		Page 2
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11	INDEX	PAGE
12	Case Number 14966 Called	4
13	Opening Statement by Mr. Bruce	4
14	Opening Statement by Ms. Munds-Dry	5
15	Cimarex Energy Company's Case-in-Chief:	
16	Witnesses:	
17	Hilary R. Coder:	
18	Direct Examination by Mr. Bruce Cross-Examination by Commissioner Warnell	7 15
19	Meera Ramoutar:	
20	Direct Examination by Mr. Bruce	17
21	Cross-Examination by Commissioner Warnell Cross-Examination by Commissioner Balch	26 27
22	Jason W. Billings:	
23	Direct Examination by Mr. Bruce	30
24	Cross-Examination by Chairperson Bailey Redirect Examination by Mr. Bruce	34,35 35
25	-	

1	TNDEV (Cont.14)	Page 3
1 2	INDEX (Cont'd)	PAGE
3	GOG Operating IIGIs (Gonsha) Goss in Chief.	PAGE
	COG Operating, LLC's (Concho) Case-in-Chief:	
4	Jayne Krawietz:	
5	Direct Examination by Ms. Munds-Dry Cross-Examination by Mr. Bruce	37 50
6	Cross-Examination by Commissioner Warnell Cross-Examination by Commissioner Balch	51 52
7	Cross-Examination by Chairperson Bailey	53
8	Closing Argument by Mr. Bruce	55
9	Closed Session	58
10	Decision of the Commission	59
11	Proceedings Conclude	61
12	Certificate of Court Reporter	62
13		
14		
15	EXHIBITS OFFERED AND ADMITTED	
16	Cimarex Energy Company Exhibit Numbers 1 through 8	15
17	Cimarex Energy Company Exhibit Number 9	25
18	Cimarex Energy Company Exhibit Number 10	34
19	Cimarex Energy Company Exhibit Number 11	36
20		
21	COG/Concho Exhibit Numbers 1 through 5	50
22		
23		
24		
25		

- 1 (9:02 a.m.)
- 2 CHAIRPERSON BAILEY: I would call Case
- 3 Number 14966, which is the application of Cimarex Energy
- 4 Company for a nonstandard oil spacing and proration unit
- 5 and compulsory pooling in Chaves County, New Mexico.
- 6 Ask for appearances.
- 7 MR. BRUCE: Madam Chair, Jim Bruce of
- 8 Santa Fe representing Cimarex, and I have three
- 9 witnesses.
- 10 MS. MUNDS-DRY: Good morning, Madam Chair.
- 11 Ocean Munds-Dry for COG Operating, LLC, and I have one
- 12 witness.
- 13 CHAIRPERSON BAILEY: Do you have any
- 14 opening statements?
- MR. BRUCE: Yeah, just very briefly.
- 16 OPENING STATEMENT
- 17 MR. BRUCE: One thing this meeting has
- 18 accomplished, Madam Chair -- and this is the first time
- 19 I ever remember COG and Cimarex being on the same side
- 20 of an issue. But I just want to point out two things.
- 21 As you know, this is a pooling application
- 22 seeking the pooling of a 240-acre well unit in the
- 23 Abo-Wolfcamp Formation in Chaves County. The original
- 24 application was denied. I think the basic reason is
- 25 stated in Finding paragraph seven, where it says one of

- 1 the quarter-quarter sections had a reservoir that
- 2 appeared to pinch out, and the Division was concerned
- 3 about diluting the interest of the pooled owners by the
- 4 inclusion of less productive acreage in the unit. And I
- 5 would note up front and it was stated in my pre-hearing
- 6 statement, the well has been drilled, and we have new
- 7 data that shows that that quarter-quarter section that
- 8 the Division was concerned about is indeed productive.
- 9 And secondly -- and we will address this in
- 10 the hearing, but this is also why COG is here. The
- 11 240-acre well unit -- although most nonstandard units in
- 12 whatever formation, the Abo, the Yeso, the Bone Spring,
- 13 have been 160-acre well units, with advances in drilling
- 14 technology, more and more wells are being drilled with
- 15 longer well units, and we don't think there should be
- 16 any distinction between 160-, 240- or even a 320-acre
- 17 well unit, which are now being drilled in the Permian
- 18 Basin.
- 19 And as a result, we think this application
- 20 is proper and should be approved.
- 21 Thank you.
- 22 CHAIRPERSON BAILEY: Ms. Munds-Dry?
- 23 OPENING STATEMENT
- 24 MS. MUNDS-DRY: Thank you, Madam Chair.
- Indeed at this point today, we, COG, are

- 1 supporting Cimarex's application, which is something
- 2 that I never thought would come out of my mouth, so that
- 3 is something to celebrate, if nothing else, this
- 4 morning. We appreciate your time this morning. We are
- 5 supportive of Cimarex's application.
- 6 We do believe this is a matter of first
- 7 impression in front of this Commission in terms of
- 8 addressing a lateral that's longer than a mile, and so
- 9 for ease of reference, we refer to these as extended
- 10 laterals. So anything longer than a 160-acre spacing
- 11 unit in a project area, we refer to that as an extended
- 12 lateral. So we do have a lot of interest.
- 13 As Mr. Bruce referred to, the Division, I
- 14 think about two years ago, determined that a standard
- 15 spacing unit for -- for a horizontal well should be 160
- 16 acres. Since that time, Concho will show you that there
- 17 has been tremendous technological advances in drilling
- 18 horizontal wells and what we've learned about drilling
- 19 extended laterals. And we hope to show you this
- 20 compelling data today in support of the pooling for
- 21 extended laterals and encourage the Commission to allow
- 22 pooling.
- 23 And, really, we think the issue is not
- 24 establishing a standard spacing unit for a horizontal
- 25 well or a project area, whatever you may refer to it as

- 1 under the rules, but consider that whatever the length
- 2 is -- as you very well know, the Commission's duty is to
- 3 prevent waste and protect correlative rights, and if an
- 4 operator can show that whatever the length of lateral it
- 5 seeks to pool for will do those things, we would
- 6 encourage the Commission to allow those type of pooling
- 7 applications to be approved. And that's what we hope to
- 8 show you today.
- 9 Thank you.
- 10 CHAIRPERSON BAILEY: Would you like to call
- 11 your first witness?
- MR. BRUCE: Sure. Should we get them all
- 13 sworn in at once?
- 14 CHAIRPERSON BAILEY: Actually, we prefer to
- 15 do them one at a time.
- MR. BRUCE: Okay.
- 17 CHAIRPERSON BAILEY: Would you please stand
- 18 to be sworn?
- 19 HILARY R. CODER,
- 20 after having been first duly sworn under oath, was
- 21 questioned and testified as follows:
- 22 DIRECT EXAMINATION
- 23 BY MR. BRUCE:
- Q. Would you please state your name for the
- 25 record?

- 1 A. Hilary Coder.
- Q. And where do you reside?
- 3 A. Midland, Texas.
- Q. Who do you work for and in what capacity?
- 5 A. Cimarex Energy, landman.
- 6 Q. Have you previously testified before the
- 7 hearing examiners, the Division?
- 8 A. Yes, sir.
- 9 Q. Have you testified before the full Commission
- 10 yet?
- 11 A. No.
- 12 Q. Would you outline your educational and
- 13 employment background for the Commissioners?
- 14 A. I have a bachelor's in business, and I've been
- 15 a landman for eight years; three of those years were at
- 16 Cimarex.
- 17 Q. Does your area of responsibility at Cimarex
- 18 include this portion of southeast New Mexico?
- 19 A. It does.
- Q. And are you familiar with the land matters
- 21 involved in this case?
- 22 A. I am.
- MR. BRUCE: Madam Chair, I tender Ms. Coder
- 24 as an expert petroleum landman.
- 25 CHAIRPERSON BAILEY: She's so accepted.

