



S3 Inverters 500VA - 2000VA



Modular designed to fit into small cabinets without compromising in quality.

Universal flexibility designed for various field selectable voltages and frequencies.

Dual PWM technology provides excellent isolation between AC to DC.

Maximum efficiency and low audible noise.

High reliability with a fast static switch provides a cost effective cascade redundant configuration.

Alpha's S3 DC to AC Inverters are ideal for critical applications such as telecommunications, dataprocessing, internet providers and building security. The S3 Inverters provide precise monitoring of the system's parameters. Optional scroll switch and LCD display provides voltages, currents, load percentage, temperature and frequency. With hot swap capability, the inverters can be quickly removed without a loss of power to the critical load when an alternate AC source is available. This capability increases the availability of power to the critical loads. The Dual PWM technology with an isolated boost converter and high frequency switching provides excellent isolation between AC to DC for maximum efficiency and very low audible noise.

Nominal Specifications

Model Number	S3 500	S3 1000	S3 2000
Output Power Rating (VA)	500	1000	2000
(W)	420	840	1680
Input Voltage (VDC) Nominal	-48	-48	-48
Input Current Max. (A)	16	30	60
Typical Heat Output (BTU/h)	315	587	1012
Mechanical			
Height (Inches / mm)	3.5 / 8.9	3.5 / 8.95	25 / 13.4
Width (Inches / mm)	17 / 43.2	17 / 43.2	17 / 43.2
Depth (Inches / mm)	19 / 48.26	19 / 48.26	19 / 48.26
Weight (Lbs / kg)	34 / 15.4	34 / 15.4	39 / 17.6

*Note: Brackets are provided for 19" or 23" rack mounting.

General Specifications

Input

Input Voltage (VDC)	-42 to -57
Output Voltage (VAC)	Selectable 100/110/115/120/200/220/230/240
Output Waveform	Sinewave
Frequency (Hz)	Selectable 50/60
Frequency (max.)	Stable +0.02%
Efficiency	85% Typical, 97% Standby
Output Power Factor	0.6 to 0.84 Lagging / Leading
Harmonic Distortion (0 to 100% load)	2% max. for linear load, <3% for non-linear load
Transfer Time	Less than 2 msec

Overload Capacity

500VA / 1000VA	up to 125% VA/W continuous
2000VA	up to 120% VA/W continuous
DC Noise Feedback	< 30 dbrnc

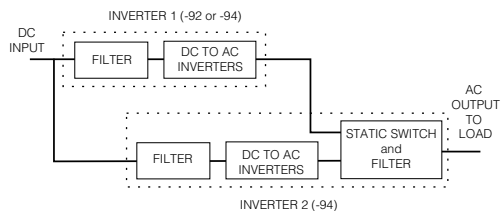
Operating Temperature

500VA / 1000VA	-10°C to +50°C
2000VA	-10°C to +40°C
Storage Temperature	-40°C to +75°C
Operating Altitude	up to 10,000 ft.
Safety Agency	UL, cUL, TUV, CE, FCC Class A
Warranty	One year

Hot Swap Side View



Cascade Redundant Configuration



Single Line with Static Switch Option Configuration

