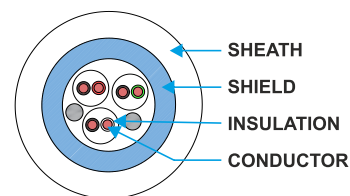




Instrumentation Cable

Multi Pair Overall - Shield Unarmoured Cables



Application

Instrumentation cables are used in diverse applications for control, monitoring, communication, data and voice transmission signals and process control circuits in industrial applications such as oil, gas, petrochemical industry, fertilizers, cement, steel plants, etc.

Construction

- Conductor : Plain or tin plated copper, class-1 solid, class-2 stranded, class-5 flexible as per IS : 8130, BS : 6360, IEC : 60228)
- Insulation : PVC-70°C / HR-85°C / 105°C, BS 5308 or polyethylene to BS 6234
- Pair / Triad identification : Identifications can be done by numbered polyester tape applied over each Pair / Triad or by number printing on a core of each Pair / Triad
- Overall screen : Multiple Pair / Triad laid up together and shielded with aluminium-mylar tape along with tinned copper drain wire. Longitudinal shielding of copper tape can also be provided
- Outer sheath : Extruded PVC / FR / FRLS / LSZH sheathed

Properties

- Halogen free
- Excellent fire resistance
- No smoke and fume generation
- Low gas emission
- Good mechanical tensile strength & elongation

Technical Parameter

Parameter	Unit	Conductor Size				
		0.5mm ² 1/0.8 mm	0.5mm ² 16/0.2 mm	0.75mm ² 24/0.2 mm	1.0mm ² 1/1.13 mm	1.5mm ² 7/0.53 mm
Insulation Thickness	mm	0.50	0.50	0.50	0.50	0.60
Conductor (Bare) resistance	Ω/Km (max.)	36	39	26	18.1	12.1
Insulation resistance	MΩ x Km	> 36.7	> 36.7	> 36.7	> 36.7	> 36.7
Mutual capacitance (c to c)	pF/m (max.)	250	250	250	250	250
Mutual capacitance (c to s)	pF/m (max.)	450	450	450	450	450
Inductance/resistance ratio (L/R)	μH/Ω (max.)	25	25	25	25	40



Multipair Instrumentation Cables (unarmoured) - BS 5308 Part 1 Type 1-Collectively Screened

Part code	Conductor	Number of Pairs	Nominal Overall Diameter (mm)	Approx. Weight (kg/km)
0301T010005	16/0.2mm (0.5mm ²)	1	6.4	60
0301T020005		2	7.3	80
0301T050005		5	12.5	200
0301T100005		10	16.6	340
0301T200005		20	21.7	570
0301T300005	30	26.3	790	
0301T010007	24/0.2mm (0.75mm ²)	1	6.7	75
0301T020007		2	7.7	100
0301T050007		5	13.7	250
0301T100007		10	18.1	450
0301T200007		20	23.9	800
0301T300007	30	28.9	1130	
0301T010010S	1/1.13mm (1.0mm ²)	1	6.8	85
0301T020010S		2	7.8	115
0301T050010S		5	13.7	290
0301T100010S		10	17.8	500
0301T200010S		20	23.8	950
0301T300010S	30	28.4	1330	
0301T010015	7/0.53mm (1.5mm ²)	1	7.7	100
0301T020015		2	9.1	150
0301T050015		5	15.8	360
0301T100015		10	21.0	670
0301T200015		20	27.9	1230
0301T300015	30	33.7	1720	

Solid conductor on request