



# 31RS Series 10KVA - 20KVA

High Frequency Online UPS RS Series

31RS Series 10KVA - 20KVA (3ph in / 1ph out)



## Key Features:

- **Zero Transfer Time**
- **Advance DSP base digital control** bring high performance of high input Power factor, low distortion , supply the load with perfect sine wave AC power supply
- **Three Level Inverter**  
Low harmony noise, high efficiency , excellent loading capability
- **Versatile Input Phase**
- **Ultra Wide Input Mains Range**  
Strong compatible with ultra with electric environment, stay well with ultra wide range mains of 90V~300V, 40~70Hz ,dramatically reduce battery discharge , prolong battery life
- **Best Loading Capability**  
Up to 0.9 Output Power Factor , 50/60 Hz Automatically adapting, selectable voltage , perfectly match all kind of application
- **Genset Compatible**
- **High Input Power Factor**  
Thanks to digital controlled PFC Technology, >0.99 input power factor
- **Reliable Design**  
Made with strong Glass fiber base (FR4) double side PCB, company with large span component, greatly improve reliability in harsh environment, Well designed ventilation and conformal coating , avoid dust accumulation ,improve resistant to corrosion
- **Open To Customization**  
Based on powerful controller and open architecture, the product is able to be customized to match need of integration of automatic system or intelligent supervisory system

**Shenzhen UPSen Electronic CO.,Ltd.**  
[www.upsen.net](http://www.upsen.net)

# Technical Specification:

Model		31RS10K	31RS10KL	31RS15K	31RS15KL	31RS20K	31RS20KL
Power Rating (VA / W)		10KVA / 9KW		15KVA / 13.5KW		20KVA / 18KW	
Topology		Double Conversion Online UPS					
Phase		Single Phase Input Single Phase Output OR 3 Phases Input Single Phase Output					
AC Mains Input	Input Wiring	Single Phase L/N+PE OR 3 Phases (L1,L2,L3,N)/N+PE					
	Rated Voltage	208 / 220 / 230 / 240VAC					
	Voltage Range	Line-Neutral 90~300VAC			Line-Line 150~500VAC		
	Input Frequency Range	40Hz - 70Hz					
	Input Power Factor	≥0.99					
AC Output	Rated Voltage	208 / 220 / 230 / 240VAC					
	Voltage Regulation	±1%					
	Output Wiring	L / N + PE					
	Output Frequency Range	50 / 60 ± 4Hz(Sync Mode) / 50 / 60Hz ± 0.1%(Free Run)					
	Waveform	Pure Sine Wave					
	Output Distortion (THDV%)	<2% (Linear Load) <7% (Non-Linear Load)					
	Overload Capability	10Min@105%~125%Rated Load 60Sec.@125%~150%Rated Load 0.5Sec.@>150%Rated Load					
Efficiency	AC / AC Mode	> 94%					
	DC / AC Mode	> 92%					
Battery & Charger	Battery Voltage / Quantity	192VDC Internal	192 / 240VDC (External)	192VDC Internal	192 / 240VDC (External)	192VDC Internal	192 / 240VDC (External)
	Battery Capacity	12V/7AH * 16pcs	External Battery Depends	12V/7AH * 32pcs	External Battery Depends	12V/7AH * 32pcs	External Battery Depends
	Backup Time	>6mins @ Half Load		>8mins @ Half Load		>6mins @ Half Load	
	Charging Current	Standard Model with Internal Battery: 1A Long Backup Time Model: 4A					
Physical	Chassis Style	RACK					
	Rack Dimension	31RS 10KL: 438mm(W) * 132mm(3U)(H) * 500mm(D) 31RS 15KL / 31RS 20KL: 4U 438(W) * 176 (H) * 530 (D) MM					
	Weight (KG)	8.9	4.2	14	5.9	21.6	8.3
HMI	LCD DISPLAY	RS232 Standard Offer,USB Optional					
	Standards Communication	1. RS232 PORT 2. NMC Card: Support remote monitor the UPS via Smart Phone APP, Web page, PC Monitor Software, Support Server / NAS shutdown					
	Optional Extension Card	CMC MODBUS Card, USB Card, Relay Card (Needs assembly according to order request before shipping)					
Environment	Operating Temperature	-10°C ~ 50°C					
	Operating Humidity	0-98% (Non-Condensation)					
	Acoustics Noise	<60dB @ 1 Meters					
*Product Specifications are Subject to Change Without Notice.							