

Polycab offers a comprehensive range of industrial cable in compliance with BIS specification & standard.



These are low voltage cable of 1100 V grade and widely used in building, Hospitals, Industrial parks and schools for major power supply. These cables are available with thermoplastic PVC compound having temperature rating of 70° C to 85°C.

Conductor: High conductivity annealed plain bunched/stranded copper conductor produced inhouse from state-of-the art Contirod line.

Insulation: Inhouse developed high insulation resistance thermoplastic PVC compound.

Sheath: The insulated cores are laid up to form circular core assembly, sheathing is provided with specially formulated PVC compound to facilitate stripping and withstand mechanical abrasion while in use.

Polycab assures the highest quality standard in every product by having stringent quality control with requisite testing which are applied at every single stage from raw material to finished goods.

The construction is based on the application and requirement of the user against IS 694.



[POLYCAB 02YY-K - Industrial Cable and Cords, 1100 V AC](#)



[POLYCAB 02YY-K MC - Industrial Cable, 1100 V AC](#)



[POLYCAB 02YY-R - Industrial Cable, 1100 V AC](#)



[POLYCAB 01Y-K FLAT & TWISTED - Twin twisted & Flat, 1100 V AC](#)



[POLYCAB 02YY-K - Industrial cable, 1100 V AC](#)

POLYCAB 02YY-K

Industrial cable, 1100 V AC



Application

POLYCAB 02YY-K power and control cable for fixed and flexible installation for industrial use where dry, damp and wet atmosphere. They are generally resistant to acids, caustic solution and certain oils in room temperature. Suitable to use in machine tool application, plant engineering, in panels, heating and air conditioning installation. Suitable for freely moved without forced guidance and tensile stress.

Voltage Rating

1100 V

Operation Temperature

Fixed: -15°C to 70°C

Construction

- Bunched copper conductor as per IS 8130/IEC 60228, class 5
- Insulated with PVC Type A to IS 5831
- Sheathed with PVC Type ST1 to IS 5831

Core Identification

| | |
|------------|--|
| Two core | Red, Black |
| Three core | Green/yellow, Red, Black Or Red, Yellow, Blue |
| Four core | Green/Yellow, Red, Yellow, Blue Or Red, Yellow, Blue, Black |
| Five core | Red, Yellow, Blue, Black, Grey |

Bending Radius

| | |
|--------------------|----------------------|
| Fixed installation | 6 x Overall diameter |
| Occasional | 8 x Overall diameter |

Standard and References

IS 8130:2013/IEC 60228
IS 5831:1984
IS 10810-53/IEC 60332-1

Compliance

Conductor resistance - IS 8130/IEC 60228
Insulation resistance - IS 5831:1984
Flammability test - IS 10810-53/IEC 60332-1

Approvals



OUR ACCREDITATION



POLYCAB 02YY-K

Industrial cable, 1100 V AC

| Product Code | Conductor size | Overall diameter | Weight (Approx.) |
|----------------------|---------------------|------------------|------------------|
| | n x mm ² | mm | kg/km |
| LDIS09CYUAY1002C0.5S | 2 x 0.5 | 6 | 50 |
| LDIS09CYUAY1003C0.5S | 3 G 0.5 | 6.4 | 57 |
| LDIS09CYUAY1004C0.5S | 4 G 0.5 | 6.9 | 69 |
| LDIS09CYUAY1002C.75S | 2 x 0.75 | 6.4 | 59 |
| LDIS09CYUAY1003C.75S | 3 G 0.75 | 6.8 | 69 |
| LDIS09CYUAY1004C.75S | 4 G 0.75 | 7.4 | 84 |
| LDIS09CYUAY1002C001S | 2 x 1 | 6.8 | 67 |
| LDIS09CYUAY1003C001S | 3 G 1 | 7.2 | 80 |
| LDIS09CYUAY1004C001S | 4 G 1 | 7.8 | 97 |
| LDIS09CYUAY1002C1.5S | 2 x 1.5 | 7.3 | 82 |
| LDIS09CYUAY1003C1.5S | 3 G 1.5 | 7.8 | 98 |
| LDIS09CYUAY1004C1.5S | 4 G 1.5 | 8.7 | 125 |
| LDIS09CYUAY1005C1.5S | 5 x 1.5 | 9.5 | 135 |
| LDIS09CYUAY1002C2.5S | 2 x 2.5 | 8.8 | 123 |
| LDIS09CYUAY1003C2.5S | 3 G 2.5 | 9.4 | 149 |
| LDIS09CYUAY1004C2.5S | 4 G 2.5 | 10.3 | 184 |
| LDIS09CYUAY1005C2.5S | 5 x 2.5 | 11.2 | 199 |
| LDIS09CYUAY1003C004S | 3 G 4 | 11 | 213 |
| LDIS09CYUAY1004C004S | 4 G 4 | 12.1 | 265 |
| LDIS09CYUAY1005C004S | 5 x 4 | 13.2 | 287 |
| LDIS09CYUAY1003C006S | 3 G 6 | 12.6 | 294 |
| LDIS09CYUAY1004C006S | 4 G 6 | 13.9 | 367 |
| LDIS09CYUAY1005C006S | 5 x 6 | 15.6 | 417 |
| LDIS09CYUAY1003C010S | 3 G 10 | 15.9 | 516 |
| LDIS09CYUAY1004C010S | 4 G 10 | 17.5 | 649 |
| LDIS09CYUAY1005C010S | 5 x 10 | 19.2 | 716 |
| LDIS09CYUAY1003C016S | 3 G 16 | 18.2 | 730 |
| LDIS09CYUAY1004C016S | 4 G 16 | 20 | 925 |
| LDIS09CYUAY1005C016S | 5 x 16 | 22 | 1029 |
| LDIS09CYUAY1003C025S | 3 G 25 | 22 | 1098 |
| LDIS09CYUAY1004C025S | 4 G 25 | 24.5 | 1409 |
| LDIS09CYUAY1005C025S | 5 x 25 | 27.1 | 1581 |
| LDIS09CYUAY1003C035S | 3 G 35 | 24.7 | 1467 |
| LDIS09CYUAY1004C035S | 4 G 35 | 27.5 | 1886 |
| LDIS09CYUAY1005C035S | 5 x 35 | 30.9 | 2156 |
| LDIS09CYUAY1003C050S | 3 G 50 | 29.6 | 2106 |
| LDIS09CYUAY1004C050S | 4 G 50 | 32.7 | 2686 |

X – without Green-Yellow conductor

G – with Green-Yellow conductor

OUR ACCREDITATION



POLYCAB 02YY-K

Industrial cable, 1100 V AC

Electrical characteristics

Current carrying capacity and Maximum DC conductor resistance.

| Nominal cross sectional area mm ² | Reference Method B (enclosed in conduit on a wall or in trunking etc.) | | Reference Method C (clipped direct) | | Reference Method E (free air or on a perforated cable tray etc, horizontal or vertical) | | Maximum DC conductor resistance at 20°C Ω/km |
|---|---|--|---|--|--|--|---|
| | 1 two-core cable* single-phase a.c. or d.c. Amp. | 1 three-core cable* or 1 four-core cable, three-phase a.c. Amp. | 1 two-core cable* single-phase a.c. or d.c. Amp. | 1 three-core cable* or 1 four-core cable, three-phase a.c. Amp. | 1 two-core cable* single-phase a.c. or d.c. Amp. | 1 three-core cable* or 1 four-core cable, three-phase a.c. Amp. | |
| 0.5 | 4 | 3.6 | 4 | 3.6 | - | - | 39 |
| 0.75 | 7 | 6 | 7 | 6 | - | - | 26 |
| 1 | 11 | 10 | 12 | 11 | 14 | 12 | 19.5 |
| 1.5 | 14 | 12 | 16 | 14 | 18 | 15 | 13.3 |
| 2.5 | 19 | 17 | 22 | 20 | 25 | 21 | 7.98 |
| 4 | 25 | 22 | 30 | 26 | 33 | 28 | 4.95 |
| 6 | 31 | 28 | 38 | 34 | 42 | 36 | 3.3 |
| 10 | 43 | 38 | 52 | 47 | 58 | 50 | 1.91 |
| 16 | 57 | 51 | 70 | 63 | 78 | 66 | 1.21 |
| 25 | 76 | 68 | 95 | 81 | 100 | 85 | 0.78 |
| 35 | 94 | 84 | 116 | 100 | 125 | 106 | 0.554 |
| 50 | 112 | 100 | 142 | 122 | 152 | 129 | 0.386 |

Air Ambient temperature: 40°C

Conductor operating temperature: 70°C

The above table is in accordance with Table 4D2A of BS 7671:2018

De-Rating Factor

De-rating factor for various ambient temperature.

