

OIL AND GAS DOCKET NO. 01-0263918

THE APPLICATION OF NORTH SOUTH OIL LLC. TO CONSIDER AN MER FOR EACH WELL IN THE SALT FLAT (EDWARDS) FIELD, CALDWELL COUNTY, TEXAS

Heard by: Andres J. Trevino, P.E. on March 4, 2010

Appearances:

Cary McGregor
Don Rhodes

Representing:

North South Oil LLC.

EXAMINER'S REPORT AND RECOMMENDATION

STATEMENT OF THE CASE

North South Oil LLC requests approval of an MER of 500 BOPD for each well in the Salt Flat (Edwards) Field. North South Oil also requested that no proration plats be required to be filed and all overproduction for the wells be canceled.

The application is unopposed and the examiner recommends approval of the requested MER of 500 BOPD and removal of the proration plat requirements and cancellation of overproduction.

DISCUSSION OF EVIDENCE

The Salt Flat (Edwards) Field was separated from the Salt Flat Field in 1995 to establish special field rules to accommodate horizontal drilling. The Salt Flat Field was discovered in 1928 and included productive intervals within the Edwards, Austin Chalk, Georgetown and Buda. North South Oil will drill horizontal wells with 1,500 foot to 2,000 foot laterals along the crest of the fault line.

The Salt Flat (Edwards) Field has a strong water drive, vertical wells typically produce 1 to 1.5 BOPD with 100 BWPD or a 1% oil cut. Horizontal wells can produce up to 500 BOPD with a 3 to 4.5% oil cut. Production data from the Smith Heirs Well No. 17H shows that to increase the oil cut the well must be produced with fluid production rates of 15,000 to 20,000 barrels of fluid per day. If the well is produced at lower rates the oil cut drops from 2.5% to .5%. In other wells the oil rates has decreased from 4.5% to 1% when fluid production rates were reduced. The higher rates of withdrawal are believed to "overtake" the water drive inflow and cause oil production to increase from natural fractures and the rock matrix. The number of producing wells in the Salt Flat (Edwards) Field has increased from 6 in 2007 to 28 in January 2010. Oil production has increased from 6 BOPD to nearly 1,200

BOPD over the same period. Additional horizontal development in the field is planned. Restricting production from the wells is not necessary to prevent waste as the field is in late stages of depletion and the wells produce with 95% to 99% water cuts.

North South also requests the elimination of having to file proration unit plats. Not requiring the filing of proration unit plats will eliminate unnecessary paperwork by not having to redraw proration units whenever a new horizontal wellbore is drilled. Similar rules were adopted for the Darst Creek (Edwards) Field in October 2009.

FINDINGS OF FACT

1. Notice of this hearing was given to all parties entitled to notice at least ten days prior to the date of hearing.
2. The Salt Flat Field was discovered in 1928 and included the Edwards, Austin Chalk, Georgetown and Buda. The Salt Flat (Edwards) Field was separated from the Salt Flat Field in 1995 to develop the Edwards with horizontal wells.
3. The Salt Flat (Edwards) Field operates under Special Rules that accommodate horizontal drilling along the crest of the fault line.
4. Since 2007 the number of producing wells in the Salt Flat (Edwards) Field has increased from 6 to 28 wells. Production has increased from 6 BOPD to nearly 1,200 BOPD over the same time period.
5. The Salt Flat (Edwards) Field has a strong water drive, wells typically produce with high water cuts of 95% to 99% water.
6. Production data of the Smith Heirs Well No. 17H indicates that producing wells in the field at rates of up to 500 BOPD and 20,000 BWPD will not cause waste.
 - a. During testing, the pump withdrawal rate was varied from 16,800 to 13,000 BWPD causing oil production to vary from 0 BOPD to 325 BOPD.
 - b. The oil cut rate increased as the fluid level above the pump decreased.
 - c. During testing, the oil cut rate increased from about 0.4% to 2.4% as the fluid level in side the well was decreased from 1,400 feet to 400 feet above the down hole pump.
7. The Darst Creek (Edwards) Field does not require the filling of plats after field rules were amended in October 2009.

CONCLUSIONS OF LAW

1. Notice of this hearing was given as specified in the provisions of all regulatory codes.
2. All things have occurred or been accomplished to give the Commission jurisdiction in this matter.
3. Approval of an MER of 500 BOPD for each well in the Salt Flat (Edwards) Field will not cause waste and will not harm correlative rights.
4. Cancellation of overproduction in the Salt Flat (Edwards) Field will not cause waste or harm correlative rights.

RECOMMENDATION

Based on the above findings and conclusions of law, the examiner recommends approval of an MER of 500 BOPD for each well in the Salt Flat (Edwards) Field and the elimination of proration plat filing requirements.

Respectfully submitted,

Andres J. Trevino, P.E.
Technical Examiner