

Duct humidity temperature sensor Type A2G-70, air2guide^{T+H}

WIKA Datasheet A2G-70



Applications

- For measuring relative humidity and temperature of gaseous media in heating, cooling and air-conditioning systems
- Designed for PLC's and other control and display panels

Special features

- Easy installation
- Direct assembly into the process
- Compact and robust design
- Comes standard with mounting flange



Duct humidity temperature sensor air2guide^{T+H},
Type A2G-70

Description

Design standards

CE-conformity: 2004/108/EG Electromagnetic compatibility
Product Safety : 2001/95/EG Product Safety
EMC: EN 607301: 2002
Product Safety : EN 607301: 2002

Supply voltage

DC 15 ... 24 V / AC 24 V $\pm$ 10 %

Scale range / measuring range

Humidity: 0 ... 100 % rH
Temperature: -4 ... +176 °F

Power consumption

0.5 W / 1.7 VA

Transmitter outputs

Humidity: DC 0 ... 10 V, load: min. 5 kOhm
Temperature: DC 0 ... 10 V, load: min. 5 kOhm

Ingress protection

NEMA 4 (IP 65 per EN 60529 / IEC 592 (connecting head))

Accuracy

Humidity: $\pm$ 3 % between 20 ... 80 % rH
Temperature: $\pm$ 1.0 % between +41 ... +113 °F

Electrical connection

Screw connection M16 x 1.5 for wire with max. dia = 0.31"

The instrument is designed to operate with safety extra-low voltage (SELV). The transmitter must be operated at a constant operating voltage (± 0.2 V). Current/Voltage spikes from switching the power supply on or off must be prevented by the customer.

Insertion length L (standard)

5.51"

Other lengths on request

Operating Temperature

Ambient: -4 ... +158 °F

Sensor tip: max. +140 °F

Probe tube

PVC, black

Filter element

Stainless steel, mesh size 80 μ m

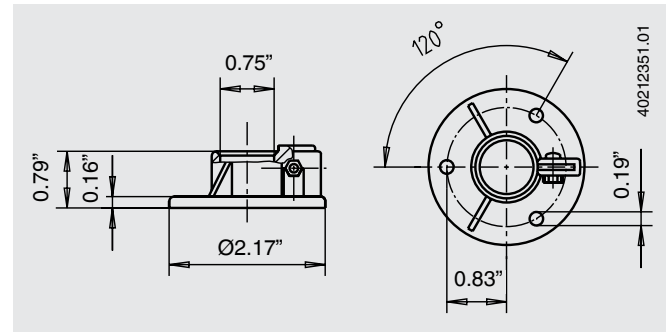
Connection head

PA6, white

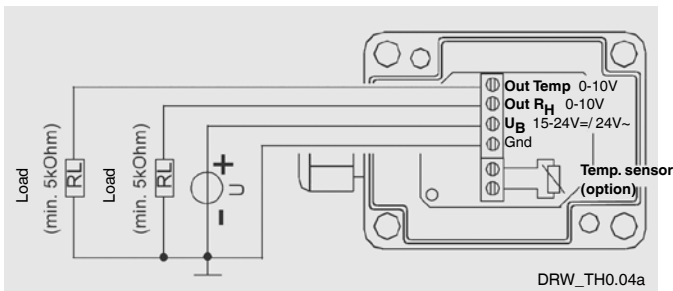
Mounting instructions

Max. air speed 10 m/s

Mounting flange MF19-PA



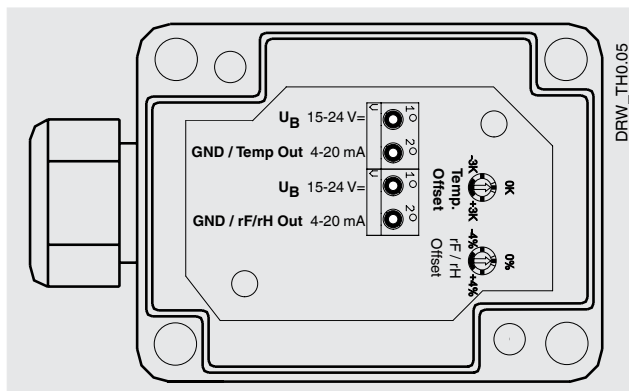
Wiring diagram for output 0 ... 10 V (standard)



Option

- Transmitter output 4 ... 20 mA
 - Humidity: 4 ... 20 mA, load <500 Ohm at DC 24 V
 - Temperature: 4 ... 20 mA, load <500 Ohm at DC 24 V

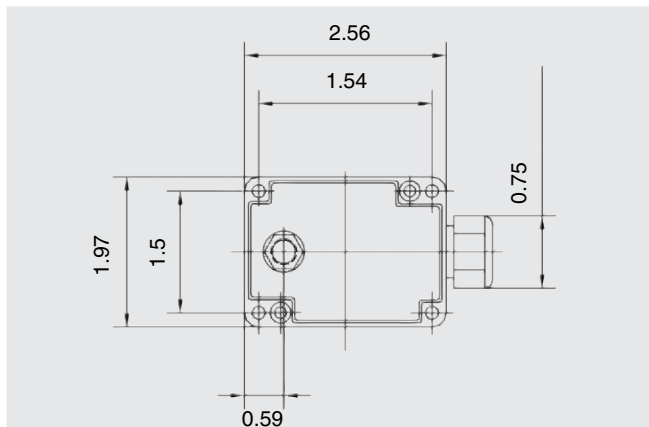
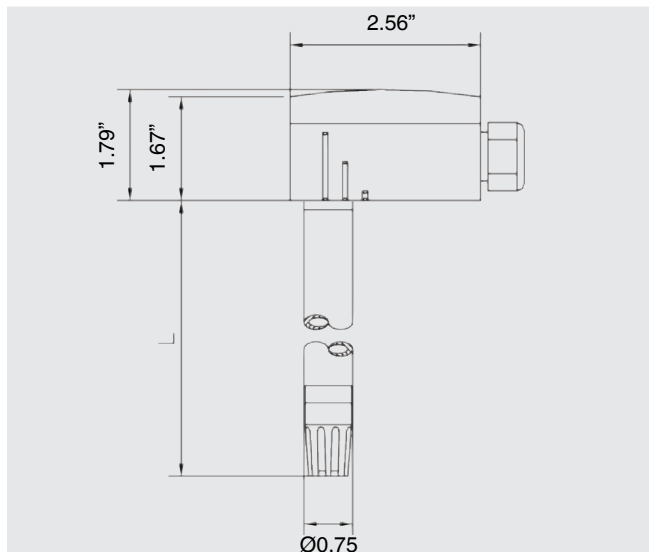
Wiring diagram for output 4 ... 20 mA (optional)



Note

If only the humidity output is used, "U_B 15-24 V= (Temp.)" has to be bridged to "U_B 15-24 V= (rF/rH)", and the temperature output "GND / Temp. Out 4-20 mA" has to be bridged to "GND" of the power supply..

Dimensions in inches



The specifications given in this document represent the state of engineering at the time of publishing.
We reserve the right to make modifications to the specifications and materials.



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