

# SmartOnline 208/230V 1000VA 900W Double-Conversion UPS - 6 Outlets, Extended Run, Card Slot, LCD, USB, DB9, 2U

# MODEL NUMBER: SUINT1000LCD2U











On-line double-conversion UPS provides pure sine wave AC output to server and network equipment in data centers and computer rooms.

## **Features**

## Double-Conversion UPS Protects Equipment against Damage, Downtime and Data Loss

This 200/208/220/230/240V 50/60 Hz UPS system maintains perfect output by converting AC input to DC, then reconverting UPS output to fully regulated sine wave AC with +/-2% voltage regulation in online and battery modes. Featuring a 900W capacity, high 0.9 power factor, 627 joules of surge suppression, true on-line operation with pure sine wave output and zero transfer time to battery mode in on-line double-conversion mode, the SmartOnline® SUINT1000LCD2U double-conversion UPS provides the highest level of AC power protection and battery backup for critical network closet, computer room and data center equipment.

## Set Power Strategies to Reflect Your Protection Priorities

Pick your power strategy, from precise power for sensitive systems to the highest possible electrical efficiency, while ensuring 100% uptime. Choose from five selectable strategies: Max Efficiency, Max Quality, Frequency Regulation, Frequency Conversion and Auto Adaptive, which automatically offers increased efficiency when power conditions are good and enhanced power quality when power conditions are poor.

## Individually Controllable Load Banks Let You Access and Control Outlets Remotely

Four C13 outlets are split evenly into two switchable load banks, allowing you to reboot select components or shed loads remotely. In addition to those four outlets, this UPS provides two more C13 outlets in their own unswitched bank for powering critical components.

# Reliable, Expandable Battery Backup Keeps You Operational Through Power Outages

The field-replaceable, hot-swappable internal battery (RBC24S) provides 12.3 minutes of support at half load (450W) and 4.7 minutes at full load (900W), keeping protected equipment operational through power failures. For mission-critical applications demanding scalable extended runtime, the UPS supports "smart" external battery packs, such as BP24V36-2US (sold separately). Both the internal and external batteries are automatically sensed and configured during replacement to offer accurate runtime-remaining and battery age notifications. The intelligent battery management system with temperature-compensated charging extends battery life.

## **Automatic Bypass Maintains Utility Output During Fault Conditions**

# **Highlights**

- Offers network-grade protection against power failures and voltage fluctuations
- Zero transfer time between online and battery modes for uninterrupted operation
- Optional external battery packs provide additional runtime for applications requiring it
- Add optional WEBCARDLX with latest version of PADM20 for IPbased Auto Probe feature
- ENERGY STAR-certified to save electricity, lower costs, and protect the environment

## **Applications**

- Deliver perfectly regulated sine wave output to mission-critical equipment
- Protect connected components from dangerous surges, spikes and line noise
- Keep equipment operational through power failures
- Allow time to save data and safely shut down components in case of a prolonged blackout

# **Package Includes**

- SUINT1000LCD2U SmartOnline Double-Conversion UPS
- USB cable
- RS-232 cable
- EPO cable
- (2) C13-to-C14 power cables
- 4-post rack-mounting hardware
- Owner's manual



Auto-bypass mode keeps connected equipment powered and operational, even during UPS fault conditions.

**ENERGY STAR-Certified Economy Mode Helps You Save Money and Protect the Environment**By meeting strict EPA efficiency guidelines, this ENERGY STAR-certified UPS system helps you save money and energy. A power-saving Economy mode setting option offers enhanced efficiency and reduced BTU output when utility power is already high quality.

## **Automatically Turns Back On After Power Is Restored**

Battery-independent restart ensures automatic UPS power-up without user interaction after lengthy power outages, even when batteries are expired and require replacement.

## Intuitive Front-Panel Interface for Convenient UPS Operation and Monitoring

The front-panel LCD screen reports UPS operating mode, detailed UPS status and site-power information, as well as a variety of advanced UPS setup and configuration options. LEDs indicate AC input/output, battery and fault status.

