

Product Specification of:

## O<sub>2</sub> - Industrial Sensor / Type I-02



### .: KEY FEATURE .:

**Galvanic gas sensor characterized by a long life and superior signal stability, designed for use in long-term monitoring such as fruit storage application.**

*All characteristics are based on conditions at 25°C, 50% RH and 1013 hPa.*

<b>Measurement Range:</b>	0 to 35 Vol.%
<b>Expected Operating Life:</b>	~ 1,000,000 Vol.% h
<b>Sensor Lifetime:</b>	< 6 years @ ambient air
<b>Electrical Connector:</b>	3-pin Molex®
<b>Initial Output Signal:</b>	9.0 to 13.5 mV @ dry ambient air
<b>Output Signal Range:</b>	5.0 to 17.0 mV @ dry ambient air
<b>Response Time t<sub>90</sub>:</b>	< 15 s
<b>Drift:</b>	10 % per year
<b>Linearity Error:</b>	0 to 2 Vol.% O <sub>2</sub> : ± 0.1 absolute 2.1 to 35 Vol.% O <sub>2</sub> : ± 0.5 relative
<b>Operating Temperature:</b>	0 to 50 °C
<b>Pressure Range:</b>	700 to 1750 hPa
<b>Influence of Humidity:</b>	- 0.03 % rel. O <sub>2</sub> reading per % RH
<b>Recommended Load Resistor:</b>	≥ 10 kOhm
<b>Temperature Compensation:</b>	NTC
<b>Interferences:</b>	< 0.1 % O <sub>2</sub> response to: 10.0 Vol.% CO, balance N <sub>2</sub> 500 ppm H <sub>2</sub> S, balance N <sub>2</sub> 15.0 Vol.% CO <sub>2</sub> , balance N <sub>2</sub> 3,000 ppm NO, balance to N <sub>2</sub> 3,000 ppm C <sub>3</sub> H <sub>8</sub> , balance N <sub>2</sub> 500 ppm SO <sub>2</sub> , balance N <sub>2</sub> 1,000 ppm Benzene, balance N <sub>2</sub>
<b>Weight:</b>	approximately 27 g
<b>Material in Contact with Media:</b>	ABS, PVC, PPS, PTFE, stainless steel



### .: STORAGE CONDITIONS .:

<b>Temperature Range:</b>	recommended: 5 to 30 °C maximum: - 20 to 50 °C
<b>Humidity:</b>	up to 100 % RH
<b>Ambient Pressure:</b>	600 to 1750 hPa
<b>Shelf Life:</b>	< 6 months recommended

### .: RELATED PRODUCTS .:

Product	Part-No.	Housing Colour
O <sub>2</sub> - Sensor I-02	48 00 26	black

*This data sheet is subject to change without prior notice. [I-02-Rev\_022012.doc]*

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