

AP990

10 kVA ~ 30 kVA
(3:3)
PF 1.0



Features

- Advanced dual-core DSP control technology and 3-level technology
- Active power factor correction (APFC), input power factor up to 0.99
- System efficiency is improved to 95%, energy saving rate is doubled
- Output power factor 1.0
- Dual input design, supporting independent bypass
- Advanced digital and parallel technology, providing higher reliability than single system
- Wide input voltage range
- 50 / 60 Hz auto-sensing frequency
- 50 / 60 Hz frequency conversion mode
- Work efficiency up to 98% in ECO mode
- Fan speed varies intelligently with load, reducing noise and extending its service life
- Conformal coating technology to make UPS operate in harsh environment for a long time
- Flexible battery configuration setting, selectable battery numbers: 32~ 40 pcs
- Digitally controlled charger (Max.10 A)
- Ability to switch on the UPS by battery in the absence of mains power (Cold start)
- Zero switching time for UPS power supply mode when the mains power is unstable, ensuring the output is uninterrupted
- Compact internal layout, small footprint
- 5 inches LCD colorful touch screen, friendly human & machine interface
- Powerful background software for parameters configuration and online upgrade
- Advanced multi-platform communication for UPS monitoring: RS232, USB, RS485, dry contacts, SNMP card, Wi-Fi card and GPRS card
- Linear derating in low voltage input, reducing battery discharging times, extending the service life of battery
- Intelligent battery management, automatic equalized and float charging control, charger dormancy control, improving the reliability of charger and extending the battery life
- Effective hardware and software protection, robust self-diagnosis function, abundant event log for future check
- Standard RS232, USB, RS485, EPO, Dry contacts, Parallel port
- Optional SNMP card, WI-FI card, GPRS card, SMS alarms

Specifications

MODEL	AP9910	AP9915	AP9920	AP9930
Capacity	10 kVA / 10 kW	15 kVA / 15 kW	20 kVA / 20 kW	30 kVA / 30 kW
INPUT				
Rated voltage	380 / 400 / 415 Vac (L-L)			
Voltage range	304~478Vac (L-L), full load 228V~304Vac (L-L), load decrease linearly according to the min phase voltage			
Rated frequency	50 / 60 Hz (auto-sensing)			
Frequency range	40 ~ 70 Hz			
Power factor	> 0.99			
Bypass voltage range	Selectable, default -20%~+15% Up limited: +10%, +15%, +20%, +25%; Down limited: -10%, -15%, -20%, -30%, -40%			
Bypass frequency range	Selectable, ±1Hz, ±3Hz, ±5Hz			
Total harmonic distortion (THDi)	<3% (full linear load)			
Bypass overload	125%: long term operation; 125%~130%: 10min; 130%~150%: 1min; 150%~400%: 1s; >400%, less than 200ms			
OUTPUT				
Rated voltage	380 / 400 / 415 Vac (L-L)			
Voltage regulation	±1% (full linear load)			
Frequency	Synchronized with utility in mains mode, 50/60 Hz ±0.1% in battery mode			
Waveform	Sinusoidal			
Power factor	1			
Total harmonic distortion (THDv)	<1% (full linear load) <3% (full non-linear load according to IEC/EN62040-3)			
Crest factor	3:1			
Overload	<110%, 60min; 110%~125%, 10min; 125%~150%, 1min; >150%, 200ms			
BATTERIES				
DC voltage	Long time model: ±240VDC (Selectable, 32 - 40pcs)			
Inbuilt battery (standard model)	(10+10) x 9AH, ±120VDC	(20+20) x 7AH, ±240VDC	(20+20) x 9AH, ±240VDC	(15+15) x 9AH x 2 strings ±180VDC
Charging current	10A Max.			
Charger voltage precision	1%			
Recharge time	Standard model: 90% capacity restored in 8 hours; Long time model: depend on the capacity of battery			
SYSTEM				
Efficiency	95% Max.			
Transfer time	0 ms			
Max. number of parallel connections	4			
Protections	Short-circuit, overload, overtemperature, battery low voltage, overvoltage, undervoltage and fan failure			
Communications	RS232, USB, RS485, EPO, Dry contacts, Parallel port (Standard) SNMP card, WI-FI card, GPRS card, SMS alarms (Optional)			
Display	LED + 5 inches LCD touch screen			
OTHERS				
Operating temperature	0°C ~ 40°C			
Storage temperature	-40°C ~ 70°C			
Relative humidity	0 ~ 95% (Non-condensing)			
Altitude	<1000m, load derated 1% per 100m from 1000 ~ 2000m			
IP rating	IP 20			
Noise level at 1 m	55dB @ 100% load, 52dB @ 50% load		58dB @ 100% load, 55dB @ 50% load	
Dimensions (W × D × H) (mm)	250 x 720 x 560 (S) 250 x 720 x 560 (H)	250 x 800 x 700 (S) 250 x 720 x 560 (H)	250 x 840 x 930 (S) 250 x 840 x 650 (H)	
Packaged dimensions (W × D × H) (mm)	350 x 800 x 722 (S) 350 x 800 x 718 (H)	350 x 900 x 862 (S) 350 x 800 x 718 (H)	350 x 950 x 1102 (S) 350 x 980 x 810 (H)	
Net weight (kg)	82 (S) 31 (H)	131 (S) 33 (H)	145 (S) 33 (H)	215 (S) 42 (H)
Gross weight (kg)	93 (S) 40 (H)	142 (S) 42 (H)	156 (S) 42 (H)	227 (S) 52 (H)

- S means standard model, H means long time model.
- All specifications are subject to change without notice.

- Custom-made specifications are acceptable.