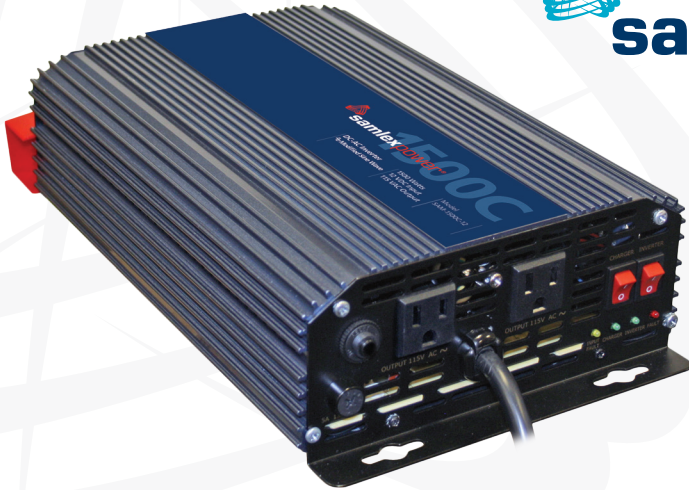




samlexamerica®

# 1500W



**DC-AC Inverter/  
Charger**  
Modified Sine Wave

Model  
**SAM-1500C-12**  
12 VDC - 115 VAC

### Design Features

- Integrated 1500W Modified Sine Wave Inverter, 30A Transfer switch, and 2 Stage 12 VDC, 15A Battery Charger.
- High efficiency, lightweight, and compact for easy installation
- Separate ON/OFF control for Inverter and Battery Charger for selectable operation as inverter, charger or UPS function
- 4 color LED indicators to monitor operational status
- Load controlled fan for efficient cooling when required
- Electronic protections including GFCI when in Inverter Mode

### MODEL NO. SAM-1500C -12

<b>OUTPUT: INVERTER MODE</b>	<b>CONTINUOUS ACTIVE OUTPUT POWER</b>	1500W (Power Factor = 1)
	<b>MAXIMUM SURGE POWER</b>	3000W (<4 millise; Power Factor = 1)
	<b>NOMINAL OUTPUT VOLTAGE</b>	115 VAC, +10% / -5%
	<b>OUTPUT FREQUENCY</b>	60 Hz ± 5%
	<b>EFFICIENCY</b>	87% (@ 100% load)
<b>OUTPUT: GRID PASS THROUGH</b>	<b>INVERTER ON/OFF CONTROL</b>	By front panel Switch
	<b>NOMINAL VOLTAGE, FREQUENCY OF GRID</b>	120 VAC, 60 Hz
	<b>MAXIMUM POWER</b>	1500W (Power Factor = 1; Battery fully charged)
<b>INPUT: BATTERY</b>	<b>BATTERY SYSTEM VOLTAGE</b>	12V (10.5V to 15.5V ± 0.5V)
	<b>DC CURRENT DRAW FROM BATTERY AT OUTPUT POWER</b>	150ADC at battery voltage of 12.5 VDC
	<b>DC NO LOAD CURRENT DRAW IN INVERTER MODE</b>	0.65A to 0.85A
<b>INPUT: GRID</b>	<b>NOMINAL VOLTAGE, FREQUENCY</b>	120 VAC, 60 Hz
	<b>MAXIMUM AC INPUT CURRENT</b>	15A (Protected by 15A breaker supplying Grid input)
	<b>CURRENT RATING OF TRANSFER RELAY</b>	30A
<b>TRANSFER RELAY K1</b>	<b>TRANSFER TIME FROM GRID TO INVERTER</b>	2 to 3 seconds
	<b>TRANSFER TIME FROM INVERTER TO GRID</b>	Up to 1 second
	<b>CURRENT RATING</b>	12A
<b>GROUND SWITCHING RELAY K2</b>	<b>CHARGING ALGORITHM</b>	2 Stage Charger - Bulk & Float
	<b>FLOAT VOLTAGE</b>	13.8V ± 0.3V
	<b>BULK CHARGE/MAX. CHARGING CURRENT</b>	15A
	<b>MAXIMUM AC INPUT CURRENT</b>	< 5A at 120 VAC
	<b>AC INPUT POWER FACTOR</b>	0.6
	<b>EFFICIENCY</b>	80 ± 5%
	<b>VOLTAGE &amp; CURRENT RATING OF FUSE</b>	5 mm x 20 mm, Fast Acting Glass Tube Fuse 125V / 250V, 5A ; Bussman GMA-5 or equivalent
<b>PASS THROUGH MODE: LOAD SIDE</b>	<b>CHARGER ON/OFF CONTROL</b>	By front panel Switch
	<b>OVERLOAD / SHORT CIRCUIT SHUTDOWN</b>	Load >15A: Input Circuit Breaker on the unit will trip
<b>PASS THROUGH MODE: CHARGER SECTION</b>	<b>HIGH AC INPUT VOLTAGE SHUTDOWN</b>	143 VAC. Auto reset at 138 VAC (No transfer to Inverter)
	<b>LOW AC INPUT VOLTAGE SHUTDOWN</b>	< 10 VAC. Auto reset at > 75 VAC (No transfer to Inverter)
	<b>GROUND FAULT SHUTDOWN IN CHARGER / PASS THROUGH MODE</b>	GFCI of AC outlet supplying AC input will trip
<b>PROTECTIONS: INVERTER MODE</b>	<b>OVERLOAD SHUTDOWN</b>	> 1650 ± 10% for up to 7 sec
	<b>LOW BATTERY INPUT VOLTAGE ALARM</b>	10.8 ± 0.3V
	<b>LOW BATTERY INPUT VOLTAGE SHUTDOWN</b>	10.5 ± 0.3V ; Auto reset at 11.7 ± 0.3V
	<b>BATTERY (INPUT) OVER VOLTAGE SHUTDOWN</b>	> 15.5V ; Auto reset at < 15.5V
	<b>COOLING - LOAD CONTROLLED FAN</b>	Inverter Mode: ON at 85W ; Charging Mode: ON at charging current > 3A ± 1A
	<b>INVERTER OVER TEMPERATURE SHUTDOWN</b>	Internal hot spot > 88° to 110°. Auto reset when hot spot cools down 10° to 15°C below the threshold
	<b>GROUND FAULT SHUTDOWN</b>	Leakage > 5.8 mA. Manual reset
<b>CONNECTIONS</b>	<b>DC INPUT REVERSE POLARITY</b>	Fuse 240A (8 pcs. 30A Automotive Type ATC Fuses in parallel)
	<b>DC INPUT</b>	Nut & Bolt, M9
	<b>AC INPUT / AC OUTPUT</b>	6 foot cord with NEMA5-15P Plug / 2 x NEMA5-15R Outlets
<b>GENERAL</b>	<b>LED DISPLAY</b>	GREEN "Inverter"; GREEN "Charger"; RED "Fault"; YELLOW "Input Fault"
	<b>OPERATING TEMPERATURE RANGE (MIN. TO MAX.)</b>	0°C to 25°C / 32°F to 77°F at 100% loading; 26°C to 35°C / 78.8°F to 95°F at 80% loading
	<b>OPERATING HUMIDITY</b>	< 80%; Non-condensing
	<b>DIMENSIONS (W X D X H)</b>	202 x 345 x 84 mm / 7.95 x 13.58 x 3.30 in
	<b>WEIGHT</b>	4.0 kg / 8.82 lb

NOTE: Specifications are subject to change without notice

12002-SAM-1500C-12-0617