

## Sensor/actuator cable - SAC-3P-MR/1,5-542/ FRSH SCO BK - 1406260


Please be informed that the data shown in this PDF Document is generated from our Online Catalog. Please find the complete data in the user's documentation. Our General Terms of Use for Downloads are valid (<http://phoenixcontact.com/download>)



Sensor/actuator cable, 3-position, PVC, yellow, shielded, Plug angled 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 797924
GTIN	4046356797924

### Technical data

#### Dimensions

Length of cable	1.5 m
-----------------	-------

#### 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

# Sensor/actuator cable - SAC-3P-MR/1,5-542/ FRSH SCO BK - 1406260

## 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)

# Sensor/actuator cable - SAC-3P-MR/1,5-542/ FRSH SCO BK - 1406260

## Technical data

### Cable

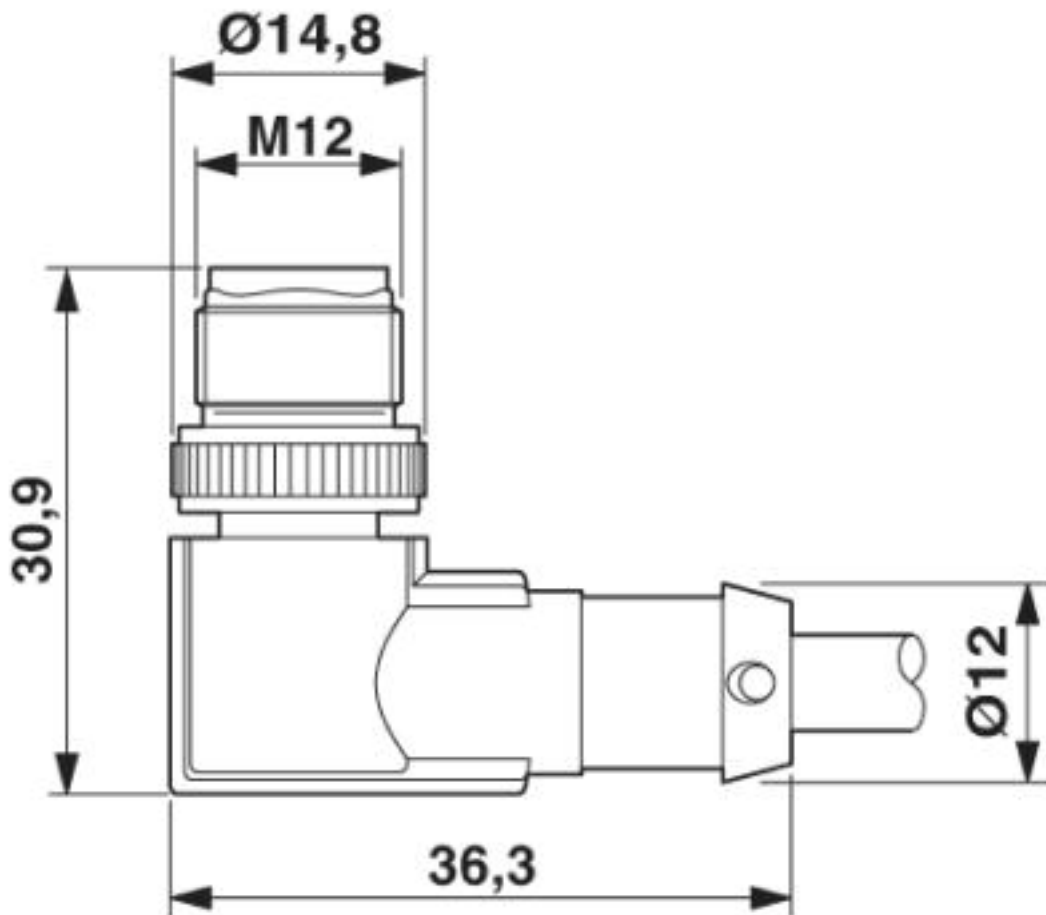
	-5 °C ... 105 °C (cable, flexible installation)
--	---

