

Cost-effective, monitoring and control with GPRS

The M2M JACE is specifically designed for remote monitoring and control applications in smaller installations, particularly for retrofit to existing sites. It combines integrated control, alarming, data logging, scheduling, supervision and network management functions in a compact, wall mounting package. In addition to wired Ethernet and serial ports, there are 16 I/O points built-in, as well as a 230V PSU and an (optional) GPRS modem. The cable management features included make this a standalone device, reducing installation time and cost. The M2M JACE makes it possible to control and manage external devices over the Internet and present real time information to users in web-based graphical views.



Key features

- Small compact wall-mount design with cable management is easy to install
- Embedded Power PC platform @ 250 MHz running Niagara Framework
- Web User interface serves rich presentations and live data to a browser
- RS 232 and RS 485 communication ports
- Plug in communications card option slot
- Universal Mains power supply built in
- Onboard 16 points of I/O
- Optional GPRS Modem for remote internet access and alarm monitoring
- Supports open communication networks; LON, BACnet, EIB-IP, Modbus, M-bus, SNMP, Z-wave, oBIX
- Full network management of LONworks devices
- Built-in Web Server provides Graphical User Interface via Browser
- Different versions match different types and sizes of application

Applications

The M2M JACE is ideal for a wide range of applications. 16 on-board inputs and outputs are included for applications where local control is required, with additional I/O or third party devices connected via the serial and IP ports.

In small facility applications, the M2M JACE is all you need for a complete system; the M2M JACE serves data and rich graphical displays to a standard web browser via an Ethernet LAN or remotely over the Internet, or via the optional built-in GPRS modem.

In larger facilities, multi-building applications, and large-scale control system integrations, Niagara AX Supervisor™ can be used to aggregate information (real-time data, history, alarms, etc.) from large numbers of JACEs into a single unified application. The AX Supervisor can manage global control functions, support data passing over multiple networks, connect to enterprise level software applications, and host multiple, simultaneous client workstations connected over the local network, the Internet, or GPRS modems.

Specifications

Platform

IBM PowerPC processor 405EP 250 MHz
 DRAM 128MB
 Serial Flash 64MB
 Battery back-up 5 minutes typical
 – shut down begins within 10 secs
 Data Base storage and Real-time clock
 – 3 month battery back-up

Communications

2 Ethernet Ports - 10/100Mb (RJ45 connectors)
 1 RS232 port (9 pin D-connector)
 1 RS485 non-isolated port (3 way two part connector)
 GPRS modem is a factory installed option

Optional Communications Cards (plug-in, internally mounted) one of

LON adaptor FTT-10A, 2 Channel RS485, RS232

Integrated Inputs and Outputs

8 universal inputs
 4 digital (relay) outputs
 4 analog (0-10V) outputs
 All IO terminals via removable two part screw terminals
 for ease of installation

Universal Inputs (UI) for:

- Type 3 (10K) Thermistors, input accuracy +/-1% of span
- Other types may be supported by entering custom non-linear curve interpolation points for each non-linear input
- 0-10Vdc acc. +/- 2% of span without user calibration
- 0-20mA acc. +/- 2% of span, without user calibration
 Uses externally connected resistor for current input (provided) Self-powered or board powered sensors accepted
- Dry contact V open circuit, 300-uA short-circuit current
 Pulsing dry contact up to 20Hz; 50% duty cycle

Digital Outputs (DO):

Form A relay contacts max 24Vac or dc, 0.5A max current; suitable for on / off control only, floating control not supported

Analog Outputs (AO)

0-10Vdc 4mA drain max.

Power Supply

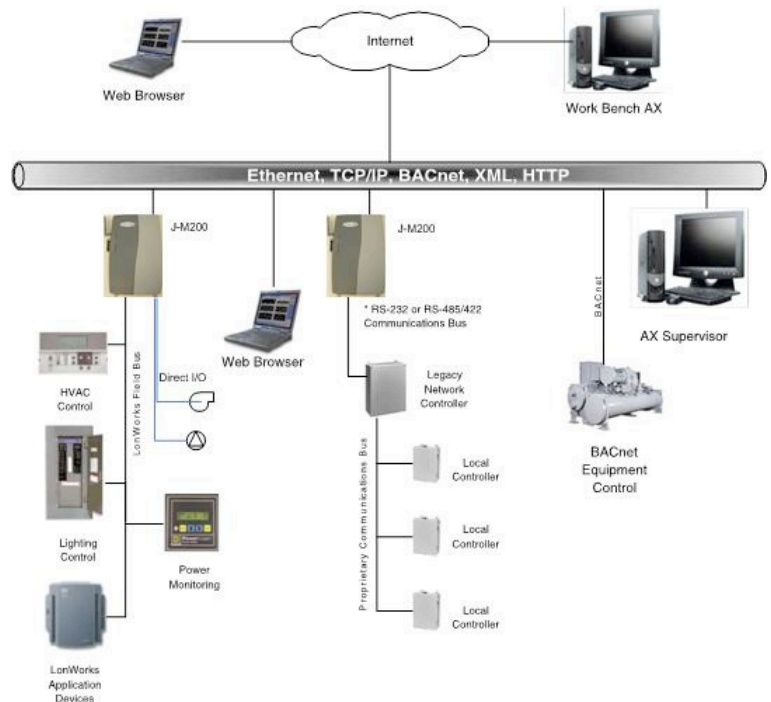
90 - 240Vac 50-60Hz universal PSU

Chassis

Construction: Plastic, screw mount chassis, plastic cover

Cooling: Internal air convection

Wiring access holes provided at top and bottom of case and via knockouts on base for hidden wiring



Operating System

QNX operating system
 IBM J9 Java Virtual Machine
 Niagara^{AX} 3.4 or later

Environment

Operating temperature range: 0 to 50°C
 Storage Temperature range: 0 to 70°C
 Relative humidity: 5 to 95%, non-condensing
 Enclosure rating: IP40 – designed for indoor spaces

Agency Listings

CE, UL 916, C-UL listed to Canadian Standards Association (CSA)
 C22.2 No. 205-M1983 "Signal Equipment"

How to order

No GPRS	With GPRS	Description
JHX256	JGX256	48MB Java Heap No license restriction
JHX246	JGX246	16MB Java Heap No license restriction
JHX236	JGX236	16MB Java Heap 450 KRU Limit Drivers limited to 200 pts
JHX216	JGX216	16MB Java Heap 350KRU limit Drivers limited to 8 devices