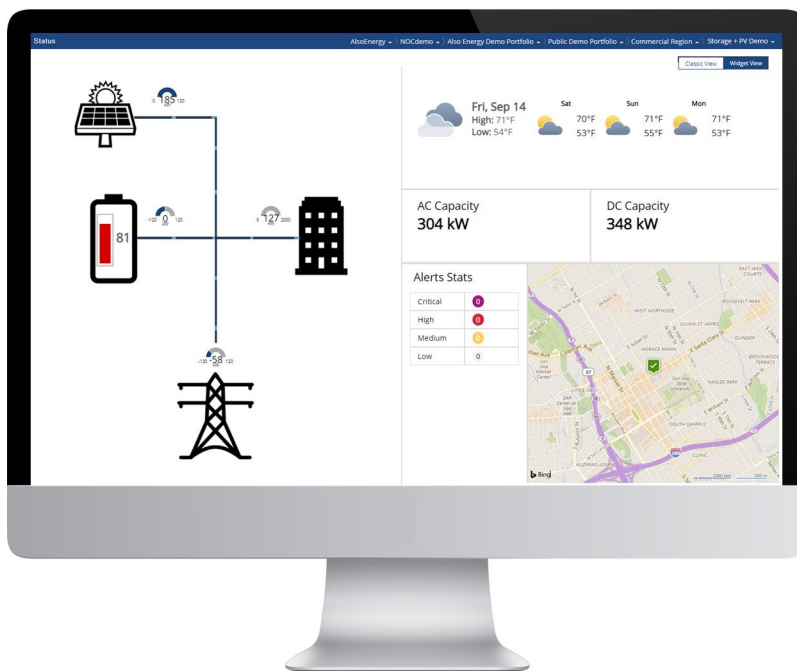


Complete Monitoring Solutions for PV + Storage

AlsoEnergy simplifies system design and fleet management with an integrated technology solution. You get performance analytics, diagnostics, alerts, and KPI displays for both your generation systems and your storage systems in a single seamless platform.



- Cost effective monitoring solution for distributed energy resources under a single platform
- Energy flow visibility in a simple easy to read format
- Standard and customized reports
- Battery system alerts and alarms for O&M and asset management
- SGIP and agency reporting
- Availability and system performance comparison
- Comparison against user-defined baseline values
- Visibility of energy storage system interaction with other energy resources

Typical DAS Hardware Includes:

- PowerManager 2000
- Revenue grade PV meter
- Revenue grade demand meter
- Revenue grade battery meter
- Weather station
- Cell modem
- Battery management controller

Battery Storage Dashboards with These Available Metrics:

- Battery state of charge
- Available stored energy kWh
- Self-consumption
- Battery system status
- Charge and discharge
- Battery charging by renewables

End-to-end solutions from AlsoEnergy provide the convenience and security of a single source provider for hardware, software, services, and support over the project lifecycle. PowerTrack features include advanced performance analytics and diagnostics, integrated CMMS job ticketing, and fleet management tools for asset managers such as reports, KPI displays, and portfolio aggregations.

Specifications for Power Manager 2000

General

Devices supported	Up to 200 devices
Logging interval	Configurable down to 1 second
Offline storage	More than 4 months offline storage with 200 field devices logging at 1 minute intervals
Configuration	Remote automated configuration; local network setup
Software management	Remote software update capability
Tools support	Ability to use third party Windows-based tools through secure remote desktop connection
Local display	Supports local HMI and remote desktop access
Real-time HMIs	Supports configurable PowerTrack real time HMIs
Native control capabilities	External command input (Modbus or DNP3) for real-time or scheduled set points; zero net export restriction; maximum export limit; closed loop reactive power control; closed loop ramp rate control; closed loop grid voltage control
Telemetry	Customizable DNP3 or Modbus TCP upstream interface

Interfaces

Ethernet	2 x 10/100/1000 ports
Primary protocols	Modbus TCP, Modbus RTU, DNP3, HTTP, HTTPS, Telnet, FTP, SNT, SNMP, proprietary inverter protocols, RDP, VPN
Discrete I/O	Available with accessory
Display	VGA and HDMI ports for local display
Peripheral support	USB ports for keyboard and mouse

Mechanical

Mounting configuration	Outdoor enclosure mount
Dimensions	10.4" x 2.96" x 5.2"

Environmental Rating

Operating Temperature	-20°C to 60°C (-40°C to 75°C available)
Storage Temperature	-40°C to 85°C

Electrical

Input Voltage	12-24 VDC
Power Consumption	26W maximum, 10W typical
Surge protection	Designed with protection against transients and ESD for use in harsh environments

Regulatory

Warranty	Standard 5 year warranty
Listings	Listed to applicable UL Standards; FCC Part 15 Subpart B Class A

