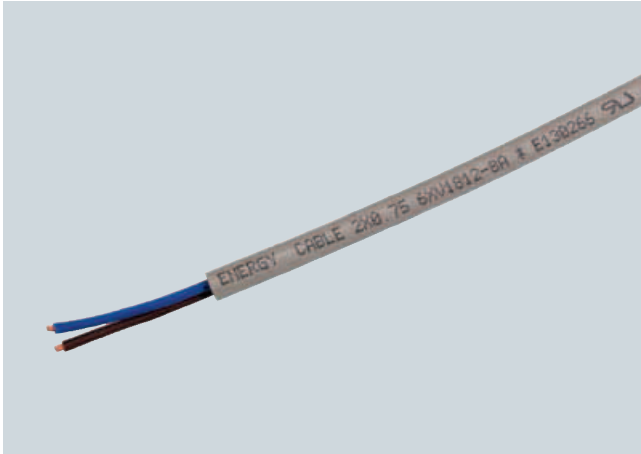


PROFIBUS

Electrical networks (RS485)

Power cables

Overview



- Different versions (5-core, 2-core) for different fields of application
- Rugged cable design for installation in industrial applications
- UL approvals
- Easy length measurement thanks to printed meter markings

Benefits



- Flexible application possibilities thanks to rugged cable design
- Silicon-free, therefore particularly suitable for use in the automotive industry (e.g. on paint shop conveyors)

Application

For the construction of PROFINET/PROFIBUS networks, different cable types are offered to suit the different types of application. The listed power cables should always be used. They are used for devices with degree of protection IP65/67 to connect the signaling contact or 24-V supply of the SCALANCE X and SCALANCE W components (power cable 2x0.75) and for the power supply (power cable 5x1.5 for ET 200).

UL approvals

As a result of appropriate UL styles, the cables can be used worldwide.

Design

Rugged 2-core or 5-core cable with circular cross-section for connection of signaling contact and power supply to IP65/67 components in industrial areas.

Cable types

The following cables with industrial capability are available for connection of the power supply and signaling contact:

- Power cable 2 x 0.75;
power cable for connection of signaling contact and 24 V supply voltage to SCALANCE X and SCALANCE W components
- Power cable 5 x 1.5;
power cable for connection of 24 V power supply of ET 200 using 7/8" plug connectors

Technical specifications

Order No.	6XV1 812-8A	6XV1 830-8AH10
Product type description	Energy Cable	Energy Cable
Suitability for use	Connection of signaling contact and 24-V power supply to SCALANCE X and SCALANCE W	Power supply of ET 200 modules with 7/8" power port
Cable name	L-YY-2x1x0.75 GR	L-Y11Y-JZ 5x1x1.5 GR
Power wires		
Operating voltage (rms value)	600 V	600 V
Conductor cross-section of power wire	0.75 mm ²	1.5 mm ²
Continuous current of the power wires	6 A	16 A
Mechanical data		
Jacket		
• Outer diameter	7.4 mm	10.5 mm
• Symmetrical tolerance of the outer diameter	0.3 mm	0.3 mm
• Material	PVC	PUR
• Color	gray	gray
Ambient temperature		
• during operation	-20 ... +80 °C	-40 ... +80 °C
• during transport	-20 ... +80 °C	-40 ... +80 °C
• during storage	-20 ... +80 °C	-40 ... +80 °C
• during installation	-20 ... +80 °C	-40 ... +80 °C
Bending radius		
• for one-off bending	19 mm	26 mm
• for repeated bending	44 mm	63 mm
Number of bending cycles	-	-
Tensile load, max.	100 N	500 N
Weight per length	70 kg/km	149 kg/km
Fire behavior	Flame retardant to IEC 60332-1	Flame retardant to IEC 60332-1
Chemical resistance		
• to mineral oil	conditional resistance	resistant
• to grease	conditional resistance	resistant
Radiological resistance to UV radiation	resistant	resistant
Product property		
• halogen-free	No	No
• Silicone-free	Yes	Yes
FastConnect electrical connection version	No	No
UL listing at 300 V rating	Yes/CL3	No
UL style at 600 V rating	Yes	Yes

Ordering data

Ordering data	Order No.
Power cable 2 x 0.75 Power cable with trailing capability with 2 copper cores (0.75 mm ²) for connecting to M12 plug-in connector; <u>sold by the meter</u> ; max. 1000 m, minimum order quantity 20 m	6XV1812-8A
Power cable 5 x 1.5 Power cable with trailing capability with 5 copper cores (1.5 mm ²) for connecting to 7/8" plug-in connector; <u>sold by the meter</u> ; max. 1000 m; minimum order quantity 20 m	6XV1 830-8AH10
Additional components	
7/8" plug-in connector Plug with axial cable outlet for field assembly for ET 200, 5-core, plastic enclosure, 1 pack = 5 items	
• Male pins	6GK1 905-0FA00
• Socket insert	6GK1 905-0FB00
7/8" Power T-Tap PRO Power T-piece for ET 200 with two 7/8" socket inserts and one 7/8" pin insert 1 pack = 5 items	6GK1 905-0FC00
Signaling Contact M12 Cable Connector PRO Socket for connection of SCALANCE X208PRO for signaling contact; 5-pole, B-coded, with assembly instructions; 3 items	6GK1908-0DC10-6AA3
Power M12 Cable Connector PRO Socket for connection of SCALANCE W-700 for 24 V DC supply voltage; 4-pole, A-coded, with assembly instructions, 3 items	6GK1 907-0DC10-6AA3
Power M12 Plug PRO Plug for connection to PS791-1PRO power supply for 24 V DC supply voltage; 4-pole, A-coded, with assembly instructions, 3 items	6GK1 907-0DB10-6AA3
SIMATIC NET Manual Collection Electronic manuals for communication systems, communication protocols, and communication products; on DVD, German/English	6GK1 975-1AA00-3AA0

More information

Cable routing:

During storage, transportation and cable laying, keep both ends sealed with a shrink-on cap.
Comply with the permissible bending radii and tensile load!

Note:

Additional components of the SIMATIC NET wiring range can be ordered from your local contact person.

For technical advice contact:

J. Hertlein, A&D SE PS
Tel.: +49(0)911/750 44 65
Fax +49(0)911/750 99 91
E-Mail: juergen.hertlein@siemens.com