- 1 Q. (BY MR. BRUCE) Ms. Coder, could you identify
- 2 Exhibit 1 for the Commission and identify the well we're
- 3 talking about today and the well unit?
- A. This is the plat representing the proposed
- 5 spacing unit for the Independence 8 Federal Com #1.
- 6 Q. And could you identify by legal description the
- 7 lands involved in the case?
- 8 A. This is the north half of the north half of
- 9 Section 9, Township 15 South, Range 31 East, and the
- 10 north half of the northeast quarter of Section 8,
- 11 Township 16 South, Range 31 East, Eddy County, New
- 12 Mexico.
- 13 Q. And so this is a 240-acre well unit?
- 14 A. Yes, sir.
- 15 O. What is the name of the well?
- 16 A. The Independence 8 Federal #1.
- 17 Q. And does Cimarex seek, besides approval of the
- 18 unit, to pool a couple of the uncommitted interest
- 19 owners into the well?
- 20 A. We do.
- 21 Q. And this is --
- MR. BRUCE: And, Madam Chair, I don't know
- 23 if the Division has ever come up -- it's all -- if you
- look at the well plats in the files, it's always
- 25 considered an Abo/Wolfcamp well. I don't know if the

- 1 Division has ever determined exactly what the pool is or
- 2 anything.
- Q. (BY MR. BRUCE) But is the spacing in the
- 4 Abo-Wolfcamp in this area on statewide rules 40-acre
- 5 spacing?
- 6 A. Yes.
- 7 Q. And is Exhibit 2 simply the C-102 for the well?
- 8 A. Yes, sir.
- 9 Q. Could you identify -- in looking at the C-102,
- 10 the well does have standard setbacks from the
- 11 quarter-quarter section line; does it not?
- 12 A. Correct.
- Q. Could you identify Exhibit 3 for the Commission
- 14 and discuss the working interest ownership and identify
- 15 the two parties who are being pooled?
- 16 A. Tract 1 is an interest that Cimarex owns 100
- 17 percent in the north half of the northeast quarter of
- 18 Section 8. Tract 2 is the north half-north half of
- 19 Section 9 where Cimarex owns a little over 75 percent of
- 20 the interest.
- There are two parties that we are looking
- 22 to force pool, which is Sigyn Lund and Clare Fraser.
- 23 Q. And both of these tracts are federal land?
- 24 A. They are.
- 25 Q. Has Cimarex been in contact with the BLM

- 1 regarding this application?
- 2 A. We have, and they are supportive.
- 3 Q. They support a 240-acre unit?
- 4 A. That's correct.
- 5 Q. And so Ms. Lund and Ms. Fraser are the only two
- 6 parties you seek to pool, correct?
- 7 A. That is correct.
- 8 Q. Let's discuss the effort to obtain voluntary
- 9 joinder of these interest owners in the well. First of
- 10 all, these two parties own -- subsequent witnesses will
- 11 have exhibits showing the wells in this area of the
- 12 pool, correct, the geology and the engineering?
- 13 A. Yes.
- 14 O. And a number of wells have been drilled out
- 15 here. Are these two parties -- do these two parties own
- 16 in a number offsetting tracts in addition to this well?
- 17 A. They do.
- 18 Q. And has Cimarex had to force pool these parties
- 19 several times over the last several years?
- 20 A. We have.
- Q. Could you identify Exhibit 4, and just identify
- 22 that for the Commission?
- A. Exhibit 4 is the well proposal that was sent to
- 24 the working interest owners in January of 2013.
- 25 O. And were there additional efforts to contact

- 1 them by Cimarex, whether by phone or e-mail, over the
- 2 last year and actually as to the other tracts over the
- 3 last several years?
- 4 A. Multiple attempts.
- 5 Q. In your opinion, has Cimarex made a good-faith
- 6 effort to obtain the voluntary joinder in this well?
- 7 A. We have.
- 8 Q. Could you identify Exhibit 5 and discuss the
- 9 estimated cost of the well?
- 10 A. Exhibit 5 is the AFE for the Independence 8
- 11 Federal #1. We have a dry-hole cost of 3,589,000. We
- have a completed well cost of 7,429,180.
- 13 Q. Cimarex has drilled a number of wells in this
- 14 pool; has it not?
- 15 A. We have.
- 16 Q. And has it been pretty accurate in estimating
- 17 costs of wells in this pool?
- 18 A. Yes, sir.
- 19 Q. And, in fact, there is an offsetting 240-acre
- 20 well unit; is there not?
- 21 A. That's correct.
- 22 MR. BRUCE: Madam Chair, immediately to the
- 23 south of this well unit, with their 240-acre well unit,
- 24 Cimarex operated the Independence 8 Fed Com Well #2, and
- 25 the pooling in that well was approved by Division Order

- 1 R-13520.
- Q. (BY MR. BRUCE) In your opinion, are these well
- 3 costs fair and reasonable and in line with the cost of
- 4 other wells drilled to this depth in this area of
- 5 New Mexico?
- 6 A. They are.
- 7 Q. Do you request that Cimarex Energy of Colorado,
- 8 a separate company, be appointed operator of the well?
- 9 A. We do.
- 10 Q. And what is the recommendation as to
- 11 supervision and administrative expenses?
- 12 A. 7,000 for drilling, 700 for producing.
- 13 Q. And are these the amounts also set forth in the
- 14 JOA with other interest owners?
- 15 A. That is correct.
- 16 Q. And are these amounts equivalent to those
- 17 normally charged by Cimarex and other operators in this
- 18 pool for wells of this depth?
- 19 A. Yes.
- Q. Do you request a maximum cost plus 200-percent
- 21 risk charge in the event interest owners go nonconsent
- 22 in the well?
- 23 A. Yes.
- Q. Do you request that the overhead rates be
- 25 adjusted periodically as provided by the COPAS

- 1 accounting procedure?
- 2 A. Yes.
- 3 Q. Were the uncommitted interest owners notified
- 4 of the original hearing?
- 5 A. Yes.
- 6 Q. And is that reflected in my Affidavit of Notice
- 7 marked as Exhibit 6?
- 8 A. Yes.
- 9 Q. And in the first hearing, neither of them
- 10 entered an appearance or showed up at the hearing; is
- 11 that correct?
- 12 A. That's correct.
- 0. And what is Exhibit 7?
- A. Exhibit 7 is a list of the offset operators and
- 15 interest owners.
- 16 Q. And were the offsets notified of the original
- 17 Division hearing in this case?
- 18 A. Yes, sir.
- 19 Q. And is Exhibit 8 simply my Affidavit of Notice
- 20 to the offsets?
- 21 A. Yes, sir.
- Q. Did any of the offsets show up and object at
- 23 the original hearing in this case?
- 24 A. They did not.
- Q. Were Exhibits 1 through 8 either prepared by

- 1 you or compiled from company business records?
- 2 A. They were.
- Q. And in your opinion, is the granting of this
- 4 application in the interest of conservation and the
- 5 prevention of waste?
- 6 A. It is.
- 7 MR. BRUCE: Madam Chair, I'd move the
- 8 admission of Cimarex Exhibits 1 through 8.
- 9 CHAIRPERSON BAILEY: They will be admitted.
- 10 (Cimarex Exhibit Numbers 1 through 8 were
- offered and admitted into evidence.)
- MR. BRUCE: I have no further questions of
- 13 the witness.
- 14 MS. MUNDS-DRY: I have no questions of
- 15 Ms. Coder. Thank you.
- 16 CHAIRPERSON BAILEY: Mr. Warnell, do you
- 17 have any questions?
- 18 COMMISSIONER WARNELL: Yes, I have a
- 19 question or two.
- 20 CROSS-EXAMINATION
- 21 BY COMMISSIONER WARNELL:
- Q. In Section 8 -- I believe maybe that's in
- 23 Exhibit 3 -- the north half of the northwest quarter --
- 24 A. Yes, sir.
- Q. -- is that fee, federal or state land?

