SmartOnline 208/240 & 120V 6kVA 4.2kW Double-Conversion UPS, 9U Rack/Tower, Extended Run, SNMPWEBCARD Option, DB9, Bypass Switch, Hardwire

MODEL NUMBER: **SU6000RT3U**

Highlights

- 6000VA / 6kVA / 4200W on-line double-conversion UPS
- 208/120V or 240/120V 50/60Hz output; Economy mode option
- 9U Rack/Tower compatible; Hot-swap power and battery modules
- RS232 & EPO ports; Support for SNMP/WEB card options
- Front panel LEDs with detailed LCD monitoring and control screen
- Expandable runtime with optional external battery packs
- Hardwire input (3 wire); Hardwire output

Package Includes

- SU6000RT3UPM 3U power module
- SU6000XFMRRT3U 3U step-down isolation transformer
- 240V 3U external battery pack
- Four post compatible rack rail kit (3 sets)
- PowerAlert software, complete data cabling and user manual

Description

Tripp Lite SU6000RT3U on-line, double-conversion UPS protects server, networking or telecommunications equipment from blackouts, voltage fluctuations and surges in a compact tower/rackmount housing. In a rack configuration, the power module, step-down transformer, and battery pack occupy only 3 rack spaces each (9U total). Upright tower placement of entire system supported with included tower stands. Large capacity 6000VA/4200 watt power module double-conversion technology converts raw input AC to DC, then resynthesizes it back to perfect sine wave AC output within 2% of user-selectable 208V/240V and 120V AC output voltages. Frequency regulation locks output power to 50/60Hz (+/-0.2 Hz), removing harmonic distortion, fast electrical impulses and other hard-to-solve power problems not addressed by other UPS types. Perfectly regulated, continuous sine wave output with zero transfer time offers guaranteed uptime and compatibility with all equipment types. Hardwire input and output connections support a variety of permanent or PDU style power connections. Highly efficient operation in optional economy mode setting, saving BTU heat output and energy costs. Battery support can be extended through the addition of external battery packs. Includes accessory slot for optional monitoring and management cards, plus DB9 contact-closure, and DB9 enhanced serial monitoring ports for unattended shutdown, remote control and monitoring of UPS system and power data.

Features

- Tripp Lite SU60000RT3U 6kVA / 6,000VA / 4200 watt on-line, double-conversion UPS system in 9U total rack/tower configuration (3U UPS power module, 3U external battery pack and 3U step-down transformer)
- Included step-down transformer with manual bypass switch enables hot-swappable UPS power module replacement with no interruption in output power to connected networking equipment
- Fault tolerant electronic bypass maintains utility output during a variety of UPS fault conditions
- Hardwire input and output connections
- Full-time active power conditioning provides clean, continuous dual-conversion AC output free of voltage fluctuations, power interruptions and line noise
- Double-conversion operation converts raw input from AC to DC, then re-synthesizes output power back to perfect sine wave AC with enhanced protection

from harmonic distortion, fast electrical impulses and other hard-to-solve power problems not addressed by other UPS types

- Accepts input voltages between 156 and 276, regulating output within 2% of selectable 208/240 and 120V AC output
- Standard included 3U battery pack provides 20 minutes runtime at half load (3000VA) and 8 minutes at full load (6000VA)
- Expandable runtime is supported with optional BP240V10RT3U; BP240V557C-1PH; BP240V787C-1PH; BP240V1037C-1PH; BP240V1407C-1PH external battery packs
- Highly efficient operation in optional economy mode significantly reduces BTU heat output and operating energy costs
- PowerAlert monitoring software offers detailed site power and UPS updates with support for safe auto-shutdown of connected systems as UPS batteries become depleted
- Includes Free PowerAlert monitoring software packages; PowerAlert LOCAL for desktops and small business networks, PowerAlert NSA (Network Shutdown Agent) for larger networks and PowerAlert NMS (Network Management System) for monitoring up to 250 SNMP-enabled UPS, PDU and other networking devices
- Supports detailed monitoring of equipment load levels, self-test data and utility power conditions via built-in RS-232 interfaces
- Optional SNMPWEBCARD offers communications and control via secure remote web and network interfaces
- Optional RELAYIOCARD supports six configurable hard contact closure outputs for custom event notification
- Supports Emergency Power Off (EPO) via built-in interface
- Included rail kit supports 9U 19 inch rackmount installation in 4 post racks
- Optional 2POSTRMKITHD supports installation in 2 post 19 inch racks
- Front panel LED's and LCD readout with scroll controls and supports visual monitoring of all major UPS functions and advanced UPS settings for nominal voltage selection, economy mode, and other operational parameters
- LED / LCD display panel rotates for viewing in rackmount or tower configurations
- Network-grade AC surge and noise suppression
- External battery packs are field replaceable and hot swappable

