

SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable



1400771
<https://www.phoenixcontact.com/it/products/1400771>

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 halogen-free, Plug straight M12, coding: A, with 1 LED, connected with Z diode, on Valve connector A, with 1 LED, connected with Z diode, cable length: 3 m

Commercial data

Item number	1400771
Packing unit	1 pc
Minimum order quantity	1 pc
Sales key	BF1
Product key	BF1DJA
GTIN	4046356509534
Weight per piece (including packing)	126.466 g
Weight per piece (excluding packing)	116.8 g
Customs tariff number	85444290
Country of origin	PL

SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable



1400771

<https://www.phoenixcontact.com/it/products/1400771>

Technical data

Product properties

Product type	Sensor/actuator cable with valve connector
Number of positions	3
No. of cable outlets	1
Shielded	no
Coding	A

Insulation characteristics

Overvoltage category	III
Degree of pollution	3

Material specifications

Flammability rating according to UL 94	HB
Seal material	TPU
Material housing valve plug	TPU
Material of grip body	TPU
Contact material	CuSn
Contact surface material	Ni/Au
Contact carrier material	TPU GF
Contact material	CuSn
Valve plug contact insert material	PA 6.6
Contact surface material	Sn
Material for screw connection	Zinc die-cast, nickel-plated

Electrical properties

Contact resistance	$\leq 5 \text{ m}\Omega$
Insulation resistance	$\geq 100 \text{ M}\Omega$
Nominal voltage U_N	24 V AC
	24 V DC
Nominal current I_N	4 A
Protective circuit	Z diode

Mechanical properties

Mechanical data

Insertion/withdrawal cycles	≥ 100
-----------------------------	------------

Signaling

Status display	1 LED
Status display present	Yes

Connector

SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable



1400771

<https://www.phoenixcontact.com/it/products/1400771>

Connection 1

Type	Plug straight M12
Number of positions	3
Coding type	A

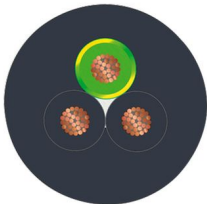
Connection 2

Type	Valve connector A
Number of positions	3
Material	CuSn (Contact)
	Sn (Contact surface)
	PA 6.6 (Contact carriers)
	TPU (Housing)

Cable/line

Cable length	3 m
--------------	-----

PUR halogen-free black [PUR]

Dimensional drawing	
Cable weight	30 kg/km
UL AWM Style	20549
Number of positions	3
Shielded	no
Cable type	PUR halogen-free black [PUR]
Conductor structure signal line	28x 0.15 mm
AWG signal line	20
Conductor cross section	3x 0.5 mm ²
Wire diameter incl. insulation	1.5 mm ±0.05 mm (Signal line)
External cable diameter	4.5 mm ±0.2 mm
Outer sheath, material	PUR
External sheath, color	black-gray RAL 7021
Conductor material	Bare Cu litz wires
Material wire insulation	PP
Single wire, color	black 1, black 2, green/yellow
Overall twist	3 wires, twisted
Max. conductor resistance	39 Ω/km (at 20 °C)
Insulation resistance	min. 20 MΩ*km
Nominal voltage, cable	≤ 300 V

SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable



1400771

<https://www.phoenixcontact.com/it/products/1400771>

Test voltage	≥ 1200 V
Minimum bending radius, fixed installation	5 x D
Minimum bending radius, flexible installation	10 x D
Smallest bending radius, fixed installation	22.5 mm
Smallest bending radius, movable installation	45 mm
Max. bending cycles	15000000
Halogen-free	in accordance with DIN VDE 0472 part 815
Flame resistance	according to DIN VDE 0482
	According to DIN EN 50265-2-1
Resistance to oil	in accordance with DIN EN 60811-2-1
Other resistance	largely oil-resistant
	partly UV-resistant (in accordance with DIN EN ISO 4892-2-A)
Ambient temperature (operation)	-40 °C ... 80 °C (cable, fixed installation)
	-20 °C ... 80 °C (Cable, flexible installation)

