

## Sensor/actuator cable - SAC-3P-MS/1,5-542/ FRSH SCO BK - 1406253


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Sensor/actuator cable, 3-position, PVC, yellow, shielded, Plug straight M12 SPEEDCON, A-coded, on Socket angled M12 SPEEDCON, A-coded, cable length: 1.5 m



### Key Commercial Data

Packing unit	1 pc
Minimum order quantity	50 pc
GTIN	 4 046356 797993
GTIN	4046356797993

### Technical data

#### Dimensions

Length of cable	1.5 m
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#### Ambient conditions

Ambient temperature (operation)	-25 °C ... 90 °C (Plug / socket)
Degree of protection	IP65/IP67

#### General

Rated current at 40°C	4 A
Rated voltage	48 V AC 60 V DC
Number of positions	3
Insulation resistance	≥ 100 MΩ
Coding	A - standard
Standards/regulations	M12 connector IEC 61076-2-101
Status display	No
Protective circuit/component	unwired
Overvoltage category	II
Degree of pollution	3

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## Technical data

### General

Insertion/withdrawal cycles	≥ 100
Torque	0.4 Nm (M12 connector)

### Material

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

### Standards and Regulations

Standard designation	M12 connector
Standards/regulations	IEC 61076-2-101
Flammability rating according to UL 94	HB

### Cable

Cable type	PVC yellow 105 °C
Cable type (abbreviation)	542
UL AWM style	2517 (105 °C / 300 V)
AWG signal line	22
Conductor structure signal line	30x 1.30 mm
Core diameter including insulation	1.27 mm ±0.03 mm
Wire colors	brown, blue, black
Overall twist	3 wires, twisted
Shielding	Tinned copper braided shield
Optical shield covering	85 %
External sheath, color	yellow
External cable diameter D	5.2 mm ±0.2 mm
Minimum bending radius, flexible installation	12 x D
Cable weight	40 kg/km
Outer sheath, material	PVC
Material conductor insulation	PVC
Conductor material	Tin-plated Cu litz wires
Insulation resistance	≥ (550 M Ohms/m @ 500V)
Conductor resistance	max. 50.5 Ω/km (20 °C)
Nominal voltage, cable	300 V
Special properties	UL standards PLTC and ITC
Flame resistance	FT4
Other resistance	UV resistant
Ambient temperature (operation)	-30 °C ... 105 °C (cable, fixed installation)

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## Technical data

### Cable

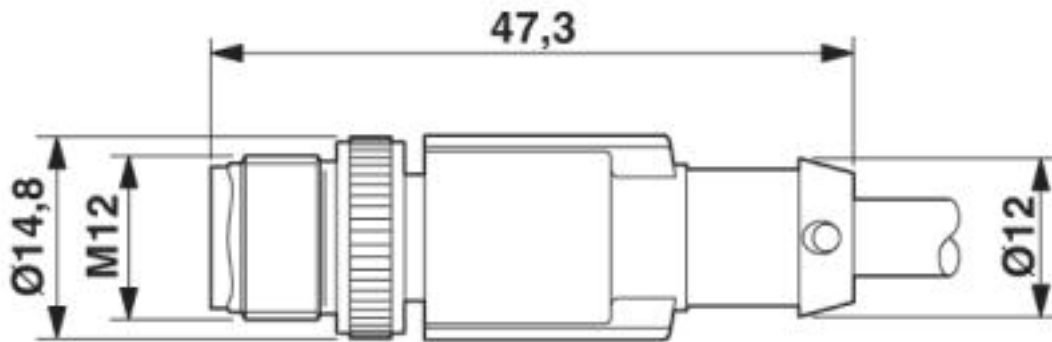
	-5 °C ... 105 °C (cable, flexible installation)
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### Environmental Product Compliance

China RoHS	Environmentally Friendly Use Period = 50
	For details about hazardous substances go to tab "Downloads", Category "Manufacturer's declaration"

