



THE ANALYSTS NORTH SEA

SHOW REPORT NUMBER CORE #1

COMPANY NORSK HYDRO A/S WELL NUMBER 30/7-2
LOCATION NORTH SEA - NORWEGIAN SECTOR DATE 27/9/75

- 1 SHOW INTERVAL 1753.0M TO 1765.2M
- 2 LITHOLOGY SST:gy,mic,fn,ang,m-crs,subrnd,fm,v poor srtg,w/ptchy oil stng,interbdd w/SH:lt gy,fm,subfiss,wxy,& SLTST:dk gy,mic,m-crse,mod hd,v fri,arg mat.SD:lt gy,unconsol, occ clr,med gnd,subrnd w/ptchy oil stng.Strg pet odour.
- 3 PENETRATION RATE: BEFORE 4 Min/M DURING 10-40 Min/M AFTER 16-20 Min/M
- 4 BACKGROUND GAS: BEFORE 8u DURING 12u AFTER 10u
- 5 CHROMATOGRAPH: C1 12u C2 - C3 - C4+ - (Overbalanced mud masking gas)
- 6 D-P-L POROSITY 10-40 (Av.20) % % %
- 7 VISIBLE POROSITY No consolidated formations;therefore unable to estimate visible porosity.
- 8 MUD WT 10.6 PORE PRESSURE 9.0 ECD 10.8
- 9 FLOURESCENCE 90 %, COLOR Strong bright yellow
- 10 CUT Inst brn vis stmg COLOR White-pale yellow INTENSITY Strong
- 11 WT. ON BIT 10-25K x1000 LBS , ROTARY SPEED 110-120 R-P-M
- 12 BIT; MAKE Christensen TYPE C22 Core Barrel SIZE 8 15/32"
- 13 CHLORIDES : BEFORE - DURING - AFTER -
- 14 REMARKS

Core Recovery 94.4% (11.5M/12.2M)

UNIT A 151 M UNIT MANAGER DAVE RACHER



THE ANALYSTS NORTH SEA

SHOW REPORT NUMBER CORE #3

COMPANY NORSK HYDRO A/S WELL NUMBER 30/7-2
LOCATION NORTH SEA - NORWEGIAN SECTOR DATE 29/9/75

- 1 SHOW INTERVAL 1780.2m. TO 1792.4m.
- 2 LITHOLOGY SD: unconsol. clr, qtz, dkyell-brn (oil stnd), med grnd grdg to f gr, subrnd, fairly well
srted, tr. musc. Tr. SLT: poorly srt, much musc, no staining.
- 3 PENETRATION RATE: BEFORE 16-20 min/m. DURING 15-60 min./m. AFTER 9-40 min/m.
- 4 BACKGROUND GAS: BEFORE 10u DURING 6u AFTER 9u
- 5 CHROMATOGRAPH: C1 6u C2 - C3 - C4+ - (Overbalanced mud masking gas)
- 6 D-P-L POROSITY 9 - 32 (ave. 18) % % %
- 7 VISIBLE POROSITY No consolidated formations; unable to estimate visible porosity
- 8 MUD WT 10.6 PORE PRESSURE 9.0 ECD 10.8
- 9 FLOURESCENCE 70% %, COLOR white - yellow
- 10 CUT Inst strmg amber cut COLOR yellow-white INTENSITY Strong uniform
- 11 WT. ON BIT 10-26 x1000 LBS, ROTARY SPEED 100-110 R-P-M
- 12 BIT; MAKE Christensen TYPE C22 core barrel (RR) SIZE 8 15/32"
- 13 CHLORIDES : BEFORE - DURING - AFTER -
- 14 REMARKS

Core recovery 100% (12.2m.)

