PARKGUARD S/T wireless

Wireless CO detection and ventilation control system.

APPLICATIONS: Single or multi-level, enclosed, vehicular structures including; parking ga - rages, truck loading docks, vehicle maintenance facilities, airplane hangers, tunnels and warehouses where an accumulation of hazardous gases may occur.

Reliable, self-healing, wireless mesh net - work provides signal routing redundancy between sensors and controller.

Multi-zone, multi-sensor system utilizing electro-chemical gas detection.

Long-lived , plug-in, battery/sensor car - tridge eliminates need for separate sen - sor battery replacement schedules.

Immediate savings with wireless installation.

Reduce energy costs, reduce ventilation maintenance costs. Why run ventilation systems when you don't have to?

Low system maintenance.

Factory-direct support.

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PARKGUARD S/T wireless

24 Hour Carbon Monoxide Wireless Sensor /Transmitter using industry leading XBee-Pro® DigiMesh wireless mesh architecture

Developed for large enclosed parking structures

PARKGUARD S/T-Wireless parking garage CO sensor/transmitter system features an integrated mesh network of wireless transmitters and central controller. The PARKGUARD central controller interfaces with standard independent programmable logic controllers (PLCs), distributed control systems (DCSs), energy, and building management systems (BMS). The PARKGUARD Sensor/Transmitter continuously monitors CO concentrations. If CO values exceed set limits, dampers, supply and exhaust fans are engaged via wireless remote relay modules.

PARKGUARD CO monitoring satisfies local code requirements and reduces energy costs required for ventilation of enclosed areas used for vehicle parking, repair and operation.

Reliable Sensor Technology

Highly stable and long lasting state-of-the art electrochemical sensing technology combines the economy of a galvanic cell with a highly efficient electrolyte for a virtually maintenance-free, sensor with a life expectancy of 5 years.

Simple Installation & Field Testing

Each PARKGUARD S/T sensor is factory calibrated, requiring only a simple response check after installation. Replaceable sensor body with separate zero and Span adjustments allow simple field calibration.

Wireless Transmission Option Provides Immediate Installation Savings

CO monitoring system installation cost is significantly reduced by the wireless transmitter option. Additionally, maintenance is minimized with wireless transmitter batteries featuring an expected life of up to 5 years. The system provides audible and visual alerts for battery replacement. The PARKGUARD S/T Controller will relay battery requirements to appropriate end user systems.

Built-in Redundancy of Wireless Data Transmission

Operating on an XBee-Pro® DigiMesh wireless mesh network, PARKGUARD S/T wireless transmission provides safety and data integrity. In a mesh network, transmitter modes are interconnected with other nodes so that at least two pathways connect each node. Connections between nodes are self routing and able to connect to other nodes as needed. The characteristics of mesh topology and ad-hoc routing ensure complete stability in changing conditions, independent of a single node failure.

Sensor Specifications*

Sensing Method: Electrochemical
Approval: Meets UL2034, EN50291 and RoHS requirements
Sensor Rated Life: 5 years at 20°C/50% RH
Sensor Battery Life: 3 - 5 years depending on user settings

Operating Ranges:

Temperature: -10°C to +60°C (continuous)
-40°C to +70°C (intermittent)
Humidity: 5-99% RH Non-Condensing

Performance Characteristics (at 20°C/50% RH)
Available Ranges: 0-100ppm thru 0-200ppm
Resolution: 1ppm; Sensitivity 1ppm
Repeatability: +/-5% of measured value
Linearity: Linear over measured value
Response Time: T90 = <60 seconds

Electrical Properties:

Operating Voltage: 10 to 30VDC
Output Signal: 4/20mA, 2 wire loop powered
4-wire RS485, 24 VDC
or

Wireless Option:

Technology: XBee-Pro® DigiMesh
Network: Mesh
Indoor/Urban Range: Up to 450 ft
Outdoor/Line-of-site: Up to 1.8 miles
RF Data Rate: 250 kbs
Supply Voltage: 2.8-3.4V
Transmit Current (typical): 215mA
Idle/Receive Current (typical): 80 mA
Power Down Current: <60 µA
Frequency: ISM 2.4 GHz
Antenna: External

Enclosure: ABS Plastic, UL94V-0, NEMA 4/12/13 rated
Weight: 12 oz
Size: 4" x 4" x 3"

* Specifications subject to change

Warranty

PARKGUARD® is guaranteed for one year from the date of shipment. Any device found defective in that period will be repaired or replaced free of charge. Read terms and conditions of sale for complete warranty information.

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