

DrägerSensor® XS EC NO

Order no. 68 09 125

Used in	Plug & Play	Replaceable	Guaranty	Expected sensor life	Selective filter
Dräger X-am 7000	yes	yes	1 year	> 2 years	–

MARKET SEGMENTS

Power plants, district heating plants

TECHNICAL SPECIFICATIONS

Detection limit:	1 ppm
Resolution:	0.5 ppm
Measurement range:	0 to 200 ppm NO (nitrogen monoxide)
Response time:	≤ 30 seconds (t90)
Precision	
Sensitivity:	≤ ± 3% of measured value
Long-term drift, at 20°C (68°F)	
Zero point:	≤ ± 1 ppm/month
Sensitivity:	≤ ± 3% of measured value/month
Warm-up time:	≤ 18 hours
Ambient conditions	
Temperature:	(–40 to 50)°C (–40 to 122)°F
Humidity:	(10 to 90)% RH
Pressure:	(700 to 1,300) hPa
Influence of temperature	
Zero point:	≤ ± 0.01 ppm/K
Sensitivity:	≤ ± 0.2% of measured value/K
Influence of humidity	
Zero point:	≤ ± 0.01 ppm/% RH
Sensitivity:	≤ ± 0.05% of measured value/% RH
Test gas:	approx. 1 to 200 ppm NO test gas

SPECIAL CHARACTERISTICS

This sensor enables a selective measurement of NO. It also offers a very fast response time and excellent linearity across its entire measurement range.

The values shown in the following table are standard and apply to new sensors. The values may fluctuate by $\pm 30\%$. The sensor may also be sensitive to additional gases (for more information, please contact Dräger). Gas mixtures may be displayed as the sum of all components. Gases with a negative cross sensitivity may displace an existing concentration of NO. To be sure, please check if gas mixtures are present.

RELEVANT CROSS-SENSITIVITIES

Gas/vapor	Chem. symbol	Concentration	Display in ppm NO
Acetone	CH_3COCH_3	1,000 ppm	No effect
Acetylene	C_2H_2	0.8 Vol. %	≤ 2
Ammonia	NH_3	500 ppm	No effect
Benzene	C_6H_6	0.6 Vol. %	No effect
Carbon dioxide	CO_2	5 Vol. %	No effect
Carbon monoxide	CO	2,000 ppm	No effect
Chlorine	Cl_2	5 ppm	No effect
Ethanol	$\text{C}_2\text{H}_5\text{OH}$	250 ppm	No effect
Ethene	C_2H_4	0.1 Vol. %	No effect
Hydrogen	H_2	5 Vol. %	≤ 2
Hydrogen chloride	HCl	40 ppm	No effect
Hydrogen cyanide	HCN	50 ppm	No effect
Hydrogen sulfide	H_2S	5 ppm	≤ 5
Methane	CH_4	2 Vol. %	No effect
Nitrogen dioxide	NO_2	20 ppm	No effect
Phosphine	PH_3	2 ppm	≤ 2
Propane	C_3H_8	1 Vol. %	No effect
Sulfur dioxide	SO_2	10 ppm	≤ 2
Tetrachloroethylene	CCl_2CCl_2	1,000 ppm	No effect
Toluene	$\text{C}_6\text{H}_5\text{CH}_3$	0.6 Vol. %	No effect
Trichloroethylene	CHClCCl_2	1,000 ppm	No effect