

THE APPLICATION OF BRAVO NATURAL RESOURCES, INC. TO AMEND THE FIELD RULES IN THE BUFFALO WALLOW (GRANITE WASH) FIELD, HEMPHILL COUNTY, TEXAS

Heard by: Donna K. Chandler on December 19, 2000

Appearances:

Flip Whitworth
Art Paquett
Mike Rollins

Representing:

Bravo Natural Resources, Inc.

EXAMINER'S REPORT AND RECOMMENDATION

STATEMENT OF THE CASE

Field rules for the Buffalo Wallow (Granite Wash) Field were adopted on January 3, 1979 in Docket No. 10-70,837. The rules in effect for the field are summarized as follows:

1. Well spacing a minimum of 467 feet from lease lines and 1,200 feet between wells;
2. 640 acre gas units plus 10% tolerance and a maximum diagonal of 9,000 feet; optional 320 acre units with a maximum diagonal of 6,500 feet.
3. Allocation based on 100% deliverability.

Bravo Natural Resources requests that the field rules be amended as follows:

1. Designation of the field as the correlative interval from 10,925 feet to 11,852 feet as shown on the log of the Holland C No. 2057;
2. No change in spacing rule.
3. addition of a provision for optional 80 acre units with a maximum diagonal of 3,250 feet;
4. allocation based on 5% acreage and 95% deliverability.

This application was unopposed and the examiner recommends that the field rules for the field be amended as proposed by Bravo Natural Resources, Inc.

DISCUSSION OF EVIDENCE

The Buffalo Wallow (Granite Wash) Field was discovered in 1980 at a depth of approximately 8,560 feet. There are currently 22 active wells in the field. Current deliverabilities range from less than 100 MCFD to over 1,700 MCFD. Cumulative production from the field is 11.3 BCF of gas and 280,000 BC.

Bravo Natural Resources has drilled six new wells in 2000, three of which required exceptions to the current density rule. Four of these new wells encountered bottom hole pressures of over 4,000 psi, while initial reservoir pressure was 4,500 psi in 1979. Current pressures in other wells in the field is 2,500 psi or less.

Bravo calculated drainage areas for three of its wells in the field based on ultimate recoveries derived from decline analysis. The ultimate recoveries range from 1.566 BCF to 2.647 BCF. The calculated drainage areas range from 22 acres to 71 acres. On this basis, Bravo requests that the density rule be amended to include an optional 80 acre density. Bravo intends to drill additional wells in the field. In addition, the nearby Hemphill (Granite Wash) Field operates under rules which provide for development on optional 80 acre density.

The designated interval proposed for the Buffalo Wallow (Granite Wash) Field includes several separate accumulations of hydrocarbons. Bravo therefore requests a two factor allocation formula to meet statutory requirements. Because the allocation formula is now based on 100% deliverability, Bravo requests that the two factors be 95% deliverability and 5% acreage, which will reflect only a small change in allowables.

FINDINGS OF FACT

1. Notice of this hearing was given to all persons entitled to notice.
2. The Buffalo Wallow (Granite Wash) Field was discovered in 1979 and rules were adopted in 1979 which provide for 640/optional 320 acre density and 467'-1,200' well spacing.
3. There are 22 active producing wells in the field and cumulative production from the field is 11.3 BCF of gas and 280,000 BC.
4. Some wells in the field will drain much less than 320 acres.
 - a. Recent wells drilled between existing wells only 1,500 feet away have encountered near virgin pressure.
 - b. Calculated drainage areas for three of Bravo's wells are less than 80 acres, based on estimated ultimate recoveries between 1.5 BCF and 2.6 BCF.
5. Allocation based on 5% acreage and 95% deliverability will protect the correlative rights of mineral owners and satisfy statutory requirements.

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. Amending the field rules for the Buffalo Wallow (Granite Wash) Field will prevent waste and protect correlative rights.

RECOMMENDATION

Based on the above findings and conclusions of law, the examiner recommends that the field rules for the Buffalo Wallow (Granite Wash) Field be amended as proposed by Bravo Natural Resources, Inc.

Respectfully submitted,

Donna K. Chandler
Technical Examiner