



## Features & Options

- Achieves True Indoor Air Quality, Not Just CO<sub>2</sub> Dilution
- Output is Correlated to a CO<sub>2</sub> Value Allowing You to Ventilate Using ASHRAE's CO<sub>2</sub>-Based VRP Algorithm
- BAPI-Stat 4 Style Enclosure with 0 to 5 or 0 to 10 VDC Output

Humans respire Volatile Organic Compounds (VOCs) as well as CO<sub>2</sub>. The BAPI sensor measures these VOCs and indicates when a space is occupied just as well as a CO<sub>2</sub> sensor.

The advantage of the VOC sensor is that it measures air contaminants from other sources besides respiration, such as building materials, cleaners, perfumes and furniture and carpet off-gassing. Using this sensor for Demand Controlled Ventilation then is a way of achieving true indoor air quality, rather than just CO<sub>2</sub> dilution.

A further benefit is that it requires no additional work on your part. That's because the sensor converts the VOC reading to a CO<sub>2</sub> equivalent level. This lets you use ASHRAE's CO<sub>2</sub>-based VRP schedule to ventilate. (More information on the CO<sub>2</sub> equivalent output is available on our website at or in the Application Notes at the end of this section of the catalog.)

The VOC Room Sensor in the BAPI-Stat 4 Enclosure features 0 to 5 VDC or 0 to 10 VDC output with an optional indication of the VOC level as "Good, Fair or Poor" by a three-color LED on the front of the unit.



VOC Sensors in the BAPI-Stat 4 Enclosure

## Specifications

### Power:

12 to 24 VDC, 50 mA Peak  
18 to 24 VAC, 1.5 VA Peak

### Selectable Output:

0 to 2,000 PPM CO<sub>2</sub> at 0 to 5 or 0 to 10 VDC

**Sensing Element:** Micro-machined Metal Oxide

**Termination:** 3 Terminals, 16 to 22 AWG

**Wiring:** 2 Pair

### Operating Environment:

32 to 122°F (0 to 50°C)  
5 to 95%RH non-condensing

### Enclosure Material:

ABS Plastic, Material Rated UL94V-O

**VOC Detection Range:** 0 to 2000 ppm CO<sub>2</sub> Equivalent

**Start-Up Time:** 15 Minutes

### Response Time:

Less Than 2 Minutes (after Start-Up Time)

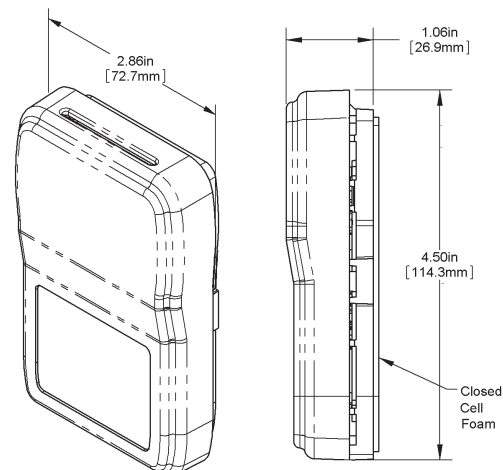
**Mounting:** 2"x4" J-Box or drywall – screws provided

### Optional LED VOC Level Indicator:

Good, Green < 1,000 PPM  
Fair, Orange = 1,000 to 1,500 PPM  
Poor, Red > 1,500 PPM

**Certifications:** RoHS

**Warranty Period:** 5 Years





## **Ordering Information: BAPI-Stat 4 VOC Sensor**

<u>Part #</u>	<u>Description</u>
<b>BA/BS4-VOC05-LED</b> .....	BAPI-Stat 4 Room VOC Sensor, 0 to 5V Output, 3-Color LED
<b>BA/BS4-VOC05-BNK</b> .....	BAPI-Stat 4 Room VOC Sensor, 0 to 5V Output, No LED
<b>BA/BS4-VOC10-LED</b> .....	BAPI-Stat 4 Room VOC Sensor, 0 to 10V Output, 3-Color LED
<b>BA/BS4-VOC10-BNK</b> .....	BAPI-Stat 4 Room VOC Sensor, 0 to 10V Output, No LED

