of Mr.
7	Montgomery? He ma	y be excused.
8		Do you have anything further, Mr. Carr?
9	٥	MR. CARR: I have a statement.
10		MR. RAMEY: You may proceed.
11		MR. PADILLA: No. Mr Mr. Chairman,
12	could I recall Mr.	Barnhill just briefly?
13		MR. RAMEY: Yes.
14		
15		WILLIAM B. BARNHILL
16	being recalled, an	d being still under oath, testified as
17	follows, to-wit:	
18		
19	·	REDIRECT EXAMINATION
20	BY MR. PADILLA:	
21	Q.	Mr. BArnhill, I show you what has been
22	introduced as Exhi	bit Number Three by Chama Petroleum. Would
23	you tell us whether	er that is your work and for what purpose
24 .	you may have prepa	red that?
25	A.	Yes, this is my work. This was prepared

quite some time back, prior to the drilling of the Chama No. 1 Huber in Section 3, or the Santa Fe Exxon State in Section 2, as a rank geological prospect, searching out this Boyd Channel. This is the way I presented it. You have to have a little optimism on these things. You will notice a figure for the Amoco Well in Section 11 was giving an Isopach value of 25. That might have been slightly exaggerated to make it look like a better prospect, and actually what it has is 16, as I presented here today, and showing that the shales and the sands have shingled out going to the east.

On this promotional map that I originally prepared before even the Chama Well was drilled, where the Exxon, Santa Fe Exxon State was drilled in Section 2, it should have encountered 40 feet of sand.

So this map, although it shows the -- the thickest slope coming right on down, and with the additional evidence that we have by the drilling of Section 2 that this is a sharp embankment, or a bank here, and the channel is west. You've got to disregard it type of promotional map. This was presented to get the Chama Well drilled in Section 3 and it came in quite close. With additional information and reviewing all the data, the Amoco Well and the Santa Fe Well in Section 2 and the Amoco Well in 11 are definitely on the east bank. They're right on strike with a well in 35 that's

man.

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on the east bank, and you somewhat have to disregard this promotional map and go to the factual map.

MR. PADILLA: That's all we have, Mr. Chair-

MR. RAMEY: Mr. Carr?

RECROSS EXAMINATION

BY MR. CARR:

Q Mr. Barnhill, when you prepared the Exhibit
Number Three, that represented your best effort at interpreting
the data available to you at that time, did it not?

A Yes, that is true.

And when you refer to the other map as the factual map, you did testify that there's very poor control in the area around 14, did you not?

A. That's true.

MR. CARR: I have no further questions.

MR. RAMEY: Any other questions of Mr.

Barnhill? He may be excused.

You may give your statement, Mr. Carr.

MR. CARR: May it please the Commission, in this case Santa Fe Exploration is seeking to drill a well at an unorthodox location by moving 320 feet closer to the property owned and operated by Chama Petroleum Company

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than would be permitted under the Commission's rules and regulations.

Here again we have a situation where the Commission rules are designed to protect operators from drainage that isn't offset by counter-drainage.

We have a situation here today where the standard rules are probably more important than in the preceding case because both witnesses admit the data is very poor. We don't know where this channel lies and we won't know exactly what the well's going to do or whether it is going to be in the best part of the channel or on the east bank until the well is actually drilled. For that reason it is extremely important that a penalty be imposed on this well to offset the advantage that is being gained by the -- by virtue of the fact that it is being moved two-thirds closer to the end of its proration unit than it would be entitled to under the Commission's rules and regulations.

I think it's important to note that traditionally you have employed radius of drainage approach in assessing a penalty. When you employ that tool, you assume a homogeneous reservoir, and we have provided you with data based on an assumption of a homogeneous reservoir that will enable you to impose a penalty.

You generally operate under a straight

2 acreage approach to these matters, but I think it's important 3 to note that you are permitted to do that only when no better evidence is available, and today we have submitted to you better evidence that will enable you to make a more accurate

determination.

We have a situation here where the proposed well may not be a very good well. The fact of the matter is just because it may not be a very good well, we submit there is no reason that the well should be paid for with reserves that are drained from offsetting properties.

MR. RAMEY: Thank you, Mr. Carr. You need to correct your statement. You said that they want to move 320 feet and that --

MR. CARR: 1320, that should be 1320.

MR. RAMEY: -- should be 1320, should it

not?

MR. CARR: That's right, Mr. Ramey.

MR. RAMEY: Mr. Padilla.

MR. PADILLA: Mr. Chairman, Mr. Arnold, I think we have the same situation; at least we're asking in this case to eliminate the penalty entirely because of the conditions that the operator faces in this proration more so in this case than in the previous case.

Because of the nature of well control, no

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well control, it's worse. We don't know that there's any kind of drainage or whether there will even be drainage to the lands lying to the west of the proposed location.

I think that we have presented testimony based upon what -- on the Santa Fe Exxon Well, which is on strike with the proposed location, and given that assumption, we think that based upon permeability and porosity we're not going to drain the lands lying to the west.

In fact, again, we're only trying to make a commercial well.

As far as precedent set in northeast New Mexico in the Morrow formation, we can go to the files of the Oil Conservation Division and find a great number of unorthodox locations because of the nature of the Morrow formation, and with no penalty assessed. I think that the Commission and the Division have recognized in those instances that that is a situation with the Morrow formation.

The geology, as buttressed by the Santa

Fe Exxon Well seems to indicate that a well drilled in Section

10, the ideal location for a well drilled in Section 10 would

be at a standard location. Again, the Chama lands seem to

be favorably situated as far as drilling good wells are con
cerned.

Again, we think that only -- our major con

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cern is making a commercial well out of this location, and I don't think, based upon the evidence that we've shown that we would be adversely impairing the correlative rights of the lands lying west and northwest of the proposed location.

Thank you.

MR. RAMEY: Thank you, Mr. Padilla. I think you need to be corrected. You said northeast New Mexico. I think that's southeast New Mexico.

MR. PADILLA: Correct. I've been doing a lot of work in northeast New Mexico.

MR. RAMEY: Does anyone have anything further to offer in Case 7522?

If not, we'll take the case under advisement and the hearing is adjourned.

(Hearing concluded.)

I, SALLY W. BOYD, C.S.R., DO HEREBY CERTIFY that the foregoing Transcript of Hearing before the Oil Conservation Division was reported by me; that the said transcript is a full, true, and correct record of the hearing, prepared by me to the best of my ability.

July W. Boyd CSR

MALL . HOYD, G.S. (), 1 am 1958 Senti Fe, Nev Mexico 8790 Prione (365) 455-7409

BEFORE THE NEW MEXICO OIL CONSERVATION COMMISSION Santa Fe, New Mexico June 2, 1982

COMMISSION HEARING

IN THE MATTER OF:

Application of Santa Fe Exploration Co. for an unorthodox gas well location, Eddy County, New Mexico.

CASE 7522 (DE NOVO)

BEFORE:

Joe D. Ramey, Director

TRANSCRIPT OF HEARING

APPEARANCES

For the New Mexico Oil Conservation Commission:

W. Perry Pearce Legal Counsel for the Commission State Land Office Building Santa Fe, New Mexico MR. RAMEY: Call Case 7522.

MR. PEARCE: Case 7522, application of Santa Fe Exploration Co.

for an unorthodox gas well location, Eddy County, New Mexico.

Lt is requested that this case be continued to June 22, 1982.

MR. RAMEY: The case is hereby continued to June 22, 1982.

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2	STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT
3	OIL CONSERVATION DIVISION STATE LAND OFFICE BLDG.
5	SANTA FE, NEW MEXICO 17 May 1982
6	COMMISSION HEARING
7	IN THE MATTER OF:
8	Application of Santa Fe Exploration CASE Co. for an unorthodox gas well loca- 7522 tion, Eddy County, New Mexico.
10	cron, Eddy Councy, New Mexico.
11	
12	•
13 14	BLFORE: Commissioner Ramey Commissioner Arnold
15	TRANSCRIPT OF HEARING
16 17	APPEARANCES
18	
19	For the Oil Conservation W. Perry Pearce, Esq. Division: Legal Counsel to the Division
20 21	State Land Office Bldg. Santa Fe, New Mexico 87501
22	
23	For the Applicant:
24	
35	

CERTIFICATE

I, SALLY W. BOYD, C.S.R., DO HEREBY CERTIFY that the foregoing Transcript of Hearing before the Oil Conservation Division was reported by me; that the said transcript is a full, true, and correct record of the hearing, prepared by me to the best of my ability.

My W. Boyd CSR

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12

CERTIFICATE

I, SALLY W. BOYD, C.S.R., DO HEREBY CERTIFY that the foregoing Transcript of Hearing before the Oil Conservation Division was reported by mc; that the said transcript is a full, true, and correct record of the hearing, prepared by me to the best of my ability.

They W. Boyd CSE

ALL. . BOYD, C.S.R. 18.1 Em 17.0 Em 17

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STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT OIL CONSERVATION DIVISION

auly 2, 1982

POST OFFICE BOX 2000 STATE LAND OFFICE BUILDING SANTA FE, NEW MEXICO STOD SOOR SET-34534

Mr. Ernest L. Padilla Attorney at Law P. O. Box 2523 Santa Fe, New Mexico 875	Re:	CASE NO. 7522 ORDER NO. R-6933-A
		Applicant:
	•	Santa Fe Exploration Co.
Dear Sir:		
Enclosed herewith are two Commission order recently		
JOE D. RAMEY Director		
• · · · · · · · · · · · · · · · · · · ·		
JDR/fd	·	
Copy of order also sent t	:0:	
Hobbs OCC X Artesia OCC X Aztec OCC		· ·
Other William F. Carr	· · · · · · · · · · · · · · · · · · ·	

STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT OIL CONSERVATION DIVISION

IN THE MATTER OF THE HEARING CALLED BY THE OIL CONSERVATION COMMISSION OF NEW MEXICO FOR THE PURPOSE OF CONSIDERING:

CASE NO. 7522 DE NOVO Order No. R-6933-A

APPLICATION OF SANTA FE EXPLORATION CO. FOR AN UNORTHODOX GAS WELL LOCATION, EDDY COUNTY, NEW MEXICO.

ORDER OF THE COMMISSION

BY THE COMMISSION:

This cause came on for hearing at 9 a.m. on June 25, 1982, at Santa Fe, New Mexico, before the Oil Conservation Commission of New Mexico, hereinafter referred to as the "Commission."

NOW, on this <u>sath</u> day of June, 1982, the Commission, a quorum being present, having considered the testimony presented and the 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 the applicant, Santa Fe Exploration Co., seeks approval of an unorthodox gas well location 660 feet from the North line and 660 feet from the West line of Section 14, Township 20 South, Range 25 East, NMPM, to test the Permo Penn, Strawn, Atoka and Morrow formations, Eddy County, New Mexico.
- (3) That the matter came on for hearing at 9 a.m. on March 31, 1982, at Santa Fe, New Mexico, before Examiner Daniel S. Nutter and, pursuant to this hearing, Order No. R-6933 was issued on April 5, 1982, which granted, with restrictions, Santa Fe's application.
- (4) That on April 7, 1982, application for Hearing De Novo was made by Chama Petroleum Company and the matter was set for hearing before the Commission.

-2-Case No. 7522 <u>De Novo</u> Order No. R-6933-A

- (5) That the matter came on for hearing de novo on June 25, 1982.
- (6) That the evidence adduced at said hearing indicates that Findings (7), (8), and (9) in Division Order No. R-6933 entered April 5, 1982, should be deleted.
- (7) That Findings (10), (11), and (18) of said Order No. R-6933 should be changed to read in their entirety as follows:
 - "(10) That an offset operator appeared at the hearing and opposed approval of the proposed unorthodox location without assessment of a penalty against production from the proposed well.
 - (11) That approval of the unorthodox location will improve applicant's geological prospect for encountering the Morrow formation in a thickened section of the Boyd Channel and will better enable it to produce the gas underlying the N/2 of the aforesaid Section 14.
 - (18) That approval 20 drill the proposed well at the unorthodox location described in Finding No. (2) above, subject to the Production Limitation Factor described in Finding No. (15) above, will not impair but will protect correlative rights, will not cause waste, and should be given."
 - (A) That Orders (1) and (2) of said Order No. R-6933 should be changed to read in their entirety as follows:
 - "(1) That the applicant, Santa Fe Exploration Co., is hereby authorized to drill a well to test the Permo Penn, Strawn, Atoka and Morrow formations at a point 660 feet from the North line and 660 feet from the West line of Section 14, Township 20 South, Range 25 East, NMPM, Eddy County, New Mexico, subject to a Production Limitation Factor of 0.71 applicable as described below, the N/2 of said Section 14 to be dedicated to said well.
 - (2) That in the absence of any Special Rules and Regulations prorating production from the subject well, the following Special Rules and Regulations for a non-prorated gas well shall apply:"
- (9) That the remainder of Division Order No. R-6933 should be affirmed.

