

OIL AND GAS DOCKET NO. 03-0224541

THE APPLICATION OF ROSEWOOD RESOURCES, INC., FOR TEMPORARY FIELD RULES IN THE IOLA (DEXTER) FIELD, GRIMES COUNTY, TEXAS

Heard by: Margaret Allen, Technical Hearings Examiner

Procedural history

Application received: April 6, 2000

Hearing held: May 15, 2000

Appearances

	Representing
Dale Miller	Rosewood Resources

EXAMINER'S REPORT AND RECOMMENDATION

STATEMENT OF THE CASE

Rosewood Resources is seeking the following temporary field rules:

1. Designated interval from 10,188 to 10,445 feet as shown on the log of the Moran Corporation Fannie Upchurch Well No. 3;
2. 1867-3735 feet well spacing;
3. 640 acre proration units with 10%-acre tolerance, and a maximum diagonal of 8500 feet; and
4. allocation based 95% on acreage and 5% on deliverability.

DISCUSSION OF THE EVIDENCE

The Iola (Dexter) Field was discovered in 1979, at a depth of 10,397 feet. The discovery well, the Moran Upchurch Well No. 3 was plugged in 1984 after producing only 107 MMCF. Rosewood recompleted its Upchurch -B- Lease Well No. 2 to the Dexter after the deeper Iola (Georgetown) Field was depleted in this well. The Georgetown field was produced from the horizontal portion of the Upchurch -B- No. 2 wellbore, but the Dexter formation is located at the curve where the well was turned horizontally. Most of the horizontal drainhole has been plugged and the Dexter recompletion is in an essentially vertical wellbore.

Rosewood's well was perforated from 10188-10198 feet in a reservoir within the upper part of the Dexter, and encountered virgin pressure of 4501 psi. The Moran Upchurch No. 3 was completed in a separate sand in the lower part of the Dexter, and this well's initial bottom-hole pressure was 3768 psi. The proposed consolidated interval, between 10,188 and 10,445 feet, includes both productive intervals separated by 150 feet of shale. The multiple reservoirs within this designated interval require a two-factor allocation formula for statutory reasons. One based 95% on

acreage and 5% on deliverability will protect correlative rights, while satisfying the requirement for two factors.

The Rosewood Upchurch -B- No. 2 was first drilled in 1994, and then recompleted to the Dexter in October of 1999. The initial deliverability for this recompletion was 2833 MCF per day (AOF) with 11 BC and 3 BW. Cumulative production from the Dexter in Rosewood's well, through April, 2000, has been 264 MMCF of gas and 2050 BC. Current production is about 1700 MCF/D with 21% water cut. The reservoir has a depletion drive and a graph of P/Z vs. cumulative production indicates the well should eventually recover 3.4 BCF.

The water saturation in the Upchurch -B- Well No. 2 is 11%, porosity is 13% and the net pay thickness is 5 feet. Assuming 80% recovery, there are an estimated 1115 MCF per acre foot. If the well produces 3.4 MCF, as predicted, it will drain 763 acres. Well spacing of 1867-3735 feet is standard for 640 acre density. Several other wells now completed in deeper formations have the potential to be recompleted to the Dexter. There will be more evidence of wells' actual production capacity when the field rules are reviewed in 18 months.

FINDINGS OF FACT

1. Notice of this hearing was given to the applicant and to operators within 2-1/2 miles of the Rosewood Upchurch -B- Lease Well No. 2 on April 18, 2000.
2. The Moran Company Fannie Upchurch No. 3 was the discovery well for this field and produced 167 MMCF between 1979 and 1984.
3. The discovery well was perforated between 10,397 and 10,412 feet, and encountered initial bottom-hole pressure of 3768 psi.
4. The only well now in the field, Rosewood Upchurch -B- No. 2, was recompleted to the Dexter in October, 1999, with perforations between 10,188 and 10,198 feet in the upper part of the Dexter Formation.
5. The Rosewood Upchurch -B- No. 3 is completed in a lower part of the Dexter section than was the discovery well and its initial bottom-hole pressure was 4501 psi.
6. Temporary rules of 640-acres are appropriate for a period of 18 months.
 - a. The initial potential of the current producing well was 2833 MCF per day (AOF), with 11 BC and 3 BW.
 - b. The Rosewood Upchurch -B- Well No. 2 has already produced 264 MMCF and is estimated to eventually recover 3.4 BCF.
 - c. Volumetric calculations indicate that 3.4 BCF of gas is the recoverable amount of gas underneath 763 acres.

- d. The Dexter Formation is an attractive recompletion target for other wells now producing from deeper horizons in this area.
7. Well spacing of 1867-3735 feet is standard for 640-acre density rules.
8. The productive Dexter section in this reservoir is shown between 10,188 to 10,445 feet on the log of the discovery well, the Moran Fannie Upchurch Lease Well No. 3.
9. Allocation based mostly on acreage will protect correlative rights, and basing 5% on deliverability will satisfy the statutory requirement for a two-factor allocation formula.

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 temporary 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 temporary field rules for the Iola (Dexter) Field be approved and reviewed in 18 months.

Respectfully submitted,

Margaret Allen
Technical Hearings Examiner

Date of Commission Action: June 22, 2000

Exhibits

1. Map
2. Proration schedule
3. Completion data
4. Production data
5. Graph of production
6. Data from Forms G-10
7. Type log
8. Daily production data from new well
9. Graph of Exhibit 8
10. Volumetric calculations
11. P/Z vs. Cumulative production
12. Drainage calculations
13. Reservoir data sheet
14. Other Palo Pinto field rules