



- ◆ The infrared spark sensor is used for the detection of sparks and flames in closed, potentially explosive area systems
- ◆ The maximum of spectral sensitivity is at approx. 830 nm
- ◆ **Well suited for detecting:**
Sparks/flames with a temperature > 800°C
- ◆ **Caution! False tripping possible:**
The spark sensor is suitable for installation in parts of the system where it is dark and where no parts, where it is dark and where no extraneous light is expected. Daylight also has infrared portions, whose influence can also get a response from spark sensors.
- ◆ **Typical Examples:**
In electronic spark extinguishing units for early detection of fire or explosions. Everywhere that flammable or smoldering materials are transported mechanically or pneumatically and a risk of fire or explosion exists.

Technical data:

| Infrared spark sensor IR-01.1ex | | | |
|---------------------------------|--|---|--|
| Operating voltage | 12...30 VDC | Dimensions | Ø: 42mm l=127 mm |
| Operating current at 24V | < 100 µA | | |
| Alarm current at 24VDC | 45mA | | |
| Alarm resistor | 560Ω | | |
| Alarm pulse without latching | approx. 0,3 s | | |
| Trigger delay | < 1ms | Weight without cable | 850g |
| Spectral sensitivity | approx. 700...1000 | Weight with cable | 2,600g |
| Range (spark temperature 800°C) | IR-01.1ex: 500mm | Sensitivity (set with sparks with a temperature of approx. 800°C) | IR-01.1ex: 500mm IR-01.1exS: 1000mm |
| | IR-01.1exS: 1000mm | | |
| Viewing angle | approx. 75° | | |
| | | Options: | |
| Temperature range | -20...+70°C | potential free contact for Alarm | |
| Housing safety class | IP65 | | |
| Special features | - Metal housing pressure-tight encapsulated T80°C | | II 2G EEx d IIC T6 II 2D IP66 |

IR-01.1ex