- 1 A. I believe it's -- I believe it's fee lands. I
- 2 know Marshall & Winston is or was the owner of that
- 3 tract. I'm not sure if they owned it, the mineral
- 4 interests, or if they owned the lease, but to my
- 5 knowledge, I believe it's mineral.
- 6 Q. So Marshall & Winston owns the northeast -- the
- 7 northwest quarter?
- 8 A. Yes, sir.
- 9 MR. BRUCE: Commissioner, if you look at
- 10 Exhibit 8, the Midland Map Company plat, I think you'll
- 11 see it is a fee tract.
- 12 COMMISSIONER WARNELL: Exhibit 8?
- MR. BRUCE: Exhibit 1. Excuse me. Exhibit
- 14 1. You'll see that the northeast quarter is U.S. land
- 15 and the rest --
- 16 COMMISSIONER WARNELL: Mr. Bruce, you have
- 17 no idea what I see there. That's pretty hard to see.
- 18 (Laughter.)
- MR. BRUCE: Well, if it's federal or state,
- 20 you'll see "state" or "U.S." listed underneath, at the
- 21 bottom of the tract.
- 22 COMMISSIONER WARNELL: I do see it.
- Thank you. I have no further questions.
- 24 COMMISSIONER BALCH: I have no questions.
- 25 CHAIRPERSON BAILEY: And I have no

- 1 questions.
- You may be excused.
- 3 Would you call your next witness?
- 4 MR. BRUCE: Call Meera Ramoutar. And that
- 5 is spelled R-A-M-O-U-T-A R.
- 6 MEERA RAMOUTAR,
- 7 after having been first duly sworn under oath, was
- 8 questioned and testified as follows:
- 9 DIRECT EXAMINATION
- 10 BY MR. BRUCE:
- Q. Will you please state your full name and city
- 12 of residence?
- 13 A. Meera Ramoutar, Midland, Texas.
- 14 Q. And who do you work for and in what capacity?
- 15 A. Cimarex Energy as a geologist.
- Q. You testified in the original hearing in this
- 17 case before the Division; did you not?
- 18 A. I did.
- 19 Q. Have you previously testified before the full
- 20 Commission?
- 21 A. No.
- Q. Would you please discuss your educational and
- 23 employment background?
- A. I have a bachelor's -- a master's in geology.
- 25 The master's is from the University of Texas. I've

- 1 worked for Cimarex for almost five years.
- Q. Does your area of responsibility at Cimarex
- 3 include this portion of southeast New Mexico?
- 4 A. It does.
- 5 Q. And are you familiar with the geologic matters
- 6 involved in this case, and more particularly in this
- 7 particular well?
- 8 A. Yes, sir.
- 9 MR. BRUCE: Madam Chair, I'd tender
- 10 Ms. Ramoutar as an expert petroleum geologist.
- 11 CHAIRPERSON BAILEY: She's accepted.
- 12 Q. (BY MR. BRUCE) Ms. Ramoutar, you stapled all of
- 13 your exhibits together and marked it as Exhibit 9?
- 14 A. Yes, sir.
- 15 Q. Could you identify -- go to the first page of
- 16 the exhibit --
- 17 A. Okay.
- 18 Q. -- couple of plats, and go into a little detail
- 19 for the Commissioners on what this shows.
- 20 A. Sure. So the first page -- as we flip from the
- 21 title page, we've got two maps and a schematic on that
- 22 page. I have labeled -- these are net porosity
- 23 isopachs, and this is -- you know, we've contoured these
- 24 on 20-foot contour intervals, and we use these maps as a
- 25 tool for finding the reservoir rock we want to target.

- 1 Superimposed on the net porosity isopach in a faint gray
- 2 is a structure map. That area basically is showing that
- 3 our structure does increase. We do get deeper as we
- 4 move to the south and east, if you will.
- 5 I've highlighted, also, the well in
- 6 question, which is in red. It is labeled on the
- 7 Independence lease.
- 8 In addition to that, of interest on this
- 9 particular page, I've also identified, in a hazy blue,
- 10 what we term the pinch-out in this area, and that is
- 11 directly linked to the schematic that is right next to
- 12 these two plats. What I'm trying to show here is the
- 13 depositional model that we use in this area, which is,
- 14 we have impermeable rock and we've got, you know,
- 15 reservoir rock that pinches out between those two --
- 16 impermeable layers trapping oil and gas. And the closer
- 17 we are to the pinch-out, without moving further down the
- 18 pinch-out, the better the reservoir will produce, as far
- 19 as we are concerned.
- On the schematic, you can see here, I
- 21 believe are the impermeable layers in gray, and then you
- 22 have -- within those two impermeable layers, I've
- 23 labeled the position of the oil as we interpret it, and
- 24 porous -- as the reservoir rock, which is porous and
- 25 permeable.

- Now, as we move closer to the pinch-out,
- 2 which is highlighted in the hazy blue on the plats,
- 3 that's where we want to be, because that's where the
- 4 accumulation of oil is that we want to target. As we
- 5 move further away from that pinch-out, we do have porous
- 6 rock, but it may not be oil saturated; it may not be
- 7 something we want to target.
- 8 Q. And does Cimarex have an engineer here to
- 9 discuss some production data from the wells near the
- 10 pinch-out?
- 11 A. Yes, sir.
- 12 Q. Now, looking at this, the top one is the March
- 13 2013 interpretation. That's what you -- that was the
- 14 interpretation when you first went to hearing on this
- 15 matter?
- 16 A. Yes, sir. And so both plats were labeled
- 17 "March 13th, 2013 Interpretation," and then the July
- 18 2013 results.
- 19 And as Mr. Bruce has said, we have drilled
- 20 this well. We drilled it in July. The first map, you
- 21 have that hazy line, which is my pinch-out, if you will,
- 22 and it is hazy simply because the data we do have, it is
- 23 not a definitive science. And so we are saying, within
- 24 this band of haziness, we expect our pinch-out to be.
- 25 And so in testifying in March, I think the Commission

- 1 [sic] was very concerned about us starting our lateral
- 2 in an area where there was little to no pay mapped.
- What I'm showing in the July 2013 results
- 4 is that that well did come in. We did get data from
- 5 that well. We logged it, had a pilot hole through the
- 6 interval of interest, and that will lead us to our next
- 7 exhibit on the following page. But, basically, just the
- 8 movement of that pinch-out line ties into the well
- 9 results that we had in drilling that well in July.
- 10 Q. And, again, just to the south is the
- 11 Independence 8 #2, which has been drilled and completed,
- 12 and there is substantial production data on that well?
- 13 A. Yes, sir.
- Q. One other thing. By drilling this well, has
- that opened up the possibility of drilling the well up
- 16 to Section -- in Section 4, up to the north?
- 17 A. It has.
- 18 Q. And one thing I didn't ask you is, the yellow
- 19 indicates Cimarex acreage; does it not?
- 20 A. It indicates Cimarex acreage or acreage that
- 21 Cimarex has an interest in in this area.
- Q. Let's move on to your cross sections --
- 23 A. Okay.
- Q. -- on the next couple of pages. Why don't you
- 25 discuss those for us?

- 1 A. Sure. The previous page we talked about, you
- 2 know, the two interpretations that we had map-wise. And
- 3 so this is the two -- I'm just showing you here the
- 4 cross section of the well logs that we have in this area
- 5 and the difference in interpretation.
- Now, the top one is the March 2013
- 7 interpretation, which I showed at the previous hearing,
- 8 basically showing that we thought that we would
- 9 encounter some type of reservoir [sic] in that -- in
- 10 that pilot hole, in that surface location, and we were
- 11 drilling to what's established pay that we have control
- 12 in other wells.
- So the cross section goes from west to
- 14 east. And you can see here. The index map shows you
- 15 that our eastern control is quite a ways away, but we
- 16 did have four feet of pay just to the south and west of
- 17 where our surface was going to be. And we have 24 feet
- 18 of pay, you know, a significant ways away from the
- 19 lateral.
- Now, in the July 2013 results, all I've
- 21 done is basically superimposed the well results that we
- 22 did get from logging that pilot hole for the
- 23 Independence well in question. As you can see here, we
- 24 have three feet of pay that was picked in that well. So
- 25 there is, in fact, reservoir rock where we targeted that

- 1 surface-hole location, drilling to what's more reservoir
- 2 rock to the east.
- And the following slide is just the blowup
- 4 of that second cross section, if you will, just having
- 5 you, you know, take a closer look at where the reservoir
- 6 rock is. It's highlighted in yellow. So you can see
- 7 here we have four feet of pay from Marshall & Winston's
- 8 Medlin 18 Fed Com, and then our Independence well came
- 9 in with three feet of pay, and the Taurus well, which is
- 10 to the east of us, with 24 feet of pay.
- Now, you can see, you know, our closest
- 12 analog is that Marshall & Winston well, which has one
- 13 foot more reservoir rock pay than our well. And the
- 14 production out of that interval of interest that we are
- also targeting to date is 120,511 barrels of oil.
- 16 Q. So in that well, near the pinch-out, it was
- 17 quite a productive well?
- 18 A. It is.
- 19 Q. It is quite a --
- 20 A. It is, yes.
- Q. And then finally the last two pages, what do
- 22 they show?
- 23 A. The last two pages are mud logs from the well,
- 24 and so the first page is titled "Mud Log." It shows
- 25 throughout the lateral of the Independence Fed, and

