

# Smart-UPS On-Line 230 V

Unity output power factor single-phase, double-conversion online UPS with advanced management features



## A versatile UPS developed for unstable power conditions worldwide

Smart-UPS™ On-Line provides high-density, double-conversion, online power protection for servers, voice/data networks, medical labs, and light industrial applications. The Smart-UPS On-Line is capable of supporting loads from 5 kVA to 10 kVA in a rack/tower convertible chassis. The 6 kVA, 8 kVA, and 10 kVA models feature unity output power factor enabling them to support power-hungry blade servers or heavily loaded equipment racks. When business-critical systems require runtime in hours, not minutes, Smart-UPS On-Line can be configured with multiple battery packs to meet aggressive runtime demands.

The included PowerChute™ Network Shutdown management software provides unattended graceful shutdown of network operating systems. All models include an integrated network management card for remote management. The entire Smart-UPS On-Line family provides value to customers with demanding power conditions, including a very wide input voltage window, extremely tight output voltage regulation, frequency regulation, internal bypass, and input power factor correction.

# Smart-UPS On-Line

Industry-leading power factor maximizing UPS density

Rackmount and Tower SRT 5 kVA – 10 kVA



[SRT6KXLI shown]

## Standard Features

### Best-in-class Power Density:

More real power in watts, 0.9 pf on 5 kVA, Unity on 6 kVA – 10 kVA units

### High-efficiency “Green Mode”:

Achieves 98% efficiency, which saves utility and cooling costs without compromising performance or reliability

### Graphical LCD Display with Multicolor Backlight:

Intuitive interface provides detailed and accurate information with ability to configure locally

### Intelligent Battery Management:

Temperature-compensated charging extends life and advanced algorithms recommend replacement date. The UPS can inform user which batteries need to be replaced and auto detect when additional battery packs are added

### Built-in Energy Meter:

Measures energy use and displays UPS efficiency in various modes of operation for easy energy tracking

### Operate without Battery:

Ability to immediately protect equipment when power returns after a complete discharge of the battery

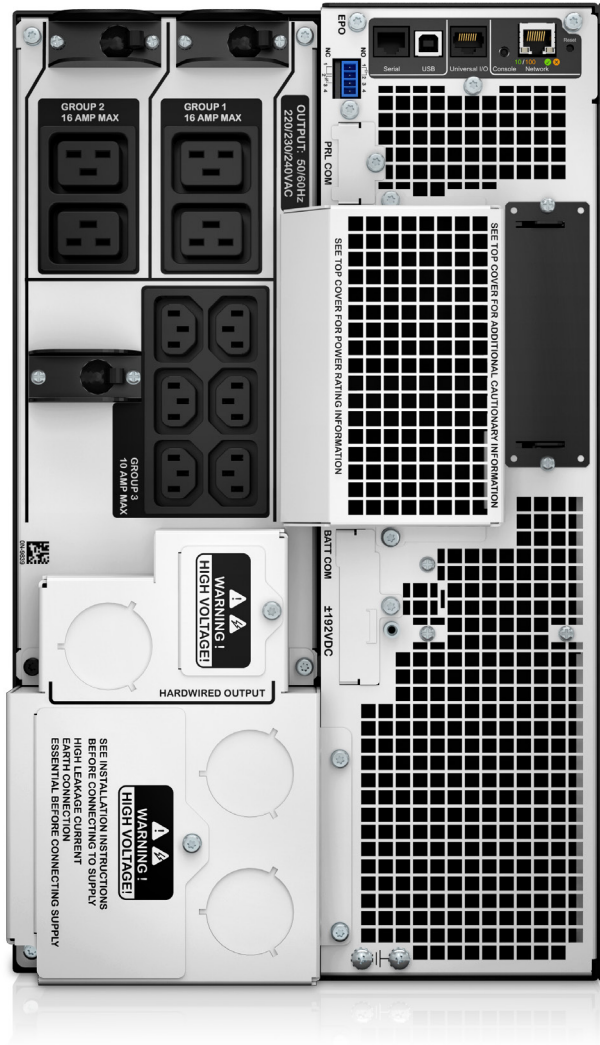
### Three-year Warranty on Electronics:

Additional year of warranty protection for electronics provides peace of mind

# Smart-UPS On-Line

Proven performance with the world's largest installed base of single-phase, double-conversion products

Rackmount and Tower SRT 5 kVA – 10 kVA



[ SRT10KXLI shown ]

