



## SWITCHBOARD CABLE

**Document ID: TE/QMS/F/02**

**DESIGN CODE : TLBL00CPUAYF003P0.5M**

Particulars	3P x 0.5 mm
Manufacturer Name	Polycab India Limited.
Cable Type	Dry Telephone Unscreened Unarmoured Cable
Applicable Specifications	Ref. GR/WIR-06/03. MAR 2002,
Number of Pairs	3 Pair
Conductor	
a) Material	Annealed Bare Copper Conforming to IS 8130 Latest.
b) Class	Class 1
c) Diameter Nom. (mm)	0.5
d) Shape of Conductor	Circular
e) Annealing (Min.)	15%
Insulation	
a) Material	HDPE Type III of ASTM D 1248/BS 6234
b) Nominal Thickness of insulation (mm)	The thickness of insulation shall be adequate to meet the electrical requirements
c) Method of Application	Extrusion
d) Colour scheme for identification of cores	As per IS-9938
Cable Elements	Two insulated conductors uniformly twisted together to form a pair with suitable Right Hand Lay
Colour coding / Pair identification	Table – 2 of GR/WIR-06/03 (Ref. Annexure-I)
Twinning & Group Twinning	3 Pair twisted together for Laid-up of 3 Pr,
Unit Identification	Not Applicable
Laid up	The units shall be laid up as per cable size and construction.
Outer Sheath	
a) Material	FR PVC
b) Colour	Grey
c) Type	ST 1 conforming to (As per IS – 5831)
d) Thickness Min. (mm)	0.65
e) Nominal Diameter (mm)	4.8 ± 1.0

Electrical Test	0.50 mm Conductor
a) Conductor Resistance (Max.)	92.2 Ω/Km
b) Capacitance unbalance Pair to Pair (Max)	230 pF/km
c) Insulation Resistance (Min.)	50 MΩ/Km
d) Dielectric Strength (DC Voltage) 3 kV DC or 2 kV RMS Applied between each conductor and the remaining conductor bunch and earth	Withstand for 1 Minutes. There should not any breakdown of the insulation.
Standard Length	Coil Formation (90/100/500 mtr)
Prominently Printing Marking on the Cable	"YEAR" "SIZE" "POLYCAB DAMAN" "FR" SEQUENTIAL LENGTH MARKING AT EVERY ONE METER

Annexure-1		
Pair Colour Coding		
	Colour of Insulation	Colour of Insulation
Pairing Element	Conductor "A"	Conductor "B"
1	White	Blue
2	White	Orange
3	White	Green

CABLE MAKE-UP		
No of Pairs	No of Unit	Identification Binder
3 Pair	1 x 3 Pr	Not Applicable