- 1 basically I've just kind of -- I've chopped up the
- 2 horizontal portion, the lateral of the well. And so you
- 3 can see here that I've highlighted everything that's
- 4 good cut, and for us, good cut is very indicative of
- 5 having good reservoir rock and having it be productive.
- And so you can see here that we do have
- 7 good cut. The red is our wellbore, and the very top --
- 8 I guess the very top part of the diagram shows you our
- 9 wellbore landing, and going basically flat for the rest
- 10 of the lateral. You can see here that as we landed
- 11 within the first thousand foot, we did have quite a
- 12 few -- quite significant shows, if you will, which is us
- 13 interpreting good cut throughout the mud log. And the
- 14 shows do decrease as we -- as we go throughout the
- 15 lateral, as you can see with the occurrence of the green
- 16 triangles.
- So even though we talked about -- in the
- 18 previous slides, we talked about us drilling to what is
- 19 thicker pay, more reservoir, we did drill to what is
- 20 thicker pay, but the shows in the lateral decreased as
- 21 we moved away from our surface towards our bottom hole.
- 22 And then the slide that follows that
- 23 basically is a zoomed-in version for the first thousand
- 24 foot of horizontal, if you will, which was the area of
- 25 concern about it not being productive. And this was the

- 1 only place I had in my mud log that had oil in the
- 2 shakers, and basically that's oil coming up from the
- 3 reservoir. And that happened within the first thousand
- 4 foot of the horizontal. So that was very encouraging
- 5 for us.
- 6 Q. In looking at the mud logs, would each
- 7 quarter-quarter section of the well unit have productive
- 8 reservoir?
- 9 A. It would have productive reservoir, some more
- 10 productive than others, but each quarter-quarter would
- 11 have productive reservoir.
- 12 Q. And, again, based on Cimarex's reservoir model
- 13 and the results, which, again, we'll get to here in a
- 14 minute, does Cimarex believe it's favorable to build the
- 15 well up near the pinch-out?
- 16 A. We certainly do. That makes this play work.
- 17 Q. Was Exhibit 9 prepared by you?
- 18 A. Yes, sir.
- 19 Q. And in your opinion, is the granting of this
- 20 application in the interest of conservation and the
- 21 prevention of waste?
- 22 A. Yes, sir.
- MR. BRUCE: Madam Chair, I'd move the
- 24 admission of Exhibit 9.
- 25 CHAIRPERSON BAILEY: It is admitted.

In addition to that, we do have offset

25

- 1 production that the engineer will get into that tells us
- 2 that there is production offset us [sic] in many
- 3 difficult areas that would allude to us drilling this
- 4 well and having production out of it.
- 5 COMMISSIONER WARNELL: No more questions.
- 6 CHAIRPERSON BAILEY: Commissioner Balch?
- 7 COMMISSIONER BALCH: Just one question.
- 8 Thank you.
- 9 CROSS-EXAMINATION
- 10 BY COMMISSIONER BALCH:
- 11 Q. The zero contour between your March and the
- 12 July 2013 interpretation --
- 13 A. Yes.
- Q. -- the March interpretation was primarily based
- 15 on seismic?
- 16 A. It was a combination of seismic and well
- 17 control. And so on the plats that you're looking at,
- 18 the black numbers that are just below the laterals,
- 19 those are our well-log picks, if you will. So you can
- 20 see that Medlin well that I referred to in the cross
- 21 section of four feet of pay. And then the next closest
- 22 logs that we have -- because we don't really have a lot
- 23 of control towards that northern -- as we move north and
- 24 east, of the pinch-out. A lot of the wells have been
- 25 drilled in the southern part, and a lot of what we

- 1 interpret as the pinch-out.
- Q. Okay. So for your first well, the one that's
- 3 been drilled to the south --
- 4 A. Yes, sir.
- 5 Q. -- that's four feet of pay?
- 6 A. That's what we interpret it as. We attempted
- 7 to get a pilot hole on that, but we had well-control
- 8 issues, and so we could not get a log to bottom on that
- 9 well. And so getting the pilot hole on the
- 10 Independence, that is in question today, the one in red,
- 11 was very important for us.
- 12 Q. And you move that contour 1,000 feet?
- A. Potentially. Because of the -- well, it's four
- 14 feet, and then this is three here (indicating). So I
- 15 shifted it up based on what we saw in the pilot hole.
- 16 Q. So is that a hand contour or --
- 17 A. It is a hand contour.
- 18 O. You have good confidence in moving that?
- 19 A. I do. You know, we do have -- like I said,
- 20 it's a combination of seismic and geology, and so my
- 21 geophysicist -- well, we don't have one on staff
- 22 anymore, but the previous interpretation we had from the
- 23 last geophysicist, we used that, you know, in tandem
- 24 with our well control. Of course, well control -- well
- 25 logs and production are, you know, what we primarily try

- 1 to use out here.
- Q. How close is your well control [sic] to the
- 3 northeast?
- 4 A. In Section 3? If you look at the July -- so
- 5 the Leo Fee Fed Com #1, which was drilled by COG, in the
- 6 south half -- the north half of the south half of
- 7 Section 3 is my closest well control, and that's 32 --
- 8 sorry -- south half-south half of Section 3 is my
- 9 closest control to the north, and that has 32 feet of
- 10 pay. And that gave me the confidence to shift that.
- 11 Q. Do you have anything north of that zero
- 12 contour?
- 13 A. No. I do have a dry hole that is -- was
- 14 drilled by someone else that is north of that.
- 15 Q. How far north?
- 16 A. I think just in Section 14-31, so about
- 17 two-and-a-half miles from our -- bottom of our hole, and
- 18 that was drilled by Marshall & Winston.
- MR. BRUCE: Dr. Balch, I thought -- I
- 20 thought it was on there, but it is --
- 21 COMMISSIONER BALCH: That's okay.
- 22 Two-and-a-half miles to the north.
- THE WITNESS: Yeah.
- 24 MR. BRUCE: But it is in Section 35 of 14
- 25 South, 31 East. There is a -- in the south half-south

- 1 half, there is a Marshall & Winston dry hole.
- 2 COMMISSIONER BALCH: Thank you.
- 3 CHAIRPERSON BAILEY: And I have no
- 4 questions. You may be excused.
- 5 And your third witness?
- 6 MR. BRUCE: Jason Billings.
- 7 JASON W. BILLINGS,
- 8 after having been first duly sworn under oath, was
- 9 questioned and testified as follows:
- 10 DIRECT EXAMINATION
- 11 BY MR. BRUCE:
- 12 Q. Mr. Billings, where do you reside?
- 13 A. Midland, Texas.
- 14 Q. Who do you work for?
- 15 A. Cimarex.
- Q. And what is your job there?
- 17 A. Reservoir engineer.
- 18 Q. Have you previously testified before the
- 19 Commission?
- 20 A. No.
- Q. Would you summarize your education and
- 22 employment background?
- 23 A. I have a bachelor's in chemical engineering.
- 24 I've worked in the industry since -- the oil industry
- 25 since 1998, and I'm a Registered Professional Engineer

- 1 in the state of Alaska.
- Q. How long have you been at Cimarex?
- A. Six months.
- 4 Q. And have you reviewed the engineering data, the
- 5 production data from wells in this pool near the
- 6 Independence 8 #1?
- 7 A. Yes.
- 8 Q. And are you familiar with the reservoir
- 9 engineering in this area?
- 10 A. Yes.
- 11 MR. BRUCE: Madam Chair, I tender
- 12 Mr. Billings as an expert reservoir engineer.
- 13 CHAIRPERSON BAILEY: He's accepted.
- Q. (BY MR. BRUCE) Mr. Billings, could you identify
- 15 Exhibit 10 for the Commissioners and run through those
- 16 couple of --
- 17 A. Right. After the title page, the first exhibit
- is a -- is a map of net pay with ten-foot contours for
- 19 each -- for the reservoir -- net reservoir. And then
- 20 the circles -- the green circles on the map are
- 21 estimated oil recoveries for the particular well. The
- 22 bigger the circle, the higher the oil recovery. And the
- 23 scale goes from, you know, zero to half a million
- 24 barrels of oil estimated recovery.
- 25 And what I highlight on this is -- as you

- 1 can note, as you get closer to the pinch-out, the well
- 2 recoveries are larger than as when you back off, even
- 3 though, you know, there are some -- within a 30-foot
- 4 contour. So there is more net pay, but the wells are
- 5 not as productive as the wells along the pinch-out.
- 6 Q. And looking at some of these wells up in
- 7 Section 3, I believe there is a Cimarex well in the
- 8 north half of Section 3, correct?
- A. Correct.
- 10 Q. Now, in the south half of Section 3, there are
- 11 a couple of wells. Were those originally drilled by
- 12 COG?
- 13 A. Correct.
- 14 Q. And they all have pretty good productivity even
- 15 though they're near the edge?
- 16 A. Correct.
- 17 Q. In looking at this -- also up in Section 35, is
- 18 that the dry hole of Marshall & Winston in the south
- 19 half of the south half?
- 20 A. Correct.
- Q. Looking at some of these other wells over in
- 22 Section 8 and Section 18 -- now, in Section 18, Cimarex
- 23 has some wells. Again, there are some stand-up wells
- 24 that are near the pinch-out; are there not?
- 25 A. Yes.

