BAYKEE
Provide High-quality Power For Global Industry

MP 1100 Series

Online UPS 1kVA-30kVA, Single Phase / Single Phase





Final assembly



Production line



Burn-in testing



Quality inspection

MP1100 Series Brief

MP1100 series UPS is the new generation of transformer-based true online double-conversion, fully digitally controlled UPS. It uses a high-speed microprocessor (MCU) and a programmable logic device (CPLD) controlled by software, with sixth-generation low-loss, high-power IGBTs and a static switch as power components. It combines the newest control parts with advanced software to meet the high availability and power quality needs of a wide variety of critical applications.

MP1100 is widely used in telecom, banking, security, transport, utilities, manufacturing, industry, commerce, government and medical equipment.

Main Features

- LED + LCD display, easy operation from the LCD panel
- Wide input voltage range, compatible with different utilities
- Advanced, intelligent battery management extends battery life
- High-precision SMD technique for circuit reliability and precision
- Static bypass: safe transfer to mains on overload or fault
- 256 real-time event log with detailed parameters
- 0-100% load step without switching to bypass
- Selectable UPS, ECO or inverter work mode
- Perfect generator compatibility
- Optional battery detecting module
- Low-frequency true online double-conversion technology
- Advanced digital circuit design for UPS stability
- Intelligent inspection system checks every UPS working state
- IGBT PWM inverter technology, efficiency up to 92%
- Manual bypass for safe maintenance of the inner units
- Standard RS232 & RS485, optional dry contacts or SNMP card
- Input/output voltage, battery, temperature, short-circuit and overload protection
- Auto restart
- Optional EPO function

Application

- Telecom and banking
- Utilities and manufacturing
- Medical equipment
- Security and transport
- Commerce and government



MP1100 Series Specifications

	Model	MP1101 K	MP1102 K	MP1103 K	MP1104 K	MP1106 K	MP1108 K	MP1110 K	MP1115 K	MP1120 K	MP1130 K
	Capacity	1kVA	2kVA	3kVA	4kVA	6kVA	8kVA	10kVA	15kVA	20kVA	30kVA
	Power Watt	0.8kW	1.6kW	2.4kW	3.2kW	4.8kW	6.4kW	8kW	12kW	16kW	24kW
	Working Principle	Low-frequency transformer-based true online double conversion									
Rectifier (Input)	Phase	Single phase									
	Input Power Factor	≥0.9 (plus filter)									
	Input Voltage Range	220VAC (230VAC or 240VAC) ±25%, 1P+N+PE; optional 110V (120V or 277V)									
	Input Frequency Range	50Hz ±10% / 60Hz ±10% (selectable)									
	Output Ripple	<2%									
	Soft Start	0~100% 5s									
Charging	Charging Mode	Constant current, then constant voltage, with temperature compensation									
	Float Charging Voltage	55VDC (1-3kVA); 220VDC (4-30kVA)									
	Equalised Charging Voltage	56.8VDC (1-3kVA); 227VDC (4-30kVA)									
	Temp. Compensated Voltage	-3mV/°C/cell									
	Charging Current	5-10A									
Battery	Type	VRLA / AGM / Gel, optional lithium battery									
	Battery Capacity	7~999Ah settable (configure capacity according to back-up time)									
	Quantity	4 units 12V or 24 units 2V (battery voltage 48VDC); 16 units 12V or 96 units 2V (battery voltage 192VDC)									
	Temperature	20°C~25°C (for maximum efficiency)									
Inverter (Output)	Phase	Single phase									
	Nominal Voltage	220VAC (230VAC or 240VAC), 1P+N; optional 110V (120V or 277V)									
	Output Voltage Regulated Accuracy	±1% (stable load), ±3% (fluctuating load)									
	Output Frequency Range	50Hz / 60Hz <±0.5% (asynchronous)									
	Crest Factor	>3:1									
	Output Total Harmonic Distortion (THD)	Pure sine wave, linear load <3%, non-linear load <5%									
	Dynamic Characteristics	Instant voltage <±5% (0 to 100% load), recovery time <10ms									
	Overload Capacity	115%: normal operation; 125%: 10min; 150%: 1min; 200%: 1s									
	Inverter Efficiency	>92% (full load)									
Bypass	Phase	Single phase (P+N)									
	Nominal Voltage	220VAC (230VAC or 240VAC); optional 110V (120V or 277V)									
	Transfer Time	0ms (static switch)									
Protection	Input Protection	Input voltage and frequency over-limit protection									
	Output Protection	Over current, short circuit, over voltage, low voltage									
	Battery Protection	Over-charge, over-discharge protection									
	Temperature Protection	Environment over-temperature, inverter over-temperature									

	Model	MP1101 K	MP1102 K	MP1103 K	MP1104 K	MP1106 K	MP1108 K	MP1110 K	MP1115 K	MP1120 K	MP1130 K
Protection (cont.)	Hardware Fault Protection	Auxiliary power abnormal, breaker cut off, breaker overload, power device over-current / over-voltage, etc.									
General	Working Environment	-10~40℃, relative humidity 30%~90%, altitude <2000m (1% derating per 100m rise, max. 4000m)									
	Cooling Method	Forced ventilation									
	Communication Interface	RS232 / RS485, optional dry contact, SNMP card (remote control via internet)									
	Parallel Operation	Tandem hot backup									
	Anti-surge Capacity	10/700μs, 5kV; 8/20μs, 20kA									
	Protection Level	IP21									
	Safety Performance	Vin-n Vout-n 2000Vac, creepage <10mA, insulation resistance >2MΩ (500VDC)									
	Noise (dB)	1-3kVA: 45~50; 4-6kVA: 50~55; 8-30kVA: 55~60									
	Dimension (W×D×H) mm	1-3kVA: 210×520×530; 4-6kVA: 220×520×640; 8-10kVA: 220×500×760; 15-30kVA: 450×600×1200									
	Weight (kg)	42	52	59	59	65	84	92	186	201	251
	Voltage Versions	100V-110V-120V version available									

Product specifications are subject to change without further notice.