

# SmartOnline 120V 3kVA 2.5kW Double-Conversion UPS, 2U Rack/Tower, Extended Run, Network Card Options, USB, DB9 Serial

MODEL NUMBER: SU3000RTXL2U





## Description

3000VA / 3kVA / 2500 watt on-line, double-conversion UPS system for critical server, network and telecommunications equipment. 2U rackmount form factor with an installed depth of only 26 inches (66cm). Expandable battery runtime with optional BP72V15-2U (limit 1), BP72V28RT-3U (multi-pack compatible) and BP72V18-2US (multi-pack compatible) external battery packs. Full time sine wave 100/110/115/120/127V output with +/-2% voltage regulation. Uninterruptible Power Supply (UPS) actively converts raw incoming AC power to DC, then re-converts output back to completely regulated, filtered AC output. Operates continuously without using battery power during brownouts to 70V and overvoltages to 144V. Up to 97% efficiency in optional

### **Highlights**

- 3000VA / 3kVA / 2500 watt on-line double-conversion 2U rack/tower UPS
- 100/110/115/120/127V 50/60Hz output, high efficiency economy mode option
- Expandable runtime, Hot-swap batteries, 26 in / 66 cm installed depth
- USB, RS232 & EPO ports; slot for network management card options
- Front panel status LEDs with detailed load and battery metering
- 2 independently switchable output load banks
- NEMA L5-30P input; L5-30R & 5-15/20R outlets

## Package Includes

- SU3000RTXL2U UPS System
- 4 post rackmount installation brackets
- USB, DB9 and EPO cabling
- Owner's manual with warranty information

economy mode saves BTU heat output and energy costs. NEMA L5-30P input plug. NEMA L5-30R, NEMA 5-15/20R and NEMA 5-15R output receptacles. Network-grade AC surge and noise suppression. Zero transfer time between AC and battery operation. Network management interfaces include USB port, DB9 serial port and slot for network management card options. Built-in DB9 port offers both enhanced RS-232 enabled monitoring data, plus contact closure monitoring ability. HID-compliant USB interface enables integration with built-in power management and auto shutdown features of Windows and Mac OS X. Supports simultaneous detailed monitoring of equipment load levels, self-test data and mains power conditions via all network interfaces. PowerAlert UPS monitoring software is available via free download. Emergency Power Off (EPO) interface. Integrated two bank PDU switching supports automated load shedding and remote-reboot of connected equipment. Multi-stage metered current monitoring and battery charge status LEDs. Mains power and voltage regulation LEDs. Audible Alarm. Self-test. Fault-tolerant auto-bypass mode. LED display panel easily rotates for better viewing in rackmount or tower configurations. Includes 4 post rackmount accessories 2-9USTAND tower kit and 2POSTRMKITWM two post rackmount hardware accessories available. Field replaceable, hot swappable internal batteries and external battery packs.\$250,000 Ultimate Lifetime Insurance (U.S., Canada, and Puerto Rico only).

#### **Features**

- SmartOnline high-performance UPS system is ideal for critical voice, data, medical and industrial network applications
- Optional economy-mode operation with 97% efficiency for reduced power consumption and cooler operation
- Economy mode is schedulable for daily or weekly hours of operation to enable precision output during peak operating hours and high efficiency, low BTU emission operation during off-peak times
- Maintains continuous operation through blackouts, voltage fluctuations and surges