## **Advanced Communications Ports Allow for Automatic Saves and Shutdowns**

RS-232 and HID-compliant USB ports connect to a computer running free downloadable PowerAlert® software to enable safe unattended file saves and system shutdown in case of a prolonged power failure. An EPO port connects the UPS to a contact closure switch to enable emergency inverter shutdown. Cables are included.

#### Optional WEBCARDLX Network Interface Offers 24/7 Remote Access for Monitoring and Control

The optional WEBCARDLX (sold separately) with the latest version of PowerAlert Device Manager firmware (PADM20) provides enhanced remote management capabilities, including customizable dashboard graphs to fit user preferences. The PADM20 upgrade and PowerAlert Element Manager (PAEM) software form a powerful tool for expanding maintenance functions in large installations, including firmware update checks and backup and restoration of device configurations. Auto Probe allows a UPS with switched loads to automatically reboot devices if a network communication failure is detected.

## **Versatile Installation Options**

Hardware is included for mounting the UPS system in 2U of space in an EIA-standard 19-inch 4-post rack. Use the optional 2POSTRMKITWM (sold separately) for 2-post rack mounting or the optional 2-9USTAND (sold separately) for mounting in an upright tower position. The C14 power inlet accepts a variety of user-supplied input cords.

# **Specifications**

OVERVIEW		
UPC Code	037332185648	
UPS Type	On-Line	
INPUT		
Input Phase	Single-Phase	
Rated input current (Maximum Load)	4.99A	
Nominal Input Voltage(s) Supported	200V AC; 208V AC; 220V AC; 230V AC; 240V AC	
UPS Input Connection Type	C14 inlet	
OUTPUT		
Output Capacity (VA)	1000	



Output Capacity (kVA)	1
Output Capacity (Watts)	900
Output Capacity (kW)	0.9
Output Capacity Details	DE-RATING INFORMATION: Max output in Frequency Conversion mode is reduced to 630 watts for 208/220/230/240V output voltages; Max output is 720W (504W in Frequency Conversion mode) at 200V output voltage  OVERLOAD CAPACITY: Supports inverter operation up to 105% load continuously, 125% for 3 minutes, 150% for
	30 seconds and >150% for 0.5 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	0,9
Crest Factor	3:1
Nominal Voltage Details	Nominal output voltage is user configured on first power-on
Frequency Compatibility	50 / 60 Hz; Supports 50 to 60 Hz and 60 to 50 Hz conversion
Frequency Compatibility Details	Output frequency matches input nominal on startup; Output capacity de-rates by 30% during frequency conversion operation
Output Voltage Regulation (Line Mode)	+/- 2%
Output Voltage Regulation (Economy Line Mode)	+/- 10%
Output Voltage Regulation (Battery Mode)	+/- 2%
Included Output Power Cables	Includes 2 C13 to C14 power cables
Load Management Receptacles	Two switchable 2-outlet load banks
Output AC Waveform (AC Mode)	Pure Sine wave
Output AC Waveform (Battery Mode)	Pure Sine wave
Nominal Output Voltage(s) Supported	200V; 208V; 220V; 230V; 240V
Output Receptacles	(6) C13
Individually Controllable Load Banks	Yes
BATTERY	
Battery Type	Valve Regulated Lead Acid (VRLA)
Runtime Full Load (min.)	4.7 min. (900W)
Runtime Half Load (min.)	12.3 min. (450W)
Expandable Runtime	Yes
External Battery Pack Compatibility	<a class="productLink" href="//tripplite.eaton.com/External-24V-2U-Rack-Tower-Battery-Pack-for-select-Tripp-Lite-UPS-Systems~BP24V15RT2U">BP24V15RT2U</a> (limit 1); <a class="productLink" href="//tripplite.eaton.com/External-24V-2U-Rack-Tower-Battery-Pack-select-Tripp-Lite-UPS-Systems~BP24V28-2U">BP24V28-2U</a> (limit 1); <a class="productLink" href="//tripplite.eaton.com/external-24V-2u-rack-mount-battery-pack-for-tripp-lite-ups-systems-SMART750-SU750-SU1000-SUINT1000-and-more~BP24V36-2US">BP24V36-2US</a> (multi-pack compatible); <a class="productLink" href="//tripplite.eaton.com/External-24V-3U-Rack-Tower-Battery-Pack-select-Tripp-Lite-UPS-Systems~BP24V70-3U">BP24V70-3U</a> (multi-pack compatible)
DC System Voltage (VDC)	24