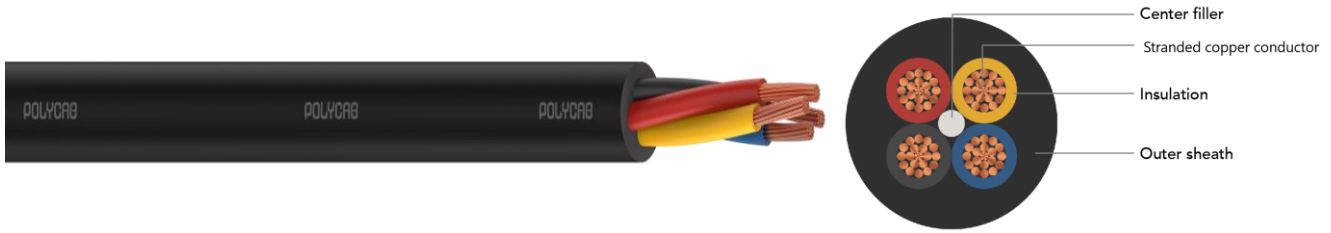
| Ambient Temperature | 35°C | 40°C | 45°C | 50°C | 55°C | 60°C | 65°C |
|---------------------|------|------|------|------|------|------|------|
| De-Rating Factor | 1.08 | 1 | 0.91 | 0.82 | 0.7 | 0.57 | 0.4 |

OUR ACCREDITATION



POLYCAB 02YY-R

Industrial Cable, 1100 V AC



Application

POLYCAB 02YY-R flexible cable insulated and sheathed with PVC conforming to IS 694 is suitable to use in electric power and lighting for indoor and outdoor use in AC single phase or three phase (earthed or unearthed) systems with rated voltage up to and including 1100 V. This cable is also suitable for DC systems with rated voltage up to and including 1500 V to earth.

Voltage Rating

1100 V

Operation Temperature

Fixed: -15°C to 70°C

Construction

- Stranded bare copper conductor as per IS 8130, class 2
- Insulated with PVC Type A to IS 5831
- Sheathed with PVC Type ST1 to IS 5831

Core Identification

| | |
|------------|--|
| Two core | Red, Black |
| Three core | Green/yellow, Red, Black Or Red, Yellow, Blue |
| Four core | Green/Yellow, Red, Yellow, Blue Or Red, Yellow, Blue, Black |
| Five core | Red, Yellow, Blue, Black, Grey |

Bending Radius

| | |
|--------------------|----------------------|
| Fixed installation | 6 x Overall diameter |
| Occasional | 8 x Overall diameter |

Note:

- The above cable also available in HR PVC insulation with maximum operating temperature 85°C.
- Outer sheath with additional properties with FR & FRLSH also available.

Standard and References

IS 8130:2013
IS 5831:1984
IEC 60332-1-2

Test Voltage

3000 V AC at (20±5) °C

Compliance

Conductor resistance - IS 8130
Insulation resistance - IS 5831:1984
Flammability test - IEC 60332-1-2

Approvals



OUR ACCREDITATION



POLYCAB 02YY-R

Industrial Cable, 1100 V AC

| Product Code | Conductor size n x mm ² | Nominal insulation thickness mm | Overall diameter (Approx.) mm | Weight (Approx.) kg/km |
|----------------------|---------------------------------------|------------------------------------|-------------------------------------|------------------------------|
| LDIS09CYUAY1002C001S | 2 X 1 | 0.6 | 7.33 | 81 |
| LDIS09CYUAY1002C1.5S | 2 X 1.5 | 0.7 | 8.4 | 110 |
| LDIS09CYUAY1002C2.5S | 2 X 2.5 | 0.8 | 9.84 | 155 |
| LDIS09CYUAY1002C004S | 2 X 4 | 0.8 | 10.99 | 207 |
| LDIS09CYUAY1002C006S | 2 X 6 | 0.8 | 12.27 | 271 |
| LDIS09CYUAY1002C010S | 2 X 10 | 1 | 15.14 | 426 |
| LDIS09CYUAY1002C016S | 2 X 16 | 1 | 17.25 | 594 |
| LDIS09CYUAY1002C025S | 2 X 25 | 1.2 | 20.91 | 897 |
| LDIS09CYUAY1002C035S | 2 X 35 | 1.2 | 23.4 | 1172 |
| LDIS09CYUAY1002C050S | 2 X 50 | 1.4 | 27.59 | 1649 |
| LDIS09CYUAY1002C070S | 2 X 70 | 1.4 | 31.07 | 2180 |
| LDIS09CYUAY1002C095S | 2 X 95 | 1.6 | 35.64 | 2912 |
| LDIS09CYUAY1002C120S | 2 X 120 | 1.6 | 38.95 | 3572 |
| LDIS09CYUAY1003C001S | 3 X 1 | 0.6 | 7.73 | 94 |
| LDIS09CYUAY1003C1.5S | 3 X 1.5 | 0.7 | 8.88 | 130 |
| LDIS09CYUAY1003C2.5S | 3 X 2.5 | 0.8 | 10.42 | 186 |
| LDIS09CYUAY1003C004S | 3 X 4 | 0.8 | 11.66 | 253 |
| LDIS09CYUAY1003C006S | 3 X 6 | 0.8 | 13.03 | 335 |
| LDIS09CYUAY1003C010S | 3 X 10 | 1 | 16.12 | 531 |
| LDIS09CYUAY1003C016S | 3 X 16 | 1 | 18.6 | 761 |
| LDIS09CYUAY1003C025S | 3 X 25 | 1.2 | 22.53 | 1156 |
| LDIS09CYUAY1003C035S | 3 X 35 | 1.2 | 25.2 | 1519 |
| LDIS09CYUAY1003C050S | 3 X 50 | 1.4 | 29.49 | 2125 |
| LDIS09CYUAY1003C070S | 3 X 70 | 1.4 | 33.23 | 2830 |
| LDIS09CYUAY1003C095S | 3 X 95 | 1.6 | 38.36 | 3813 |
| LDIS09CYUAY1003C120S | 3 X 120 | 1.6 | 41.92 | 4694 |
| LDIS09CYUAY1004C001S | 4 X 1 | 0.6 | 8.37 | 114 |
| LDIS09CYUAY1004C1.5S | 4 X 1.5 | 0.7 | 9.86 | 163 |
| LDIS09CYUAY1004C2.5S | 4 X 2.5 | 0.8 | 11.36 | 228 |
| LDIS09CYUAY1004C004S | 4 X 4 | 0.8 | 12.95 | 320 |
| LDIS09CYUAY1004C006S | 4 X 6 | 0.8 | 14.26 | 417 |
| LDIS09CYUAY1004C010S | 4 X 10 | 1 | 17.89 | 675 |
| LDIS09CYUAY1004C016S | 4 X 16 | 1 | 20.45 | 960 |
| LDIS09CYUAY1004C025S | 4 X 25 | 1.2 | 25.03 | 1477 |
| LDIS09CYUAY1004C035S | 4 X 35 | 1.2 | 28 | 1946 |
| LDIS09CYUAY1004C050S | 4 X 50 | 1.4 | 32.78 | 2725 |
| LDIS09CYUAY1004C070S | 4 X 70 | 1.4 | 37.15 | 3656 |
| LDIS09CYUAY1004C095S | 4 X 95 | 1.6 | 42.65 | 4901 |
| LDIS09CYUAY1004C120S | 4 X 120 | 1.6 | 46.61 | 6042 |

OUR ACCREDITATION



POLYCAB 02YY-R

Industrial Cable, 1100 V AC

Electrical characteristics

Current carrying capacity and maximum DC conductor resistance.

| Nominal cross sectional area mm ² | Reference method B (enclosed in conduit on a wall or in trunking etc) | | Reference method C (clipped direct) | | Reference method E (in free air or on a perforated cable tray horizontal or vertical) | | Maximum DC conductor resistance at 20°C Ω/km |
|---|--|--|--|--|---|--|---|
| | 1 two core cable single phase ac or dc Amp. | 1 three core cable or 1 four core cable three phase ac Amp. | 1 two core cable single phase ac or dc Amp. | 1 three core cable or 1 four core cable three phase ac Amp. | 1 two core cable single phase ac or dc Amp. | 1 three core cable or 1 four core cable three phase ac Amp. | |
| 1 | 11 | 10 | 13 | 12 | 15 | 13 | 18.1 |
| 1.5 | 14 | 13 | 17 | 15 | 19 | 16 | 12.1 |
| 2.5 | 20 | 17 | 23 | 21 | 26 | 22 | 7.41 |
| 4 | 26 | 23 | 31 | 28 | 35 | 30 | 4.61 |
| 6 | 33 | 30 | 40 | 36 | 44 | 37 | 3.08 |
| 10 | 45 | 40 | 55 | 50 | 61 | 52 | 1.83 |
| 16 | 60 | 54 | 74 | 66 | 82 | 70 | 1.15 |
| 25 | 78 | 70 | 97 | 84 | 104 | 88 | 0.727 |
| 35 | 97 | 86 | 120 | 104 | 129 | 110 | 0.524 |
| 50 | 116 | 103 | 146 | 125 | 157 | 133 | 0.387 |
| 70 | 146 | 130 | 185 | 160 | 202 | 171 | 0.268 |
| 95 | 175 | 156 | 224 | 194 | 245 | 207 | 0.193 |
| 120 | 202 | 179 | 260 | 225 | 285 | 240 | 0.153 |

Air Ambient temperature: 40°C

Conductor operating temperature: 70°C

The above table is in accordance with BS 7671(4D2A)

De-Rating Factor

De-rating factor for various ambient temperature.

