



**SOLID POWER. YOUR POWER.**

Demanding boat builders and operators alike know that a vessel's electrical system is the lifeline of the boat, and insist on Charles Marine AC and DC power solutions to provide safe, reliable power whether cruising or in port. **SOLID POWER** is more than a marketing slogan at Charles Industries, it's a corporate philosophy. **SOLID POWER** is embodied in our strict adherence to manufacturing standards of excellence; our dedication to supplying your electronics with safe, reliable power; our passion for innovation; and our commitment to the industry's best customer service both before and after the sale.

**SOLID  
POWER**

## MARINE AC SYSTEMS



### ISOLATION TRANSFORMERS

Fully isolates the boat from potential shore-side hazards. Protects onboard electrical equipment and electronics. Eliminates the need for galvanic isolators and corrects reverse polarity deleting the need for alarms. Meets all ABYC and USCG standards. Models from 3.6 kVA to 24 kVA.



### A/B SELECTOR SWITCHES

Automatically senses location of 2 power sources: port/starboard, or fore/aft. Selects AC connection and locks out a second power source. Eliminates the danger of live unused inlets, crossed connection potential and the need for manual switch gear. Available for 120V 30/50 Amp, 240V 50 Amp and 240V 100 Amp applications.



### ISO-BOOSTS WITH SOFTSTART

Units combine all the functions of an isolation transformer with RMS voltage sensing and seamless switching circuit, providing the ability to automatically boost low shore power voltage by increasing voltage up to 15%. Remote monitoring panel with diagnostic LEDs available. 12 kVA and 24 kVA models.



### SHOREBOOST PORTABLE AC POWER BOOSTER

"Portable" dockside boosting module monitors fluctuating shore power. Detects drops to or below 208 VAC, reliably provides 13% voltage boost to the AC system. Used in tandem with a 240V 50 Amp transformer.



### SMARTBOOST UNIVERSAL AC VOLTAGE BOOSTER

Fully automatic and designed to increase incoming AC shore power voltage when dockside power drops below 208 VAC, provides 13% AC voltage boost to any existing transformer up to 50 Amps. May be connected to any manufacturer's 12 kVA or 15 kVA (50 Amp) isolation transformer.



### DOCKBOOST AC VOLTAGE BOOSTER

Allows marina owners with 208 VAC to offer 240 VAC dockside power. Integrated polarization transformer provides 15% AC voltage boost to any 208 VAC dock service for clean, reliable 240 VAC service. Output circuit breaker protection to prevent overloading.



### AC MASTER CONTROLS

Maximizes AC input capabilities. Automatically transfers AC Power from multiple inlets and generators (maximum of 4 inputs) on 50 and 100 Amp, 240 VAC electrical systems. 50 Amp and 100 Amp units.



### C-CABLE® SHORE POWER SOLUTIONS

High quality, corrosion resistant cordsets in 30 Amp & 50 Amp 120 VAC and 50 Amp & 100/120/240 VAC, Adapters, Hull Inlets, Covers, Connectors, Receptacles, Adapters, Phone inlets/plugs/connectors, and TV inlets. Lifetime warranty.



### PM<sup>3</sup> AC POWER MANAGEMENT SYSTEM

Designed for vessels 50' and above, harnesses 100 Amp onboard power from two 50A 240 VAC dockside shore power sources.

Unique 3-piece modular design allows boat builders to disperse the size and weight of the product as required onboard.



### SMART-V®

Enables boaters to reliably combine available shore power. Available in a two 30 Amp males into one 50 Amp female configuration, and a two 50 Amp males into one 100 Amp female configuration.



Please visit [www.charlesindustries.com](http://www.charlesindustries.com) for product specifications, warranties and ordering information.



# MARINE DC SYSTEMS



## HQ SERIES BATTERY CHARGERS

Rugged battery charger and power supply all in one. ABS Type Approved, meets USCG (10B) and ABYC (A-31) construction standards for 150 gross ton vessels and/or vessels over 90 meters. 120/240 VAC input and 12 or 24 VDC output.



## 5000 SP SERIES BATTERY CHARGERS

Marine UL Listed and meets ABYC (A-31), 3-stage charging with temperature compensation (30 Amp and greater models) delivers the greatest charge when the battery is most able to accept it, prevents overcharging, and extends battery life. Battery type selector switch accommodates Lead Acid, Gel or AGM batteries. Thermal, over current, ignition and reverse polarity protection. 12V Models: 10-100 Amps, 24V Models: 10-60 Amps.



## 2000 SP SERIES BATTERY CHARGERS

Meets ABYC (A-31), 3-stage charging with temperature compensation (30 Amp and greater models) delivers the greatest charge when the battery is most able to accept it, prevents overcharging, and extends battery life. Battery type selector switch for Lead Acid, Gel or AGM batteries. Thermal, over current, ignition and reverse polarity protection. 12V Models: 10-50 Amps.



## 9000 SERIES BATTERY CHARGERS

Marine UL listed and Meets ABYC (A-31), chargers use self-regulating ferroresonant transformers to charge up to three battery banks simultaneously. Rugged stainless steel enclosures. Accurately charge lead-acid batteries only. 12, 24 or 32 VDC models.



## POWER SUPPLIES

Used in place of batteries to power onboard DC equipment. Provide constant 14.4 VDC and accept variances in frequency (45 - 65 Hz) and variances in AC input (120V models: 90-135 VAC, 220V models: 180-270 VAC).



## SURGE SUPPRESSORS

Protect valuable AC and DC systems from power surges and spikes up to 90,000 Amps. EMI suppressors also available to protect against DC transients created by trim tab pumps.



## DC-AC POWER INVERTERS

True sinewave and quasi/modified sinewave inverters convert 12 and 24 VDC battery power into 120/240 VAC (60 Hz) that can be used to operate onboard equipment and appliances.



## STARTNOW & STARTNOW PLUS

Allows the main battery to drain without draining the reserve battery. When it detects the starter of the engine engaging, it parallels both batteries immediately, guaranteeing an engine start. Available for 12V systems.



## BATTCOM BATTERY COMBINERS

A high-tech battery combiner that automatically allows the charging of two batteries from a single alternator. Available for 12V systems.



## BATTERY ISOLATORS

Isolate batteries when alternator is turned off, preventing power draining. Isolate charge current and stop it from recirculation, preventing discharge into a lesser-charged battery.



## MULTI-STAGE REGULATORS

Control the power of the alternator output and maintain the proper battery charging voltage regardless of engine speed. Microprocessor-controlled 3-stage regulator designed for use with type-P alternators.



## BATTERY SWITCHES

On/Off switch or 4-position switch allows boaters to choose between any combination of two batteries. Switches are ignition protected, Marine UL Listed and meet US Coast Guard and ABYC standards.

## ADDITIONAL CHARLES MARINE SOLUTIONS



## C-PHONE COMMUNICATION SYSTEMS

Designed specifically for marine onboard use. Offers boat owners intercom, hailer, paging, security alarm, fog horn and cellular integration. Expandable to 4, 8 or 12 stations. Distinctive ring identification. Accesses cellular lines with optional transceiver/interface unit. Operates on 12, 24 or 36 VDC input voltages



## BOAT STANDS

High-grade welded steel with a dark green powder-coated finish to minimize corrosion and rusting. Three designs; side stands for power boats, side stands for sail boats and keel stands. A wing nut design on a solid steel threaded rod allows tops to be raised or lowered quickly and easily. Stand pans available.