General information

Lithostrat. unit	TAU FM
NPDID lithostrat. unit	164
Level	FORMATION
Lithostrat. unit, parent	BOKNFJORD GP

Level below

Lithostrat. unit

Description

Tau Formation

Name

From a village within the Boknfjord area in Rogaland. The formation represents only the lowermost, radioactive part of the Børglum Member as defined by Deegan and Scull (1977).

Well type section

Norwegian well 9/4-3 (Conoco) from 2400 m to 2437 m, coord N 57°36'54.5", E 04°18'57.7" (Fig 3.36).

Well reference section

Norwegian well 8/1-1 (Phillips) from 2551 m to 2606 m, coord N 57°51'43.53", E 03°12'27.64" (Fig 3.37).

Thickness

37 m in the type well and 55 m in the reference well.

Lithology

The Tau Formation consists of dark grey to black, pyritic, fissile, organic-rich slightly to non-calcareous shales.

Boundaries

This formation is highly radioactive and the boundaries are characterized by prominent log breaks. The underlying Egersund Formation is less radioactive and has a lower interval transit time than the Tau Formation. The upper boundary may be more gradational but shows a marked increase in radioactivity compared to the overlying unit.

Distribution

The formation is confined to the central part of the type area of the Boknfjord Group, and grades laterally into the Børglum unit southwards and eastwards.

Age

Kimmeridgian to Early Volgian.

Depositional environment

The Tau Formation was deposited in an anaerobic marine environment with high organic productivity and restricted bottom water circulation.

Source

- Vollset, J. and Doré, A. G. (eds.) 1984: A revised Triassic and Jurassic lithostratigraphic nomenclature for the Norwegian North Sea. NPD-Bulletin No. 3, 53 pp.

Wellbores penetrating

Wellbore name	Wellbore completion date	Top depth [m]	Bottom depth [m]
8/1-1	07.02.1972	2551	2606
8/3-1	10.10.1966	1831	1890
8/3-2	04.12.1982	2200	2290

8/4-1	25.07.1977	2351	2397
8/5-1	28.03.2013	2260	2314
8/12-1	23.07.1971	2661	2663
9/1-1 S	21.11.2011	2262	2332
9/2-1	28.04.1987	2993	3097
9/2-2	21.09.1987	2957	3062
9/2-3	08.02.1990	3098	3188
9/2-4 S	11.04.1994	3875	3993
9/2-5	21.07.1995	3021	3078
9/2-6 S	15.10.1996	4627	4714
9/2-7 S	10.06.1997	3683	3784
9/2-8 S	02.02.1998	5689	5769
9/2-9 S	17.09.1999	3551	3669
9/2-11	29.03.2010	2492	2574
9/2-12	14.10.2019	2825	2932
9/2-A-4	13.08.1996	4478	4560
9/3-1	04.09.1986	1686	1749
9/3-2	09.12.2005	2503	2607
9/4-1	19.05.1968	2200	2251
9/4-2	29.08.1970	2396	2435
9/4-3	19.08.1972	2400	2437
9/4-4	20.08.1977	2598	2668
9/4-5	01.08.2006	2603	2654
9/11-1	19.08.1971	1993	2005
10/4-1	12.07.2015	2215	2245
10/7-1	30.07.1992	1486	1539
10/8-1	17.01.1971	1451	1464
11/5-1	12.09.2007	1107	1141
16/11-1 S	31.10.1967	2124	2142
16/11-1 S	31.10.1967	2152	2165
16/11-2	23.07.1973	2127	2202
17/3-1	20.08.1995	2311	2339
17/6-1	07.02.2011	2489	2542
17/8-1	23.10.2021	2393	2417
17/9-1	23.10.1973	2165	2205
17/9-1 R	11.06.1974	2165	2205
17/10-1	24.03.1969	2640	2675
17/11-1	30.06.1968	2180	2195
17/11-2	17.05.1976	2495	2513
17/12-1 R	21.06.1972	2167	2215
17/12-3	03.02.1980	2236	2288

17/12-4	10.07.2009	2149	2198
17/12-4 A	15.08.2009	2358	2438
17/12-4 B	26.08.2009	2309	2377
18/10-1	01.01.1980	2277	2319
18/11-1	31.03.1974	1747	1800

Wellbores with cores

Wellbore name	Wellbore completion date	Core length [m]