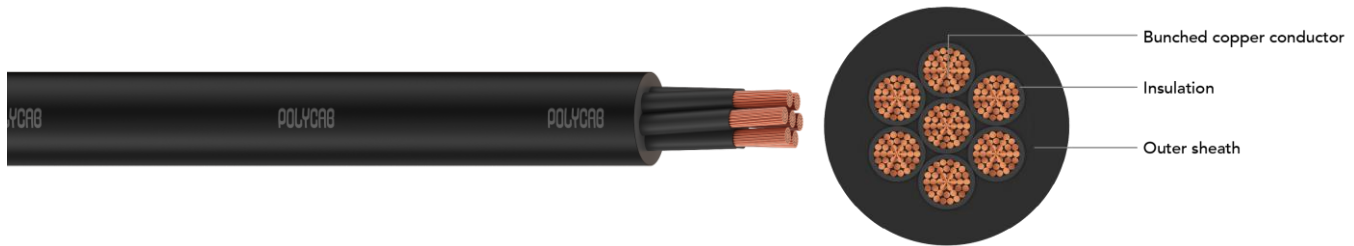
| Ambient Temperature | 35°C | 40°C | 45°C | 50°C | 55°C | 60°C | 65°C |
|---------------------|------|------|------|------|------|------|------|
| De-Rating Factor | 1.08 | 1 | 0.91 | 0.82 | 0.7 | 0.57 | 0.4 |

OUR ACCREDITATION



POLYCAB 02YY-K MC

Industrial Cable, 1100 V AC



Application

POLYCAB 02YY-K MC flexible cable insulated and sheathed with PVC conforming to IS 694 is suitable to use in electric power and lighting for indoor and outdoor use in AC single phase or three phase (earthed or unearthed) systems with rated voltage up to and including 1100 V. This cable is also suitable for DC systems with rated voltage up to and including 1500 V to earth.

Voltage Rating

1100 V

Operation Temperature

Fixed: -15°C to 70°C

Construction

- Bunched copper conductor as per IS 8130, class 5
- Insulated with PVC Type D to IS 5831
- Sheathed with PVC Type ST3 to IS 5831

Core Identification

As per IS 694:2010

Bending Radius

| | |
|--------------------|----------------------|
| Fixed installation | 6 x Overall diameter |
| Occasional | 8 x Overall diameter |

Standard and References

IS 8130:2013
IS 5831:1984
IEC 60332-1-2

Test Voltage

3000 V AC at (20±5) °C

Compliance

| | |
|-----------------------|-----------------|
| Conductor resistance | - IS 8130 |
| Insulation resistance | - IS 5831:1984 |
| Flammability test | - IEC 60332-1-2 |

Approvals



Note:

- The above cable also available in HR PVC insulation with maximum operating temperature 85°C.
- Outer sheath with additional properties FR & FRLSH available.

OUR ACCREDITATION



POLYCAB 02YY-K MC

Industrial Cable, 1100 V AC

| Product Code | Conductor size | Nominal insulation thickness | Overall diameter (Approx.) | Weight (Approx.) |
|----------------------|---------------------|------------------------------|----------------------------|------------------|
| | n x mm ² | mm | mm | kg/km |
| LDIS09CYUAY1006C0.5S | 6 x 0.5 | 0.6 | 8.14 | 85 |
| LDIS09CYUAY1006C.75S | 6 x 0.75 | 0.6 | 8.95 | 109 |
| LDIS09CYUAY1006C001S | 6 x 1 | 0.6 | 9.47 | 128 |
| LDIS09CYUAY1006C1.5S | 6 x 1.5 | 0.6 | 10.28 | 162 |
| LDIS09CYUAY1006C2.5S | 6 x 2.5 | 0.7 | 12.45 | 248 |
| LDIS09CYUAY1006C004S | 6 x 4 | 0.8 | 14.88 | 371 |
| LDIS09CYUAY1007C0.5S | 7 x 0.5 | 0.6 | 8.14 | 93 |
| LDIS09CYUAY1007C.75S | 7 x 0.75 | 0.6 | 8.95 | 121 |
| LDIS09CYUAY1007C001S | 7 x 1 | 0.6 | 9.47 | 142 |
| LDIS09CYUAY1007C1.5S | 7 x 1.5 | 0.6 | 10.28 | 181 |
| LDIS09CYUAY1007C2.5S | 7 x 2.5 | 0.7 | 12.45 | 279 |
| LDIS09CYUAY1007C004S | 7 x 4 | 0.8 | 14.88 | 419 |
| LDIS09CYUAY1008C0.5S | 8 x 0.5 | 0.6 | 9.29 | 111 |
| LDIS09CYUAY1008C.75S | 8 x 0.75 | 0.6 | 9.99 | 137 |
| LDIS09CYUAY1008C001S | 8 x 1 | 0.6 | 10.59 | 162 |
| LDIS09CYUAY1008C1.5S | 8 x 1.5 | 0.6 | 11.73 | 213 |
| LDIS09CYUAY1008C2.5S | 8 x 2.5 | 0.7 | 14.18 | 325 |
| LDIS09CYUAY1008C004S | 8 x 4 | 0.8 | 16.95 | 487 |
| LDIS09CYUAY1009C0.5S | 9 x 0.5 | 0.6 | 10.03 | 124 |
| LDIS09CYUAY1009C.75S | 9 x 0.75 | 0.6 | 11.00 | 159 |
| LDIS09CYUAY1009C001S | 9 x 1 | 0.6 | 11.66 | 187 |
| LDIS09CYUAY1009C1.5S | 9 x 1.5 | 0.6 | 12.69 | 237 |
| LDIS09CYUAY1009C2.5S | 9 x 2.5 | 0.7 | 15.58 | 371 |
| LDIS09CYUAY1009C004S | 9 x 4 | 0.8 | 18.61 | 554 |
| LDIS09CYUAY1010C0.5S | 10 x 0.5 | 0.6 | 10.45 | 134 |
| LDIS09CYUAY1010C.75S | 10 x 0.75 | 0.6 | 11.47 | 173 |
| LDIS09CYUAY1010C001S | 10 x 1 | 0.6 | 12.16 | 204 |
| LDIS09CYUAY1010C1.5S | 10 x 1.5 | 0.6 | 13.24 | 260 |
| LDIS09CYUAY1010C2.5S | 10 x 2.5 | 0.7 | 16.26 | 407 |
| LDIS09CYUAY1010C004S | 10 x 4 | 0.8 | 19.44 | 608 |
| LDIS09CYUAY1011C0.5S | 11 x 0.5 | 0.6 | 10.45 | 143 |
| LDIS09CYUAY1011C.75S | 11 x 0.75 | 0.6 | 11.47 | 184 |
| LDIS09CYUAY1011C001S | 11 x 1 | 0.6 | 12.16 | 218 |
| LDIS09CYUAY1011C1.5S | 11 x 1.5 | 0.6 | 13.24 | 279 |
| LDIS09CYUAY1011C2.5S | 11 x 2.5 | 0.7 | 16.26 | 437 |
| LDIS09CYUAY1011C004S | 11 x 4 | 0.8 | 19.44 | 656 |

