

# O<sub>2</sub> - Scuba Diving Sensor

## Type D-05R



### KEY FEATURE

**Galvanic gas sensor with an extra water repellent head space.**

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

Electrical Connector:	3-pin Molex®, gold-plated
Measurement Range:	0 to 100 Vol.%
Sensor Lifetime:	< 2 years @ ambient air, depending on application
Expected Operating Life:	> 500,000 Vol.% h
Initial Output Signal:	9.0 to 12.5 mV @ dry ambient air
Output Signal Range:	3 to 15 mV @ dry ambient air
Response Time t <sub>90</sub> :	< 8 s
Drift:	< 2 % volume O <sub>2</sub> / month @ air, averaged across 12 months
Linearity Error:	< 3 % @ 100 % O <sub>2</sub> , applied for 5 min
Zero Offset Voltage:	< 150 µV in 100 % N <sub>2</sub> , applied for 5 min
Operating Temperature:	0 to 45 °C
Influence of Humidity:	-0.03 % rel. O <sub>2</sub> reading per % RH
Recommended Load Resistor:	≥ 10 kOhm
Temperature Compensation:	NTC on sensor PCB
Weight:	approximately 23 g
Interferences:	none to He, H <sub>2</sub> and CO
Material in Contact with Media:	PA, PPS, PTFE, NBR, stainless steel

### STORAGE CONDITIONS

Temperature Range:	recommended: 5 to 30 °C maximum: -20 to 50 °C
Humidity:	up to 100 % Rh
Shelf Life:	< 6 months recommended

### RELATED PRODUCTS

Product	Part-No.	Housing Colour	Feature
O <sub>2</sub> - Sensor D-05		white	
O <sub>2</sub> - Sensor D-05R		white	Fast response time

[www.nrc-international.com](http://www.nrc-international.com)



**NRC International GmbH**

Stentenberg Str. 63  
D-51702 Bergneustadt

Phone +49(0)2261-500414  
Fax +49(0)2261-500415

[info@nrc-international.com](mailto:info@nrc-international.com)