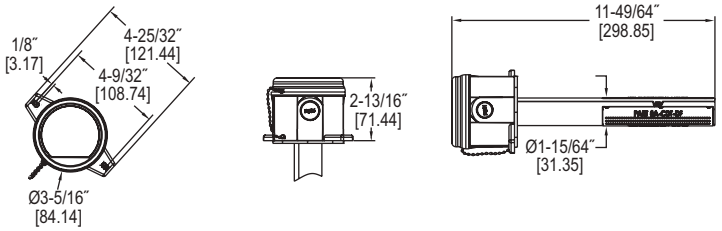
Dwyer

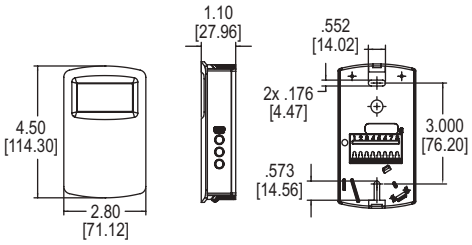
SERIES CDTV

CARBON DIOXIDE/VOLATILE ORGANIC COMPOUND TRANSMITTERS

Simultaneously Outputs Both CO_2 / VOC

North American style





The **Series CDTV Carbon Dioxide/Volatile Organic Compound Transmitters** reduce energy cost in buildings by lowering the amount of conditioned air based on the occupancy of the space. By sensing both CO_2 and VOC, the transmitter can detect fumes that may need to be exhausted during lower occupancy periods.

BENEFITS/FEATURES

- Combination VOC and CO_2 outputs reduce labor and material costs
- Single beam dual wavelength NDIR CO_2 sensor allows for use in spaces that may be occupied 24 hours a day
- VOC output is correlated to be equivalent to CO_2 measurements
- Ventilate using ASHRAE's occupancy-based VRP Algorithm

APPLICATIONS

- HVAC applications in hospitals, schools, and commercial buildings
- Demand control ventilation
- Odor control
- Waiting rooms or other spaces that may be occupied 24 hours a day

MODEL CHART

Example	CDTV	-2	D	4	A	4	-RLY	CDTV-2D4A4-RLY
Series	CDTV							Carbon dioxide/VOC transmitter
Range		2 5						0 to 2000 PPM CO_2 range 0 to 5000 PPM CO_2 range
Configuration			D N					Duct North American style wall mount
CO_2 Output				4				4-20 mA / 0 to (5 or 10) VDC
Temperature Output					0 A B C D E F			None 10 KΩ NTC thermistor type III 10 KΩ NTC thermistor type II 3 KΩ NTC thermistor Pt100 Ω RTD Pt1000 Ω RTD 20 KΩ NTC thermistor
VOC Output						4		4-20 mA / 0 to (5 or 10) VDC
Options							COC FC LCD RLY	Certificate of calibration Factory calibration certificate LCD display (wall only) Relay

SPECIFICATIONS

Range: CO_2: 0 to 2000 or 0 to 5000 PPM (depending on model); VOC: 0 to 2000 PPM CO_2 equivalent.
Accuracy: CO_2: ±40 PPM ±3% of reading.
Temperature Dependence: ±8 PPM / °C at 1100 PPM.
Non-Linearity: CO_2: 16 PPM.
Pressure Dependence: CO_2: 0.13% of reading per mm of Hg.
Response Time: CO_2: 2 minutes for 99% step change; VOC: 5 minutes.
Temperature Limits: 32 to 122°F (0 to 50°C).
Duct Air Velocity Range: 0-4000 FPM (20.32 m/s).
Power Requirements: 16-35 VDC / 19-28 VAC.
Power Consumption: Average: 2 watts; Peak: 3.75 watts.
Sensor: CO_2: Single-beam, dual-wavelength NDIR; VOC: MEMS metal oxide semiconductor.
Output: Current: 0-20 mA, 4-20 mA, 0-10 mA, or 2-10 mA (depending on selection jumper, max 500 Ω); Voltage: 0-10 VDC, 2-10 VDC, 0-5 VDC, or 1-5 VDC (depending on selection jumper, min 500 Ω); Relay: SPST NO 2A @ 30 VDC.
Enclosure Rating: Duct mount: NEMA 4X (IP66) for housing only; Wall mount: IP20.
Weight: 5.6 oz (158.8 g).
Agency Approvals: CE.