OUR ACCREDITATION



POLYCAB 02YY-K MC

Industrial Cable, 1100 V AC

| Product Code | Conductor size n x mm ² | Nominal insulation thickness mm | Overall diameter (Approx.) mm | Weight (Approx.) kg/km |
|----------------------|---------------------------------------|---------------------------------------|-------------------------------------|------------------------------|
| LDIS09CYUAY1012C0.5S | 12 x 0.5 | 0.6 | 10.79 | 153 |
| LDIS09CYUAY1012C.75S | 12 x 0.75 | 0.6 | 11.84 | 198 |
| LDIS09CYUAY1012C001S | 12 x 1 | 0.6 | 12.56 | 234 |
| LDIS09CYUAY1012C1.5S | 12 x 1.5 | 0.6 | 13.69 | 300 |
| LDIS09CYUAY1012C2.5S | 12 x 2.5 | 0.7 | 16.81 | 472 |
| LDIS09CYUAY1012C004S | 12 x 4 | 0.8 | 20.10 | 708 |
| LDIS09CYUAY1013C0.5S | 13 x 0.5 | 0.6 | 11.31 | 165 |
| LDIS09CYUAY1013C.75S | 13 x 0.75 | 0.6 | 12.42 | 212 |
| LDIS09CYUAY1013C001S | 13 x 1 | 0.6 | 13.18 | 252 |
| LDIS09CYUAY1013C1.5S | 13 x 1.5 | 0.6 | 14.58 | 331 |
| LDIS09CYUAY1013C2.5S | 13 x 2.5 | 0.7 | 17.66 | 508 |
| LDIS09CYUAY1013C004S | 13 x 4 | 0.8 | 21.14 | 764 |
| LDIS09CYUAY1014C0.5S | 14 x 0.5 | 0.6 | 11.51 | 179 |
| LDIS09CYUAY1014C.75S | 14 x 0.75 | 0.6 | 12.42 | 224 |
| LDIS09CYUAY1014C001S | 14 x 1 | 0.6 | 13.18 | 266 |
| LDIS09CYUAY1014C1.5S | 14 x 1.5 | 0.6 | 14.58 | 350 |
| LDIS09CYUAY1014C2.5S | 14 x 2.5 | 0.7 | 17.66 | 539 |
| LDIS09CYUAY1014C004S | 14 x 4 | 0.8 | 21.14 | 811 |
| LDIS09CYUAY1015C0.5S | 15 x 0.5 | 0.6 | 12.13 | 191 |
| LDIS09CYUAY1015C.75S | 15 x 0.75 | 0.6 | 13.29 | 246 |
| LDIS09CYUAY1015C001S | 15 x 1 | 0.6 | 14.10 | 292 |
| LDIS09CYUAY1015C1.5S | 15 x 1.5 | 0.6 | 15.38 | 374 |
| LDIS09CYUAY1015C2.5S | 15 x 2.5 | 0.7 | 18.85 | 586 |
| LDIS09CYUAY1015C004S | 15 x 4 | 0.8 | 22.55 | 879 |
| LDIS09CYUAY1016C0.5S | 16 x 0.5 | 0.6 | 12.13 | 200 |
| LDIS09CYUAY1016C.75S | 16 x 0.75 | 0.6 | 13.29 | 257 |
| LDIS09CYUAY1016C001S | 16 x 1 | 0.6 | 14.10 | 306 |
| LDIS09CYUAY1016C1.5S | 16 x 1.5 | 0.6 | 15.38 | 393 |
| LDIS09CYUAY1016C2.5S | 16 x 2.5 | 0.7 | 18.85 | 616 |
| LDIS09CYUAY1016C004S | 16 x 4 | 0.8 | 22.55 | 927 |
| LDIS09CYUAY1017C0.5S | 17 x 0.5 | 0.6 | 12.76 | 212 |
| LDIS09CYUAY1017C.75S | 17 x 0.75 | 0.6 | 13.98 | 273 |
| LDIS09CYUAY1017C001S | 17 x 1 | 0.6 | 14.85 | 325 |
| LDIS09CYUAY1017C1.5S | 17 x 1.5 | 0.6 | 16.41 | 426 |
| LDIS09CYUAY1017C2.5S | 17 x 2.5 | 0.7 | 19.88 | 655 |
| LDIS09CYUAY1017C004S | 17 x 4 | 0.8 | 23.80 | 985 |

OUR ACCREDITATION



POLYCAB 02YY-K MC

Industrial Cable, 1100 V AC

| Product Code | Conductor size n x mm ² | Nominal insulation thickness mm | Overall dia. (Approx.) mm | Weight (Approx.) kg/km |
|----------------------|---------------------------------------|---------------------------------------|---------------------------------|------------------------------|
| LDIS09CYUAY1018C0.5S | 18 x 0.5 | 0.6 | 12.76 | 220 |
| LDIS09CYUAY1018C.75S | 18 x 0.75 | 0.6 | 13.98 | 284 |
| LDIS09CYUAY1018C001S | 18 x 1 | 0.6 | 15.05 | 346 |
| LDIS09CYUAY1018C1.5S | 18 x 1.5 | 0.6 | 16.41 | 445 |
| LDIS09CYUAY1018C2.5S | 18 x 2.5 | 0.7 | 19.88 | 685 |
| LDIS09CYUAY1018C004S | 18 x 4 | 0.8 | 23.80 | 1033 |
| LDIS09CYUAY1019C0.5S | 19 x 0.5 | 0.6 | 12.76 | 229 |
| LDIS09CYUAY1019C.75S | 19 x 0.75 | 0.6 | 13.98 | 296 |
| LDIS09CYUAY1019C001S | 19 x 1 | 0.6 | 15.05 | 361 |
| LDIS09CYUAY1019C1.5S | 19 x 1.5 | 0.6 | 16.41 | 464 |
| LDIS09CYUAY1019C2.5S | 19 x 2.5 | 0.7 | 19.88 | 716 |
| LDIS09CYUAY1019C004S | 19 x 4 | 0.8 | 23.80 | 1080 |
| LDIS09CYUAY1020C0.5S | 20 x 0.5 | 0.6 | 13.66 | 248 |
| LDIS09CYUAY1020C.75S | 20 x 0.75 | 0.6 | 14.95 | 319 |
| LDIS09CYUAY1020C001S | 20 x 1 | 0.6 | 16.07 | 388 |
| LDIS09CYUAY1020C1.5S | 20 x 1.5 | 0.6 | 17.52 | 498 |
| LDIS09CYUAY1020C2.5S | 20 x 2.5 | 0.7 | 21.20 | 766 |
| LDIS09CYUAY1020C004S | 20 x 4 | 0.8 | 25.37 | 1152 |
| LDIS09CYUAY1021C0.5S | 21 x 0.5 | 0.6 | 13.66 | 257 |
| LDIS09CYUAY1021C.75S | 21 x 0.75 | 0.6 | 14.95 | 331 |
| LDIS09CYUAY1021C001S | 21 x 1 | 0.6 | 16.07 | 403 |
| LDIS09CYUAY1021C1.5S | 21 x 1.5 | 0.6 | 17.52 | 517 |
| LDIS09CYUAY1021C2.5S | 21 x 2.5 | 0.7 | 21.20 | 796 |
| LDIS09CYUAY1021C004S | 21 x 4 | 0.8 | 25.37 | 1200 |
| LDIS09CYUAY1022C0.5S | 22 x 0.5 | 0.6 | 14.38 | 270 |
| LDIS09CYUAY1022C.75S | 22 x 0.75 | 0.6 | 15.74 | 347 |
| LDIS09CYUAY1022C001S | 22 x 1 | 0.6 | 16.92 | 423 |
| LDIS09CYUAY1022C1.5S | 22 x 1.5 | 0.6 | 18.45 | 543 |
| LDIS09CYUAY1022C2.5S | 22 x 2.5 | 0.7 | 22.36 | 836 |
| LDIS09CYUAY1022C004S | 22 x 4 | 0.8 | 26.78 | 1259 |
| LDIS09CYUAY1023C0.5S | 23 x 0.5 | 0.6 | 14.38 | 279 |
| LDIS09CYUAY1023C.75S | 23 x 0.75 | 0.6 | 15.74 | 359 |
| LDIS09CYUAY1023C001S | 23 x 1 | 0.6 | 16.92 | 437 |
| LDIS09CYUAY1023C1.5S | 23 x 1.5 | 0.6 | 18.45 | 562 |
| LDIS09CYUAY1023C2.5S | 23 x 2.5 | 0.7 | 22.36 | 867 |
| LDIS09CYUAY1023C004S | 23 x 4 | 0.8 | 26.78 | 1307 |