Battery Recharge Rate (Included ,	
Batteries)	Less than 4.1 hours from 10% to 90% (typical, full load discharge)
Battery Access F	Front panel battery access door
	<a class="productLink" href="//tripplite.eaton.com/UPS-Replacement-Battery-Cartridge-for-Tripp-Lite-SUINT1000LCD2U-UPS-System-24v~RBC24S">RBC24S</a>
Battery Replacement Description	Hot-swappable, replaceable batteries
VOLTAGE REGULATION	
Voltage Regulation Description (	Online, double-conversion power conditioning
Overvoltage Correction 2	2% output voltage regulation during overvoltages to 288V
Undervoltage Correction 2	2% output voltage regulation during undervoltages to 160V (100% load), 130V (70% load), 100V (30% load)
USER INTERFACE, ALERTS & CONTR	ROLS
Front Panel LCD Display	Interactive front-panel LCD interface reports UPS operating mode, detailed UPS status and site-power information; LCD interface also enables a variety of advanced UPS setup and configuration options
Switches 5	5 front panel switches: On/Off, Up, Down and Escape
Alarm Cancel Operation F	Power-fail alarm can be silenced by following on-screen prompts
Audible Alarm	Audible alarm indicates power failure, low battery, overload and fault
LED Indicators	4 front panel LEDs: AC input (green), AC output (green), Battery (yellow), Fault (red)
SURGE / NOISE SUPPRESSION	
UPS Dataline Suppression Details	Single line dialup / network dataline protection included
EMI / RFI AC Noise Suppression	Yes
AC Suppression Joule Rating	627
AC Suppression Response Time	Instantaneous
PHYSICAL	
Primary Form Factor F	Rackmount
Rack Height 2	2U
Cooling Method F	Fan
	Included 4POSTRAILKIT mounting bracket enables installation in 4 post racks from 20.5 to 36 inches (521 to 914mm)
Installation Form Factors Supported with Included Accessories	4 post 19 inch rackmount
with Optional Accessories  A  F  F  C  G  G  G  G  G  G  G  G  G  G  G  G	2 post rackmount ( <a class="productLink" href="//tripplite.eaton.com/2-Post-Rack-Mount-Wall-Mount-Adapter-Kit-select-Rack-Mount-UPS-Systems~2POSTRMKITWM">2POSTRMKITWM</a> ); 2-4 post front rail rackmount ( <a class="productLink" href="//tripplite.eaton.com/Heavy-Duty-2-post-Front-Mounting-Ear-Kit~UPSHDEARKIT">UPSHDEARKIT</a> ); 4 post rackmount short-depth ( <a class="productLink" href="//tripplite.eaton.com/4-Post-1U-Universal-Adjustable-Rack-Mount-Shelf-Kit-for-Wall-Mount-Racks~4POSTRAILKITWM">4POSTRAILKITWM</a> ); Tower ( <a class="productLink" href="//tripplite.eaton.com/2U-9U-Tower-Stand-Kit-select-Rack-Mount-UPS-Systems~2-9USTAND">2-9USTAND"&gt;2-9USTAND"&gt;2-9USTAND</a> ); Wallmount (



