

1539033

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Sensor/actuator cable, 3-position, PUR halogen-free, black-gray RAL 7021, shielded, Plug straight M12, coding: A, on Socket straight M8, cable length: 7.2 m

### Commercial data

Item number	1539033
Packing unit	5 pc
Minimum order quantity	50 pc
Note	Made to order (non-returnable)
Sales key	BF03
Product key	AF1CIA
GTIN	4046356076104
Weight per piece (including packing)	229.36 g
Weight per piece (excluding packing)	229.36 g
Customs tariff number	85444290
Country of origin	PL



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## Technical data

### Product properties

Product type	Sensor/actuator cable	
Number of positions	3	
No. of cable outlets	1	
Shielded	yes	
Coding	A	
Insulation characteristics		
Overvoltage category	II	
Degree of pollution	3	

### Material specifications

Flammability rating according to UL 94	НВ
Seal material	NBR
Material of grip body	TPU, hardly inflammable, self-extinguishing
Contact material	CuSn
Contact surface material	Ni/Au
Contact carrier material	TPU GF
Material for screw connection	Zinc die-cast, nickel-plated

### Electrical properties

Insulation resistance	≥ 100 MΩ
Nominal voltage U <sub>N</sub>	250 V AC
	250 V DC
Nominal current I <sub>N</sub>	4 A

### Mechanical properties

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Insertion/withdrawal cycles	≥ 100
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### Signaling

Status display	no
Status display present	no

#### Connector

#### Connection 1

Туре	Plug straight M12
Number of positions	3
Coding type	A

Connection 2	
Туре	Socket straight M8



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Number of positions	3
ble/line	
Cable length	7.2 m
PUR halogen-free black [PUR]	
Dimensional drawing	
Cable weight	26 kg/km
UL AWM Style	20549
Number of positions	3
Shielded	yes
Cable type	PUR halogen-free black [PUR]
Conductor structure signal line	32x 0.10 mm
AWG signal line	24
Conductor cross section	3x 0.25 mm² (Signal line)
Wire diameter incl. insulation	1.17 mm ±0.02 mm (Signal line)
External cable diameter	4.35 mm ±0.2 mm
Outer sheath, material	PUR
External sheath, color	black-gray RAL 7021
Conductor material	Bare Cu litz wires
Material wire insulation	PP
Single wire, color	brown, blue, black
Thickness, insulation	≥ 0.21 mm (Core insulation)
	≥ 0.50 mm (Outer cable sheath)
Overall twist	3 wires, twisted
Optical shield covering	80 %
Max. conductor resistance	max. 79 Ω/km
Insulation resistance	≥ 100 GΩ*km
Nominal voltage, cable	300 V
Test voltage	3000 V
Smallest bending radius, fixed installation	22 mm
Smallest bending radius, movable installation	44 mm
Dynamic load capacity (bending)	Max. bending cycles: 10000000, Bending radius: 50 mm, Traversing path: 10 m, Traversing rate: 3 m/s, Acceleration: 10 m/s²
Dynamic load capacity (torsion)	Torsion: ±180 °/m, Torsion cycles: ≥2000000, Torsional frequency: 35 cycles/min.
Halogen-free	in accordance with DIN VDE 0472 part 815



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Flame resistance	in accordance with UL 758/1581 FT2
	DIN EN 60332-2-2 (20 s)
Resistance to oil	in accordance with DIN EN 60811-2-1
Other resistance	Highly resistant to acids, alkaline solutions and solvents
	hydrolysis and microbe resistant
	partly UV-resistant (in accordance with DIN EN ISO 4892-2-A)
Special properties	Flexible cable conduit capable
	Silicone-free
	Free of substances which would hinder coating with paint or varnish
Ambient temperature (operation)	-40 °C 80 °C (cable, fixed installation)
	-25 °C 80 °C (Cable, flexible installation)

#### Environmental and real-life conditions

#### Ambient conditions

Degree of protection	IP65
	IP67
Ambient temperature (operation)	-25 °C 90 °C (Plug / socket)
	-25 °C 80 °C (cable, fixed installation)
	-5 °C 80 °C (Cable, flexible installation)

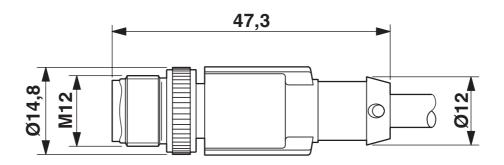


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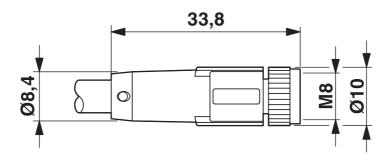
# Drawings

### Dimensional drawing



Plug, M12 x 1, straight, shielded

### Dimensional drawing

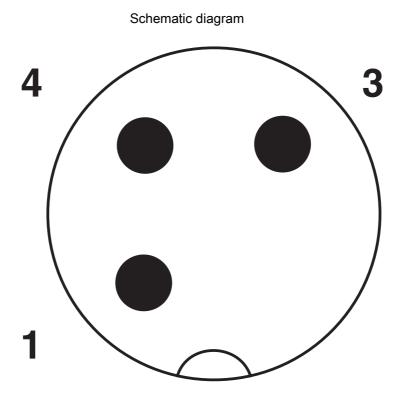


Socket M8 x 1, straight, shielded



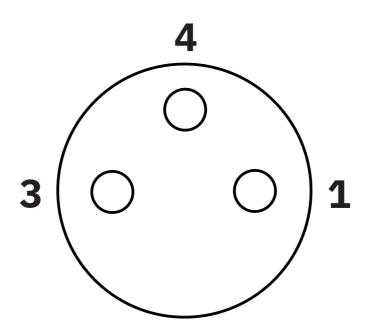
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Pin assignment M12 plug, 3-pos., A-coded, view male side

Schematic diagram



Pin assignment M8 socket, 3-pos.



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## Classifications

UNSPSC 21.0

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EC	$^{LA}$	G	$\overline{}$

	ECLASS-13.0	27060311		
ETIM				
	ETIM 8.0	EC001855		
UNSPSC				

26121600



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## Environmental product compliance

#### EU RoHS

20 1.01.0		
Fulfills EU RoHS substance requirements	Yes, No exemptions	
China RoHS		
Environment friendly use period (EFUP)	EFUP-E	
	No hazardous substances above the limits	
EU REACH SVHC		
REACH candidate substance (CAS No.)	No substance above 0.1 wt%	

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