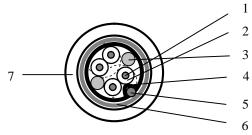


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APPLICATION

Instrumentation and computer cable for EIA RS-485 data transmission applications.

CONSTRUCTION



1. Conductor AWG24 (7xAWG32) tinned Cu

2. Insulation

Material Polyethylene Diameter over insulation 1.73 \pm 0.05 mm

Colour of insulation Pair #1: White/blue and blue/white

Pair #2: White/orange and

orange/white

3. Filler (2x)

Material Polypropylene
Diameter 2.87 mm
Colour White

4. Foil (Z-fold®)

Material Aluminium / Polyester Thickness 9 / 23 μm

5. Drainwire AWG24 (7xAWG32) tinned Cu

6. Braiding

Material 0.122 mm tinned Cu Coverage 90%

7. Sheath

Material FRNC (UV stabilised)
Colour Chrome (like RAL 7037)

Nominal thickness 0.89 mm Nominal diameter 8.65 mm



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REQUIREMENTS AND TEST METHODS

Electrical:

Nominal resistance conductor $78.7 \Omega/\text{km}$ $7.2 \Omega/\text{km}$ Nominal resistance shield Nominal capacitance conductor to conductor 42.0 pF/m Nominal capacitance conductor to shield + other cond. 75.5 pF/m Nominal impedance @ 1 MHz 120Ω Nominal velocity of propagation 66 % Nominal delay 5.2 ns/m Nominal attenuation @ 1 MHz $1.97 \, dB/100 m$

Testvoltage conductor-conductor

Testvoltage conductor-screen

2500 VDC, 3 seconds
2500 VDC, 3 seconds

Voltage rating 300 V RMS (CM application) 30 V RMS (AWM application)

Maximum continues current per conductor @ 25 °C 2.1 A

Mechanical and physical:

Flame resistance IEC 60332-3C
Oil resistance ASTMD741
Radiation resistance IEC544 (CERN)

Application specification BS 7655 section 6.1 table 1, LTS 3

Halogen content according to IEC754-1 zero

Corrosivity of fire gasses according to IEC754-2

Conductivity $\leq 100 \,\mu\text{S/cm}$ pH value ≥ 3.5

Temperature range installing $-15 \text{ to } +80 \text{ }^{\circ}\text{C}$ Temperature range operating (moving installation) $-15 \text{ to } +80 \text{ }^{\circ}\text{C}$ Temperature range operating (fixed installation) $-45 \text{ to } +80 \text{ }^{\circ}\text{C}$ Temperature range storage $-45 \text{ to } +80 \text{ }^{\circ}\text{C}$ Minimum bending radius $-15 \text{ to } +80 \text{ }^{\circ}\text{C}$ $-45 \text{ to } +80 \text{ }^{\circ}\text{C}$ $-45 \text{ to } +80 \text{ }^{\circ}\text{C}$

Maximum pulling tension 395 N

PACKAGING

On non-returnable reels with a nominal length of 305m (-0, +10%) or on non-returnable reels with a nominal length of 500m (-0, +10%) or on non-returnable reels with a nominal length of 1000m (-0, +10%).

Each reel is labelled with the following data:

Belden Logo. Belden code number. Item description. Length on the reel. Date of manufacture. CE-marking.



Belden declares this product to be in compliance with the environmental regulations EU RoHS (Directive 2002/95/EC, 27 January 2003); this is valid for all material produced after the RoHS compliant date for this product.