

RS 485 Marine ARM

Flexible 1, 2 or 4 pairs

SHF1

120Ω

DNV-GL

Application

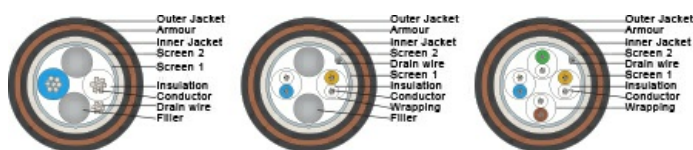
Armoured marine cable for monitoring oil wells and linking POS terminals, to alarm systems, motion control and HVAC controls. Extended capability transceivers offer data rates up to 100 Mbps and up to 256 nodes, as well as 2500 VRMS isolation and fault protection up to ± 60V. Installations up to 1200 m.



Construction

Conductor	0.22 [mm ²] Stranded Tinned Cu AWG 24 (7x0.20mm)
Insulation	Cellular PE
No. of pairs	1, 2 or 4
Colour code	IEC 60189-2
Screen	Al-polyester tape 100 [% optical coverage]
Screen 2	Cu- braid 85 [% optical coverage]
Inner jacket	SHF1
Armour alt.1	Bronze wire braid (BWB)
Armour alt.2	Tinned Cu-braid (TWB)
Armour alt.3	Galvanised steel wire braid (GSWB)
Jacket	Black SHF1 Available and approved DNV-GL with SHF2 jacket
O.D.	See table [mm]
Weight	See table [kg/km]

Jacket marking
NEK Kabel AS - RS485 SHF1 ARMURED MARINE CABLE 120ohm IEC 60332-3-22



Specifications

Operating temperature	-40 to +70 [°C]
Operating voltage	100 [V]
Characteristic Impedance @ 1MHz	120±15 [Ω]
Conductor resistance	<90 [Ω/km]
Insulation resistance	≥ 1 [GΩ x km]
Test voltage	2000 [V-DC 1min.]
Capacitance	42 [pF/m]
Min. bending radius	10 [x outer diam]

Norms

Halogenfree, max content corrosive and toxic gases	IEC 60754-1, 2
Material properties, insulation and sheath	IEC 60092-360 (359) 3582
Design and testing standards	IEC 61156-6
Flame retardant	IEC 60332-1
Fire retardant	IEC 60332-3-22 Cat.A
Oil and fuel, hydrocarbons resistant	IEC 60811-2-1 IRM 902 23°C / 7 days, 70°C / 4h
Smoke emission	IEC 61034-1, -2
UV-resistant	ASTM G 154
Certification	DNV-GL
Part No.	See table



Number of pairs	Diam. inner jacket [mm]	Diam. outer jacket [mm]	Weight app. [kg/km]	Part no.
1 x 2 x AWG24 BWB	5,8	9,5	160	1032395
2 x 2 x AWG24 BWB	7,3	11,2	190	1032396
4 x 2 x AWG24 BWB	8,0	12,0	230	1032397

Updated

Date	Rev.	Description
30.01.15	2	Update
5.4.2019	3	Update texts
15.4.2019	4	Additional information