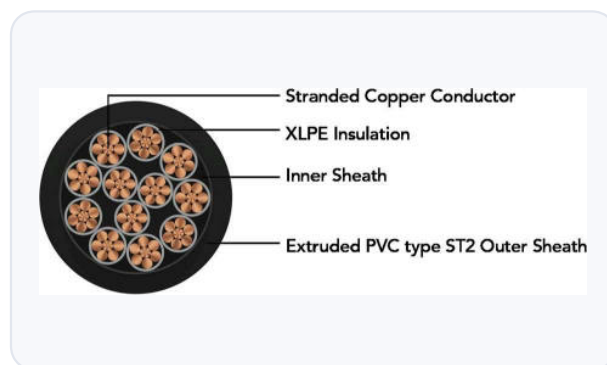


MULTICORE CONTROL CABLE · XLPE · UNARMoured · IEC 60502-1

INDOCABLES LV 2.5 CU IEC 60502-1 0.6/1 KV MC UA CONTROL CABLE, 0.6/1 (1.2) KV AC



Images not to scale. Follow table for dimensions

APPLICATION

INDOCABLES LV 2.5 CU IEC 60502-1 0.6/1 KV MC UA, stranded compacted copper conductor, XLPE insulated, and PVC sheathed unarmoured cable confirming to IEC 60502-1 is suitable for fixed installation such as distribution network or industrial installation. These cable cables are designed for systems with rated AC voltage 1KV ($U_m=1.2$ KV) & ≤ 1.5 KV (with a maximum 1.8 KV DC) between two live conductor.

CONSTRUCTION

- 01 **Conductor:** Circular Stranded Copper conductor as per IEC 60228, class 2
- 02 **Insulation:** XLPE as per IEC 60502-1
- 03 **Inner covering:** Extruded or Lapped PVC
- 04 **Outer Sheath:** Extruded Polyvinylchloride (ST2) or Polyethylene (ST7) or Halogen free (ST8) as per IEC 60502-1

CHARACTERISTICS

VOLTAGE RATING	Nominal Voltage: 0.6/1 (1.2) kV
OPERATION TEMPERATURE	Max. operating temperature up to 90°C
SHORT CIRCUIT TEMPERATURE	Max. 250°C
TEST VOLTAGE	3.5kV AC
CORE IDENTIFICATION	2 Core ●● Red, Black 3 Core ●●● Red, Yellow, Black 4 Core ●●●● Red, Yellow, Blue, Black 5 Core ●●●●● Red, Yellow, Blue, Black, Grey

6 Core
&
above

 Grey with number
printing

BENDING RADIUS

 Fixed installation 12 x Overall
diameter

OUTSTANDING FEATURES

HIGH LIFE

**HIGH INSULATION
RESISTANCE**

FLAME RETARDANT

LOW SMOKE

UV RESISTANT
STANDARD FOLLOWS

IEC 60228

IEC 60502-1

IEC 60332-1-2

COMPLIANCE

Conductor resistance

Insulation resistance

Shrinkage test

Flame Retardant test

IEC 60228

IEC 60502-1

IEC 60811-503

IEC 60332-1-2

**ACCREDITATIONS
& APPROVAL**


ISI



ISO 9001


 Make in
India

CM/L 6200267409

NOTES The above cable is also available with EPR/HEPR insulation type.



TABLE 1 WEIGHT AND DIMENSION DATA

PRODUCT CODE	NUMBER OF CORES No.	NOMINAL CROSS SECTIONAL AREA mm ²	NOMINAL INSULATION THICKNESS mm	NOMINAL SHEATH THICKNESS mm	OVERALL DIAMETER (APPROX.) mm	WEIGHT (APPROX.) Kg/Km
IC-CT-02-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	2	2.5	0.70	1.80	12.5	190
IC-CT-03-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	3	2.5	0.70	1.80	13.1	230
IC-CT-04-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	4	2.5	0.70	1.80	14.0	270
IC-CT-05-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	5	2.5	0.70	1.80	14.9	310
IC-CT-06-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	6	2.5	0.70	1.80	16.0	360
IC-CT-07-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	7	2.5	0.70	1.80	16.0	390
IC-CT-08-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	8	2.5	0.70	1.80	17.5	440
IC-CT-09-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	9	2.5	0.70	1.80	18.7	480
IC-CT-10-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	10	2.5	0.70	1.80	19.4	520
IC-CT-12-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	12	2.5	0.70	1.80	20.0	590
IC-CT-14-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	14	2.5	0.70	1.80	20.8	660
IC-CT-16-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	16	2.5	0.70	1.80	21.8	730
IC-CT-19-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	19	2.5	0.70	1.80	22.9	830
IC-CT-21-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	21	2.5	0.70	1.80	24.0	900
IC-CT-24-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	24	2.5	0.70	1.80	26.3	1020
IC-CT-27-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	27	2.5	0.70	1.80	26.8	1120
IC-CT-30-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	30	2.5	0.70	1.80	27.7	1220
IC-CT-33-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	33	2.5	0.70	1.80	28.7	1320
IC-CT-37-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	37	2.5	0.70	1.90	30.0	1460
IC-CT-44-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	44	2.5	0.70	2.00	34.0	1770
IC-CT-52-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	52	2.5	0.70	2.00	35.4	2020
IC-CT-61-00250-CU-2XL-2XY-0660-IEC60502P1-FRLS	61	2.5	0.70	2.10	37.7	2330