Environmental and real-life conditions

Ambient conditions

Degree of protection	IP65
	IP67
Ambient temperature (operation)	-25 °C ... 90 °C (Plug / socket)
	-20 °C ... 85 °C (valve plug)
	-40 °C ... 80 °C (cable, fixed installation)
	-15 °C ... 80 °C (Cable, flexible installation)

SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable

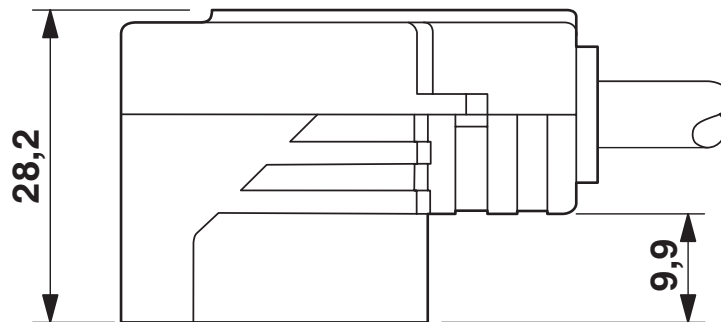


1400771

<https://www.phoenixcontact.com/it/products/1400771>

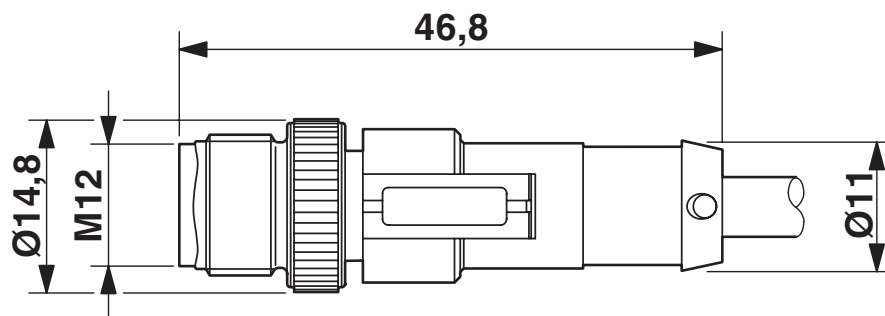
Drawings

Dimensional drawing



Valve connector, type A, side view

Dimensional drawing



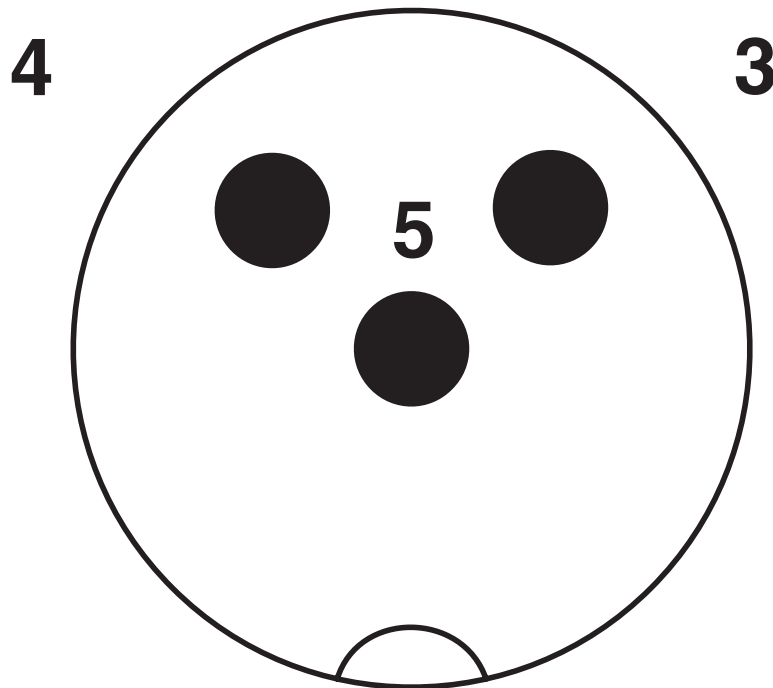
Plug, M12 x 1, straight, shielded

SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable

1400771

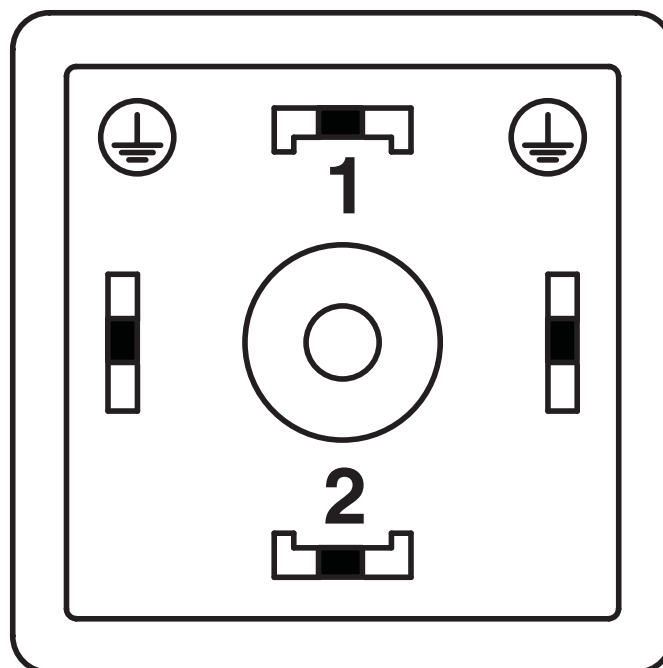
<https://www.phoenixcontact.com/it/products/1400771>