Specifications

OUTPUT	
Output Capacity Details	Supports up to 102% load continuously in double conversion mode, 102 to 125% for 1 minute, 126% to 150% for 30 seconds; Loads over 150% trigger immediate bypass mode operation to support loads directly from mains power; Double conversion mode is automatically restored as load levels are reduced to 90% or less
Output Volt Amp Capacity (VA)	6000
Output kVA Capacity (kVA)	6
Output Watt Capacity (Watts)	4200
Output kW Capacity (kW)	4.2
Power Factor	0.7
Crest Factor	3:1
Nominal Output Voltage(s) Supported	120V; 208V; 240V
Nominal Voltage Details	Voltage selection via front panel LCD interface
Frequency Compatibility	50 / 60 Hz
Frequency Compatibility Details	Output frequency matches input nominal on startup

Output Voltage Regulation (Line Mode)	+/- 2%
Output Voltage Regulation (Economy Line Mode)	+/- 10%
Output Voltage Regulation (Battery Mode)	+/- 2%
Output Receptacles	Hardwire
Output Receptacle Backplate Options	Optional backplates SUPDM12 (for 208v nominal), SUPDM14 (for 240v nominal), SUPDM16 (for 208v nominal) add low and high voltage outlets, plus L6-30P input cord
Output Circuit Breakers	40A double-pole
Output AC Waveform (AC Mode)	Pure Sine wave
Output AC Waveform (Battery Mode)	Pure Sine wave

INPUT	
Rated input current (Maximum Load)	30A
Nominal Input Voltage(s) Supported	208V AC; 240V AC
UPS Input Connection Type	Hardwire
UPS Input Connection Description	3 wire single phase input (L1, L2, G); optional, country-specific backplates SUPDM12 (for 208v nominal), SUPDM14 (for 240v nominal), SUPDM16 (for 208v nominal) add low and high voltage outlets, plus L6-30P input cord
Input Circuit Breakers	40A double-pole
Recommended Electrical Service	30A 208V or 240V
Input Phase	Single-Phase

BATTERY	
Full Load Runtime (min.)	8 min. (4200w)
Half Load Runtime (min.)	20 min. (2100w)
Expandable Battery Runtime	Supports extended runtime with optional external battery packs
External Battery Pack Compatibility	BP240V10RT3U; BP240V557C-1PH; BP240V787C-1PH; BP240V1037C-1PH; BP240V1407C-1PH
DC System Voltage (VDC)	240
Battery Recharge Rate (Included Batteries)	Less than 6 hours from 10% to 80% (typical, full load discharge)
Battery Replacement Description	Hot-swappable, user replaceable batteries
Expandable Runtime	Yes

VOLTAGE REGULATION	
Voltage Regulation Description	Online, double-conversion power conditioning
Overvoltage Correction	2% output voltage regulation during overvoltages to 276
Undervoltage Correction	2% output voltage regulation during undervoltages to 156

USER INTERFACE, ALERTS & CONTROLS	
Front Panel LCD Display	Selectable LCD display with scroll and selection buttons enables UPS control and detailed monitoring options; LED/LCD panel rotates for viewing in rack/tower formats (see manual)
Switches	2 Switches control off/on power status and alarm-cancel/self-test operation; 2 additional switches support set and execute scrolling LCD functions; bundled transformer includes bypass switch to enable hot-swap UPS power module replacement
Alarm Cancel Operation	Alarm cancel switch
Audible Alarm	Unique audible alarms for all major UPS, environmental and power conditions (see manual)
LED Indicators	6 LEDs indicate line power, online mode, economy/bypass mode, on-battery, charger and AC output status; LCD screen offers additional information and control options

SURGE / NOISE SUPPRESSION	
UPS AC Suppression Response Time	Instantaneous
EMI / RFI AC Noise Suppression	Yes

ISOLATION	
Output Isolation Transformer	120V output includes load isolation transfomer protection

