#### OIL AND GAS DOCKET NO. 05-0243148

# APPLICATION OF REDMAN OPERATING CORPORATION TO AMEND THE FIELD RULES FOR THE DEBRA A. (SMACKOVER) FIELD, VAN ZANDT COUNTY, TEXAS

**HEARD BY**: Thomas H. Richter, P.E. **DATE OF HEARING:** July 8, 2005

**APPEARANCES:** 

**REPRESENTING:** 

Redman Operating Corporation

Philip Whitworth, attorney Loren Long Bryan McMicken

## EXAMINER'S REPORT AND RECOMMENDATION STATEMENT OF THE CASE

This is the unprotested application of Redman Operating Corporation for the Commission to consider amending the field rules for the Debra A. (Smackover) Field as adopted in Order No. 5-93,166, effective September 11, 1989, as amended, which currently provide for:

- 1. The entire correlative interval from 13,172' to 13,533' as shown on the Dual Induction-SFL-Sonic log of the Wesson Energy-Dallas Production, Inc., R.J. Parker Well No. 1, J.A. Cheshire Survey, A-181, Van Zandt County, Texas shall be designated as a single reservoir for proration purposes and be designated as the Debra A. (Smackover) Field.
- 2. Minimum well spacing of 933'/1867' (lease line/between well);
- 3. 320 acre gas proration units with 10 % tolerance and maximum diagonal of 7,000';
- 4. An allocation formula based on 100% acreage.

Redman Operating proposes the following:

- 1. No change
- 2. Minimum well spacing of 467'/1200' (lease line/between well),

- 3. 40 acre gas proration units and a maximum diagonal of 2,100'; and
- 4. No change.

The examiner recommends approval of the proposed amended rules.

## **DISCUSSION OF THE EVIDENCE**

The Debra A. (Smackover) Field was discovered in 1989 at 13,468' subsurface depth. Redman Operating is the only operator in the field with one well.

The R.J. Parker Well No. 1 was completed in 1989 through 3 sets of perforations from 13,292' through 13,482' subsurface depth. Two other wells were drilled to test the Smackover but were not productive and subsequently plugged. To the south and east is the much larger Fruitvale (Smackover) Field. Cross section log analysis shows the East Fruitvale salt dome uplift removed the Smackover causing the structural separation. Cumulative production from the field is 3.5 BCF of gas.

Forty (40) acre gas proration unit density is necessary to provide for the efficient and effective depletion of the subject field. The subject well is currently producing  $\pm$  400 MCFD. Production decline analysis estimates that the remaining recoverable gas is 3.2 BCF of gas over a 60 year period which is not economical. Material balance calculates the ultimate recovery to be 4.9 BCF (1.7 BCF remaining recoverable). Volumetric reservoir modelings estimate the average original recoverable gas-in-place to be 25 BCF. The calculated drainage area for the R.J. Parker is 54 acres. The estimated reservoir size is 204 acres. Redman Operating plans on drilling additional wells in the field.

### **FINDINGS OF FACT**

- 1. Notice of this hearing was sent to all operators in the subject field at least ten (10) days prior to the subject hearing.
- 2. There was no protest at the call of the hearing.
- 3. The Debra A. (Smackover) Field was discovered in 1989 at 13,468' subsurface depth. Redman Operating is the only operator in the field with one well.
- 4. Special Field rules for the Debra A. (Smackover) Field were adopted in Order No. 5-93,166, effective September 11, 1989, as amended, which currently provide for:
  - a. The entire correlative interval from 13,172' to 13,533' as shown on the Dual Induction -SFL- Sonic log of the Wesson Energy-Dallas Production, Inc., R.J. Parker

<sup>&</sup>lt;sup>1</sup> Average porosity 12%; average water saturation 17%, average reservoir thickness 87'.

Well No. 1, J.A. Cheshire Survey, A-181, Van Zandt County, Texas shall be designated as a single reservoir for proration purposes and be designated as the Debra A. (Smackover) Field.

- b. Minimum well spacing of 933'/1867' (lease line/between well),
- c. 320 acre gas proration units with 10 % tolerance and maximum diagonal of 7,000';
- d. An allocation formula based on 100% acreage
- 5. Forty (40) acre gas proration unit density is necessary to provide for the efficient and effective depletion of the subject field.
  - a. The subject well is currently producing  $\pm 400$  MCFD.
  - b. Material balance calculates the ultimate recovery to be 4.9 BCF (1.7 BCF remaining recoverable).
  - c. Volumetric reservoir modelings estimate the average original recoverable gas-inplace to be 25 BCF.
  - d. The calculated drainage area for the R.J. Parker is 54 acres.
- 6. The proposed minimum well spacing of 467'/1,200' (lease line/between well) will provide for the orderly development of the field.

#### **CONCLUSIONS OF LAW**

- 1. Proper notice was given to all parties as set out in the provisions of all applicable codes and regulatory statutes.
- 2. All things have occurred and been accomplished to give the Commission jurisdiction in this matter.
- 3. Consideration of field rules, a determination of their effectiveness and appropriate actions is a matter within the Commission jurisdiction.
- 4. Adoption of the proposed amended field rules will prevent waste, foster conservation and protect correlative rights.

### **EXAMINER'S RECOMMENDATION**

Based on the above findings and conclusions of law, the examiner recommends approval of the proposed amended field rules for the Debra A. (Smackover) Field.

Respectfully submitted,

Thomas H. Richter, P.E. Technical Examiner Office of General Counsel