

Wellbore History

GENERAL

Well 34/6-1 S is located in the northern part of the Tampen Spur area. The block lies on the eastern flank of the Tampen Spur, separated from the North Viking Graben to the east by the Visund Fault Trend. The well targeted potential hydrocarbon bearing sands in the Jurassic Brent, Cook, and Statfjord formations (the Akkar prospect). The well was drilled directionally to evaluate all three formations at adequate structural locations to ensure that the risk of leaving economic reserves untested up-dip was minimal. The well should acquire data necessary to evaluate the prospect and the remaining exploration potential of the licence, and in the event of a dry well, acquire sufficient data to demonstrate the well to be dry and explain the absence of hydrocarbons. Planned TD was 50 m into the Lunde Formation of the Hegre Group.

OPERATIONS AND RESULTS

Exploration well 34/6-1 S spudded with the semi-submersible installation Transocean Winner on 18 July 2002 and drilled to the planned TD of 4360 m (3922 m TVD RKB) in the Triassic Lunde Formation. Drilling operations went smoothly without significant problems. The 12 1/4" hole section was directional, building 2,3°/30m from 2490 m to an inclination of \pm 49°. Inclination and direction were held to section TD at 3395m MD / 3228m TVD. Inclination fell back to \pm 41° at ca 3700 m and the hole was kept at that inclination to final TD. The well was drilled with seawater and hi-vis sweeps down to 1350 m, with KCl/Glydril (glycol) mud from 1350 m to 2422 m, and with Versavert oil based mud from 2422 m to TD.

Reservoir quality sands were encountered at all levels identified prior to drilling as potential targets, namely: the Brent Group, Cook Formation and Statfjord Formation. In addition, sand was encountered within the Lunde Formation.

The MDT tool was run on wire line, obtaining 11 successful pressure tests. The results gave water gradients in the Brent and Dunlin sands. Possible low hydrocarbon saturation (residual) could be interpreted from logs in the Amundsen and Statfjord/Lunde Formations, though there were no other observations to support this. No significant shows were recorded, neither on the rig nor from post-well geochemical analyses. However, the use of oil-based mud made geochemical interpretations of rock extracts problematic. The conclusion was a non-commercial well with no hydrocarbon bearing sands. No cores, neither conventional nor sidewall, were obtained. No fluid samples were attempted.

The well was permanently plugged and abandoned as a dry hole on 27 August 2002.

TESTING

No drill stem test was performed