



HELUKABEL OZ-BL-PAAR-CY 4x2x0.5 QMM / 14079 900 V 001042085 CE

Technical data

- Special PVC control cable with blue outer jacket for hazardous areas to hazard type -i- for intrinsically safe installation marking to DIN VDE 0165 part 1, EN 60079-14 and IEC 60079-14 section 12.2.2.6
- **Conductor resistance**
at 0,5 mm² ≤ 378 Ohm/km
at 0,75 mm² ≤ 25,3 Ohm/km
- **Temperature range**
flexing - 5°C to +80°C
fixed installation -30°C to +80°C
- **Nominal voltage** 900 V
(not for power installation)
- **Test voltage**
core/core 2000 V
core/screen 1000 V
- **Breakdown voltage** min. 4000 V
- **Insulation resistance**
min. 20 MOhm x km
- **Mutual capacitance**
core/core approx. 105 nF/km
core/screen approx. 145 nF/km
- **Inductance** approx. 0,68 mH/km
- **Characteristic impedance**
approx. 80 Ohm
- **Minimum bending radius**
approx. 15 x cable Ø
- **Radiation resistance**
up to 80x10⁶ cJ/kg (up to 80 Mrad)
- **Coupling resistance**
max. 250 Ohm/km

Cable structure

- Bare copper, fine wire conductors, bunch stranded to DIN VDE 0295 cl. 5, BS 6360 cl. 5 and IEC 60228 cl. 5
- Special PVC core insulation Y12, to DIN VDE 0207 part 4
- Cores colour coded according to DIN 47100, see page T 46
- Cores twisted in pairs
- Pairs stranded in layers with optimal lay-length
- Foil taped
- Tinned copper braided screening, approx. 80% coverage
- Special PVC outer sheath YM2, to DIN VDE 0207 part 5 colour blue RAL 5015
- Extensively oil resistant
- Chemical Resistance – see table Technical Informations
- PVC self-extinguishing and flame retardant according to DIN VDE 0482 part 265-2-1/EN 50265-2-1/IEC 60332-1 (equivalent DIN VDE 0472 part 804 test method B)

Application

For hazardous areas this flexible control cable has been constructed for closed circuit systems in accordance with VDE 0165 part 1, part 12.2.2.6, which covers the requirements for the special marking (blue) of this type (hazard type -i-).

The paired construction and the copper screening afford a good protection against electrical interference and ensure the transmission of data signals.

* **EMC** = Electromagnetic compatibility
Note To optimise the EMC features we recommend a large round contact of the copper braiding on both ends.

- The materials used in manufacture are cadmium-free and contain no silicone and free from substances harmful to the wetting properties of lacquers.

CE = The product is conformed with the EC Low-Voltage Directive 73/23/EEC and 93/68/EEC.

Part No.	No. cores x cross-sec. mm ²	Outer Ø ca. mm	Cop. weight kg / km	Weight ca. kg / km	AWG-no. *)
14077	2 x 2 x 0,5	8,0	46	89	20
14078	3 x 2 x 0,5	8,4	63	104	20
14079	4 x 2 x 0,5	9,1	81	126	20
14080	6 x 2 x 0,5	10,7	111	171	20
14081	8 x 2 x 0,5	13,0	137	251	20
14082	10 x 2 x 0,5	14,2	162	282	20
14083	12 x 2 x 0,5	14,4	185	261	20
14084	16 x 2 x 0,5	17,7	240	445	20
14085	20 x 2 x 0,5	19,2	291	525	20
14086	24 x 2 x 0,5	20,7	346	590	20
14087	25 x 2 x 0,5	20,9	358	622	20
14089	2 x 2 x 0,75	8,7	59	105	18
14090	3 x 2 x 0,75	9,2	87	128	18
14091	4 x 2 x 0,75	10,0	108	156	18
14092	6 x 2 x 0,75	11,1	146	216	18
14093	8 x 2 x 0,75	14,6	180	309	18
14094	10 x 2 x 0,75	16,0	220	355	18
14095	12 x 2 x 0,75	16,4	267	405	18
14096	16 x 2 x 0,75	20,0	330	560	18
14097	20 x 2 x 0,75	21,6	425	671	18
14098	24 x 2 x 0,75	24,3	488	795	18
14099	25 x 2 x 0,75	24,4	530	803	18

*) Note

AWG sizes are approximate equivalent values.
The actual cross-section is in mm² – see page T 15.

The solution for connecting the screen.
PVC cables will be changed to lead free PVC successively.



MCI-Switchboard with security barrier

Works photo: R. Stahl GmbH