

AR890

10KVA ~ 120KVA (3:3)
PF 0.9



AR890 10KVA ~ 120KVA (208V) is three-phase input and three-phase output uninterruptible power supply system for Latin Americans's applications with line voltage 200 / 208 / 220Vac. It adopts on-line double-conversion technology controlled by DSP (Digital Signal Processor) microprocessor. It complies with advanced design criteria improving the performance of components, minimizing the quantity of raw material used on the magnetism and reducing the number of semiconductors thus reducing servicing time and ownership costs. The UPS has high input power factor (> 0.99) with built-in output isolation transformer. The inverter transformer prevents the direct feed-through of the battery potential into the critical load and allows a very high rejection ratio of the power supply disturbances (spikes, surges etc).

Features

- Online double-conversion with full DSP control
- IGBT rectifier and high input power factor (>0.99)
- IGBT inverter with output isolation transformer
- 100% unbalance load capability
- Output power factor 0.9
- Generator compatible
- Support battery cold start and mains supply self-starting
- ECO mode operation for energy saving
- Perfect protective function
- 5.7 inches LCD touch screen, friendly human & machine interface
- Front access makes maintenance and replacement easy (50 ~ 120KVA)
- Intelligent self diagnose function, all kinds of fault protection, large capability of history record storage
- High MTBF (> 200,000 h)
- Low MTTR (< 0.5 h)
- Standard emergency power off (EPO)
- Standard RS232, RS485, dry contacts communication port
- Optional SNMP communication port
- Optional N+X redundancy parallel up to 6 units

Specifications

MODEL	AR8910	AR8915	AR8920	AR8930	AR8940	AR8950	AR8960	AR8980	AR89100	AR89120
Capacity	10KVA 9KW	15KVA 13.5KW	20KVA 18KW	30KVA 27KW	40KVA 36KW	50KVA 45KW	60KVA 54KW	80KVA 72KW	100KVA 90KW	120KVA 108KW
INPUT										
Rated voltage	200 / 208 / 220Vac									
Voltage range	146 ~ 270Vac (166V ~ 250Vac full load)									
Rated frequency	50 / 60Hz									
Frequency range	50 / 60Hz ± 5Hz									
Power factor	≥ 0.99									
Current distortion	≤ 5%									
Bypass voltage range	± 20%									
ECO voltage range	± 10%									
OUTPUT										
Voltage	200 / 208 / 220Vac									
Voltage regulation	± 1%									
Frequency	Synchronized with utility in AC mode; 50 / 60Hz ± 0.1% in battery mode									
Waveform	Sinusoidal									
Crest factor	3:1									
Total harmonic distortion(THDV)	≤ 1% (linear load); ≤ 5% (non-linear load)			≤ 2% (linear load); ≤ 8% (non-linear load)						
Transfer time	Mains mode to battery mode: 0 ms Inverter model to bypass mode: 0 ms ECO mode to Inverter model: max. 10 ms									
Inverter overload capability	105%: long time running; 105% ~ 110%: transfer to bypass in 1 h 110% ~ 125%: transfer to bypass in 10 mins 125% ~ 150%: transfer to bypass in 1 min 150% ~ 200%: transfer to bypass in 200 ms > 200%: transfer to bypass in 100 ms									
Bypass overload capability	≤ 150%: long time running 150% < load < 200%: power off in 1 min > 200%: power off in 100 ms									
BATTERIES										
DC voltage	360V (default 12V × 30pcs, 28pcs ~ 32pcs settable)									
Inbuilt battery of standard model	Max. 60 × 12V / 9Ah (optional external battery available)					External battery				
Charger current	25A	25A	50A	75A	100A	100A	150A	150A	200A	200A
SYSTEM										
Alarm	Battery mode, battery voltage low etc					Battery mode, battery voltage low, fans fault etc				
Surge protection	IEC 60664-1									
Insulation resistance	> 2MΩ (500Vdc)									
Dielectric strength	2820Vdc, No arc in 1min									
IP rating	IP 20									
EMI	EN 62040-2									
EMS	IEC61000-4-2 (ESD)									
	IEC61000-4-3 (RS)									
	IEC61000-4-4 (EFT)									
	IEC61000-4-5 (surge)									
COMMUNICATIONS										
RS232 / RS485 / dry contacts (standard)	Supports Windows 98 / 2000 / 2003 / XP / Vista / 2008 / 7 / 8 / 10									
SNMP (option)	Power management from SNMP manager and web browser									
OTHERS										
Humidity	0~95% RH @ 0 ~ 40°C (non-condensing)									
Noise Level	65dB									
Dimensions (mm) W × D × H	500 × 800 × 1400			500 × 800 × 1600			600 × 800 × 1600		800 × 900 × 1800	
Packaged dimensions (mm) W × D × H	600 × 945 × 1575			600 × 945 × 1775			690 × 990 × 1670		890 × 990 × 1870	
Net / Gross weight (kg)	300 / 320	305 / 325	310 / 330	330 / 350	350 / 370	450 / 470	460 / 480	590 / 620	630 / 660	690 / 720

- All specifications subject to change without notice.
- Custom-made specifications are acceptable.