

MTW500 MODULAR UPS

50-600kVA

DSP Control

Smart Sleep Function

Graphic LCD Display



MTW500 Modular UPS are online devices produced with 3-level and DSP technology that provide low THD with high input power factor designed for sensitive loads. Thanks to its hot-swappable modular structure, it has the flexibility to operate at powers between 50 and 600kVA with a single cabinet. It offers the most suitable power solutions for large data centers and sensitive electronic devices. Thanks to its parallelizable design, which takes up less space, it provides the opportunity to reach 1800kVA in an area of less than 4m². It stands out with its rack type design, high power density, user-friendly interface, independent LCD for each power module in addition to 7&10" graphical touchscreen, smart sleep function, self-aging, and smart charge management.

GENERAL SPECIFICATIONS

Compact design

500kVA in one cabinet, footprint less than 1.5m², saving valuable room space

High power density

50kVA power module in 4U height, easy for capacity expansion

High efficiency

Advanced 3-level technology guarantees high efficiency operating in double conversion mode up to 96%

Intelligent charging management

The system intelligently control the whole process of the charging and discharging, effectively improve the life time of the battery.

High scalability

The system can be configured from 50kVA to 600kVA in one single cabinet, 3 units in parallel for a capacity up to 1800kVA

User friendly HMI

7&10" touch color LCD with graphic display, IoT function

Smart sleep function

System can intelligently shutdown some power modules to increase total load rate, achieving higher efficiency



TECHNICAL SPECIFICATIONS

MODEL	MTW200/50X1		MTW300/50X1		MTW400/50X1		MTW600/50X1	
Capacity	200kVA		300kVA		400kVA		600kVA	
Power module capacity	TPW50 (50kVA/50kW)							
INPUT								
Phase	3P5W (3P+N+PE)							
Rate voltage	380V/400V/415VAC (line to line); 220/230/240VAC (line to neutral)							
Rate frequency	50Hz / 60Hz							
Input power factor	> 0.99							
THDI	THDi < 3% @ 100% linear load							
Voltage Range	304~478Vac (Line-Line) full load; 304 ~ 228Vac (Line-Line) power derate from 100% to 75%							
Frequency range	40Hz~70Hz							
BATTERY								
Voltage	± 240 VDC							
Charging capacity	20%*Pout							
Charge accuracy	± 1%							
BYPASS								
Rate voltage	380/400/415VAC (line to line) 220/230/240VAC (line to neutral)							
Voltage range	Range: -40% - +25%, Settable, default -20% ~ +15%							
Overload	125%, long time operation; 125% < load < 130%, 10 mins; 130% < load < 150%, 1 min; > 150%, 300ms				110%, long time operation; 110% < load < 125%, 5 mins; 125% < load < 150%, 1 min; > 150%, 1 second			
INVERTER								
Rate voltage	380/400/415VAC (line to line); 220/230/240VAC (line to neutral)							
Rate frequency	50Hz / 60Hz							
Output power factor	1							
Voltage accuracy	± 1.0%							
Load response	< 5% (20% - 80% -20% step load)							
Recovery time	< 20ms (0% - 100% -0% step load)							
Output THDu	< 1% (linear load), < 5% (non-linear load according to IEC 62040-3)							
Overload	110%, 1 hour; 125%, 10 mins; 150%, 1 min; > 150%, 200ms							
Frequency accuracy	0.1%							
Synchronize window	Settable, ±0.5Hz - ±5%Hz, default ±3Hz							
Slew rate	Settable, ±0.5Hz/S - ±3%Hz/S, default ±0.5Hz/S							
Crest Factor	3:1							
Phase accuracy	120° ± 0.5°							
SYSTEM								
Efficiency	Normal mode ≥ 96%; Battery mode ≥ 96%							
Display	LED + 7 inch touch LCD				LED + 10 inch touch LCD			
Certification - Safety	IEC62040-1, IEC60950-1							
Certification - EMS	IEC62040-2, IEC60950-4-2 (ESD); IEC61000-4-3 (RS); IEC61000-4-4 (EFT); IEC61000-4-5 (Surge)							
IP degree	IP20							
Configuration	USB, RS232, RS485, Dry contact, Cold start, Air filter							
Option	SNMP card, AS400 card, Parallel kit, SPD, LBS							
Environment	0-40°C (operation); -25°C ~ 70°C (storage); 0-95% (Humidity, non-condensing)							
Noise (dB) (1 meter)	72dB @ 100% load, 69dB @ 45% load							
Dimension	Cabinet (HxWxD) mm	1600x600x1000		2000x600x1000		2000x1200x1100		
	Module (HxWxD) mm	174x442x659						
Weight (kg)	Cabinet	185		248		250		578
	Module	41						