

**CONTINUOUS EMISSION MONITORING**



*We care about the environment*

# PORTABLE MULTIGAS ANALYZER NDIR-TECHNOLOGY



O<sub>2</sub>

CO

NO<sub>x</sub>

SO<sub>2</sub>

CO<sub>2</sub>

mg/m<sup>3</sup>  
g/s

°C  
°F

m/s  
ft/s

Pa  
mbar  
"H<sub>2</sub>O

ANALOG  
OUTPUT  
4 - 20 mA

EXCESS AIR  
EFFICIENCY

COMBUSTION  
CALCULATIONS

EMISSIONS  
CALCULATIONS  
mg/m<sup>3</sup>

METAL  
ENCLOSURE

INTERFACE  
RS 232

MMC  
CARD

# MGA 5



EMISSION MONITORING SYSTEMS

# CONTINUOUS EMISSION MONITORING



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## MULTIGAS ANALYZER MGA 5

- ▶ Continuous control measurements of different industrial applications
- ▶ Compliance testing of engines, turbines, boilers and furnaces
- ▶ Emission monitoring of all combustion facilities
- ▶ Industrial firings/ process control up to 1.700°C stack temperature

The MGA 5 analyzer is a complete portable flue gas measuring system with integrated sample conditioner and infrared benches for measuring CO, NO, SO<sub>2</sub> and CO<sub>2</sub>, catalytic converter for NO<sub>2</sub> and electrochemical cell for O<sub>2</sub>. Additionally, the analyzer is measuring temperatures and flow velocity of the flue gas, performs combustion and emission calculations and display the measuring results on a large, graphical type display.

### Simultaneous measurement of up to 6 gases

#### Important features:

- ▶ Integrated, electrical gas cooler unit
- ▶ Sample probe with heated coarse filter
- ▶ Heated gas sample line, length 3m or 5m
- ▶ Automatic condensate pump
- ▶ Automatic zero calibration
- ▶ Automatic interval measurement program
- ▶ Automatic selftest of soft- and hardware functions
- ▶ Large, high-contrast, backlit graphical display
- ▶ All measuring data at a glance
- ▶ Fuel types user selectable
- ▶ Reference oxygen user selectable
- ▶ Differential pressure measurement
- ▶ RS 232 to PC
- ▶ Internal measuring data storage for approx. 7.500 measuring data
- ▶ Measuring data visualization for PC
- ▶ MMC Card up to 128 MB with data logger software
- ▶ Universal analog input for 0 - 10 V or 4 - 20 mA transmitter
- ▶ 8 analog outputs 4 - 20 mA
- ▶ Robust aluminium frame transport case with trolley and wheels
- ▶ Gas velocity measurement by means of additional Pitot tube and mass flow calculation [Nm<sup>3</sup>/s]

#### Continuous gas-measurement:

CO (NDIR) \_\_\_\_\_ 0 - 1.000 / 4.000 ppm  
SO<sub>2</sub> (NDIR) \_\_\_\_\_ 0 - 1.000 / 4.000 ppm  
NO (NDIR) \_\_\_\_\_ 0 - 500 / 2.000 ppm  
NO<sub>2</sub> (catalytic converter) \_\_\_\_\_ 0 - 500 ppm  
CO<sub>2</sub> (NDIR) \_\_\_\_\_ 0 - 20,0%  
O<sub>2</sub> (electrochemical) \_\_\_\_\_ 0 - 25,0%  
(other ranges on request)

#### Other measurements:

Temp.<sub>AIR</sub> \_\_\_\_\_ 0 - 300°C\*  
Temp.<sub>GAS</sub> \_\_\_\_\_ 0 - 1.700°C\*  
(\* with adequate probes)  
Diff. pressure \_\_\_\_\_ ± 100 hPa

#### Further specifications:

Dimensions \_\_\_\_\_ 500 x 520 x 295 mm  
Weight \_\_\_\_\_ approx. 19 kg  
Operation temp. \_\_\_\_\_ +5 - +45°C  
Storage temp. \_\_\_\_\_ -20 - +50°C  
Power supply \_\_\_\_\_ 110V or 230 V  
50/60 Hz

Dealer's stamp:



MRU

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