-3-Case No. 7522 <u>De Novo</u> Ordar No. R-6933-A

IT IS THEREFORE ORDERED

- (1) That findings (7), (8), and (9) in Division Order No. R-6933 entered April 5, 1982, are hereby deleted.
- (2) That Findings (10), (11), and (18) in said Order No. R-6933 are changed to read in their untirety as follows:
 - "(10) That an offset operator appeared at the hearing and opposed approval of the proposed unorthodox location without assessment of a penalty against production from the proposed well.
 - (11) That approval of the unorthodox location will improve applicant's geological prospect for encountering the Morrow formation in a thickened section of the Boyd Channel and will better enable it to produce the gas underlying the N/2 of the aforesaid Section 14.
 - (18) That approval to drill the proposed well at the unorthodox location described in Finding No. (2) above, subject to the Production Limitation Factor, described in Finding No. (15) above, will not impair but will protect correlative rights, will not cause waste, and should be given."
- (3) That Orders (1) and (2) in said Order No. R-6933 are changed to read in their entirety as follows:
 - "(1) That the applicant, Santa Fe Exploration Co., is hereby authorized to drill a well to test the Permo Penn, Strawn, Atoka and Morrow formations at a point 660 feet from the North line and 660 feet from the West line of Section 14, Township 20 South, Range 25 East, NMPM, Eddy County, New Mexico, subject to a Production Limitation Factor of 0.71 applicable as described below, the N/2 of said Section 14 to be dedicated to the well.
 - (2) That in the absence of any Special Rules and Regulations prorating production from the subject well, the following Special Rules and Regulations for a non-prorated gas well shall apply:"
- (4) That the remainder of said Order No. R-6933 is affirmed.

-4-Case No. 7522 <u>De Novo</u> Order No. R-6933-A

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

DONE at Santa Fe, New Mexico, on the day and year herein-above designated.

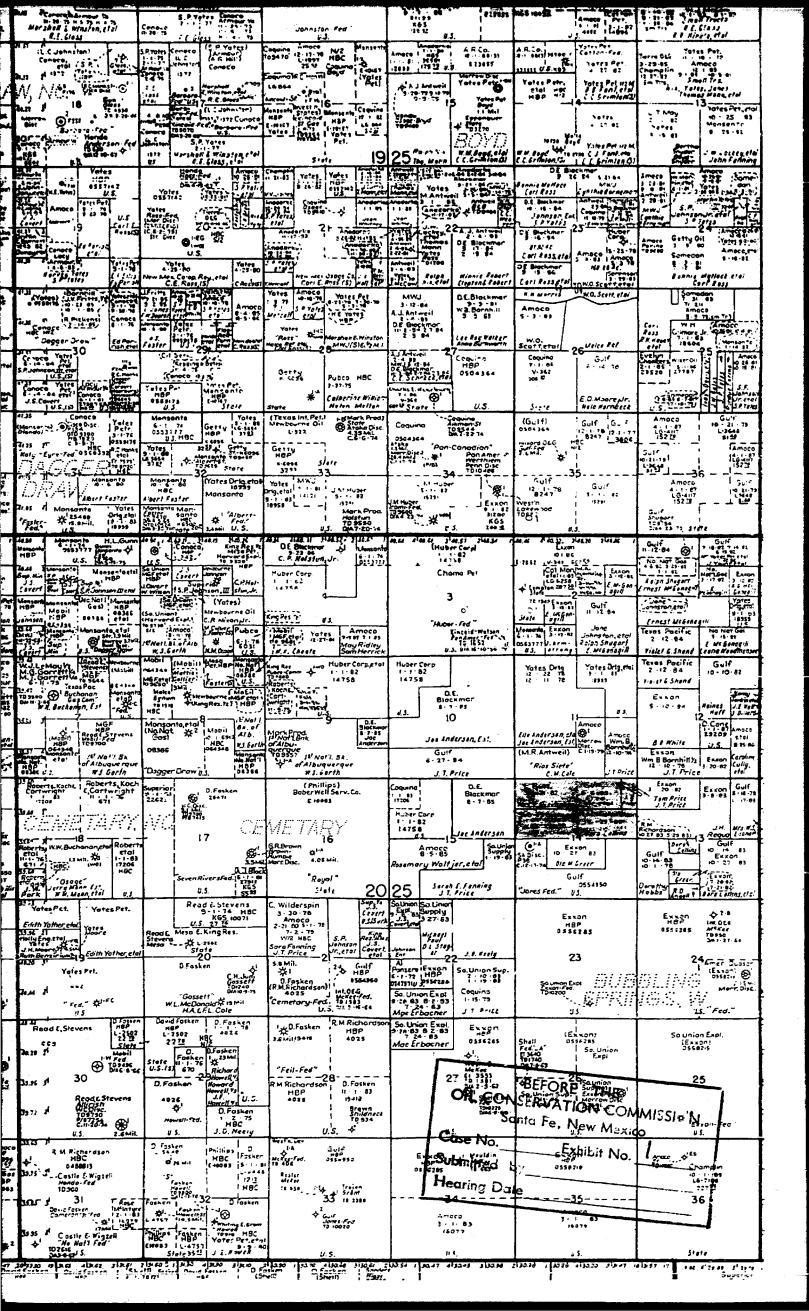
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STATE OF NEW MEXICO OIL CONSERVATION COMMISSION

EMERY Q. ARNOLD, Chairman

ALEX J. ARHIJO Member

JOE D. RAMEY, Member & Secretary



PRODUCTION THRU 1981

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102020\$25E GAS 01L HCWELL 29 162920525E GAS 01L	11450	11463	11740	76 14		8200	17017	2796 10	11904				57470 2 6	1895465 2150
MOPELL SA LEDEKAL		2603		10999	11845			12578		11867	8784	11336	133553	3365904
HEWELL ST COM 1L3220525E GAS OIL	3360		26.89	2093	3275	3320	3063	9506	10479	5475	4933	4885	55701	355210
ADSS FEDERAL COM IS 421524E GAS	8267	9266	9444	5355	00e7	10657	8937	6067	7955	4631	#858	esor	107745	**1933
15 421524E GAS 01L 2M 421524E GAS 01L	54991 70 153748 284 27403 72	48475 69 121709	39651 130071	50293 177 109884	51305 117028 232	47201 73 120290	53941 49 116172	100765	49652 96962	47401 80 91881	48287 73 85662	43096 49 82785	583060 798 1331779	10641255 21386 3532535
3E 421524E GAS	27403	121709 215 21455 55	1300 71 243 174 92	109884	14243	120296 258 10955 21	116172 231 15789 25	14779	12759	187C5 28	73 85662 140 17587	12772	1321779 2505 198056	353753 6531 88946
SHELL FEDERAL CON 13 521524E GAS	21342	14385	1392	1893	1974	!10Z	7561	12 926	1792	1170	26 1419	2756	414 54670	2209 7977917
56 521524F 645	1947	3023	2174	3482	5934	11678	11778	21432	24496	24065	21295	19414	150718 150718	1667 25137
STATE 32 COM GIL 103220525E GAS 01L	5943	6162	5974	4192	41.85	5585	5277	62 18	794i	23 6838	5661	5798	135 73614	15.76344 15.7634
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LE AZOSZSE GAS	5017	7467	7783	4648	963	2393	15407	12105	14742	4545	5162	12303	101416	1697006
S P JCHASON OFF	199	234	340	76	215	347	1796	1653	658	475		435	6526	452088 291

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PELCO PETROLEUM CO	RPORATIO	GA	•	******	******	******	******	******	******					
FEOERAL RY 18 1E1922323E GAS FEOERAL RY 18		ASANOGNE		5064	4296	4775	5658	5113	3210	6722	5561	4245	422 <u>0 j</u>	44
MAT	**************************************	#4	111	75	13	123	133	1 5 6	¥	155	150	145	1447	422
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	J. C. R? LAST	PROD. DA	TE 02/74	r									s	1 04
ELXON DEPOSETT AMO 2723195246 GAS SECURITY FUEL HOLEN		FROD. GA	TE 02/78		******		******	******	******				s	1 84

Ex 46

Petroleum Informations

Date: 3-7-79

Cord No.: 16 cm

OIL CONCLE	POPE THE VATION COMMISSION For New Mexico
Cate No.	Exhibit NoJ
Submined b.	
Hearing Date_	

500 R.M. 1500m 60 2223-58 FIDDY WILDCAT ... 3536DF . com Westorn Drlg. Co. - Fl - Lakewood co: 1830 FEL & 660 FEL Sac. 24, T.19-S. - 45-Gryb. 10 5 - 817-500 10-31-57 --- 4-9-58 P&A

505

0 -

SI; P. 1 BO ~ 5 BXW/4 hrs. THE OLD SERVICE DESCRIPTION OF THE SERVICE OF THE S Pinasson Color Propins and Color Col tor orl 北里/2-3631年250 35731CFG/16 inves, ill/31/ file 100 - - 300 into क्षेत्रकाम वर्ष्या १०३१ । १०४४-६६/

EDDY, N.M. 34-19-25
Pan American - #1 - A. L. Werthiem.

CONTRACT THE BY

49 BAW & 134 BLW/53 hrs. & swb. dry w/sli. blow # gas, TSTM; blow down well; SITr 2950# to 1500#, 20/64" ah. 30" blew to 200# 45.64" ch. next 30" 20/64 6n. 30 blew to 200% 45.04 6n. most 30 end of blow down had attacky blow of gas.

30,000 SWF (10,500' sd) swb. 200 BLW/14 hrs. F. & rate 540 MCFGPD + 2 bbls. LW/1 hrs., 25/64" ch.; PTP 300 FCP 800%; P. 390 MCP + 4 BLW/1 hrs., 30/64" ch.; FTP 100%; PCP 600%; SI 12 hrs., TP 2000%; CP 2300%; P. 47 BLW/9 hrs. 25/64" ch., gas & 750 MCF to 384 FM MCFG; P. 23 BLW/12 hrs., 30/64" ch. no gas ggo.,

Swb. 144 bbls. LW & 24 BAW/24 hrs. w/so; reA/2000 swb.

899 sd.

MCFG; r. 23 blm/12 hrs., 30/64 ch.; FTP 150#; CP 500#.

PB 9537'; 560. 600 MCFG/12 hrs., 30/64" ch.; FTP 110-150#

CP 500#; F. 13 bbls. LW/12 hrs., 30/64" ch.; TP 145#;

CP 500#; SI 12 hrs.; CP 2200#; TP 2200#.

Perf. 24/9442-46

Perf. 24/9454-58; 10,000 SWF (10,000# sd.) swb. 143 bbls.

LO & 1 bbl. LW/11 hrs.; Swb. 100 BLW/11 hrs., SI 12 hrs.,

CP 1200#; swb. Clow losd:SI/16';SITP 1250#; SICP 1400#. CP 1200#; swb.& flow load; SI/16; SITP 1250#; SICP 1400#.

> K-2223-53 RGE 3

EUM, NEW MEXICO 34-19-25 Sten olind #1 - Lakewood Unit.

DST 10373-423 on 3 hrs. Rec. 2251 mad. PP 120 20 mim SIP 180# DST 10433-488 op 4 hrs. Rec. 270 md / 10030 black brackish wtr. PP 4275 SIP 4475 (CHO).TO: Pen American - fl - A. D. Morthion, S.D.:
Luz 650' FEL & 1980' PSL of eec. CARD #2223-59 for Sec. 34, T-19-3; R-25-E 0%10)

Acre de Sect	E-s-e Record	1		
	13-3/8 300 373	Gray	885	, .
	9-5/8 3578 200	3.A.	900	
	•	Glor.	2450	
		CIP	5260	
		Abo	4190	
		W.C.	6620	PERMAN ASSIL
5-p. 9-25-52	. 1- 2 7-63	Pena	8150	Cases meet
		Miss	9865 -= 42= - 6323	LOG ON PALE BARD STAMPED
i, e. Pld.	•	Dov.	10340	EL
		TP "	•	RL_
3a. GOR TP	CP	To 10486	3º lime.	
ROMERS CONTID	on arce 2	P00		

K-2223-53

EDDY, HEW MEXICO 34-19-25 Stanoline - #1 - Lakewood Unit

A GE 2

DST 810-861 op 2 hrs. rec. 105' SOMOCH. PP 55 SIP-0-DST 2610-42 op 2 hrs. rec. 135' SOMCCH,

DST 7770-2850 op 1 hr. 45 mins rec. 108' SOCM DST 3310-3385 op 2 hrs. rec. 84' mod.

DST 6605-6700 op 4 hrs. 10 mins Gas 2 hrs. 15 mins Rec. 270' mad. 2515' XM. P? 1465 20 mins SIP 2605#

DST 7030-\$125 op 4 hrs. Gas 35 mins rec. 60' SGCM, PP 130 20 mins SIP 175#

DST 7836-78 op 3 hrs. Rec. 39' mod, M.S. --DST 9397-9500 op 5 hrs. rec. gas 35 mins 47000 CPGPD, Rec. 284' RCCM, PP 115 20 mins SIP 2936#

_ DST 9407-9540 op 5 hre. rec. gas 55 mins 515' HGCM, FP 20 20 mins SIP 1810#

DST 10,350-351 op 1 hr. 50 mins Rec. 20' mod.