## Additional Features

### Embedded Network Management Card with Environmental Monitoring:

Remote monitoring and control of the UPS and the environment via Ethernet connection while freeing up the SmartSlot™ so customers can add accessories for additional communication options

### Switched Outlet Group(s):

Ability to control a group of output load receptacles independent from the main UPS. Enables:

- Rebooting hung device without cycling the entire UPS
- Sequenced turn ON/OFF
- Shedding of noncritical loads based on a variety of parameters (battery time, runtime remaining, and overload)
- Scheduled time OFF to conserve energy

### Emergency Power Off (EPO):

Remote UPS shutoff in the event of a fire or other emergency. The UPS can accept normally open (NO) or normally closed (NC) contacts

### Communication Ports:

Serial, USB, Ethernet, and SmartSlot for network accessory cards

### Communication Protocols:

Modbus Serial, USB Power Summary, HTTP, SNMP, and Telnet

### 1:1, 3:1 Input Hard-wire Options:

Product can be wired for 3-PH or 1-PH input (230 V, 8 kVA, and 10 kVA models only)

### Dual Input:

Enables second input source to be connected to UPS bypass (230 V, 8 kVA, and 10 kVA models only)

# Smart-UPS On-Line Display

Intuitive, easy-to-use LCD provides clear and accurate information in multiple languages



## Backlight screens:

**Amber:** Indication of condition that requires attention

**Red:** Indication of UPS alarm that requires immediate attention



## Standard Features

### LCD Display Screen:

Accurately provides real-time status updates in your choice of basic or advanced menus

### UPS Status (Scrolling):

- Output voltage
- Input voltage
- Output frequency
- Runtime
- Load
- Battery health

### Control:

- UPS and outlet group settings
- Bypass control

### Configuration:

- Output voltage, frequency
- Language, brightness, contrast
- Alarm volume
- IP address

### Test and Diagnostics:

- Initiate battery and runtime calibration tests

### About:

- UPS serial number, battery part number
- Battery install and suggested replacement dates

# Product Accessories

## Management Cards

**AP9630:** UPS Network Management Card with PowerChute Network Shutdown

**AP9631:** UPS Network Management Card with PowerChute Network Shutdown & Environmental Monitoring

**AP9335TH:** APC™ by Schneider Electric™ Temperature & Humidity Sensor

**AP9810:** APC Dry Contact I/O Accessory

**AP9624:** UPS Interface Expander

## Battery Packs

**SRT192BP:** APC Smart-UPS SRT 192 V, 5 kVA, and 6 kVA Battery Pack

**SRT192RMBP:** APC Smart-UPS SRT 192 V, 5 kVA, and 6 kVA RM Battery Pack

**SRT192BP2:** APC Smart-UPS SRT 192 V, 8 kVA, and 10 kVA Battery Pack

**SRT192RMBP2:** APC Smart-UPS SRT 192 V, 8 kVA, and 10 kVA RM Battery Pack

**SRT002:** APC Smart-UPS SRT 15 ft. Extension Cable for 192 VDC External Battery Packs 5/6 kVA UPS

**SRT003:** APC Smart-UPS SRT 15 ft. Extension Cable for 192 VDC External Battery Packs 8/10 kVA UPS

## Rail Kits

**SRTRK2:** APC Smart-UPS SRT 19 in. Rail Kit for Smart-UPS SRT 5/6/8/10 kVA

**SRTRK3:** APC 2-Post Mounting Rail Kit for Smart-UPS SRT

## Backplate Kit

**SRT001:** APC Smart-UPS SRT 5 kVA Output HW Kit

## Transformers

**SURT002:** APC Smart-UPS RT 5,000 VA 230 V Isolation Transformer

**APTF10KW01:** APC WW 10 kVA Isolation Transformer

## Service Bypass Panels

**SBP6KRM12U:** APC Service Bypass Panel 230 V; 50 A; MBB; Hardwire input; (4) IEC-320 C19 Output

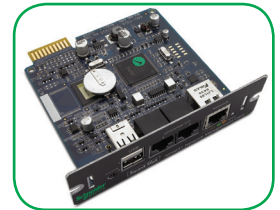
**SBP10KRM14U:** APC Service Bypass Panel 230 V; 100 A; MBB; Hardwire input; IEC-320 output (8) C13 (2) C19

