

# SMART<sup>™</sup> HOME UPS A SMART<sup>™</sup>world of power backup solutions

MPOWER\* Smart\* series Sine Wave inverter is a DSP based PWM technology using MOSFET/IGBT Bridge. It has a user friendly graphics-display along with sophisticated state-of-art design. A rugged product by itself on unique range than regular ones - for the end-user to keep load little extra at almost same cost within the range band. Smart\* HUPS contains all safety and protection features for your home appliances and Computers.

## SALIENT FEATURES



High Technology DSP based design with absolute and stable Sine Wave Output



MOSFET/IGBT based PWM technology with greater efficiency



Automatic By Pass System



Over Thermal Temperature protection



Saves electricity by efficient charging



Even charge the deep discharged battery



Home/UPS selection to run computer without rebooting



Reverse battery protection



User friendly LCD display



Protection for overload and short circuit



No humming Noise (Silent HUPS)



BATS - Battery Ambient Temperature Sensor Technology

#### AVAILABLE RANGE

1100 VA	12 VDC
2000 VA	24 VDC
3.5KVA/5 KVA	48 VDC
5 KVA	96 VDC
7.5 KVA	120 VDC
10 KVA	180 VDC

#### Multistage Battery Charging



MPOWER Smart<sup>™</sup> has multistage charging technology which gives you better charging efficiency in inverter range.

#### Intelligent Load Management System



MPOWER Smart™ works on simple DSP based control algorithm that continually monitors power and decides load applications within its limits. It controls overloads for specified period of time with visual and audio alarms thus protecting the system from serious damages or Short circuit.

#### Reduce Transfer time



MPOWER Smart™ is designed to provide a transfer time <8ms with better voltage and frequency regulation which allows you to enjoy power supply without any interruption.

### MPOWER Smart<sup>™</sup> PWM Charger takes-up even at low input voltage



MPOWER Smart™ has wide input voltage range thus able to charge the battery at remote locations - where possibility of low voltage is imminent. Smart™ has Powerful charger which effectively operates with multistage charging technique, hence, enhances the life of battery and also charges deep discharged battery. The inbuilt PWM charger helps in faster and efficient charging which continuously saves electricity.

# Introducing BATS technology feature



MPOWER Smart™ HUPS are now with BATS technology (Battery Ambient Temperature Sensor) which sense the ambient temperature of the battery & adjust the charging accordingly.

# MPOWER Smart<sup>™</sup> on its extended VA capacities



MPOWER Smart™ Plus design by itself allows the end user to keep their load little extra than regular ranges available in market place at almost same cost.







#### **TECHNICAL SPECIFICATION - DSP SINE WAVE**

MPOWER SMART <sup>™</sup> SERIES									
RATING	1100 VA	2000VA	3.5KVA	5KVA		7.5KVA	10KVA		
MAINS MODE									
Home Range	100-290±10 V AC								
UPS Range	180-270±10 V AC								
BATTERY									
Batt. Recommended	100-200 AH								
No. of Batteries	1	2	4	4	8	10	15		
CHARGING		,							
Charging Technology	SMPS-20 KHZ								
Charging Volt (Boost)	14.30±0.2V DC	28.6±0.2V DC	57.2±0.2V DC	57.2±0.2V DC	114.4±0.2V DC	143±0.2V DC	214.5±0.2V DC		
Charging Volt (Float)	13.8±0.2V DC	27.6±0.2V DC							
Charging Current Normal	12±1A 15±1A								
Charging Current High	15±1A			ISEIA					
INVERTER MODE									
Technology	DIGITAL SIGNAL PROCESSOR (PWM)								
Output Voltage Range	180-230±5% VAC								
THD	< 5%								
Wave Form	PURE SINE WAVE								
Frequency	50±0.5 Hz.								
Over Load	110% Load								
Over Load Reset	3 Time Before Shutdown								
Short Circuit Protection	Home UPS Shutdown								
Inverter Shutdown (B/L Position)	10.2±0.2V DC	20.4±0.2V DC	40.8±0.2V DC	40.8±0.2V DC	81.6±0.2V DC	102±0.2V DC	153±0.2V DC		
AUDIO/ VISUAL INDICATION									

LCD (Input Voltage & Frequency, Output Voltage & Frequency, Load%, Batt. Charging, Batt.% DC Voltage, Short Ckt., UPS ON, INV. ON, BATS Compensation)

### LOAD CHART

	1100VA-12V DC		2000VA-24V DC		3.5KVA-48V DC		5KVA-48V DC	
LOAD*	OPTION-1	OPTION-2	OPTION-1	OPTION-2	OPTION-1	OPTION-2	OPTION-1	OPTION-2
COMPUTER	1	0	1	0	2	4	4	6
T.V.	1	1	1	1	2	1	2	2
TUBE LIGHT	5	8	5	12	10	8	10	15
FAN	4	6	6	5	5	3	10	12
COOLER	0	0	2	0	1	1	2	1
FRIDGE	0	0	0	1	1	2	2	1

#### APPLICATION



\*When P.C. is running, T.V. is not recommended

AUTHORISED DISTRIBUTOR/DEALER





With Smart Energy Management System

**Product Brochure**