DST 10,350-575 op 1 hr. 22 mins res. 15 mad.

DST 10370-398 op 3 hrs. reo. 90' mud. CONT'D ON PAO'S

(73)	EDDY - Lind	esignated		Capropins Res	receptor Propiese E
Car man	HUBER J. M. CORP.	ESTRUCEO			5-21115
•	l same Irami Federal	"Com,"			
	Sec 34 T-19-S R-25-E			هيون	
	660' FSL. 1980' FWL of	Sec		50-540	
			CLASS	<u> </u>	
	1-14-74-4-23-74	F@Auth P@H	041	P@PRACTOR	DATUM
	.3 3/8" at 485' v/325 ax				
	•	· 9600'		P00	

PLUGGED & ABANDONED

comm Delta	OFFIC ELEV 3527 1	GL.	3545	KB	95001	TYPE RT

EDDY HUBER, J. H. CORP.

Undesignated NM 1 Irami Federal "Com." Page 2 Sec 34, T19S, R25E

4-29-74 TD 9600'; PLUGGED & ABANDONED LOG TOPS: Welfcamp 6552', Cisco 7702', Canyon 8237' Strawn 8512', Atoka 8895', Morrow 9244', Chester 9572'

5-4-74 COMPLETION REPORTED

F.R. 2-25-74
(Morrow)

3-14-74 MIRT

3-20-74 Drlg 535'
3-27-74 Drlg 2958' lm

4-3-74 Drlg 4710' lm

4-10-74 Drlg 7060' lm & sh

4-17-74 Drlg 8865' lm & sh

4-24-74 TD 9600' P/P & A

DST 9300-9410', open 1 hr,

Rec 60' DM (Spl 840 cc's DM + 1 CFG)

1 hr ISIP 608#. FP 87-62#

2 hr FSIP 1839#, HP 4808-4808#

Well: COQUINA OIL CORP. 1 Pan Canadian (OWWO)

Result CAS

DG

Loca: 7 mi W/Lakewood, 1980' FNL 1980' FWL Sec 34-195-25E.

Re-Spud: 4-28-77; Re-Comp: 5-5-77; Elev: 3521' g:d; TD: 9640' Mist; PB: 9177'
Casing: 13 3/8" 472'/550 st, 8 5/8" 1320'/600 st, 5 1/2" 9640'/325 st
Frod Zone: (Atoka) T/Pay 8838', prod thru perfs 8838-8922'

PCAOF: 1, 251, 000 CFGPD, COR 270-1, Grav (gas) . 645, (cond) NR, SIWHP 3163#
Comp info: (Orig. #1 Pan Canadian, Comp 1-17-74 thru (Morrow) perfs 9236-9318'; OTD
9640'): PB to 9177': Perf (Atoka) 8838-41', 8866-80', 8917-22' w/2 SPF: natural:
(Atoka) Four Point Gauges: F/444 MCFGPD, 1" orifice, 120 min, TP 2811#; F/567
MCFGPD, 1" orifice, 120 min, TP 2610#; F/636 MCFGPD, 1" orifice, 120 min, TP
2444#; F/943 MCFGPD, 1" orifice, 120 min, TP 2031#; C/NR. API No.: 30-015-20997

Petroleum Informations

Date: 6-22-77 Cord No.: 3 mm

(7) Ferroleum Information. reco Wildcar STATE NM COUNTY EDDY <u>-- 30-015-20997</u> COQUINA OIL CORP. use Pan Canadian Sec 34, T-19-S, R-25-E 1980' FNL, 1980' FWL of Sec RLEV: 0.455 500 10-25-73cm 1-17-74 -13 3/8" at 472' w/550 sx 8 5/8" at 1320' w/600 sx 5 1/2" at 9640! w/325 sx 9640'

IP (Morrow) Perfs 9236-9318' CAOF 28,463 MCFGPD. GOR Dry; Grav (Gas) .675; SIWHP 3070#; SIBHP 3771#

OPPS ELEV 3521' GL CONTR WEK F.R. 10-22-73 (Morrow) 10-29-73 Drlg 1050' Dr lg 3421' lm 11-5-73 11-12-73 Dr lg 5733' lm 11-19-73 Dr 1g '7885' DST 6420-6460', open 1 hr, rec 2400' GIDP, 1 hr ISIP 758#, FP 25-25#, 2 hr FSIP 343#, HP 2892-2875#, BHT 118 deg 11-26-73 TD 8856'; On DST (8805-56') DST (NA), Miss Run DST (NA), Miss Run

EDDY COQUINA OIL CORP. Wildcat

NM Page #2

TVPL RT

10,000'

l Pan Canadian Sec 34, T19S, R25E

Drlg 9110' 12-3-73 DST 8805-56', open 2 hrs 15 mins, GTS in 13 mins @ 70 MCFGPD, incr to 282 MCFGPD, rec 15' M, 1 hr ISIP 4455#, IFP 313-521#, FFP 146-208#, 4 hr FSIP 4455#, HP 4824-4721#, BHT 140 deg

12-11-73 Drlg 9456' DST 8870-8908', open 1 hr 10 mins, GTS in 5 min @ 195 MCFGPD, incr to 458 MCFGPD, rec 90' SGCM, 1 hr ISIP 4853#, FP 45-87#, 2 hr FSIP 4903#, HP 4934-4880#, BHT 133 deg DST 9208-9289', open 1 hr 45 mins, GTS in 2 mins@ 15,000 MCFGPD (Max), Aver 5500

COPYRIGHTED I 0

12-11-73 Continued MCFGPD, rec 100' F (70' Cond + 30' SGCM), 1 hr ISIP 3840#, FP 1455-1396#, 4 hr FSIP 3840#, HP 5129-5069# TD 9640'; WOC 12-17-73 DST 9289-9347', open 2 hrs 10 mins, GTS in l min @ 8500 MCFGPD (Max 14,000 MCFGPD), rec 10' Cond, 1 hr ISIP 3820#, FP 1697-1861#, 2 hr 30 min FSIP 3820#, HP 5069-5049#, BHT 152 des TD 9640'; WOCU 12-25-73 TD 9640'; Prep Run Tbg 12-31-73 TD 9640'; Rng Tbg 1-7-74 TD 9640'; Prep Perf TD 9640'; SI WO Test Equip 1-14-74 1-15-74 Perf 9326-9318' w/104 shots (overall) Flwd 7550 MCFGPD thru 24/64" chk, TP 2450#

EDDY Wildcat NM COQUINA OIL CORP. 1 Pan Canadian Page #3 Sec 34, T19S, R25E

1-22-74

TD 9640'; WO Pipeline Conn
CAOF 28,462 MCFGPD

3-11-74

TD 9640'; COMPLETE

(Morrow) FOUR POINT GAUGES:
Flwd 1197 MCFGPD, 1.75" orifice, 1 hr, TP 3000#
Flwd 1606 MCFGPD, 1.75" orifice, 1 hr, TP 2957#
Flwd 1946 MCFGPD, 1.75" orifice, 1 hr, TP 2939#
Flwd 2526 MCFGPD, 1.75" orifice, 1 hr, TP 2889#
LOG TOPS: Grayburg 520', San Andres 812',
Glorieta 2365', Tubb 3170', Abo 3775', Third
Bone Spring Sand 6175', Wolfcamp 6422,
Canyon 7868', Strawn 8295', Atoka 3568',
Morrow 8938', Barnett 9348', Chester 9573'

COUNTY EDDY	Wildcat		•	
- HILLIARD DIL & GAS C	0		<u>~ 30-</u>	Q15-2106E
- l um Gulf Fede	cal		B4 mas	
Sct 35, T-19-S, R-25	-£		UA	
1980' FNL, 1980' FWL	of Sec		CO-0=0	
		CLOSS WOE	ecev	
s=01-30-74 cus 4-11-74	******	0.70		0.100
13 3/8" at 305' w/250 s: 8 5/8" at 1300' w/700 s: 4 1/2" at 9810' w/500 s:				
	1. 9835' (CSTRI	Pec 9705'	

IP (Morrow) Perfs 9437-9563' CAOF 2639 MCFGPD. GOR (NR); Grav (gas) .596; SIWHP 3020#

cowra Capitan	ores even 3503, CT	~ 9900'	THE RT
	F.R. 12-17-73		
	(Merrow)		
12-31-73	AMEND OPERATOR:	Formerly report	rced as
	Barnhill-Richar	•	
2-5-74	Drlg 1095' 1m 5	anhy	
2-12-74	Drlg 3015' lm 6	•	
2-15-74	Drlg 3865' im S		
	••	open 1 hr 15 m	ins, rec
		OG&SWCDF, I hr	
		66-150#, 2 hr 30	
•		279#, BHT 100 de	
2 19-74	Drlg 5280' lm		
2-25-74	Drlg 7880' lm &	sh	
3-4-74	Drlg 9183'		
3-11-74	TD 9633'; Prep	co drill	*

EDDY Wildcat NM HILLIARD OIL & GAS CO. 1 Gulf Federal Page #2 Sec 35, T19S, R25E

3-11-74 Cont'd

DST 9383-9467', open 1 hr 45 mins, GTS in

18 mins @ 95 MCFGPD, Flwd after 30 mins @

160 MCFGPD thru 1/2" chk, rec 140' SGCM

(Sampler rec 1.2 CFG), 1 hr 15 min ISIP

3811#, FP 150-213#, 3 hr FSIP 3879#, HP

4523-4523#

DST 9506-9573', open 4 hr 15 mins, GTS in

12 mins @ 250 MCFGPD thru 1/2" chk, FTP

24#, rec 270' GCM (Sampler rec 1.5 CFG @

375#), 1 hr 30 min ISIP 3924#, FP 113-151#,

6 hr FSIP 3847#, HP 4551-4551#

DST 9561-9633#, open 1 hr 15 mins, rec 500'

