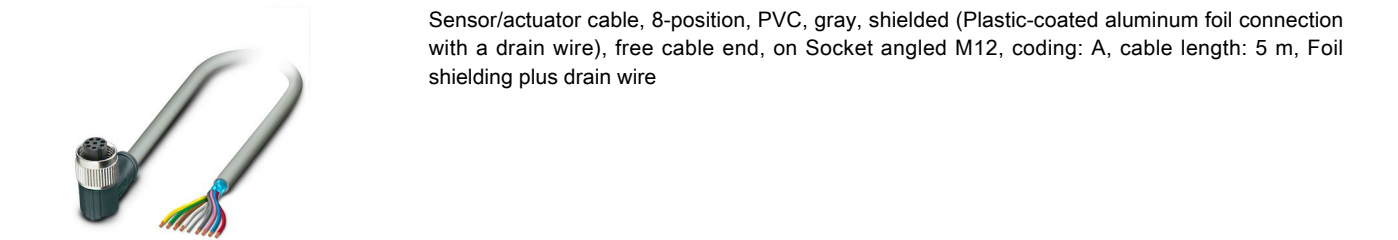


1095795
<https://www.phoenixcontact.com/us/products/1095795>

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.



Commercial data

Item number	1095795
Packing unit	1 pc
Note	Made to order (non-returnable)
Sales key	BF13
Product key	BF1IED
GTIN	4055626927466
Weight per piece (including packing)	22.22 g
Weight per piece (excluding packing)	22.22 g
Country of origin	US

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

Technical data

Product properties

Product type	Sensor/actuator cable
Number of positions	8
Application	Standard, U.S. cables
No. of cable outlets	1
Shielded	yes
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	CuZn
Contact surface material	Ni/Au
Contact carrier material	TPU GF
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	30 V AC
	30 V DC
Nominal current I_N	2 A
Protective circuit	unwired

Mechanical properties

Mechanical data

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

Signaling

Status display	No
Status display present	No

Connection data

Conductor connection

Tightening torque	0.4 Nm (M12 connector)
-------------------	------------------------

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

Connector

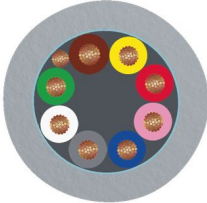
Connection 1

Type	free cable end
------	----------------

Connection 2

Type	Socket angled M12
Number of positions	8
Coding type	A

Cable/line

Cable length	5 m
Dimensional drawing	
Cable weight	47.37 kg/km
UL AWM Style	2517 (105 °C / 300 V)
Number of positions	8
Shielded	yes
AWG signal line	24
Wire diameter incl. insulation	1.12 mm ±0.03 mm
External cable diameter	5.79 mm ±0.2 mm
Outer sheath, material	PVC
External sheath, color	gray
Conductor material	Tin-plated Cu litz wires
Material wire insulation	PVC (Signal line)
Single wire, color	white, brown, green, yellow, gray, pink, blue, red
Type of pair shielding	Plastic-coated aluminum foil, aluminum side inside
Overall twist	Conductors, fillers, and drain wire are twisted with left-hand lay
Max. conductor resistance	max. 80.2 Ω/km (20 °C)
Insulation resistance	≥ (550 M Ohms/m @ 500V)
Nominal voltage, cable	300 V
Minimum bending radius, flexible installation	8 x D
Smallest bending radius, movable installation	47 mm
Flame resistance	FT4
Other resistance	UV resistant
Ambient temperature (operation)	-30 °C ... 105 °C (cable, fixed installation)

Environmental and real-life conditions

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

Ambient conditions

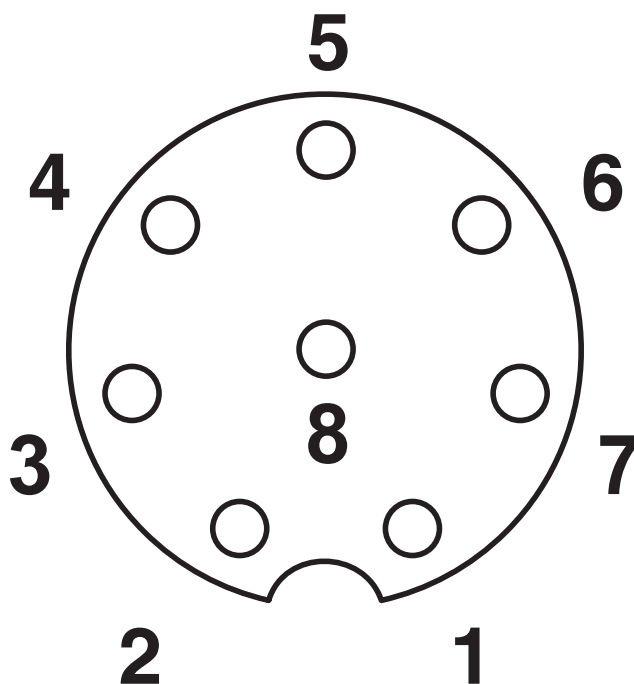
Degree of protection	IP65
	IP67
	IP68
Ambient temperature (operation)	-25 °C ... 90 °C (Plug / socket)
	-40 °C ... 80 °C (cable, fixed installation)
	-5 °C ... 80 °C (Cable, flexible installation)

