

June 15, 2016

Mr. Harold Mayland
Operations Manager
Nighthawk Production, LLC
1805 Shea Center Drive
Highlands Ranch, Colorado 80129

Re: Snowbird 16-15 injection preparation - DDF-003-2016

Dear Harold,

A review was conducted of the Snowbird 16-15 well history in preparation for installing the Arikaree Creek Pilot Unit water flood. This well will be an injection well for the project.

The well properties reviewed include estimate of tract OOIP, production behavior, and review of offset well SWD #1 injection testing.

Sincerely,



Dr. David D. Faulder
Colorado license PE 0036871
Expires 10/31/2017

1. Reservoir review

The Snowbird 16-15 is one of two injection wells for the Arikaree Creek Pilot Unit. The purpose of this memo is to review and summarize the Spergen dolomite reservoir properties and production history of the well.

1.1 Petrophysical analysis

The well was spudded September 25, 2014 with the well reaching TD and casing set October 10. Electrical logs were ran and the logs processed for a petrophysical analysis. A processed log (Hoyer Petrophysics, Inc.) of the Spergen and Simpson interval is presented in Figure 1. The top of the Spergen limestone is at 8106 ft KB. The tri-polite interval is from 8141 ft to 8150 ft and is clearly identified by the resistivity low. The dolomite interval is from 8152 ft to 8200 ft with good porosity development in two major intervals. The top of the Simpson is at 8200 ft. The well penetrates the oil-water contact at -2893 ft SS, or at 8149 ft KB.

Completion testing of the well indicated the Spergen was wet and just above the oil-water contact. Geostatistical analysis indicates about 294 Mstb OOIP in the 40-acre tract the Snowbird 16-15 is located. The Snowbird 16-15 encountered a 5 ft section of moderate quality Spergen dolomite reservoir. The well was completed as a Marmaton producer, with perforations from 7266-7274 ft KB.

1.2 Pressure transient testing

No pressure transient testing has been performed in the Spergen dolomite.

1.3 Production response

The Snowbird 16-15 was placed on production from the Marmaton November 8, 2014 at an initial rate (30 day average) of 465 stb/d and no water. The entire production history is presented in Figure 2.

Cumulative production through April 30, 2016 is 60.0 Mstb and 6.7 Mbw.

1.4 Injection pressure

A step-rate injection test was conducted in nearby well, SWD #1, in the Simpson formation, immediately below the Spergen dolomite¹. The step-rate test used six increasing rates to a final equivalent pressure gradient on the top of the perforated Simpson interval (8203 ft KB) of 0.712 psi/ft. No indication of mechanical failure or formation breakdown was observed in the data set, satisfying the Colorado Oil and Gas Commission default gradient of 0.60 psi/ft without a step-rate test.