## Drawings

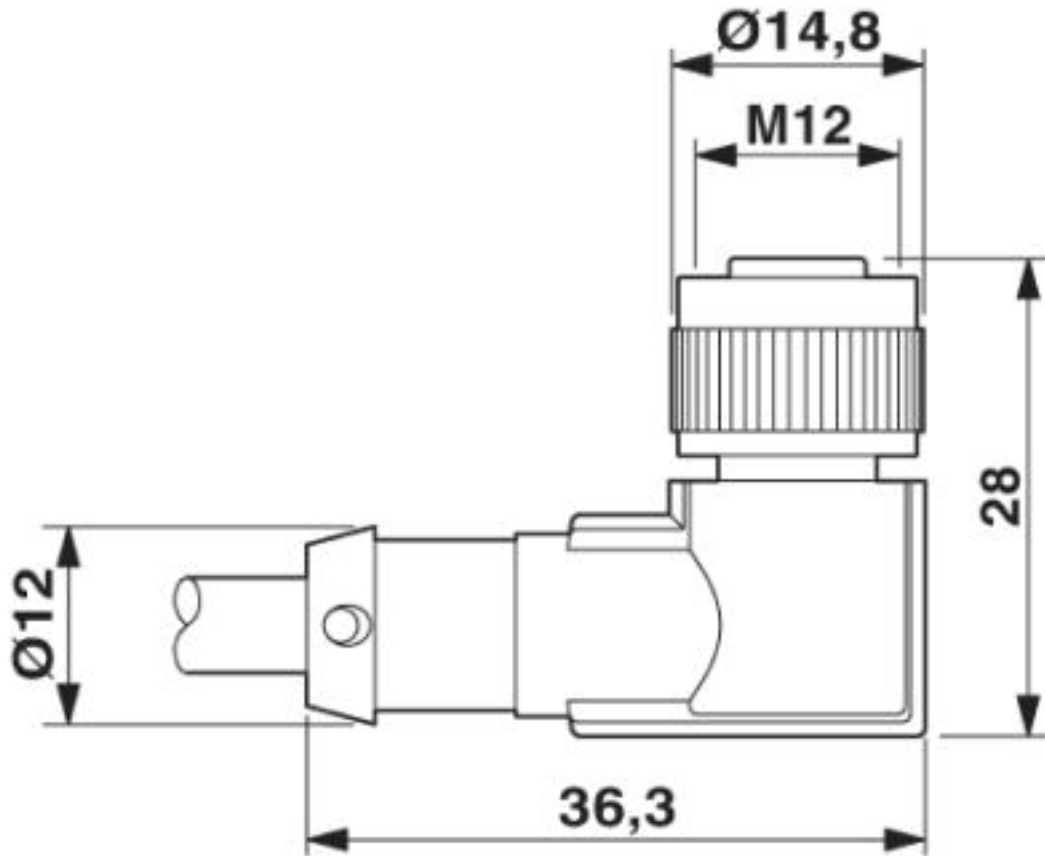
Dimensional drawing



Plug, M12 x 1, straight, shielded

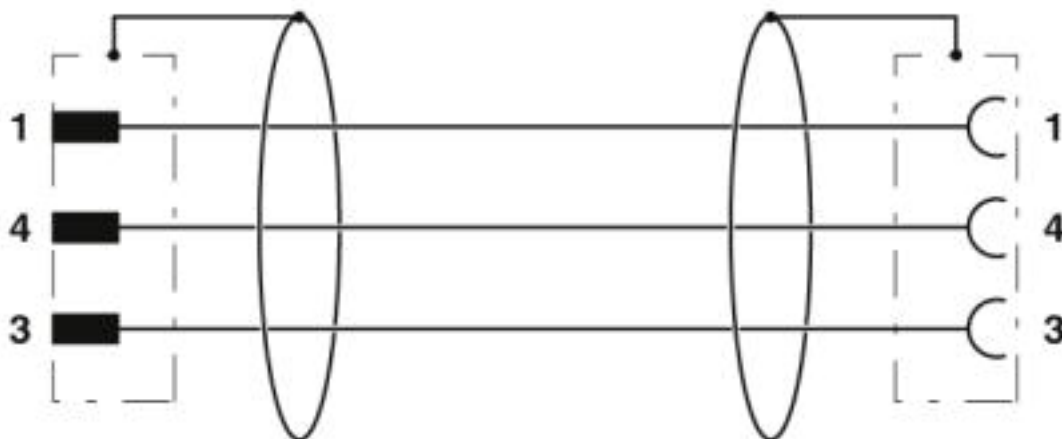
# Sensor/actuator cable - SAC-3P-MS/1,5-542/ FRSH SCO BK - 1406253

