

- Lower Installation Costs
- Add Controls to Difficult-To-Wire locations
- Compatible with all Andover Continuum BACnet Field 4.5 Controllers
- 2.4 GHz Wireless Mesh Technology
 - Auto-Connection
 - Self Healing
- Wireless Adapter Powered by Controller
- Wireless Repeaters
- Wireless Survey Tool
- Software Selectable Channels
- Small and Attractive Form Factor Suitable for Architectural Space

Andover Continuum[™] Wireless BACnet Field Bus

Andover Continuum is the first BACnet system to offer a Wireless BACnet Field Bus solution. Wireless technologies can be found in all the corners of the globe from cell phones to wireless hotspots in an airport, where a traveler can browse the Internet – as a result, wireless has lowered installation costs while providing a level of connectivity freedom never before seen. The Andover Continuum Wireless BACnet solution now introduces these cost savings and ease of installation benefits to the BACnet world of open protocol building automation.

FEATURES/BENEFITS

Lower Costs and Solve Wiring Challenges

Wiring a field bus can be very labor intensive. Many field buses require controllers to be wired as a daisy chain, increasing the run lengths. Furthermore, certain controller locations may be extremely hard to wire, yet easily accessed by wireless. Wireless solves these challenges while greatly reducing the labor required for connectivity.

Full Family of Wireless BACnet B-AAC Controllers

Any one of the 17 BTL listed Andover Continuum BACnet controllers with version 4.5 firmware can become part of a wireless mesh. As a wireless BACnet controller, these controllers support the same BACnet objects and services as when they are wired to an MS/TP field bus and meet the requirements of a BACnet Advanced Application Controller (B-AAC) with support for BACnet trends per ASHRAE 135-2004.

2.4 GHz Wireless Mesh Provides High Reliability

Like a spider web, a wireless mesh becomes stronger with every node that is added to the system. If a node becomes unreachable, the mesh simply heals itself by connecting to the next nearest neighbor's. The wireless nodes operate at the 2.4 GHz wireless frequency, which has been approved for use in countries worldwide. The transmission level of each node can be attenuated by the software for use in radio sensitive environments. The software can also be used to select channels for systems with multiple buses.

Small, Attractive Wireless Adapter/Repeater

The Andover Continuum BACnet controller communicates wirelessly when a Wireless Adapter is connected to its service port. The adapter itself contains the wireless antenna and can be mounted up to six feet from the controller. The adapter is powered directly from the 3.3V power feeds of the service port. Power kits are available to run the adapter as a repeater to bridge controllers that are far apart. The adapter is plenum rated and may be mounted outside the controller enclosure or within an architectural space. The adapter is light and mounts with a single screw, adhesive tape, or tie warp.

Wireless Survey Tool for Mesh Optimization

Visualize your wireless mesh with the Wireless Survey Tool. The survey tool automatically discovers all wireless adapters and repeaters while showing the signal strength of each node and the line quality of each connection. The graphic display allows you to arrange the wireless nodes over a floor plan graphic, making it easy to see if the placement of the wireless adapter needs to be modified or if repeaters need to be added.



DIMENSIONAL DRAWINGS

CONNECTOR DETAILS



SPECIFICATIONS

Wireless BACnet Field Bus

POWER

Input Power

3.3 VDC +/- 5% @ 75 mA Wireless Adaptor: Supplied by controller via service port connection Wireless Repeater: Supplied by 120/240 VAC to 3.3 VDC transformer power kit

ENVIRONMENTAL

Standard Operating Temperatures -40° to 85° F

Storage Temperature -40°-185° F (-40°-85° C)

Humidity (non-condensing) 0 - 95%

COMMUNICATIONS/ **CONNECTIONS**

Wireless Communications Frequency Range: 2.4 GHz with 16 software selectable channels

Standard: IEEE 802.15.4

Speed: 250 Kbps

Output power: 0 to +10dBm software selectable

Range: up to 150m (492 ft.) Outdoor line of sight up to 30m (100ft) Indoor Distances vary based on environmental conditions

RS-485 Speed: 9600 to 76.8K baud RS-485 Connector: 4 pin connector (2 pins comm., 2 pins power)

AGENCY LISTINGS (Pending)

Emissions Certifications FCC Rules and Regulations CFR 47, Part 15. Class C IC RSS 210 (Canada) AS/NZS 3548 (Australia/New Zealand) (CTick) RoHS: 2002/95/EC WEEE: 2002/96/EC

UL Approval UL 916

CE Approval 89/336/EEC - EMC directive EN300328 EN301489

Specifications subject to change.

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