

**General information**

Wellbore name	35/12-1
Type	EXPLORATION
Purpose	WILDCAT
Status	P&A
Factmaps in new window	link to map
Main area	NORTH SEA
Well name	35/12-1
Seismic location	NO.D4-84-83 & SP. 920
Production licence	174
Drilling operator	Saga Petroleum ASA
Drill permit	720-L
Drilling facility	TREASURE SAGA
Drilling days	58
Entered date	27.02.1992
Completed date	24.04.1992
Release date	24.04.1994
Publication date	27.02.2004
Purpose - planned	WILDCAT
Reentry	NO
Content	OIL SHOWS
Discovery wellbore	NO
Kelly bushing elevation [m]	26.0
Water depth [m]	351.0
Total depth (MD) [m RKB]	3020.0
Final vertical depth (TVD) [m RKB]	3018.0
Maximum inclination [°]	4.4
Bottom hole temperature [°C]	91
Oldest penetrated age	EARLY JURASSIC
Oldest penetrated formation	AMUNDSEN FM
Geodetic datum	ED50
NS degrees	61° 11' 4.06" N
EW degrees	3° 57' 45.41" E
NS UTM [m]	6783875.97
EW UTM [m]	551762.89
UTM zone	31
NPDID wellbore	1881



Wellbore history

General

The well 35/12-1 was drilled on the eastern border of the block 35/12 against a north-south oriented main fault, which is the eastern limit of the Uer Terrace. The primary purpose of the well was to test the hydrocarbon potential in sandstones of the Late Jurassic Sognefjord Formation. A secondary objective was to test the reservoirs of the Brent and Dunlin Groups.

Operations and results

Well 35/12-1 was spudded with the semi submersible rig Treasure saga on the 27 February 1992 and was drilled to TD at 3020 m in Early Jurassic (Early Pliensbachian - ? Sinemurian) rocks. The well was drilled with spud mud down to 486 m, with gel mud from 486 m to 1020 m, and with KCL mud from 1020 m to TD.

The well penetrated mainly claystones with minor sandstone intervals in the Nordland and Rogaland Groups. Shetland and Cromer Knoll Groups consisted mainly of claystones with limestones and marls. The well encountered 37 m of Draupne. Top Heather Formation was penetrated at 2398 m. The reservoir quality in the Heather Formation was poor. The formation consists of siltstone and some thin beds of fine sandstones with low porosity.

The sandstones in the Sognefjord Formation and the Fensfjord Formation sandstone had better reservoir quality with porosities around 20% in the Fensfjord Formation. Sandstones were also present in the Brent and Dunlin Groups. Some weak traces of hydrocarbons were observed in sandstone lamina on cores from the Upper parts of the Heather Formation. Weak traces of shows were recorded also in the Fensfjord Formation and into the Brent Group. Petrophysical evaluation showed that the sandstones of Jurassic age were water filled. The well was terminated 17 m into what was initially believed to be basement rocks, but which was shown by post-well analyses to be undifferentiated Early Jurassic sediments about 120 meters shallower than prognosis. Three cores were cut in the Heather Formation from 2415 m to 2458.5 m. One core was cut from 2598 m to 2606 m in the Sognefjord Formation. The well was permanently plugged on 24 April 1992 as a dry well.

Testing

No drill stem test was performed

Cuttings at the Norwegian Offshore Directorate

Cutting sample, top depth [m]	Cutting samples, bottom depth [m]
490.00	3018.00

Cuttings available for sampling?	YES
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Cores at the Norwegian Offshore Directorate



Core sample number	Core sample - top depth	Core sample - bottom depth	Core sample depth - uom
1	2415.0	2441.6	[m]
2	2442.0	2456.7	[m]
3	2457.0	2458.4	[m]
4	2598.0	2605.2	[m]

Total core sample length [m]	49.9
Cores available for sampling?	YES

Core photos

2415-2419m



2423-2427m



2427-2431m



2431-2435m



2435-2439m



2439-2441m



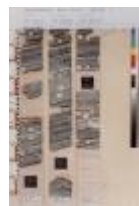
2442-2446m



2446-2450m



2450-2454m



2454-2456m



2457-2458m



2601-2605m



2598-2602m

Palynological slides at the Norwegian Offshore Directorate

Sample depth	Depth unit	Sample type	Laboratory
490.0	[m]	DC	RRI
500.0	[m]	DC	RRI
570.0	[m]	DC	RRI
610.0	[m]	DC	RRI



