

# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

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 documentation. Our general terms of use for downloads are valid.



Sensor/actuator cable, 3-position, PVC, yellow, Plug straight M8, on Socket straight M8, coding: A, cable length: 1.5 m

## Commercial data

Item number	1406271
Packing unit	1 pc
Minimum order quantity	1 pc
Note	Made to order (non-returnable)
Sales key	BF13
Product key	BF1ICA
GTIN	4046356797818
Weight per piece (including packing)	43 g
Weight per piece (excluding packing)	43 g
Customs tariff number	85444290
Country of origin	US

# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

## Technical data

### Product properties

Product type	Sensor/actuator cable
Number of positions	3
Application	Standard, U.S. cables
No. of cable outlets	1
Shielded	no
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	CuSn
Contact surface material	Ni/Au
Contact carrier material	TPU GF
Material for screw connection	Zinc die-cast, nickel-plated
Outer sheath, material	PVC

### Electrical properties

Contact resistance	$\leq 5 \text{ m}\Omega$
Insulation resistance	$\geq 100 \text{ M}\Omega$
Nominal voltage $U_N$	48 V AC
	60 V DC
Nominal current $I_N$	4 A
Protective circuit	unwired

### Mechanical properties

#### Mechanical data

Insertion/withdrawal cycles	$\geq 100$
-----------------------------	------------

### Signaling

Status display	No
Status display present	No

### Connection data

#### Conductor connection

Tightening torque	0.2 Nm (M8 connectors)
-------------------	------------------------

# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

## Connector

### Connection 1

Type	Plug straight M8
Number of positions	3
	3

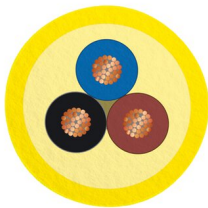
### Connection 2

Type	Socket straight M8
Number of positions	3
Coding type	A
Number of positions	3

## Cable/line

Cable length	1.5 m
--------------	-------

### PVC yellow 105 °C [542]

Dimensional drawing	
Cable weight	21 kg/km
UL AWM Style	2517 (105 °C / 300 V)
Number of positions	3
Shielded	no
Cable type	PVC yellow 105 °C [542]
AWG signal line	24
Wire diameter incl. insulation	1.12 mm ±0.03 mm
External cable diameter	4.1 mm ±0.2 mm
Outer sheath, material	PVC
External sheath, color	yellow
Conductor material	Tin-plated Cu litz wires
Material wire insulation	PVC
Single wire, color	brown, blue, black
Overall twist	3 wires, twisted
Max. conductor resistance	max. 79.7 Ω/km (20 °C)
Insulation resistance	≥ (550 M Ohms/m @ 500V)
Nominal voltage, cable	300 V
Minimum bending radius, flexible installation	8 x D
Flame resistance	FT4

# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

Other resistance	UV resistant
Ambient temperature (operation)	-30 °C ... 105 °C (cable, fixed installation)

## Environmental and real-life conditions

### Ambient conditions

Degree of protection	IP65
	IP67
	IP68
Ambient temperature (operation)	-25 °C ... 90 °C (Plug / socket)
	-40 °C ... 80 °C (cable, fixed installation)
	-5 °C ... 80 °C (Cable, flexible installation)

## Standards and regulations

Standard designation	M8 connector
Standards/specifications	IEC 61076-2-104

# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

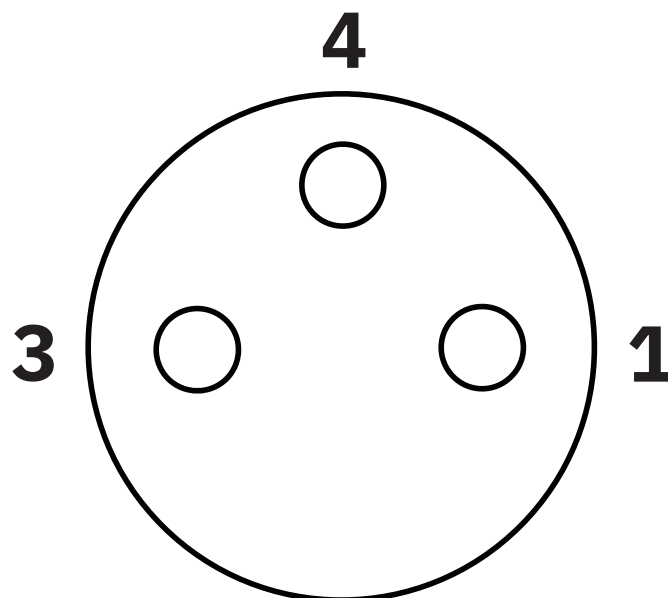
## Drawings

Dimensional drawing



M8 x 1 male plug, straight version

Schematic diagram



Pin assignment M8 socket, 3-pos., view female side

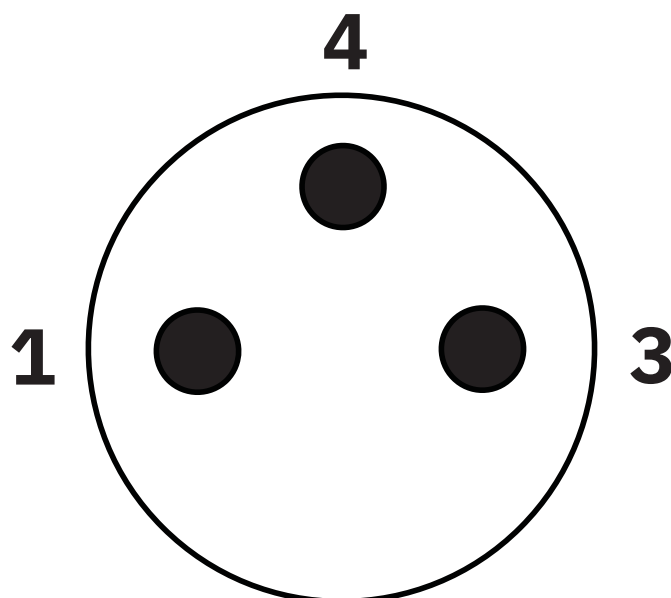
# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

