

PECO II®

NetMACS™ II



- ▶ 24 - 768 inputs - Automatic range selection monitors inputs from 60VDC to battery float current levels via a 50mV shunt
- ▶ Isolated outputs - Four isolated relay drivers and two isolated analog outputs
- ▶ Better than .1% accuracy of (24 bit) data
- ▶ 1U rack height - 19" or 23" rack or wall mountable
- ▶ Modem / network compatible
- ▶ Web based - Communications capability including e-mail alert messaging
- ▶ TL1-X.25, NMA compatible
- ▶ Network management

■ ■ PRODUCT DESCRIPTION

The NetMACS™ II is a flexible and cost effective solution to monitoring locations ranging from confined areas such as cabinets, to large and diverse environments such as central offices. The NetMACS™ II can be programmed to perform local control and evaluations such as threshold based alarming and trending. It can also be used to perform complex algorithm-based decision-making. Data can be accessed graphically via a standard web browser over a network. Using this web interface, commands and changes to setpoints can be input through pushbuttons and slide bars.

■ ■ SPECIFICATIONS

INPUT

Universal Inputs 0 – 60VDC, 1 – 50mV, 4 – 20mA

OUTPUT

Analog Outputs 0 – 60VDC, maximum current
100mA

DOCUMENTATION

Product Manual 4380193PD

ENVIRONMENTAL

Storage Ambient -40°F to +185°F (-40°C to +85°C)

Operating Ambient +32°F to +122°F (0°C to +50°C)

Humidity < 95% non-condensing

■ ■ INDICATORS & ALARMS

MONITORING, ALARMING & CONTROL

The NetMACS™ II is capable of monitoring all plant voltages and electrical signals. It can produce a status report for these voltages and signals in specified intervals of the plant operation. This gives the user the capability to track a plants performance over a long period of time, during different periods of usage. A basic NetMACS™ II has 24 universal inputs, 4 isolated relay drivers and 2 isolated analog outputs. The inputs will automatically switch from a 60VDC range to a 50mV range (accuracy of .1%, with a resolution of 5 microvolts in the 50mV range). This basic functionality can be expanded by adding supplemental monitoring units, up to a total of 768 inputs. Additional modules may be located up to 300' from the basic unit.

CONTROLS

The NetMACS™ II units, through digital output contact closures, can start or stop auxiliary equipment.

SYSTEM CAPABILITIES

Item	Quantity
Universal Inputs	768
Analog Outputs	2
Digital Outputs	4

COMMUNICATIONS

The NetMACS™ II has a wide array of communication capabilities. These include:

- ▶ Ethernet 10 base-T running TCP/IP
- ▶ HTTP Web enabled
- ▶ PPP Dial up, text based dial up, telnet

The NetMACS™ II can support a direct RS-232 or modem connection running PPP. The NetMACS™ II is a web page server allowing a convenient web browser interface.

PROGRAMMING

The NetMACS™ II operating system allows the programmer to create functional control programs. These programs can be site specific and based upon the values of any or all Analog Inputs, Analog Outputs, Timers, Digital Input Registers, Functions and the status of any or all Digital Inputs, Digital Outputs, Date, Time of Day, etc. These programs can be started either automatically, manually with a switch, or remotely with a macro.

Programming can be preformed over the network or via a direct connection to the NETMACS™ II.

Typical Programs:

Power Plant Controls

- ▶ Automatic Equalizing
- ▶ Battery Thermal Protection
- ▶ Time Scheduling
- ▶ Run Time Logging
- ▶ Trend Logs
- ▶ Automatic Status Reporting
- ▶ Monthly Reports

Environmental Controls

- ▶ Fixed Time Duty Cycling
- ▶ Night Purge
- ▶ Lead/Lag Control
- ▶ Seasonal Change-over
- ▶ Duty Cycling
- ▶ Optimum Start/Stop
- ▶ Staging Control
- ▶ Security System Control
- ▶ AC Generator Test