## Other

**SURT013:** SURT Equipment Cart

## Replacement Battery Cartridge

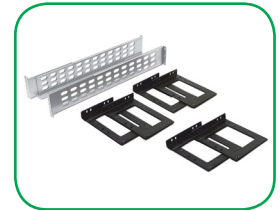
**APCRBC140**



Management Card



Battery Pack



Rail Kits

## Runtime Estimates at Half and Full Load (Minutes)

UPS Half/Full Loads	SRT5KXLI SRT5KRMXLW-HW (2,250 W/4,500 W)	SRT6KXLI (3,000 W/6,000 W)	SRT8KXLI (4,000 W/8,000 W)	SRT10KXLI (5,000 W/10,000 W)
Internal	11.8/4	8.7/2.5	14.5/5.2	11.5/3.8
(1) Battery pack	46.2/20.5	36/15.5	34.5/14.7	28/11.6
(2) Battery packs	83/38	65.2/29.4	55.43/24.63	45.3/19.8
(3) Battery packs	121/56.4	95.5/43.8	77/34.84	63.1/28.2
(4) Battery packs	160.4/75.1	126.6/58.6	99.1/45.33	81.3/36.8

# Smart-UPS On-Line SRT 5 kVA – 10 kVA

## Technical Specifications

Product feature	SRT5KRMXLW-HW	SRT5KXLI SRT5KRMXLI	SRT6KXLI SRT6KRMXLI	SRT8KXLI SRT8KRMXLI	SRT10KXLI SRT10KRMXLI
Output					
Power rating	5,000 VA/4,500 W		6,000 VA/6,000 W	8,000 VA/8,000 W	10,000 VA/10,000 W
Nominal output voltage	230 V (220 V, 240 V, 208 V user selectable)	230 V (220 V, 240 V User Selectable)			
Output frequency	50/60 Hz ± 3 Hz (auto sense)    50/60 Hz ± 0.1 Hz (user selectable)				
Topology	Double-conversion Online				
Online efficiency at full load (typical)	94%				
Green mode efficiency at full load (typical)	98%				
Output connections	Hardwire three-wire (1 PH + N + G) or (2 PH + G)	(6) IEC 320 C13 (4) IEC 320 C19	(6) IEC320 C13, (4) IEC320 C19, Hardwire three-wire (1 PH + N + G)		
Input					
Nominal input voltage	208 V, 220 V, 230 V, 240V	220 V, 230 V, 240 V		220 V/380 V, 230 V/400 V, 240 V/ 415 V	
Input voltage range full load (half load)	160 – 275 V (100 – 275 V)			160/277 - 275/476 V (100/173-275/476 V)	
Input frequency	40 – 70 Hz auto-selecting				
Input connection	Hardwire three-wire (1 Ph+N+G) or (2 PH + G)	Hardwire three-wire (1 Ph+N+G)		Hardwire three-wire (1Ph+N+G), Hardwire five-wire (3 Ph+N+G)	
Batteries and runtime					
Battery type	Maintenance-free sealed lead-acid battery with suspended electrolyte, leak proof				
Typical backup time at 1/2 load (min.)	11.8 min.		8.7 min.	14.5 min.	11.5 min.
Typical backup time at full load (min.)	4 min.		2.5 min.	5.2 min.	3.8 min.
Replacement battery (quantity)	APCRBC140 (1)			APCRBC140 (2)	
External battery pack (tower/rack mount)	SRT192BP/SRT192RMBP			SRT192BP2/SRT192RMBP2	
Communication and management					
Interface ports	Embedded Network Management with Environmental Monitoring which includes an RJ-45 with Status LEDs (10/100 Base-T), Serial (RJ45), USB (Type B), and SmartSlot				
Control panel	High Resolution Graphical LCD display				
Emergency power off (EPO)	Yes (normally open, NO/ normally closed, NC connections)				
Physical					
Rack height	3 U		4 U	6 U	6 U
Maximum height (RM)	130 mm		174 mm	263 mm	263 mm
Maximum width (RM)	432 mm		432 mm	432 mm	432 mm
Maximum depth (RM)	719 mm		719 mm	715 mm	715 mm
Net weight	54.5 kg		60 kg	112 kg	112 kg
Conformance					
Regulatory	CE, VDE, C-tick, EAC, EN 50091-1, EN 50091-2, IEC62040-2 2005 Edition, IEC60950, UL-1778, FCC Part 15 Class A, CSA	CE, VDE, C-tick, EAC, EN 50091-1, EN 50091-2, IEC62040-2 2005 Edition, IEC60950			
Warranty	3 years electronics, 2 years battery				