

Outdoor sensor Temperature

With external sensor probe for measuring temperature in outdoor areas. Typical applications at cold stores, greenhouses, production plants and warehouses. NEMA 4X / IP65 rated enclosure.


Type Overview

| Type | Output signal passive temperature | Additional features |
|-----------|-----------------------------------|---------------------|
| 01UT-1A0X | Pt100 | External sensor |
| 01UT-1B0X | Pt1000 | External sensor |

Technical Data

| | | |
|------------------------|-----------------------------------|---|
| Electrical data | Electrical connection | Pluggable spring loaded terminal block max. 2.5 mm ² |
| | Cable entry | Cable gland with strain relief Ø6...8 mm |
| Functional data | Application | Air |
| | Output signal passive temperature | Pt100 Pt1000 |
| Measuring data | Measured values | Temperature |
| | Measuring range temperature | -35...50°C [-30...120°F] |
| | Accuracy temperature passive | Class B, ±0.3°C @ 0°C [±0.5°F @ 32° F] |
| | Measuring current | Pt100: <1 mA @ 0°C [32°F] Pt1000: <0.3 mA @ 0°C [32°F] |
| | Time constant τ (63%) in the room | Typical 420 s |
| | | |
| Materials | Cable gland | PA6, white |
| | Mounting plate | PC, grey RAL7001 |
| | Housing | Cover: PC, white Bottom: PC, white Seal: NBR70, black UV resistant |
| Safety data | Ambient humidity | Max. 95% RH, non-condensing |
| | Ambient temperature | -35...50°C [-30...120°F] |
| | Fluid temperature | -35...50°C [-30...120°F] |
| | Housing surface temperature | Max. 70°C [160°F] |
| | Protection class IEC/EN | III, Protective Extra-Low Voltage (PELV) |
| | Power source UL | Class 2 Supply |
| | EU Conformity | CE Marking |
| | Certification IEC/EN | IEC/EN 60730-1 |
| | Degree of protection IEC/EN | IP65 |
| | Degree of protection NEMA/UL | NEMA 4X |
| | Enclosure | UL Enclosure Type 4X |
| | Quality Standard | ISO 9001 |
| | Mode of operation | Type 1 |
| | Pollution degree | 3 |

| | | |
|--------------------|------------------------------|-------------------------------|
| Safety data | Rated impulse voltage supply | 0.8 kV |
| | Construction | Independently mounted control |

Safety notes


This device has been designed for use in stationary heating, ventilation and air-conditioning systems and must not be used outside the specified field of application. Unauthorised modifications are prohibited. The product must not be used in relation with any equipment that in case of a failure may threaten humans, animals or assets.

Ensure all power is disconnected before installing. Do not connect to live/operating equipment.

Only authorised specialists may carry out installation. All applicable legal or institutional installation regulations must be complied during installation.

The device contains electrical and electronic components and must not be disposed of as household refuse. All locally valid regulations and requirements must be observed.

Remarks

General remarks concerning sensors Due to self-heating with 2 wire passive sensors, the supply wire current affects the measurement accuracy. So the supply current should not be higher than the measuring current values specified in this data sheet.

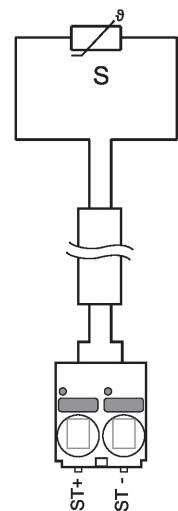
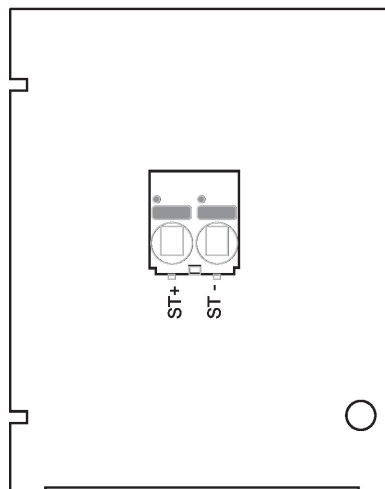
When using lengthy connecting cables (depending on the cross section used), the cable resistance must be taken into account. The lower the impedance of the sensor used, the greater the effect of the line resistance on the measurement, because it generates an offset.

Scope of delivery

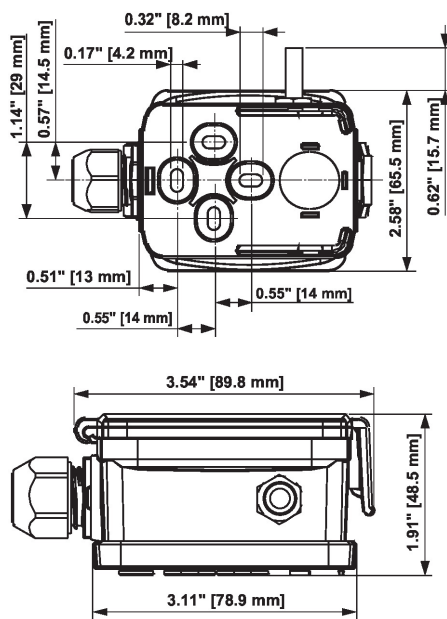
| Scope of delivery | Description | Type |
|-------------------|--------------------------|-----------|
| | Mounting plate S housing | A-22D-A09 |
| | Dowel | |
| | Screws | |

Accessories

| Optional accessories | Description | Type |
|----------------------|--|-------------|
| | Connection adapter, M20x1.5, for cable 1x6 mm, Multipack 10 pcs. | A-22G-A01.1 |

Wiring diagram


Dimensions



| Type | Probe length | Weight |
|-----------|--------------|---------|
| 01UT-1A0X | 25 mm | 0.12 kg |
| 01UT-1B0X | 25 mm | 0.12 kg |