valid from: 01.01.2019

UNITRONIC® 100



Application

UNITRONIC[®] 100 is a control and signal cable with small cross-sections for fixed installation as well as occasional flexing at free, noncontinuously recurring movement without tensile load. It is used in dry, damp and wet interiors but it is not appropriate for outside usage. The cables are used in the milliampere range for computer systems, electronic control equipment, office machines, balances etc. and wherever the thinnest possible control cables are required.

Design

Design	Design based on standard VDE 0812
Conductor	fine wire strands of bare copper wires
Insulation	special PVC-based compound
Core identification code	according to UNITRONIC® colour code
Stranding	cores are stranded in layers
Outer sheath	special PVC-based compound colour: grey (similar RAL 7001)

Electrical properties at 20°C

Specific volume resistivity	> 20 G Ω x cm
Mutual capacitance	C/C: approx. 120 nF/km (at 800 Hz)
Inductance	approx. 0.65 mH/km
Peak operating voltage	0.14 mm ² : 350 V (not for power applications) ≥ 0.25 mm ² : 500 V (not for power applications)
Test voltage	0.14 mm²: 1200 V ≥ 0.25 mm²: 1500 V

Mechanical and thermal properties

Minimum bending radius	Flexing: 15 x cable Ø Fixed installation: 4 x cable Ø
Temperature range	Flexing: - 5°C up to +70°C Fixed installation: - 40°C up to +80°C
Flammability	flame retardant acc. to IEC 60332-1-2
General requirements	This cable is conform to the EU-Directive 2011/65/EU (RoHS, Restriction of the use of certain hazardous substances).