620.0 [m]	DC	RRI
640.0 [m]	DC	RRI
650.0 [m]	DC	RRI
660.0 [m]	DC	RRI
670.0 [m]	DC	RRI
680.0 [m]	DC	RRI
700.0 [m]	DC	RRI
710.0 [m]	DC	RRI
720.0 [m]	DC	RRI
750.0 [m]	DC	RRI
770.0 [m]	DC	RRI
890.0 [m]	DC	RRI
910.0 [m]	DC	RRI
930.0 [m]	DC	RRI
1020.0 [m]	DC	RRI
1040.0 [m]	DC	RRI
1060.0 [m]	DC	RRI
1080.0 [m]	DC	RRI
1100.0 [m]	DC	RRI
1120.0 [m]	DC	RRI
1130.0 [m]	DC	RRI
1170.0 [m]	DC	RRI
1190.0 [m]	DC	RRI
1210.0 [m]	DC	RRI
1230.0 [m]	DC	RRI
1250.0 [m]	DC	RRI
1270.0 [m]	DC	RRI
1290.0 [m]	DC	RRI
1310.0 [m]	DC	RRI
1330.0 [m]	DC	RRI
1350.0 [m]	DC	RRI
1370.0 [m]	DC	RRI
1380.0 [m]	DC	RRI
1400.0 [m]	DC	RRI
1420.0 [m]	DC	RRI
1440.0 [m]	DC	RRI
1450.0 [m]	DC	RRI
1465.0 [m]	DC	RRI
1480.0 [m]	DC	RRI
1495.0 [m]	DC	RRI



1510.0 [m]	DC	RRI
1535.0 [m]	DC	RRI
1550.0 [m]	DC	RRI
1580.0 [m]	DC	RRI
1615.0 [m]	DC	RRI
1630.0 [m]	DC	RRI
1645.0 [m]	DC	RRI
1660.0 [m]	DC	RRI
1675.0 [m]	DC	RRI
1690.0 [m]	DC	RRI
1705.0 [m]	DC	RRI
1720.0 [m]	DC	RRI
1735.0 [m]	DC	RRI
1750.0 [m]	DC	RRI
1765.0 [m]	DC	RRI
1780.0 [m]	DC	RRI
1795.0 [m]	DC	RRI
1810.0 [m]	DC	RRI
1820.0 [m]	DC	RRI
1850.0 [m]	DC	RRI
1865.0 [m]	DC	RRI
1880.0 [m]	DC	RRI
1895.0 [m]	DC	RRI
1910.0 [m]	DC	RRI
1925.0 [m]	DC	RRI
1955.0 [m]	DC	RRI
1970.0 [m]	DC	RRI
1985.0 [m]	DC	RRI
2060.0 [m]	DC	RRI
2075.0 [m]	DC	RRI
2090.0 [m]	DC	RRI
2165.0 [m]	DC	RRI
2180.0 [m]	DC	RRI
2195.0 [m]	DC	RRI
2210.0 [m]	DC	RRI
2370.0 [m]	DC	RRI
2398.0 [m]	DC	RRI
2423.0 [m]	C	RRI
2436.0 [m]	C	RRI
2448.0 [m]	C	RRI



2458.0	[m]	C	RRI
2475.0	[m]	DC	RRI
2490.0	[m]	DC	RRI
2505.0	[m]	DC	RRI
2520.0	[m]	DC	RRI
2532.0	[m]	DC	RRI
2538.0	[m]	DC	RRI
2544.0	[m]	DC	RRI
2550.0	[m]	DC	RRI
2574.0	[m]	DC	RRI
2580.0	[m]	DC	RRI
2601.0	[m]	C	RRI
2619.0	[m]	DC	RRI
2631.0	[m]	DC	RRI
2646.0	[m]	DC	RRI
2661.0	[m]	DC	RRI
2676.0	[m]	DC	RRI
2691.0	[m]	DC	RRI
2706.0	[m]	DC	RRI
2751.0	[m]	DC	RRI
2766.0	[m]	DC	RRI
2781.0	[m]	DC	RRI
2796.0	[m]	DC	RRI
2811.0	[m]	DC	RRI
2826.0	[m]	DC	RRI
2856.0	[m]	DC	RRI
2901.0	[m]	DC	RRI
2916.0	[m]	DC	RRI
2949.0	[m]	DC	RRI
2961.0	[m]	DC	RRI
2976.0	[m]	DC	RRI
2997.0	[m]	DC	RRI
3003.0	[m]	DC	RRI
3012.0	[m]	DC	RRI
3018.0	[m]	DC	RRI

