

## TS-U/I-R Room temperature transmitter

### Features

- Indoor temperature measurement.
- Simple and secure installation
- Wide range of temperature probes
- 0...10V or 4...20mA measuring signals
- Compact size and modern design

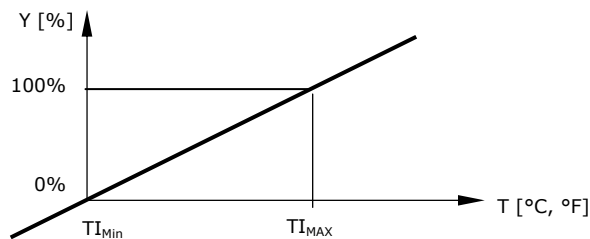
### Applications

- Indoor air temperature measurement for comfort control
- Frost protection sensor

### Temperature Transmitter

The room temperature transmitter measures the temperature by the use of a PT1000 sensing element. The transmitter analog output may be 0-10V or 4-20mA. And the transmitter include a noise filter. the power supply is large range VDC18V---VDC30V. Standard temperature measurement range is -30...70 °C.

linearity Signal output:



### Ordering

Ordering number: TS-U/I-R

-U indicates the transmitter signal out is 0-10V.

-I indicates the transmitter signal out is 4-20mA.

For example: TS-U-R

The duct temperature transmitter signal out is 0-10V.

### Installation

Mount the temperature sensor on a flat interior wall of the room to be controlled. Do not place near heat sources, draft channels. Do not expose to direct sunlight.

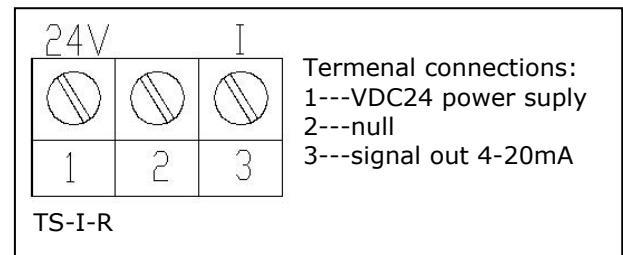
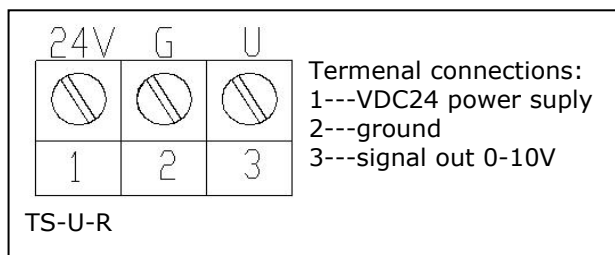
- When installing the unit, fix the base plate first, connect the electrical connections then hook on the cover and secure it.
- The end of the conduit at the sensor must be sealed to prevent false measurements due to draughts through the conduit.
- Connect the wires according to the wiring diagram to the measuring circuit in the cover:
  - If the transmitter signal out is 0-10V, it's need three terminal connections, DC24V, Ground and signal out.
  - If the transmitter signal out is 4-20mA, it's need two terminal connections, DC24V, Ground and signal out.
  - The connection signal cable should be shield wires.



### Technical Specification

Power supply	Option voltage	VDC18V---VDC30V
	Power Consumption	Max 2 VA
Signal outputs	-U type	0-10VDC
	-I type	4-20mA
	accuracy	0.5%
	Temperature range	-30----70°C
Sensing elements	Platinum-Film: Range Accuracy	PT, 0.3851ohm/k -30----70°C ±0.3k
Connection	Connection Terminals	2.5 mm <sup>2</sup>
Environment	Operation Climatic Conditions Temperature Humidity	To IEC 721-3-3 class 3 K5 -40...70°C <95% r.h.
	Transport & Storage Climatic Conditions Temperature Humidity Mechanical Conditions	To IEC 721-3-2 and IEC 721-3-1 class 3 K3 and class 1 K3 -40...80°C <95% r.h. class 2M2
Standards	CE conform according to EMC Standard 89/336/EEC EMEI Standard 73/23/EEC	EN 61 000-6-1/ EN 61 000-6-3
	Automatic electrical controls for household and similar use	EN 60 730 -1
	Special requirement on temperature dependent controls	EN 60 730 - 2 - 9
	Pollution Class	Normal acc. To EN 60 730,RoHS compliant
	Degree of Protection	IP56 to EN 60 529
	Safety Class	III (IEC 60536)
Housing Materials	Cover & Mounting Plate	Fire proof ABS plastic
General	Dimensions [mm]	Cover: 42 x 112 x 88 (H x W x D)
	Weight (including package)	135g

### Wire diagram



### dimension [mm]

