

# SAC-7P-M12MS/ 1,5-513 SH8 - Sensor/actuator cable



1403299

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Sensor/actuator cable, 8-position, PUR halogen-free, black-gray RAL 7021, shielded, Plug straight M12, coding: A, on free cable end, cable length: 1.5 m

## Commercial data

Item number	1403299
Packing unit	1 pc
Minimum order quantity	1 pc
Product key	AF1CFA
GTIN	4046356647397
Weight per piece (including packing)	82.2 g
Weight per piece (excluding packing)	82.2 g
Country of origin	PL

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## Technical data

### Product properties

Product type	Sensor/actuator cable
Number of positions	8
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	HB
Seal material	NBR
Material of grip body	TPU, hardly inflammable, self-extinguishing
Contact material	CuZn
Contact surface material	Ni/Au
Contact carrier material	TPU GF
Material for screw connection	Zinc die-cast, nickel-plated

### Electrical properties

Nominal voltage $U_N$	30 V AC
	30 V DC
Nominal current $I_N$	2 A

### Signaling

Status display	no
Status display present	no

### Connector

#### Connection 1

Type	Plug straight M12
Number of positions	8
Coding type	A

#### Connection 2

Type	free cable end
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### Cable/line

Cable length	1.5 m
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#### PUR halogen-free black [513]

Cable weight	58 kg/km
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UL AWM Style	20549
Number of positions	7
Shielded	yes
Cable type	PUR halogen-free black [513]
Conductor type	Round cable
Conductor structure signal line	32x 0.10 mm
AWG signal line	24
Conductor cross-section	7x 0.25 mm <sup>2</sup> (Signal line) 1x 0.25 mm <sup>2</sup> (Drain wire)
Wire diameter incl. insulation	1.15 mm ±0.05 mm (Signal line)
External cable diameter	6.30 mm ±0.2 mm
Outer sheath, material	PUR
External sheath, color	black-gray RAL 7021
Conductor material	Bare Cu litz wires
Material, filler	PE
Material wire insulation	PP
Single wire, color	white, brown, green, yellow, gray, pink, blue
Thickness, insulation	≥ 0.21 mm (Core insulation) ≥ 0.76 mm (Outer cable sheath)
Overall twist	Seven wires around the filler to the core
Optical shield covering	85 %
Max. conductor resistance	≤ 78 Ω/km (at 20 °C)
Insulation resistance	≥ 100 GΩ*km (at 20 °C)
Nominal voltage, cable	≤ 300 V
Test voltage	≥ 3000 V
Smallest bending radius, fixed installation	65 mm
Smallest bending radius, movable installation	65 mm
Dynamic load capacity (bending)	Max. bending cycles: 4000000, Bending radius: 65 mm, Traversing path: 10 m, Traversing rate: 3 m/s, Acceleration: 10 m/s <sup>2</sup>
Halogen-free	in accordance with DIN VDE 0472 part 815
Flame resistance	in accordance with DIN UL-Style 20549
Special properties	Flexible cable conduit capable
Ambient temperature (operation)	-40 °C ... 80 °C (cable, fixed installation)

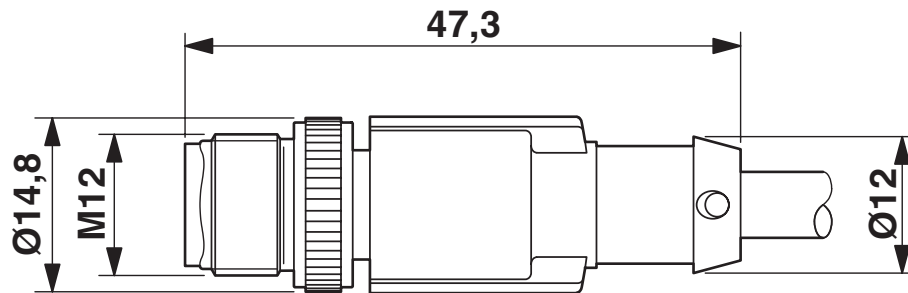
## Environmental and real-life conditions

### Ambient conditions

Degree of protection	IP65
	IP68

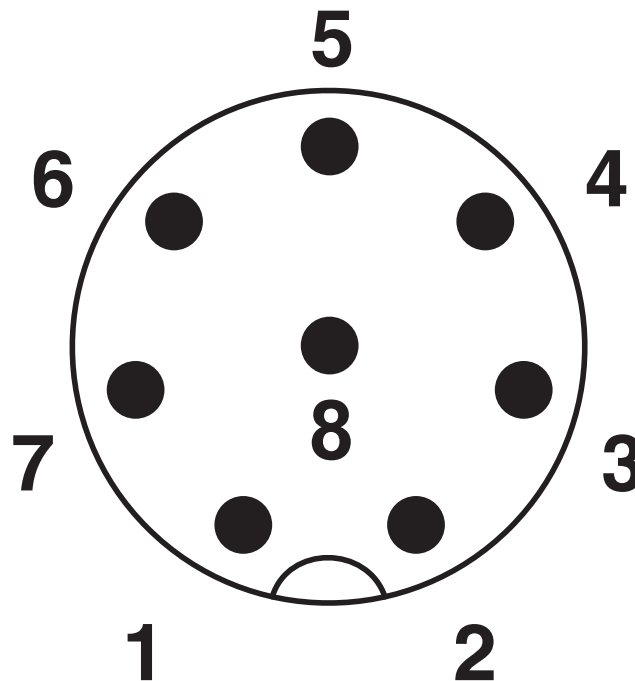
Drawings

Dimensional drawing



Plug, M12 x 1, straight, shielded

Schematic diagram



Pin assignment M12 plug, 8-pos., view plug side

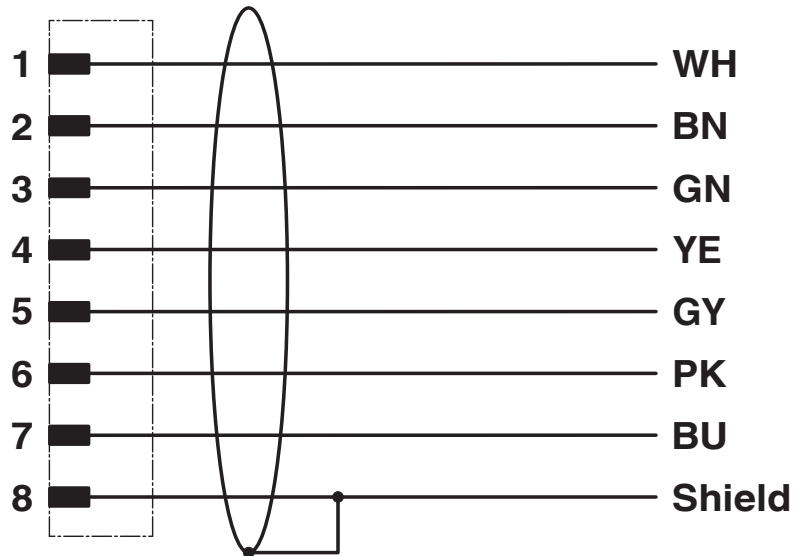
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Circuit diagram



Contact assignment of the M12 plugs

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## Classifications

### ECLASS

ECLASS-13.0	27060311
ECLASS-15.0	27060311

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## Environmental product compliance

### China RoHS

Environment friendly use period (EFUP)	EFUP-50
	An article-related China RoHS declaration table can be found in the download area for the respective article under "Manufacturer declaration". For all articles with EFUP-E, no China RoHS declaration table issued and required.

### EU REACH SVHC

REACH candidate substance (CAS No.)	No substance above 0.1 wt%
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