

# Air check ✓ Advantage

## Methyl Bromide Fumigation Monitor

“PureAire Methyl Bromide Monitor is listed as an equivalent method for fumigation monitoring by the California EPA.” -June 2008



### Features

- ✓ Detects Methyl Bromide at sub, (0.5ppm) TLV levels for Fumigation
- ✓ Enhanced self-diagnostic capability decreases downtime and maintenance costs
- ✓ Supervised sensor electronics continuously checks sensor and system status
- ✓ Built-in user selectable local dual level alarms with relay output
- ✓ Local digital display
- ✓ 4-20 mA analog output
- ✓ Low-cost renewable sensor

The PureAire **Air check ✓ Advantage** is a compact, extractive gas monitoring system that's ideal for continuously and remotely monitoring fumigation chambers and fruit storage areas where access may be limited or undesirable. Featuring a special pyrolizer and sample pump, this accurate methyl bromide gas monitor has been tested to provide ultra low 0.3ppm and lower detection of methyl bromide levels in the workplace. PureAire's continuous monitor eliminates the need to subject an employee into fumigation chambers to manually take colorimetric grab samples to determine if an area is safe to enter.

The instrument's "smart" circuitry continuously monitors sensor cell status and sampling system performance. Continuous sensor cell operation is transmitted via 4-20mA signal to PureAire controllers, PLC's or remote alarm systems. Should a system error occur, the **Air check ✓ Advantage** outputs a signal to remote alarm/control systems to immediately alert control room personnel.

The heart of the system is a smart renewable sensor cell linked to a compact pyrolizer. Sample is drawn through the pyrolizer where Methyl bromide is thermally decomposed and converted into another gas that is more easily detected electrochemically. Unlike competitive Methyl bromide detectors and colorimetric tubes which have interferences to humidity, temperature and moisture, the **Air check ✓** sensor and electronics are unaffected by changes in environment. This stability provides true sub TLV measurement of methyl bromide in product storage areas without the need for conversion tables.

## Low Annual Operation Cost

The PureAire **Air check ✓ Advantage** has the lowest annual maintenance costs of any gas monitoring system on the market. PureAire's Renewable Sensor cells are easily recharged with electrolyte right in the field at approximately 20% of the cost of disposable sensor cell type systems. Recharge costs typically run about \$35.00 per sensor every 6 months. Combined with our built-in, low power pyrolizer, and long life sample pump, the **Air check ✓ Advantage** will lower your annual operation costs. When compared to the annual cost of disposable colorimetric stain tubes, it will pay for itself in just a few months!

## Connects to DCS and PLC Controls

The **Air check ✓ Advantage** transmits continuous gas concentration levels to any distributive control system, programmable logic controller or PureAire's proprietary single and multichannel controllers. The monitoring system Monitor can be operated remote up to 1,000 meters, 0.6 miles from centralized distributive control systems.

## Specifications

Sampling Method	Extractive sample draw
Range	0-10ppm, 0-30ppm
Accuracy	± 10% of reading
Operating Temperature	-4 to +122F (-20 to +50C)
Available Gases	Methyl Bromide. Other gases available; consult PureAire.
Sensor Type	Renewable electrochemical sensor
Gas concentration indicator	Built-in LCD digital display, (back lit) Displays, Gas name & ppm concentration, AL1, AL2, System fault messages
Signal Outputs	4-20 mA analog output Alarm Level 1 - SPDT AC 125V, 0.3 A max. Alarm Level 2 - SPDT DC 30V, 1.0 A max resistive load Fault - SPDT Fail safe
Sampling Distance	100 feet (30 meters) (Longer sampling lengths available)
Sample Pump	Electromagnetic DC diaphragm pump
Power Requirements	24 VDC 2.0 amp
Dimensions	10.0" W x 7.0" H x 7.0" D (254mm W x 178mm H x 178mm D)
Weight	8 lbs. (3.62 kg)
Enclosure	Polycarbonate NEMA 4 (Class 1 Div, Groups B, C & D explosion proof is optional)