



# LT XLPE CABLE

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| Particulars   | 3 Core X 4 Sq.mm   |
|---|--|
| Name of Manufacturer                                | Polycab India Ltd  |
| Type of cable                                       | 2XWY   |
| Voltage Grade V                                     | 1100   |
| No of cores X size in sqmm                          | 3 Core X 4 Sq.mm   |
| Conductor   |  |
| Material  | Plain annealed Copper as per Class 2 of IS:8130/2013, latest |
| Max. D.C. resistance of conductor at 20° C (ohm/km) | 4.61   |
| Shape of the conductor                              | Stranded Circular  |
| Insulation  |  |
| Material  | XLPE as per IS 7098(Pt-1)/88, Latest                         |
| Nominal thickness (mm)                              | 0.7  |
| Core identification                                 | Red, Yellow, Blue  |
| Inner Sheath  |  |
| Material  | Extruded PVC Type ST2 as per IS:5831/84                      |
| Minimum thickness (mm)                              | 0.3  |
| Armouring   |  |
| Material  | Galvanised Steel   |
| Type of armouring                                   | Round Wire   |
| Nominal size of armour (mm)                         | 1.4  |
| Tolerance on armour dimensions                      | ± 0.040 mm   |
| Outer Sheath  |  |
| Material  | Extruded FR-LSH PVC Type 'ST2' as per IS:5831/84             |
| Thickness (mm)                                      | 1.24 (Min.)  |
| Colour of outer sheath.                             | Black  |
| Electrical Parameters                               |  |
| Max. a.c. resistance of conductor at 90° C (ohm/km) | 5.88   |
| Calculated Cable reactance (ohm/km)                 | 0.093  |
| Impedance of cable (ohm/km)                         | 5.88   |
| Approx. Cable Capacitance (mfd/km)                  | 0.25   |

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Note: -The values given above are subject to tolerances as per the relevant standards.

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|   |       |
|---|-------|
| 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)  | 0.57  |

**Continuous Current carrying capacities :-**

|   |   |
|---|---|
| In Ground at 30°C (A)   | 45  |
| In Air at 40°C (A)  | 41  |
| Applicable Standard   | IS 7098 Part I/88,IS 8130/2013,IS 5831/84, IS 3975/1999 etc. with latest up to date amendments                                |
| Approx. overall diameter of the cable in mm                     | 15.0 +/- 2.0  |
| Minimum bending radius  | 12 times Overall diameter   |
| Max. Tensile strength for Cables pulled with stocking (Newtons) | 9 x D <sup>2</sup> , D is the cable OD in mm  |
| for Cables pulled with pulling eyes (N)                         | 600   |
| 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**

|                      |                                    |
|----------------------|------------------------------------|
| Oxygen Index         | Min. 29% as per ASTM D- 2863       |
| Temperature Index    | Min. 250 Deg.C as per ASTM D- 2863 |
| Smoke Density Rating | Max. 60% as per ASTM D- 2843       |
| Acid Gas Generation  | Max. 20% as per IEC- 754- 1        |
| Flammability Test    | As per IEC:332-I                   |