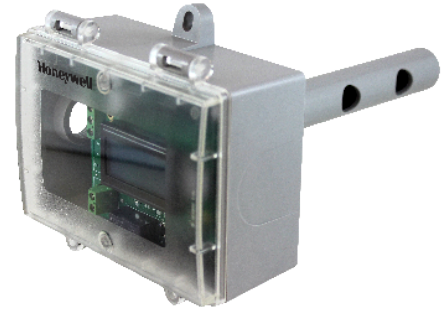


## HCHTDTF1VX-EU Series of Carbon Dioxide, Humidity and Temperature Transmitter



The CO<sub>2</sub>/RH/T transmitter incorporates three sensors in one duct mount enclosure for the most efficient environmental monitoring and control system. A field-proven RH sensor to monitor relative humidity from 0-100 %RH and curve-matched thermistor to measure temperature over common field-selectable ranges. All measurements are continuously available on separate outputs as linear analog signals. The device includes an LCD for configuration and operating parameters are programmed using a keypad for specific applications.

### APPLICATIONS

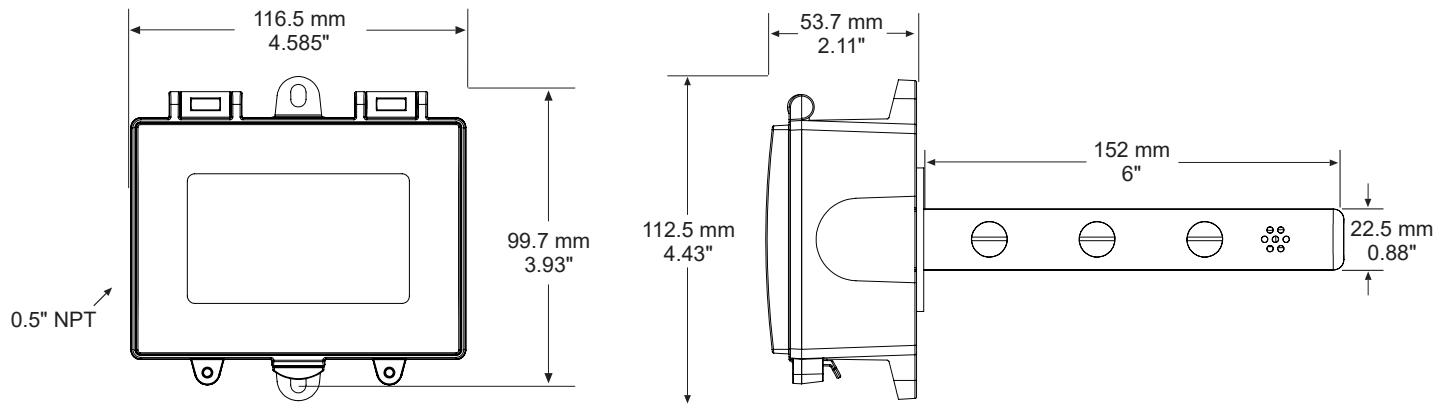
The HCHTDT-EU carbon dioxide and temperature transmitter is designed for use with commercial heating and cooling systems.

### SPECIFICATIONS

Power Supply .....	20 - 28 Vac/dc (non-isolated half-wave rectified)
Consumptions.....	79 mA max @ 24 Vdc, 129 mA max @ 24 Vac
Output Signals.....	0-5 Vdc / 0-10 Vdc (field selectable)
Output Drive Capability.....	5 KΩ minimum
Output Resolution.....	10 bit PWM
Input Voltage Effect .....	Negligible over specified operating range
Protection Circuitry .....	Reverse voltage protected, overvoltage protected
Operating Conditions.....	0-50°C (32-122°F), 0-95 %RH non-condensing
LCD Resolution .....	1 ppm CO <sub>2</sub>
LCD Size .....	35 mm W x 15 mm H (1.4" x 0.6") alpha-numeric 2 line x 8 characters
LCD Backlight.....	Enable or disable via keypad
Wiring Connections .....	Screw terminal blocks, 14 to 22 AWG
Enclosure.....	Polycarbonate, UL94-V0 IP65 (NEMA 4X) Includes thread adapter (1/2" NPT to M16) and cable gland fitting
Probe.....	152 mm L x 22.5 mm D (6" x 0.85")
<b>CO<sub>2</sub> Signal</b>	
Measurement Type.....	Non-Dispersive Infrared (NDIR), diffusion sampling
Measurement Range .....	0-2000 ppm
Standard Accuracy .....	+30 ppm +3% or reading 0-2000 ppm range with Auto Cal,
Temperature Dependence.....	0.2 %FS per °C
Stability .....	2 %FS over life of sensor (15 years typical) 0-2000 ppm
Pressure Dependence.....	0.13% of reading per mm Hg

Altitude Correction.....	Programmable from 0-5000 ft via keypad
Response Time.....	<2 minutes for 90% step change typical
Warm-up Time .....	<2 minutes
<b>Temperature Signal</b>	
Sensing Element .....	10K thermistor, +0.2°C (+0.4°F)
Range .....	0 to 35°C (32 to 95°F) 0 to 50°C (32 to 122°F) selectable via keypad
Range.....	0.1°C
<b>RH Signal</b>	
Sensor .....	Thermoset polymer based capacitive
Accuracy.....	+2 %RH
Range .....	0-100 %RH, non-condensing
Resolution.....	2 %RH
Hysteresis.....	+3 %RH
Response Time.....	15 seconds typical
Stability.....	+1.2 %RH typical @ 50 %RH in 5 years
Country of Origin .....	Canada

# HCHTDTF1VX-EU Series of Carbon Dioxide, Humidity and Temperature Transmitter



**RoHS**  
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ORDERING: HCHTDTF1VX-EU

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