Schematic diagram



Pin assignment M12 plug, 3-pos., valve connector

Schematic diagram



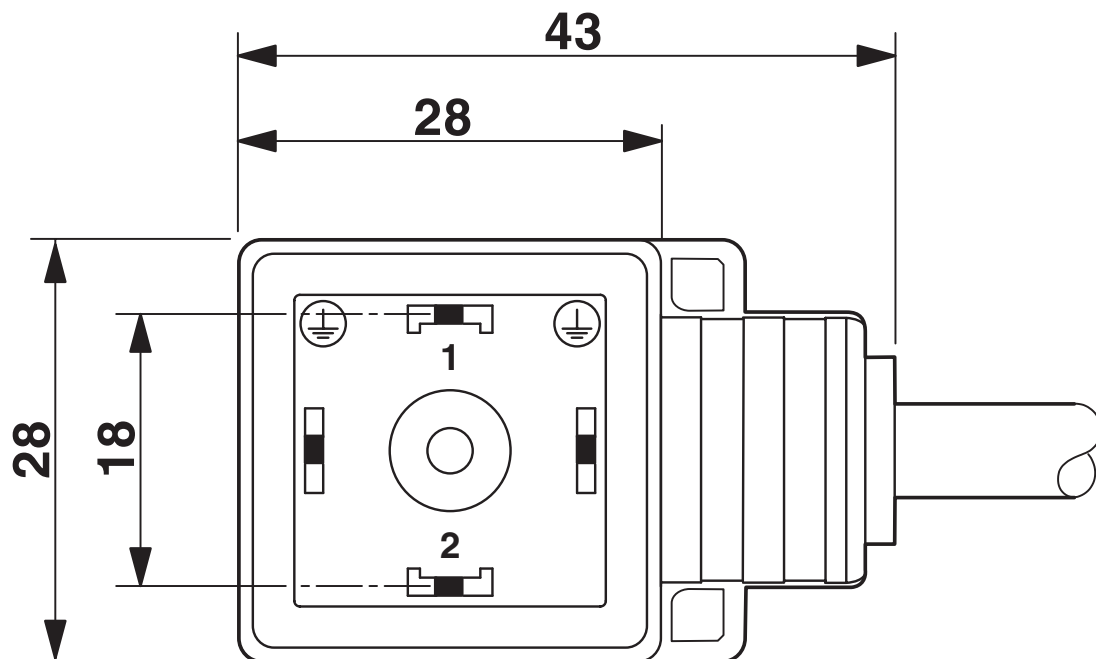
Valve connector pin assignment, type A

SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable

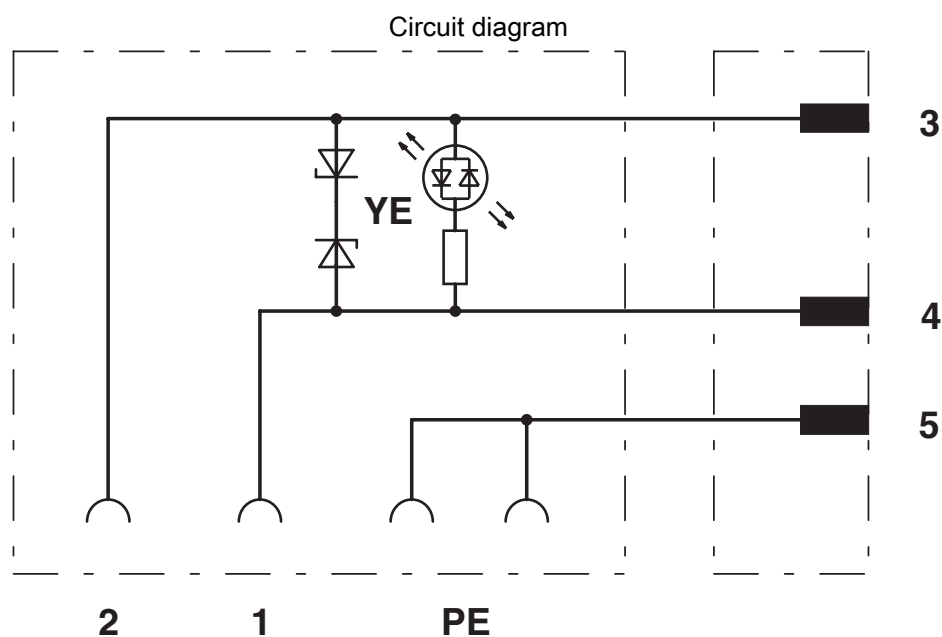
1400771

<https://www.phoenixcontact.com/it/products/1400771>

Dimensional drawing



Valve connector, type A



SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable



1400771
<https://www.phoenixcontact.com/it/products/1400771>

Approvals

To download certificates, visit the product detail page: <https://www.phoenixcontact.com/it/products/1400771>

 CSA Approval ID: 13631				
	Nominal voltage U_N	Nominal current I_N	Cross section AWG	Cross section mm^2
	24 V	4 A	-	-

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

 CSAus Approval ID: 13631				
	Nominal voltage U_N	Nominal current I_N	Cross section AWG	Cross section mm^2
	24 V	4 A	-	-

cCSAus				
---------------	--	--	--	--

SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable



1400771
<https://www.phoenixcontact.com/it/products/1400771>

Classifications

ECLASS

ECLASS-11.0	27060312
ECLASS-12.0	27060312
ECLASS-13.0	27060312

ETIM

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

UNSPSC

UNSPSC 21.0	31251500
-------------	----------

SAC-3P-M12MS/3,0-PUR/A-1L-Z - Sensor/actuator cable



1400771
<https://www.phoenixcontact.com/lt/products/1400771>

Environmental product compliance

China RoHS	Environmentally Friendly Use Period = 50 years
	For information on hazardous substances, refer to the manufacturer's declaration available under "Downloads"

Phoenix Contact 2024 © - all rights reserved
<https://www.phoenixcontact.com>

Phoenix Contact UAB
Svitrigailos str. 11B
03228 Vilnius
+370 5 2106321
balticinfo@phoenixcontact.com