- 1 Q. But looking overall at this, it appears that
- when you're in the heart of the reservoir, you don't get
- 3 the same recovery that you do near the pinch-out?
- 4 A. Correct.
- 5 Q. What about page 2?
- 6 A. This is a comparison of a few of these laterals
- 7 that are along the pinch-out. So up in the upper right,
- 8 the wells that I'm plotting in the bar chart are
- 9 signified in the blue. And what this is showing -- what
- 10 I have is a graph of -- or a plot of how much cumulative
- 11 liquid production -- so it's oil plus water -- the well
- 12 has accumulated -- these wells have accumulated in their
- 13 first year of production. The blue bars are one-mile
- 14 laterals, and the red bar is the 1.5-mile laterals.
- And you can see, for total productivity,
- 16 these sets of wells are showing that the one-and-a-half-
- 17 mile laterals are anywhere from, you know, 27 percent
- 18 better to over 100 percent better than the one-mile
- 19 laterals. And these are comparing wells, you know,
- 20 along the pinch-out, which we know are more productive.
- 21 So I tried to keep consistent.
- 22 Q. And that is why Cimarex and other operators are
- 23 looking at drilling laterals longer than a mile in
- 24 length?
- 25 A. Correct.

- 1 Q. Was Exhibit 10 prepared by you?
- A. Yes.
- 3 Q. And in your opinion, is the granting of this
- 4 application in the interest of conservation and the
- 5 prevention of waste?
- 6 A. Yes.
- 7 MR. BRUCE: Madam Chair, I move the
- 8 admission of Exhibit 10.
- 9 CHAIRPERSON BAILEY: It is admitted.
- 10 (Cimarex Exhibit Number 10 was offered and
- admitted into evidence.)
- MR. BRUCE: And I pass the witness.
- MS. MUNDS-DRY: No questions.
- 14 CHAIRPERSON BAILEY: Mr. Warner?
- 15 COMMISSIONER WARNELL: I have no questions.
- 16 COMMISSIONER BALCH: I have no questions.
- 17 CROSS-EXAMINATION
- 18 BY CHAIRPERSON BAILEY:
- 19 O. What's the IP on the well?
- 20 A. Which well, ma'am?
- 21 Q. The #8.
- 22 A. IP on the #8 --
- 23 Q. On the #2 -- do you have an IP on #1?
- 24 A. IP? It's about 200 barrels a day.
- 25 Q. 200?

- 1 MR. BRUCE: Madam Chair, in rummaging
- 2 through my file in preparation for the hearing -- and
- 3 this is totally up to the -- I do have something which
- 4 Mr. Billings can identify. May I approach the witness,
- 5 Madam Chair?
- 6 CHAIRPERSON BAILEY: Go ahead.
- 7 REDIRECT EXAMINATION
- 8 BY MR. BRUCE:
- 9 Q. Mr. Billings, could you identify that?
- 10 A. This is the production of the Independence #2.
- 11 Q. So originally it started off --
- 12 A. I was referring to the -- go ahead.
- Q. Oh. But the Independence 8 #2 originally
- 14 started off close to 1,000 barrels a day?
- 15 A. Correct.
- Q. And it has been a very good well for Cimarex?
- 17 A. Correct.
- 18 Q. And is this exhibit compiled from company
- 19 records?
- 20 A. I believe so, yes.
- 21 MR. BRUCE: Madam Chair, I'd move the
- 22 admission of Exhibit 11.
- 23 CONTINUED CROSS-EXAMINATION
- 24 BY CHAIRPERSON BAILEY:
- Q. And you did say #1 had 200 per day?

- 1 A. Yes, ma'am.
- 2 CHAIRPERSON BAILEY: Yes, Exhibit 11 is
- 3 admitted.
- 4 (Cimarex Exhibit Number 11 was offered and
- 5 admitted into evidence.)
- 6 CHAIRPERSON BAILEY: You may be excused.
- 7 Do you have any other witnesses?
- 8 MR. BRUCE: I do not have any other
- 9 witnesses.
- 10 I would ask one thing. If the
- 11 Commissioners want the witnesses to stick around for
- 12 further questioning, that's fine. If not, I would ask
- 13 that they be excused. All of the witnesses have their
- 14 quarterly meetings tomorrow. They'd like to get back to
- 15 Midland as soon as possible to prepare for their bosses
- 16 to ask questions of them.
- 17 CHAIRPERSON BAILEY: Tough day for all,
- 18 too.
- 19 (Laughter.)
- 20 CHAIRPERSON BAILEY: Do you anticipate that
- 21 we would have any other questions of these witnesses?
- 22 COMMISSIONER BALCH: I don't.
- 23 CHAIRPERSON BAILEY: Then they may take
- 24 off.
- MR. BRUCE: Thank you very much.

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- 1 Commission?
- 2 A. I have not.
- 3 Q. Would you please review your education and work
- 4 history for the Commissioners?
- 5 A. Yes. I have a bachelor of science in chemical
- 6 engineering from Oklahoma State University, an MBA from
- 7 the University of Tulsa, and a master's in pastoral
- 8 studies from Loyola University North.
- 9 MS. MUNDS-DRY: I just thought that was
- 10 interesting, so I asked her to include it.
- 11 Q. (BY MS. MUNDS-DRY) And if you could also then
- 12 review your work history.
- 13 A. Yes. Directly after undergrad, I worked for
- 14 Arco Oil & Gas Company in Tulsa as a reservoir engineer.
- 15 I also worked in Denver and Midland for Arco as a
- 16 reservoir engineer and a gas contract engineer. I
- 17 worked part-time for Pennzoil Oil & Gas in Midland as a
- 18 reservoir engineer. And for the past five years, I've
- 19 worked for COG as a reservoir engineer, and now as a
- 20 lead reservoir engineer.
- Q. And as a lead reservoir engineer, what are your
- 22 duties?
- 23 A. Well, like the rest of the reservoir engineers,
- 24 I have responsibilities as a reservoir engineer for a
- 25 part of the Delaware Basin in Lea County. But as a lead

- 1 reservoir engineer, I'm also responsible for corporate
- 2 reporting, budgeting, preparing -- supervising the
- 3 preparation of year-end reserves and so forth for the
- 4 whole asset team.
- 5 Q. Have you had a chance to review Cimarex's
- 6 application in this case?
- 7 A. Yes.
- 8 Q. And you've become familiar, fairly, with the
- 9 application?
- 10 A. Mostly, yes.
- MS. MUNDS-DRY: Madam Chair, we tender
- 12 Ms. Krawietz as an expert in reservoir engineering
- 13 matters.
- 14 CHAIRPERSON BAILEY: You are accepted.
- 15 Q. (BY MS. MUNDS-DRY) If you could please turn to
- 16 what's been marked as Concho Exhibit Number 1 and
- 17 explain what this plat show to the Commissioners.
- 18 A. It is a map that shows part of Eddy and Lea
- 19 Counties in southeast New Mexico. The red line
- 20 differentiates between the New Mexico Shelf on the north
- 21 part of the map and the Northern Delaware Basin on the
- 22 inside of the red line.
- The orange lines show areas of potash
- 24 mining.
- The horizontal well symbols show all the

- 1 horizontal wells that were permitted or spud in 2013 by
- 2 all operators in this area.
- The green well symbols indicate one-mile
- 4 laterals, and the red symbols indicate extended laterals
- 5 or any wells that were over a mile in length.
- The second map is the same thing, but only
- 7 shows COG's permitted or spud laterals and extended
- 8 laterals.
- 9 Q. And let's focus in on this COG map for a minute
- 10 if we could. How many horizontal wells has your team,
- 11 the Basin Team, drilled in 2013?
- 12 A. Thus far we have drilled 83.
- Q. And how many does the Basin Team plan to drill
- 14 this year?
- 15 A. We will have drilled 121 by the end of the
- 16 year.
- 17 Q. And what about for 2014, how many do you plan
- 18 to drill?
- 19 A. We plan to drill 172 wells, all of which will
- 20 be horizontal but one.
- Q. And how many of the wells drilled in 2013 are
- 22 horizontal wells?
- A. There will be a total of 17.
- Q. For all horizontal wells? I'm talking about
- 25 how many of them will be horizontal.

