



Features & Options

- Accurate Dew Point and Dry Bulb Temperature in One Unit
- ±1.8°F (1°C) Dew Point Accuracy for the Normal Range
- No Installation Calibration or Recalibration Required

The green revolution is increasing the use of chilled beams and chilled ceilings in commercial buildings. Chilled water is pumped through hollow beams or special hollow ceiling tiles. Radiation cools the space eliminating air handlers, VAV boxes, fan-coil units and the energy to run them.

The temperature of the chilled water has to be regulated above the space's air dew point temperature. If the beam or ceiling temperature is below the space's dew point, they will "sweat", causing mold and dripping water.

BAPI's Dew Point Sensor is an easy and economical way to measure the dew point temperature. The unit is available with an optional display, temperature setpoint slider and an occupant override pushbutton. The large LCD can display Dew Point Temperature and Dry Bulb Temperature and is field adjustable between °F or °C.



Dew Point Sensors with Setpoint, Display and Override

Specifications

Power: 15 to 35 VDC @ 4 mA max

Sensing Element:

Humidity – Capacitive Polymer, ±2% RH Accuracy, 10% to 90% @ 25°C

Optional Temperature Sensor

Thermistor or RTD (See "Sensors" Section for Specs.)

Mounting:

2"x4" J-Box or drywall mount, screws provided

Dew Point Temperature Range:

-4 to 122°F (-20 to 50°C)

Operating Environment:

Temperature: 32 to 122°F (0 to 50°C)

Humidity: 0 to 95%RH non-condensing

Response Time: Less Than 60 Seconds

Display: 3.5 digit numeric (Dew Pt & Dry Bulb Temp)

Measurement Offsets (field adjustable)

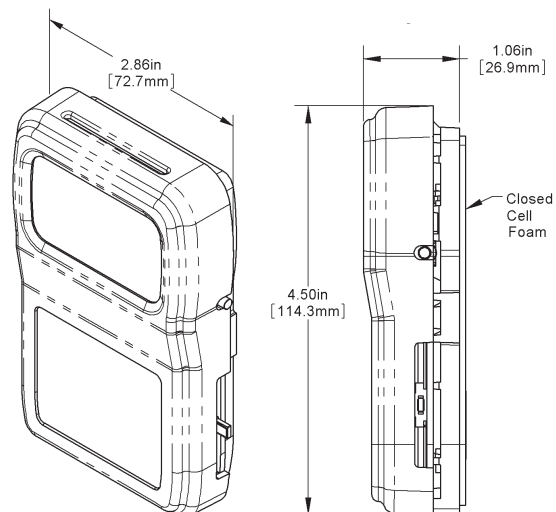
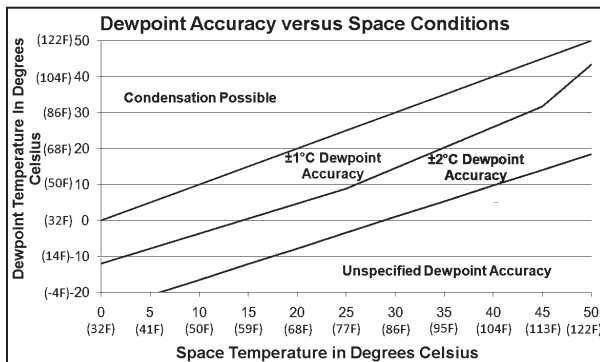
±5° (F or C) in 0.1° or 0.5° increments – DB
±5 RH in 0.1% or 0.5% increments – RH

Analog Output (0 to 5 or 0 to 10VDC, 1KΩ impedance)

Dew Point Temperature: -4 to 122°F (-20 to 50°C)

Material: ABS Plastic, Material Rated UL94V-0

Certifications: CE, RoHS



Note: BAPI recommends that you do not run wiring for the room units in the same conduit as line voltage wiring or with wiring used to supply highly inductive loads such as motors, generators and coils.





Use the Option Selection Guide below to create your custom part number. Replace the number and parenthesis with the designator for each selection. Skip the designator and dashes for optional selections that are not required in your configuration.

BAPI-Stat 4 Humidity Sensor Option Selection Guide:

BA/ (#1) - (#2) - (#3) - (#4) (#5) - (#6) - (#7) - (#8) - (#9)

#1: Dew Point Output (required)

- DP05..... 0 to 5V Dew Point Output
- DP10..... 0 to 10V Dew Point Output

#2: Temperature Sensor (optional)

- 1K[375]..... 1K Platinum RTD (375 curve)
- 1K..... 1K Platinum RTD (385 curve)
- 1.8K..... 1.8K Thermistor
- 3K..... 3K Thermistor
- 10K-2..... 10K-2 Thermistor
- 10K-3..... 10K-3 Thermistor
- 10K-3[11K]. 10K-3[11K] Thermistor
- 20K..... 20K Thermistor

#3: Display and Indication (required)

- B4DF..... Temperature Displayed in °F
- B4DC..... Temperature Displayed in °C
- B4DX..... No Display

#4: Setpoint Display Range (optional)

- A..... -3 to +3
- B..... -5 to +5
- C..... 50 to 90 °F or 10 to 32 °C
- D..... 55 to 85 °F or 13 to 30 °C
- E..... 60 to 80 °F or 15 to 27 °C
- F..... 65 to 80 °F or 18 to 27 °C

#5: Setpoint Output Range (optional)

- 60..... 0 to 10 kΩ
- 80..... 0 to 20 kΩ
- 81..... 4.75 k to 24.75 kΩ
- 82..... 6.19 k to 26.19 kΩ
- 84..... 10 k to 30 kΩ

#6: Setpoint Legend (required)

- L6..... Cool/Warm
- L0..... No Legend

#7: Occupant Override (required)

- J..... Override as a Separate Output
- N..... Override in Parallel (//) with Sensor
- P..... Override in Parallel (//) with Setpoint
- Z..... No Override

#8: Communication Jack (optional)

- C35L..... 3.5 mm Phono Style Jack

#9: Logo Plate Color (required)

- WMW..... Warm White (matches enclosure)
- GRY..... Gray

Additional options are available for these units but not shown in this Selection Guide. Contact your BAPI representative for the complete list of options. Submittal sheets without List Prices can be downloaded from our website at www.bapihvac.com

Example Number: BA/ (DP05) - (10K-2) - (B4DF) - (E)(80) - (L6) - (N) - () - (WMW)

Actual Number (with parenthesis removed): BA/DP05-10K-2-B4DF-E80-L6-N-WMW

Description: 0 to 5V Dew Point Output, 10K-2 Thermistor Temperature Sensor, BAPI-Stat 4 Unit with Display and °F Indication, 60 to 80°F Setpoint Display Range, 0 to 20KΩ Setpoint Output Range, Cool/Warm Setpoint Legend, Override in Parallel with Sensor, Warm White Logo Plate Color

Your Number: BA/

