

AUTO SAMPLING TYPE OXYGEN & TOXIC GAS DETECTOR TS-4000Tx Series





- Continuous measurring of Oxygen & Toxic Gases and Vapours by Continuous sampling
- · Excellent Measurement Sensitivity and Stability
- · Long Life Sensor element
- Built-in LCD Display that Indicates the Density of Leaked Gas in Field
- Built-In Subminiature and High-Efficient Micro Pump
- · 3-wires connection
- · 4-20mA Signal output
- · Calibration by One Person and Easy Maintenance
- · Highest Safety Certification

GENERAL SPECIFICATION

- TS-4000Tx series is auto sampling-type oxygen & toxic gas detector, having a built-in high-efficient micro pump. Likewise, it can detect part per billion (PPB), part per million (PPM) and volume (%), applying electrochemical sensor of high sensitivity, having high selectivity and for detecting low-density toxic gas.
- It was designed to surveil the gas leak in even hazardous area such as low-temperature, hightemperature, high-humidity, high-ground area, etc., which the barrier place to work in maintenance and repair, continuously inhaling gas in those places, using explosion-proof housing.
- It can correctly and rapidly detect the gas through a display that indicate the density of leaked gas in field.
- It is a product that minimizes the influence from the exterior environment (temperature, humidity, pressure, electrical noise, etc.); at the same time, it was manufactured to guarantee long life, high sensitivity, inearity, reproducibility, etc. on a long-term basis.
- It is a 3-wire-type product, no need separate power for operating pump; it makes lower construction expense than 5 or 6 wires. Likewise, it is possible to transmit industry standard output signal (4-20mA. DC) to a control center; at the same time, it realized longdistance transmission of 2,000m.
- It is possible to confirm the detected density at the even local area; at the same time, it provides oneperson calibration and maintenance function, using a port on the outside of the detector.



SYSTEM SPECIFICATION

Sensor type: Continuous auto sampling Local LCD display type **Function:**

Transmitter type

Service: Indoor or outdoor locations

Including hazardous areas

PPB, PPM & Vol.% Measuring range:

Refer to Ordering information(P.50)

Sensor life: 2 to 3 years typical

Accuracy: \pm 3% of full scale Thermal

Response time: T90 < 45 sec.

Zero drift: Less than 3% of full scale per year

Suction flow method Electrical diaphragm pump

Flow rate 0-2000 ml/min Max.

Electrical Classification: Explosion-proof, Ex d IIC T5

Warranty: One year

Approval: Korea Occupational Safety Association

ENVIRONMENTAL SPECIFICATION

Electronics -40 °C to 70 °C Operating Temperature range:

Standard sensor -50 °C to 80 °C

-40°C to 70°C Storage Temperature range: 5 to 100% RH Operating Humidity range: Operating pressure range: ATM. ± 10%

MECHANICAL SPECIFICATION

Weight: 7kg

Cast aluminum Material(housing): Steel(Glass Window) Material(Enclosure): **Mounting Type:** surface mount

ELECTRICAL SPECIFICATION

EMI/RFI by EN 50082-1 **Electrical protection:**

24V.DC nominal Input power:

18 to 31V.DC/230mA max.

18kg(Including Enclosure)

4-20mA(600 ohms max. load) Output signal: Cable Requirements: 3-wire shield cable. Max distance

2000M

Conduit connection: 1/2" & 3/4" PT & NPT

DIMENSIONS



