

Portable Flue Gas Analyzer MODEL - 230PV

Combination of Technologies for Gas Concentration

Measurement



- Analyzer that covers all process application
- Measures O₂ CO, SO₂ NO, Stack Temperature, Pressure & Velocity
- Calculates CO₂Efficiency, Losses, Excess Air, Net Temperature, CO / CO₂ Ratio & Poison Index





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Technical Specification

PARAMETER	RESOLUTION	ACCURACY	RANGE
Flue Temperature with probe	0.1℃	±2.0℃	0 - 1200°C / 32 - 2200 ℉ with suitable probe
Inlet Temperature	0.1℃	±0.1℃	0 - 50°C / 32 - 122 F
Pressure	0.1 mbar	±2.% of full scale	+150 mbar to -150 mbar
Velocity	0.1 m/s	±2.% of full scale	0 - 50 m/s
GAS MEASUREMENT - ELECTROCHEMICAL			
Oxygen	0.1%	±0.2%	0 - 21%
Carbon Monoxide (Standard)	1 ppm	±20 ppm<500 ppm, ±5%>500 ppm,	0 -10000 ppm
Nitric Oxide (Standard)	1 ppm	±5 ppm<100 ppm, ±5%>100 ppm	0 - 5000 ppm
Sulphur Dioxide	1 ppm	±5 ppm<100 ppm, ±5% >100 ppm	0 - 5000 ppm
GAS MEASUREMENT - INFRARED (IR)			
Total Hydrocarbon	0.1%	±3%	0 -1%, 0 - 5%, 0 - 100%
CALCULATIONS			
Carbon Dioxide	0.1%	±0.3% reading	0 - 20%
Efficiency	0.1%	±1.0% reading	0 - 120%
Losses	0.1%	±1.0% reading	0 - 99.99%
Excess air	0.1%	±0.2%	0 - 2885.0%
Temp (Net) Standard	1.00 C/F	±2℃	0 - 600℃ / 32-1112 ° F
CO/CO ₂ Ratio	0.0001	±0.0001	0 - 0.9999
Poison Index	0.01%	0.01%	0 - 99.99%

Unit Specification

Ambient Temperature : 0-50°CHumidity : 0-95 % rh

Repeatability : ± 1% of reading

Power Supply : 80-230 VAC, 50 Hz, Adaptor

Area Classification : General Purpose

Other parameters measured

Pressure

Velocity

Flow rate



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Total Solution for Boiler Efficiency Analysis Combined with Emission Monitoring

Efficiency

Net Temperature

Pressure

Losses

Stack temperature

Velocity

Excess Air

Ambient temperature

Flow rate

Poison Index

Derived CO₂& NO x

Also calculates relative concentration of all Gas Emissions with respect to Reference O₂

Programmable units of measured gas concentration

- Gas concentrations can be displayed either in ppm or mg/m³
- Gas concentrations can be displayed either in ppb or μg/m³on request

Data Management

- Can store up to 160 sets of data
- Data logger function for the analog inputs
- Can choose up to 15 parameters in a data set
- Auto store and averaging option for all gas concentration
- Powerful Windows Software for Analyzer Data Communication
- All measured values, stored values or displayed can be printed on the internal or external printer

Hardware Capabilities

- 32-bit Cortex-M3 ARM Processor
- Rechargeable Lithium Ion Battery
- Suction Pump with 400 mbar w.r.t. absolute
- Printer Interface
- Borosilicate Filter with 0.1 micron porosity
- Gas probe with thermocouple and condensate trap
- RS-232 interface and multi functional PC program

Optional Accessories

- Choice of soft carrying case or hard housing
- For longer sampling duration : Mini Peltier gas dryer with peristaltic pump
- For velocity measurement : Pitot tube



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Sampling Probes

- For SO_x/ NO measurement : Heated probe with heated hose
- Inconel probe for up to 1200°C
- Silicon Carbide probe for up to 1600°C
- Alumina probe for up to 1600°C
- Customized probe length contact office

Additional Capabilities

- Automatic zeroing when the analyzer is switched ON
- All parameters programmable
- 18 common fuels with 2 extra programmable fuels

Advantages

- Low cost of ownership, maintenance and installation
- Ensured after sales & service support
- Spares and accessories availability guaranteed for years
- Combination of technologies and integration under one roof

5.7"QVGA TFT Touch Screen Display





