

## Sensor/Actuator cable - SAC-4P-M8MR/0,5-542/M8FS SH BK - 1406009

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://download.phoenixcontact.com>)



Sensor/Actuator cable, 4-position, PVC, yellow, shielded, Plug angled M8, on Socket straight M8, Cable length: 0.5 m



### Key commercial data

Packing unit	1 PCE
GTIN	4 046356 800204
Custom tariff number	85444290
Country of origin	UNITED STATES

### Technical data

#### Dimensions

Length of cable	0.5 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	30 V
Number of positions	4
Contact resistance	≤ 5 mΩ
Insulation resistance	≥ 100 MΩ
Standards/regulations	M8 plug-in connector IEC 61076-2-104
Coding	A - standard

## Sensor/Actuator cable - SAC-4P-M8MR/0,5-542/M8FS SH BK - 1406009

### Technical data

#### General

Surge voltage category	II
Pollution degree	3
Insertion/withdrawal cycles	≥ 100
Torque	0.2 Nm (M8 plug-in connectors)
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
Status display	No

#### Line characteristics

Cable type	PVC yellow 105 °C
Cable type (abbreviation)	542
UL AWM style	2517 (105°C/300 V)
AWG signal line	24
Core diameter including insulation	1.12 mm ±0.03 mm
Wire colors	brown, blue, black, white
Overall twist	4 wires, twisted
Shielding	Tinned copper braided shield
Optical shield covering	85 %
External sheath, color	yellow
External cable diameter D	4.9 mm ± 0.2 mm
Minimum bending radius, flexible installation	12 x D
Cable weight	37 kg/km
Outer sheath, material	PVC
Material conductor insulation	PVC
Conductor material	Tin-plated Cu litz wires
Nominal voltage, cable	300 V
Other resistance	UV resistant
Ambient temperature (operation)	-30 °C ... 105 °C (cable, fixed installation)

### Classifications

#### eCl@ss

eCl@ss 4.0	27060306
eCl@ss 4.1	27060306

# Sensor/Actuator cable - SAC-4P-M8MR/0,5-542/M8FS SH BK - 1406009

## Classifications

### eCl@ss

eCl@ss 5.0	27061801
eCl@ss 5.1	27061801
eCl@ss 6.0	27061801
eCl@ss 7.0	27061801

### ETIM

ETIM 3.0	EC001855
ETIM 4.0	EC001855
ETIM 5.0	EC001855

### UNSPSC

UNSPSC 6.01	31251501
UNSPSC 7.0901	31251501
UNSPSC 11	31251501
UNSPSC 12.01	31251501
UNSPSC 13.2	31251501

## Approvals

### Approvals

---

Approvals

UL Listed / cUL Listed / cULus Listed

---

Ex Approvals

---

Approvals submitted

---

### Approval details

UL Listed	
Nominal current IN	4 A
Nominal voltage UN	125 V

# Sensor/Actuator cable - SAC-4P-M8MR/0,5-542/M8FS SH BK - 1406009

## Approvals

cUL Listed	
Nominal current IN	4 A
Nominal voltage UN	125 V

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

## Accessories

### Accessories

### Marking

Insert label - PABA WH/15 - 1013151



Insert label, Strip, white, Unlabeled, Can be labeled with: Plotter, Mounting type: Thread on, Cable diameter: 0.6-50 mm, Lettering field: 15 x 4 mm

Insert label - PABA YE/15 - 1013698



Insert label, Strip, yellow, Unlabeled, Can be labeled with: Plotter, Mounting type: Thread on, Cable diameter: 0.6-50 mm, Lettering field: 15 x 4 mm

Insert label - PABA RD/15 - 1013944



Insert label, Strip, red, Unlabeled, Can be labeled with: Plotter, Mounting type: Thread on, Cable diameter: 0.6-50 mm, Lettering field: 15 x 4 mm

## Sensor/Actuator cable - SAC-4P-M8MR/0,5-542/M8FS SH BK - 1406009

### Accessories

Conductor marker carrier - PATO 2/15 - 1013122



Conductor marker carrier, transparent, Unlabeled, Mounting type: Clip on, Cable diameter: 2.8-4.4 mm, Lettering field: 4 x 15 mm

Conductor marker carrier - PATO 3/15 - 1013135



Conductor marker carrier, transparent, Unlabeled, Mounting type: Clip on, Cable diameter: 4.4-6.7 mm, Lettering field: 4 x 15 mm

Conductor marker carrier - PATO 4/15 - 1013148



Conductor marker carrier, transparent, Unlabeled, Mounting type: Clip on, Cable diameter: 6.7-10 mm, Lettering field: 4 x 15 mm

Marker pen - B-STIFT - 1051993



Marker pen, for manual labeling of unprinted Zack strips, smear-proof and waterproof, line thickness 0.5 mm

### Protection and sealing elements

Sealing cap - PROT-M 8 FS-PA-CHAIN - 1430857

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



# Sensor/Actuator cable - SAC-4P-M8MR/0,5-542/M8FS SH BK - 1406009

## Accessories

Screw plug - PROT-M 8 MS-PA-CHAIN - 1430860

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



## Tools

Torque screwdriver - TSD 02 SAC - 1208487



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

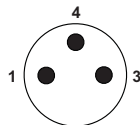
Tool - SAC BIT M8-D10 - 1208461



Nut for assembling sensor/actuator cables with M8 connector and for M8 connectors with QUICKON fast connection technology, for 4 mm hexagonal drive

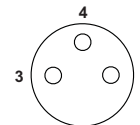
## Drawings

Schematic diagram



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

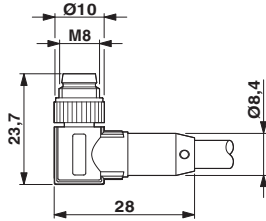
Schematic diagram



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

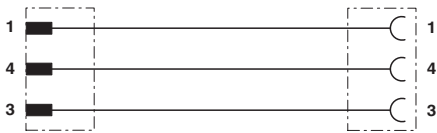
# Sensor/Actuator cable - SAC-4P-M8MR/0,5-542/M8FS SH BK - 1406009

Dimensioned drawing



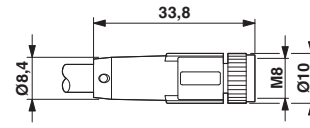
Plug M8 x 1, angled, shielded

Circuit diagram



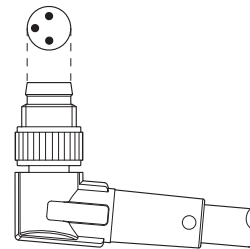
Contact assignment of M8 plugs/sockets

Dimensioned drawing



Socket M8 x 1, straight, shielded

Schematic diagram



Layout of connector pin assignments