



ANALYTIC SYSTEMS

Power Conversion Solutions

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AC Power Supplies

PWS1503 Series Power Supply

Description

The PWS1503 Series of power supplies provides 12 or 24 Volts DC at 50 to 100 Amps of continuous power from a 110 or 220 Volt AC source.

Analytic Systems' power supplies use Switchmode technology with powerful IGBT switching transistors for reliability and efficiency with minimum size. Circuit innovations reduce output ripple to levels previously available only from bulky and inefficient linear power supplies. Reliability features include an input fuse, thermal shutdown, current limiting and output short circuit protection with automatic recovery. An Output Over voltage Crowbar circuit protects any powered devices from excessive voltage in the event of a failure of the unit.

The newly updated single-board PWS1503 is ultra-quiet and features the latest generation of current mode PWM control. Extra features include audible and visual indicators for low input voltage, over temperature, overload and output on. Either 110 or 220 VAC input (Field Convertible) is available.

The PWS1503 also features an easy to connect two contact output Anderson Plug and a standard NMEA - 110 VAC plug for plug-and-play installation.

Features

- Ideal as a Trade Show Power Supply for Auto Shows
- Military-Grade extrusion ensures a high tolerance for shock and vibration
- Ultra-quiet low EMI operation (meets MIL461E)
- Can be left permanently connected
- Field Convertible to 220VAC or back to 110VAC
- 3 Bank Load Splitter Available
- Dry contact output fail relay
- Visual indicators for output voltage & over-temperature
- Over-temperature shutdown
- Short circuit protection
- Output over-voltage crowbar
- Inrush Current Limiting with solid state bypass
- Thermostatically controlled fan
- 3 year parts and labour warranty



(Also available with Optional Carrying Handle)