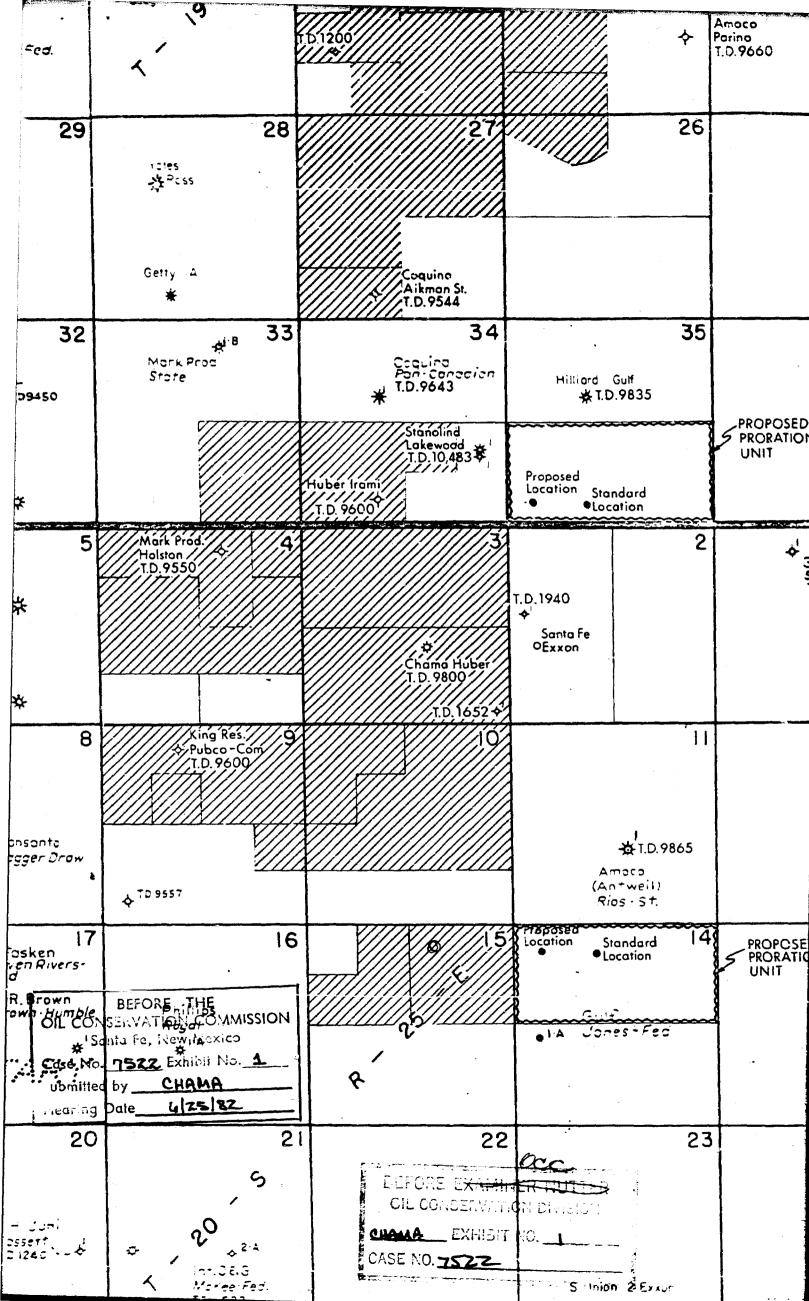
GIDP + 180' GCM (Sampler rec 3.56 CFG +

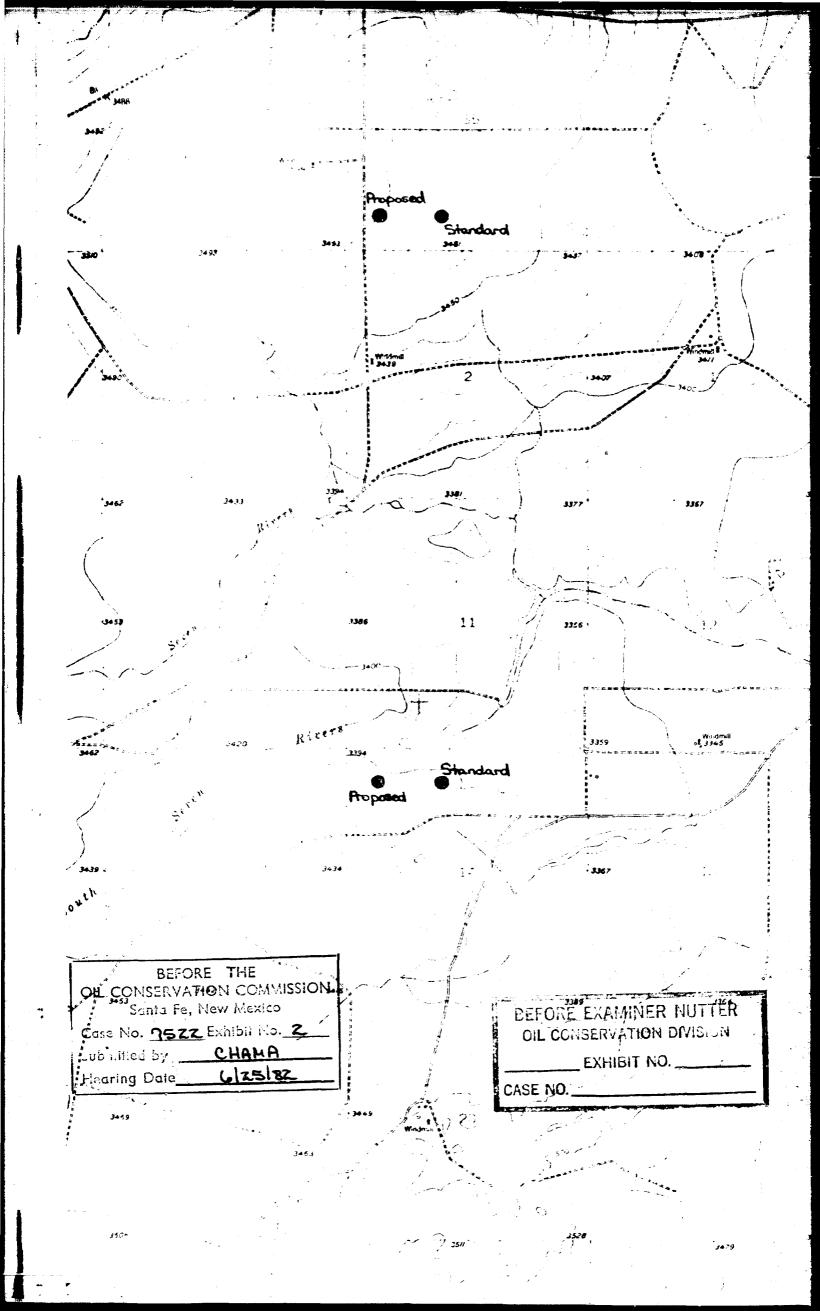
200G cc's GCM @ 1650#), 1 hr 30 min 2746#, FP 57-75#, 3 hr FSIP 3391#, 4589-4570# 3-18-74 TD 9835'; MORT	HP
4589 -4570#	HP
4589 -4570#	
2 10 7/ TO GRIS! MORT	
3-18-74 TD 9835'; MORT	
3-26-74 TD 9835'; WOCU	-
4-15-74 TD 9835'; PBD 9705'; Tstg	
Perf 9437-9563' w/15 shots (overal)	.)
Acid (9437-9563') 6000 gals (74% MS	iA)
4-29-74 TD 9835'; PBD 9705'; SI PBU	
5-7-74 TD 9835'; PBD 9705'; Tstg	
6-16-74 TD 9835'; PBD 9705'; WO Pot	
CAOF 2639 MCFGPD	
6-17-74 TD 9835'; PBD 9705'; COMPLETE	

EDDY Wildcat
HILLIARD OIL & GAS CO. 1 Gulf Federal
Sec 35, T195, R25E

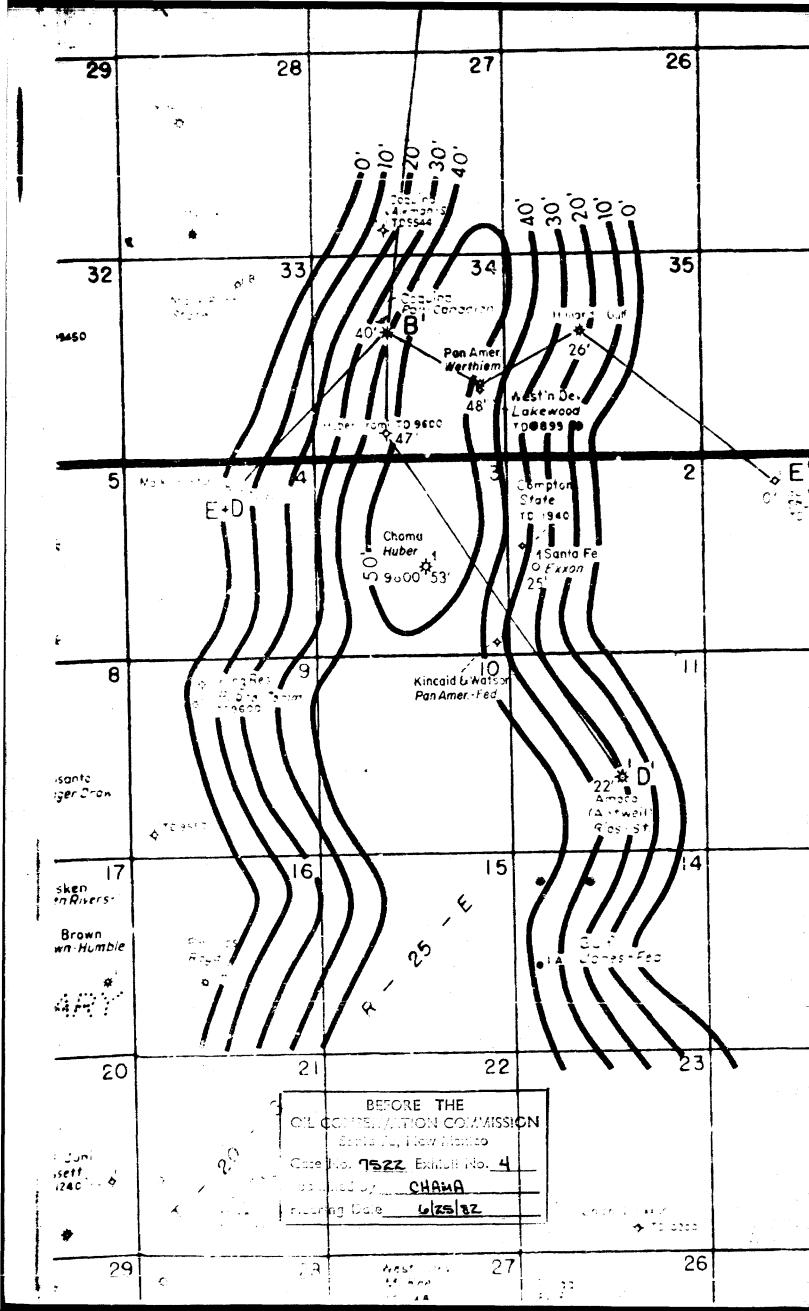
(MOTTOW) FOUR FOUNT GAUGES:
Flwd 472 MCFGPD, .5" Orifice, 1 hr, TP 2901#
Flwd 799 MCFGPD, .5" Orifice, 1 hr, TP 2740#
Flwd 1295 MCFGPD, 1.0" Orifice, 1 hr, 2423#
Flwd 2119 MCFGPD, 1.0" Orifice, 1 hr, 1481#
LOG TOPS: Yeso 2455', Second Bone Spring
Sand 3285', Third Bone Spring Sand 6364',
Wolfcamp 6635', Cisco 7879', Canyon 8139',
Strawn 8558', Atoka 9016', Morrow 9325',
Chester 9795'
COMPLETION REPORTED

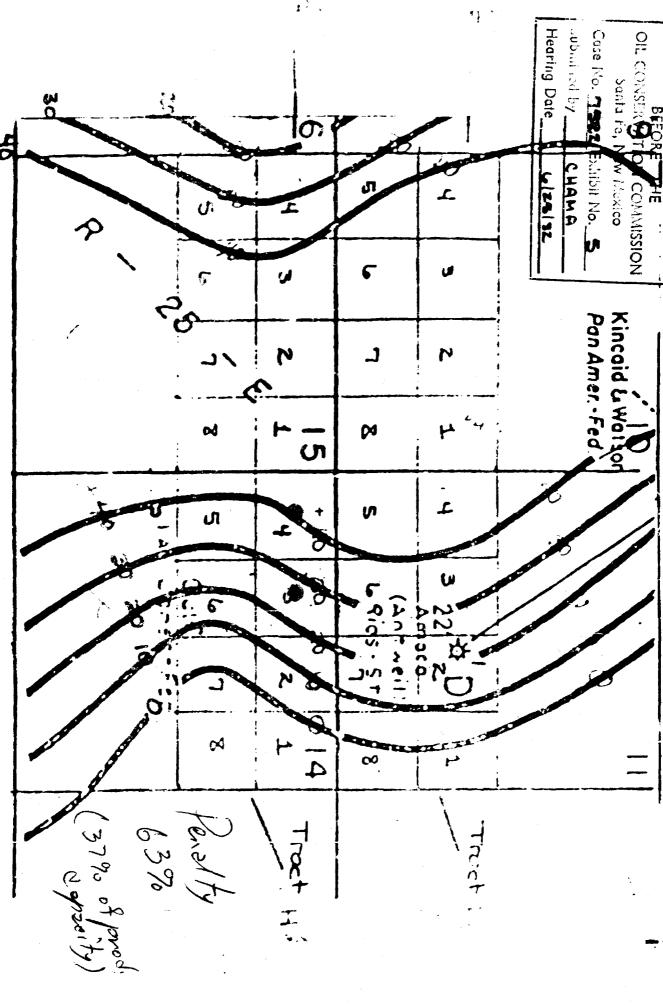
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Dockets Nos. 23-82 and 24-82 are tentatively set for July 21 and August 4, 1982. Applications for hearing must be filed at least 22 days in advance of hearing date.

DOCKET: CONGISSION HEARING - FRIDAY - JUNE 25, 1982

OIL COMMENSATION COMMISSION - 9 A.H.
OIL COMMENSATION DIVISION COMPENSACE
ROOM, STATE LAND OFFICE BUILDING,
SANTA-PE, NEW MEXICO

The following cases were continued from the June 22, 1982. Commission Hearing:

CASE 7522: (DE HOVO)

Application of Santa Fe Emploration Co. for an unorthodox gas well location, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of an unorthodox location 660 feet from the North and West lines of Section 14, Township 20 South, Hange 25 East, Permo-Penr, Strawn, Atoka and Morrow formations, the M/2 of said Section 14 to be dedicated to the well.

Opon application of Chuma Petroleum Company, this case will be heard De Novo pursuant to the provisions of Rule 1220.

CASE 7521: (DE MOVO)

Application of William B. Barnhill for an unorthodox gas well location, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of an unorthodox location 660 feet from the South and West lines of Section 35, Township 19 South, Range 25 East, Permo-Penn, Strawn, Atoka and Morrow formations, the S/2 of stid Section 35 to be dedicated to the well.

Upon application of Chama Petrolema Company and William B. Barnhill, this case will be heard De Movo pursuant to the provisions of Rule 1220.

Docket No. 22-82

DOCKET: EXAMINER HEAPING - WEDNESDAY - JULY 7, 1982

9. A.M. - OIL COMSERVATION DIVISION, MOSGAM HALL, STATE LAND OFFICE BUILDING, SAWTA FE, MEN MEXICO

The following cases will be heard before Richard L. Stamets, Examiner, or Daniel S. Mutter, Alternate Examiner:

CASE 7566: (Continued from May 12, 1982, Examiner Hearing)

In the matter of the hearing called by the Oil Conservation Division on its own motion to permit Flag-Redfern Oil Co., Principal, Mational Surety Corporation, and all other interested parties to appear and show cause why four wells, being the Julander Mo. 1 located in Unit L, Section 34, Julander Mo. 2 located in Unit I, Section 33; Hargis Mo. 1 located in Unit G, Section 33; and Hargis Mo. 2 located in Unit J, Section 33, all in Township 30 Morth, Pange 12 West, San Juan County, should not be plugged and abandoned in accordance with a Division-approved plugging program.

