HY-ALERTA® 5021

BATTERY ROOM AREA MONITOR

H2scan®
Advanced Hydrogen Sensing

H2scan HY-ALERTA 5021 PN: 105021 SN: AXXXXX ⌷ : 20XX USA
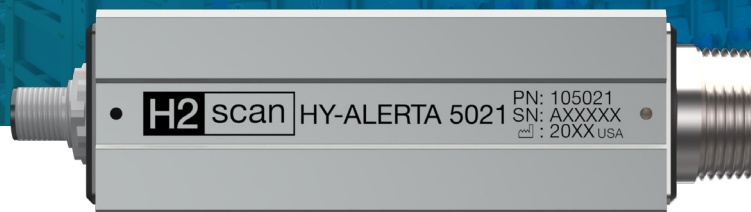
Solid State, Maintenance-Free Battery Room Hydrogen Monitor

The most advanced technology provides the lowest cost of ownership. Sensors only detect hydrogen, eliminating false positives. Expensive replacements are unnecessary, with a sensor life cycle of over ten years. The auto-calibration feature eliminates maintenance events. H2scan hydrogen sensing solutions offer various communication options, including Modbus, dry contacts, and 4-20 mA analog communications.

The HY-ALERTA® 5021 Meets All Code & Standards Requirements

- **Compliance:** According to codes and standards, hydrogen must be kept below 25% of the lower flammability level (1% of room volume) for all battery types, including lead acid, nickel-cadmium, lithium, and other technologies

- **Battery Safety:** Ideal for use in battery rooms and enclosures to detect if hydrogen is present and prevent the dangerous accumulation of hydrogen gas

- **Exhaust Fan Activation:** Communicates to relays that activate exhaust fans

- **Annunciation Compliance:** Modbus communication to meet annunciation requirements. Dry contacts, 4-20 mA analog communication modules are available

- **Communication Continuity:** Reports hydrogen continuously over Modbus

- **Easy Connection:** Provides easy cable connections to each sensor. Sensors may be daisy-chained for easy installation

Benefits

- **Advanced Technology:** Provides the lowest cost of ownership

- **Hydrogen-Specific Detection:** Sensors only detect hydrogen, eliminating false positives

- **Long Sensor Life:** The sensor life cycle is over ten years, eliminating the need for expensive replacements

- **Maintenance-Free:** The auto-calibration feature eliminates manual calibration and maintenance events

- **Flexible Communication:** H2scan hydrogen sensing solutions include various communication options, such as Modbus, 4-20 mA analog communications, and dry contact outputs

Applications

Data center UPS

Utility applications and substations

Energy storage batteries

Features

Solid state technology

Auto-calibrating

10-year warranty

Field configurable settings

No cross-sensitivity

Long-term reliability

High resistance

Lowest TCO. 15 year service life set it and forget it!

Product Details

IEC 61326-1 CE FC

Standards and Certifications

IEC 60068-2-2 & EN 50155 Section 13.4.4	IEC 60068-2-27
IEC 60068-2-11 & DIN EN ISO 12944	IEC 55022 IFCC Part 15 EN
IEC 60529	55011 Class A Group 1
IEC 60068-2-6 table C2	IEC 61000-4-2, 61000-4-3, 6100-4-6, and 61000-4-8
IEC 60068-2-64 paragraph A.2, category no. 2	IEC/ EN 61010-1
	IEC 61326-1

Performance Specifications

|	
Low H_2	0%
High H_2	5%
Lower Detection Limit (LDL)	0.4% H_2
Response Time	<5 min
Accuracy (Absolute Error)	0.3% H_2
Repeatability (Absolute Error)	0.3% H_2

HY-ALERTA 5021 Dimensions
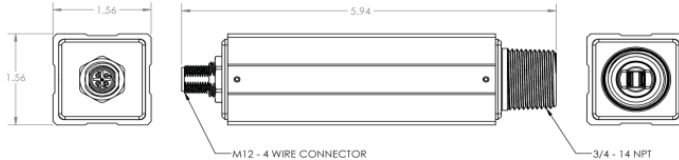
Mounting Kit Operations

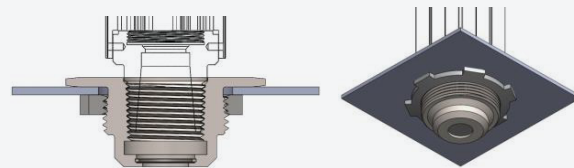The HY-ALERTA 5021 sensors have two mounting options that make it easy for installation:

General Purpose Mount

This mount can be mounted to a ceiling or other structure using the included mounting plate with pre-drilled holes.
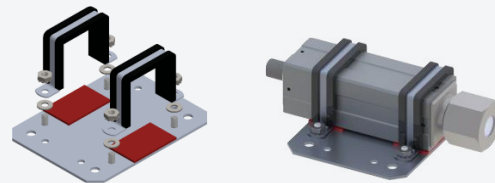
Enclosure Bulkhead Style Mount

Designed for mounting to indoor or outdoor enclosures, providing flexibility in installation locations.

These mounting options ensure the HY-ALERTA 5021 sensor can be easily integrated into various environments, whether in rooms, enclosures, or outdoor settings, facilitating straightforward deployment setup.