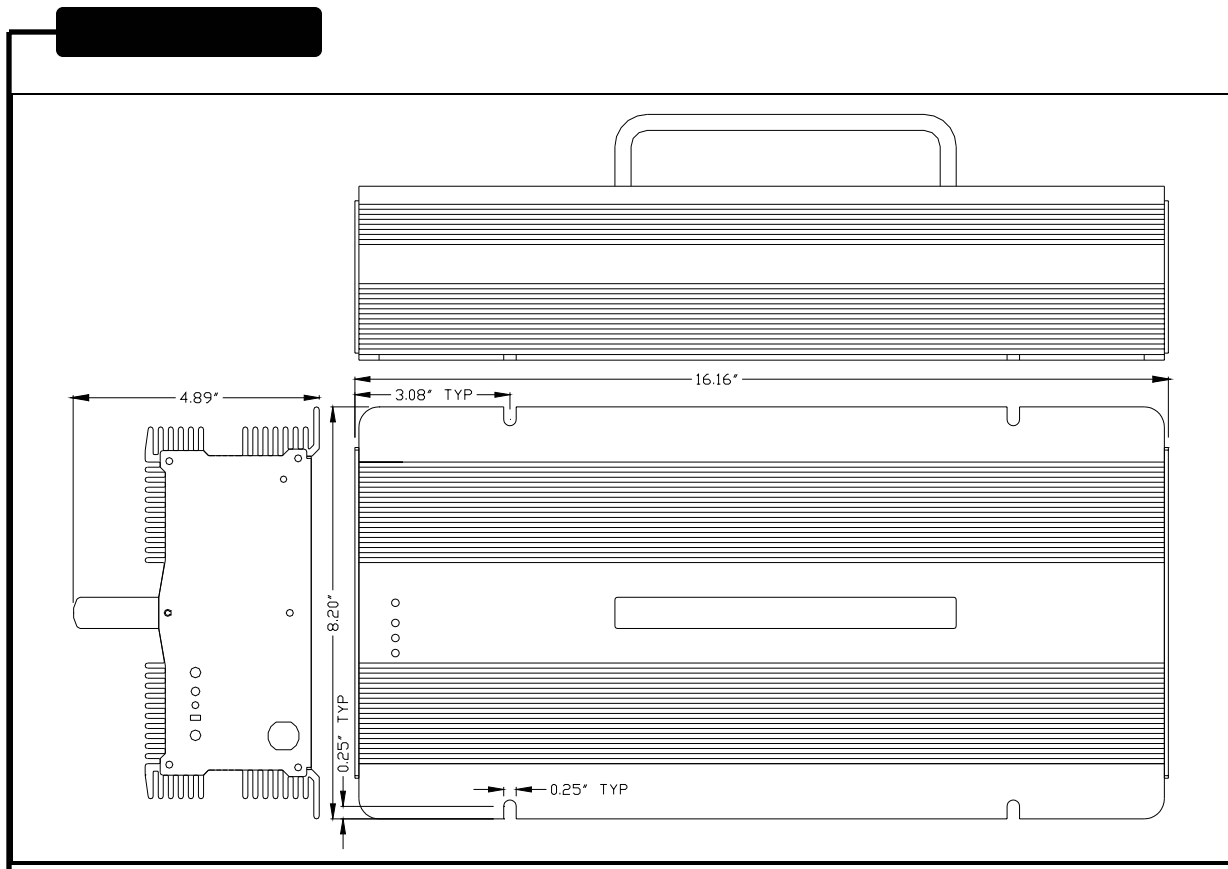
Benefits

- Ultra-Quiet
- Power sensitive electronics without interference
- Rugged & Reliable
- Ensure years of safe and trouble free operation

Applications

- Marine & other rugged environments
- Automotive / RV
- Electric Utilities and Substations
- Base Station Power (Radio & Telecommunications)
- OEM Applications
- Field Work / Construction Sites
- Solar Power Systems
- Emergency Power Backup (UPS)
- Security Systems
- Power any 12 or 24 Volt Electronic Equipment

PWS1503 Series Power Supply



Specifications

Electrical (Input)

Nominal Vac (ip)	110	220
Actual (Vac)	105-125	210-250
Input Amps (max)	16.2	8.1
Input Fuse (MDA)	20A	10A
Input Frequency	45-65 Hz	
Noise on Input	< 50 mV	

Environmental Specifications

Operating Temp. Range	-25° to +40°C @ maximum output Derate Linearly 2.5% per °C from 40°C (Optional -40°C extra wide temp. operation avail.)
Humidity	0 - 95°C Relative Humidity (non-condensing) with optional conformal coating
Audible Noise	NONE Ødb @ 3 ft (34.5 dB when fan operating)
Typical Service Life	> 10 yrs. (87,600 hrs)
Isolation	Input-Case & Input-Output 1500VDC / Output-Case 500VDC
Vibration	Meets MIL-PRF-44485

Electrical (Output)

Output Nominal (op)	12	24
Output Volts (VDC)	13.6 (12.0 Available)	27.2 (24.0 or 28.0 Available)
Output Amps	100A	50A
Output Crowbar	16.0 ± 0.5V	32.0 ± 1.0V
Output Ripple & Noise	< 50 mV	
Regulation (Line & Load)	< +/- 0.5%	
Duty Cycle	Continuous 100% for 24 hours per day	
EMC	Meets MIL461E	
Efficiency	> 85% @ Maximum Output	

Mechanical Specifications

Length	17.0 in / 43.2 cm
Width	8.2 in / 20.8 cm
Height	3.5 in / 8.9 cm (without carrying handle)
Clearance	1 inch (2.5 cm) all around
Material	Marine Grade Aluminium
Finish	Clear Chromate (Optional Colors Available)
Fastenings	All 18-8 Stainless Steel
Weight	14.4 lb / 6.6 kg
Connections	Four contact output terminals
Warranty	3 years
Safety	Meets UL458 & CSA 22.2.107.1

Available From:



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Quality since 1976

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