

Nexans Ref.: BDBH20AA001CXNA

Country Ref.: 7763

Al conductor, XLPE insulated, Black PVC sheath. 0.6/1 kV. Made to AS/NZS 5000.1

DESCRIPTION

Application

- Industrial and commercial applications (predominantly)
- Some domestic applications
- For use in various situations to supply the main power from the point of supply (either single or three phase application) to buildings, equipment, eg, switch board to main control cabinet, main between floors and buildings, cable cabinet to motor, etc. Commonly used in Power Authority work.



STANDARDS

National AS/NZS 5000.1

CHARACTERISTICS

Construction characteristics

Conductor material	Aluminum
Type of conductor	Circular compacted stranded
Insulation	XLPE
Outer sheath	PVC
Sheath colour	Black
With Green/Yellow core	No
With smaller neutral conductor	No

Dimensional characteristics

Conductor cross-section	70 mm ²
Nominal overall diameter	15.0 mm
Gland Size (A2 or A2F)	25
Approximate weight	0.32 kg/m
Neutral conductor section (when smaller)	- mm ²
Number of cores	1

Electrical characteristics

Max. DC resistance of the conductor at 20°C (Ohm/km)	0.443
Permissible short circuit current conductor 1s	- kA
Rated Voltage U ₀ /U (Um)	0.6/ 1 (1.2) kV

Mechanical characteristics

Cable flexibility	Rigid
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Usage characteristics

Max. conductor temperature in service	90 °C
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CURRENT CARRYING CAPACITIES SINGLE PHASE (IN AMPS) - SINGLE CONDUCTOR XLPE

Copper conductor - Circular compacted stranded - Insulation XLPE Aluminium conductor - Circular compacted stranded - Insulation XLPE Max. Conductor Temperature 90C

Conductor cross-section															
[mm²]		Cu	Al	Cu	Al	Cu	Al	Cu	Al	Cu	Al	Cu	Al	Cu	Al
70		300	233	246	191	224	175	335	335	276	214	249	194	-	
	Air Spaced from Surface, Unenclosed						Air touching, unenclosed					Air enclosed			
	Buried direct						Buried in single-way duct					Buried in multi-way duct			
	Cable surrounded by thermal insulation, unenclosed														

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- Ambient Air Temperature:30°C
- Soil Temperature:15°C
- Soil Thermal Resistivity:1.2 K.m/W
- Depth of Burial:0.5 m

CURRENT CARRYING CAPACITIES THREE PHASE (IN AMPS) - SINGLE CONDUCTOR XLPE

Copper conductor - Circular compacted stranded - Insulation XLPE Aluminum conductor - Circular compacted stranded - Insulation XLPE Max. Conductor Temperature 90C

Conductor cross-section															
[mm²]		Cu	Al	Cu	Al	Cu	Al	Cu	Al	Cu	Al	Cu	Al	Cu	Al
70		264	205	246	191	201	156	280	217	248	193	217	169	-	
		Air Spaced from Surface, Unenclosed						Air touching, unenclosed						Air enclosed	
		Buried direct						Buried in single-way duct						Buried in multi-way duct	
		Cable surrounded by thermal insulation, unenclosed													

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