- 1 A. Oh. All of them are horizontal for 2013. I'm
- 2 sorry.
- O. And then let's talk about the extended
- 4 laterals. In 2013, how many of them were longer than a
- 5 mile or extended laterals?
- 6 A. 17.
- 7 Q. And that's a total that we will have drilled
- 8 for the year?
- 9 A. Right.
- 10 Q. What about for 2014, how many extended laterals
- 11 do we have planned?
- 12 A. 26.
- Q. And have you and your team studied the costs
- 14 and rate of recovery for the longer laterals that Concho
- 15 has drilled thus far?
- 16 A. Yes, we have.
- 17 Q. And if you could just orient the Commissioners
- 18 on the map where those studies have taken place.
- 19 A. Okay. Some of the wells were in the state-line
- 20 area in the Bone Spring and the Avalon Shale, and that
- 21 would be just the bottom third of the map. Other wells
- 22 in the study area were in the Red Hills Avalon area,
- 23 which would be in the east-central part of the map.
- Q. Thank you.
- Let's turn to Concho's Exhibit Number 2.

- 1 A. Okay.
- Q. If you could explain these schematics to the
- 3 Commissioners.
- 4 A. These are very simple schematics trying to show
- 5 how much of a horizontal well can be completed, and this
- 6 is showing two section lines. We're assuming 330-foot
- 7 offsets from the leaseline and a 600-foot curve between
- 8 the vertical well on the horizontal part of the well.
- 9 When you look at one section, the completed
- 10 lateral length would be the 5,280 feet of the section,
- 11 minus the 330 feet at each end for the leaseline offset,
- 12 and then 600 feet of the lateral, which leaves about
- 13 4,020 feet completable lateral length. Now, that can be
- 14 more or less depending on the curve, how far up the
- 15 curve is the lease, leaseline offsets, et cetera. But
- 16 this is just an example. So to complete the two
- 17 sections with two wells, you could get a completable
- 18 lateral of 8,040 feet.
- 19 The next page of this schematic shows the
- 20 same two sections but with a one two-mile lateral. In
- 21 that case, you could have a completable lateral length
- 22 of 9,300 feet. You also don't have the additional costs
- 23 of an additional vertical section of the well.
- Q. And given that these are just cartoons,
- 25 essentially --

- 1 A. Yes.
- Q. -- but when you're looking at the schematics
- 3 and as you've explained the completed or treatable
- 4 lateral length, what is this showing?
- 5 A. This is just showing, if you drill a longer
- 6 lateral over leaselines, you don't have the leaseline
- 7 offset or an extra curve. You would just get greater
- 8 treatable lateral length and are able to better develop
- 9 the minerals under these leases.
- 10 Q. So, in theory, more reserves?
- 11 A. Yes.
- 12 Q. Let's go to Concho Exhibit Number 3. What is
- 13 this graph showing?
- 14 A. This is just simply showing that you get more
- 15 recoverable reserves the longer the lateral length.
- Q. And so on the left-hand side of the graph
- 17 there, you're showing UR --
- 18 A. Uh-huh.
- 19 Q. -- and compared to lateral length?
- 20 A. Right.
- Q. And, again, this is in the state-line area,
- 22 which you show the Commissioners on the map?
- 23 A. Yes. Uh-huh.
- Q. Let's actually look at some actual numbers,
- 25 then, since this is just a general graph. Let's go to

- 1 Concho Exhibit Number 4.
- 2 A. Okay.
- Q. What is this table showing the Commissioners?
- 4 A. It's just showing a comparison between
- 5 different lateral lengths. So, for instance, a one-mile
- 6 lateral, as we have discussed, has about 4,020 feet of
- 7 treatable laterals. For a given investment X and a
- 8 given EUR, Y, you can compare the different lateral
- 9 lengths to it. So a one-and-a-half-mile lateral, using
- 10 these same assumptions, would have 6,660 feet of
- 11 treatable lateral length. You would invest only a third
- more to get the additional length, but you'd get 60
- 13 percent more reserves.
- Going down to two miles, as I have shown on
- 15 the other exhibit, you get 9,300 feet of treatable
- 16 lateral. It costs you 60 percent more to drill it, but
- 17 you've got 2.3 times the reserves. If you compare that
- 18 to the two one-mile laterals, again, as we discussed,
- 19 8,040 feet, which is 1,260 feet fewer lateral feet,
- 20 double the investment and only double the reserves. So
- 21 you can just see the difference in the economics and in
- 22 the recoverable reserves when you drill longer laterals.
- 23 Q. So if I'm understanding your table correctly,
- 24 the costs are between 30 and 60 percent more than what
- 25 we call a one-mile standard lateral?

- 1 A. Uh-huh.
- Q. Is that what this is showing?
- 3 A. Yes. Yes.
- Q. And then the reserves are between 60 and 100
- 5 percent more reserves when you have a one-and-a-half or
- 6 longer lateral?
- 7 A. Yes.
- 8 Q. When we're looking at not only the costs and
- 9 reserves for extended laterals, what other benefits is
- 10 Concho seeing by drilling longer than a mile lateral?
- 11 A. Well, we've already shown the economics are
- 12 better, but you certainly prevent waste and protect
- 13 correlative rights because you can actually develop more
- 14 of the minerals under the leases.
- You have fewer surface locations, so your
- 16 surface footprint is smaller, with your tank battery,
- 17 your wellhead, your drilling pad, your flow lines,
- 18 everything. You only have one versus more than one to
- 19 develop all those minerals. And in environmentally
- 20 sensitive areas, that can be very important.
- 21 And in some areas such as the potash, you
- 22 can only develop the minerals by doing an extended
- 23 lateral because you can't get a surface location in some
- 24 of those areas.
- 25 You only would need to get one APD, so

- 1 there is less paperwork for both us and the State in
- 2 drilling an extended lateral versus one or more wells to
- 3 develop all the minerals.
- Q. So we have potash concerns --
- 5 A. Uh-huh.
- Q. -- out here, which you've shown on the map, and
- 7 you mentioned the environmentally sensitive areas.
- 8 Do we have endangered habitats also out in
- 9 this Basin area?
- 10 A. Yes.
- 11 Q. So we have that -- those surface issues to take
- 12 into consideration?
- 13 A. Yes.
- 14 O. What are some of the reasons we would drill
- something that's more than a mile but less than two
- 16 miles? So you showed your general schematic. What are
- 17 some of the reasons why we would have a variable of a
- 18 mile-and-a-quarter or a mile-and-a-half or some
- 19 variation?
- 20 A. Sometimes we just don't have the land position;
- 21 we don't have a lease that covers that, and we aren't
- 22 able to get a pooling agreement for anything further
- 23 than that. Sometimes there are existing vertical or
- 24 horizontal wells, so we can't drill into those.
- 25 Sometimes our lease or the other offsetting lease is

- 1 federal land, and it has become more difficult to obtain
- 2 permission to commingle production with -- from a
- 3 federal lease with state or fee lease.
- 4 You also would have to have an additional
- 5 tank battery, which increases the cost, and could make
- 6 the project less economic or even uneconomic, or the
- 7 geology might prevent you from wanting to drill any
- 8 farther if there is no reservoir that way. We would
- 9 want to drill it because it makes more economic sense,
- 10 but some things do prevent us from doing so.
- 11 Q. Does that mean, in your opinion, that when you
- 12 leave a quarter-quarter or more out of a so-called
- 13 project area or spacing unit, that it's necessarily
- 14 stranded?
- 15 A. When I think stranded, I think of two things.
- 16 One is that there is no more land surrounding that
- 17 quarter-quarter section or that there are no other ways
- 18 to develop that section.
- 19 O. So should we turn to -- let's turn to Exhibit
- 20 5, and maybe you can illustrate your -- your discussion.
- 21 A. Yes. Exhibit 5 shows a two section development
- 22 with one-and-a-quarter-mile laterals, and it just shows
- 23 the various permutations of ways to develop the
- 24 remaining three-quarters of a section of these two
- 25 sections. It doesn't even show any offsetting sections