CASE 7560: (Continued from May 12, 1982, Examiner Hearing)

In the matter of the hearing called by the Oil Conservation Division on its own motion to permit Charles H. Heisen, Fidelity and Deposit Company of Maryland, Surety, and all other interested parties to appear and show cause why the Crownpoint Well No. 1, located in Unit F, Section 18, Township 18 North, Range 13 West, McKinley County, should not be plugged and abandoned in accordance with a Division-approved plugging program.

CASE 7619: Application of Merrion Oil & Gas Corp. for pool creation and special pool rules, Rio Arriba County, New Mexico. Applicant, in the above-styled cause, seeks the creation of a new Gallup Pool to comprise Sections 3, 4, 8, 9, 10, 14, and 15, Township 23 Morth, Range 6 West, and the promulgation of special rules therefor including 160-acre spacing for oil and gas.

CASE 7620:

Application of Mesa Petroleum Company for compulsory pooling, Chaves County, New Mexico.

Applicant, in the above-styled cause, seeks an order pooling all mineral interests in all formations from the surface through the base of the Abo formation underlying the SM/4 of Section 8, Township 5 South, Range 25 East, to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.

CASE 7548: (Continued from June 23, 1982, Examiner Hearing)

Application of Takes Oil & Cattle Co. for salt water disposal, Lee County, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the San Andres formation in the perforated interval from 4932 feet to 4992 feet in its Schwalbe Well Mo. 1, located in Unit P of Section 21, Township 9 South, Range 37 East, West Sawyer-San Andres Pool.

CASES 7528, 7529, 7532, 7533 and 7534: (Continued from May 12, 1982, Examiner Hearing)

Application of Jack J. Grynberg for compulsory pooling, Chaves County, New Mexico. Applicant, in each of the following 5 cases, seeks an order pooling all mineral interests down through the Abo formation underlying the lands specified in each case, each to form a standard 160-acre gas spacing and proration unit to be dedicated to a well to be drilled at a standard location thereon. Also to be considered in each case will be the cost of drilling and completing said wells and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the wells and a charge for risk involved in drilling said wells:

CASE 7528: HM/4 Section 4, Township 5 South, Range 24 East

CASE 7529: ME/4 Section 4, Township 5 South, Range 24 East

CASE 7532: SE/4 Section 27, Township 6 South, Range 24 East

CASE 7533: SW/4 Section 27, Township 6 South, Range 24 East

CASE 7534: NM/4 Section 34, Township 6 South, Range 24 East

CASE 7621: In the matter of the hearing called by the Oil Conservation Division on its own motion for an order creating, abolishing, and extending certain pools in Chaves, Eddy, and Les Counties, New Mexico.

(a) CREATE a new pool in Eddy County, New Mexico, classified as a gas pool for Wolfcamp production and designated as the Big Sinks-Wolfcamp Gas Pool. The discovery well is the Perry R. Bass, Poker Lake Unit Well No. 50 located in Unit B of Section 4, Township 25 South, Range 31 East, NMPM. Said pool would comprise:

TOWNSHIP 25 SOUTH, RANGE 31 EAST, HMPM Section 4: N/2

(b) CREATE a new pool in Eddy County, New Mexico, classified as a gas pool for Atoka production and designated as the East Black River-Atoka Gas Pool. The discovery well is the Pogo Production Company MAW State Well No. 1 located in Unit E of Section 14, Township 24 South, Range 27 East, NMPM. Said pool would comprise:

TOWNSHIP 24 SOUTH, RANGE 27 EAST, HMPH Section 14: W/2

(c) CREATE a new pool in Eddy County, New Mexico, classified as a gas pool for Morrow production and designated as the Black River-Morrow Gas Pool. The discovery well is the HMG Oil Company Loving 1 State Well No. 1 located in Unit B of Section 1, Township 24 South, Range 27 East, NHPM. Said pool would comprise:

TOMMSHIP 24 SOUTH, RANGE 27 EAST, HMPM Section 1: 11/2

(d) CREATS a new pool in Eddy County, New Haxioo, classified as a gas pool for Horrow production and designated as the Dog Town Draw-Horrow Gas Pool. The discovery well is the Perry R. Bass Poker Lake Unit Well Mo. 49 located in Unit E of Section 17, Township 24 South, Range 30 East, MEPH. Said pool would comprise:

TORRESTP 24 SOUTH, RANGE 30 EAST, MRFM Section 17: W/2

(e) CREATE a new pool in Lea County, New Mexico, classified as an oil pool for Yates production and designated as the East Eumont-Yates Pool. The discovery well is Ike Lovelady, Inc. Linwood Well No. 1 located in Unit F of Section 30, Township 19 South, Range 38 East, MMPM. Said pool would comprise:

TOWNSHIP 19 SOUTH, RANGE 38 EAST, WHEN Section 30: NM/4

(f) CREATE a new pool in Lee County, Hear Mexico, classified as an oil pool for Bone Spring production and designated as the Feetherstone-Bone Spring Pool. The discovery wall is The Superior Oil Company Featherstone Federal Well No. 1 located in Unit G of Section 21, Township 20 South, Range 35 East, NAMEN. Said pool would comprise:

TOWNSHIP 20 SOUTH, RANGE 35 EAST, HMPM Section 21: ME/4

(g) CHEATE a new pool in Eddy County, New Herrico, classified as a gas pool for Atoka production and designated as the Livingston Ridge-Atoka Gas Pool. The discovery well is the Perry R. Bass James Ranch Unit Well No. 12 located in Unit G of Section 21, Township 22 South, Range 30 East, MRPM. Said pool would comprise:

TORRISHIP 22 SOUTH, RANGE 30 EAST, HERM Section 21: E/2

(h) CREATE a new pool in Lea County, New Mexico, classified as an oil pool for Yates production and designated as the West Madine-Yates Pool. The discovery well is the Ike Lovelady, Inc. McMeill Well No. 1 located in Unit M of Section 33, Township 19 South, Range 38 East, MMPM. Said pool: would comprise:

TOMESHIP 19 SOUTH, RANGE 38 BAST, MHPM Section 33: SM/4

(i) ABOLISH the South Rock Tank-Horrow Gas Pool in Eddy County, New Mexico, heretofore classified, defined, and described as:

TOMESHIP 24 SOUTH, PARGE 24 EAST, HEPM Section 2: 8/2

(j) EXTEND the Baldridge Canyon-Morrow Gas Pool in Eddy County, Hew Mexico, to include therein:

TOMESHIP 24 SOUTH, RANGE 24 EAST, MEM

Section 1: W/2 Section 2: All

Section 14: S/2

(k) EXTEMD the West Bitter Lakes-San Andres Pool in Chaves County, New Mexico, to include therein:

TOWNSHIP 10 SOUTH, RANGE 25 EAST, No. Section 17: NE/4 NE/4 and W/2 NE/4

(1) EXTEND the East Carlsbad-Wolfcamp Gas Pool in Eddy County, New Mexico, to include therein:

TOWNSHIP 21 SOUTH, RANGE 27 EAST, MM2M Section 21: All

Section 22: W/2

(m) EXTERD the Chaveroo-San Andres Pool in Chaves County, New Maxico, to include therein:

TOWNSHIP 8 SOUTH, RANGE 33 EAST, HMPH Section 7: \$/2 Section 8: \$M/4

EXTEND the East Eagle Creek Atoka-Morrow Gas Pool in Eddy County, New Mexico, to include therein:

TORRESTP 17 SOUTH, RANGE 26 EAST, HMPM Section 32: W/2

EXTEND the Malaga-Atoka Gas Pool in Eddy County, New Mexico, to include (0) thereing

Section 10: W/2

EXTERD the East Mason-Delaware Pool in Lee County, New Mexico, to include (0)

TORREST 26 SOUTE, DAMCE 32 EAST, HMPM Section 16: WM/4

EXTEND the Penjack-Abo Gas Pool in Chaves County, New Mexico, to include **(a**) therein:

TORRENIP 9 SOUTH, RANGE 26 EAST, MRPM Section 31: SE/4 Section 32: All

(r) EXTERD the Racetrack-San Andres Pool in Chaves County, New Mexico, to include therein:

TOWNSHIP 10 SOUTH, RANGE 28 EAST, WHEN Section 20: 9W/4

EXTEND the East Red Lake Queen-Grayburg Pool in Eddy County, New Mexico, to include (8) therein:

TOWNSHIP 16 SOUTH, RANGE 29 EAST, NAPM Section 30: NM/4

(t) EXTRED the Mest Sawyer-San Andres Pool in Les County, New Mexico, to include

therein:

TOMMSHIP 10 SOUTH, RANGE 37 EAST, MAPM. Section 3: MM/4

EXTEND the Scharb-Bone Spring Pool in Lea County, New Mexico, to include

therein:

TOWNSHIP 19 SOUTH, RANGE 35 EAST, MAPPE Section 9: SW/4

(v) ENTEND the Turkey Track-Atoka Gas Pool in Eddy County, New Mexico, to include therein:

TOWNSHIP 18 SOUTH, NAMEZ 29 EAST, MMENN Section 28: M/2

DOCKET: CONMISSION MEARING - MEDINESDAY - JULY 14, 1982

OIL COMBENATION COMMISSION - 9 A.M. HORGAN HALL, STATE LAND OFFICE SUILDING SANTA FE, MEN MEXICO

CASE 7496: (DE 11040)

Application of Viking Petroleum, Inc. for an unorthodox location, Chaves County, New Mexico.
Applicant, in the above-styled cause, seeks approved for the unorthodox location of an Abo gas well
located 62 feet from the South line and 1984 feet from the East line of Section 29, Township 5 South,
Ressge 24 East, the SE/4 of seid Section 29 to be dedicated to the well.

Opon application of Viking Petroleum, Inc., this case will be heard Do Hovo pursuant to the provisions of Rule 1220.

CASE 7329: (DE MOVO)

Application of Loco Hills Meter Disposel Company for an exception to Order No. R-3221, Eddy County, New Maxico. Applicant, in the above-styled cause, seeks an exception to Order No. R-3221 to permit the commercial disposel of produced brine into several unlined surface pits located in the W/2 SW/4 SW/4 of Section 16, Township 17 South, Renge 30 East.

Open application of Loco Hills Water Disposal Company, this case will be heard De Novo pursuant to the provisions of Bule 1220.

Dockets Nos. 21-82 and 22-82 are tentatively set for July 7 and 21, 1982. Applications for hearing must be filed at least 22 days in advance of hearing date.

DOCKET: CORRISSION HEARING - TUESDAY - JUNE 22, 1982

OIL CONSERVATION CONSISSION - 9 A.M. MORGAN HALL, STATE LAND OFFICE BUILDING SANTA FE, NEW MEXICO

The following cases were continued from the June 2, 1982, Commission hearing:

CASE 7522: (DE NOVO)

Application of Santa Fe Exploration Co. for an unorthodox gas well location, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of an unorthodox location 660 feet from the North and West lines of Section 14, Township 20 South, Range 25 East, Permo-Pena, Strawn, Atoka and Morrow formations, the N/2 of said Section 14 to be dedicated to the well.

Upon application of Chams Petroleum Company; this case will be heard De Novo pursuant to the provisions of Rule 1220.

CASE 7521. (DE NOVO)

Application of William 3. Barnhill for an unorthodox gas well location, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of an unorthodox location 660 feet from the South and West lines of Section 35, Township 19 South, Range 25 East, Permo-Penn, Strawn, Atoka and Morrow formations, the S/2 of said Section 35 to be dedicated to the well.

Upon application of Chama Petroleum Company and William B. Barnhill, this case will be heard De Novo pursuant to the provisions of Rule 1220.

Docket No. 20-82

DOCKET: EXAMINER HEARING - WEDNESDAY - JUNE 23, 1982

9 A.M., MORGAN HALL, STATE LAND OFFICE BUILDING, SANTA FE, NEW MEXICO

The following cases will be heard before Daniel S. Mutter, Examiner, or Richard L. Stamets, Alternate Examiner:

Application of Stevens Oil Company for salt water disposal, Chaves County, New Mexico.

Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the San Andres formation in the perforated interval from 2724 feet to 2745 feet in its O'Brien "J" Well No. 9 located in Unit A, Section 31, Township 8 South, Range 29 East, Twinlakes-San Andres Pool. CASE 7610:

CASE 7611: Application of Texaco Inc. for special pool rules, Lea County, New Mexico.

Applicant, in the above-styled cause, seeks special pool rules for the Skaggs-Drinkard Pool, including provision for a limiting gas-oil ratio of 10,000 cubic feet of gas per barrel of oil.

Application of B & E, Inc. for salt water disposal, Eddy County, New Mexico.

