# enteliBUS™



# Automation Engine: Controller (eBCON)

## **Description**

The enteliBUS™ Controller (eBCON) is a fully programmable native BACnet® Building Controller. The Controller supports multiple communications methods including, as standard, BACnet/IP, BACnet® over Ethernet, BACnet MS/TP and Delta LINKnet.™

The Controller integrates the functions of the enteliBUS Manager and the enteliBUS Expander into a single compact module. This single module contains the primary CPU, memory storage, external communication ports, and direct I/O control for up to 4 enteliBUS I/O Modules.

The Controller comes bundled with a controller Backplane that holds up to 4 I/O Modules. A connector on the Backplane allows for further I/O expansion. Up to 8 Backplanes (and associated I/O Modules) can be controlled from a single enteliBUS Controller module.



# **eBCON**

#### **Application**

The enteliBUS Control System is made up of multiple modular components that you select to meet the exact needs of a wide range of HVAC and Access control applications.

The enteliBUS Controller, with associated I/O Modules, provides a small footprint controller perfect for applications with limited mounting space. It can be used as a low density distributed controller, or expanded with additional Backplanes/modules for high density I/O applications.

#### **Features**

- Native BACnet firmware
- Fully programmable
- BACnet Ethernet, BACnet/IP, and BACnet MS/TP comm. ports
- Modular, expandable I/O
- Advanced fault detection & diagnostics
- SD card memory expansion
- Firmware upgrade & database load/ save over the network
- LED status indications of power/ scan and communication ports
- Small footprint, DIN rail mountable
- Modular design provides flexibility, ease of service, and reduced cost for future upgrades

# **Specifications**

#### **BACnet Device Profile**

BACnet Building Controller (B-BC)

## Technology

ARM9 32-bit RISC CPU

64 MB Flash memory

32 MB SDRAM memory

SD/SDIO card slot for memory expansion

Real-time clock (temperature compensated)

Ultracap power backup for RTC & memory

LED indication of CPU and scan status

#### **Communication Ports**

Twisted Pair Ethernet (10/100). BACnet/IP & BACnet over Ethernet protocols supported.

RS-485 Port (up to 76800 bps). BACnet MS/TP and Delta LINKnet protocols supported.

**USB Host Port** 

## Device Type/Addressing

BACnet address set via software

#### Connectors

Removable screw-type terminal connectors

#### Wiring Class

Class 2 / SELV

# Power

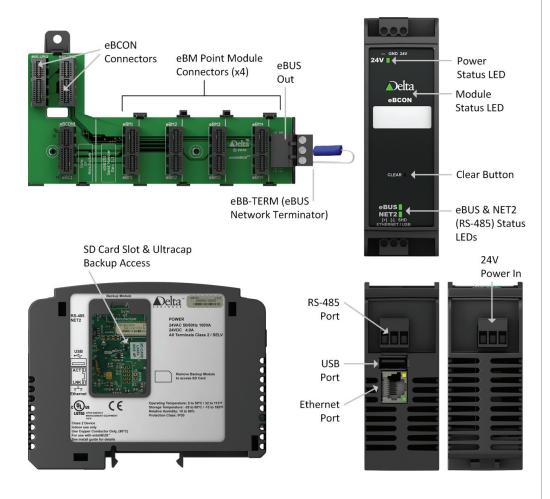
24VAC/DC

6VA, 100VA max with fully loaded I/O Modules\*

\*eBCON supplies power for up to 4 I/O Modules via the Controller Backplane.

# enteliBUS™

# eBCON: Board Layout Diagram



# Specifications (Continued)

#### **Ambient**

0° to 55°C (32° to 131°F) 10 - 95% RH (non-condensing)

## **Dimensions**

eBCON\*

12.6 x 14.5 x 10.0 cm (5.0 x 5.7 x 4.0")

\*Dimensions given are for eBCON package with associated controller Backplane.

#### Mounting

Backplane: Snap mounts to standard 35mm DIN rail

eBCON: Snap mounts to Backplane & DIN rail assembly

# Enclosure Protection Rating

Compliance

CE

FCC

Listings UL 916

BTL

# **Ordering**

eBCON enteliBUS Controller w/ 4 slot Controller Backplane

# **Accessories**

(See enteliBUS Parts List for a complete list of all available enteliBUS modules and accessories)

eBM-xxx enteliBUS I/O Modules, see enteliBUS Parts List for a list of available modules

Subject to change without notice.

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