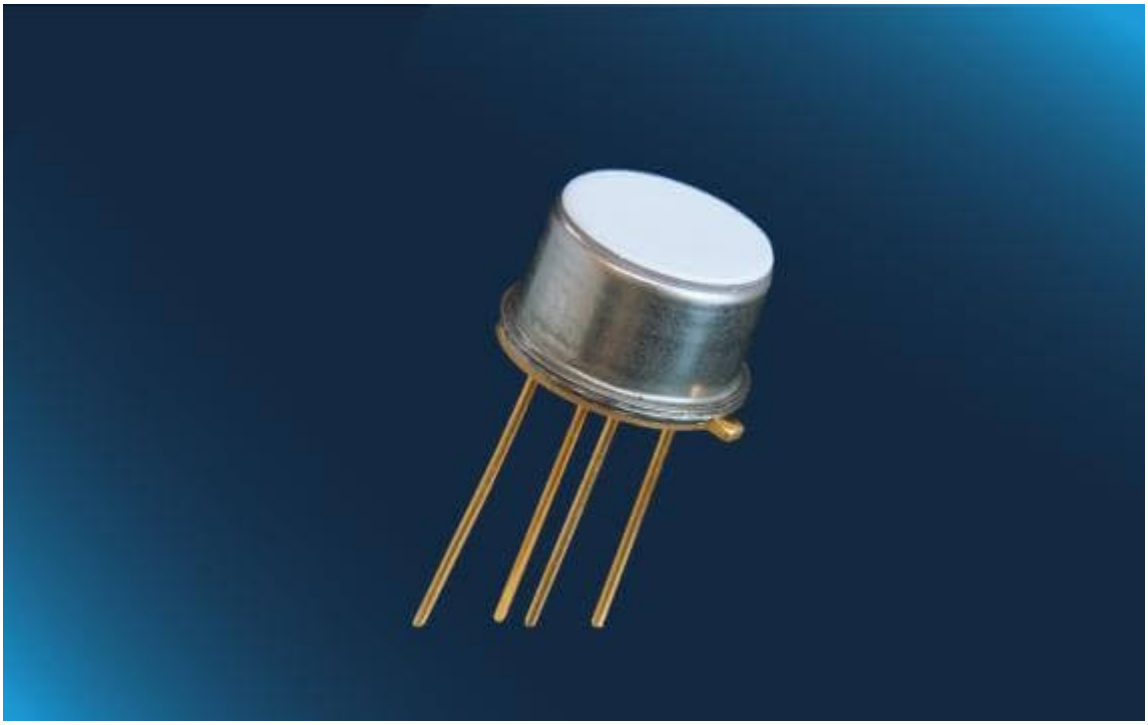
HYT 939p with membrane filter



Humidity module with a front PTFE membrane filter for VOC and particle protection.

HYT 939p digital RH/T module with I²C outputs in gas-tight TO39 housing. Condensation-safe for 0..100%RH. Compact, fast and universally applicable in HVAC, emission monitoring or industrial drying.

Application specific calibration and housing design possible upon request.

Product Name: HYT 939p module with PTFE filter
Operating humidity range: 0 % RH to 100 % RH
Operating temperature range: -40 °C to +125 °C
Accuracy humidity: ± 1.8 % RH at + 23 °C (0 % RH to 90 % RH)
Accuracy temperature: ±0.2 °C at 0-60°C
Digital interface: I²C, default address 0x28
Operating voltage: 2.7 V to 5.5 V
Current consumption: < 1µA in sleep mode, < 22µA at 1Hz measuring rate
Dimensions: 9 mm x 5.2 mm (ØxH)
Connections: TO-39, 4 wires

Wire dimensions: 13.5 x 0.45 mm (LxØ)
Response time: < 10 s
Filter: PTFE particle filter
Product code: 154417

Product details

Benefits & Characteristics of the HYT 939p

Mechanically robust and with a chemical and condensed waterproof sensing area, the digital iST HYT 939p humidity module excels with the special robust construction withstanding peak loading at high temperatures. The HYT 939p is also ideal for high pressure applications and is also offered with a pressure tight packaging. Precisely calibrated, the HYT 939p delivers an accuracy of ±1.8 % RH and ±0.2 °C and combines the advantages of a precise, capacitive polymer humidity sensor with the high integration density and functionality of an ASIC. The digital software integrated in the module processes the measured data and delivers the physical parameters of relative humidity and temperature over the I²C compatible interface as digital values. The HYT 939p humidity module is therefore fully interchangeable without adjustment and both the linearity error as well as temperature drift are corrected “on-chip” through computation resulting in an outstanding accuracy over a wide range of applications.

Further advantages of the HYT 939p digital humidity module include:

- Calibrated and temperature compensated
- Excellent humidity/temperature accuracy and stability
- High chemical resistance
- I2C protocol (address 0x28 or alternative address)
- Wide humidity and temperature range (0 % RH to 100 % RH and -40 °C to +125 °C)
- Very low drift
- Very stable at high humidity
- Interchangeable without adjustments
- Pressure-resistant version (up to 16 bar) upon request

Option: High-end humidity calibration HYT modules

With the development of a high end humidity calibration and measurement set up, the HYT sensor family boasts the accuracy of up to +/- 1.4 % RH and sets new standards for moisture measurement with low hysteresis and easy plug-and-play interchangeability.

Our three HYT models can be ordered with a tailored calibration, which allows an accuracy of higher than +/- 1.4 % RH when used in combination with a limited range of 0-50 % RH. For dew point applications measuring in the range of 0-5 % RH, you can even reach an accuracy of < +/- 0.5 % RH.

Contact our experts for customized solutions.

Quality

Consistent with the well-known, high-quality standards in Switzerland, IST AG is certified according to ISO 9001:2015 (quality) and ISO 14001:2015 (environment). Appropriate processes are part of our daily work. They are regularly audited and extended parallel to the growth of our company.

> Read more

The online shop

Quantity (pieces)	Price (per piece)
1-9	CHF 60.77
10-50	CHF 55.62

Stock: **22**