Applicant, in the above-styled cause, seeks authority to install and operate a commercial facility for the disposal of salt water into the Southeast end of Laguna Tres in Section 12, Township 23 South, Range 29 East and/or into the Northeast side of Laguna Cuatro in Section 6, Township 23 South, Range 30 East. CASE 7612:

Application of Tenneco Oil Company for an unorthodox gas well location, Les County, New Mexico. Applicant, in the above-styled cause, seeks approval for the unorthodox location of a Pennsylvanian test well to be located 660 feet from the South and West lines of Section 28, Township 16 South, Range 34 East, the W/2 of said Section 28 to be dedicated to the well. CASE 7613:

CASE 7548: (Continued from June 9, 1982, Examiner Hearing)

> Application of Taboe Oil & Cattle Co. for salt water disposal, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to dispose of produced salt water into the San Andres formation in the perforated interval from 4932 feet to 4992 feet in its Schwalbe Well No. 1, located in Unit P of Section 21, Township 9 South, Range 37 East, West Sawyer-San Andres Pool.

Page 2 of 2 Examiner Hearing - Wadnesday - June 23, 1982

CASES 7614 AND 7615: Application of Inexco Oil Company for compulsory pooling, Lea County, New Mexico. Applicant, in each of the following cases seeks an order pooling all mineral interests from the surface through the Strawn formation underlying the lands specified in each case, to form a standard 80-acre oil provetion unit in the South Humble City-Strawn Pool to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said wells and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the wells and a charge for risk involved in drilling said

CASE 7614: W/2 NE/4 Section 23, Township 17 South, Range 37 East

CASE 7615: E/2 NE/4 Section 23, Township 17 South, Range 37 East

CASES 7616 AND 7617: Application of Southland Royalty Company for compulsory pooling, Eddy County, New Mexico. Applicant, in each of the following cases seeks an order pooling all mineral interests in the Pennsylvanian formation underlying the lands specified in each case, to form a standard 320-acre gas spacing and proration unit to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said wells and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the wells and a charge for risk involved in drilling said wells:

CASE 7616: N/2 Section 21, Township 18 South, Range 29 East

CASE 7617: S/2 Section 21, Township 18 South, Range 29 East

CASE 7618: Application of Doyle Hartman for an unorthodox gas well location, Lea County, New Mexico. Applicant, in the above-styled cause, seeks approval for the unorthodox location of a gas well to be drilled 1450 feet from the South line and 1980 feet from the East line of Section 20, Township 20 South, Range 37 East, Eumont Gas Pool, the SE/4 of said Section 20 to be dedicated to the well.

CASE 7605: (Continued from June 9, 1982, Examiner Hearing)

Application of Yates Petroleum Corporation for compulsory pooling, Eddy County, New Maxico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests from the top of the Wolfcamp formation through the uppermost 100 feet of the Mississippian Chester Limestone underlying the W/2 of Section 35, Township 19 South, Range 24 East, to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.

CASE 7458: (Continued from April 28, 1982, Examiner Hearing)

Application of Marks & Garner Production Company for salt water disposal, Lea County, New Mexico. Applicant, in the above-styled cause, seeks authority to disposa of salt water into the Bough C formation in the perforated interval from 9596 feet to 9616 feet in its Betenbough Well No. 2, located in Unit M of Section 12, Township 9 South, Range 35 East.

CASE 7598: (This case was heard on May 26, 1982. However, due to an error in originally advertising the case in the Torrance County newspaper, it has been readvertised in Torrance County only and will be reopened June 23, 1982, with respect to Torrance County only.)

> Application of ANR Production Company and Yates Petroleum Corporation for designation of a tight formation in San Miguel, Torrance, Guadalupe, De Baca, Lincoln and Chaves Counties, New Mexico. Pursuant to Section 107 of the Natural Gas Policy Act of 1978 and 18 CFR Section 271.701-705, applicants, in the above-styled cause, seeks the designation as a tight formation of the Abo formation underlying the following described lands in the above-named counties.

Townships 1 thru 4 North, Ranges 14 thru 27 East;

Townships 5 thru 11 North, Ranges 14 thru 26 East;

Townships 2 thru 5 South, Ranges 14 thru 27 East; Townships 2 thru 5 South, Ranges 14 thru 21 East:

Townships 6 thru 11 South, Ranges 15 thru 21 East; Township 12 South, Ranges 17 thru 21 1/2 East; and Townships 13 and 14 South, Ranges 17 thru 21 East;

containing 5,168,563 acres, more or less, but excluding the not yet defined Capitan Wilderness Area.

Docket No. 16-82

Dockets Nos. 18-82 and 19-82 are tentatively set for June 23 and July 7, 1982. Applications for hearing must be filed at least 22 days in advance of hearing date.

> CONNISSION HEARING - WEDNESDAY - JUNE 2, 1982 OIL CONSERVATION COMMISSION - 9 A.M. DOCKET: MORGAN HALL, STATE LAND OFFICE BUILDING SANTA FE, NEW MEXICO

CASE 7522: (DE NOVO - Continued from May 17, 1982, Commission Hearing)

Application of Santa Fe Exploration Co. for an unorthodox gas well location, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of an unorthodox location 660 feet from the North and West lines of Section 14, Township 20 South, Range 25 East, Permo-Penn, Strawn, Atoka and Morrow formations, the N/2 of said Section 14 to be dedicated to the well.

Upon application of Chama Petroleum Company, this case will be heard De Novo pursuant to the provisions of Rule 1220.

CASE 7521: (DE NOVO)

Application of William B. Barnhill for an unorthodox gas well location, Eddy County, New Mexico. Applicant, in the above-styled cause, seeks approval of an unorthodox location 660 feet from the South and West lines of Section 35, Township 19 South, Range 25 East, Permo-Penn, Strawn, Atoka and Morrow formations, the S/2 of said Section 35 to be dedicated to the well.

Upon application of Chama Petroleum Company and William B. Barnhill, this case will be heard De Novo pursuant to the provisions of Rule 1220.

Dockets Nos. 14-82 and 15-82 are tentatively set for May 26 and June 9, 1982. Applications for hearing must be filed at least 22 days in #dvance of hearing date.

DOCKET: EXAMINER HEARING - WEDNESDAY - MAY 12, 1982

9 A.M. - OIL CONSERVATION DIVISION CONFERENCE ROOM, STATE LAND OFFICE BUILDING, SANTA FE, NEW MEXICO

The following cases will be heard before Richard L. Stamets . Examiner, or Daniel S. Nutter, Alternate Examiner:

- ALLOWABLE: (1) Consideration of the allowable production of gas for June, 1982, from fifteen prorated pools in Lea, Eddy, and Chaves Counties, New Mexico.
 - (2) Consideration of the allowable production of gas for June, 1982, from four prorated pools in San Juan, Rio Arriba, and Sandoval Counties, New Mexico.

CASE 7540: (Continued and Readvertised)

In the matter of the hearing called by the Oil Conservation Division on its own motion to permit Pauly-Anderson-Pritchard, William H. Pauly, and all other interested parties to appear and show cause why the Maloy Well No. 1, located in Unit P. Section 16, Township 29 North, Range 11 West, San Juan County, should not be plugged and abandoned in accordance with a Division-approved plugging program.

CASE 7538: > (Continued and Readvertised)

In the matter of the hearing called by the Oil Conservation Division on its own motion to permit Francis L. Harvey and all other interested parties to appear and show cause why the Pinkstaff Estate Well No. 2, located in Unit A, Section 29, Township 29 North, Range 10 West, San Juan County, should not be re-entered and plugged and abandoned in accordance with a Division-approved plugging program.

CASE 7566: In the matter of the hearing called by the Oil Conservation Division on its own motion to permit Flag-Redfern Oil Co., Principal, Mational Surety Corporation, and all other interested parties to appear and show cause why four wells, being the Julander No. 1 located in Unit L, Section 34: Julander No. 2 located in Unit I, Section 33; Hargis No. 1 located in Unit G, Section 33; and Hargis No. 2 located in Unit J, Section 33, all in Township 30 North, Range 12 West, San Juan County, should not be plugged and abandoned in accordance with a Division-approved plugging program.

CASE 7560: (Continued from April 28, 1982, Examiner Hearing)

In the matter of the hearing called by the Gil Conservation Division on its own motion to permit Charles H. Heisen, Fidelity and Deposit Company of Maryland, Surety, and all other interested parties to appear and show cause why the Crownpoint Well No. 1, located in Unit F, Section 18, Township 18 North, Range 13 West, McKinley County, should not be plugged and abandoned in accordance with a Division-approved plugging program.

CASE 7542: (Continued from April 14, 1982, Examiner Hearing)

In the matter of the hearing called by the Oil Conservation Division on its own motion to permit Benson-Montin-Greer Drilling Corporation, Hartford Accident and Indemnity Company, and all other interested parties to appear and show cause why the following wells: Dustin No. 1, located in Unit K, Section 6, and the Gallegos Canyon Unit No. 2, located in Unit K, Section 35, both in Township 29 North, Range 12 West, and the Segal No. 1, located in Unit K, Section 10, and the Price No. 1, located in Unit N, Section 15, both in Township 31 North, Range 13 West, San Juan County, should not be plugged and abandoned in accordance with Division-approved plugging programs.

CASE 7567: Application of Harvey E. Yates Company for a unit agreement, Lea County, New Mexico.

Applicant, in the above-styled cause, seeks approval for the Richardson Unit Area, comprising 1,283.35 acres, more or less, of State and Fee lands in Townships 13 and 14 South, Range 36 East.

CASE 7565: (Continued from April 28, 1982, Examiner Hearing)

Application of Delta Drilling Company for a unit agreement, Lea County, New Mexico.

Applicant, in the above-styled cause, seeks approval for the North Mescalero Unit Area, comprising
719.77 acres, more or less, of State, Fee and Federal lands in Townships 9 and 10 South, Range 32 East.

CASE 7568: Application of Petroleum Corp. of Delaware for a dual completion, Eddy County, New Mexico.

Applicant, in the above-styled cause, seeks approval for the dual completion of its Superior Federal

Mell Ho. 6 located in Unit N of Section 6, Township 20 South, Range 29 East, East Burton Flat Field,
to produce oil from the Strawn formation through tubing and gas from the Morrow formation through the
casing-tubing annulus by means of a cross-over assembly.

Examiner Hearing - WEDNESDAY - MAY 12, 1982

- CASE 7569: Application of Petroleum Corp. of Delaware for downhole commingling, Eddy County, New Mexico.

 Applicant, in the above-styled cause, seeks approval for the downhole commingling of Atoka and Morrow production in the wellbores of its Parkway West Unit Well No. 3, located in Unit K of Section 29, and Well No. 10, located in Unit G of Section 27, both in Township 19 South, Pange 29 East.
- CASE 7570: Application of J. Cleo Thompson for three unorthodox oil well locations, Eddy County, New Mexico.

 Applicant, in the above-styled cause, seeks approval for three unorthodox well locations, being 660 feet from the XC th line and 1330 feet from the West line, 660 feet from the North line and 2630 feet from the East line, and 660 feet from the North line and 1310 feet from the East line, all in Section 2, Township 17 South, Range 30 East, Square Lake Pool.
- CASE 7516: (Continued from March 31, 1982, Examiner Hearing)

Application of Benson-Montin-Greer for a unit agreement, Rio Arriba County, New Mexico. Applicant, in the above-styled cause, seeks approval for the North Canada Ojitos Unit Area, comprising 12,361 acres, more or less, of Jicarilla Apache Indian lands in Township 27 North, Range 1 West.

- CASE 7571: Application of Yates Petroleum Corporation for compulsory pooling, Chaves County, New Mexico.
 Applicant, in the above-styled cause, seeks an order pooling all mineral interests from the surface through the Abo formation underlying the SE/4 of Section 9, the SW/4 of Section 10, the NW/4 of Section 15, all in Township 6 South, Range 26 East, each to form a standard 160-acre spacing and proration unit to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said wells and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the wells and a charge for risk involved in drilling said wells.
- CASE 7551: (Continued from April 14, 1982, Examiner Hearing)

Application of Harvey E. Yates Company for compulsory pooling, Chaves County, New Mexico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests in the Wolfcamp through Mississippian formations underlying the E/2 of Section 21, Township 11 South, Range 31 East, to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.

- CASE 7572: Application of Anadarko Production Company for a waterflood expansion, Eddy County, New Mexico.

 Applicant, in the above-styled cause, seeks authority to expand its Ballard GSA Waterflood Project by drilling and converting ten wells located in Unit N of Section 5, Units N and P of Section 6, Units F, H, J, and P of Section 7, Units F and N of Section 8, and Unit F of Section 17, all in Township 18 South, Range 29 East, Loco Hills Pool.
- CASE 7573: Application of Anadarko Production Company for a waterflood expansion, Eddy County, New Mexico.