- 1 that would also give you more ways to develop it. But
- 2 there are many ways to develop the other acreage.
- Q. And as you were saying, this only shows two
- 4 sections. This doesn't show the nine-section area
- 5 around it or other acreage that's included in the
- 6 lateral?
- 7 A. Right.
- 8 Q. What's the longest lateral that Concho has
- 9 drilled to date?
- 10 A. So far we have drilled a two-and-a-quarter-mile
- 11 lateral.
- 12 Q. How long do you think you'll go?
- 13 A. I don't have any idea. It's hard to guess,
- 14 because technology is advancing so quickly. I know
- 15 there is a well in the Middle East that was drilled to
- 16 over six miles, treatable lateral.
- 17 Q. That would be something to see.
- 18 A. Yes.
- 19 Q. And just to give the Commission an idea of how
- 20 far Concho's come in just a year's time, how many
- 21 extended laterals did we have planned this time last
- 22 year?
- A. Okay. A year ago this time, we were preparing
- 24 our budget for 2013. We had drilled two extended
- 25 lateral wells but didn't have very much data, so we only

- 1 budgeted five extended laterals for 2013. Well, as I've
- 2 already stated, we're going to drill 17 this year, and
- 3 we have budgeted 26 for next year. And I'm confident
- 4 that we will actually drill more than 26, because we are
- 5 trying all the time to further our land position, pool
- 6 other interests. But that's what we have planned thus
- 7 far, is 26. So in a year's time -- the data are so
- 8 compelling that we would -- that's where we would prefer
- 9 to go.
- 10 Q. And based on your studies and the data that
- 11 you've presented here today, in your expert opinion,
- 12 should the Commission consider one-mile laterals as a
- 13 standard spacing unit?
- 14 A. No.
- Q. Why is that?
- 16 A. Because I think most operators are going to
- 17 want to drill longer laterals because the economics are
- 18 better, there is less waste, and correlative rights are
- 19 better protected by drilling extended laterals.
- Q. Were Exhibits 1 through 5 compiled by you or
- 21 compiled under your direction and supervision?
- 22 A. Yes.
- 23 MS. MUNDS-DRY: Madam Chair, we move the
- 24 admission of Concho Exhibits 1 through 5 into evidence.
- 25 CHAIRPERSON BAILEY: They are admitted.

- 1 (COG/Concho Exhibit Numbers 1 through 5
- were offered and admitted into evidence.)
- 3 MS. MUNDS-DRY: That concludes my
- 4 examination. Pass the witness.
- 5 MR. BRUCE: I'll just ask a few questions.
- 6 CROSS-EXAMINATION
- 7 BY MR. BRUCE:
- 8 Q. Looking at your Exhibit 5, Ms. Krawietz -- as
- 9 you well know, I'm over here every couple of weeks, and
- 10 I've seen many of the COG applications. If you turn to
- 11 page 2 of that exhibit, in the bottom half of that left
- 12 section, not too long ago, COG had that exact situation,
- 13 where there were vertical wells, and they had to get a
- 14 120-pooling nonstandard unit, correct?
- 15 A. Yes.
- 16 Q. And then on the last page, on the left-hand
- 17 side, again, two section area that -- I believe that
- 18 picture on the left side is the way Concho, and then
- 19 Devon to the south is developing a couple of sections, I
- 20 believe, in 17 South 32, correct?
- 21 A. I can't speak to that specifically.
- 22 MS. MUNDS-DRY: I think that's what the
- 23 other team is doing, Mr. Bruce. I'm not sure she has
- 24 knowledge of that.
- Q. (BY MR. BRUCE) If you look at your Exhibit 1,

- 1 if this had been prepared a couple years ago, in your
- 2 opinion, would there be very few extended laterals?
- 3 A. Yes, very few.
- Q. And so it's just proceeded a pace in the
- 5 drilling of longer laterals?
- 6 A. It has.
- 7 MR. BRUCE: That's all I have, Madam Chair.
- 8 CHAIRPERSON BAILEY: Commissioner Warnell?
- 9 COMMISSIONER WARNELL: Yes. Thank you.
- 10 CROSS-EXAMINATION
- 11 BY COMMISSIONER WARNELL:
- 12 Q. I, too, admire your Exhibit 5. It almost looks
- 13 like a board game.
- But you had mentioned, I believe, problems
- 15 commingling federal, fee, state?
- 16 A. Yes.
- 17 Q. Could you talk a little bit more about that?
- 18 A. I can tell you what little I know. I'm not a
- 19 landman or a lawyer, but my understanding is that the
- 20 BLM requires -- they have to approve you commingling --
- 21 downhole commingling minerals from another -- from
- 22 something that is not a federal lease. You have to have
- 23 a separate tank battery for any subsequent wells that
- 24 you commingle on that lease. So instead of having one
- 25 tank battery for your entire federal lease, you could

- 1 potentially have multiple tank batteries, depending on
- 2 how many leases you commingle your wells with, and you
- 3 have to obtain permission to do that. That's my
- 4 understanding.
- 5 Q. So there are ongoing issues there, I think.
- 6 Thank you. I have no more questions.
- 7 CROSS-EXAMINATION
- 8 BY COMMISSIONER BALCH:
- 9 Q. Couple of questions about Exhibits 3 and 4.
- 10 What's the data that's plotted on Exhibit 3?
- 11 A. Exhibit 3 just shows EUR versus lateral length
- 12 for wells --
- 13 Q. The data points come from -- where do the data
- 14 points come from?
- 15 A. I don't know what you're saying. How are the
- 16 EURs calculated?
- 17 Q. What wells do they represent?
- 18 A. They are just wells in the state line 2nd Bone
- 19 Spring. I don't have the well names with me, but they
- 20 are not just the Concho wells, but various operators'
- 21 wells in the state-line area.
- 22 Q. What time period do those wells cover?
- 23 A. Within the last three years.
- Q. And is the straight line plotted there the
- 25 basis for the analysis on Exhibit 4?

- 1 A. Not completely. This analysis assumes that the
- 2 E -- that the recovery per foot is the same across the
- 3 lateral, which is a separate plot. This is just EUR
- 4 versus lateral length. So if you assume the recovery
- 5 rate per foot is equal no matter how long, that's where
- 6 these EUR numbers come from.
- 7 Q. Thank you.
- 8 CROSS-EXAMINATION
- 9 BY CHAIRPERSON BAILEY:
- 10 Q. You said that for 2013, 17 of the 121 wells
- 11 would be extended laterals --
- 12 A. Yes.
- 13 Q. -- which is more or less 14 percent?
- 14 With the additional knowledge that you
- 15 have, the technology, you said that the projected number
- 16 of extended laterals for 2014 would be 26 --
- 17 A. Yes.
- 18 Q. -- out of 172 --
- 19 A. Uh-huh.
- 20 Q. -- which is about 18 percent?
- 21 A. Uh-huh.
- Q. Given the argument of how much more economic it
- 23 is to drill these extended laterals, why isn't that
- 24 percentage higher?
- 25 A. I predict that it will be higher. When I give

- 1 you those numbers, those are what we know we have now
- 2 land-wise. So we know we're going to drill a certain
- 3 number of wells. Right now, we are in a land position
- 4 to drill 26 of those as extended laterals. Our landmen,
- 5 every single day, are trying to acquire more acreage,
- 6 trade out acreage, pool acreage to make that number
- 7 bigger than 26. So I expect that will be greater.
- 8 Q. Thank you.
- 9 A. These numbers are taken from our reserves which
- 10 are as of a date -- a given date.
- 11 Q. Now, the percentage between 14 percent and 18
- 12 percent isn't that great, and given the evidence that
- 13 you've brought to us today, I'm just questioning the
- 14 commitment to the longer laterals.
- 15 A. No, the commitment is there. Again, those 26
- 16 wells indicate what our land position is right now.
- 17 Over the next year, we will be acquiring more acreage or
- 18 trading out of acreage or pooling more acreage because
- 19 we want to drill more than 26 extended laterals, because
- 20 the economics are so much better.
- 21 Q. Those are all the questions I have.
- 22 CHAIRPERSON BAILEY: Do you have any more?
- MR. BRUCE: No, ma'am.
- 24 CHAIRPERSON BAILEY: You may be excused.
- Do you have any other witnesses,

