

DIAMOND CONTROLS

Data Sheet

DCM 8000 Controller



Description

The DCM 8000 is a compact, embedded Niagara Framework®-based controller and server platform for connecting multiple and diverse devices and sub-systems.

With internet connectivity and web-serving capability, the DCM 8000 controller provides integrated control, supervision, data logging, alarming, scheduling and network management. It streams data and rich graphical displays to a standard web browser via an ethernet or wireless LAN, or remotely over the internet.

The licensing model for the DCM 8000 controller features standard drivers along with optional IO and field bus expansion modules for ultimate flexibility and expandability.

The DCM 8000 controller is optimized for the Niagara 4 platform. In larger facilities, multi-building applications and large-scale control system integrations, Niagara 4 Supervisors can be used with DCM 8000 controllers to aggregate information, including alarms, and historical and real-time data, to create a single, unified application.

Specifications

TI AM3352: 1000MHz Arm® Cortex®-A8 1GB DDR3 SDRAM Removable micro-SD card with 4GB flash total storage/2GB user storage Wi-Fi (Client or WAP)* IEEE802.11a/b/g/n IEEE802.11n HT20 @ 2.4GHz IEEE802.11n HT20/HT40 @ 5GHz Configurable radio (Off, WAP, or Client) WPAPSK/WPA2PSK supported USB type A connector* Back-up and restore support (2) isolated RS-485 with selectable bias and termination (2) 10/100MB Ethernet ports Secure boot Supply requirements: 24VAC rated at 24VA minimum, or 24VDC rated at 1A (24W) minimum** Runs Niagara AX: 3.8u1 and later Runs Niagara 4: 4.1 and later Niagara Analytics 1.1 requires Niagara AX 3.8u1 or later update builds Niagara Analytics 2.0 requires Niagara 4.2 and later Real-time clock Batteryless

** Niagara Enterprise Security requires 4 hours of standby power

Expansion Module and IO Configurations

Maximum Combinations



Expansion 1	Expansion 2	Expansion 3	Expansion 4
232 or LON	232 or LON	232 or LON	232 or LON
485 x 2	232 or LON	232 or LON	232 or LON
485 x 2	485 x 2	232 or LON	
485 x 2	485 x 2		-

DCM 8000 Controller Mounting and Dimensions



- 1. DCM 8000 controller. Allow at least 1.5" (38mm) clearance around all sides and minimum 3" (76mm) at bottom for Wi-Fi antenna.
- 2. Expansion module. Up to four (4) may be used. See "Expansion Module and IO Configurations".
- 3. Distance between center of tabs from one unit to another unit.

Specifications

Environmental Specifications

Operating temperature: -20 to 60°C (-4 to 140°F)

Storage temperature: -40 to 85°C (-40 to 185°F)

Humidity: 5 to 95%, non-condensing

Shipping & vibration: ASTM D4169, Assurance Level II

MTTF: 10 years+

Agency Certifications

UL 916

CE EN 61326-1

RCM

FCC Part 15 Subpart B, Class B

FCC Part 15 Subpart C

C-UL listed to Canadian Standards Association (CSA) C22.2 No. 205-M1983 "Signal Equipment"

1999/5/EC R&TTE Directive

CCC

SRRC

RSS

RoHS

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