# Sensor Datasheet 01CT-1..

Cable Temperature Sensor

For measuring the temperature in pipe and air applications. Incorporates a stainless steel probe and plenum rated cable.

## Type Overview

| Type | Output signal passive temperature | Probe length | Probe diameter |
|---|---|---|---|
| **01CT-1AH** | PT100 | 50 mm | 6 mm |
| **01CT-1BH** | PT1000 | 50 mm | 6 mm |
| **01CT-1CH** | Ni1000 | 50 mm | 6 mm |
| **01CT-1DH** | Ni1000TK5000 | 50 mm | 6 mm |
| **01CT-1LH** | NTC10k (10k2) | 50 mm | 6 mm |

## Technical Data

| | | |
|---|---|---|
| **Functional data** | Output signal passive temperature | PT100<br>PT1000<br>Ni1000<br>Ni1000TK5000<br>NTC10k (10k2) |
| | Media | Air |
| **Measuring data** | Measured values | Temperature |
| | Measuring range temperature | depending on used sensor |
| | Accuracy temperature | PT.. : Class B, ±0.3 °C @ 0 °C<br>Ni.. : ±0.4 °C @ 0 °C<br>NTC10k (10k2): ±0.22 °C @ 25 °C |
| **Safety data** | Ambient humidity | 85% r.h., non-condensing |
| | Ambient Temperature | -35...100 °C [-30...210 °F] |
| | Medium temperature | -35...100 °C [-30...210 °F] |
| | Protection class IEC/EN | III Protective extra-low voltage (PELV) |
| | Protection class UL | UL Class 2 Supply |
| | EU Conformity | CE Marking |
| | Certification IEC/EN | IEC/EN 60730-1 and IEC/EN 60730-2-9 |
| | Certification UL | pending |
| | Degree of protection IEC/EN | IP65 |
| | Degree of protection NEMA/UL | NEMA 4X |
| | Quality Standard | ISO 9001 |
| | Weight | 0.03 kg |

## Safety notes

The installation and assembly of electrical equipment should only be performed by authorized personnel.

The product should only be used for the intended application. Unauthorised modifications are prohibited! The product must not be used in relation with any equipment that in case of a failure may threaten, directly or indirectly, human health or life or result in danger to human beings, animals or assets. Ensure all power is disconnected before installing. Do not connect to live/operating equipment.

Please comply with
- Local laws, health & safety regulations, technical standards and regulations
- Condition of the device at the time of installation, to ensure safe installation
- This data sheet and installation manual

## Remarks

**General remarks concerning sensors**

Due to self-heating with 2 wire passive sensors, the supply wire current affects the measurement accuracy, so it should not exceed 1 mA.

When using lengthy connection wires (depending on the cross section used) the measuring result might be falsified due to a voltage drop at the common GND-wire (caused by the voltage current and the line resistance). In this case, 2 GND-wires must be wired to the sensor - one for supply voltage and one for the measuring current.

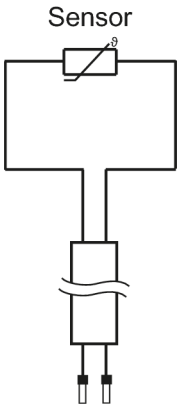
## Accessories

**Optional accessories**

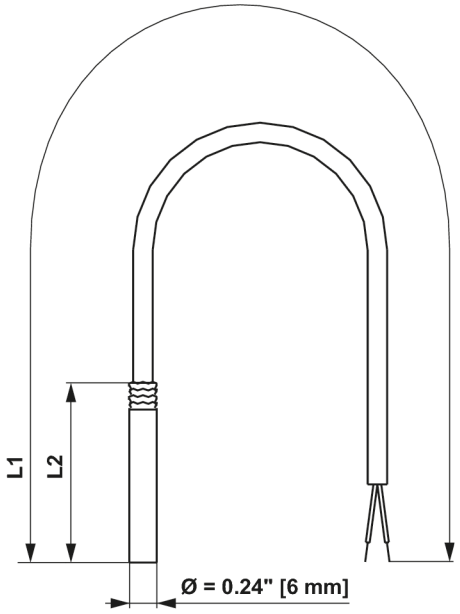
| Description | Type |
|---|---|
| Mounting flange 6 mm, Plastic (adjustable), up to max. 120 °C | A-22D-A03 |
| Mounting flange 6 mm, Brass, up to max. 260 °C | A-22D-A05 |

**For Immersion Application a Thermowell pocket A-22P-A.. is recommended.**

## Wiring diagram



## Dimensions




Hexagon pressed

L1: cable length
L2: pocket length

**L1 = 6.56 ft [2 m]**

**L2 = 2" [50 mm] / 4" [100 mm] / 8" [200 mm]**