

OIL AND GAS DOCKET NO. 05-0228114

THE APPLICATION OF NOW DEVELOPMENT COMPANY, INC., FOR PERMANENT FIELD RULES IN THE RED LAKE (SUB-CLARKSVILLE) FIELD, FREESTONE COUNTY, TEXAS

Heard by: Margaret Allen, Technical Hearings Examiner

Procedural history

Application received: April 18, 2001

Hearing held: May 21, 2001

Appearances

Noel D. Ischy

Representing

Now Development Company, Inc.

EXAMINER'S REPORT AND RECOMMENDATION

STATEMENT OF THE CASE

Now Development Company is seeking the following permanent field rules for the Red Lake (Sub-Clarksville) Field:

1. 467-1200 feet well spacing;
2. 320 acre proration units with 10% tolerance, and a maximum diagonal of 6000 feet.

Now also asked to have the allocation formula suspended for the field. The examiner requested that a designated interval be adopted for the field and that the allocation formula be based on acreage. At the examiner's suggestion, Now asked that the correlative interval be from 4536 to 4549 feet as shown on the log of its P.D.C. Ball Estate Well No. 2A.

DISCUSSION OF THE EVIDENCE

The Red Lake (Sub-Clarksville) Field was discovered in 1954, at a depth of 4513 feet. The initial bottomhole pressure was estimated from the nearby Nan-Su-Gail (Sub-Clarksville) Field to have been 1900 psi. There were 16 wells in the field at one time, with cumulative production of 8.3 BCF from a pay section estimated to be 8.5 feet thick. Based on analogy from the Nan-Su-Gail (Sub-Clarksville) Field, the porosity is 18%, water saturation is 30% and the permeability is 382 md.

There is now only one well in the field, the P.D.C. Ball Estate No. 2A, which was drilled in 1966, by H.B. Pyle. This well was perforated from 4536 to 4546 feet and had an initial producing rate of 3200 MC/D. Cumulative production from this particular well is a little over one BCF. Current production is less than 100 MCF per day, but with little decline.

Volumetric calculations indicate that the initial gas-in-place was 778 MCF per acre-foot, and therefor 2.116 BCF of gas would have been originally present underneath 320 acres. The projected recovery from Well No. 2A is 1.4 BCF which is 65% of the original gas-in-place underneath 320 acres. The applicant indicated that typical recoveries for this type of field are between 50 and 60%. The estimated original gas-in-place for the field as a whole is 32 BCF. Assuming 65% recovery, the remaining recoverable gas-in-place for the field as a whole is 9.2 BCF, while the remaining recoverable condensate is estimate to be 101,000 barrels.

The applicant requested well spacing of 467-1200 feet to provide extra flexibility. Now is planning to re-enter plugged wells or recomplete existing ones that may be only 467 feet from a lease line. Allocation based on acreage will protect correlative rights. As there is only one well in the field, there is no purpose served by suspending the allocation formula.

FINDINGS OF FACT

1. Notice of this hearing was given to the applicant and to all operators in the Red Lake (Sub-Clarksville) Field on May 4, 2001.
2. The Red Lake (Sub-Clarksville) Field was discovered in 1954 and has produced 8.3 BCF from a total of 16 wells.
3. The only existing well in the field, the Now P.D.C. Ball Estate No. 2A, was completed in the Sub-Clarksville formation in 1966 and has produced a little over one BCF.
4. The Sub-Clarksville is between 4536 and 4549 feet as shown on the log of the Ball Estate Well No. 2A.
5. Field rules of 320-acres are appropriate for this field.
 - a. Volumetric analysis indicates that there are 778 MCF of initial gas in place per acre-foot.
 - b. The only existing well in the field has already produced 1.03 BCF.
 - c. Expected ultimate recovery of this well is 1.4 BCF.
 - d. The expected ultimate recovery will be 65% of the original-gas-in-place underneath 320 acres.

6. Well spacing of 467-1200 feet will provide extra flexibility in re-entering plugged wells or recompleting wells to this field.
7. Allocation based on acreage will protect correlative rights if another well should ever be completed.

CONCLUSIONS OF LAW

1. Proper notice was given as required by statute.
2. All things have been done or occurred to give the Railroad Commission jurisdiction to resolve this matter.
3. The requested field rules will prevent waste, protect correlative rights within the field, and promote orderly development of the reservoir.

EXAMINER'S RECOMMENDATION

Based on the above findings and conclusions, the examiner recommends that the requested permanent field rules for the Red Lake (Sub-Clarksville) Field be approved.

Respectfully submitted,

Margaret Allen
Technical Hearings Examiner

Date of Commission Action: June 5, 2001