- 1 Ms. Munds-Dry?
- MS. MUNDS-DRY: I do not, Madam Chair.
- 3 That concludes our case.
- 4 CHAIRPERSON BAILEY: How about closing
- 5 arguments, then?
- 6 CLOSING ARGUMENT
- 7 MR. BRUCE: I have just a couple of brief
- 8 things, Madam Chair.
- 9 First of all, when it comes to --
- 10 whatever -- when it came to the original order, what I
- 11 said was, one of the quarter-quarter sections may have
- 12 some dry acreage in it. A couple of things came to mind
- 13 immediately. As you well know, I'm getting to be a
- 14 fossil around here, and I remember the glory days of
- 15 drilling Morrow wells. And when you looked at force
- 16 pooling of Morrow wells, oftentimes, 30, 40, 50 percent
- 17 of excess of those well units had dry acreage. Now, of
- 18 course, they were drilling on standard 320-acre units,
- 19 but nonetheless, that does occur. As we all know,
- 20 reservoirs are not continuous across the Permian Basin.
- 21 The other thing is, even if you're talking
- 22 about 160-acre well units, you're looking at what the
- 23 Division considers standard. Any of those -- as
- 24 Ms. Krawietz' exhibit pointed out, the two interior
- 25 quarter-quarter sections would have 1,320 feet of

- 1 productive lateral; whereas, the two end quarter-quarter
- 2 sections would have substantially less than that.
- 3 Nonetheless, forced pooling occurs all the time on that
- 4 basis. So I think -- I think you have to give some
- 5 leeway to the operators. I don't think -- whether it's
- 6 COG or Cimarex or any other operator, they're not in the
- 7 business of drilling dry wells. They're not in the
- 8 habit of including nonproductive acreage in the wells,
- 9 and there is only really one way to tell, and that's to
- 10 drill the well.
- 11 Therefore, I think, in proposing and when
- 12 the people come before the Division and present their
- 13 geology, you know, you've got to -- I think you have to
- 14 assume that they are seeking to drill these wells in
- 15 good faith and not impair anybody's correlative rights.
- 16 And then when it comes to correlative
- 17 rights, it's also -- correlative rights is an
- 18 opportunity -- not a quarantee, but the opportunity of a
- 19 party to produce its fair and equitable share of
- 20 reserves. And so I think there has to be some burden on
- 21 interest owners, if they object to it, to come forward
- 22 and object to the Division or the Commission on forced
- 23 pooling.
- 24 And if you -- along that line, if you look
- 25 at some of the Cimarex exhibits, you'd see, in Section

- 1 3, wells drilled by both Cimarex and COG. If you look,
- 2 strictly speaking, at the geology, it looks like part of
- 3 those well units are unproductive, but yet they have
- 4 very good recoveries.
- 5 And what I'm getting at is, especially now
- 6 that the well has been drilled, it shows that that
- 7 quarter-quarter section that the Division was so
- 8 concerned with at one point is not dry, and certainly
- 9 the correlative rights of the parties are protected by
- 10 the drilling of the well.
- 11 And I would also agree with Ms. Krawietz
- 12 that the trend is to put longer laterals. I meant to
- 13 bring the case number, but in one hearing last June,
- 14 Devon Energy had submitted a map with all of the
- 15 horizontals basically in Eddy County. And you can see
- 16 where the more recent wells are a mile and a half or two
- 17 miles long, Devon's and COG's and others.
- 18 And Ms. Krawietz also touched on another
- 19 area that I'd like to bring up. As you well know, the
- 20 BLM is proposing drilling islands in the potash area,
- 21 and, of course, that rule or that order is not fully
- 22 effective yet. But certainly that will entail probably
- 23 extensive -- an extensive number of extended laterals
- 24 throughout the potash area, where you drill off these
- 25 drilling islands that the BLM is proposing.

- 1 So we think that's where the technology is
- 2 going, and I think the only thing is to let the
- 3 technology determine the length of the wellbore,
- 4 providing that offsets are notified and have a chance to
- 5 challenge an extended lateral, whether or not they want
- 6 to develop their own acreage or have the lateral
- 7 extended even further.
- 8 And I think in this case, Cimarex complied
- 9 with that requirement by giving notice to the offsets,
- 10 and obviously the offsets have not had any objection to
- 11 the 240-acre lateral, and I'd request that the
- 12 application be approved.
- 13 CHAIRPERSON BAILEY: Okay. Commissioners,
- 14 would you like to go into closed session to deliberate
- in accordance with New Mexico Statute 10-15-1 of the OCC
- 16 resolution on open meetings, and to deliberate on this
- 17 case right now?
- 18 COMMISSIONER BALCH: I move we go into
- 19 closed session.
- 20 COMMISSIONER WARNELL: Second that motion.
- 21 CHAIRPERSON BAILEY: All those in favor?
- 22 (Ayes are unanimous; Closed Session,
- 23 10:06 a.m. to 10:22 a.m.)
- 24 CHAIRPERSON BAILEY: Do I hear a motion for
- 25 us to go back on the record?

- 1 COMMISSIONER WARNELL: Motion to go back on
- 2 the record.
- 3 COMMISSIONER BALCH: Second the motion.
- 4 CHAIRPERSON BAILEY: All those in favor.
- 5 (Ayes are unanimous.)
- 6 CHAIRPERSON BAILEY: The only thing
- 7 discussed was Case 14966, and we have reached a
- 8 decision. And we would like for counsel to describe the
- 9 decision.
- 10 MR. BRANCARD: The Commission finds that
- 11 all of the proposed units in this project area do
- 12 potentially contribute to the production of this well.
- 13 Therefore, there is no impairment of correlative rights,
- 14 and, therefore, we overturn the Division's decision in
- 15 that regard.
- 16 In regard to the issue of the length of the
- 17 lateral, the Commission notes that there have been prior
- 18 orders of the Division dealing -- attempting to deal
- 19 with this issue. Those orders pre-dated the writing of
- 20 the Horizontal Well Rule by the Commission. The
- 21 Commission does not see any arbitrary distinction among
- 22 the lengths of laterals when those laterals are proposed
- 23 for approval by the Division.
- 24 Therefore, the Commission will grant this
- 25 project area and compulsory ruling and would request an

- 1 order to be prepared that would show the standard
- 2 conditions for units and pooling, including a
- 3 200-percent charge.
- 4 Did I capture --
- 5 CHAIRPERSON BAILEY: Yes.
- 6 And would you like Mr. Bruce to give that
- 7 to you?
- 8 MR. BRUCE: Is two weeks fine?
- 9 MR. BRANCARD: Two weeks is fine.
- 10 (Discussion off the record.)
- MR. BRUCE: Monday the 21st. Would that be
- 12 sufficient?
- MR. BRANCARD: Yeah.
- 14 CHAIRPERSON BAILEY: That will be fine.
- 15 And then we would be able to sign that order at the next
- 16 Commission hearing in November, which is November 21st.
- 17 Assuming that all cases -- we'll still be signing the
- 18 order.
- 19 Okay. Is there any other business before
- 20 the Commission?
- Then do I hear a motion to adjourn?
- 22 COMMISSIONER WARNELL: I make a motion to
- 23 adjourn.
- MR. BRANCARD: Madam Chair --
- 25 CHAIRPERSON BAILEY: Yes.

- 1 MR. BRANCARD: -- just one -- I've been
- 2 sending some of the Commissioners -- not you,
- 3 Commissioner Warnell -- but Commissioner Bloom updates
- 4 on the litigation matters that are going on with the
- 5 appeals of Commission decisions, and I'll continue to do
- 6 that if you want any more updates on that.
- 7 We do have a hearing scheduled for November
- 8 4th on the Commission's motion to certify the appeal to
- 9 the Court of Appeals. So that is what is scheduled now
- 10 before the judge.
- 11 There has also been a motion to dismiss
- 12 after that. I don't know how the judge wants to handle
- 13 that at the hearing.
- 14 CHAIRPERSON BAILEY: Okay. Thank you for
- 15 the update.
- 16 COMMISSIONER BALCH: I will now second the
- 17 motion to adjourn.
- 18 CHAIRPERSON BAILEY: All those in favor?
- 19 (Ayes are unanimous.)
- 20 CHAIRPERSON BAILEY: Thank you.
- 21 (Case Number 14966 concludes, 10:26 a.m.)

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	Page 6
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2	COUNTY OF BERNALILLO
3	
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5	I, MARY C. HANKINS, New Mexico Certified
6	Court Reporter No. 20, and Registered Professional
7	Reporter, do hereby certify that I reported the
8	foregoing proceedings in stenographic shorthand and that
9	the foregoing pages are a true and correct transcript of
10	those proceedings that were reduced to printed form by
11	me to the best of my ability.
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13	Record of the proceedings truly and accurately reflects
14	the exhibits, if any, offered by the respective parties.
15	I FURTHER CERTIFY that I am neither
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17	attorneys in this case and that I have no interest in
18	the final disposition of this case.
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