Standards and regulations

Standard designation	M12 connector
Standards/specifications	IEC 61076-2-101

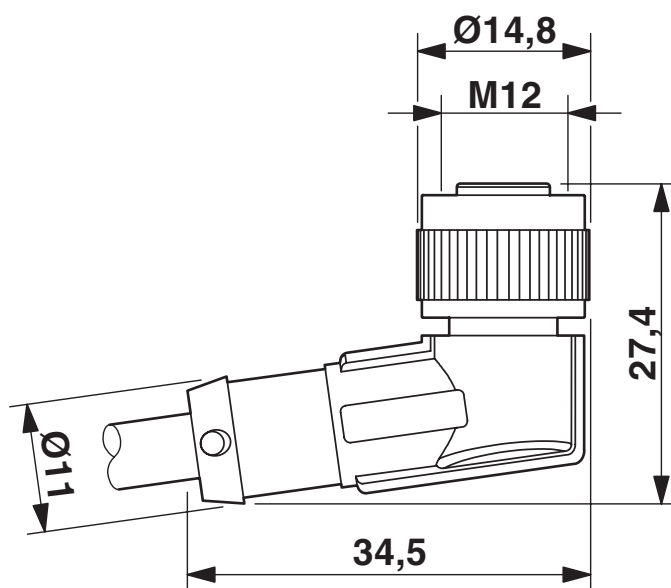
Drawings

Schematic diagram



Pin assignment M12 socket, 8-pos., A-coded, view female side

Dimensional drawing



M12 x 1 socket, angled

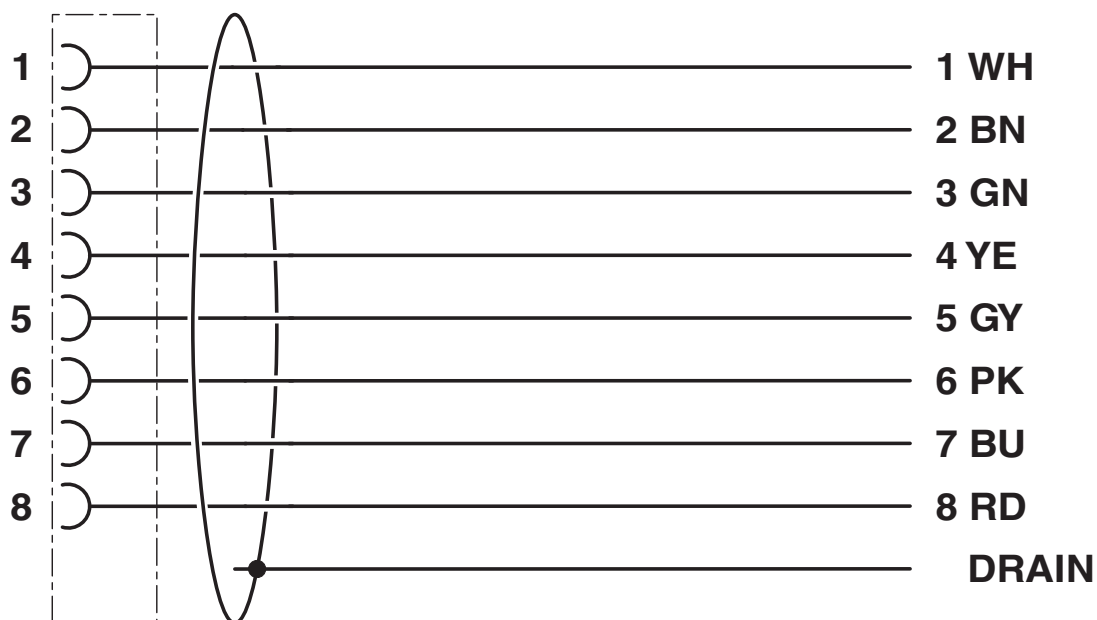
SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable

1095795

<https://www.phoenixcontact.com/us/products/1095795>



Circuit diagram



SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

Approvals

To download certificates, visit the product detail page: <https://www.phoenixcontact.com/us/products/1095795>

