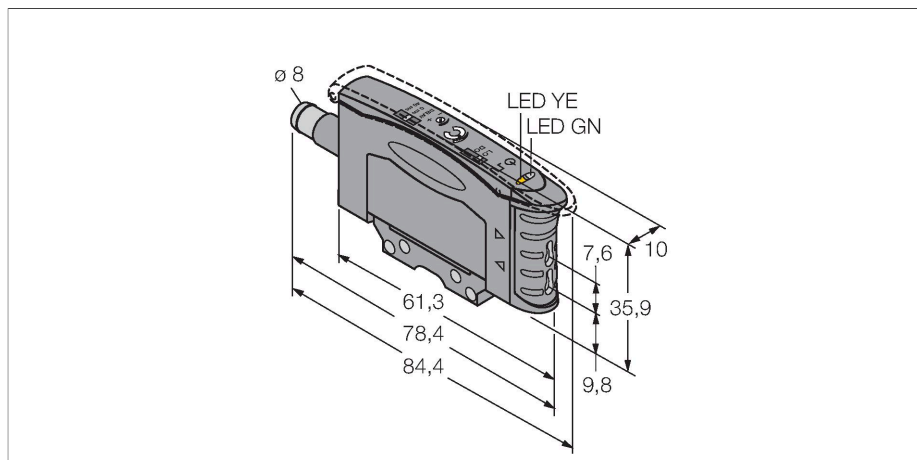


# D10AFPQ

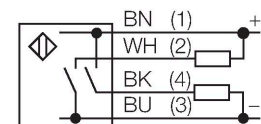
## Photoelectric Sensor – Photoelectric Sensor for Plastic Fibers



### Features

- Male 8 mm, 4-pin, snap-lock
- Light/dark operation
- Red visible light
- Operating voltage 10...30 VDC
- Switch-off delay 40 ms, selectable
- Max. switching frequency 1 kHz
- Sensitivity adjusted via 12-turn potentiometer

### Wiring diagram



### Technical data

|                              |   |
|------------------------------|---|
| Type                         | D10AFPQ                                 |
| ID no.                       | 3072809                                 |
| <b>Optical data</b>          |   |
| Function                     | Photoelectric sensor for plastic fibers |
| Fiber-optic type             | plastic                                 |
| Light type                   | Red                                     |
| Wavelength                   | 660 nm                                  |
| <b>Electrical data</b>       |   |
| Operating voltage            | 10...30 VDC                             |
| Residual ripple              | < 10 % $U_{ss}$                         |
| DC rated operational current | ≤ 100 mA                                |
| No-load current              | ≤ 25 mA                                 |
| Short-circuit protection     | yes                                     |
| Reverse polarity protection  | yes                                     |
| Output function              | NO contact, PNP/NPN                     |
| Switching frequency          | 1 kHz                                   |
| Readiness delay              | ≤ 100 ms                                |
| Response time typical        | < 0.5 ms                                |
| Setting option               | Potentiometer                           |
| <b>Mechanical data</b>       |   |
| Design                       | Rectangular, D10A                       |
| Dimensions                   | 84.4 x 10 x 35.9 mm                     |
| Housing material             | Plastic, Thermoplastic material, Black  |
| Electrical connection        | Connectors, M8 × 1, PVC                 |
| Number of cores              | 4                                       |
| Ambient temperature          | -20...+55 °C                            |
| Relative humidity            | 0...90 %                                |

### Functional principle

Glass or fibre optic sensors are the optimum choice for high temperature or space restricted applications. Fibre optics transfer the light from the sensor to a remote object. Individual fibre optics are used for opposed mode sensing, whereas bifurcated fibre optics are suited for diffuse mode operation.

## Technical data

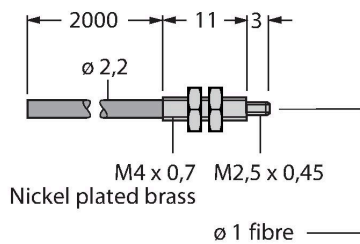
|                        |                                    |
|------------------------|------------------------------------|
| Protection class       | IP50                               |
| Special features       | keep/defer<br>Crosstalk protection |
| Power-on indication    | LED, Green                         |
| Switching state        | LED, Yellow                        |
| Excess gain indication | LED, yellow, flashing              |
| <b>Tests/approvals</b> |                                    |
| Approvals              | CE, cURus                          |

## Accessories

|            |  |            |   |
|------------|--|------------|---|
| SMBR55F01  | 3067104  | SMBR55FRA  | 3058809   |
|            | Mounting panel, PBT, black, for R55F series, wall mounting |            | Mounting bracket, 19-ga. stainless steel, for D10, DF-G1 and R55F series, lateral wall mounting |
| DIN-35-70  | 3026604  | DIN-35-105 | 3030470   |
|            | DIN rail, width 35 mm, length 70 mm                        |            | DIN rail, width 35 mm, length 105 mm  |
| DIN-35-140 | 3026605  |            |   |
|            | DIN rail, width 35 mm, length 140 mm                       |            |   |

## Accessories

| Dimension drawing | Type   | ID no.  |   |
|-------------------|--------|---------|---|
|                   | PIT46U | 3026034 | Plastic fiber-optic sensor, operating mode: Opposed mode, threaded sleeve M3 x 0.5 mm, field wireable wire without end tip, polyethylene sheath, ambient temperatures -30 °C...+70 °C |



| Dimension drawing | Type   | ID no.  |  |
|-------------------|--------|---------|--|
|                   | PBT46U | 3025967 | Plastic fiber-optic sensor, operating mode: Diffuse mode, threaded sleeve M3 x 0.75 mm, field wireable wire without end tip, polyethylene sheath, ambient temperatures -30 °C...+70 °C |

