General information

Wellbore name	33/12-7
Type	EXPLORATION
Purpose	WILDCAT
Status	P&A
Factmaps in new window	link to map
Main area	NORTH SEA
Well name	33/12-7
Seismic location	NOD-8-87-012& SKUDDPUNKT 170
Production licence	152
Drilling operator	Den norske stats oljeselskap a.s
Drill permit	601-L
Drilling facility	DEEPSEA BERGEN
Drilling days	65
Entered date	22.02.1989
Completed date	27.04.1989
Release date	27.04.1991
Publication date	30.06.2005
Purpose - planned	WILDCAT
Reentry	NO
Content	DRY
Discovery wellbore	NO
Kelly bushing elevation [m]	23.0
Water depth [m]	140.0
Total depth (MD) [m RKB]	3703.0
Final vertical depth (TVD) [m RKB]	3696.0
Maximum inclination [°]	12.3
Bottom hole temperature [°C]	126
Oldest penetrated age	EARLY JURASSIC
Oldest penetrated formation	STATFJORD GP
Geodetic datum	ED50
NS degrees	61° 7' 35.72'' N
EW degrees	1° 54' 32.5'' E
NS UTM [m]	6777538.47
EW UTM [m]	441227.76
UTM zone	31
NPDID wellbore	1358

Wellbore history

General

Well 33/12-7 was designed to drill the Delta structure, a tilted fault block on the Tampen Spur, and was the only commitment well in licence 152. The primary objective was to test the hydrocarbon potential of the Brent group on the Delta structure. A secondary objective was to explore the Statfjord Formation on the same structure. The well was designed as a possible producer in case of a discovery. Shallow gas was predicted at 375 m MSL, 415 m MSL, and possibly in sand lenses on an erosion surface at 456 m MSL.

Operations and results

Wildcat well 33/12-7 was spudded with the semi-submersible installation Deepsea Bergen on 22 February 1989 and drilled to TD at 3703 m in Early Jurassic sediments of the Statfjord Formation. After drilling 26" section to 384 m fifteen days rig time were spent trouble shooting and repairing a leak in the BOP. Otherwise operations went without significant problems. The well was drilled with seawater and gel down to 383 m, with Newdrill/PAC/seawater from 383 m to 3034 m, and with gel/lignosulphonate from 3034 m to TD. No shallow gas was encountered in the well.

Sands were encountered in the Tarbert, Rannoch, Cook and Statfjord Formations. No shows of hydrocarbons were recorded while drilling, except for some residuals in the Cook Formation. Post-well organic geochemical analyses established that the Draupne Formation has potential for generation of oil and gas and that the Heather Formation has potential for condensate/light oil and gas. Draupne is immature and Heather marginally mature in the well location. Tarbert and Cook Formations were analysed for migrated hydrocarbons but no significant abundance were found.

One core was cut in the interval 3041 m to 3057.5 m. No fluid sampling was attempted.

The well was permanently abandoned on 27 April 1989 as a dry hole.

Testing

No drill stem test was performed.

Cuttings at the Norwegian Offshore Directorate

Cutting sample, top depth [m]	Cutting samples, bottom depth [m]
390.00	3703.00

Cuttings available for sampling?	YES

Cores at the Norwegian Offshore Directorate

Core sample number	Core sample - top depth	Core sample - bottom depth	Core sample depth - uom
1	3035.0	3051.5	[m]

Total core sample length [m]	16.5
Cores available for sampling?	YES

Palynological slides at the Norwegian Offshore Directorate

Sample depth	Depth unit	Sample type	Laboratory
1700.0	[m]	DC	STRAT
1800.0	[m]	DC	STRAT
1830.0	[m]	DC	STRAT
1860.0	[m]	DC	STRAT
1890.0	[m]	DC	STRAT
2010.0	[m]	DC	STRAT
2020.0	[m]	DC	STRAT
2030.0	[m]	DC	STRAT
2060.0	[m]	DC	STRAT
2100.0	[m]	DC	STRAT
2140.0	[m]	DC	STRAT
2180.0	[m]	DC	STRAT
2220.0	[m]	DC	STRAT
2260.0	[m]	DC	STRAT
2300.0	[m]	DC	STRAT
2340.0	[m]	DC	STRAT
2380.0	[m]	DC	STRAT
2420.0	[m]	DC	STRAT
2460.0	[m]	DC	STRAT
2500.0	[m]	DC	STRAT
2540.0	[m]	DC	STRAT
2580.0	[m]	DC	STRAT
2620.0	[m]	DC	STRAT
2660.0	[m]	DC	STRAT
2700.0	[m]	DC	STRAT
2740.0	[m]	DC	STRAT
2780.0	[m]	DC	STRAT
2820.0	[m]	DC	STRAT
2859.0	[m]	DC	STRAT
2901.0	[m]	DC	STRAT
2916.0	[m]	DC	STRAT
2922.0	[m]	DC	STRAT