	UL Listed			
	Approval ID: FILE E 221474			
		Nominal voltage U _N	Nominal current I _N	Cross section AWG
		30 V	2 A	-
				Cross section mm ²
				-

	cUL Listed			
	Approval ID: FILE E 221474			
		Nominal voltage U _N	Nominal current I _N	Cross section AWG
		30 V	2 A	-
				Cross section mm ²
				-

cULus Listed

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

Classifications

ECLASS

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

ETIM

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

UNSPSC

UNSPSC 21.0	31251501
-------------	----------

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

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"

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

Accessories

PROT-M12 FS-PA-CHAIN - Sealing cap

1430873

<https://www.phoenixcontact.com/us/products/1430873>

M12 sealing cap made of plastic with fixing band, for sensor cables, for free M12 plugs



SAC-M12-EXCLIP-M - Locking clip

1558988

<https://www.phoenixcontact.com/us/products/1558988>

Locking clip for the pin side of sensor/actuator cables with M12 connector and M12 connectors for assembly, for knurl diameter: 15 mm or for Allen key with a wrench size of 14 mm, prevents the disconnection of plug-in connections without tools



SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

UCT-WMT (23X4) - Conductor marker

0801453

<https://www.phoenixcontact.com/us/products/0801453>



Conductor marker, Sheet, white, unlabeled, can be labeled with: TOPMARK NEO, TOPMARK LASER, BLUEMARK ID COLOR, BLUEMARK ID, BLUEMARK CLED, THERMOMARK PRIME, THERMOMARK CARD 2.0, THERMOMARK CARD, mounting type: insert, cable diameter range: 1.5 ... 35 mm, lettering field size: 23 x 4 mm, Number of individual labels: 30

UC-WMT (23X4) - Conductor marker

0819411

<https://www.phoenixcontact.com/us/products/0819411>



Conductor marker, Sheet, white, unlabeled, can be labeled with: BLUEMARK ID COLOR, BLUEMARK ID, BLUEMARK CLED, PLOTMARK, CMS-P1-PLOTTER, mounting type: insert, cable diameter range: 1.5 ... 35 mm, lettering field size: 23 x 4 mm, Number of individual labels: 24

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

US-WMT (23X4) - Cable marker

0828769

<https://www.phoenixcontact.com/us/products/0828769>



Cable marker, Card, white, unlabeled, can be labeled with: BLUEMARK ID COLOR, BLUEMARK ID, THERMOMARK PRIME, THERMOMARK CARD 2.0, THERMOMARK CARD, mounting type: slide-on, cable diameter range: 1.5 ... 35 mm, lettering field size: 23 x 4 mm, Number of individual labels: 56

WMTW (23X4)R - Cable marker

0831004

<https://www.phoenixcontact.com/us/products/0831004>



Cable marker, Roll, white, unlabeled, can be labeled with: THERMOMARK E.300 (D)/600 (D), THERMOMARK ROLL 2.0, THERMOMARK ROLL, THERMOMARK ROLL X1, THERMOMARK ROLLMaster 300/600, THERMOMARK X1.2, mounting type: insert, cable diameter range: 1.5 ... 35 mm, lettering field size: 23 x 4 mm, Number of individual labels: 3000

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

PROT-M12 MS-PA-CHAIN - Screw plug

1430899

<https://www.phoenixcontact.com/us/products/1430899>

M12 sealing cap with fixing band, for sensor cables, for free M12 sockets



SAC-M12-EXCLIP-F - Locking clip

1558991

<https://www.phoenixcontact.com/us/products/1558991>

Locking clip for the socket side of sensor/actuator cables with M12 connector and M12 connectors for assembly, for knurl diameter: 15 mm or for Allen key with a wrench size of 14 mm, prevents the disconnection of plug-in connections without tools



SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

B-STIFT - Marker pen

1051993

<https://www.phoenixcontact.com/us/products/1051993>



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

TSD 04 SAC - Torque screwdriver

1208429

<https://www.phoenixcontact.com/us/products/1208429>



Torque screwdriver, with preset torque of 0.4 Nm and 4 mm hexagonal drive for M12 connectors

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

TSD-M 1,2NM - Torque screwdriver

1212224

<https://www.phoenixcontact.com/us/products/1212224>



Torque screw driver, accuracy as per EN ISO 6789 standard, adjustable from 0.3 - 1.2 Nm

TSD-M SAC-BIT ADAPTER - Adapter insert

1212600

<https://www.phoenixcontact.com/us/products/1212600>



Adapter bit for TSD-M...torque tools, E6.3-1/4" drive with 4 mm hexagon to accommodate SAC bits

SAC-8P- 5,0-680/M12FR FDN - Sensor/actuator cable



1095795

<https://www.phoenixcontact.com/us/products/1095795>

SAC BIT M12-D15 - Tool

1208432

<https://www.phoenixcontact.com/us/products/1208432>



Nut for assembling sensor/actuator cables with M12 connector and M12 connectors for assembly, with a knurl diameter of 15 mm, for 4 mm hexagonal drive

Phoenix Contact 2024 © - 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