The above data is approximate & subject to manufacturing tolerance.

Product codes follow the Indo Cables product-code structure: IC – LINE – CORES – SIZE – CONDUCTOR – INSULATION – DESIGNATION – VOLTAGE – STANDARD – OPTION. 2XY denotes XLPE insulation, unarmoured construction and PVC sheath; 0660 the 600/1000 V grade; FRLS the flame-retardant low-smoke sheath option. No IEC 60502-1 item exists in the Item Master register yet: all 22 codes on this sheet are derived from the code structure and are pending entry.



TABLE 2 ELECTRICAL PARAMETER

Current rating and maximum DC conductor resistance.

NOMINAL CROSS SECTIONAL AREA mm ²	NUMBER OF CORES No.	MAX. DC CONDUCTOR RESISTANCE AT 20°C Ω/km	CURRENT RATING	
			In Ground at 20°C Amp.	In Air at 30°C Amp.
1.5	2	7.41	44	39.6
1.5	3	7.41	37	33
1.5	4	7.41	37	33
1.5	5	7.41	37	33
1.5	6	7.41	33.5	30
1.5	7	7.41	29	25
1.5	8	7.41	25	22
1.5	9	7.41	25	22
1.5	10	7.41	25	22
1.5	12	7.41	21.6	20
1.5	14	7.41	21.6	20
1.5	16	7.41	19	17.6
1.5	19	7.41	19	17.6
1.5	21	7.41	17	15
1.5	24	7.41	17	15
1.5	27	7.41	15	14
1.5	30	7.41	15	14
1.5	33	7.41	15	14
1.5	37	7.41	15	14
1.5	44	7.41	13	12
1.5	52	7.41	13	12
1.5	61	7.41	13	12

MAXIMUM CONDUCTOR TEMPERATURE 90°C	AMBIENT AIR TEMPERATURE 30°C	GROUND TEMPERATURE 20°C	DEPTH OF LAYING 750 mm	THERMAL RESISTIVITY OF SOIL 1.5 K.m/W
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FLAGGED — the source sheet gives 1.5 mm² in the nominal cross-sectional area column of this table, while the product and Table 1 are 2.5 mm². Values are reproduced as written; confirm before release. The ISO 9001 mark is a 52 × 53 px crop from a supplied screenshot



and prints well below the resolution a 300 dpi sheet needs. No RoHS or REACH mark is printed — no control-cable source sheet claims either. The Make in India mark is a 76 × 39 px crop from a supplied screenshot and prints at roughly a quarter of the resolution a 300 dpi sheet needs; supply a print-resolution file or hold the mark off the sheet. The reference header shows a lockup carrying the tagline EVERY CONNECTION MATTERS. No supplied logo file contains it and the design system has no confirmed tagline, so the header prints the stacked lockup alone; supply that lockup, or confirm the tagline, to set it.

TABLE 3 DE-RATING FACTORS

Current rating de-rating factors for other than 30°C ambient air temperature.

AIR TEMPERATURE °C	20	25	35	40	45	50	55	60
DE-RATING FACTOR	1.08	1.04	0.96	0.91	0.87	0.82	0.76	0.71

Current rating de-rating factors for other than 20°C ground temperature.

GROUND TEMPERATURE °C	10	15	25	30	35	40	45	50
DE-RATING FACTOR	1.07	1.04	0.96	0.93	0.89	0.85	0.8	0.76