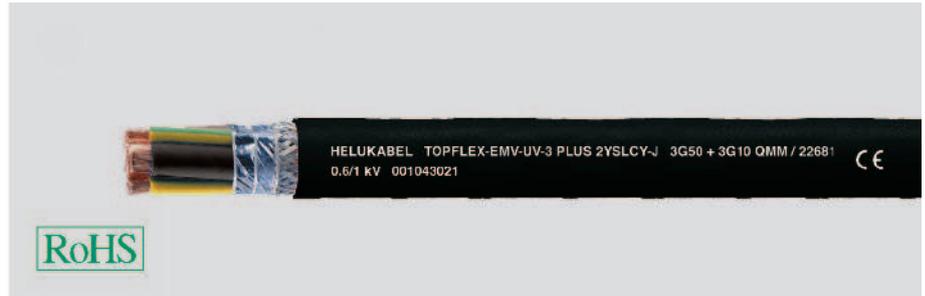
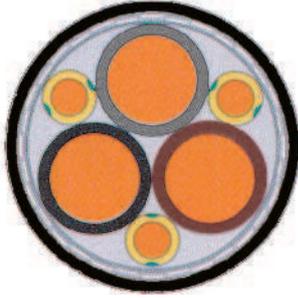


# TOPFLEX®-EMV-UV-3 PLUS 2YSLCYK-J for power supply connections to frequency converters, double screened, 0,6/1kV



## Technical data

- Special motor power supply cable for frequency converters adapted to DIN VDE 0250
- **Temperature range**  
flexing -5°C bis +70°C  
fixed installation -40°C bis +70°C
- **Nominal voltage**  $U_0/U$  600/1000 V
- **Operating voltage, max.**  
A.C. and 3-phase 700/1200 V  
DC operation 900/1800 V
- **Peak value**  $\hat{U}$  1700 V
- **Test voltage** 2500 V
- **Insulation resistance**  
min. 200 MOhm x km
- **Coupling resistance**  
depending on the cross-section  
max. 250 Ohm/km
- **Minimum bending radius**  
fixed installation for outer  $\emptyset$ :  
up to 12 mm: 5x cable  $\emptyset$   
>12 to 20 mm: 7,5x cable  $\emptyset$   
>20 mm: 10x cable  $\emptyset$   
free-movement for outer  $\emptyset$ :  
up to 12 mm: 10x cable  $\emptyset$   
>12 to 20 mm: 15x cable  $\emptyset$   
>20 mm: 20x cable  $\emptyset$
- **Radiation resistance**  
up to  $80 \times 10^6$  cJ/kg (up to 80 Mrad)

## Cable construction

- Bare copper, fine wire conductor to DIN VDE 0295 cl. 5, BS 6360 cl. 5 and IEC 60228 cl. 5
- Polyethylene (PE) core insulation
- Core colour: black, brown, grey, green-yellow (earth core divided into 3)
- Cores stranded in concentric layers
- **3+3 core design**
- 1. screening with special aluminum foil
- 2. screening with copper braiding, tinned copper, coverage approx. 80%
- Special PVC outer sheath, schwarz (RAL 9005)
- Pos.no. 22685 = capacitance  
core/core 270 nF/km  
core/screen 520 nF/km

## Properties

- Behavior in fire: Test to DIN VDE 0482 part 265-2-1/ EN 50265-2-1/ IEC 60332-1 (equivalent to DIN VDE 0472 part 804, test type B) low mutual capacitance, to DIN VDE 0472 part 504, test method B
- PE-insulation secures a lower dielectric loss, double potential strength, high longevity and low screen-interference currents
- Low mutual capacitance
- Meets EMC requirements according to EN 55011 and DIN VDE 0875 part 11
- Low coupling resistance for high electromagnetic compatibility
- Due to the optimal screening an interference-free operation of frequency converters is obtained
- The 3 Plus-construction of motor power supply cables features a symmetrical 3-core design, improved in terms of EMC characteristics comparing favorably with a 4-core version
- The protective conductor PE, divided into 3 is uniformly stranded in the interstices
- This enables an extremely concentric structure
- The materials used in manufacture are cadmium-free and contain no silicone and free from substances harmful to the wetting properties of lacquers
- The minimum cross-section of 0,75<sup>2</sup> meets the requirements of DIN EN 60204 part 1
- Resistant to ultra violet rays
- This screened motor supply cable with low mutual capacitance of the single cores because of the special PE core insulation and low screen capacitance enable a low-loss transmission of the power compared to PVC-sheathed connecting cables

## Application

As a supply and connecting cable for medium mechanical stresses in fixed installations and forced movements in dry, moist and wet environments and for outdoor applications. Used in the automobile industry, food industry, environmental engineering, packaging industry, toolmaking machinery, handling equipment, for SIMOVERT drivers, they are particularly suitable for use with industrial pumps, ventilators, conveyor belts and air-conditioning installations and similar applications.

Installation in hazardous areas.

**EMC** = Electromagnetic compatibility

The screen must be connected at both ends and ensure lare-area contact over the entire cable circumference for compliance with the functional interference requirements of EN 55011.

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

Continuation ▶