

DETECTING ETHYLENE OXIDE LEVELS FOR MEDICAL DEVICE STERILIZATION

The BASELINE[®] 9100 Gas Chromatograph Will Easily Track and Document Ethylene Oxide Levels.

Medical devices are often made from hard-to-sterilize materials like polymers or contain multiple layers and parts that aren't easily accessed.

To ensure that devices are completely sterile prior to distribution to hospitals, many companies rely on ethylene oxide gas. About 50% of all sterile medical devices in the United States are sterilized with ethylene oxide, or EtO.

However, EtO is extremely toxic even in small amounts, and occupational and long-term exposures have been linked to increased cancer risk.

Therefore, it's crucial that companies responsible for sterilization ensure EtO is at a safe level before workers enter the gassing chamber and when working in surrounding areas. In addition to detecting very low levels of EtO, companies also need to provide documentation to meet compliance regulations. This makes data collection and retention critical to the overall sterilization process.



**KEEP WORKERS SAFE
THROUGHOUT THE
ENTIRE FACILITY**

FROM THE LOADING DOCK
TO SHIPMENT, THE BASELINE
9100 HELPS MONITOR GAS
LEVELS THROUGHOUT YOUR
STERILIZATION PROCESS.

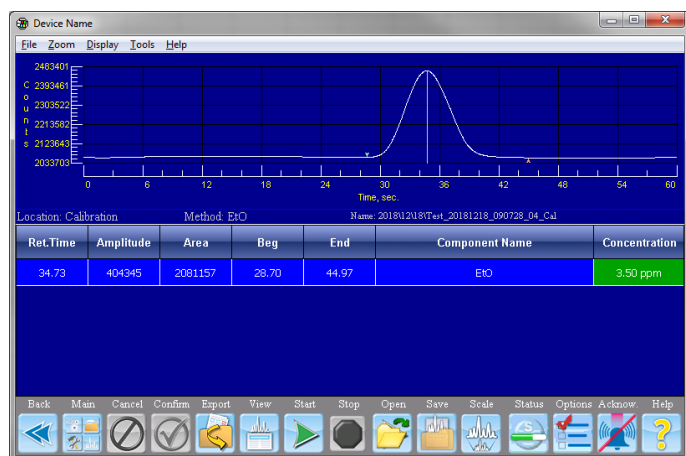
KEEP WORKERS SAFE THROUGHOUT THE ENTIRE FACILITY

APPLICATION NOTE

State-of-the-art Technology With the Reliability and Flexibility of Gas Chromatography

Specifically designed for a lower detection limit (LDL) of less than 1 part per billion, the BASELINE 9100 is an ideal instrument for detecting low EtO levels. It's significantly less costly than other gas detection technologies like FTIR, and provides faster throughput than other gas chromatography instruments.

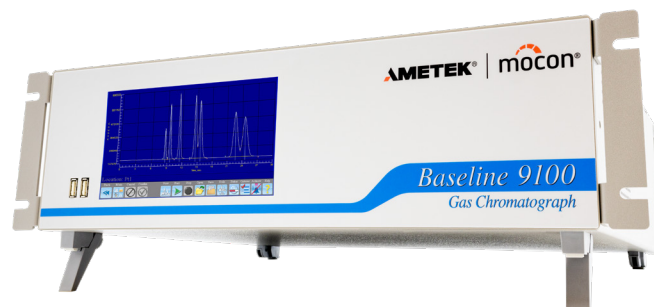
With one analyzer, you can track and document EtO levels of multiple locations within your facility. The 9100 Analyzer features an easy-to-use interface and programmable sequencing, letting you easily monitor EtO in multiple spaces to keep workers safe.



Screen sample - tracking EtO levels

Features and Benefits

- Measures down to <1 ppb, allowing you to easily measure down to OSHA's 8-hour TWA action level of 0.5 ppm
- Has low interference from other gases so you can be confident in an accurate measurement
- Color alert and action levels provide fast visual indication of EtO status
- Intuitive programming of sequences allows you to get information from the right location at the right time
- Color touchscreen LCD display and easy-to-use menu for quick instrument configuration
- Programmable analog outputs to communicate with process management systems
- Programmable relays for diagnostics, concentration, alarms, and events to initiate audible and visual alarms, and control sequences



BASELINE 9100 Gas Chromatograph

Conclusion

Medical device sterilization with ethylene oxide requires stringent safety measures and accurate monitoring to keep workers safe. The BASELINE 9100 Gas Chromatograph not only provides a low detection level to help companies exceed safety standards, but also simplifies data management and program automation.



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