Minimum Required Rack Depth (inches)	19	
Minimum Required Rack Depth with External Battery Pack (cm)	48	
Minimum Required Rack Depth with External Battery Pack (in.)	18.75	
Minimum Required Rack Depth without External Battery Pack (cm)	46	
Minimum Required Rack Depth without External Battery Pack (in.)	18	
Optional Mounting Accessory Notes	Optional <a class="productLink" href="//tripplite.eaton.com/2U-9U-Tower-Stand-Kit-select-Rack-Mount-UPS-Systems~2-9USTAND">2-9USTAND</a> enables upright tower UPS placement; <a class="productLink" href="//tripplite.eaton.com/2-Post-Rack-Mount-Wall-Mount-Adapter-Kit-select-Rack-Mount-UPS-Systems~2POSTRMKITWM">2POSTRMKITWM</a> enables wall-mount and 2-post rackmount installation; <a class="productLink" href="//tripplite.eaton.com/Heavy-Duty-2-post-Front-Mounting-Ear-Kit~UPSHDEARKIT" productlink"="">UPSHDEARKIT</a> enables installation in 2 or 4-post racks using front vertical rails only, without rear support	
Primary UPS Depth (mm)	397	
Primary UPS Height (mm)	88	
Primary UPS Width (mm)	438	
Shipping Dimensions (hwd / in.)	9.60 x 19.80 x 23.50	
Shipping Dimensions (hwd / cm)	24.38 x 50.29 x 59.69	
Shipping Weight (lbs.)	44.00	
Shipping Weight (kg)	19.96	
UPS Housing Material	Metal	
UPS Power Module Dimensions (hwd, cm)	8.79 x 43.79 x 39.70	
UPS Power Module Dimensions (hwd, in.)	3.46 x 17.24 x 15.63	
UPS Power Module Weight (kg)	12.70	
UPS Power Module Weight (lbs.)	28	
Unit Weight (lbs.)	28.000	
Unit Weight (kg)	12.70	
ENVIRONMENTAL	ENVIRONMENTAL	
Operating Temperature Range	32° to 104°F (0° to 40°C)	
Storage Temperature Range	5° to 122°F (-15° to 50°C)	
Relative Humidity	5 to 95%, non-condensing	
AC Mode BTU / Hr. (Full Load)	245	
AC Economy Mode BTU / Hr. (Full Load)	128	
AC Mode Efficiency Rating (100% Load)	>93%	



AC Economy Mode Efficiency Rating	>96%
(100% Load) Online Mode Heat Dissipation	
(BTU/Hr) @ Full Load	245
Battery Mode Heat Dissipation (BTU/Hr) @ Full Load	500
Audible Noise	<45dB at front side 1M
Operating Elevation (m)	Up to 3000m
COMMUNICATIONS	
Network Management Cards	WEBCARDLX
PowerAlert Software	Free download from https://tripplite.eaton.com/products/power-alert
Communications Cable	USB and DB9 cabling included
WatchDog Compatibility	Supports Watchdog application, OS and hard-reboot restart options for remote applications
Network Management Card Description	Network management card optional
Communications Interface	Contact closure; DB9 Serial; EPO (emergency power off); Slot for SNMP/Web interface; USB (HID enabled)
LINE / BATTERY TRANSFER	
Transfer Time	No transfer time (0 ms.) in online, double-conversion mode; 3-9 ms. transfer time during economy mode operation
Low Voltage Transfer to Battery Power (Setpoint)	160V (100% load), 140V (66% load), 120V (33% load)
High Voltage Transfer to Battery Power (Setpoint)	288V
FEATURES & SPECIFICATIONS	
Cold Start (Startup in Battery Mode During a Power Failure)	Cold-start operation supported
High Availability UPS Features	Auto Probe Monitoring and Reboot (requires WEBCARDLX); Automatic inverter bypass; Hot swappable batteries; Remote management; Surge/noise protection; Zero transfer time
Green Energy-Saving Features	High efficiency economy mode operation; Individually controllable load banks
Grounding Details	Back panel grounding lug included
APPLICATIONS	
UPS Applications	Mission Critical Applications
STANDARDS & COMPLIANCE	
Product Certifications	CSA (Canada); NOM (Mexico); UL 1778
Product Compliance	RoHS; SASO (Saudi Arabia); CE (Europe); EAC (Belarus, Kazakhstan, Russia); ENERGY STAR Qualified
WARRANTY & SUPPORT	



Product Warranty Period (Worldwide)	2-year limited warranty
Connected Equipment Insurance (U.S., Canada & Puerto Rico)	\$250,000 <a class="insuranceLink" href="//tripplite.eaton.com/support/insurance-policy">Ultimate Lifetime Insurance</a>



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