 Applicant, in the above-styled cause, seeks authority to expand its West Square Lake Waterflood Project by the conversion to water injection of five wells located in Units J and N of Section 9, D and H of Section 10, and J of Section 3, all in Township 17 South, Range 30 East.
- CASE 7574: Application of Sun Exploration and Production Company for two non-standard gas promation units and an unorthodox location, Lea County, New Mexico. Applicant, in the above-styled cause, seeks approval of two 160-acre non-standard Jalmat gas proration units comprising the NW/4 of Section 21, for its Boren & Greer Com Well No. 2 in Unit C and the NE/4 of Section 20, for its Boren & Greer Com Well No. 3, to be drilled at an unorthodox location 660 feet from the North line and 940 feet from the East line of said Section 20, all in Township 22 South, Range 36 East. Applicant further seeks rescission of Order No. R-5688.
- CASE 7575: Application of Eagle Oil & Gas Co. for an unorthodox gas well location, Eddy County, New Mexico.

 Applicant, in the above-styled cause, seeks approval for an unorthodox gas well location for a WolfcampPenn test well to be drilled 1500 feet from the South line and 660 feet from the East line of Section 2,
 Township 17 South, Range 27 East, the S/2 of said Section 2 to be dedicated to the well.
- CASES 7576 and 7577:

 Application of Apollo Oil Company for compulsory pooling, Lea County, New Mexico.

 Applicant, in each of the following cases, seeks an order pooling all mineral interests from the surface through the base of the San Andres formation underlying the lands specified in each case, each to form a standard 40-acre oil spacing and proration unit to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said wells and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the wells and a charge for risk involved in drilling said wells:

CASE 7576: NE/4 SW/4 Section 6, Township 19 South, Range 38 East

CASE 7577: SE/4 SW/4 Section 6, Township 19 South, Range 38 East

- Application of MGT Oil Corporation for compulsory pooling, Lea County, New Mexico.

 Applicant, in the above-styled cause, seeks an order pooling all mineral interests from the surface down through the Seven Rivers formation underlying the SE/4 of Section 31, Township 19 South, Range 39 East, to form a standard 160-acre gas proration unit to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.
- CASE 7579: Application of MGF Oil Corporation for compulsory pooling, Lea County, New Mexico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests from the surface down through the Seven Rivers formation underlying the N/2 NW/4 of Section 5, Township 20 South, Range 39 East, to form a non-standard 80-acre gas proration unit to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.
- CASE 7580: Application of MGF Oil Corporation for compulsory pooling, Lea County, New Mexico.

 Applicant, in the above-styled cause, seeks an order pooling all mineral interests from the surface to the base of the Seven Rivers formation underlying the SW/4 of Section 31, Township 19 South, Range 39 East, to form a standard 160-acre gas proration unit to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.
- CASE 7581: Application of Estoril Producing Corp. for an unorthodox gas well location, Lea County, New Mexico.

 Applicant, in the above-styled cause, seeks approval for the unorthodox location of a well to be drilled 660 feet from the South line and 990 feet from the East line of Section 10, Township 23 South, Range 34 East, Antelope Ridge-Morrow Gas Pool, the S/2 of said Section 10 to be dedicated to the well.
- CASES 7582 thru 7585: Application of Jack J. Grynberg for compulsory pooling, Chaves County, New Mexico.

 Applicant, in each of the following cases, seeks an order pooling all mineral interests down through the Abo formation underlying the lands specified in each case, each to form a standard 160-acre gas spacing and proration unit to be dedicated to a well to be drilled at a standard location therson. Also to be considered will be the cost of drilling and completing said wells and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the wells and a charge for risk involved in drilling said wells:

CASE 7582: NW/4 Section 13, Township 6 South, Range 24 East

CASE 7583: NE/4 Section 13, Township 6 South, Range 24 East

CASE 7584: SW/4 Section 13, Township 6 South, Range 24 East

CASE 7585: NW/4 Section 24, Township 6 South, Range 24 East

CASES 7525 thru 7534: (Continued from April 28, 1982, Examiner Hearing)

Application of Jack J. Grynberg for compulsory pooling, Chaves County, New Mexico. Applicant, in each of the following 10 cases, seeks an order pooling all mineral interests down through the Abo formation underlying the lands specified in each case, each to form a standard 160-acre gas spacing and proration unit to be dedicated to a well to be drilled at a standard location thereon. Also to be considered in each case will be the cost of drilling and completing said wells and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the wells and a charge for risk involved in drilling said wells:

CASE 7525: SW/4 Section 3, Township 5 South, Range 24 East

CASE 7526: NW/4 Section 3, Township 5 South, Range 24 East

CASE 7527: SE/4 Section 3, Township 5 South, Range 24 Fast

CASE 7528: NW/4 Section 4, Township 5 South, Range 24 East

CASE 7529: NE/4 Section 4. Township 5 South, Range 24 East
CASE 7530: NW/4 Section 11. Township 6 South, Range 24 East

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CASE 7531: SW/4 Section 11, Township 6 South, Range 24 East
CASE 7532: SE/4 Section 27, Township 6 South, Range 24 East

CASE 7533: SW/4 Section 27, Township 6 South, Range 24 East

CASE 7534: NW/4 Section 34, Township 6 South, Range 24 East

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CASE 7515: (Continued from April 14, 1982, Examiner Hearing)

Application of Four Corners Gas Producers Association for designation of a tight formation, San Juan County, New Mexico. Applicant, in the above-styled cause, seeks the designation of the Dakota formation underlying all or portions of Townships 26 and 27 North, Ranges 12 and 13 West, Township 28 North, Range 13 West, Township 29 North, Ranges 13 through 15 West, and Township 30 North, Ranges 14 and 15 West, containing 164,120 acres, more or less, as a tight formation pursuant to Section 107 of the Matural Gas Policy Act and 18 CFR Section 271. 701-705.

- CASE 7586: Application of Standard Resources Corp. for designation of a tight formation, Chaves and Eddy Counties, New Mexico. Applicant, in the above-styled cause, seaks the designation of the Abo formation underlying all or portions of Township 15 South, Ranges 23 through 25 East, Township 19 South, Range 20 East, and Township 20 South, Range 20 East, all in Chaves County; in Eddy County: Township 16 South, Ranges 23 through 26 East, Township 17 South, Ranges 21, 23, 24, and 25 East, and Township 18 South, Ranges 21, 23, 24 and 25 East, Township 19 South, Ranges 21, 23, and 24 East, and Township 20 South, Ranges 21, 23, and 24 East, containing 460,800 acres, more or less, as a tight formation pursuant to Section 107 of the Natural Gas Policy Act and 18 CFR Section 271. 701-705.
- CASE 7587: In the matter of the hearing called by the Oil Conservation Division on its own motion for an order creating, abclishing, and extending vertical and horizontal limits of certain pools in Chaves, Sddy, and Lea Counties, New Mexico:
 - (a) CREATE a new pool in Lea County, New Mexico, classified as a gas pool for Wolfcamp production and designated as the Draper Mill-Wolfcamp Gas Pool. The discovery well is the HMG Oil Company Vaca Draw 16 State Well No. 1 located in Unit E of Section 16, Township 25 South, Range 33 East, NMPM. Said pool would COMDISE:

TOWNSHIP 25 SOUTH, RANGE 33 EAST, NMPM Section 16: W/2

(b) CREATE a new pool in Lea County, New Mexico, classified as a gas pool for Morrow production and designated as the Jabalina-Morrow Gas Pool. The discovery well is the Amoco Production Company Perro Grande Unit Well No. 1 located in Unit J of Section 6, Township 26 South, Range 35 East, MMPM. Said pool would comprise:

TOWNSHIP 26 SOUTH, RANGE 35 EAST, NMPM Section 6: E/2

(c) ABOLISH the Diamond Mound-Morrow Gas Fool in Chaves and Eddy Counties, New Mexico, as heretofore classified, defined, and described as:

TOWNSHIP 15 SOUTH, RANGE 27 EAST, NMPM Section 35: All

TOWNSHIP 15 SOUTH, RANGE 28 ZAST, NMPM Section 31: E/2

TOWNSHIP 16 SOUTH, RANGE 28 EAST, NMPM Section 3: Lots 1 through 16

Section 3: Lots 1 through 16
Section 4: Lots 1 through 16
Section 5: Lots 1 through 16
Section 6: Lots 1, 2, 7, 8, 9, 10, 15, 16, and S/2

(d) EXTEND the vertical limits of the Diamond Mound-Atoka Gas Pool in Chaves and Eddy Counties, New Mexico, to include the Morrow formation, and redesignate said pool to Diamond Mound-Atoka-Morrow Gas Pool, and extend the horizontal limits of said pool to include acreage from abolished Diamond Mound-Morrow Gas Pool and one additional well as follows:

TOWNSHIP 15 SOUTH, RANGE 27 EAST, NMPM Section 35: All

TOWNSHIP 15 SOUTH, RANGE 28 EAST, NMPH Section 31: E/2

TOWNSHIP 16 SOUTH, RANGE 27 EAST, NMPM Section 9: 5/2

TOWNSHIP 16 SOUTH, RANGE 28 EAST, NMPM Section 3: Lots 1 through 16

Section 4: Lots i through 16

Section 5: Lots 1 through 16 Section 6: Lots 1, 2, 7, 8, 9, 10, 15, 16, and S/2

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(e) EXTEMD the Burton Flat-Strawn Gas Pool in Eddy County, New Mexico, to include therein:

TOWNSHIP 20 SOUTH, RANGE 28 EAST, NMPM

Section 36: N/2

(f) EXTEND the Crow Flats-Horrow Gas Pool in Eddy County, New Mexico to include therein:

TOMMSHIP 17 SOUTH, RANGE 27 EAST, NNPM

Section 1:

Section 12: N/2

(g) EXTEND the South Culebra Bluff-Atoka Gas Pool in Eddy County, New Mexico, to include therein:

TOWNSHIP 23 SOUTH, RANGE 28 EAST, NMPM Section 10: All Section 11: W/2

Section 14: W/2 Section 15: W/2 Section 34: W/2

(h) EXTEND the South Empire-Morrow Gas Pool in Eddy County, New Mexico, to include

TOWNSHIP 17 SOUTH, RANGE 29 EAST, NNPN Section 17: N/2

(i) EXTERU the Golden Lane-Strawn Gas Pool in Eddy County, New Mexico, to include therein:

TOMMSHIP 20 SOUTH, PANGE 30 EAST, HMPM Section 28: All

(j) EXTEND the Kennedy Farms-Morrow Gas Fool in Eddy County, New Mexico, to include therein:

TOWNSHIP 17 SOUTH, RANGE 26 EAST, NMPM Section 10: M/2

(k) EXTEND the East LaRica-Morrow Gas Pool in Lea County, New Mexico, to include therein:

TOWNSHIP 18 SOUTH, RANGE 34 EAST, NRPM Section 36: S/2

TOWNSHIP 18 SOUTH, RANGE 35 EAST, NMPM Section 31: 5/2

(1) EXTEND the Little Box Canyon-Morrow Gas Pool in Eddy County, New Mexico, to include therein:

TOWNSHIP 21 SOUTH, RANGE 22 EAST, NMPM Section 18: E/2

(m) EXTEND the Malaga-Atoka Gas Pool in Eddy County, New Mexico, to include

therein:

therein:

TOWNSHIP 24 SOUTE, RANGE 28 EAST, NMPM Section 11: E/2

(n) EXTEND the South Millman-Morrow Gas Pool in Eddy County, New Mexico, to include

TOWNSHIP 19 SOUTH, RANGE 28 EAST, MMPM Section 16: M/2

(o) EXTEND the East Millman-Queen-Grayburg Pool in Eddy County, New Mexico, to include therein:

TOWNSHIP 19 SOUTH; RANGE 29 EAST, NMPM Section 7: ME/4

therein:

(p) EXTEND the Millman Strawn Gas Pool in Eddy County, New Mexico, to include therein:

TOWNSHIP 19 SOUTH, RANGE 28 EAST, NAPM Section 8: S/2

(q) EXTEND the West Nadine-Blinebry Pool in Lea County, New Mexico, to include

TOWNSHIP 20 SOUTH, RANGE 38 EAST, NAPH Section 5: SW/4

(r) EXTEND the Nest Osudo-Morrow Gas Pool in Lea County, New Mexico, to include therein:

TORRISHIP 20 SOUTH, RANGE 35 EAST, MMFM Section 11: 5/2 Section 12: 5/2

(s) EXTEND the Pecos Slope-Abo Gas Pool in Chaves County, New Mexico, to include therein:

TOMISHIP 4 SOUTH, RANGE 24 EAST, HMPN

Section 24: S/2 Section 25: All Section 26: E/2 Section 35: W/2 and NE/4 Section 36: W/2

TOWNSHIP 4 SOUTH, RANGE 25 EAST, WHEN Section 19: SW/4 Section 30: W/2 Section 31: NW/4

TOWNSHIP 5 SOUTH, RANGE 24 EAST, NRPM

Section 2: BW/4
Section 7: All
Section 8: All
Section 9: N/2 and SW/4
Section 16: W/2

Section 17 thru 20: Ali

Section 21: W/2 Section 28: W/2

Section 29: All

Section 30: All Section 31: M/2 Section 32: M/2 Section 33: MW/4

TOWNSHIP 5 SOUTH, RANGE 25 EAST, NMPM Section 1 thru 5: All Section 6: E/2 Section 7: SW/4 and E/2