Lithostratigraphy



Top depth [mMD RKB]	Lithostrat. unit
377	NORDLAND GP
551	UTSIRA FM
573	ROGALAND GP
573	BALDER FM
600	SELE FM
999	LISTA FM
1054	NO FORMAL NAME
1087	LISTA FM
1400	VÅLE FM
1434	SHETLAND GP
1434	JORSALFARE FM
1513	KYRRE FM
1924	SVARTE FM
2180	CROMER KNOLL GP
2180	RØDBY FM
2247	ÅSGARD FM
2361	VIKING GP
2361	DRAUPNE FM
2398	HEATHER FM
2557	SOGNEFJORD FM
2667	HEATHER FM
2790	FENSFJORD FM
2886	BRENT GP
2886	TARBERT FM
2890	NESS FM
2908	DUNLIN GP
2908	DRAKE FM
2921	COOK FM
3003	AMUNDSEN FM

Composite logs

Document name	Document format	Document size [MB]
1881	pdf	0.39





Geochemical information

Document name	Document format	Document size [MB]
1881_1	pdf	3.24

Documents - older Norwegian Offshore Directorate WDSS reports and other related documents

Document name	Document format	Document size [MB]
1881_01_WDSS_General_Information	pdf	0.48
1881_02_WDSS_completion_log	pdf	0.18

Documents - reported by the production licence (period for duty of secrecy expired)

Document name	Document format	Document size [MB]
1881_35_12_1_COMPLETION_REPORT_AND_LOG	pdf	13.25

Logs

Log type	Log top depth [m]	Log bottom depth [m]
CST	520	1005
CST	1040	2208
CST	2280	3017
DIL MSFL LSS VOL GR AMS	2198	3023
DLL MSFL LSS LDL GR AMS	998	2207
DLL SFL LSS LDL CNL GR AMS	2198	2700
LDL CNL GR AMS	2650	3023
MWD - DIR	479	486
MWD - GR RES DIR	520	1005
MWD - GR RES DIR	998	2207
MWD - GR RES DIR	2198	3023
RFT GR AMS	2407	2660
RFT GR AMS	2660	2999
SHDT GR AMS	2198	3023
VSP	1285	2185
VSP	2110	3015



**Casing and leak-off tests**

Casing type	Casing diam. [inch]	Casing depth [m]	Hole diam. [inch]	Hole depth [m]	LOT/FIT mud eqv. [g/cm3]	Formation test type
CONDUCTOR	30	474.0	36	486.0	0.00	LOT
INTERM.	20	999.0	26	1020.0	1.41	LOT
INTERM.	13 3/8	2198.0	17 1/2	2215.0	1.60	LOT
OPEN HOLE		3020.0	12 1/4	3020.0	0.00	LOT

Drilling mud

Depth MD [m]	Mud weight [g/cm3]	Visc. [mPa.s]	Yield point [Pa]	Mud type	Date measured
385	1.04			WATER BASED	
419	1.04			WATER BASED	
486	1.04			WATER BASED	
856	1.11	6.0		WATER BASED	
1015	1.12	8.0		WATER BASED	
1020	1.17	10.0		WATER BASED	
1280	1.30	28.0		WATER BASED	
1439	1.30	29.0		WATER BASED	
1487	1.30	28.0		WATER BASED	
1600	1.30	27.0		WATER BASED	
1693	1.30	26.0		WATER BASED	
1769	1.30	28.0		WATER BASED	
1827	1.30	27.0		WATER BASED	
1899	1.30	28.0		WATER BASED	
1959	1.30	28.0		WATER BASED	
2046	1.28	27.0		WATER BASED	
2215	1.28	30.0		WATER BASED	
2352	1.32	30.0		WATER BASED	
2418	1.32	34.0		WATER BASED	
2445	1.32	34.0		WATER BASED	
2458	1.32	39.0		WATER BASED	
2596	1.32	29.0		WATER BASED	
2598	1.32	28.0		WATER BASED	
2647	1.32	27.0		WATER BASED	
2700	1.32	30.0		WATER BASED	



2778	1.30	32.0		WATER BASED	
2923	1.28	27.0		WATER BASED	
2975	1.25	27.0		WATER BASED	
3001	1.25	24.0		WATER BASED	
3020	1.25			WATER BASED	

Thin sections at the Norwegian Offshore Directorate

Depth	Unit
2602.65	[m]
2598.13	[m]
2439.47	[m]

Pressure plots

The pore pressure data is sourced from well logs if no other source is specified. In some wells where pore pressure logs do not exist, information from Drill stem tests and kicks have been used. The data has been reported to the NPD, and further processed and quality controlled by IHS Markit.

Document name	Document format	Document size [MB]
1881 Formation pressure (Formasjonstrykk)	pdf	0.22

