

EcoChem Mobile Continuous Emission Monitoring System (CEMS)



- ✓ Complete emission monitoring solution (probe, sample line, CEMS and DAS) provided in a mobile housing
- ✓ One or more system housed in air-conditioned trailer for minimal maintenance and hassle-free operations.
- ✓ Cellular phone link with powerful software allows total remote access for data monitoring, diagnostics and quick service support. Regularly emailed compliance reports
- ✓ Simple Hot-Wet sample system to streamline design
- ✓ Direct measurement (without converters) of up to 8 components including SO_2 , NO , NO_2 , N_2O , CO , NH_3 , CH_4 , CO_2 , H_2O & O_2
- ✓ Three decades of design and application experience with installations including chemical and refining facilities, power plants, waste-to-energy, pharmaceutical manufacture, cement kilns and hazardous waste incineration plants.
- ✓ Cost-effective financial model; can be purchased outright or lease payments; short and long-term monthly lease plans which gives you the option to avoid large capital outlay

The EcoChem Mobile CEMS is a total "headache-free" CEMS outsourcing solution; you make monthly payments and EcoChem provides complete CEMS equipment, Data Acquisition System (DAS), calibration gases, emission data monitoring and exceedance checks; maintenance and service, including quarterly Calibration Gas Audits (CGA) and annual Relative Accuracy Test Audit (RATA) certification.

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Unlike most other system integrators, EcoChem manufactures its own Probe, Analyzer and Data Acquisition System ... **there is only one party responsible for the entire system!**

No finger-pointing...
Probe to Printout by
single provider;
total responsibility
for EcoChem leading
to effective service
and support

System Cabinet
with Heated
Analyzer

Data Acquisition for
Regulatory Compliance

Heated
Sample Probe

Heated
Sample Line

Technical Specifications

Gas	Typical	Typical
	Low Range*	High Range*
SO ₂	0-20 PPM	0-1,000 PPM
NO	0-10 PPM	0-500 PPM
NO ₂	0-10 PPM	0-500 PPM
N ₂ O	0-100 PPM	0-1,500 PPM
CO	0-10 PPM	0-5,000 PPM
NH ₃	0-10 PPM	0-100 PPM
CH ₄	0-100 PPM	0-1,000 PPM
CO ₂	0-2%	0-20%
H ₂ O	0-2%	0-25%
O ₂	0-10 %	0-25%

Weight & Dimension

Freestanding NEMA-12 or NEMA 4 housing
(Other user-defined configurations available)

Flow Rate

2-7 liter per minute with 1/4" Swagelok connectors

Display

Menu-driven LCD Panel can be field-customized

Power

115 volts AC / 60 Hz or 220 volts AC / 50 Hz

Accuracy

± 2 % of full-scale value

Lower Threshold

1 % of lowest range

Response Time

10 seconds

Output Signals

Analog: 8 signals of 0/4 – 20 mA;

Digital: 2 ports RS 232-C, 1 port RS 422-A;

Relays: Failure Indicator, Service, Maintenance

Operating Temperature

32 – 105°F (0 – 40°C)

* Typical range for application -- user can select appropriate range; dual ranges possible



Advanced software is provided with every MC3 based system for remote access, diagnostics and quick service support.



Single MC3 analyzer measures gases including SO₂, NO, NO₂, N₂O, CO, NH₃, CH₄, CO₂, H₂O & O₂