Dimensional drawing



M12 x 1 socket, angled, shielded

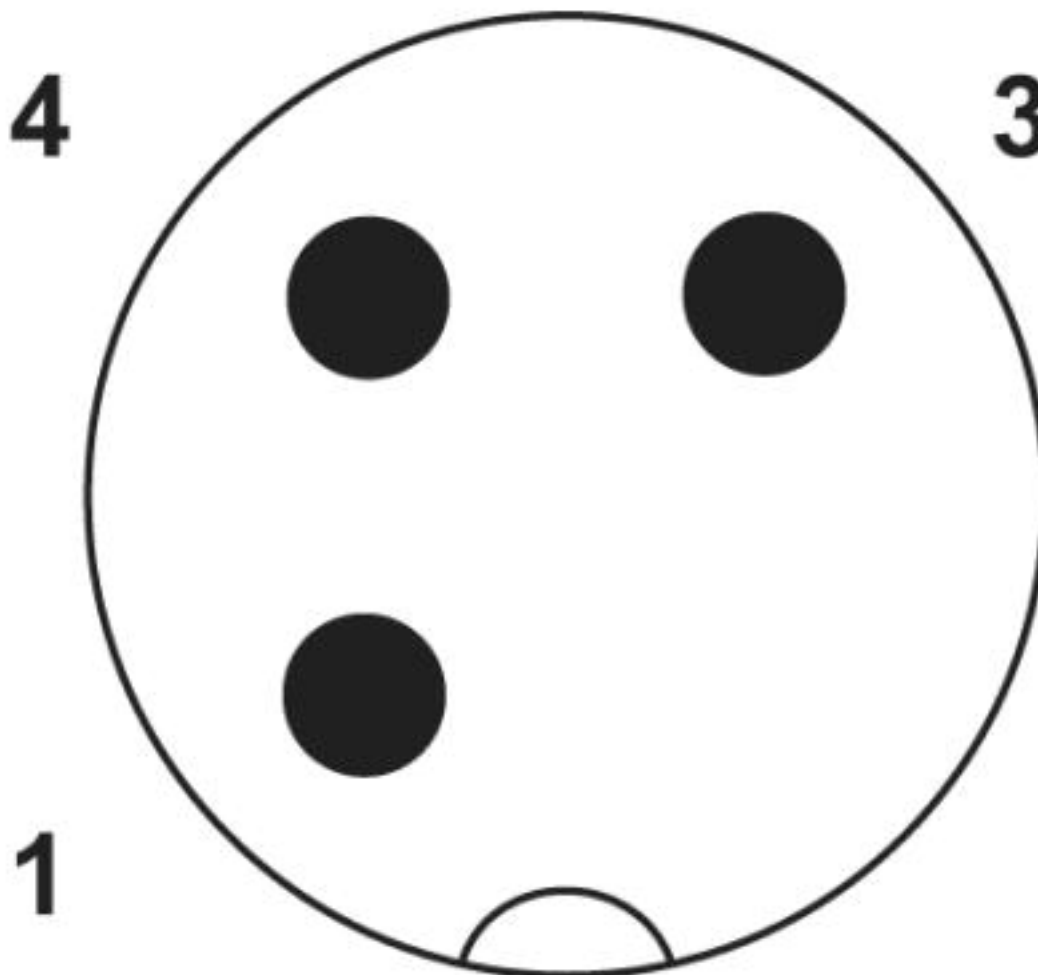
Circuit diagram



Contact assignment of M8 plugs / M12 sockets

# Sensor/actuator cable - SAC-3P-MS/1,5-542/ FRSH SCO BK - 1406253

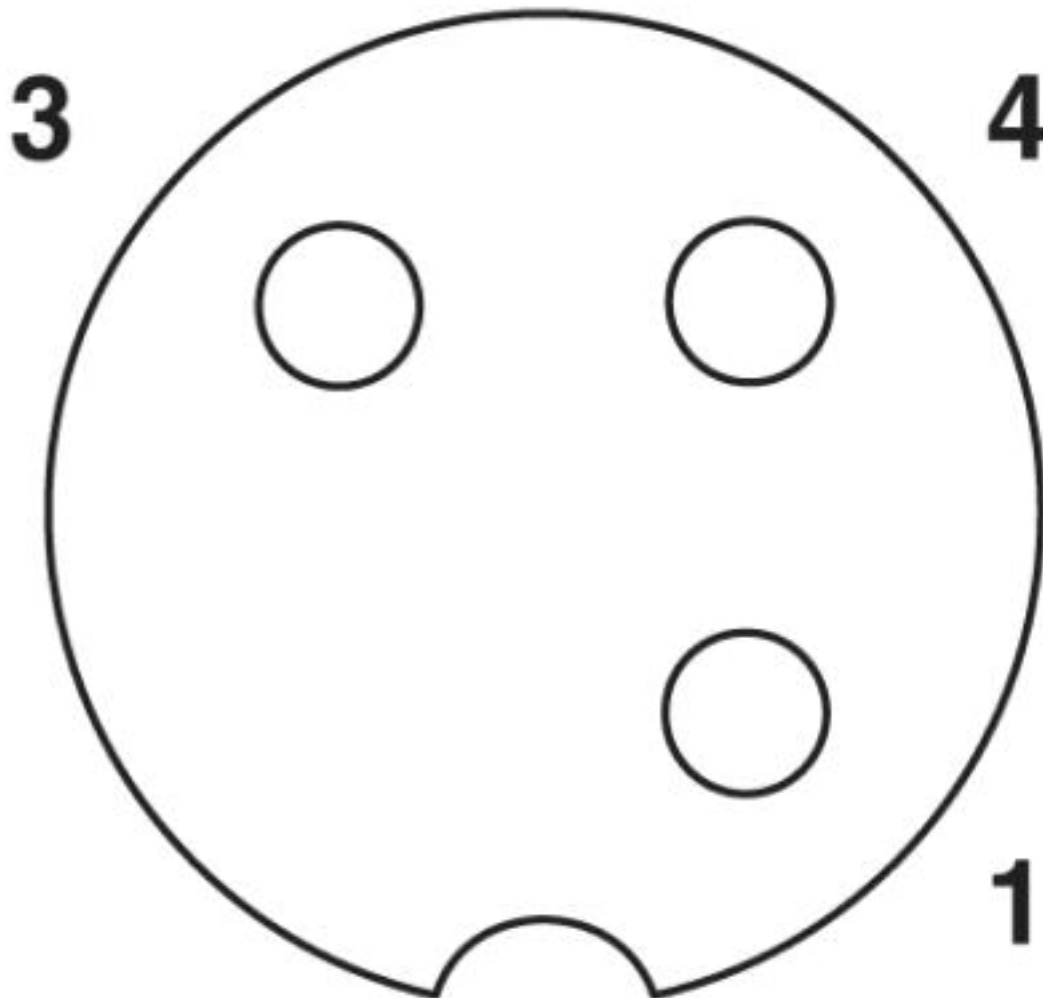
Schematic diagram



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

# Sensor/actuator cable - SAC-3P-MS/1,5-542/ FRSH SCO BK - 1406253

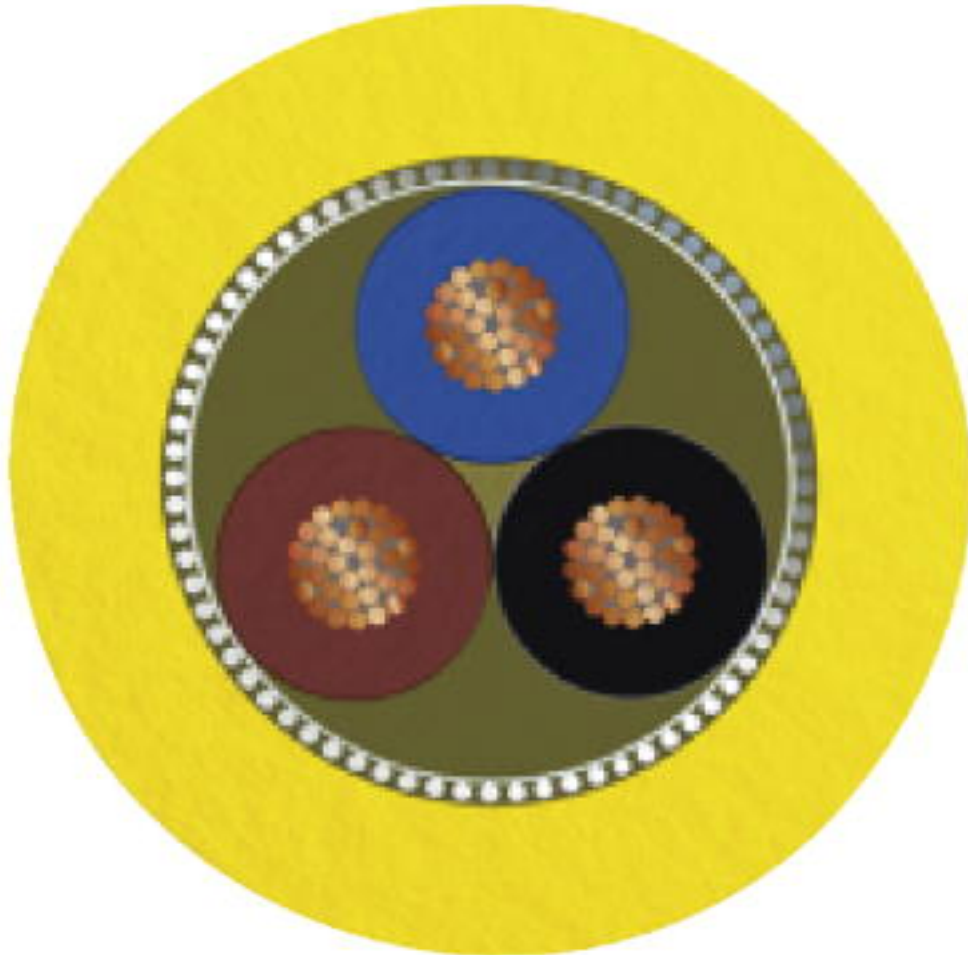
Schematic diagram



Pin assignment M12 socket, 3-pos., A-coded, view female side

# Sensor/actuator cable - SAC-3P-MS/1,5-542/ FRSH SCO BK - 1406253

Cable cross section



PVC yellow 105 °C [542]

## Approvals

Approvals

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Approvals

UL Listed / cUL Listed / EAC / cULus Listed

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Ex Approvals

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Approval details

# Sensor/actuator cable - SAC-3P-MS/1,5-542/ FRSH SCO BK - 1406253

## Approvals

UL Listed		<a href="http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm">http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm</a>	FILE E 221474
Nominal voltage UN		300 V	
Nominal current IN		4 A	

cUL Listed		<a href="http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm">http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm</a>	FILE E 221474
Nominal voltage UN		300 V	
Nominal current IN		4 A	

EAC		RU C- DE.BL08.B.00286
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cULus Listed	
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