

8091 HUMIDITY-TEMPERATURE SENSOR



Small, light, compact

Special resistance to airborne pollutants as a result of the use of a high-quality measuring element! This ensures - in combination with the high-quality electronics - excellent measuring accuracy and long-term stability. As a consequence, the sensor (8091) is particularly appropriate for measurements outdoors, in various areas of application.

- Small, light, compact
- Simple mounting, very robust, low-maintenance
- Low power consumption
- Good dynamic behaviour
- Reliable membrane filter as protection against atmospheric pollutants
- High long-term stability

APPLICATIONS

- Building services engineering
- Industry

Professional Line	8091
Id-No.	00.08091.000042 00.08091.000012
Meas. range air temperature	-30...+70 °C
Meas. range rel. humidity	0...100 % r. h.
Accuracy air temperature	± 0.3°C (4...20 mA); plus ± 0.007 K/K (< 10°C, > 40°C)
Accuracy rel. humidity	± 2 % r. h. (5...95 % r. h. at 10...40°C); plus < 0.1 %/ K (<10°C, >40°C)
Response time	< 1 min

Continued on page 2

Professional Line	8091
Long-term stability	Typical under normal conditions 1% r. h./ year
Output	00.08091.000042: 4...20 mA 00.08091.000012: 0...10 VDC
Supply voltage	00.08091.000042: 12...30 VDC 00.08091.000012: 15...30 VDC
Power consumption	Max. 45 mA
Measuring elements	Capacitive; Pt100; IEC 751 Class B
Dimensions	H 180 mm; Ø 20 mm
Housing	Aluminium; lacquered; grey-white
Protection class	IP 65; membrane filter as sensor protection IP 30
Weight	0.34 kg
Standards	CE/ EMV: DIN 50082-2; EN 550011 Class B
Accessories (order separately)	00.08141.600000 Sensor shelter with natural ventilation 00.08141.600004 Sensor shelter with artificial ventilation 67.01002.056041 Cable: 4 x AWG 20 C UL sw for 00.08091.000042 67.01002.056081 Cabel: 8 x AWG 20 C UL sw for 00.08091.000012

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