



LT XLPE CABLE

TDS Doc.No:PIL/TE/250425/002787

DESIGN CODE : LVIS09CXSWYL004C2.5SA002S

| Particulars | 4 Core X 2.5 Sq.mm |
|--|--|
| Name of Manufacturer | Polycab India Ltd. |
| Type of cable | 2XWY |
| Voltage Grade V | 1100 |
| No of cores X size in sqmm | 4 Core X 2.5 Sq.mm |
| Conductor | |
| a) Material | Plain annealed Copper as per Class 1 of IS:8130/2013 |
| b) Max. d.c. resistance of conductor at 20° C (ohm/km) | 7.4100 |
| c) Shape of the conductor | Solid 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 | Galvanised Steel |
| b) Type of armouring | Round Wire |
| c) Nominal size of armour (mm) | 1.400 |
| d) Tolerance | +/- 0.040 |
| Outer Sheath | |
| a) Material | Extruded FR-LSH PVC Type ST2 as per IS:5831/84 |
| b) Thickness (mm) | 1.24 (Min.) |
| c) Colour of outer sheath. | Black |
| Electrical Parameters | |
| a) Max. a.c. resistance of conductor at 90° C (ohm/km) | 9.4500 |
| b) Calculated Cable reactance (ohm/km) | 0.0983 |

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|---|--------|
| c) Impedance of cable (ohm/km) | 9.4500 |
| d) Approx. Cable Capacitance (mfd/km) | 0.19 |
| 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) | 0.36 |

Continuous Current carrying capacities :-

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|---|---|
| (a) In Ground at 30°C (A) | 34 |
| (b) In Air at 40°C (A) | 30 |
| Applicable Standard | IS 8130/2013, IS 7098 Part I/88, IS 5831/84, IS 3975/1999 etc. with latest up to date amendments |
| Approx. overall diameter of the cable in mm | 14.0 +/- 2.0 |
| Minimum bending radius | 12 times Overall diameter |
| Max. Tensile strength | |
| (i) for Cables pulled with stocking (Newtons) | 9 x D ² , D is the cable OD in mm |
| (ii) for Cables pulled with pulling eyes (N) | 500 |
| 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 |