

AirSentry® II

Point-of-Use Ion Mobility Spectrometer (IMS)



The AirSentry® II family of ion mobility spectrometers detect and alert users to small concentrations or changes in airborne levels of chlorides, acids, amines and ammonia-containing species. With parts-per-trillion (ppt) sensitivity, these point-of-use sensors provide fast response, increased detection selectivity and repeatable performance.

Combining Air Sentry II sensors with a central software platform allows for easy data acquisition and analysis. The AirSentry II family of sensors provide continuous actionable data, to enable efficient response to contamination sources and events.

BENEFITS

- Continuous AMC monitoring of critical locations
- Robust and reliable data acquisition, control and analysis
- Long-term data stability
- Lowest cost-per-test

FEATURES

- High-sensitivity detection of acids and bases (amines, ammonia and chlorides)
- Versatile product configuration for point-of-use, multi-point and mobile monitoring applications
- Compact size allows placement in any location
- Ethernet, RS-232, 4-20 mA outputs

APPLICATIONS

- Real-time corrosion monitoring within etch process locations
- Real-time amine and ammonia monitoring within critical lithography systems
- Quantification of chemical filter efficiency
- Tracking and troubleshooting of contamination sources throughout cleanroom and in process tools
- Analysis of contamination within FOUP wafer storage modules

AirSentry[®] II

Point-of-Use Ion Mobility Spectrometer (IMS)

Specifications

Contaminants detected	Individual analyzers to detect Ammonia, Amines, or Acids
Range	0 – 50 ppb _v
Sample flow	< 1000 cc/min
LDL (3σ)*	70 ppt _v
Response time	< 5 min to 95% (Dry)
Cleardown time	< 5 min to 5% (Dry)
Temperature range	Operating: 59 – 86 °F (15 – 30 °C) Storage: - 40 – 122 °F (- 40 – 50 °C)
Humidity range	Operating: 30 – 60% RH Storage: 0 – 90% RH
Dimensions (H x W x L)	4 x 9 x 12 in (10 x 23 x 31 cm)
Weight	5 lb (2.3 kg)

* 5 minute sample averaging, 760 Torr

Utility Requirements

Power	100 – 240 VAC (50/60 Hz), 60 W
Clean Dry Air (CDA)	< 1000 cc/min, < - 60 °C dew point, 5 psig pressure regulated, no particles > 50 μm, hydrocarbon free
Vacuum	< 33 kPa (absolute)

Communication

Data output	Ethernet (to Facility Net software), RS-232 (to HyperTerminal), 4-20 mA
User interface	4 LEDs, 2 buttons (Zero/Span Calibration)

AirSentry[®] is a registered trademark of Particle Measuring Systems, Inc.
Patent details available at pmeasuring.com/trademarks-patents.
Particle Measuring Systems, Inc. reserves the right to change specifications without notice.
© 2018 Particle Measuring Systems, Inc. All rights reserved.

HEADQUARTERS

5475 Airport Blvd
Boulder, Colorado 80301 USA
T: +1 303 443 7100, +1 800 238 1801

Instrument Service & Support
T: +1 800 557 6363

Customer Response Center
T: +1 877 475 3317
E: info@pmeasuring.com

www.pmeasuring.com
info@pmeasuring.com



**PARTICLE
MEASURING
SYSTEMS[®]**
a spectris company

GLOBAL OFFICES

AUSTRIA
T: +43 512 390 500
E: pmsaustria@pmeasuring.com

BENELUX
T: +32 10 23 71 56
E: pmsbelgium@pmeasuring.com

BRAZIL
T: +55 11 5188 8227
E: pmsbrazil@pmeasuring.com

CHINA
T: +86 21 6113 3600
E: pmschina@pmeasuring.com

FRANCE
T: 33(0)1 60 10 32 96
E: pmsfrance@pmeasuring.com

GERMANY
T: +49 6151 6671 632
E: pmsgermany@pmeasuring.com

ITALY
T: +39 06 9053 0130
E: pmsrl@pmeasuring.com

JAPAN
T: +81 3 5298 8175
E: pmsjapan@pmeasuring.com

KOREA
T: +82 31 286 5790
E: pmskorea@pmeasuring.com

MEXICO
T: +52 55 2271 5106
E: pmsmexico@pmeasuring.com

NORDIC
T: +45 707 028 55
E: pmsnordic@pmeasuring.com

PUERTO RICO
T: +1 787 718 9096
E: pmspuertorico@pmeasuring.com

SINGAPORE
T: +65 6496 0330
E: pmsingapore@pmeasuring.com

SWITZERLAND
T: +41 71 987 01 01
E: pmsswitzerland@pmeasuring.com

TAIWAN
T: 886-3-5525300 Ext: 301
E: pmstaiwan@pmeasuring.com