

# MEMBRAPOR SPECIFICATION SHEET

## ETO/M-500

Ethylene Oxide Gas Sensor in Mini Housing



### MEASUREMENT

Operation Principle	3-Electrode Electrochemical
Nominal Range	0 – 500 ppm
Maximum Overload	1'000 ppm
Inboard Filter	–
Output Signal	50 ± 15 nA/ppm
Resolution (Electronics dependent)	< 4 ppm
T90 Response Time	< 140 sec
Typical Baseline Range (pure air, 20°C)	0 ppm to 36 ppm
Maximum Zero Shift (+20°C to +40°C)	N.D.
Repeatability	< 2 % of signal
Output Linearity	Linear
Gain	–

### ELECTRICAL

Rec. Load Resistor	10 Ohm
Bias (V_Sens-V_Ref)	+300 mV
Conformity to RoHS directive	RoHS Compliance

### ENVIRONMENTAL

Relative Humidity Range	15 % to 90 % R.H. non-condensing
Temperature Range	-40 °C to 50 °C
Pressure Range	Atmospheric ± 10%
Pressure Coefficient	N.D.
Humidity Effect	none

### LIFETIME

Expected Operation Life	2 years in air
Expected Long Term Output Drift in air	< 2 % per month
Filter Life	–
Storage Life	6 months in container
Rec. Storage Temperature	5 °C – 20 °C
Warranty Period	12 months from date of dispatch

Performance data conditions: 20 °C, 50% RH, 1013 mbar

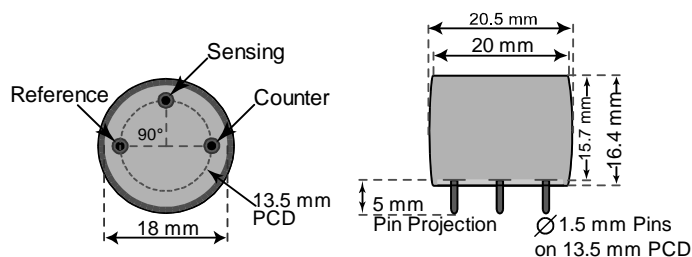
### IMPORTANT NOTE

1) Fresh sensors with bias need 24-72 h for stabilization of the baseline

### Miniature-Size Outline Dimensions

BOTTOM VIEW

SIDE VIEW



± 0.10 mm

### MECHANICAL

Weight	5.5 g
Position Sensitivity	None

### APPLICATIONS

Sterilization Processes  
Safety and Environmental Control

### CROSS-SENSITIVITY DATA

The table below does not claim to be complete. Interfering gases should not be used for calibration.

Interfering Gas	Conc. ppm	Reading ppm
CO	100	45
Ethanol	30	21
Formic Acid	42	42 ± 3
Aromatic Hydrocarbons	30	< 15

REV.: 10/2018

Phone: +41 43 311 72 00

Fax: +41 43 311 72 01

Email: info@membrapor.ch

www.membrapor.ch

The data contained in this document is for guidance only. Membrapor AG accepts no liability for any consequential losses, injury or damage resulting from the use of this document or from any omissions or errors herein. Customers should test under their own conditions, to ensure that the sensors are suitable for their own requirements.

Page 1 of 1

MEMBRAPOR AG

Birkenweg 2

CH-8304 Wallisellen

Switzerland