OUR ACCREDITATION



POLYCAB 02YY-K MC

Industrial Cable, 1100 V AC

| Product Code | Conductor size n x mm ² | Nominal insulation thickness mm | Overall dia. (Approx.) mm | Weight (Approx.) kg/km |
|----------------------|---------------------------------------|------------------------------------|---------------------------------|------------------------------|
| LDIS09CYUAY1024C0.5S | 24 x 0.5 | 0.6 | 15.07 | 291 |
| LDIS09CYUAY1024C.75S | 24 x 0.75 | 0.6 | 16.50 | 375 |
| LDIS09CYUAY1024C001S | 24 x 1 | 0.6 | 17.74 | 457 |
| LDIS09CYUAY1024C1.5S | 24 x 1.5 | 0.6 | 19.37 | 588 |
| LDIS09CYUAY1024C2.5S | 24 x 2.5 | 0.7 | 23.49 | 906 |
| LDIS09CYUAY1024C004S | 24 x 4 | 0.8 | 28.16 | 1366 |
| LDIS09CYUAY1025C0.5S | 25 x 0.5 | 0.6 | 15.07 | 300 |
| LDIS09CYUAY1025C.75S | 25 x 0.75 | 0.6 | 16.50 | 387 |
| LDIS09CYUAY1025C001S | 25 x 1 | 0.6 | 17.74 | 471 |
| LDIS09CYUAY1025C1.5S | 25 x 1.5 | 0.6 | 19.37 | 607 |
| LDIS09CYUAY1025C2.5S | 25 x 2.5 | 0.7 | 23.49 | 937 |
| LDIS09CYUAY1025C004S | 25 x 4 | 0.8 | 28.16 | 1414 |
| LDIS09CYUAY1030C0.5S | 30 x 0.5 | 0.6 | 16.14 | 357 |
| LDIS09CYUAY1030C.75S | 30 x 0.75 | 0.6 | 17.45 | 450 |
| LDIS09CYUAY1030C001S | 30 x 1 | 0.6 | 18.76 | 549 |
| LDIS09CYUAY1030C1.5S | 30 x 1.5 | 0.6 | 20.50 | 711 |
| LDIS09CYUAY1030C2.5S | 30 x 2.5 | 0.7 | 24.89 | 1101 |
| LDIS09CYUAY1030C004S | 30 x 4 | 0.8 | 29.86 | 1667 |

Electrical characteristics

Current carrying capacity and maximum DC conductor resistance.

| Nominal cross sectional area mm ² | Reference method B (enclosed in conduit on a wall or in trunking etc) | | Reference method C (clipped direct) | | Reference method E (in free air or on a perforated cable tray horizontal or vertical) | | Maximum DC conductor resistance 20°C Ω/km |
|---|---|--|--|--|---|--|--|
| | 1 two core cable single phase ac or dc Amp. | 1 three core cable or 1 four core cable three phase ac Amp. | 1 two core cable single phase ac or dc Amp. | 1 three core cable or 1 four core cable three phase ac Amp. | 1 two core cable single phase ac or dc Amp. | 1 three core cable or 1 four core cable three phase ac Amp. | |
| 0.5 | 4 | 3.6 | 4 | 3.6 | - | - | 39 |
| 0.75 | 7 | 6 | 7 | 6 | - | - | 26 |
| 1 | 11 | 10 | 12 | 11 | 14 | 12 | 19.5 |
| 1.5 | 14 | 12 | 16 | 14 | 18 | 15 | 13.3 |
| 2.5 | 19 | 17 | 22 | 20 | 25 | 21 | 7.98 |
| 4 | 25 | 22 | 30 | 26 | 33 | 28 | 4.95 |

Ambient temperature: 40°C, Conductor operating temperature: 70°C, the above table is in accordance with BS 7671(4D2A)

De-Rating Factor

De-rating factor for various ambient temperature.

| Ambient Temperature | 35°C | 40°C | 45°C | 50°C | 55°C | 60°C | 65°C |
|---------------------|------|------|------|------|------|------|------|
| De-Rating Factor | 1.08 | 1 | 0.91 | 0.82 | 0.7 | 0.57 | 0.4 |

OUR ACCREDITATION



POLYCAB 02YY-K

Industrial Cable and Cords, 1100 V AC



Application

POLYCAB 02YY-K flexible cable insulated and sheathed with PVC conforming to IS 694 is suitable to use in electric power and lighting for indoor and outdoor use in AC single phase or three phase (earthed or unearthed) systems with rated voltage up to and including 1100 V. This cable is also suitable for DC systems with rated voltage up to and including 1500 V to earth.

Voltage Rating

1100 V

Operation Temperature

Fixed: -15°C to 70°C

Construction

- Bunched copper conductor as per IS 8130, class 5
- Insulated with PVC Type D to IS 5831
- Sheathed with PVC Type ST3 to IS 5831

Core Identification

As per IS 694:2010

Bending Radius

| | |
|--------------------|----------------------|
| Fixed installation | 6 x Overall diameter |
| Occasional | 8 x Overall diameter |

Standard and References

IS 8130:2013
 IS 5831:1984
 IEC 60332-1-2

Test Voltage

3000 V AC at (20±5) °C

Compliance

| | |
|-----------------------|-----------------|
| Conductor resistance | - IS 8130 |
| Insulation resistance | - IS 5831:1984 |
| Flammability test | - IEC 60332-1-2 |

Approvals



Note:

- The above cable also available in HR PVC insulation with maximum operating temperature 85°C.
- Outer sheath with additional properties FR & FRLSH available.

OUR ACCREDITATION



POLYCAB 02YY-K

Industrial Cable and Cords, 1100 V AC

| Product Code | Conductor size | Nominal insulation thickness | Overall dia. (Approx.) | Weight (Approx.) |
|----------------------|---------------------|------------------------------|------------------------|------------------|
| | n x mm ² | mm | mm | kg/km |
| LDIS09CYUAY1002C0.5S | 2 x 0.5 | 0.6 | 6.02 | 52 |
| LDIS09CYUAY1002C.75S | 2 x 0.75 | 0.6 | 6.43 | 62 |
| LDIS09CYUAY1002C001S | 2 x 1 | 0.6 | 6.78 | 71 |
| LDIS09CYUAY1002C1.5S | 2 x 1.5 | 0.6 | 7.32 | 87 |
| LDIS09CYUAY1002C2.5S | 2 x 2.5 | 0.7 | 8.83 | 131 |
| LDIS09CYUAY1002C004S | 2 x 4 | 0.8 | 10.32 | 188 |
| LDIS09CYUAY1002C006S | 2 x 6 | 0.8 | 11.67 | 252 |
| LDIS09CYUAY1002C010S | 2 x 10 | 1 | 14.76 | 412 |
| LDIS09CYUAY1002C016S | 2 x 16 | 1 | 17.04 | 583 |
| LDIS09CYUAY1002C025S | 2 x 25 | 1.2 | 20.37 | 861 |
| LDIS09CYUAY1002C035S | 2 x 35 | 1.2 | 23.15 | 1154 |
| LDIS09CYUAY1002C050S | 2 x 50 | 1.4 | 27.75 | 1657 |
| LDIS09CYUAY1002C070S | 2 x 70 | 1.4 | 31.51 | 2219 |
| LDIS09CYUAY1002C095S | 2 x 95 | 1.6 | 36.28 | 2974 |
| LDIS09CYUAY1002C120S | 2 x 120 | 1.6 | 39.56 | 3633 |
| LDIS09CYUAY1003C0.5S | 3 x 0.5 | 0.6 | 6.36 | 60 |
| LDIS09CYUAY1003C.75S | 3 x 0.75 | 0.6 | 6.80 | 73 |
| LDIS09CYUAY1003C001S | 3 x 1 | 0.6 | 7.18 | 85 |
| LDIS09CYUAY1003C1.5S | 3 x 1.5 | 0.6 | 7.76 | 105 |
| LDIS09CYUAY1003C2.5S | 3 x 2.5 | 0.7 | 9.38 | 160 |
| LDIS09CYUAY1003C004S | 3 x 4 | 0.8 | 10.98 | 231 |
| LDIS09CYUAY1003C006S | 3 x 6 | 0.8 | 12.63 | 321 |
| LDIS09CYUAY1003C010S | 3 x 10 | 1 | 15.93 | 524 |
| LDIS09CYUAY1003C016S | 3 x 16 | 1 | 18.18 | 741 |
| LDIS09CYUAY1003C025S | 3 x 25 | 1.2 | 21.97 | 1113 |
| LDIS09CYUAY1003C035S | 3 x 35 | 1.2 | 24.75 | 1486 |
| LDIS09CYUAY1003C050S | 3 x 50 | 1.4 | 29.65 | 2133 |
| LDIS09CYUAY1003C070S | 3 x 70 | 1.4 | 33.68 | 2874 |
| LDIS09CYUAY1003C095S | 3 x 95 | 1.6 | 38.80 | 3862 |
| LDIS09CYUAY1003C120S | 3 x 120 | 1.6 | 42.32 | 4738 |
| LDIS09CYUAY1003C150S | 3 x 150 | 1.8 | 46.69 | 5797 |
| LDIS09CYUAY1003C185S | 3 x 185 | 2 | 52.03 | 7241 |
| LDIS09CYUAY1003C240S | 3 x 240 | 2.2 | 58.33 | 9210 |
| LDIS09CYUAY1003C300S | 3 x 300 | 2.4 | 64.88 | 11518 |