### Environmental Product Compliance

China RoHS	Environmentally friendly use period: unlimited = EFUP-e
	No hazardous substances above threshold values

## Drawings

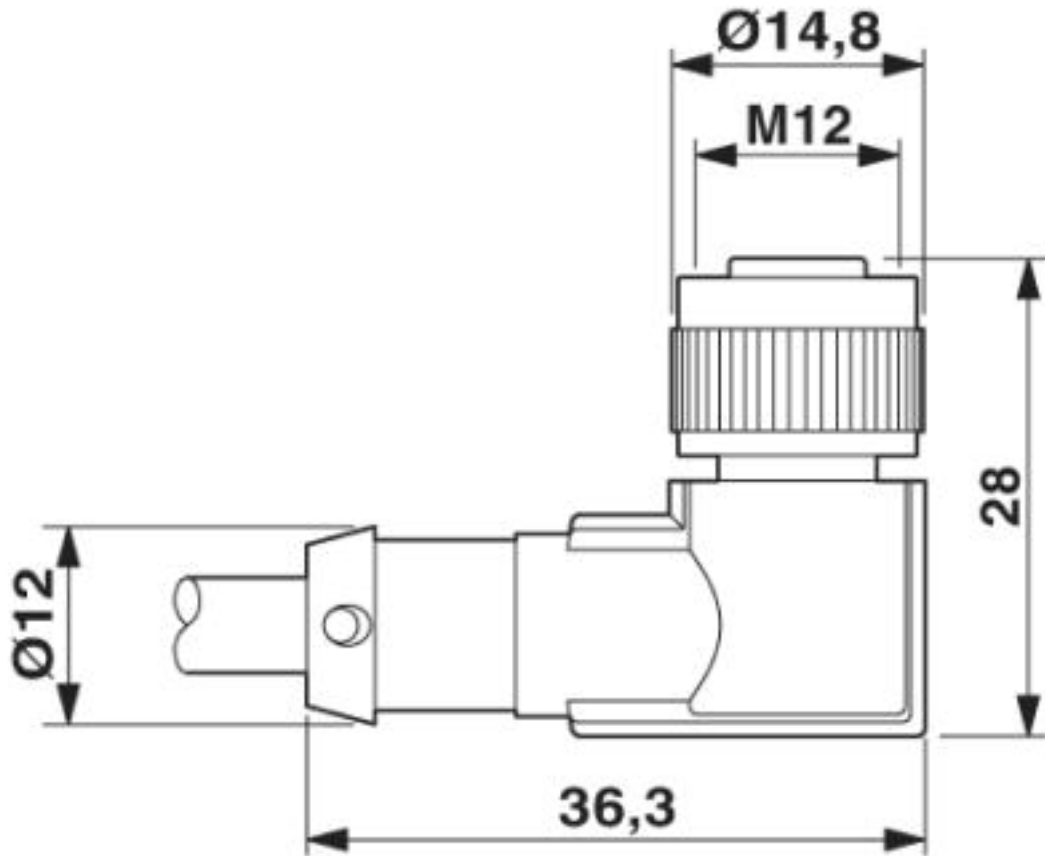
Dimensional drawing



M12 x 1 male plug, angled, shielded

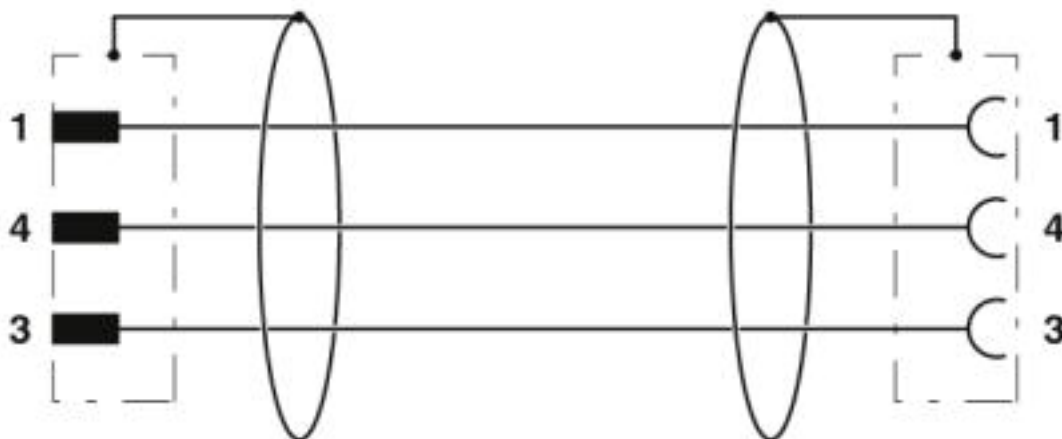
# Sensor/actuator cable - SAC-3P-MR/1,5-542/ FRSH SCO BK - 1406260

