THE APPLICATION OF CML EXPLORATION LLC TO ADOPT FIELD RULES FOR THE REVILO (CLEAR FORK) FIELD, SCURRY COUNTY, TEXAS

HEARD BY: Andres J. Trevino, P.E., Technical Examiner

Mark Helmueller, Legal Examiner

APPEARANCES:

APPLICANT: REPRESENTING:

William Osborn CML Exploration LLC

Jason Clayton Damien Larson

PROTESTANT:

John Gilbert Pioneer Exploration LLC

PROCEDURAL HISTORY

Application Filed:
Request for Hearing:
Notice of Hearing:
Date of Hearing:
Proposal For Decision Issued:
January 11, 2010
January 15, 2010
February 16, 2010
September 3, 2010

EXAMINERS' REPORT AND PROPOSAL FOR DECISION

STATEMENT OF THE CASE

The field rules (Statewide Rules) for the Revilo (Clear Fork) Field provide for 467'/1200' well spacing and 40 acre units. CML Exploration LLC requests that field rules be adopted as follows:

- 1. Designation of the field as the correlative interval from 3,315 feet to 3,717 feet as shown on the log of the CML Brumley Well No. 1;
- 2. 330'-660' well spacing;
- 3. 40 acre oil units, maximum diagonal of 2,100', 20 acre optional units, maximum diagonal of 1,500';

4. Allocation based on 100% acreage.

This application was protested by Pioneer Exploration LLC, an operator in the field.

DISCUSSION OF THE EVIDENCE

Applicant's Evidence

The Revilo (Clear Fork) Field was discovered in 1957 at a depth of approximately 3,445 feet. Cumulative production from the field is approximately 85,321 BO. As of February 2010, there are 15 active oil wells in the field which in total produce about 187 BOPD. Fourteen of the fifteen wells in the field were drilled recently beginning in late 2007. There are two other operators in the field.

CML Exploration requests the correlative interval from 3,315 feet to 3,717 feet as shown on the log of the CML Brumley Well No. 1 be designated as the Revilo (Clear Fork) Field. The interval includes the Lower Clear Fork dolomite. The Lower Clear Fork in this area is a shelf margin deposit, deposited on a paleo-high spot. The gross interval includes numerous small sections with porosity development. CML Exploration perforates the sections with adequate porosity which are saturated with hydrocarbons. The hydrocarbon accumulations are thin, lenticular and vary from well to well.

Numerous other Clearfork fields in the area have similar 40/20 acre density or less and 330'/660' spacing as the proposed Revilo (Clear Fork) Field rules. The Diamond M (Clearfork) field, located 2 miles south of the Revilo (Clear Fork) Field adopted 20/10 acre density with 330'/660' well spacing on June 1993. The Kelly-Snyder (Clearfork, Lower) Field located 1 mile to the east, adopted 20 acre density with 330'/933' well spacing on May 1978. All three fields produce from similar Lower Clear Fork formation.

Pioneer, which operates 12 of the 15 wells in the field, has requested eight Rule 37 exceptions and two Rule 37/38 density exceptions on their 12 wells. Most of the Rule 37 exceptions were for wells drilled 330' from the lease line. The two Rule 38 density exception requests claimed that the existing 12 wells on the 470 acre Brumley "A" lease would not drain it. All Rule 37/38 exceptions were reviewed and approved by the Commission. Pioneer initially claimed that the wells will have a recovery factor of 45% to 35%. These estimates were made on wells with only one year of production history. CML Exploration used Unitex Oil and Gas' Nichols No.1 with a 20 year production history to calculate a 8.4% recovery factor for the field.

CML Exploration recently completed it first well in the field, the Brumley Well No. 1 on July 25, 2009. The well was selectively perforated, acid and fractured stimulated over a 200 foot gross interval. The well had an initial potential of 50 BOPD. The drainage radius calculations provided by CML demonstrate the need for smaller drilling units. The

estimated drainage area for the Brumley Well No. 1 is 17 acres. This calculation is based on a porosity of 7.9%, water saturation of 43.5%, net pay thickness of 48 feet and a recovery factor of 8.4%. The estimated ultimate recovery for the Brumley Well No. 1 is 25,810 BO. CML Exploration request optional 20 acre density to allow infill drilling to recover stranded reserves and to assist in placing wells in optimum locations to help implement a waterflood for the field in the future.

Protestant's Evidence

John Gilbert, Vice President of Pioneer Exploration LLC, did not present any evidence, testimony or exhibits to counter CML's claims of needing smaller units to drain remaining oil in the field. Pioneer did not dispute any technical claims made by CML Exploration. Pioneer's opposition to the proposed field rules would require CML Exploration and other operators in the field to seek individual Rule 37/38 exceptions on a well to well basis. Pioneer believes the existing field rules are appropriate and CML should request Rule 37/38 exceptions as needed.

EXAMINERS' OPINION

Based on the findings and conclusions of law, the examiners recommend that field rules for the Revilo (Clear Fork) Field be adopted to provide for 40 acre units with optional 20 acre density and 330'-660' well spacing. Drainage calculations on CML's Brumley Well No. 1 demonstrate the need for smaller units. The Brumley Well No. 1 is calculated to drain 17 acres. Pioneer's need for eight Rule 37 exceptions and two Rule 38 exceptions further demonstrates the need for the proposed field rules. The proposed field rules will prevent waste and will protect correlative rights.

FINDINGS OF FACT

- 1. Notice of this hearing was given to all persons entitled to notice at least ten days prior to the date of hearing.
- 2. Field rules for the Revilo (Clear Fork) Field provide for 467'-1,200' well spacing, 40 acre oil units and allocation based on 100% acreage.
- 3. The Revilo (Clear Fork) Field was discovered in 1957 and cumulative production from the field is approximately 85,321BO.
- 4. Current production from the 15 active oil wells in the field is approximately 187 BOPD total.
- 5. A density rule providing for 40/optional 20 acre units is appropriate for the field.

- a. The calculated drainage area for the CML Brumley Well No. 1, is about 17 acres.
- b. Pioneer, which operates 12 of the 15 wells in the field, has requested eight rule 37 exceptions and two Rule 37/38 density exceptions on their 12 wells. All Rule 37/38 exceptions were reviewed and approved by the Commission.
- 6. The proposed 330'-660' well spacing will accommodate development on the optional 20 acres.
- 7. Numerous other Clearfork fields in the area have 20 acre or less density and 330'/660' spacing.

CONCLUSIONS OF LAW

- 1. Proper notice of this hearing was issued.
- 2. All things have been accomplished or have occurred to give the Commission jurisdiction in this matter.
- 3. Adopting field rules for the Revilo (Clear Fork) Field is necessary to prevent waste and protect correlative rights.

EXAMINERS' RECOMMENDATION

Based on the above findings and conclusions, the examiners recommend that the application be approved as set out in the attached Final Order.

Respectfully submitted,

Andres J. Trevino, P.E. Technical Examiner

Mark Helmueller Hearings Examiner