



Relative Humidity and Temperature Probe

HC2A Series

Product Overview

The HC2A Probe Series is a versatile, high-accuracy solution for humidity and temperature measurement in demanding environments. With ± 0.8 %rh and ± 0.1 °C accuracy, < 0.1 %rh drift per year, and a rugged, fully potted design, it ensures long-term stability and durability—even in condensing conditions. Models cover -100 to 200 °C and 0 to 100 %rh across all variants.

Key Message

The HC2A Series sets the benchmark for reliable, precise, and future-proof humidity and temperature measurement. Designed for critical and demanding environments, it delivers high accuracy, long-term stability, and flexible integration, making it the trusted choice for any application where measurement performance matters.

Key Features and Benefits

- High accuracy ± 0.8 %rh, ± 0.1 °C with long-term stability (< 0.1 %rh/year)
- Digital UART and dual 0–1 V analog outputs
- Hot-swappable for minimal downtime
- Calibration data stored on probe
- Field calibration via software
- Rugged, fully potted design for harsh conditions

Key Vertical Markets



Pharma



Life Sciences



HVAC Systems



Controlled Environment



Building Automation

Key Product Differentiators

- Built with proven HygroMer® thick-film sensor technology for reliable, high-precision performance
- Supplied with a traceable factory calibration certificate, including multi-point rh and temperature calibration and adjustment
- Offers an application-specific range of probe designs, materials, sensors, and filters
- Developed and validated under GAMP5-compliant R&D and quality standards
- Ideal for use in regulated environments requiring critical humidity control

Key Business Challenge

Standard humidity and temperature devices often can't meet the strict accuracy, stability, or environmental requirements of regulated or demanding applications. The HC2A Series solves this with long-term precision, rugged construction, and hot-swappable design. Whether paired with a transmitter or handheld device, the HC2A adapts easily to any setup, ensuring reliable, future-proof measurement with minimal downtime.

Applications

- Pharmaceutical & Life Sciences: manufacturing, warehouses, cleanrooms, and regulated lab environments (ISO13485, ISO17025)
- Controlled & Clean Environments: glove boxes, isolators, clean rooms, and climatic chambers
- Industrial Processes: drying and environmental monitoring
- Building Systems: HVAC, building management systems (BMS), and data centers

Personas

- Design/Test Engineer
- Engineering Director
- Engineering Technician
- Maintenance Manager/tech
- System Integrator

Additional Resources

[Datasheet
Online](#)

[Instruction Manual
Short Manual](#)

Sellable Regions

- Americas
- EMEA
- APAC

Use Filter for "HC2A"



North America



APAC



EMEA