Dimensional drawing



M12 x 1 socket, angled, shielded

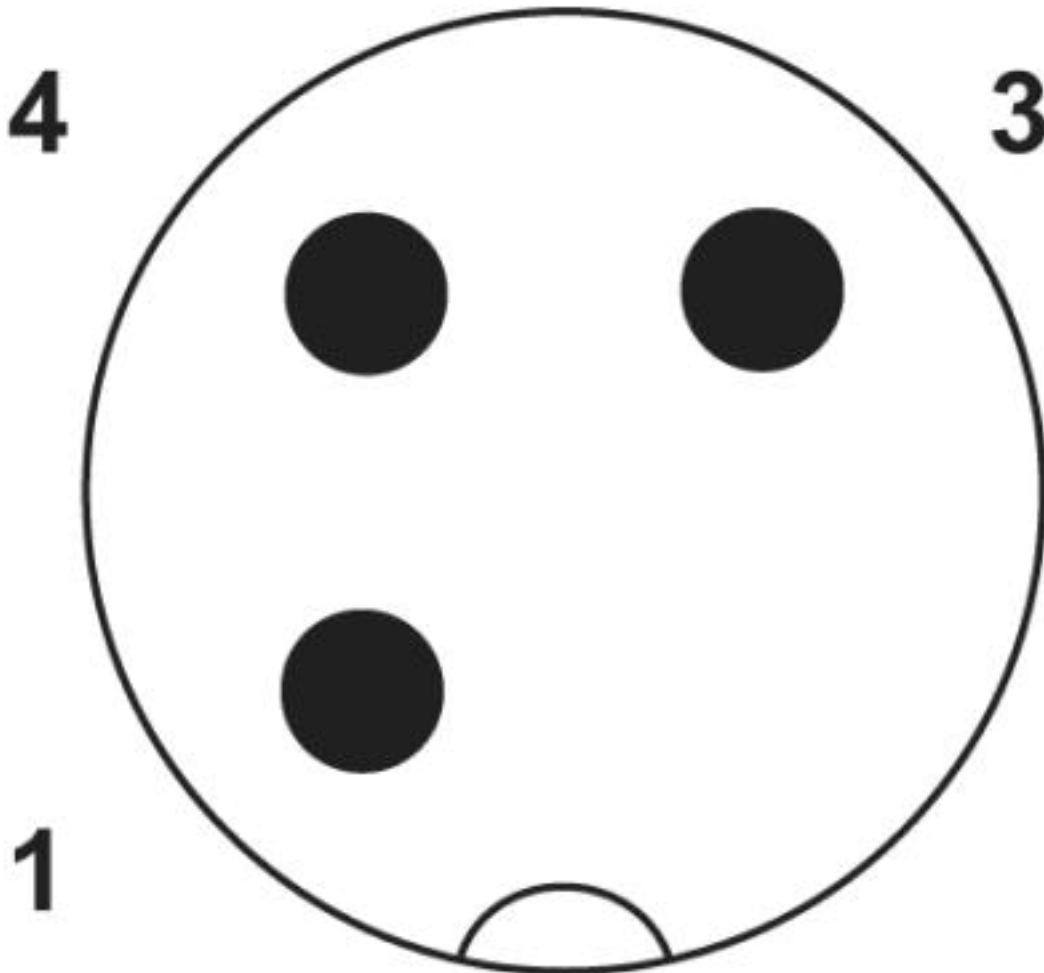
Circuit diagram



Contact assignment of M8 plugs / M12 sockets

# Sensor/actuator cable - SAC-3P-MR/1,5-542/ FRSH SCO BK - 1406260

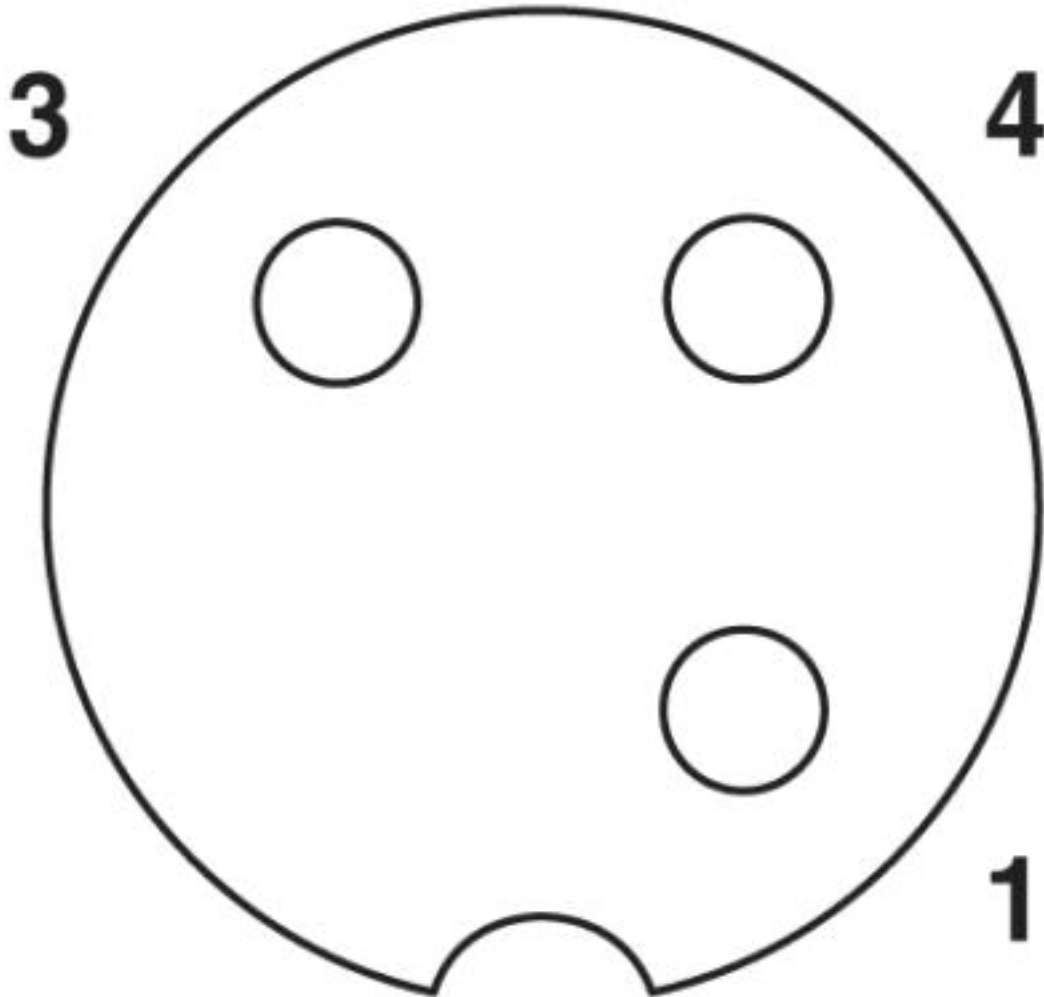
Schematic diagram



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

## Sensor/actuator cable - SAC-3P-MR/1,5-542/ FRSH SCO BK - 1406260

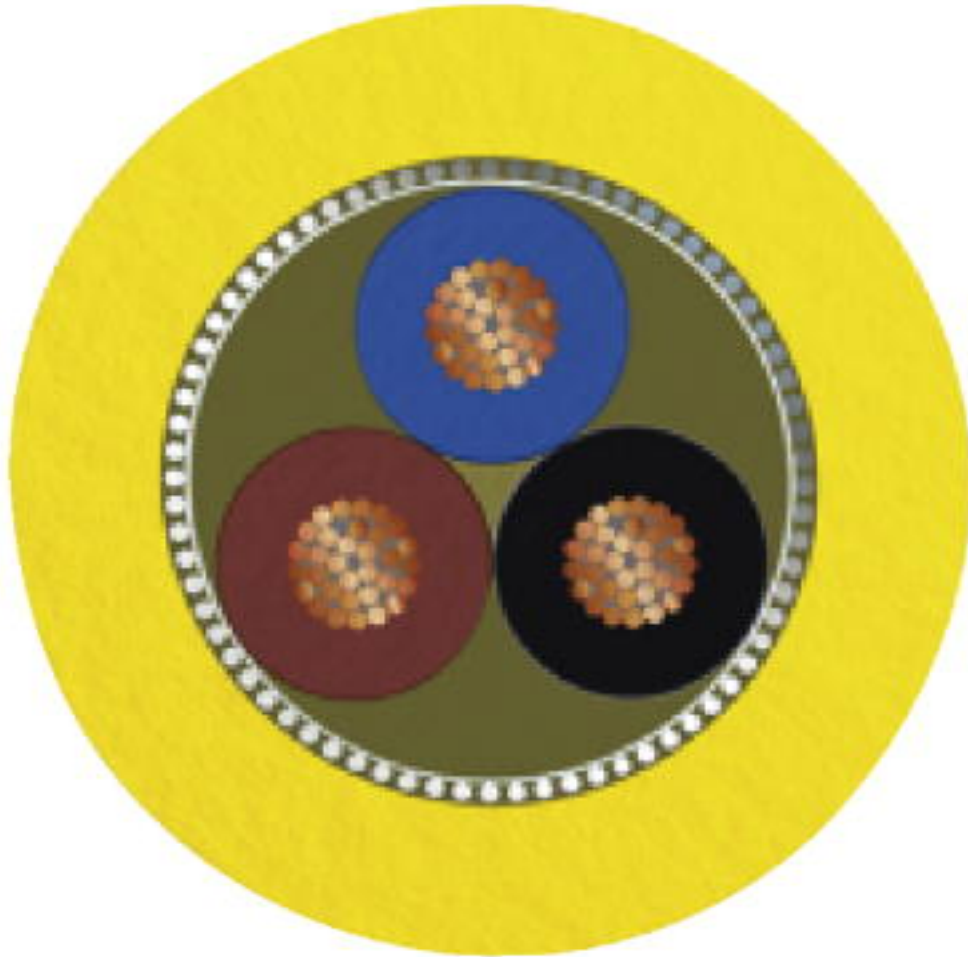
Schematic diagram



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

# Sensor/actuator cable - SAC-3P-MR/1,5-542/ FRSH SCO BK - 1406260

Cable cross section



PVC yellow 105 °C [542]

## Approvals

Approvals

---

Approvals

UL Listed / cUL Listed / EAC / cULus Listed

---

Ex Approvals

---

Approval details

# Sensor/actuator cable - SAC-3P-MR/1,5-542/ FRSH SCO BK - 1406260

## 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
-----	--	--	--------------------------

cULus Listed			
--------------	--	--	--

Phoenix Contact 2019 © - all rights reserved  
<http://www.phoenixcontact.com>

PHOENIX CONTACT GmbH & Co. KG  
Flachsmarktstr. 8  
32825 Blomberg  
Germany  
Tel. +49 5235 300  
Fax +49 5235 3 41200  
<http://www.phoenixcontact.com>