

## **Master Flex Cables**

## INSTRUMENTATION CABLES, THERMOCOUPLE EXTENSION TYPE UN-ARMOURED / WIRE ARMOURED, UN - SIDELDED / OVERALL / INDIVIDUAL SIDELDED

## **Applications:**

Can be used for instrumentation/process control in chemical and petrochemical industries and are required to transfer reference junction to the control room.

Specifications: As per ANSI MC 96.1

	CONSTRUCTIONS	TECHNICAL DATA	
Conductor	Solid type of J (Iron/Constantan), K(Chromel/Alumel), T(Copper/Constantan) E(Chromel/Constantan), Type S&R (Copper/Alloy#11) as per spec. ANSI MC 96.1 IN 16AWG (1.29MM) for single pair & 20AWG (0.81 mm) for multi pair cables	Temperature range EX type JX type KX type TX type	-18 to 204°C. -18 to 204°C. -18 to 204°C. -59 to 93°C.
Insulation	PVC Type TI1 as per BS : 7655 Thickness shall eb 0.38 mm Min.	Working voltage	300/500 Volts
Color code	EX type : Chromel(+)-Purple & Constantan(-)Red JX type : Iron(+)-White & Constantan(-) -Red KX type : Chrome!(+) - Yellow & Alumel(-) - Red TX type Copper (+) - Blue & Constantan (-) Red	Minimum bending radius	12 x cable diameter
Pair shield (In case of individual shielded cables)	Each twisted pair shielded with aluminium polyester tape and a stranded tinned copper drain wire of size 0.5 mm2 for maximum electrostatic noise and cross talk rejection. All pair shields are electrically isolated from each other.	Conductor Loop resistance at 20°c-	Refer spec. ANSI MC 96.1
Overall shield (In case of Ind. & Overall shielded as well as overall shielded cables)	Individually shielded pairs are cabled with non hygroscopic fillers if necessary, and the entire assembly is shielded with aluminimum polyester tape and a stranded tinned copper drain wire of size 0.5 mm <sup>2</sup>	R.M.S. test voltage Core to core & Core to screen	1000 V rmsfor 1 minute.
Bedding (In case of armoured cables)	Extruded Black PVC Type TM1 of BS:7655	Inductance (Max.) Thermal EMF test	0.9 Micro Henry/Km. As per ANSI MC 96.1
Wire Armour (In case of Armoured cables)	A serving of round galvanized steel wires as per BS:1442, is applied with 90% minimum coverage.	Mutual Capacitance Core to core Core to Screen	250 nF/Km. Max 400nF/Km. Max.
Sheath	Extruded PVC Type TM1 of BS:7655. The colour of the sheath shall be PURPLE, BLACK, YELLOW & BLUE respectively for Type EX, JX, KX & TX cable.	Min. Insulation Resistance	100 Meg Ohms/Km.
Printing Legend	INSTRUMENTATION CABLE SHIELDED # PRX Area of cross section Type of conductor 300/500 V SURBHI YEAR		

PACKING: In Wooden Drums of 500/1000 Meters.

## NOTE:

- Sheath material shall be FR/FRLS/ZERO HALOGEN compound as per customer's request.
- As an alternate armoured cable shall be supplied with flat strip I Double steel Tape I Wire Braided as per customer requireme
- Higher pair count cables shall also be supplied Upto maximum overall diameter of 70mm.
- The given picture of the product may differ to its actual in construction/colour.