- On-line, double-conversion mode provides perfectly regulated sine wave output within 2% of 100/110/115/120/127V (user selectable) with zero transfer time
- Supports operation at 50/60Hz (auto-sensing) with the ability for full-time frequency conversion from 50 to 60Hz or 60 to 50Hz (frequency conversion de-rates UPS capacity by 20%)
- Removes harmonic distortion, fast electrical impulses, frequency variations and other hard to solve power problems not addressed by other UPS types
- · Corrects line voltage conditions as low as 70V and as high as 144V to within 2% of selected nominal voltage
- Standard internal battery set offers 15 minutes runtime at half load (1250W) and 6 minutes at full load (2500W)
- Expandable battery runtime with optional BP72V15-2U (limit 1), BP72V28RT-3U (multi-pack compatible) and BP72V18-2US (multi-pack compatible) external battery packs
- Intelligent battery management system extends battery life
- Compact rackmount form factor installs using only 2 rack spaces (2U) with a depth of only 26 inches
- Ships with all mounting accessories for 4 post rackmount installation
- Optional 2POSTRMKITWM enables 2 post rackmount installation
- Optional 2-9USTAND accessory enables upright tower placement
- Fault tolerant electronic bypass maintains utility output during a variety of UPS fault conditions
- Network interfaces support simultaneous communications via built-in USB, DB9 serial / contact-closure and slot for network management card options
- Compatible with Tripp Lite UPS management card options TLNETCARD, WEBCARDLX and SNMPWEBCARD
- HID compliant USB interface enables integration with built-in power management and auto shutdown features of Windows and Mac OS X.
- USB & Serial ports enable data-saving unattended shutdown when used with Tripp Lite's PowerAlert software, available via FREE download from www.tripplite.com/poweralert
- Built-in Emergency Power Off (EPO) interface with cable
- NEMA L5-30P input plug / NEMA 5-15/20R & L5-30R output receptacles
- Integrated 2 bank switched PDU enables remote outlet management for load shedding or remote reboot of individual load banks (each bank has 3 outlets)
- Front panel LEDs offer current monitoring and battery charge level information
- Network grade AC surge suppression
- Field replaceable, hot swappable internal batteries and external battery packs
- \$250,000 Ultimate Lifetime Insurance (U.S., Canada, and Puerto Rico only)

## **Specifications**

ОИТРИТ	
Output Volt Amp Capacity (VA)	3000
Output kVA Capacity (kVA)	3
Output Watt Capacity (Watts)	2500
Output kW Capacity (kW)	2.5
Output Capacity Details	Max output is reduced to 2400W at 100V, 110V and 115V nominal settings OVERLOAD CAPACITY: Supports inverter operation up to 100% load continuously, 120% for 30 seconds, 150% for 10 seconds and >150% for 0.1 seconds before switching to BYPASS (when bypass input voltage and frequency are WITHIN bypass limits) or SHUTDOWN (when bypass input voltage or frequency are OUTSIDE bypass limits).
Power Factor	0.83
Crest Factor	3:1
Nominal Output Voltage(s) Supported	100V; 110V; 115V; 120V; 127V



