ZN551 ZONE CONTROLLER

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CONTROLLER FOR THE WEBCTRL® BUILDING AUTOMATION SYSTEM

The ZN551 is a fully programmable, native BACnetAdvanced Application Controller (AAC) designed for controlling a single zone in a building. The ZN551 is well suited for VAV, heat pump, unit ventilator and other packaged HVAC applications. It communicates on an EIA-485 LAN using BACnet MS/TP communications and connects seamlessly to the WebCTRL® building automation system.

KEY FEATURES AND BENEFITS

Application Features

- Versatile controller suitable for a variety of applications, including fan coil units, lighting, and exhaust fan control
- Standard library of control programs available for most zoning applications
- Supports EIKON® graphical programming software, an object oriented tool that provides complete flexibility for any custom control sequence that you need
- Supports Automated Logic communicating sensors, which are available in a variety of zone sensing combinations and support setpoint adjustments and occupancy overrides
- Supports Automated Logic touchscreen interfaces for managing and troubleshooting the connected equipment easily
- Supports live, visual displays of control logic, helping operators troubleshoot and optimize system operations
- Quick and easy test and balancing process

Hardware Features

- Controls up to 11 points (5 binary outputs, 5 universal inputs, and 1 analog output)
- Supports native BACnet over MS/TP communications when required
- Fast, powerful, and fully distributed control allows complete independence from any other devices in the sysstem
- Firmware upgrades can be performed remotely

 Easy startup and commissioning using the WebCTRL
- system user interfaces

System Benefits

- Connects seamlessly to the WebCTRL system
- Supports demand limiting and optimal start for maximum energy savings





The WebCTRL building automation system gives you the ability to understand your building operations and analyze the results. Integrate environmental, energy, security and safety systems into one powerful management tool that helps you reduce energy consumption, increase occupant comfort, and achieve sustainable building operations.

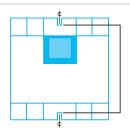
SPECIFICATIONS





Part #	ZN551 ZN551 Zone Controller		
BACnet Conformance	BTL Tested and conforms to the BACnet Advanced Application Controller (B-AAC) standard device profile, as defined in ANSI/ASHRAE Standard 135-2012 (BACnet) Annex L, Protocol Revision 9		
Power	24 Vac +/- 10%, 50 - 60 Hz, 15 VA 26 Vdc (25 V min, 30 V max)		
Communication			
BACnet Port	For communication with the controller network using MS/TP (9,600 bps)		
LStat Port	For LogiStat and LogiStat Plus zone sensors. The LogiStat port uses two universal inputs.		
Rnet Port	Supports up to 5 wireless and/or ZS sensors - freely mix ZS zone, ZS duct, ZS immersion and ZS outdoor sensors and 1 Equipment Touch or OptiPoint™ interface Supplies 12 Vdc / 210 mA power to the Rnet at an ambient temperature of 77°F (25°C) with a 24 Vac nominal power source.		
Local Access Port	For system startup and troubleshooting		
Flow Sensor Port	Provides flow inputs for a USF or UDF flow sensor		
Inputs			
Universal	5 inputs configurable for thermistor or dry contact. Inputs 1 and 2 are also configurable for 0-5 Vdc. Inputs 4 and 5 are used when a LogiStat sensor is connected, but are available if an RS room sensor is connected.		
Resolution	10 bit A/D		
Pulse Frequency	10 pulses per second. Minimum pulse width (on or off time) required for each pulse is 50 msec.		
Outputs			
Analog Output	1 analog output 0-10 Vdc (5 mA max)		
Digital Outputs	5 digital outputs, relay contacts rated at 1 A max 24 Vac/Vdc; configured normally open		
Output Resolution	8 bit D/A		
Status Indicators	LED's indicate status of communications, running, errors, power, and digital outputs		
Protection	Built-in surge and transient protection for power and communications in compliance with EN61000-6-1		
Environmental Range	0 to 130°F (-17.8 to 54.4°C), 10–90% relative humidity, non-condensing		
Physical	Rugged GE C2950 Cycoloy plastic		
Memory	512 kb non-volatile battery backed RAM, 1 MB flash memory, 16-bit memory bus		
Battery	10-year lithium CR2032 retains the following data for a maximum of 10,000 hours during power outages: control programs, editable properties, schedules, and trends.		
Compliance	United States: FCC compliant to Title CFR47, Part 15, Subpart B, Class A. UL Listed, File E143900; CCN PAZX, UL916, Energy Management Equipment; AS/NZS: RCM Mark, IEC 61000-6-3; Canada: UL Listed File E143900, CCN PAZX7, CAN/CSA C22.2 No. 205 Signal Equip., Industry Canada Compliant, ICES-003, Class A; CE Mark Compliant with 2014/30/EU, and RoHS Compliant: 2015/863/EU; UKCA Mark compliant with Electromagnetic Compatibility Regulations 2016 – Gov.UK and RoHS for Electrical and Electronic Equipment 2012.		
BT485 Connector	Attach a BT485 (not included) to a controller at the beginning and end of a network segment to add bias and to terminate a network segment.		

Figure 1: Physical Dimensions



	in.	cm
Width:	5.06	12.85

Controller Overall Dimensions

14.45 Height: 5.69 Weight: 0.6 lbs 0.27 kg

Assembled in the United States

Mounting*

Two mounting holes center line as at left with 5-5/16" (13.5 cm) spacing (height) *For indoor use only.



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