UNIT A 151 M UNIT MANAGER DAVE RACHER



THE ANALYSTS NORTH SEA

SHOW REPORT NUMBER CORE #4

COMPANY NORSK HYDRO A/S WELL NUMBER 30/7-2
LOCATION NORTH SEA NORWEGIAN SECTOR DATE 30/9/75

- 1 SHOW INTERVAL 1792.4m. TO 1802.5m.
- 2 LITHOLOGY SD: unconsol, dk yell-brn(oilstnd), m-occ f gr, subang-subrnd, mic, well srt, tr, hd
blk min (?)
- 3 PENETRATION RATE: BEFORE 15-60 min./m. DURING 9-40 min/m. AFTER 9-40 min/m.
- 4 BACKGROUND GAS: BEFORE 6u DURING 9u AFTER 8u
- 5 CHROMATOGRAPH: C1 9u C2 - C3 - C4⁺ - (Overbalanced mud masking gas)
- 6 D-P-L POROSITY 10-36 (ave.20) % % %
- 7 VISIBLE POROSITY Nonconsolidated formation; unable to estimate visible porosity
- 8 MUD WT 10.4 PORE PRESSURE 9.0 ECD 10.6
- 9 FLOURESCENCE 80% %, COLOR white-yellow
- 10 CUT Inst strmg dk amber vis COLOR white-blue/white INTENSITY Strong - uniform/patchy
- 11 WT. ON BIT 18-25 x1000 LBS , ROTARY SPEED 110-120 R-P-M
- 12 BIT; MAKE Christensen TYPE C22 core barrel (ReRun) SIZE 8 15/32"
- 13 CHLORIDES : BEFORE - DURING - AFTER -
- 14 REMARKS

Core recovery 81.5% (8.2m. from 10.1m.)

UNIT A 151 M UNIT MANAGER DAVE RACHER



THE ANALYSTS NORTH SEA

SHOW REPORT NUMBER CORE #5

COMPANY NORSK HYDRO A/S WELL NUMBER 30/7-2
LOCATION NORTH SEA - NORWEGIAN SECTOR DATE 30/9/75

- 1 SHOW INTERVAL 1802.5m. TO 1816.2m.
- 2 LITHOLOGY SST: clr qtz, v. fria, f-v. f (occ m) gr, sl arg, poorly consol; dk yell-brn (oil stnd),
f-m gr, rnd-subrnd, well srt, sl mic. Tr, SLTST: mod hd, ang-subrnd, SH: clean dk gy,
smooth, w/mica.
- 3 PENETRATION RATE: BEFORE 9-40 min/m. DURING 9-40 min/m. AFTER 120-140 min/m.
- 4 BACKGROUND GAS: BEFORE 9u DURING 8u AFTER 8u
- 5 CHROMATOGRAPH: C1 8u C2 - C3 - C4⁺ - (Overbalanced mud masking gas)
- 6 D-P-L POROSITY 5-38 (ave. 15) % % %
- 7 VISIBLE POROSITY Relatively good in parts; otherwise unconsol. formation affords no information
- 8 MUD WT 10.5 PORE PRESSURE 9.0 ECD 10.7
- 9 FLOURESCENCE 80% %, COLOR Strong yellow
- 10 CUT Inst strmg dk amber vis COLOR blue-white INTENSITY Strong
- 11 WT. ON BIT 13-17 x 1000 LBS, ROTARY SPEED 100-120 R-P-M
- 12 BIT; MAKE Christensen TYPE C22 core barrel (RR) SIZE 8 15/32"
- 13 CHLORIDES : BEFORE - DURING - AFTER -
- 14 REMARKS

Core recovery initially 84.4% (11.6m. from 13.7m.)