2. References

1. Faulder, D.D. to Nighthawk Production, *SWD #1 step-rate test May 14, 2014 - memo* - DDF-043-2014, June 13, 2014.

Figures

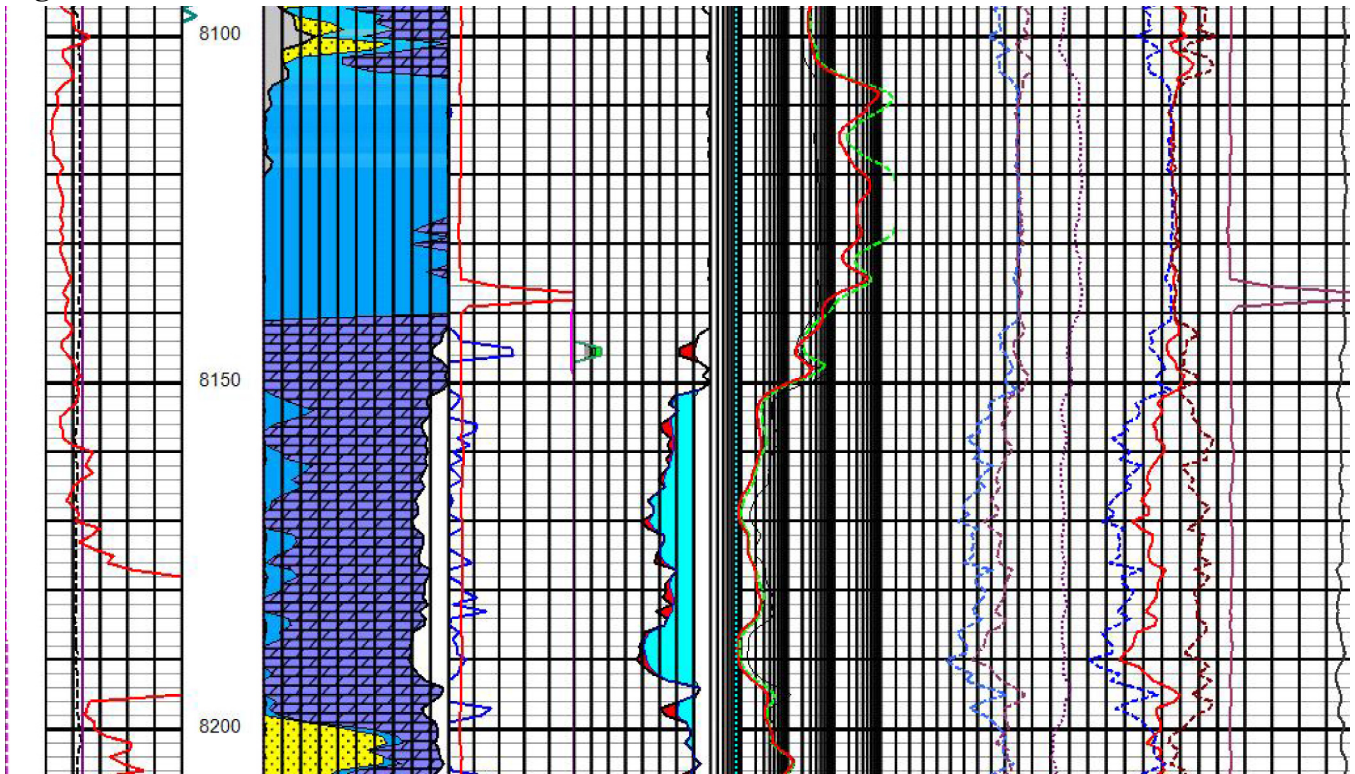


Figure 1 Snowbird 16-15 processed log

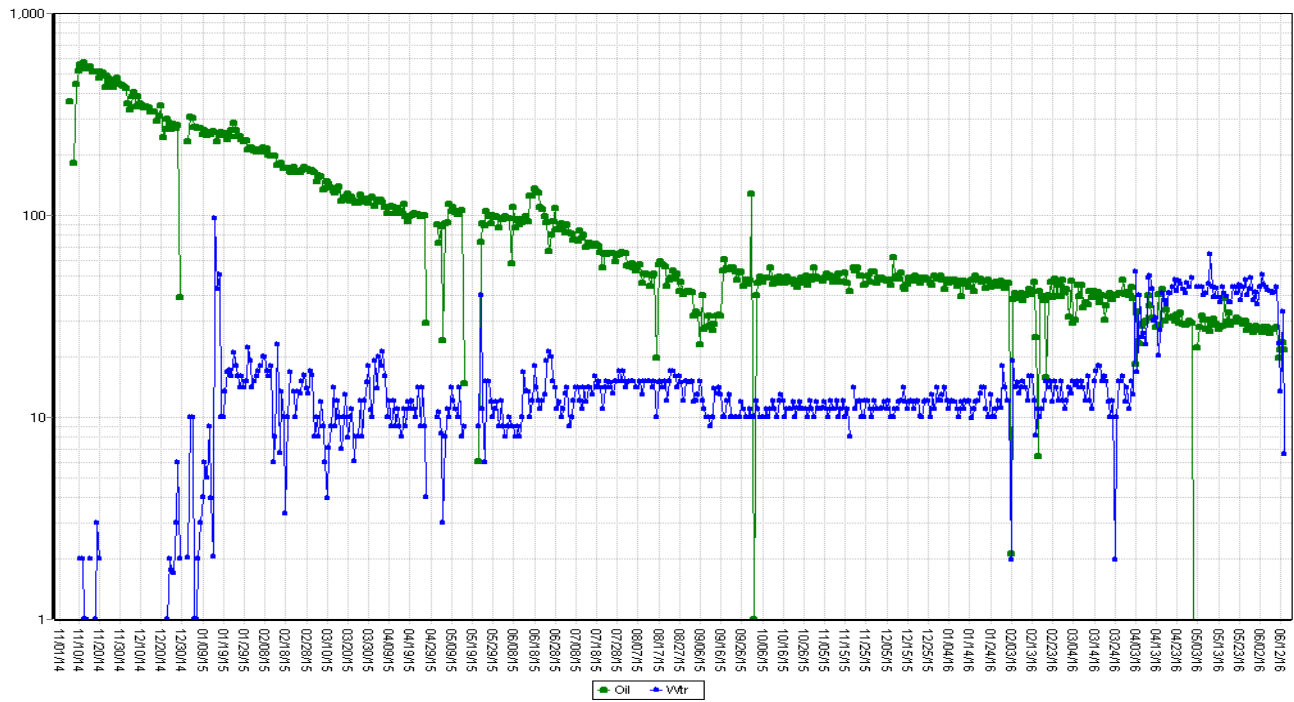


Figure 2 Snowbird 16-15 production history (Marmaton)