

BRINGING CERTAINTY TO AIR EMISSIONS MEASUREMENT



Stay Compliant - Even if Your Primary CEMS is Down

ALTERNATE CONTINUOUS EMISSION MONITORING SYSTEMS

The Global Analyzer Systems (Global) Alternate Continuous Emission Monitoring System (CEMS) incorporates the Global CEMS package onto a movable platform.

The Alternate CEMS can be customized to monitor several pollutant types on a wide range of sources at varying lengths of time, from a few days to several months, depending on the customer's specific needs. The system is designed to be autonomous after installation and can be operated remotely to maximize efficiency and minimize labour costs. Global is on standby to remotely monitor all the CEMS diagnostics and is supplied with a daily systems update report.

APPLICATIONS

- ✓ **Emergency Backup CEMS**
The Alternate CEMS can be deployed quickly to meet the maintenance needs of the CEMS code system availability requirements.
- ✓ **Sulphur Recovery Unit (SRU) Optimization and Fuel Gas Reduction Programs**
The Alternate CEMS can be configured to continuously monitor Total Reduced Sulphur (TRS) and O₂ to aid in SRU optimization, and SRU fuel gas usage reduction programs.
- ✓ **Process Equipment Performance Testing**
Temporary installation of the Alternate CEMS allows process engineers the ability to collect emission data over several days and months, in order to determine best operating practices for their facilities.
- ✓ **Predictive Emission Monitoring Systems (PEMS)**
The Alternate CEMS can be deployed to collect emission and process data to develop a PEMS model, and can be used to validate the facility PEMS as per US EPA PS-16.

MULTIPLE CONFIGURATIONS. CUSTOM SOLUTIONS.



SPECIFICATIONS

The Alternate CEMS can be configured to continuously measure common emission data such as CO, CO₂, NO, NO₂, NO_x, SO₂, H₂S, TRS and O₂, temperature, velocity, volumetric flow and mass emission calculations. Other species can be measured upon request. Emission data can be easily accessed remotely in real-time.

General

- ✓ Auto Calibration: User selected frequency
- ✓ Area Classification: General purpose
- ✓ Ambient Temperature Limits: -40 °C to 40 °C
- ✓ Sample Flow Rate
 - Total Flow: 10 slpm (20 scfh)
 - Analyzer Flow: 0.5 slpm (1.0 scfh)
- ✓ Remote Monitoring Via Cellular Network
- ✓ Dilution Ratio's Available (50-350:1)

Outputs

- ✓ Full Scale Ranges: Custom higher ranges possible on requests
 - NO_x (0 - 20,000 ppm)
 - SO₂ (0 - 20,000 ppm)
 - CO (01-10,000 ppm)
 - CO₂ (0-100%)
 - O₂ (0-100%)
 - H₂S (0-5000 ppm)
- ✓ Output Signals
 - Digital: Modbus TCP/IP or RTU Protocol
 - Analog: 4-20mA (Self Powered) ; 0-10V Outputs
 - Discrete Alarms

Performance Specifications

- ✓ Zero and Span Drift (24 hour): <± 1% Full Scale
- ✓ Accuracy: ± 1% Full Scale
- ✓ Sensitivity: ± 1% Full Scale
- ✓ Linearity: <± 1% Full Scale
- ✓ Repeatability: ± 1% Full Scale
- ✓ Response Time: T95: 100-130 seconds
- ✓ Temperature Measurement Range: 0-1000°C
- ✓ Velocity Measurement Range: 0-40 m/s

Required Services

- ✓ Electrical
 - 240VAC. 50A. Single phase
 - 50/60 Hz.
- ✓ Instrument Air
 - 30 slpm (1.0 scfm)
 - Periodic peaks of up to 55 slpm (2.0 scfm)
 - Minimum of 90 psig
 - Oil free air
 - Minimum dew point: -40°C
 - Sample line lengths up to 500 ft
 - Calibration gas can be provided upon request



ABOUT GLOBAL ANALYZER SYSTEMS

Founded in 1996, Global Analyzer Systems Ltd. is a leader in the emissions monitoring industry. We ensure safe and sustainable air by bringing certainty to emissions measurement. We provide a full complement of specialized and customized CEMS solutions and are committed to keeping industry compliant with regulations.