

# Coastal "Watt Wizard"

## Perfect for monitoring Solar, Wind, and Hydro installations

### Description

The Coastal DC **Watt Wizard** is an invaluable monitoring and diagnostic tool for all serious cruising vessels. Any small/medium DC charging source (solar, wind, hydro, etc.) or load (refrigeration, water maker, instruments, etc.) can be monitored for instantaneous volts, amps, and watts, plus accumulative amp/hours and run time. The meter comprises of a digital display with a membrane keypad mounted in a plastic mounting plate measuring 4" x 2.5". The installation requires a cut-out of 3.25"w x 1.75"h and a minimum depth of 1.5". A small ancillary circuit board connects via an 8" ribbon cable, and a remote shunt is included that is to be connected in the negative lead of the charge source or load to be monitored. An external 12v or 24v power supply is required.



### Operation



The **Watt Wizard** front panel incorporates a red, two-line four-digit LED display, numerous indicator LED's, and three buttons that allow the user to select the data to be displayed. The top line can be configured to display either volts or watts, and the lower line can be set to show either instantaneous amps, accumulative amp/hours, or run time. There is provision for an optional relay to be connected to facilitate switching the load or charging source on and off either manually, or automatically as the result of an alarm condition. Several alarm parameters can be set by the user, and a warning buzzer will sound when an alarm is activated.

### Features

#### Accurate and Reliable Display

Attractive red LED display shows volts, watts and amps, plus accumulative amp/hours and run time.

#### Versatile

Measures and displays up to 90 volts DC, and up to 75 amps DC.

#### Alarm Configuration Possible

Alarms for: Over and under voltage; over current; over power; over amp/hours and over time limit.

#### Alarm Buzzer

Buzzer will sound if any alarm condition is met.

#### Remote Relay Activation

With an optional relay installed (not included), the load or charge source can be disconnected either manually or in response to an alarm condition.

#### Manual Reset for Amp/Hours and Run Time

Accumulative amp/hours and run time can be reset to zero by the operator at any time.

#### Attractive Appearance

The Coastal DC **Watt Wizard** is attractive and unobtrusive, and may be mounted in any suitable convenient location.

#### Simple to Install and Operate

Installation, setup, and operation are simple and intuitive. No special tools or skills are required.



## Options

1) **Shunt Mount** - Provides sturdy base for mounting the Shunt. Features brass 5/16" studs, nuts, and washers.



2) **Relay, with Base** - For connecting/disconnecting charging source or load. Maximum current 20 amps. Specify 12v or 24v coil.



## Specifications

Power Supply	5v to 40v (Remote power supply required if voltages above 40v but below 90v are anticipated)
Measuring Range	0 to 90.0 volts - 0 to 75.0 amps
Accuracy	Volts: +/- 0.1% - Amps +/- 0.05%
Resolution	0.01 volts, amps, watts, amp/hrs
Sampling Rate	5 readings per second
Voltage Measuring	Internal
Current Measuring	External by negative line Shunt (Supplied)
Operating Temperature	0 to 50 C (32 to 122 F)
Operating Humidity	35% to 85% Relative Humidity
Alarms Available	High and low volts, high amps, high Watts, high Amp/Hrs, over time limit.
Alarm Action	Buzzer, plus relay operation if installed (Optional. Not Included)
Relay Coil Voltage (if installed)	12v if 12v power supply used 24v if 24v power supply used
Relay Coil Current (if installed)	Maximum 500 mA
Dimensions: Overall - Panel w/ Mounting Plate	4.0" x 2.5"
Dimensions: Required Cut-Out	3.125" x 1.75"
Dimensions: Required Depth	1.5"
Weight (Inc. standard Shunt)	250g / 9oz



**Coastal Climate Control, Inc.**