PHYSICAL	
Included Mounting Accessory Description	3 sets of adjustable 4 post rack rails included (for UPS, transformer and battery pack components); 2-9USTAND tower kit included (supports up to 9U in tower format)
Installation Form Factors Supported with Optional Accessories	2 post rackmount (2POSTRMKITHD)
Optional Mounting Accessory Notes	3 sets of 2POSTRMKITHD required for 2 post rackmount installation of separate UPS, transformer and battery pack
Primary Form Factor	Rackmount
UPS Power Module Dimensions (hwd, in.)	5.2 x 17.5 x 26
UPS Power Module Dimensions (hwd, cm)	13.3 x 44.4 x 66
Installed Whole System Maximum Rack Depth (in.)	26
Installed Whole System Maximum Rack Depth (cm)	66
Rack Height (U Spaces)	9
UPS Power Module Weight (lbs.)	43.8
UPS Power Module Weight (kg)	19.9
UPS Dimensions Details	Includes 3U power module, 3U stepdown transformer and 3U battery pack
Stepdown Transformer Dimensions (hwd / in.)	5.2 x 17.5 x 26
Stepdown Transformer Dimensions (hwd / cm)	13.3 x 44.4 x 66

Stepdown Transformer Weight (lbs.)	90
Stepdown Transformer Weight (kg)	40.9
Included Battery Pack Dimensions (hwd / in.)	5.2 x 17.5 x 25
Included Battery Pack Dimensions (hwd / cm)	13.3 x 44.4 x 63.5
Included Battery Pack Weight (lbs.)	136.5
Included Battery Pack Weight (kg)	62
UPS Shipping Dimensions (hwd / in.)	36 x 24 x 35
UPS Shipping Dimensions (hwd / cm)	91.4 x 61 x 88.9
Shipping Weight (lbs.)	436
Shipping Weight (kg)	197.9
Cooling Method	Fan
UPS Housing Material	Steel

ENVIRONMENTAL

Operating Temperature Range	+32 to +104 degrees Fahrenheit / 0 to +40 degrees Celsius
Storage Temperature Range	+5 to +122 degrees Fahrenheit / -15 to +50 degrees Celsius
Relative Humidity	0 to 95%, non-condensing
AC Mode BTU / Hr. (Full Load)	1412.3
AC Economy Mode BTU / Hr. (Full Load)	911.5
AC Mode Efficiency Rating (100% Load)	91%
AC Economy Mode Efficiency Rating (100% Load)	96%
Operating Elevation (ft.)	0-3000m (0 to 10,000 ft.)
Audible Noise	53dBA At Front Side 1 Meter
Operating Elevation (m)	0-3000 m

COMMUNICATIONS

Communications Interface	DB9 Serial; Contact closure; EPO (emergency power off); Slot for SNMP/Web interface
Network Monitoring Port Description	RS232 and contact closure communications are located on two separate DB9 ports
PowerAlert Software	Included
Communications Cable	DB9 cable included

LINE / BATTERY TRANSFER

Transfer Time	No transfer time (0 ms.) in online, double-conversion mode

Transfer Time (Economy Mode)	8ms. typical power failure response in optional economy mode
Low Voltage Transfer to Battery Power (Setpoint)	156
High Voltage Transfer to Battery Power (Setpoint)	276

SPECIAL FEATURES	
Cold Start (Startup in Battery Mode During a Power Failure)	Cold-start operation supported
Economy Mode Operation	Optional economy mode enables high efficiency bypass operation with a maximum output voltage variation of +/-10%. Double conversion mode is automatically restored as mains voltage varies beyond +/-10% with less than 1 millisecond transfer time between modes.
High Availability UPS Features	Automatic inverter bypass; Manual bypass switch; Hot swappable UPS power module; Hot swappable batteries
Green Energy-Saving Features	High efficiency economy mode operation; Schedulable daily hours of economy mode operation

CERTIFICATIONS	
UPS Certifications	Tested to UL1778 (USA); Tested to CSA (Canada); Tested to NOM (Mexico); CE; Tested to GOST (Russia); Tested to SASO (Saudi Arabia); Tested to IRAM (Argentina); Meets FCC Part 15 Category A (EMI)

WARRANTY	
Product Warranty Period (Worldwide)	2-year limited warranty
Connected Equipment Insurance (U.S., Canada & Puerto Rico)	$250,000 Ultimate Lifetime Insurance