

## **Product Data**

### Air Quality Transmitter



ACI/AQS



### **Product Description**

The ACI/AQS series air quality sensors measure the level of contaminate gases within a controlled space and converts the 0 to 100% contaminate level to a 4 to 20mA (2 to 10VDC) or 0 to 10VDC (0 to 20mA) signal. An RS-485 modbus output is available upon request. Please specify when ordering. This sensor may be used as either a controller or transmitter by setting the software with the ACI/AQS-HC Hand Held Calibrator. This unit is factory calibrated for use in Office Buildings, Schools, etc. If this sensor is to be used in applications such as Service Garages or Industrial Plants, the unit will have to be field calibrated using the ACI/AQS-HC, since their are no adjustment potentiometers on the ACI/AQS.

The use of a specially designed sintered semiconductor sensor allows the ACI/AQS to accurately measure the level of Volatile Organic Compounds (VOC'S). This signal can then be used to control a damper, regulating the amount of fresh air introduced by a ventilation plant, thereby saving on the energy costs of heating or cooling fresh air during periods of little or no occupancy.

The AQS Transmitter/Controller works by looking at the signal as a full spectrum sensor, automatically compensating for temperature and humidity effects, and calculating the overall degree of pollution on a scale from 0 to 100%. The sensor is sensitive to a wide variety of air pollutants such as carbon monoxide, ketones, aldehydes, esters benzene, alcohols, hydrogen, reducing hydrocarbons, and cigarette smoke. Please note that this sensor should not be used to monitor a specific gas, but should be used when monitoring the overall air quality of the indoor space or environment.

These units must be powered with +15 to 30VDC and are offered in both room and duct configurations. Please contact ACI for further information regarding this product

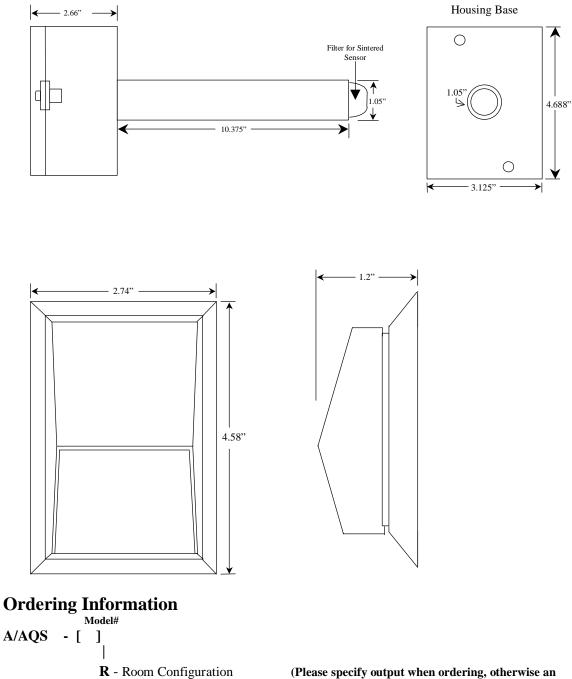
Supply Voltage	+15 to 30VDC	Output Impedance	> 1K Ohms for Voltage
			1000 x Vs/24 for Current
Supply Current	50 mA	<b>Operating Temp. Range</b>	$-10 \text{ to } 60^{\circ}\text{C} (14 \text{ to } 140^{\circ}\text{F})$
Output	4-20 mA and 2-10 VDC (Standard),	Operating Humidity	10 to 95% non-condensing
	0-20 mA and 0-10 VDC, (Specify when ordering),		
	RS-485 Output (Specify when ordering)		
Agency Approvals	None	<b>Environmental Compliance</b>	RoH's – Directive 2002/95/EC
		_	WEEE – Directive 2002/96/EC

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### **Product Specifications**

#### Dimensions



**D** - Duct Configuration

A/AQS-HC must be ordered for all field modifications)

Example: A/AQS-R or A/AQS-D

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