2928.0	[m]	DC	STRAT
2931.0	[m]	DC	STRAT
2946.0	[m]	DC	STRAT
2961.0	[m]	DC	STRAT
2976.0	[m]	DC	STRAT
2991.0	[m]	DC	STRAT
3006.0	[m]	DC	STRAT
3021.0	[m]	DC	STRAT
3027.0	[m]	DC	STRAT
3039.7	[m]	C	STAT
3040.3	[m]	C	STAT
3046.6	[m]	C	STAT
3050.7	[m]	C	STAT
3069.0	[m]	DC	STRAT
3081.0	[m]	DC	STRAT
3096.0	[m]	DC	STRAT
3111.0	[m]	DC	STRAT
3126.0	[m]	DC	STRAT
3141.0	[m]	DC	STRAT
3156.0	[m]	DC	STRAT
3171.0	[m]	DC	STRAT
3186.0	[m]	DC	STRAT
3201.0	[m]	DC	STRAT
3216.0	[m]	DC	STRAT
3231.0	[m]	DC	STRAT
3237.0	[m]	DC	STRAT
3246.0	[m]	DC	STRAT
3252.0	[m]	DC	STRAT
3267.0	[m]	DC	STRAT
3282.0	[m]	DC	STRAT
3288.0	[m]	DC	STRAT
3294.0	[m]	DC	STRAT
3303.0	[m]	DC	STRAT
3318.0	[m]	DC	STRAT
3333.0	[m]	DC	STRAT
3348.0	[m]	DC	STRAT
3363.0	[m]	DC	STRAT
3378.0	[m]	DC	STRAT
3389.0	[m]	SWC	STAT
3399.3	[m]	SWC	STAT

3407.0	[m]	SWC	STAT
3417.0	[m]	SWC	STAT
3427.5	[m]	SWC	STAT
3441.0	[m]	SWC	STAT
3461.0	[m]	SWC	STAT
3473.0	[m]	SWC	STAT
3484.0	[m]	SWC	STAT
3489.0	[m]	DC	STRAT
3504.0	[m]	DC	STRAT
3519.0	[m]	DC	STRAT
3525.0	[m]	DC	STRAT
3540.0	[m]	DC	STRAT
3555.0	[m]	DC	STRAT
3570.0	[m]	DC	STRAT
3585.0	[m]	DC	STRAT
3600.0	[m]	DC	STRAT
3615.0	[m]	DC	STRAT
3630.0	[m]	DC	STRAT
3645.0	[m]	DC	STRAT
3662.0	[m]	SWC	STAT
3664.0	[m]	SWC	STAT
3678.0	[m]	DC	STRAT
3693.0	[m]	DC	STRAT
3703.0	[m]	DC	STRAT

Lithostratigraphy

Top depth [mMD RKB]	Lithostrat. unit
163	NORDLAND GP
927	UTSIRA FM
946	HORDALAND GP
1784	ROGALAND GP
1784	BALDER FM
1861	SELE FM
2007	VÅLE FM
2027	SHETLAND GP
2920	CROMER KNOLL GP
2927	VIKING GP
2927	DRAUPNE FM

2976	HEATHER FM
3022	BRENT GP
3022	TARBERT FM
3235	ETIVE FM
3248	RANNOCH FM
3296	BROOM FM
3306	DUNLIN GP
3306	DRAKE FM
3387	COOK FM
3472	BURTON FM
3530	AMUNDSEN FM
3660	STATFJORD GP

Composite logs

Document name	Document format	Document size [MB]
1358	pdf	0.53

Geochemical information

Document name	Document format	Document size [MB]
1358_1	pdf	1.70

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

Document name	Document format	Document size [MB]
1358_01_WDSS_General_Information	pdf	0.23
1358_02_WDSS_completion_log	pdf	0.21

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

Document name	Document format	Document size [MB]
1358_33_12_7_COMPLETION_REPORT_AND_LOG	pdf	23.60

Logs

Log type	Log top depth [m]	Log bottom depth [m]
CBL VDL	160	1600
CBL VDL	1400	3018
CDL CNL GR	3017	3701
CDL GR	364	3036
DIFF.TEMP	1505	1848
DIFL ACL GR	364	3688
DIPLOG	3017	3701
FMT	3388	3041
MWD - GR RES DIR	226	3703
SWC GR	3295	3670
VELOCITY	1300	3680

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	222.0	36	225.0	0.00	LOT
INTERM.	20	363.0	26	384.0	1.43	LOT
INTERM.	13 3/8	1610.0	17 1/2	1625.0	1.76	LOT
INTERM.	9 5/8	3017.0	12 1/4	3034.0	1.85	LOT
OPEN HOLE		3703.0	8 1/2	3703.0	0.00	LOT

