EAGLE EYE
POWER SOLUTIONS

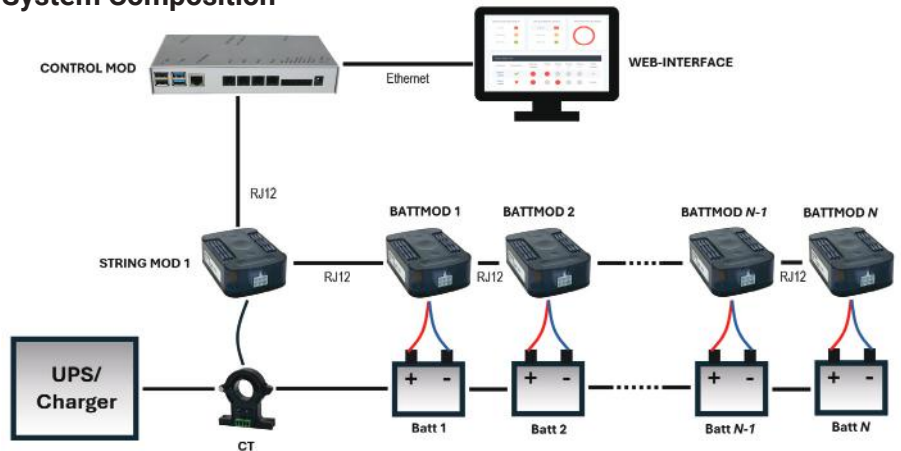# PowerEye UPS Battery Monitoring System

Product Overview
The PowerEye is an easy to install, cost-effective modular battery monitoring solution. It is designed for but not limited to UPS battery applications. At the center of each PowerEye system is a control unit which runs a web-server application. All data is stored on the control unit and accessible from a web-browser on the same network. Each control unit is capable of monitoring up to 480 battery cells/units which can be divided across 4 individual battery strings. For further expansion, an unlimited number of control units can all be configured on a single web-interface. Extend the life of your battery systems and reduce maintenance and replacement costs with proactive battery monitoring.

Features
- Local area network monitoring
- Modbus RTU and TCP/IP
- Real-time measurement and alarm status
- Detailed charge/discharge recording
- Email notifications
- Alarm & event activities
- Data management
- Monitors 16V nominal batteries
- PDF or Excel reporting
- Graphics and analysis tools
- Alarm history & service logs
- **Optional**: Cell balancing

System Composition

Technical Specifications	
Measurement Range	String voltage: 1.2 - 2500VDC String current: 0 - 500A Battery voltage: 1.2V - 16VDC nominal Internal resistance: 0.1 - 64m ohms
Battery Types	VRLA, VLA, Ni-Cad
Number of Strings/Units	Control module: Up to 4 strings, 480 units String module: Up to 240 units
Accuracy/Resolution	String voltage: 0.1% / 10mV String current: 1% / 10mA Battery voltage: 0.05% / 1mV Internal resistance: 2% / 1µOhm
Power Requirements	Control module: 12VDC @ 1.5A, 20W consumption String module: 100mA, 1.2W consumption Battery module: 10mA – 50mA (from connected cell/unit)
Dimensions (H x W x D)	Control module: 40.5 x 200 x 95.5 mm String module: 91 x 63 x 29 mm Battery module: 91 x 63 x 29 mm
Communications	RS-485: Modbus RTU Ethernet: SNMP, Modbus TCP/IP, HTTP (2) Dry contact relay: 400V (AC-DC) 120mA
Protections	Electrical isolation 2000V Short circuit protection: Max 3.5A (internal fuse) Reverse polarity protection (battery module)

Measured Parameters
- Battery Voltage
- Battery Internal Resistance
- Battery Temperature
- Battery State of Health
- String Voltage
- String Current
- Ambient Temperature