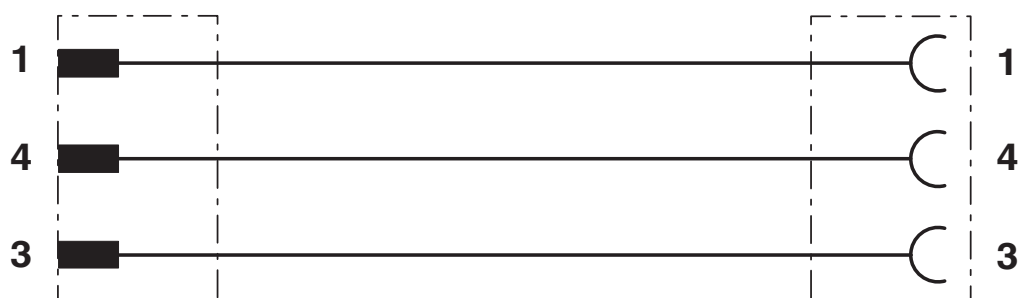
<https://www.phoenixcontact.com/us/products/1406271>

Schematic diagram



Pin assignment M8 plug, 3-pos., view male side

Circuit diagram



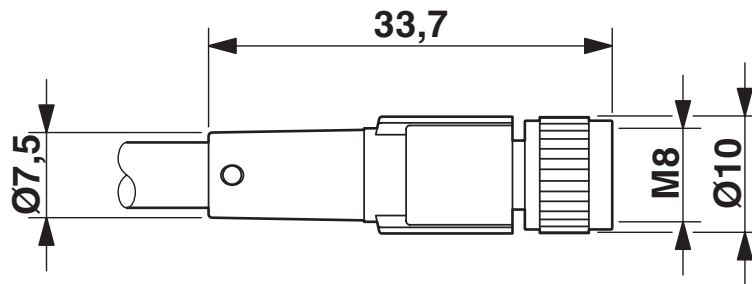
# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

Dimensional drawing



Socket M8 x 1, straight

# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

## Approvals

To download certificates, visit the product detail page: <https://www.phoenixcontact.com/us/products/1406271>



### EAC

Approval ID: RU C-DE.BL08.B.00286



### UL Listed

Approval ID: FILE E 221474

	Nominal voltage $U_N$	Nominal current $I_N$	Cross section AWG	Cross section $\text{mm}^2$
	125 V	4 A	-	-



### cUL Listed

Approval ID: FILE E 221474

	Nominal voltage $U_N$	Nominal current $I_N$	Cross section AWG	Cross section $\text{mm}^2$
	125 V	4 A	-	-



### EAC-RoHS

Approval ID: RU D-DE.HB35.B.00387



### cUL Listed

Approval ID: FILE E 221474

	Nominal voltage $U_N$	Nominal current $I_N$	Cross section AWG	Cross section $\text{mm}^2$
	60 V	4 A	-	-



### UL Listed

Approval ID: FILE E 221474

	Nominal voltage $U_N$	Nominal current $I_N$	Cross section AWG	Cross section $\text{mm}^2$
	60 V	4 A	-	-



# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

## Classifications

### ECLASS

ECLASS-11.0	27060311
ECLASS-12.0	27060311
ECLASS-13.0	27060311

### ETIM

ETIM 8.0	EC001855
----------	----------

### UNSPSC

UNSPSC 21.0	26121600
-------------	----------

1406271  
<https://www.phoenixcontact.com/us/products/1406271>

Environmental product compliance

REACH SVHC	Lead 7439-92-1
China RoHS	Environmentally Friendly Use Period = 50 years
	For information on hazardous substances, refer to the manufacturer's declaration available under "Downloads"

# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

## Accessories

### PROT-M 8 FS-PA-CHAIN - Sealing cap

1430857

<https://www.phoenixcontact.com/us/products/1430857>

M8 sealing cap made of plastic with fixing band for sensor cables, for M8 plugs



---

### PROT-M 8 MS-PA-CHAIN - Screw plug

1430860

<https://www.phoenixcontact.com/us/products/1430860>

M8 sealing cap made of plastic with fixing band for sensor cables, for M8 sockets



# SAC-3P-M8MS/ 1,5-542/M8 FS BK - Sensor/actuator cable



1406271

<https://www.phoenixcontact.com/us/products/1406271>

## TSD 02 SAC - Torque screwdriver

1208487

<https://www.phoenixcontact.com/us/products/1208487>



Torque screwdriver, with preset torque of 0.2 Nm and 4 mm hexagonal drive for M8 connectors

---

## SAC BIT M8-D10 - Tool

1208461

<https://www.phoenixcontact.com/us/products/1208461>



Nut for assembling M8 connectors with longitudinal knurl and a knurl diameter of 10 mm, for 4 mm hexagonal drive

---

Phoenix Contact 2023 © - all rights reserved  
<https://www.phoenixcontact.com>

Phoenix Contact USA  
586 Fulling Mill Road  
Middletown, PA 17057, United States  
(+717) 944-1300  
[info@phoenixcon.com](mailto:info@phoenixcon.com)