

1 Treoflex-UV uv stabilised VSD Cable 0.6/1kV



Technical Data

Flexible cable with multi-stranded conductors, with a cross-linked XLPE polyethylene insulation, double stranding element screen, with UV resistant outer sheath made of a special type of PVC. Symmetric conductor construction (3+3PE, conductors arranged symmetrically every 120°)

- **Operating temperature:** -40°C to 90°C
- **Operating voltage:** U/U = 0.6/1 kV
- **Test voltage:** 2500V
- **Insulation resistance:** > 200 MΩm x km
- **Capacitance:** conductor/conductor = 70 to 250 nF/km
conductor/screen = 110 to 410 nF/km
- **Max. operating conductor temp:** 90°C
- **Min. bending radius:**
 $\varnothing < 12 \text{ mm} - 5 \times \varnothing$
 $\varnothing = 12 + 20 \text{ mm} - 7,5 \times \varnothing$
 $\varnothing > 20 \text{ mm} - 10 \times \varnothing$

Cable Structure

- **Conductors:** flexible copper wire, class 5 as per PN-EN 60228 or PN-HD 383 S2
- **Conductor insulation:** XLPE cross-linked polyethylene
- **Conductor marking:** black, brown, grey, yellow-green (3 + 3PE). Cores twisted together without fillers
- **Screens:** an electrostatic screen in the form of polyester tape covered with a layer of aluminium, and a second screen in the form of a tinned copper wire braid
- **Sheath:** special PVC, self-extinguishing and flame retardant (as per PN-N60332-1), UV resistant
- **Sheath colour:** transparent/orange

Properties

- Low capacitance
- Self-extinguishing sheath
- UV resistant
- Fulfilment of electromagnetic compatibility (EMC) requirements*
 *Note: in order to ensure optimal screen earthing and the fulfilment of electromagnetic compatibility (EMC) requirements by the connection, we recommend using Treotham metal EMC glands (please refer to pages 315-318).

Application

Cables with a special construction, used to supply power to motors from frequency converters while maintaining full electromagnetic compatibility (EMC). The cross-linked XLPE polyethylene insulation improves current-carrying capacity, while at the same time maintaining low cable capacitance in comparison with cables with a PVC insulation. The cables are suitable for both fixed installation and movable connections in industrial equipment, process lines, and machines operating in dry and damp rooms. The symmetric construction of the cable (3+3PE) ensures the symmetry of supply voltages on the motor terminals.

Part Number	No of cores x cross section mm ²	Outer Ø c.a mm	Current capacity amps un-enclosed touching	Cop weight kg/km	Weight ca. Kg	Gland part no.
TA6.0015.04	4G1.5	10.6	19	86	140	159.2012.20
TA6.0025.04	4G2.5	12.3	26	143	219	159.2012.20
TA6.0040.04	4G4	14.6	34	224	323	159.2516.20
TA6.0060.03.3E	3x6 + 3G1	16.1	43	298	429	159.2516.20
TA6.0100.03.3E	3x10 + 3G1.5	18.8	61	491	615	159.3221.20
TA6.0160.03.3E	3x16 + 3G 2.5	20.5	81	723	819	159.3221.20
TA6.0250.03.3E	3x25 + 3G4	24.8	108	1137	1324	159.4028.20
TA6.0350.03.3E	3x35 + 3G6	27.3	135	1535	1718	159.4028.20
TA6.0500.03.3E	3x50 + 3G10	31.3	170	2207	2398	108.503230
TA6.0700.03.3E	3x70 + 3G10	36.0	214	2871	3055	108.503630
TA6.0950.03.3E	3x95 + 3G16	40.2	256	3953	4161	108.634438
TA6.1200.03.3E	3x120 + 3G16	43.3	303	4836	5073	108.635142
TA6.1500.03.3E	3x150 + 3G25	49.8	348	5411	6127	108.635148
TA6.1850.03.3E	3x185 + 3G35	55.0	396	6968	7189	108.635648
TA6.2400.03.3E	3x240 + 3G50	61.0	472	8540	9540.0	108.806454

For suitable EMC glands, see pages 315-318.