



Airline

Products and Solutions to Power Your Ideas

PQiaB - PQube-in-a-Box

NIST Certified Energy Monitor

Features (with Part Number PQube-02-0000 PQube Installed)

- **NO SOFTWARE REQUIRED.** Auto-configuration of the PSL PQube.
- Three-phase, single-phase and split-phase monitoring 200~480V, 50/60/400Hz.
- Self-configuration - auto-detects single-phase, 3-phase, phase-to-phase, wye, nominal voltage, nominal frequency, and more. HMI pre-configured and programmed for 3 phase display of voltage, current, and power.
- Available for customer configuration:
 - Two analog inputs, one digital input, up to 4 relay outputs, two temperature/humidity channels.
 - Direct connect to 100~480V, no PTs required for voltage measurements only. (May require a tap change on the internal power supply transformer). Also capable up to 36V DC measurement on two independent analog inputs.
 - Automatic data storage on included 4GB SD card (up to 2 years of data).
 - Full-color organic LED display, 35 built-in languages. 5.7" full color LCD display with programmable graphics with extended data transport capabilities.

Energy Monitoring (Requires Optional CTs)

- Watts, VA, VARs, True Power Factor, Watt-hours, VA-hours, VAR-hours.
- Carbon footprint meter (in kg), CO² generated and avoided.
- Peak averages—single-cycle, 1-minute, 15-minute or user-selected intervals.
- CT ratios support up to 50,000 amps; PT ratios support up to 6,900,000 volts.
- Daily, weekly, monthly trends; load duration curves & more.
- Energy accumulators—daily, weekly, monthly.

Communications

- Direct remote access to built-in web server - **NO SOFTWARE REQUIRED** for PQube connection. Direct real time data access through HMI capabilities with optional server software license.
- Instant email notification after a power quality disturbance or end of trend interval (Requires an active connection to the Internet).
- Free email account (Supplied by PSL).
- More than 200 Modbus-TCP slave registers available through the HMI interface.



PSL Pro-face

Shown above: PSL-A01-B01-C03-D00-E01-F01-G00-H00-J01
Available from stock, subject to prior sale.

Power quality and energy monitoring pre-packaged in a pre-wired enclosure with 5.7" Proface HMI and 5 port Ethernet switch.

Enclosure Construction

- Enhanced UV inhibitors protect against outdoor weathering.
- 10-32 threaded brass inserts are provided for optional inner panel or terminal kit mounting. Mounting hardware is included.
- Stainless steel draw type "snap latch" door fasteners.
- Door fasteners include a provision for padlocking.
- Polycarbonate viewing windows with swing up cover for PQube control access and SD card removal without opening enclosure.
- Captive oil resistant gasket provides a positive seal.
- Threaded brass inserts are provided for mounting feet to the rear of the enclosure.
- Stainless steel mounting brackets and hardware are provided for mounting to the rear of the enclosure.
- HMI front bezel is NEMA 4/4X rated.

Power Quality Monitoring

- High-speed 256-samples-per-cycle recording.
- Power quality disturbances recorded with waveforms and RMS graphs.
- Voltage sags, swells and interruptions; over-frequency and under-frequency events; 1 micro-second high-frequency impulse detection; time-triggered snapshots.
- Voltage THD, current TDD and current THD; voltage and current unbalance; VARs (fundamental and Budeanu); VAR-hr accumulator; flicker (Pinst, PST, PLT).
- Voltage and current harmonics and interharmonics—up to the 63rd, with statistics.
- Daily, weekly, monthly trends. Cumulative probability, histograms, etc.

Call 1-800-999-7378

www.airlinehyd.com

Note: Current Transformers (CTs) sold separately.

Select at least three .333V CTs to monitor power attributes and usage. A total of 5 can be used to monitor PE & N. Please choose from the following or ask your Airline Hydraulics representative for the correct part numbers(s) and pricing for the current ranges you wish to monitor.

SCN2-1A:333mV-0.4	High accuracy split-core current sensor, hinge top, 1A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.1, 0.4"x0.4" opening.
SCN2-SA:333mV-0.4	High accuracy split-core current sensor, hinge top, SA:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 0.4"x0.4" opening.
SCN3-20A:333mV-0.7	High accuracy split-core current sensor, hinge top, 20A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 0.7"x0.7" opening.
SCN3-50A:333mV-0.7	High accuracy split-core current sensor, hinge top, 50A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 0.7"x0.7" opening.
SCN3-100A:333mV-0.7	High accuracy split-core current sensor, hinge top, 100A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 0.7"x0.7" opening.
SCN3-150A:333mV-0.7	High accuracy split-core current sensor, hinge top, 150A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 0.7"x0.7" opening.
SCN4-200A:333mV-1.25	High accuracy split-core current sensor, hinge top, 200A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 1.25"x1.25" opening.
SCN4-300A:333mV-1.25	High accuracy split-core current sensor, hinge top, 300A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 1.25"x1.25" opening.
SCN4-400A:333mV-1.25	High accuracy split-core current sensor, hinge top, 400A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 1.25"x1.25" opening.
SCN4 - 500A:333mV-1.25	High accuracy split-core current sensor, hinge top, 500A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 1.25"x1.25" opening.
SCN4-600A:333mV-1.5x2.0	High accuracy split-core current sensor, hinge top, 600A:333mV, 0.2% accuracy, 600V, 40-600Hz, phase displacement <0.2, 1.5"x1.2.0" opening.
SC4L-800A:333mV-2.0x3.0	High accuracy split-core current sensor, 800A:0.333mV, 0.6% accuracy, 600V, 50-400Hz, phase displacement <0.5, 2"x3" opening.
SC4L-1000A:333mV-2.5x2.5	High accuracy split-core current sensor, 1000A:0.333mV, 0.6% accuracy, 600V, 50-400Hz, phase displacement <0.5, 2.5"x2.5" opening.
SC4L-1500A:333mV-2.5x5.5	High accuracy split-core current sensor, 1500A:0.333mV, 0.6% accuracy, 600V, 50-400Hz, phase displacement <0.5, 2.5"x5.5" opening.
SC4L-2000A:333mV-4.0x4.0	High accuracy split-core current sensor, 2000A:0.333mV, 0.6% accuracy, 600V, 50-400Hz, phase displacement <0.5, 4"x4" opening.
SC4L-3000A:333mV-4.0x6.0	High accuracy split-core current sensor, 3000A:0.333mV, 0.6% accuracy, 600V, 50-400Hz, phase displacement <0.5, 4"x6" opening.
SC4L-4000A:333mV-4.0x6.0	High accuracy split-core current sensor, 4000A:0.333mV, 0.6% accuracy, 600V, 50-400Hz, phase displacement <0.5, 4"x6" opening.
SC4L-5000A:333mV-4.0x7.0	High accuracy split-core current sensor, 5000A:0.333mV, 0.6% accuracy, 600V, 50-400Hz, phase displacement <0.5, 4"x7" opening.
SC4L-6000A:333mV-5.0x7.0	High accuracy split-core current sensor, 6000A:0.333mV, 0.6% accuracy, 600V, 50-400Hz, phase displacement <0.5, 5"x7" opening.
10 *CTCON0150EZU	150A/0.333V Clamp On CT, Accuracy <1% From .5– 300 A AC
10 *CTCON1000U	1000A/0.333V Clamp CT Accuracy < 0.5% From 40—1200 A AC < 1% From 20—40 A AC

Other CT ratings are available. Please ask your Airline Hydraulics representative for further information.