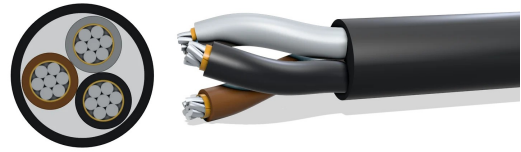


Application

BU 0.6/1 kV is a fire-resistant, flame-retardant, halogen-free and mud-resistant power and control cable for fixed installation on offshore units, drilling rigs, FPSOs and ships, designed to NEK TS 606 (code P17, now P110) and IEC 60092-353. The tinned copper conductors are wrapped with a mica tape fire barrier, insulated with halogen-free EPR and protected by a halogen-free, flame-retardant and mud-resistant thermoset outer sheath; the cable has no braid armour. It is intended for power, lighting and control circuits below 1 kV that must keep functioning during a fire, such as emergency and safety systems, fire-fighting circuits and other critical services in safe areas. Where mechanical protection or electromagnetic screening by a metal braid is required, the armoured version (BFOU) should be used instead.



CONSTRUCTION

Conductor	Tinned annealed stranded circular copper, class 2 acc. to IEC 60228.
Fire barrier	Mica (glass) tape applied over the conductor.
Insulation	Halogen-free EPR compound.
Outer sheath	Halogen-free, flame-retardant and mud-resistant thermoset compound (SHF2), black; no armour.
Core identification	Up to 4 cores: coloured cores acc. to NEK TS 606 (1: black; 2: blue, brown; 3: brown, black, grey; 4: blue, brown, black, grey); 5 cores and more: white cores with black numbers.

ELECTRICAL & THERMAL PROPERTIES

Rated voltage U₀/U	0.6/1 kV (max. operating voltage 1.2 kV).
Test voltage	3.5 kV.
Standard	NEK TS 606 (code P17 / P110); design acc. to IEC 60092-353; conductors acc. to IEC 60228.
Fire-resistant	Acc. to IEC 60331-21 (IEC 60331-1/-2).
Flame-retardant	Acc. to IEC 60332-1-2 and IEC 60332-3-22 Cat. A.
Halogen-free	Acc. to IEC 60754-1/-2; low smoke density acc. to IEC 61034-1/-2.
Mud-resistant	Yes, sheath resistant to oil and drilling mud acc. to NEK TS 606.
Max. conductor temperature	+90 °C.
Permitted outer cable temperature, fixed	-15 °C to +90 °C.
Min. bending radius, fixed	6 × outer diameter (8 × outer diameter during installation).
Reaction to fire (CPR)	Outside the scope of EN 50575 (shipboard / offshore cable, classified under IEC 60092 and marine type approval, not for permanent installation in construction works).

DIMENSIONS & TECHNICAL DATA

Cores × mm ²	Cond. R @20°C (Ω/km)	Nominal O.D. (mm)	Weight (kg/km)
1 × 1.5	12.2	6.4	65
2 × 1.5	12.2	10.3	155
3 × 1.5	12.2	10.9	180
4 × 1.5	12.2	12.1	225
5 × 1.5	12.2	14.3	265
6 × 1.5	12.2	15.6	305
7 × 1.5	12.2	15.6	320
8 × 1.5	12.2	18.4	425
9 × 1.5	12.2	19.9	440
10 × 1.5	12.2	20.2	495
12 × 1.5	12.2	20.9	530
14 × 1.5	12.2	21.9	630
16 × 1.5	12.2	23.3	690
19 × 1.5	12.2	24.6	790
20 × 1.5	12.2	26.1	880
23 × 1.5	12.2	28.4	1030
24 × 1.5	12.2	29.2	1035
27 × 1.5	12.2	29.9	1080
30 × 1.5	12.2	31.1	1250
33 × 1.5	12.2	32.3	1335
37 × 1.5	12.2	33.8	1445
44 × 1.5	12.2	38.4	1765
1 × 2.5	7.56	6.8	75
2 × 2.5	7.56	11	190
3 × 2.5	7.56	11.9	230
4 × 2.5	7.56	13	275
5 × 2.5	7.56	14.5	340
6 × 2.5	7.56	17	395
7 × 2.5	7.56	17	420
8 × 2.5	7.56	20	535
9 × 2.5	7.56	21.5	560
10 × 2.5	7.56	21.8	620
12 × 2.5	7.56	22.7	680
14 × 2.5	7.56	23.9	810
16 × 2.5	7.56	25.4	895
19 × 2.5	7.56	26.8	1000
20 × 2.5	7.56	28.4	1140
23 × 2.5	7.56	30.9	1325
24 × 2.5	7.56	31.8	1340
27 × 2.5	7.56	32.5	1395
30 × 2.5	7.56	33.9	1620
33 × 2.5	7.56	35.2	1735
37 × 2.5	7.56	36.8	1865
44 × 2.5	7.56	41.8	2295
1 × 4	4.7	7.4	95

Cores × mm ²	Cond. R @20°C (Ω/km)	Nominal O.D. (mm)	Weight (kg/km)
2 × 4	4.7	12.3	250
3 × 4	4.7	13.1	295
4 × 4	4.7	14.5	365
1 × 6	3.11	7.9	120
2 × 6	3.11	13.4	310
3 × 6	3.11	14.2	375
4 × 6	3.11	15.8	490
1 × 10	1.84	8.8	170
2 × 10	1.84	15.6	445
3 × 10	1.84	16.5	550
4 × 10	1.84	18.4	695
1 × 16	1.16	10.2	240
2 × 16	1.16	18.2	635
3 × 16	1.16	19.3	795
4 × 16	1.16	21.5	1005
1 × 25	0.734	12	360
2 × 25	0.734	22	970
3 × 25	0.734	23.5	1220
4 × 25	0.734	26.1	1550
1 × 35	0.529	13.1	455
2 × 35	0.529	24	1215
3 × 35	0.529	25.6	1545
4 × 35	0.529	28.5	1970
1 × 50	0.391	14.7	600
2 × 50	0.391	27.4	1615
3 × 50	0.391	29.5	2075
4 × 50	0.391	32.8	2645
1 × 70	0.27	16.6	805
2 × 70	0.27	32.6	2335
3 × 70	0.27	33.2	2775
4 × 70	0.27	36.9	3545
1 × 95	0.195	19	1095
2 × 95	0.195	37.6	3155
3 × 95	0.195	38.5	3800
4 × 95	0.195	42.8	4850
1 × 120	0.154	20.6	1345
2 × 120	0.154	41.2	3875
3 × 120	0.154	42	4685
4 × 120	0.154	46.5	5965
1 × 150	0.126	22.7	1635
2 × 150	0.126	45.4	4725
3 × 150	0.126	46.3	5685
4 × 150	0.126	54.6	8020
1 × 185	0.1	25.2	2070
2 × 185	0.1	50.2	5845
3 × 185	0.1	51.8	7215
4 × 185	0.1	60.3	9930

Cores × mm2	Cond. R @20°C (Ω/km)	Nominal O.D. (mm)	Weight (kg/km)
1 × 240	0.0762	28.4	2655
2 × 240	0.0762	56.8	7570
3 × 240	0.0762	58	9320
4 × 240	0.0762	68.4	12920
1 × 300	0.0607	31.1	3335
2 × 300	0.0607	63	9395
3 × 300	0.0607	67.6	12280
4 × 300	0.0607	75.5	15995

Outer diameters, weights and conductor resistance are the nominal manufacturer values of the leading reference source (tinned class-2 conductors, constructions without earth core); all values are indicative and non-binding.