



LT XLPE CABLE

TDS Doc.No:PIL/TE/250425/000118

DESIGN CODE : LVIS09CXUAYL004C010SA001S

Particulars		4 Core X 10 Sq.mm
Name of Manufacturer		Polycab India Ltd.
Type of cable		2XY
Voltage Grade V		1100
No of cores X size in sqmm		4 Core X 10 Sq.mm
Conductor		
a) Material		Plain annealed Copper as per Class 2 of IS:8130/2013
b) Max. d.c. resistance of conductor at 20° C (ohm/km)		1.830
c) Shape of the conductor		Stranded Circular
Insulation		
a) Material		XLPE as per IS 7098(Pt-1)/88, Latest
b) Nominal thickness (mm)		0.7
c) Core Identification		Red, Yellow, Blue & Black
Inner Sheath		
a) Material		Extruded PVC Type ST2 as per IS:5831/84
b) Minimum thickness (mm)		0.3
Armouring		
a) Material		NA
b) Type of armouring		NA
c) Nominal size of armour (mm)		NA
Outer Sheath		
a) Material		Extruded FR-LSH PVC Type 'ST2' as per IS:5831/84
b) Thickness (mm)		1.8 (Nom.)
c) Colour of outer sheath.		Black
Electrical Parameters		
a) Max. a.c. resistance of conductor at 90° C (ohm/km)		2.33
b) Calculated Cable reactance (ohm/km)		0.0840
c) Impedance of cable (ohm/km)		2.330

Maximum conductor temperature under normal operating conditions	90°C
Maximum conductor temperature at the termination of short circuit	250°C
Short Circuit rating of conductor for the duration of 1 sec (kA)	1.43
Continuous Current carrying capacities :-	
(a) In Ground at 30°C (A)	74
(b) In Air at 40°C (A)	70
Applicable Standard	IS 8130/2013,IS 7098 Part I/88, IS 5831/84 etc. with latest up to date amendments
Approx. overall diameter of the cable in mm	18.0 +/- 2.0
Minimum bending radius	12 times Overall diameter
Max. Tensile strength	
(i) for Cables pulled with stocking (Newtons)	5 x D ² , D is the cable OD in mm
(ii) for Cables pulled with pulling eyes (N)	2,000
Embossing	POLYCAB ELECTRIC 1100 VOLTS GRADE XLPE FR-LSH
Printing	YEAR POLYCAB ELECTRIC 1100 VOLTS GRADE XLPE FR-LSH CABLE SIZE CABLE TYPE WITH SEQUENTIAL MARKING at every one meter interval.
Standard Drum Length (Mtr.)	1000 ± 5%
Non- Standard Drum Length (Mtr.)	Maximum 5% of order quantity
FR-LSH PROPERTIES	
a) Oxygen Index	Min. 29% as per ASTM D- 2863
b) Temperature Index	Min. 250 Deg.C as per ASTM D- 2863
c) Smoke Density Rating	Max. 60% as per ASTM D- 2843
d) Acid Gas Generation	Max. 20% as per IEC- 754- 1
e) Flammability Test	As per IEC:332-I