OUR ACCREDITATION



POLYCAB 02YY-K

Industrial Cable and Cords, 1100 V AC

| Product Code | Conductor size | Nominal insulation thickness | Overall dia. (Approx.) | Weight (Approx.) |
|----------------------|---------------------|------------------------------|------------------------|------------------|
| | n x mm ² | mm | mm | kg/km |
| LDIS09CYUAY1004C0.5S | 4 x 0.5 | 0.6 | 6.91 | 73 |
| LDIS09CYUAY1004C.75S | 4 x 0.75 | 0.6 | 7.41 | 88 |
| LDIS09CYUAY1004C001S | 4 x 1 | 0.6 | 7.83 | 103 |
| LDIS09CYUAY1004C1.5S | 4 x 1.5 | 0.6 | 8.68 | 134 |
| LDIS09CYUAY1004C2.5S | 4 x 2.5 | 0.7 | 10.26 | 198 |
| LDIS09CYUAY1004C004S | 4 x 4 | 0.8 | 12.07 | 289 |
| LDIS09CYUAY1004C006S | 4 x 6 | 0.8 | 13.86 | 402 |
| LDIS09CYUAY1004C010S | 4 x 10 | 1 | 17.51 | 658 |
| LDIS09CYUAY1004C016S | 4 x 16 | 1 | 20.03 | 937 |
| LDIS09CYUAY1004C025S | 4 x 25 | 1.2 | 24.46 | 1426 |
| LDIS09CYUAY1004C035S | 4 x 35 | 1.2 | 27.54 | 1906 |
| LDIS09CYUAY1004C050S | 4 x 50 | 1.4 | 32.74 | 2715 |
| LDIS09CYUAY1004C070S | 4 x 70 | 1.4 | 37.20 | 3668 |
| LDIS09CYUAY1004C095S | 4 x 95 | 1.6 | 42.89 | 4935 |
| LDIS09CYUAY1004C120S | 4 x 120 | 1.6 | 46.81 | 6066 |
| LDIS09CYUAY1004C150S | 4 x 150 | 1.8 | 51.69 | 7428 |
| LDIS09CYUAY1004C185S | 4 x 185 | 2 | 57.62 | 9285 |
| LDIS09CYUAY1004C240S | 4 x 240 | 2.2 | 64.63 | 11820 |
| LDIS09CYUAY1004C300S | 4 x 300 | 2.4 | 71.92 | 14794 |
| LDIS09CYUAY1005C0.5S | 5 x 0.5 | 0.6 | 7.50 | 73 |
| LDIS09CYUAY1005C.75S | 5 x 0.75 | 0.6 | 8.06 | 90 |
| LDIS09CYUAY1005C001S | 5 x 1 | 0.6 | 8.72 | 110 |
| LDIS09CYUAY1005C1.5S | 5 x 1.5 | 0.6 | 9.45 | 139 |
| LDIS09CYUAY1005C2.5S | 5 x 2.5 | 0.7 | 11.22 | 206 |
| LDIS09CYUAY1005C004S | 5 x 4 | 0.8 | 13.43 | 309 |

OUR ACCREDITATION



POLYCAB 02YY-K

Industrial Cable and Cords, 1100 V AC

Electrical characteristics

Current carrying capacity and maximum DC conductor DC resistance.

| Nominal cross sectional area mm ² | Reference Method B (enclosed in conduit on a wall or in trunking etc.) | | Reference Method C (clipped direct) | | Reference Method E (free air or on a perforated cable tray etc, horizontal or vertical) | | Max. DC conductor resistance at 20°C Ω/km |
|---|---|--|---|--|---|--|--|
| | 1 two-core cable* single-phase a.c. or d.c. Amp. | 1 three-core cable* or 1 four-core cable, three-phase a.c. Amp. | 1 two-core cable* single-phase a.c. or d.c. Amp. | 1 three-core cable* or 1 four-core cable, three-phase a.c. Amp. | 1 two-core cable* single-phase a.c. or d.c. Amp. | 1 three-core cable* or 1 four-core cable, three-phase a.c. Amp. | |
| 0.5 | 4 | 3.6 | 4 | 3.6 | - | - | 39 |
| 0.75 | 7 | 6 | 7 | 6 | - | - | 26 |
| 1 | 11 | 10 | 12 | 11 | 14 | 12 | 19.5 |
| 1.5 | 14 | 12 | 16 | 14 | 18 | 15 | 13.3 |
| 2.5 | 19 | 17 | 22 | 20 | 25 | 21 | 7.98 |
| 4 | 25 | 22 | 30 | 26 | 33 | 28 | 4.95 |
| 6 | 31 | 28 | 38 | 34 | 42 | 36 | 3.3 |
| 10 | 43 | 38 | 52 | 47 | 58 | 50 | 1.91 |
| 16 | 57 | 51 | 70 | 63 | 78 | 66 | 1.21 |
| 25 | 76 | 68 | 95 | 81 | 100 | 85 | 0.78 |
| 35 | 94 | 84 | 116 | 100 | 125 | 106 | 0.554 |
| 50 | 112 | 100 | 142 | 122 | 152 | 129 | 0.386 |
| 70 | 142 | 122 | 180 | 155 | 196 | 165 | 0.272 |
| 95 | 170 | 151 | 218 | 188 | 238 | 201 | 0.206 |
| 120 | 196 | 174 | 252 | 219 | 277 | 233 | 0.161 |
| 150 | 218 | 190 | 290 | 252 | 320 | 269 | 0.129 |
| 185 | 248 | 215 | 331 | 288 | 366 | 307 | 0.106 |
| 240 | 290 | 251 | 389 | 340 | 434 | 363 | 0.0801 |
| 300 | 332 | 286 | 447 | 392 | 500 | 419 | 0.0641 |

Air Ambient temperature: 40°C, Conductor operating temperature: 70°C

The above table is in accordance with BS 7671(Table 4D2A)

De-Rating Factor

De-rating factor for various ambient temperature.

| Ambient Temperature | 35°C | 40°C | 45°C | 50°C | 55°C | 60°C | 65°C |
|---------------------|------|------|------|------|------|------|------|
| De-Rating Factor | 1.08 | 1 | 0.91 | 0.82 | 0.7 | 0.57 | 0.4 |

OUR ACCREDITATION



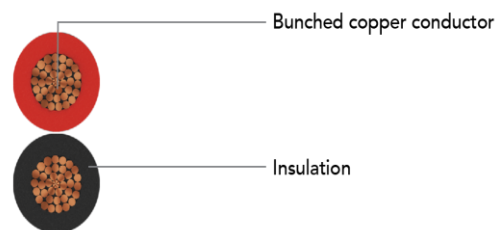
POLYCAB 01Y-K FLAT & TWISTED

Twin twisted & Flat, 1100 V AC

Twin Parallel



Twin Twisted



Application

POLYCAB 01Y-K Flat & Twisted PVC insulated flexible cable confirming to IS 694 is suitable to use in domestic appliances and lighting application.

Voltage Rating

1100 V

Operation Temperature

Fixed: -15°C to 70°C

Construction

- Bunched copper conductor as per IS 8130, class 5
- Insulated with PVC Type D to IS 5831

Core Identification

Red and Black

Bending Radius

Fixed installation 6 x Overall diameter
Occasional 4 x Overall diameter

Standard and References

IS 8130:2013
IS 5831:1984
IEC 60332-1-2

Compliance

Conductor resistance - IS 8130
Insulation resistance - IS 5831:1984
Flammability test - IEC 60332-1-2

Approvals



Note:

- The above cable also available in HR PVC insulation with maximum operating temperature 85°C.

OUR ACCREDITATION



POLYCAB 01Y-K FLAT & TWISTED

Twin twisted & Flat, 1100 V AC

| Twin Twisted cable | | | | |
|----------------------|---------------------------------------|------------------------------------|--------------------------------------|------------------------------|
| Product Code | Conductor size n x mm ² | Nominal insulation thickness mm | Overall dia. (Approx.) mm | Weight (Approx.) kg/km |
| TTIS09CYUAYA002C0.5S | 2 x 0.5 | 0.6 | 4.22 | 17 |
| TTIS09CYUAYA002C.75S | 2 x 0.75 | 0.6 | 4.63 | 23 |
| TTIS09CYUAYA002C001S | 2 x 1 | 0.6 | 4.98 | 28 |
| TTIS09CYUAYA002C1.5S | 2 x 1.5 | 0.6 | 5.52 | 38 |
| TTIS09CYUAYA002C2.5S | 2 x 2.5 | 0.7 | 6.83 | 61 |
| TTIS09CYUAYA002C004S | 2 x 4 | 0.8 | 8.32 | 96 |
| Twin Parallel cable | | | | |
| Product Code | Conductor size n x mm ² | Nominal insulation thickness mm | Overall dimension (Approx.) mm | Weight (Approx.) kg/km |
| TFIS09CYUAY1002C0.5S | 2 x 0.5 | 0.6 | 3.02 x 2.11 | 17 |
| TFIS09CYUAY1002C.75S | 2 x 0.75 | 0.6 | 3.43 x 2.32 | 23 |
| TFIS09CYUAY1002C001S | 2 x 1 | 0.6 | 3.78 x 2.49 | 28 |
| TFIS09CYUAY1002C1.5S | 2 x 1.5 | 0.6 | 4.32 x 2.76 | 38 |
| TFIS09CYUAY1002C2.5S | 2 x 2.5 | 0.7 | 5.43 x 3.42 | 61 |
| TFIS09CYUAY1002C004S | 2 x 4 | 0.8 | 6.72 x 4.16 | 96 |

Electrical characteristics

Current carrying capacity and maximum DC conductor resistance.

| Nominal cross sectional area mm ² | Current rating Amp. | Maximum DC conductor resistance at 20°C Ω/km |
|---|------------------------|---|
| 0.5 | 4 | 39 |
| 0.75 | 7 | 26 |
| 1 | 11 | 19.5 |
| 1.5 | 14 | 13.3 |
| 2.5 | 19 | 7.98 |
| 4 | 26 | 4.95 |

Air Ambient temperature: 40°C, Conductor operating temperature: 70°C

The above table is in accordance with IS 3961

De-Rating Factor

De-rating factor for various ambient temperature.