2.1m. recovery with core #6 gives a total of 100% recovery

UNIT A 151 M UNIT MANAGER DAVE RACHER



THE ANALYSTS NORTH SEA

SHOW REPORT NUMBER CORE #6

COMPANY NORSK HYDRO A/S WELL NUMBER 30/7-2

LOCATION NORTH SEA - NORWEGIAN SECTOR DATE 1/10/75

- 1 SHOW INTERVAL 1819.0m. ** TO 1821.7m.
- 2 LITHOLOGY SD:unconsol,dk yelsh brn(oil stnd),ccc med gy,med-fn gnd,well srted,subang-
subrnd,v sl mic,Shows in upper pt of core only.
- 3 PENETRATION RATE: BEFORE 9-40 min/m. DURING 120-140 min/m. AFTER 2-5 min/m (Anomalous ROP)
- 4 BACKGROUND GAS: BEFORE 8u DURING 8u AFTER 4u
- 5 CHROMATOGRAPH: C1 8u C2 - C3 - C4+ - (Overbalanced mud masking gas)
- 6 D-P-L POROSITY 1-12 (ave. 5) % (Anomalous drlg response) %
- 7 VISIBLE POROSITY No consolidated formation; unable to estimate visible porosity.
- 8 MUD WT 10.5 PORE PRESSURE 9.1 ECD 10.7
- 9 FLOURESCENCE 25 %, COLOR straw yellow
- 10 CUT Inst lt amber vis cut COLOR Strmg white INTENSITY Mod strong
- 11 WT. ON BIT 15-17 x1000 LBS , ROTARY SPEED 105-120 R-P-M
- 12 BIT; MAKE Christensen TYPE C22 core barrel (RR) SIZE 8 15/32"
- 13 CHLORIDES : BEFORE - DURING - AFTER -
- 14 REMARKS

** Start of core #6 adjusted to this depth (corrected Schlumberger depth).
Anomalous ROP/drlg response ≡ Technical engineering problems.
Core recovery 100% (2.7m.)

UNIT A 151 M UNIT MANAGER DAVE RACHER



THE ANALYSTS NORTH SEA

SHOW REPORT NUMBER CORE#8

COMPANY NORSK HYDRO A/S WELL NUMBER 30/7-2
LOCATION NORTH SEA - NORWEGIAN SECTOR DATE 5/10/75

- 1 SHOW INTERVAL 1980.0 TO 2000.0
- 2 LITHOLOGY SST:lt olv gy, med-fn,rnd-subrnd,sft-mod hd,sl mic,rel w cmtd,calc/silic cmt.
intbdd w/occ SH: olv gy,subfiss & LST:v lt gy,v hd,m-fn gnd,Comnly formg Breccia:
compnts a/a w/Oil stnd fractures,Basal SD:clr,lt brn(oil stnd),fn-m,w srted,uncons.
- 3 PENETRATION RATE: BEFORE 5-30Min/M DURING 2-5Min/M AFTER 3-12Min/M
- 4 BACKGROUND GAS: BEFORE 3u DURING 6u AFTER 4u
- 5 CHROMATOGRAPH: C1 6u C2 - C3 - C4⁺ -(Overbalanced mud masking gas)
- 6 D-P-L POROSITY SST & BRECCIA 2-5 % SD 25-35 % %
- 7 VISIBLE POROSITY SST & BRECCIA V low/negligible,SD Unable to estimate:unconsolidated.
- 8 MUD WT 10.4 PORE PRESSURE 9.3 ECD 10.6
- 9 FLOURESCENCE Fractures 10% SD 90 %, COLOR Unifm strg yellow in fractures & sands.
- 10 CUT Lt brn/amber vis cut COLOR Strg yellow-white INTENSITY Instant strong.
- 11 WT. ON BIT 10-20 x1000 LBS , ROTARY SPEED 120-140 R-P-M
- 12 BIT: MAKE Christensen TYPE Core Barrel + C18 SIZE 8 15/32"
- 13 CHLORIDES : BEFORE - DURING - AFTER -
- 14 REMARKS

Core Recovery 30.0% (5.18m from 20.0m) No recovery below about 1989.0m.
Very significant drilling break 1988.0m continuing to 2000.0m
Interpreted as unconsolidated SD as described above (recovered at base
of core)

UNIT A 151 M UNIT MANAGER DAVE RACHER