Groups Formation Tops NORDLAND GP TOP **NAUST FM TOP** 300 400 500 600 700 800 900 1000 1100 1200 KAI FM TOP **BRYGGE FM TOP** 1300 TD (m) 1400 GALAND GP TOP TARE FM TOP 1500 TANG FM TOP SHETLAND GP TOP SPRINGAR FM TOP 1600 **NISE FM TOP CROMER KNOLL GP TOP LANGE FM TOP** 1700 → ○ ○ ○ ○ ○ 000000 000000 0000000 1800 VIKING GPTOP 1900 **FANGST GP TOP ILE FM TOP BÅT GP TOP ROR FM TOP** 2000 TILJE FM TOP 2100 ÅRE FM TOP 2200 2300 GREY BEDS (INFORMAL) TOP

2500

Wellbore History

GENERAL

Well 6609/10-2 was drilled in the Helgeland Basin in the Norwegian Sea. The main objective was to test the hydrocarbon potential of the Lower Jurassic Båt Group in the Trolla Prospect, with the Early Jurassic Tilje and Åre formations as the main targets. The Middle Jurassic Garn and Ile formations were secondary targets. Well 6609/10-2 was planned as a vertical exploration well with TD 200 m into the Triassic Grey Beds at approximately 2525 m MD-RKB.

OPERATIONS AND RESULTS

Wildcat well 6609/10-2 was spudded with the semi-submersible installation Songa Delta on 5 September 2009 and drilled to TD at 2528 m in the Late Triassic Grey Beds. A water kick was taken at 1640 m, in a thin permeable zone below seismic resolution. The well was closed in with an observed shut-in pressure of 1.43 sg EMW. The water kick was circulated out before displacing the well to kill mud and drilling continued. The well was drilled with spud mud down to 352 m, with AQUAMUL KCI/Polymer mud from 352 m to 1237 m, and with AQUACOL KCI/Polymer/glycol mud from 1237 m to TD.

The Fangst Group was present in form of 37 m thick Ile Formation and 45 m of Ror Formation, despite its presence being highly uncertain prior to drilling. The Tilje Formation was encountered at 2054 m while top Åre Formation was encountered at 2142 m. The main Båt Group reservoir was 367 m thick of which 182 m (50 %) was net sand according to log interpretation. Except for increased background gas readings when penetrating Jurassic coal seams, no hydrocarbons were detected in the reservoir section. Results from the analysis of Isotube gas samples confirmed the absence of hydrocarbons in the well. No hydrocarbon shows were recorded in the well.

No coring was undertaken due to dry hole. A Vertical Seismic Profile (VSP) tool was the only wire line log that was run. No wire line pressures or fluid samples were taken.

The well was permanently abandoned on 3 October 2009 as a dry well.

TESTING

No drill stem test was performed.