

The 6008U enclosure has 4 slots for Series 6000 input and output modules with a Universal Serial Bus (USB 2.0) computer interface for programming, control and data output. Multiple enclosures can be combined for larger and/or distributed installations. 6008U is DC operated for mobile applications.

All connections are made on the front allowing the 6008U to be located in the tightest of spaces. It has integral fans that supply cooling air to the modules and power supply. Power is 10 to 20 VDC with 21 to 32 VDC also available. An included power adapter is provided for operation from 120/240 VAC.

A sample clock bus is provided for multi-rack installations. Programming and data transfer are USB 2.0 which provides high data transfer rates with low, predictable latency. It interfaces to the USB 2.0 port provided on most PC computers, including laptops. Maximum length of the interface cable is 3 meters but it may be extended further using Ethernet with the Control & Data Processor (CDP) option.

Data Redundancy is optionally available. A 2.5" HD (Model 6095) mounts on the USB controller board in each 6008 enclosure and provides a redundant recording point for the DAS. In the unlikely event the Operator's Workstation or DAS Software fails, data will continue to record in each enclosure and can be recovered from the system post test.

The Operator's Workstation (PCCOWU-LT) is the primary control and data recording point for the Series 6000 DAS. The PCCOWU-LT is typically a laptop, connected to the 6008U's USB port and runs PI660 Data Acquisition Software for system setup, calibration, display, recording, distribution and export.



FEATURES

- DC Enclosure for 4 I/O Modules
- USB 2.0 Interface provides 4.8 MS/s aggregate data rate
- Calibration voltage input
- Alarm busses for control external equipment
- Optional remote operation using gigabit Ethernet
- Optional on-board data storage
- Built-in fans and front mounted connections

SPECIFICATIONS

DATA FORMAT

Data Word	16/24/32-bits, 2's complement binary.
Scan Table	Maximum format length is 65,536 samples.
Sample Rates	Multiple sample rates consisting of the highest sample rate divided by binary numbers. Highest sample rate is programmable with 1μS resolution.

DATA INTERFACE

Output Rate	Processor dependent, typically over 5 million 16-bit samples/second.
Latency.....	Processor and scan table dependent, typically less than 5 milliseconds..
Clock Stability.....	100 ppm over temperature range.

OPERATION

Protocol	Control and data interface is USB 2.0.
Software	Windows 10 64-bit driver provides a high-level operating command set. Fully compatible with all implementations of PI660 operating software.
Control Inputs.....	TTL inputs for Start, Stop and Trigger assert flags in the header of output data that initiate software control operations.
Alarms	Warning and alarm busses may be independent or shared between enclosures and may initiate an output from a digital I/O type module.

CONNECTIONS

Calibration	15-Pin Type D mounted on rear panel. Mating connector supplied.
Control	9-Pin Type D mounted on rear panel. Mating connector supplied.
Synchronization.....	Sampling clock synchronization for multiple rack systems. RJ45 connector on controller board. Category 5, 2-meter cable supplied.
USB	Two-meter cable supplied.

MECHANICAL

Power Input	10 to 20 VDC. (21 to 32 VDC available on special order)
Temperature	0°C to +50°C operating.
Humidity	95% without condensation.
Size	13.4 inches wide, 7 inches high, 16.7 inches deep exclusive of handles.
Weight	Approximately 20 pounds with all channel modules.

ACCESSORIES

6085	Connector Interface Panel for 6005 Enclosures.
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OPERATORS WORKSTATION (PCCOWU-LT) (OPTIONAL)

Operating System ..	Windows 10, 64-Bit.
Processor	Intel Core i5 or better. 2GB RAM.
Media	160GB SSD or better and CD/DVD. Dual SSD Option. Larger disk drives available.
Ethernet	Gigabit Ethernet.
Display	15".
Power	115 or 230 VAC, 47 to 63 Hz..
Temperature	0°C to +50°C operating.
Size	Laptop (other configurations available).

ORDERING INFORMATION

6008U	Enclosure, 4-slot, 12VDC USB Interface.
6095	Redundant Hard Drive.
PCCOWU-LT	Operator's Workstation, Laptop.