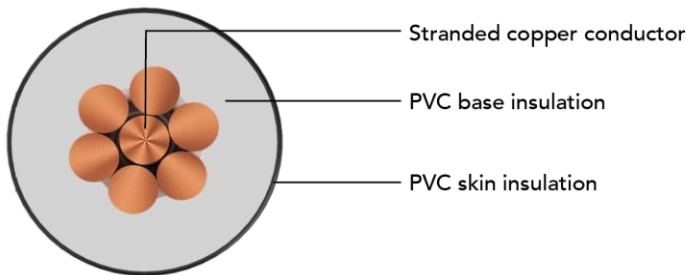
| Ambient temperature | 30°C | 35°C | 40°C | 50°C | 55°C |
|---------------------|------|------|------|------|------|
| De-Rating Factor | 1.09 | 1.04 | 1 | 0.77 | 0.54 |

OUR ACCREDITATION



POLYCAB 01Y-R SC

Industrial Cables 1100 V AC



Salient Features:

- ✓ Optimised current carrying capacity
- ✓ Fire retardant and safe for protection
- ✓ Low emission of toxic gases
- ✓ Low carbon emission
- ✓ Low volatile organic content – less contamination
- ✓ High conductivity electrolytic copper conductor

Application

POLYCAB 01Y-R SC PVC cable, PVC insulated unsheathed cable confirming to IS 694 is suitable to use in electric power, lighting & panel wiring for indoor use in AC single phase or three phase (earthed or unearthed) systems with rated voltage up to and including 1100 V. This cable is also suitable for DC systems with rated voltage up to and including 1500 V to earth.

Voltage Rating

1100 V

Operation Temperature

Fixed: -15°C to 70° C

Construction

- Annealed stranded plain copper conductor as per IS 8130, class 2
- Insulated with FR-PVC Type A as per IS 5831

Core Identification

Red/Black/Blue/Yellow/White/Grey.

Bending Radius

Fixed 4 x Overall Diameter
Occasional 6 x Overall Diameter

Standard and References

IS 8130
IS 5831
IS 694
IEC 60332-1-2

Test Voltage

3kV AC

Compliance

Conductor resistance - IS 8130
Insulation resistance - IS 5831:1984
Flammability test - IEC 60332-1-2
Anti-Termite and anti-Rodent

Approvals



Note:

- The above cable is also available in HR PVC insulation with maximum operating temperature of 85°C.
- Outer sheath with additional properties of FR & FRLSH are also available.
- The cable is also available with tinned copper conductor.

OUR ACCREDITATION



POLYCAB 01Y-R SC

Industrial Cables 1100 V AC

| Product Code | Nominal cross-sectional area mm ² | insulation thickness mm | Overall Diameter (Approx.) mm | Weight (Approx.) |
|----------------------|--|-------------------------|-------------------------------|------------------|
| LDIS09CYUAYF001C001S | 1 | 0.7 | 2.70 | 15 |
| LDIS09CYUAYF001C1.5S | 1.5 | 0.7 | 3.00 | 21 |
| LDIS09CYUAYF001C2.5S | 2.5 | 0.8 | 3.60 | 32 |
| LDIS09CYUAYF001C004S | 4 | 0.8 | 4.20 | 49 |
| LDIS09CYUAYF001C006S | 6 | 0.8 | 4.70 | 68 |
| LDIS09CYUAYF001C010S | 10 | 1 | 6.10 | 114 |
| LDIS09CYUAYF001C016S | 16 | 1 | 7.10 | 171 |
| LDIS09CYUAYF001C025S | 25 | 1.2 | 8.90 | 270 |
| LDIS09CYUAYF001C035S | 35 | 1.2 | 10.00 | 364 |
| LDIS09CYUAYF001C050S | 50 | 1.4 | 11.90 | 519 |
| LDIS09CYUAYF001C070S | 70 | 1.4 | 13.50 | 706 |
| LDIS09CYUAYF001C095S | 95 | 1.6 | 15.70 | 959 |
| LDIS09CYUAYF001C120S | 120 | 1.6 | 17.30 | 1198 |
| LDIS09CYUAYF001C150S | 150 | 1.8 | 19.30 | 1497 |
| LDIS09CYUAYF001C185S | 185 | 2 | 21.50 | 1848 |
| LDIS09CYUAYF001C240S | 240 | 2.2 | 24.30 | 2387 |
| LDIS09CYUAYF001C300S | 300 | 2.4 | 27.10 | 2981 |
| LDIS09CYUAYF001C400S | 400 | 2.6 | 30.80 | 3927 |
| LDIS09CYUAYF001C500S | 500 | 2.8 | 34.40 | 4929 |
| LDIS09CYUAYF001C630S | 630 | 3 | 38.30 | 6188 |

OUR ACREDITATION



POLYCAB 01Y-R SC

Industrial Cables 1100 V AC

Electrical Characteristics

Current carrying capacity and maximum DC conductor resistance.

| Nominal cross sectional area mm ² | Reference method B(enclosed in conduit on a wall or in trunking etc) | | Reference method C (clipped direct) | | Reference method F (in free air or on a perforated cable tray horizontal or vertical) | | | | | Maximum DC conductor resistance at 20°C Ω/km |
|---|---|--------------------------------------|--|---|--|--------------------------------------|---|---|------------------|---|
| | 2 cables single phase AC or DC Amp. | 3 or 4 cables three phase AC Amp. | 2 cables single phase AC or DC flat and touching Amp. | 3 or 4 cables three phase AC flat and touching or trefoil Amp. | Touching | | | Spaced by one meter | | |
| | | | | | 2 cables single phase AC or DC flat Amp. | 3 cables three phase AC flat Amp. | 3 cables three phase AC trefoil Amp. | 2 cables ,single-phase AC or DC or 3 cables three phase AC flat | | |
| | | | | | | | | Horizontal Amp. | Vertical Amp. | |
| 1 | 12 | 10 | 13 | 12 | - | - | - | - | - | 18.1 |
| 1.5 | 15 | 13 | 17 | 16 | - | - | - | - | - | 12.1 |
| 2.5 | 21 | 18 | 23 | 22 | - | - | - | - | - | 7.41 |
| 4 | 28 | 24 | 32 | 29 | - | - | - | - | - | 4.61 |
| 6 | 36 | 31 | 41 | 37 | - | - | - | - | - | 3.08 |
| 10 | 50 | 44 | 57 | 51 | - | - | - | - | - | 1.83 |
| 16 | 66 | 59 | 76 | 69 | - | - | - | - | - | 1.15 |
| 25 | 88 | 77 | 99 | 90 | 114 | 99 | 96 | 127 | 113 | 0.727 |
| 35 | 109 | 96 | 123 | 112 | 141 | 124 | 119 | 157 | 141 | 0.524 |
| 50 | 131 | 117 | 158 | 145 | 171 | 151 | 145 | 191 | 171 | 0.387 |
| 70 | 167 | 149 | 204 | 186 | 218 | 196 | 188 | 244 | 221 | 0.268 |
| 95 | 202 | 180 | 247 | 227 | 264 | 239 | 230 | 297 | 271 | 0.193 |
| 120 | 234 | 208 | 287 | 264 | 306 | 279 | 268 | 345 | 315 | 0.153 |
| 150 | 261 | 228 | 331 | 304 | 353 | 324 | 310 | 397 | 365 | 0.124 |
| 185 | 297 | 258 | 379 | 348 | 403 | 371 | 356 | 453 | 418 | 0.0991 |
| 240 | 348 | 301 | 448 | 411 | 475 | 441 | 422 | 535 | 495 | 0.0754 |
| 300 | 398 | 343 | 517 | 474 | 547 | 511 | 488 | 617 | 573 | 0.0601 |
| 400 | 475 | 406 | 604 | 552 | 656 | 599 | 571 | 741 | 692 | 0.047 |
| 500 | 545 | 464 | 689 | 629 | 755 | 686 | 652 | 854 | 800 | 0.0366 |
| 630 | 626 | 532 | 786 | 719 | 874 | 787 | 744 | 990 | 931 | 0.0283 |

Ambient temperature: 40°C

Conductor operating temperature: 70°C

The above table is in accordance with BS 7671(Table 4D1A)

De-Rating Factor

De-rating factor at various air temperature.

