

product type designation

product description



PROFIBUS FC Robust Cable

Special bus cable (2-core), sold by the meter, unassembled

PROFIBUS FC robust bus cable with PUR outer sheath for use in environments exposed to chemicals and mechanical loads, 2-core shielded, Sold by the meter delivery unit max. 1000 m minimum order quantity 20 m.

suitability for use

For use in chemically and mechanically demanding environments

cable designation

02YSY (ST) C11Y 1x2x0,64/2,55-150 VI KF 40 FR

electrical data

attenuation factor per length

- | | |
|-------------------------|-------------|
| • at 9.6 kHz / maximum | 0.0025 dB/m |
| • at 38.4 kHz / maximum | 0.004 dB/m |
| • at 4 MHz / maximum | 0.022 dB/m |
| • at 16 MHz / maximum | 0.042 dB/m |

impedance

- | | |
|-----------------------|-------|
| • rated value | 150 Ω |
| • at 9.6 kHz | 270 Ω |
| • at 38.4 kHz | 185 Ω |
| • at 3 MHz ... 20 MHz | 150 Ω |

relative symmetrical tolerance

- | | |
|-------------------------------------------------------|------|
| • of the characteristic impedance at 9.6 kHz | 10 % |
| • of the characteristic impedance at 38.4 kHz | 10 % |
| • of the characteristic impedance at 3 MHz ... 20 MHz | 10 % |

loop resistance per length / maximum

110 mΩ/m

shield resistance per length / maximum

9.5 Ω/km

capacity per length / at 1 kHz

28.5 pF/m

operating voltage

- | | |
|-------------|------|
| • RMS value | 80 V |
|-------------|------|

mechanical data

number of electrical cores

2

design of the shield

Overlapped aluminum-clad foil, sheathed in a braided screen of tinned copper wires

type of electrical connection / FastConnect

Yes

outer diameter

- | | |
|------------------------------------|---------|
| • of inner conductor | 0.65 mm |
| • of the wire insulation | 2.55 mm |
| • of the inner sheath of the cable | 5.4 mm |
| • of cable sheath | 8 mm |

symmetrical tolerance of the outer diameter / of cable sheath

0.4 mm

material

- | | |
|------------------------------------|-------------------|
| • of the wire insulation | polyethylene (PE) |
| • of the inner sheath of the cable | PVC |
| • of cable sheath | PUR (TPE-U) |

color	
<ul style="list-style-type: none"> of the insulation of data wires of cable sheath 	red/green Violet
bending radius	
<ul style="list-style-type: none"> with single bend / minimum permissible with multiple bends / minimum permissible 	75 mm 150 mm
tensile load / maximum	100 N
weight per length	71 kg/km
ambient conditions	
ambient temperature	
<ul style="list-style-type: none"> during operation during storage during transport during installation note 	-40 ... +60 °C -40 ... +60 °C -40 ... +60 °C -40 ... +60 °C Electrical properties measured at 20 °C, tests according to DIN 47250 part 4 respectively DIN VDE 0472
fire behavior	flame resistant according to IEC 60332-1
class of burning behaviour / according to EN 13501-6	Fca
chemical resistance	
<ul style="list-style-type: none"> to mineral oil to grease to water 	oil resistant according to IEC 60811-2-1 (7x24h/90°C) resistant conditional resistance
radiological resistance / to UV radiation	resistant
product features, product functions, product components / general	
product feature	
<ul style="list-style-type: none"> halogen-free silicon-free 	No Yes
standards, specifications, approvals	
UL/ETL listing / 300 V Rating	Yes; c(UL)us, CMX
UL/ETL style / 600 V Rating	No
certificate of suitability	
<ul style="list-style-type: none"> EAC approval CE marking RoHS conformity 	Yes Yes Yes
Marine classification association	
<ul style="list-style-type: none"> American Bureau of Shipping Europe Ltd. (ABS) French marine classification society (BV) Det Norske Veritas (DNV) Germanische Lloyd (GL) Lloyds Register of Shipping (LRS) Nippon Kaiji Kyokai (NK) Polski Rejestr Statkow (PRS) 	No No No No No No No
reference code	
<ul style="list-style-type: none"> according to IEC 81346-2 according to IEC 81346-2:2019 	WG WGB
further information / internet-Links	
Internet-Link	
<ul style="list-style-type: none"> to web page: selection aid TIA Selection Tool to website: Industrial communication to website: Industry Mall to website: Information and Download Center to website: Selection guide for cables and connectors to website: Image database to website: CAx-Download-Manager to website: Industry Online Support 	http://www.siemens.com/tia-selection-tool http://www.siemens.com/simatic-net https://mall.industry.siemens.com http://www.siemens.com/industry/infocenter https://sie.ag/2QdlxcP http://automation.siemens.com/bilddb http://www.siemens.com/cax https://support.industry.siemens.com
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