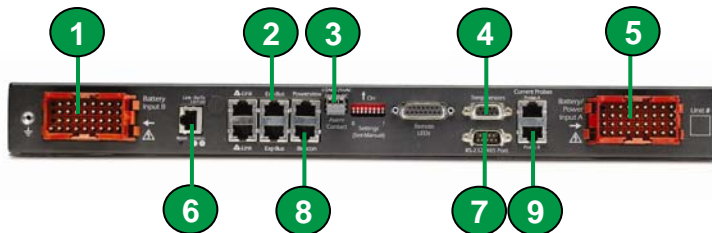


# Battery Management

**Smart charging and remote battery management  
for stationary batteries**

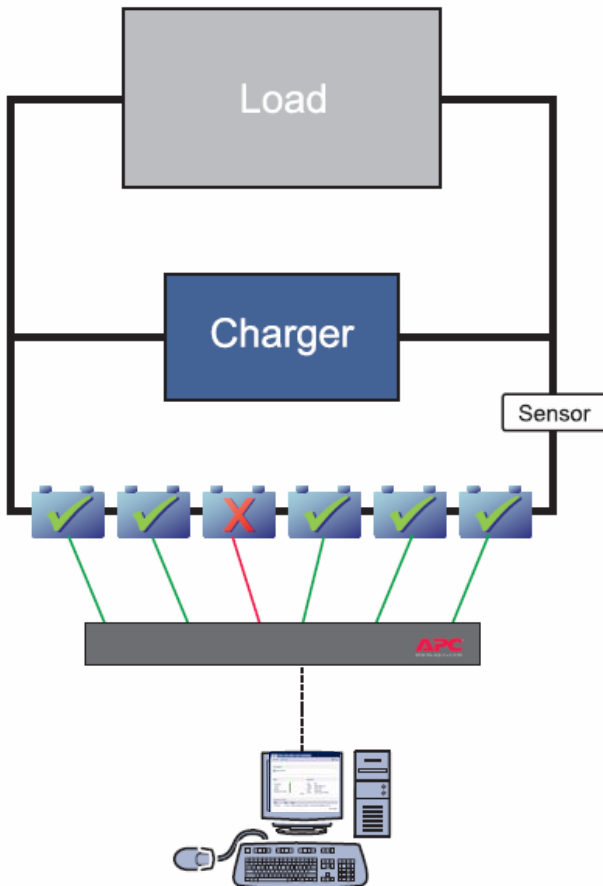
**APC Battery Management System**  
for Vented Lead-Acid (VLA), Valve-Regulated  
Lead-Acid (VRLA), or Nickel-Cadmium (NiCd)  
batteries



- 1 Battery wire harnesses connect each battery management unit to up to 64 battery units per battery management module
- 2 Cascade up to 7 Battery Management Expansion Units (AP9921XS) to one "master" unit (AP9921X) – up to 2 strings of 240 cells per system (LA) or 375 cells per system (NiCd)
- 3 One dry contact set (NO or NC) available for summary alarm notification
- 4 Monitor battery and environment temperature with the temperature sensors
- 5 Connect to 2-, 4-, 8-, or 12-Volt VRLA or wet-cell batteries or 1.2 or 2.4 nickel-cadmium batteries.
- 6 Connect the Battery Management System to your network and monitor using the Telnet, Web, or SNMP interface
- 7 Use this RS-232/485 port for serial connection. Use Modbus over RS-485 to communicate with your building management system
- 8 Add an audible/visible alarm beacon for clear notification of serious events (AP9324)
- 9 Connect one current sensor per string to monitor charge, discharge and AC ripple current

# Stay in charge with the APC Battery Management System

APC's Battery Management System improves availability by ensuring your batteries are optimally charged and ready for use. This browser-accessible, 1U, rack-mount system combines battery monitoring and testing with individual boost charging for peak battery performance. The system provides visibility of battery health and status through a web browser or your preferred building management system. This InfraStruxure component is ideal for Valve-Regulated Lead-Acid (VRLA), Vented Lead Acid (VLA), and nickel cadmium batteries in use in IT facilities, and industrial applications.



During discharge operation, the system detects the bad battery by measuring the individual difference in voltage while under the load. Following the discharge, the system indicates the internal resistance of each battery.

During normal operation, the Battery Management System can detect a bad battery by recording and trending the individual boost current.

The current sensor records the direction and amount of battery current and the charger ripple current. The Battery Management System reports system data and notifies of bad batteries through its Web, Telnet, SNMP, or Modbus interface.

**APC's Battery Management System improves availability by ensuring your batteries are optimally charged and ready for use.**

- > Individual battery charging
- > Individual battery management
- > Battery fault detection and notification
- > Ripple current monitoring
- > Internal resistance measurement
- > Building management system integration
- > Individual float current testing
- > Browser accessible
- > Data and event recording

	AP9921X		
Physical			
Unpackaged weight	11.85lb (5.39kg)	Shipping weight	18.65lb (8.48kg)
Unpackaged height	1.75in (44.00mm)	Shipping height	3.50in (89.00kg)
Unpackaged width	17in (433.00mm)	Shipping width	22.81in (579mm)
Unpackaged depth	18in (459.00mm)	Shipping depth	21.82in (554.00mm)
Color	Black		
Environmental			
Operating temperature	23-113°F (-5 to 45°C)	Storage temperature	-13 to 149°F (-24 to 65°C)
Operating elevation	0-10,000ft (0-3000m)	Storage elevation	0-30,000ft (0-9000m)
Conformance			
Approvals	cUL Listed , C-tick , CE , FCC Part 15 Class B , GS Mark , UL Listed , VCCI , VDE		
Warranty	1 year		