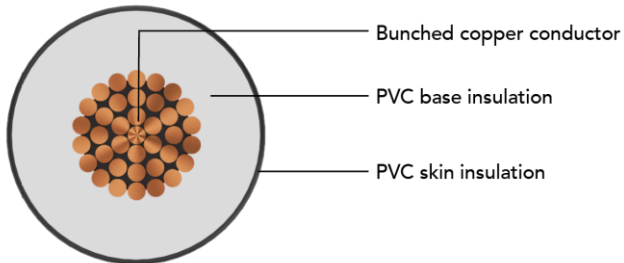
| Ambient Temperature | 45°C | 50°C | 55°C | 60°C | 65°C |
|---------------------|------|------|------|------|------|
| De-Rating Factor | 0.91 | 0.82 | 0.71 | 0.58 | 0.41 |

OUR ACCREDITATION



POLYCAB 01Y-K SC

Industrial Flexible Cables 1100 V AC



Salient Features:

- ✓ Optimised current carrying capacity
- ✓ Fire retardant and safe for protection
- ✓ Low emission of toxic gases
- ✓ Low carbon emission
- ✓ Low volatile organic content – less contamination
- ✓ High conductivity electrolytic copper conductor

Application

POLYCAB 01Y-K SC, PVC insulated unsheathed cable conforming to IS 694 is suitable to use in electric power, lighting & panel wiring for indoor and outdoor use in AC single phase or three phase (earthed or unearthed) systems with rated voltage up to and including 1100 V. This cable is also suitable for DC systems with rated voltage up to and including 1500 V to earth.

Voltage Rating

1100 V

Operation Temperature

Fixed: -15°C to 70°C

Construction

- Annealed bunched copper conductor as per IS 8130, class 5
- Insulated with FR-PVC Type D as per IS 5831

Core Identification

Red/Black/Blue/Yellow/White/Grey.

Bending Radius

Fixed 4 x Overall Diameter
Occasional 6 x Overall Diameter

Standard and References

IS 8130
IS 5831
IS 694
IEC 60332-1-2

Test Voltage

3kV AC

Compliance

Conductor resistance - IS 8130
Insulation resistance - IS 5831:1984
Flammability test - IEC 60332-1-2
Anti-Termite and anti-Rodent

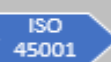
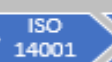
Approval



Note:

- The above cable is also available in HR PVC insulation with maximum operating temperature of 85°C.
- Outer sheath with additional properties of FR & FRLSH are also available.
- The cable is also available with tinned copper conductor.

OUR ACCREDITATION



POLYCAB 01Y-K SC

Industrial Flexible Cables 1100 V AC

| Product Code | Nominal cross sectional area mm ² | insulation thickness mm | Overall Diameter (Approx.) mm | Weight (Approx.) |
|----------------------|--|-------------------------|-------------------------------|------------------|
| LDIS09CYUAYF001C0.5S | 0.5 | 0.6 | 2.10 | 9 |
| LDIS09CYUAYF001C.75S | 0.75 | 0.6 | 2.30 | 11 |
| LDIS09CYUAYF001C001S | 1 | 0.6 | 2.50 | 14 |
| LDIS09CYUAYF001C1.5S | 1.5 | 0.6 | 2.80 | 19 |
| LDIS09CYUAYF001C2.5S | 2.5 | 0.7 | 3.40 | 31 |
| LDIS09CYUAYF001C004S | 4 | 0.8 | 4.20 | 46 |
| LDIS09CYUAYF001C006S | 6 | 0.8 | 4.70 | 65 |
| LDIS09CYUAYF001C010S | 10 | 1 | 6.10 | 114 |
| LDIS09CYUAYF001C016S | 16 | 1 | 7.10 | 171 |
| LDIS09CYUAYF001C025S | 25 | 1.2 | 8.80 | 264 |
| LDIS09CYUAYF001C035S | 35 | 1.2 | 10.00 | 362 |
| LDIS09CYUAYF001C050S | 50 | 1.4 | 11.90 | 517 |
| LDIS09CYUAYF001C070S | 70 | 1.4 | 13.60 | 711 |
| LDIS09CYUAYF001C095S | 95 | 1.6 | 15.70 | 961 |
| LDIS09CYUAYF001C120S | 120 | 1.6 | 17.30 | 1199 |
| LDIS09CYUAYF001C150S | 150 | 1.8 | 19.20 | 1474 |
| LDIS09CYUAYF001C185S | 185 | 2 | 21.50 | 1851 |
| LDIS09CYUAYF001C240S | 240 | 2.2 | 24.20 | 2369 |
| LDIS09CYUAYF001C300S | 300 | 2.4 | 27.10 | 2984 |

OUR ACREDITATION



POLYCAB 01Y-K SC

Industrial Flexible Cables 1100 V AC

Electrical Characteristics

Current carrying capacity and maximum DC conductor resistance.

| Nominal cross-sectional area mm ² | Reference method B (enclosed in conduit on a wall or in trunking etc) | | Reference method C (clipped direct) | | Reference method F (in free air or on a perforated cable tray horizontal or vertical) | | | | | Maximum DC conductor resistance at 20°C Ω/km |
|---|---|--------------------------------------|--|---|---|--------------------------------------|---|--|-------------------|---|
| | 2 cables single phase AC or DC Amp. | 3 or 4 cables three phase AC Amp. | 2 cables single phase AC or DC flat and touching Amp. | 3 or 4 cables three phase AC flat and touching or trefoil Amp. | Touching | | | Spaced by one meter | | |
| | | | | | 2 cables single phase AC or DC flat Amp. | 3 cables three phase AC flat Amp. | 3 cables three phase AC trefoil Amp. | 2 cables ,single-phase AC or DC or 3 cables three phase AC flat Hori zontal Amp. | Verti cal Amp. | |
| 0.5 | 4 | 3.6 | 4 | 3.6 | - | - | - | - | - | 39 |
| 0.75 | 7 | 6 | 7 | 6 | - | - | - | - | - | 26 |
| 1 | 11 | 10 | 13 | 12 | - | - | - | - | - | 19.5 |
| 1.5 | 14 | 13 | 17 | 15 | - | - | - | - | - | 13.3 |
| 2.5 | 20 | 17 | 22 | 21 | - | - | - | - | - | 7.98 |
| 4 | 26 | 23 | 31 | 27 | - | - | - | - | - | 4.95 |
| 6 | 34 | 30 | 39 | 36 | - | - | - | - | - | 3.3 |
| 10 | 47 | 41 | 54 | 49 | - | - | - | - | - | 1.91 |
| 16 | 63 | 56 | 72 | 65 | - | - | - | - | - | 1.21 |
| 25 | 85 | 75 | 96 | 88 | 111 | 96 | 93 | 123 | 110 | 0.78 |
| 35 | 105 | 93 | 119 | 109 | 137 | 121 | 116 | 153 | 137 | 0.554 |
| 50 | 127 | 113 | 154 | 141 | 165 | 147 | 141 | 185 | 166 | 0.386 |
| 70 | 162 | 144 | 197 | 181 | 212 | 190 | 182 | 237 | 214 | 0.272 |
| 95 | 196 | 175 | 240 | 220 | 257 | 232 | 223 | 288 | 262 | 0.206 |
| 120 | 227 | 202 | 278 | 256 | 297 | 271 | 260 | 334 | 305 | 0.161 |
| 150 | 253 | 221 | 322 | 295 | 343 | 314 | 300 | 385 | 354 | 0.129 |
| 185 | 288 | 250 | 368 | 338 | 391 | 360 | 345 | 440 | 405 | 0.106 |
| 240 | 338 | 292 | 435 | 398 | 461 | 428 | 409 | 519 | 480 | 0.0801 |
| 300 | 387 | 332 | 501 | 460 | 531 | 495 | 473 | 598 | 556 | 0.0641 |

Ambient temperature: 40°C,

Conductor operating temperature: 70°C

The above table is in accordance with BS 7671 (Table 4D1A)

De-Rating Factor

De-rating factor at various ambient temperature other than 40°C.

| Ambient Temperature | 35°C | 40°C | 45°C | 50°C | 55°C | 60°C | 65°C |
|---------------------|------|------|------|------|------|------|------|
| De-Rating Factor | 1.08 | 1 | 0.91 | 0.82 | 0.7 | 0.57 | 0.4 |

OUR ACREDITATION

