

1424656

https://www.phoenixcontact.com/in/products/1424656

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.

Connector, Universal, 4-position, unshielded, Socket angled M12, A, Push-lock spring connection, knurl material: Zinc die-cast, nickel-plated, external cable diameter 4 mm ... 8 mm



## Your advantages

- Time-saving Push-Lock connection: Tool-free connection and disconnection of conductors by opening the contact levers
- · Intuitive connection: Easy assignment of individual litz wires with color-coded and numerical identification of the contact levers
- · Integrated Push-in Technology: Wire rigid and pretreated conductors easily by means of simple, direct insertion
- Shock- and vibration-resistant connection: Proven spring-cage technology guarantees secure and reliable contacting
- · Flexible cable outlets with angled connectors

#### **Commercial Data**

| Item number                          | 1424656            |
|--------------------------------------|--------------------|
| Packing unit                         | 1 pc               |
| Minimum order quantity               | 1 pc               |
| Sales Key                            | BF2                |
| Product Key                          | BF2CEA             |
| Catalog Page                         | Page 19 (C-2-2019) |
| GTIN                                 | 4055626375830      |
| Weight per Piece (including packing) | 28 g               |
| Weight per Piece (excluding packing) | 26.1 g             |
| Customs tariff number                | 85366990           |
| Country of origin                    | DE                 |



https://www.phoenixcontact.com/in/products/1424656



## **Technical Data**

#### Notes

| Assembly instruction: | NOTE: Observe the permissible bending radii when laying   |
|-----------------------|---|
|                       | conductors, since the degree of protection may be put in jeopardy if the bending forces are too high. Alleviate mechanical loads upstream of the connector, e.g. by using cable ties. |

## Mounting

| Assembly instructions | The connector pin assignment can be rotated 45° to the cable outlet |
|-----------------------|---|
|                       | The wires can be connected both with ferrules and without ferrules  |
| Connection method     | Push-lock spring connection   |

## Product properties

| Product type         | Circular connector (cable-side) |
|----------------------|---------------------------------|
| Number of positions  | 4                               |
| Sensor type          | Universal                       |
| No. of cable outlets | 1                               |
| Shielded             | no                              |
| Coding               | A                               |
| Cable outlet         | angled                          |
|                      |                                 |

### Insulation characteristics

| Overvoltage category | II |
|----------------------|----|
| Degree of pollution  | 3  |

#### **Dimensions**

| Dimensional drawing     | 019       |
|-------------------------|-----------|
| Length                  | 49 mm     |
| External dimensions     |           |
| Outside diameter        | 4 mm 8 mm |
| Housing                 |           |
| Diameter housing        | 19 mm     |
| Material specifications |           |
| Color Handle area       | black     |



https://www.phoenixcontact.com/in/products/1424656



| Material                               | PBT   |
|--|---|
|  | PA 6  |
| Flammability rating according to UL 94 | V0  |
| Seal material                          | NBR   |
| Material of grip body                  | PA 6.6  |
| Contact material                       | CuSn  |
| Contact surface material               | Ni/Au   |
| Contact carrier material               | PA 6.6  |
| Material for screw connection          | Zinc die-cast, nickel-plated  |
| Standards/regulations                  | PA 6.6: Fire protection in rail vehicles - requirement sets R22, R23, R24, and R26 acc. to DIN EN 45545-2 (Risk level HL1 - HL3)        |
|  | PA 6: Fire protection in rail vehicles - requirement sets R22, R23, and R24 acc. to DIN EN 45545-2 (Risk level HL1 - HL3)               |
|  | PBT: Fire protection in rail vehicles - requirement sets R22, R23, R24, and R26 acc. to DIN EN 45545-2 (Risk level HL1 - HL2, R26: HL3) |

#### Connection data

#### Conductor connection

| Connection method   | Push-lock spring connection                                 |
|---|---|
| Connection cross section                                  | 0.14 mm <sup>2</sup> 0.75 mm <sup>2</sup> (without ferrule) |
|   | 0.08 mm <sup>2</sup> 0.5 mm <sup>2</sup> (with ferrule)     |
|   | 0.14 mm <sup>2</sup> 0.75 mm <sup>2</sup> (solid)           |
| Connection cross section AWG                              | 26 18 (without ferrule)                                     |
|   | 28 20 (with ferrule)  |
| Stripping length of the individual wire                   | 7 mm  |
| Tightening torque   | 0.4 Nm (M12 knurl)  |
|   | 0.4 Nm (Connector with coupling sleeve)                     |
|   | 1.5 Nm (Pressure nut with coupling sleeve)                  |
| Pin assignment  |   |
| Contact   Color (signal designation)   Contact (optional) | 1 = BN  |
|   | 2 = WH  |
|   | 3 = BU  |
|   | 4 = BK  |
|   | T - DIX   |

## Electrical properties

| Min. AWG, flexible, multi-strand | 26                                       |
|----------------------------------|--|
| Rated surge voltage              | 2.5 kV                                   |
| Contact resistance               | ≤ 5 mΩ                                   |
| Insulation resistance            | ≥ 100 MΩ                                 |
| Nominal voltage $U_N$            | 250 V AC                                 |
|                                  | 250 V DC                                 |
| Nominal current I <sub>N</sub>   | 4 A (2 A when using 0.14 mm² conductors) |



1424656

https://www.phoenixcontact.com/in/products/1424656

#### Mechanical properties

#### Mechanical data

#### Connector

#### Connection 1

| Head design       | Socket |
|-------------------|--------|
| Head cable outlet | angled |
| Head thread type  | M12    |
| Coding            | A      |

#### Cable/line

| Signal type/category                    | Universal |
|---|-----------|
| Stripping length of the individual wire | 7 mm      |

#### Environmental and real-life conditions

#### Ambient conditions

| Degree of protection            | IP65                         |
|---------------------------------|------------------------------|
|                                 | IP67                         |
| Ambient temperature (operation) | -40 °C 85 °C (Plug / socket) |

## Standards and regulations

## Testing

| Standards/regulations    | PA 6.6: Fire protection in rail vehicles - requirement sets R22, R23, R24, and R26 acc. to DIN EN 45545-2 (Risk level HL1 - HL3)        |
|--------------------------|---|
|                          | PA 6: Fire protection in rail vehicles - requirement sets R22, R23, and R24 acc. to DIN EN 45545-2 (Risk level HL1 - HL3)               |
|                          | PBT: Fire protection in rail vehicles - requirement sets R22, R23, R24, and R26 acc. to DIN EN 45545-2 (Risk level HL1 - HL2, R26: HL3) |
| M12                      |   |
| Standards/specifications | IEC 61076-2-101   |
| Standards/specifications | EN 50155:2001   |

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

PHOENIX CONTACT (I) Pvt. Ltd. A-58/2, Okhla Industrial Area, Phase - II, New Delhi-110 020

+91.1275.71420 info@phoenixcontact.co.in