Section 8 thru 12: All Section 14 thru 22: All

Section 23: N/2 Section 27: N/2 Section 28 thru 30: All

Section 31: NE/4
Section 32: N/2

Section 32: A/2 Section 33: All Section 34: All

TOWNSHIP 6 SOUTH, RANGE 24 ZAST, NMPM Section 2: All Section 11 thru 14: All

Section 12 thru 28: All Section 34: E/2 Section 35: All Section 36: All

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TOWNSHIP 6 SOUTH, RANGE 26 EAST, MRPM
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Section 4 thru 6: All Section 7 thru 8: All

Section 9: N/2 Section 17-thru 20: All Section 29 thru 32: All

TOMMSHIP 7 SOUTH, RANGE 24 EAST, HMPH Section 1: All Section 2: All Section 3: E/2 Section 9 thru 15: All

Section 22 thru 27: All Section 34 thru 36: All

TOMESBIP 7 SOUTH, RANGE 25 EAST, NNPM

Section 6: W/2 Section 7: S/2 Section 13: SW/4 Section 14: S/2

Section 15: S/2

Section 18 and 19: All

Section 20: S/2

Section 22 thru 27: All Section 29 thru 32: All Section 34 thru 36: All

TOWNSHIP 7 SOUTH, RANGE 26 EAST, MICH

Section 5: All Section 6: All Section 7 thru 10: All

Section 11: W/2

Section 15 thru 17: All

Section 18: H/2 Section 19 thru 22: All Section 28 thru 32: All

TOWNSHIP 8 SOUTH, RANGE 24 EAST, MMPM

Section 1 through 3: All Section 10: E/2 Section 11: All Section 12: All

TOWNSHIP 8 SOUTH, RANGE 25 EAST, NMPM Section 1 through 12: All Section 13 through 16: N/2

TOWNSHIP 8 SOUTH, RANGE 26 EAST, NMPM Section 6: W/2

(t) EXTERD the West Pecos Slope-Abo Gas Pool in Chaves County, New Mexico, to include therein:

TOWNISHIP 8 SOUTH, RANGE 22 EAST, NMPM Section 23: SE/4 Section 24: S/2 and NE/4 Section 25 through 27: Ali

Section 28: E/2

TOWNSHIP 8 SOUTH, RANGE 23 EAST, NHPM

Section 3 through 5: All
Section 6: N/2
Section 8 through 10: N/2
Section 17: W/2
Section 18: SE/4
Section 19: All

Section 19: All

Section 20: W/2 Section 29: W/2 Section 30: All Section 31: All Section 32: W/2

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TOWNSHIP 9 SOUTH, RANGE 23 EAST, NMPM Section 3: W/2

Section 4: All

Section 5: All

Section 6: E/2

Section 8: All

(u) EXTERD the East Red Lake-Queen-Grayburg Pool in Eddy County, New Mexico, to include therein:

TOWNSHIP 16 SOUTH, RANGE 28 EAST, NO Section 25: E/2 NE/4 and NE/4 SE/4

(w) EXTERD the Sand Ranch-Horrow Gas Pool in Chaves County, New Mexico, to include therein:

TOWNSHIP 10 SOUTH, RANGE 29 EAST, NMPM Section 26: All

(w) EXTEND the Sawyer-San Andres Associated Pool in Lea County, New Mexico, to include therein:

TOWNSHIP 10 SOUTH, RANGE 38 EAST, NMPM Section 4: SW/4

(x) EXTEND the Tom-Tom-San Andres Pool in Chaves County, New Mexico, to include

TOWNSHIP 8 SOUTH, RANGE 31 EAST, NHPH

(y) EXTEND the Turkey Track-Morrow Gas Pool in Eddy County, New Mexico, to include

TOWNSHIP 19 SOUTH, RANGE 29 EAST, NMPM

Section 2: W/2 Section 7: W/2

(z) EXTEND the Twin Lakes-San Andres Associated Pool in Chaves County, New Mexico, to include therein:

TOWNSHIP 8 SOUTH, RANGE 29 EAST, NMPM Section 18: M/2 SE/4 and SE/4 SE/4

(aa) EXTEND the South Vacuum-Wolfcamp Pool in Lea County, New Mexico, to include therein:

TOWNSHIP 18 SOUTH, RANGE 35 EAST, NMPM Section 16: SE/4

Docket No. 14-82

DOCKET: COMMISSION HEARING - MONDAY - MAY 17, 1982

OIL CONSERVATION COMMISSION - 9 A.M. RCOM 205 - STATE LAND OFFICE BUILDING, SANTA FE, NEW MEXICO.

CASE 7522: (DE NOVO)

Application of Santa Fe Exploration Co. for an unorthodox gas well location, Eddy County, New Mexico Applicant, in the above-styled cause, seeks approval of an unorthodox location 660 feet from the North and West lines of Section 14, Township 20 South, Range 25 East, Permo-Penn, Strawn, Atoka and Morrow formations, the N/2 of said Section 14 to be dedicated to the well.

Upon application of Chama Petroleum Company, this case will be heard De Novo pursuant to the provisions of Rule 1220.

Page 9 of 9 Commission Hearing -MONDAY - May 17, 1982

Docket 14-82

CASE 7476: (DE NOVO)

Application of Jack J. Grynberg for compulsory pooling, Chaves County, New Mexico. Applicant, in the above-styled Cause, seeks an order pooling all mineral interests down through and including the Abo formation, underlying two 160-acre gas spacing units, being the NE/4 and SE/4, respectively, of Section 12, Township 5 South, Range 24 East, each to be dadicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.

Upon application of Mesa Petroleum Company, this care will be heard De Novo pursuant to the provisions of Rule 1220.

CASE 7513: (DE NOVO)

Application of Mesa Petroleum Company for compulsory pooling, Chaves County, New Mexico. Applicant, in the above-styled cause, seeks an order pooling all mineral interests in the Abo formation underlying the SE/4 of Section 12, Township 5 South, Range 24 East, to be dedicated to a well to be drilled at a standard location thereon. Also to be considered will be the cost of drilling and completing said well and the allocation of the cost thereof as well as actual operating costs and charges for supervision, designation of applicant as operator of the well and a charge for risk involved in drilling said well.

Upon application of Mesa Petroleum Company, this case will be heard De Novo pursuant to the provisions of Rule 1220.

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April 7, 1982

Mr. Joe D. Ramey
Director
Oil Conservation Division
New Mexico Department of Energy
& Minerals
Post Office Box 2088
Santa Fe, New Mexico 87501

APR 07 1982

Re: Case 7522: Application of Santa Fe Exploration Company for an Unorthodox Gas Well Location, Eddy County, New Mexico

Dear Mr. Ramey:

Enclosed is the Application for Hearing De Novo of Chama Petroleum Company in the above referenced case.

Chama would appreciate this matter being set for Hearing De Novo before the full Oil Conservation Division at the earliest possible date.

You attention to this request is appreciated.

Very truly yours

William F. Carr

WFC:jh w/enc.

cc: Mr. Charles E. Nearburg (w/enc.) Ernest L. Padilla, Esq. (w/enc.)

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BEFORE THE

OIL CONSERVATION DIVISION

APR 07 1982

NEW MEXICO DEPARTMENT OF ENERGY AND MINERALS

IN THE MATTER OF THE APPLICATION OF SANTA FE EXPLORATION COMPANY FOR AN UNORTHODOX GAS WELL LOCATION, EDDY COUNTY, NEW MEXICO

CASE 7522

APPLICATION FOR HEARING DE NOVO

Comes now CHAMA PETROLEUM COMPANY, by through its undersigned attorneys, and states that it is a party adversely affected by Order No. R-6933 which was entered in the above-referenced case on April 5, 1982 and pursuant to Oil Conservation Division Rule 1220, hereby makes application for this case to be heard de novo before the Commission.

Respectfully submitted,
CAMPBELL, BYRD & BLACK, P.A.

William F. Carr

Post Office Box 2208

Santa Fe, New Mexico 87501

(505) 988-4421

Certificate of Service

I hereby certify that true copies the Application for Hearing De Novo were served on all opposing counsel of record on this day of April, 1982.

William F. Carr

STATE OF NEW MEXICO ENERGY AND MINERALS DEPARTMENT OIL CONSERVATION DIVISION

IN THE MATTER OF THE HEARING CALLED BY THE OIL CONSERVATION COMMISSION OF NEW MEXICO FOR THE PURPOSE OF CONSIDERING:

CASE NO.7522 DE NOVO Order No. R-6933-A

ORDER OF THE COMMISSION

BY THE COMMISSION:

This cause came on for hearing at 9 a.m. on Dure 25, 1982, at Santa Fe, New Mexico, before the Oil Conservation Commission of New Mexico, hereinafter referred to as the "Commission."

NOW, on this <u>day of Fine</u>, 1981, the Commission, a quorum being present, having considered the testimony presented and the 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.

That the applicant, Sontste Exploration (2), seeks income of an unorthouse gas well location 660 feet from the North line and 660 feet from the West line of Section 14, Township 20 South, Range 25 East, NIPM to tost the famo-Penn, Strawn Atoka and Morron for motions actors County, New Mexico.

(3) That the matter came on for hearing at 9 a.m. on Morch 3, 1982, at Santa Fe, New Mexico, before Examiner Daniel S.

Nutter and, pursuant to this hearing, Order No. R-6933 was issued on April 1-5, 1982, which granted: 1 ... application.

Noth restrictions, Sonte & 5.

S. W.

De Novo was made by Chains fetroking Company and the matter was set for hearing before the Commission.

(5) That the matter came on for hearing de novo on June 25, 1982.

Finding 57, 8,9 (6) That the evidence adduced at said hearing indicates that Division Order No. R-6933 entered April 6, 10823, should be seen de le fed.

(7) That Findings 10,112 hould be changed to read in their entirety as dollows:

"(10) That an offset operator appeared at the hearing and opposed approval of the proposed unorthodox focation without assessment of a penalty against production from the proposed wells but waived objection to the unorthodox location described above, i.e., 1786 feet from the North line and 1780 feet from the West line of Section 14.

That approval of the unorthodox location will improve applicant's geological prospect for encountering the Morrow formation in a thickened section of the Boyd Channel and will better enable it to produce the gas underlying the 1/2 of the aforesaid Section 1/4,

(18) That approval to drill the proposed well at the unorthodox location described in Finding No. (2) above, subject to the Production Limitation Factor, described in Finding No. (15) above, subject to the Production Limitation Factor, described in Finding No. (15) above, will not impair but will protect correlative rights, will not cause waste, and should be given.

(8) That Orders I and 2 should be changed to read in their entacts as follows:

"(1) That the applicant, Santa Fe Exploration Co., is hereby authorized to drill a well to test the Permo-Penn, Strawn, Atoka and Morrow formations at a point 660 feet from the North line and 660 feet from the West line of Section 14, Township 20 South, Range 25 East, NMPM, Eddy County, New Mexico subject to a Production Limitation Factor of 0.71 applicable as described below, as, in the alternative described below, as in the alternative described below. The West line of said Section 14 without penalty, and the West line of said Section 14 without penalty, in the N/2 of said Section 14

(2) That in the absence of any Special Rules and Regulations prorating production from the subject well, the following Special Rules and Regulations for a non-prorated gas well shall apply: if the male is drilled at the location fine described in Paragraph (1) shows:

(4) That the remainder of Division Order No. R-6933 should be offirmed.

IT IS THEREFORE ORDERED:

(1) That Findings 7, 8, and 9 in Division Order No. R-6933 entered April 5,1982, are well leted.

(2) That Findings 10, 11, and 18 in soil order pare change to read in their entirely endlines:

(10) That an offset operator appeared at the hearing and opposed approval of the proposed unorthodox location without assessment of a penalty against production from the proposed wells but waived objection to the unorthodox location described above, i.e., 1788 feet from the North line and 1780 feet from the West line of Section 14.

(b) That approval of the unorthodox location will improve applicant's geological prospect for encountering the Morrow formation in a thickened section of the Boyd Channel and will better enable it to produce the gas underlying the 1/2 of the aforesaid Section 3/4.

(18) That approval to drill the proposed well at the unorthodox location described in Finding No. (2) above, subject to the Production Limitation Factor, described in Finding No. (15) above, will not impair but

will protect correlative rights, will not cause waste, and should be given. "

(3) That Orders I and 2 in said Order No. R-6933 are changed to read in their ending as follows:

(1) That the applicant, Santa Fe Exploration Co., is hereby authorized to drill a well to test the Permo-Penn, Strawn, Atoka and Morrow formations at a point 660 feet from the North line and 660 feet from the West line of Section 14, Township 20 South, Range 25 East, NMPM, Eddy County, New Mexico, subject to a Production Limitation Factor of 0.71 applicable as described below, the N/2 of said Section 14

(2) That in the absence of any Special Rules and Regulations prorating production from the subject well, the following Special Rules and Regulations for a non-prorated gas well shall apply:

(4) That the remainder of soid Order No. R-6933 is affirmed.

(5) Jurisdiction