Drilling mud

Depth MD [m]	Mud weight [g/cm3]	Visc. [mPa.s]	Yield point [Pa]	Mud type	Date measured
208	1.05			WATER BASED	23.02.1989
225	1.05	25.0	23.9	WATER BASED	27.02.1989
332	1.05	25.0	23.9	WATER BASED	27.02.1989
383	1.05	25.0	23.9	WATER BASED	27.02.1989
384	1.10	12.0	3.8	WATER BASED	03.03.1989
384	1.10	10.0	3.8	WATER BASED	28.02.1989
773	1.10	14.0	3.8	WATER BASED	16.03.1989
1218	1.20	16.0	3.4	WATER BASED	17.03.1989

1545	1.20	21.0	3.9	WATER BASED	20.03.1989
1548	1.20	21.0	3.8	WATER BASED	20.03.1989
1613	1.20	16.0	2.4	WATER BASED	20.03.1989
1625	1.20	16.0	3.8	WATER BASED	20.03.1989
1625	1.20	15.0	3.4	WATER BASED	21.03.1989
1625	1.12	17.0	3.8	WATER BASED	22.03.1989
1625	1.20	17.0	4.3	WATER BASED	20.03.1989
1625	1.13	12.0	3.8	WATER BASED	28.03.1989
1630	1.27	12.0	3.8	WATER BASED	28.03.1989
1827	1.27	20.0	3.8	WATER BASED	28.03.1989
2139	1.27	20.0	4.5	WATER BASED	28.03.1989
2388	1.27	19.0	3.4	WATER BASED	28.03.1989
2422	1.27	18.0	3.8	WATER BASED	28.03.1989
2424	1.27	18.0	3.4	WATER BASED	28.03.1989
2439	1.27	15.0	3.8	WATER BASED	29.03.1989
2511	1.27	18.0	2.9	WATER BASED	29.03.1989
2587	1.27	21.0	3.8	WATER BASED	29.03.1989
2628	1.27	20.0	3.8	WATER BASED	30.03.1989
2682	1.27	17.0	3.4	WATER BASED	30.03.1989
2730	1.27	20.0	2.8	WATER BASED	30.03.1989
2760	1.27	19.0	2.8	WATER BASED	30.03.1989
2821	1.27	16.0	3.4	WATER BASED	31.03.1989
2879	1.27	13.0	3.9	WATER BASED	31.03.1989
2904	1.27	13.0	3.4	WATER BASED	03.04.1989
2917	1.28	15.0	3.9	WATER BASED	03.04.1989
2937	1.52	19.0	5.3	WATER BASED	03.04.1989
2961	1.52	18.0	5.7	WATER BASED	03.04.1989
2976	1.52	18.0	6.2	WATER BASED	03.04.1989
3034	1.52	16.0	5.3	WATER BASED	03.04.1989
3034	1.55	17.0	5.3	WATER BASED	06.04.1989
3034	1.55	16.0	5.3	WATER BASED	05.04.1989
3034	1.52	17.0	4.8	WATER BASED	04.04.1989
3034	1.55	18.0	4.8	WATER BASED	07.04.1989
3035	1.47	18.0	4.8	WATER BASED	10.04.1989
3052	1.47	27.0	5.3	WATER BASED	10.04.1989
3054	1.47	25.0	5.3	WATER BASED	10.04.1989
3170	1.47	27.0	6.2	WATER BASED	11.04.1989
3170	1.47	27.0	6.2	WATER BASED	11.04.1989
3291	1.47	28.0	6.2	WATER BASED	12.04.1989
3315	1.47	28.0	4.7	WATER BASED	13.04.1989

3383	1.47	31.0	4.3	WATER BASED	14.04.1989
3472	1.47	34.0	4.7	WATER BASED	17.04.1989
3472	1.47	34.0	4.7	WATER BASED	17.04.1989
3472	1.47	34.0	4.7	WATER BASED	17.04.1989
3505	1.47	35.0	3.8	WATER BASED	17.04.1989
3505	1.47	35.0	3.8	WATER BASED	17.04.1989
3505	1.47	35.0	3.8	WATER BASED	17.04.1989
3583	1.47	33.0	4.8	WATER BASED	17.04.1989
3583	1.47	33.0	4.8	WATER BASED	17.04.1989
3583	1.47	33.0	4.8	WATER BASED	17.04.1989
3595	1.47	34.0	4.8	WATER BASED	18.04.1989
3628	1.47	33.0	3.8	WATER BASED	18.04.1989
3650	1.47	32.0	5.3	WATER BASED	19.04.1989
3703	1.47	36.0	5.3	WATER BASED	20.04.1989
3703	1.47	36.0	5.3	WATER BASED	20.04.1989
3703	1.47	36.0	3.4	WATER BASED	21.04.1989
3703	1.47	35.0	4.8	WATER BASED	24.04.1989
3703	1.47	34.0	3.4	WATER BASED	19.04.1989

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]
1358_Formation_pressure_(Formasjonstrykk)	pdf	0.23