

ANEMOMETER (AND THERMOMETER)

THERMAL ANEMOMETER PROBES / IMPELLER PROBES



HD-2303-0



AP-471-S1

AP-471-S2

AP-472-S2

**HD 2303.0239,90**

Art. no. 700073

Anemometer

**General:**

The HD-2303-0 is designed for use in the fields of air conditioning, heating, ventilation and environmental comfort. It uses hotwire or vane probes to measure air speed, flow rate, and temperature inside pipelines and vents. Temperature only is measured by immersion, penetration air or contact probes. The temperature sensor used can be chosen from the Pt100, Pt1000. The probes are equipped with the SICRAM module, with the factory calibration data stored inside.

**Specifications:**

**Instrument**

<b>Dimensions:</b>	140 x 88 x 38 mm (H x W x D)
<b>Material:</b>	ABS
<b>Display:</b>	2 x 4½ digits plus symbols, Visible area: 52 x 42 mm

**Operating conditions**

<b>Working temperature:</b>	-5 ... +50 °C
<b>Storage temperature:</b>	-25 ... +65 °C
<b>Working relative humidity:</b>	0 ... 90 % RH, without condensation
<b>Protection rating:</b>	IP67

**Power supply**

<b>Batteries:</b>	3 1.5 V type AA batteries
<b>Battery operation:</b>	200 h with 1800 mAh alkaline batteries
<b>Power absorbed with instrument off:</b>	<20 µA

**Measuring unit:** °C – °F – m/s – km/h – ft/min – mph – knot – l/s  
m³/min – m³/h – ft³/s – ft³/min

**Connections**

**Input module for the probes:** 8-pole male DIN45326 connector

**Measurement of temperature by Instrument**

<b>Pt100 measurement range:</b>	-200 ... +650 °C
<b>Pt1000 measurement range:</b>	-200 ... +650 °C
<b>Resolution:</b>	0.1 °C
<b>Accuracy:</b>	±0.1 °C

**Scope of supply:** Instrument HD-2303-0, 3 1.5 V alkaline batteries, manual, case.  
**Probes must be ordered separately.**

**AP 471-S1**

Art. no. 700074

Anemometer probes for air speed

**AP 471-S2**

Art. no. 700075

Anemometer probes for air speed

Specifications:	AP-471-S1	AP-471-S2
<b>Type of measure:</b>	Air speed, calculated flow rate, air temperature	
<b>Type of sensor</b>		
<b>Speed:</b>	NTC thermistor	Omnidirectional NTC thermistor
<b>Temperature:</b>	NTC thermistor	NTC thermistor
<b>Measurement range</b>		
<b>Speed:</b>	0.1 ... 40 m/s	0.1 ... 5 m/s
<b>Temperature:</b>	-25 ... +80 °C	-25 ... +80 °C
<b>Measurement resolution</b>		
<b>Speed:</b>	0.01 m/s – 0.1 km/h – 1 ft/min – 0.1 mph – 0.1 knot	
<b>Temperature:</b>	0.1 °C	
<b>Measurement accuracy</b>		
<b>Speed:</b>	±0.2 m/s (0 ... 0.99 m/s) ±0.4 m/s (1.00 ... 9.99 m/s) ±0.8 m/s (10.00 ... 40.0 m/s)	±0.2 m/s (0 ... 0.99 m/s) ±0.3 m/s (1.00 ... 5.00 m/s)
<b>Temperature:</b>	±0.8 °C (-10 ... +80 °C)    ±0.8 °C (-10 ... +80 °C)	
<b>Minimum speed:</b>	0.1 m/s	
<b>Air temperature compensation:</b>	0 ... 80 °C	
<b>Sensor working conditions:</b>	Clean air, RH <80 %	
<b>Battery life:</b>	Approx. 20 hours @ 20 m/s with alkaline batteries	Approx. 30 hours @ 5 m/s with alkaline batteries
<b>Unit of Measurement</b>		
<b>Speed:</b>	m/s – km/h – ft/min – mph – knot	
<b>Flow rate:</b>	l/s – m³/s – m³/min – m³/h – ft³/s – ft³/min	
<b>Pipeline section for flow rate calculation:</b>	0.0001 ... 1.9999 m²	
<b>Cable length:</b>	~ 2 m	
<b>Scope of supply:</b>	Hot-wire telescopic probe	Omnidirectional hot-wire probe

**AP 472-S2**

Art. no. 700076

Anemometer probes for air speed, Impeller

Specifications:	
<b>Type of measure:</b>	Air speed, calculated flow rate
<b>Diameter:</b>	60 mm
<b>Type of measurement</b>	
<b>Speed:</b>	Vane
<b>Measurement range</b>	
<b>Speed (m/s):</b>	0.5 ... 20
<b>Temperature (°C):</b>	-25 ... +80 (*)
<b>Resolution</b>	
<b>Speed:</b>	0.01 m/s – 0.1 km/h – 1 ft/min – 0.1 mph – 0.1 knot
<b>Accuracy</b>	
<b>Speed:</b>	±(0.4 m/s +1.5 % f.s.)
<b>Minimum speed:</b>	0.5 m/s
<b>Unit of Measurement</b>	
<b>Speed:</b>	m/s – km/h – ft/min – mph – knot
<b>Flow:</b>	l/s – m³/s – m³/min – m³/h – ft³/s – ft³/min
<b>Pipeline section for flow rate calculation:</b>	0.0001 ... 1.9999 m²
<b>Cable length:</b>	~ 2 m
<b>Scope of supply:</b>	Vane probe

(\*) The indicated value refers to the vane's working range.