

Gas Sensor

Model No: SENSE-GT100

Data Sheet



Item	Information
Target Gas	Ammonia (NH ₃)
Gas Code	SG2
Product Platform	SENSE-GT100
Enclosure Type	WP - Weatherproof industrial enclosure
Document Type	Data Sheet
Document Revision	Rev. 1.0
Important: Read this complete manual before installation, commissioning, operation, calibration or servicing of the gas transmitter.	

OVERVIEW

The SENSE-GT100 combines gas sensing, communication and cloud-ready architecture into a single weatherproof platform suitable for industrial gas monitoring and alarm indication applications.

Features

- Weatherproof industrial enclosure for non-flameproof industrial areas.
- One configured target gas sensor module in a single transmitter.
- Higher-accuracy sensing platform for target gas monitoring.
- 2.4" TFT LCD color display for live gas value, alarm status and configuration pages.
- Touch Keypad interface for local device setting and operations.
- RS485 Modbus RTU communication for PLC, DCS, BMS, SCADA and data logger integration.
- Modbus TCP/IP communication support through Ethernet interface.
- PoE (Power on Ethernet) support.
- Ethernet and Wi-Fi internet connectivity on top model variant.
- Cloud protocol support: MQTT(S), HTTP(S).
- Default compatibility with Linked IoT SCADA platform.
- 4-20 mA analog output channels and relay output for external alarm or interlock.
- Built In buzzer and top alarm indicator/lens for alarm annunciation.
- Continuous 24x7 monitoring operation.
- Compact enclosure suitable for wall/surface mounting.

Applications

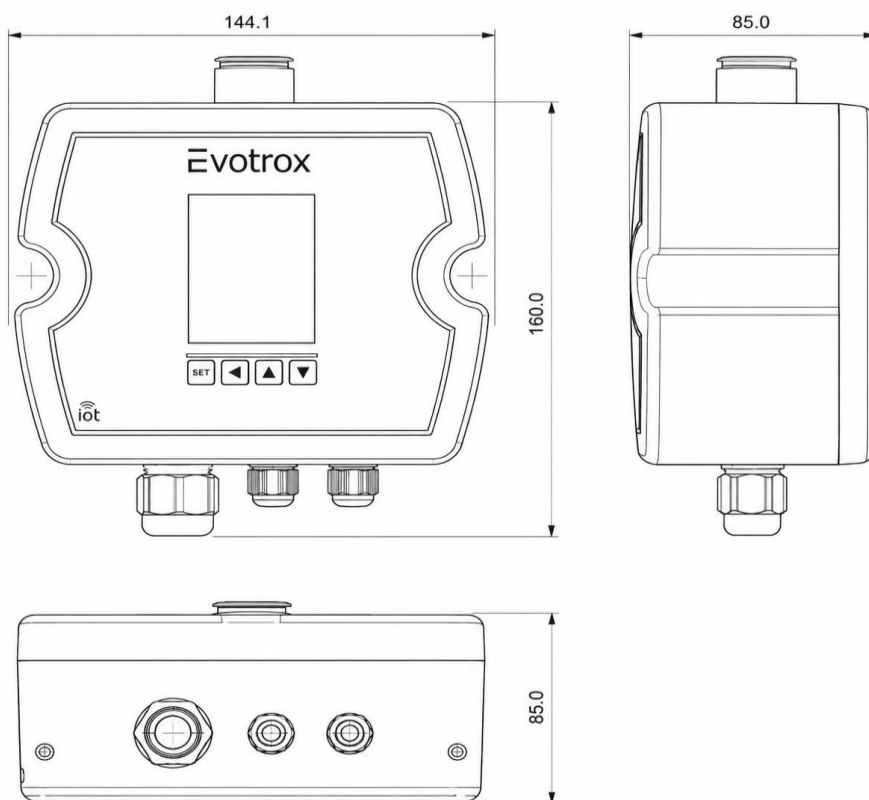
- Cold storage plants and ammonia refrigeration areas
- Compressor rooms and utility areas
- Chemical storage and processing areas where weatherproof enclosure is permitted
- Boiler rooms and industrial plant rooms
- Ventilation monitoring and alarm interlock systems
- Food, dairy and beverage processing plants
- Pharmaceutical warehouses and production utilities
- Water and wastewater treatment plants
- Industrial safety monitoring panels
- SCADA, BMS, PLC and IoT-based gas monitoring systems

TECHNICAL SPECIFICATIONS

Parameter	Specification
Sensor Technology	Electrochemical / Catalytic / Pellistor / NDIR, depending on target gas
Configured Target Gas	Ammonia (NH3) - SG-2 for this manual copy
Sensing Range	0 to 1000 PPM
Cross Sensitivity	Nil
Gas Channels	Single target gas sensor module only
Display	2.4" TFT LCD color display
User Interface	Touch Keypad for device configuration
Typical Power Supply	24 VDC
Power Supply Range	12 to 30 VDC
PoE	PoE support through Ethernet interface
Outputs	4-20 mA analog output, relay output and buzzer/top indicator
Communication	RS485 Modbus RTU, Ethernet Modbus TCP/IP
Cloud Protocols	MQTT(S), HTTP(S)
Internet Connectivity	Ethernet / Wi-Fi depending on model variant
Operating Temperature	10°C to +50°C or as per final sensor datasheet
Storage Temperature	10°C to +60°C or as per final sensor datasheet
Humidity	<95% RH, non-condensing recommended
Mounting	Wall / surface mount
Operation	Continuous 24x7 monitoring

MECHANICAL DIMENSIONS

The following dimensional drawing provides the mechanical dimensions required for mounting and installation planning.



All dimensions in millimeters (mm)

ORDERING INFORMATION

Ordering format: SENSE-GT100-SG2-GF2

Code Segment	Meaning
SENSE	Product Family
GT100	Product Model
SG2	Targeted Gas
GF2	Filter Category

Ordering note: Final ordering code may include additional options such as gas range, relay logic, output configuration, cable gland type, calibration certificate and communication settings

Filter Variants

Code	Filter Type	Working Area	Protection
GF1	SS Mesh	Normal factory air	Dust protection, fast response
GF2	SS Sintered	Dusty industrial areas	Strong dust protection
GF3	PTFE Membrane	Outdoor / condensation	Blocks liquid water
GF4	PTFE + AC Membrane	Chemical vapors	Protects from chemicals

Note: If no filter option is specified during ordering, standard F1 filter variant will be supplied by default

CONTACT INFORMATION

Company	Details
Brand	EVOTROX
Location	Ahmedabad, Gujarat, India
Mail Us	support@evotrox.com
Website	www.evotrox.com