Nominal Voltage Details	120V default
Frequency Compatibility	50 / 60 Hz
Frequency Compatibility Details	Output frequency matches input nominal on startup, defaults to 60 Hz on cold-start. Frequency conversion from 60 to 50 Hz -or- 50 to 60 Hz supported. Output capacity de-rates by 25% during frequency conversion operation.
Output Voltage Regulation (Line Mode)	+/- 2%
Output Voltage Regulation (Economy Line Mode)	-12%, + 10%
Output Voltage Regulation (Battery Mode)	+/- 2%
Output Receptacles	(6) 5-15/20R; (1) L5-30R
Load Management Receptacles	Two switchable three-outlet load banks
Output Circuit Breakers	20A (x2) - each breaker protects 3 5-15/20R outlets, L5-30R outlet is un-breakered
Output AC Waveform (AC Mode)	Pure Sine wave
Output AC Waveform (Battery Mode)	Pure Sine wave
INPUT	
Rated input current (Maximum Load)	24A
Nominal Input Voltage(s) Supported	100V AC; 110V AC; 115V AC; 120V AC; 127V AC
UPS Input Connection Type	L5-30P
Recommended Electrical Service	30A 120V
Input Cord Length (ft.)	10
Input Cord Length (m)	3.05
Input Phase	Single-Phase
BATTERY	
Full Load Runtime (min.)	6 min. (2500w)
Half Load Runtime (min.)	15 min. (1250w)
Expandable Battery Runtime	Supports extended runtime with optional external battery packs
External Battery Pack Compatibility	BP72V15-2U(limit 1); BP72V28RT-3U(multi-pack compatible); BP72V18-2US(multi-pack compatible)
DC System Voltage (VDC)	72
Battery Recharge Rate (Included Batteries)	Less than 4.8 hours from 10% to 90% (typical, full load discharge)
Internal UPS Replacement Battery Cartridge	RBC96-2U
Battery Access	Front panel battery access door
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 144	
Undervoltage Correction	2% output voltage regulation during undervoltages to 80	
Severe Undervoltage Correction	2% output voltage regulation during undervoltages to 70V (under 66% load only) or 60V (under 33% load only)	
USER INTERFACE, ALERTS & CONTROLS		
Switches	2 Switches control off/on power status and alarm-cancel/self-test operation	
Alarm Cancel Operation	Power-fail alarm can be silenced using alarm-cancel switch	
Audible Alarm	Audible alarm indicates power failure, low battery, overload, replace battery and EPO operation	
LED Indicators	14 LEDs indicate line power, online mode, economy/bypass mode, on-battery, overload, battery low, replace battery and fault status information; 4-LED meter displays load and battery charge levels; LED panel rotates for viewing in rack/tower formats	
SURGE / NOISE SUPPRESSION		
UPS AC Suppression Joule Rating	504 joules	
EMI / RFI AC Noise Suppression	Yes	
AC Suppression Response Time	Instantaneous	
PHYSICAL		
Included Mounting Accessory Description	Includes 4 post rackmount installation accessories	
Installation Form Factors Supported with Optional Accessories	2 post rackmount(2POSTRMKITWM); Tower(2-9USTAND)	
Primary Form Factor	Rackmount	
UPS Power Module Dimensions (hwd, in.)	3.5 x 17.3 x 26	
UPS Power Module Dimensions (hwd, cm)	8.89 x 43.94 x 66.04	
Rack Height (U Spaces)	2	
Minimum Required Rack Depth (inches)	37	
Minimum Required Rack Depth (cm)	93.98	
UPS Power Module Weight (lbs.)	68.8	
UPS Power Module Weight (kg)	31.21	
UPS Shipping Dimensions (hwd / in.)	9 x 22 x 32.8	
UPS Shipping Dimensions (hwd / cm)	22.86 x 55.88 x 83.31	





Shipping Weight (kg)	35.5
Cooling Method	Fan
UPS Housing Material	Steel
Minimum Required Rack Depth (mm)	940
Primary UPS Height (mm)	89
Primary UPS Width (mm)	439
Primary UPS Depth (mm)	660
Shipping Height (mm)	229
Shipping Width (mm)	559
Shipping Depth (mm)	833
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)	1000
AC Economy Mode BTU / Hr. (Full Load)	241
Battery Mode BTU / Hr. (Full Load)	1507
AC Mode Efficiency Rating (100% Load)	89%
AC Economy Mode Efficiency Rating (100% Load)	97%
COMMUNICATIONS	
Communications Interface	USB (HID enabled); DB9 Serial; Contact closure; EPO (emergency power off); Slot for SNMP/Web interface
Network Management Cards	SNMPWEBCARD; TLNETCARD; WEBCARDLX
Network Monitoring Port Description	Supports detailed monitoring of UPS and site power conditions; DB9 port supports RS232 and contact closure communications
PowerAlert Software	For local monitoring via the UPS's built-in communication ports, download PowerAlert Local software at http://www.tripplite.com/poweralert
Communications Cable	USB and DB9 cabling included
WatchDog Compatibility	Supports Watchdog application, OS and hard-reboot restart options for remote applications
LINE / BATTERY TRANSFER	
Transfer Time	No transfer time (0 ms.) in online, double-conversion mode
Low Voltage Transfer to Battery Power (Setpoint)	80V (100% load), 70V (66% load), 60V (33% load)



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High Voltage Transfer to Battery Power (Setpoint)	144		
SPECIAL FEATURES			
Cold Start (Startup in Battery Mode During a Power Failure)	Cold-start operation supported		
High Availability UPS Features	Automatic inverter bypass; Hot swappable batteries		
Green Energy-Saving Features	High efficiency economy mode operation; Individually controllable load banks; Schedulable daily hours of economy mode operation		
CERTIFICATIONS			
UPS Certifications	Tested to UL1778 (USA); Tested to CSA (Canada); Tested to NOM (Mexico); 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		

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