

# Solar-powered Portable Home Energy Storage System



### High Efficiency

High power density, low cost. Typical switch time is 20ms.



### High Security

Support lithium battery activation wake-up function Protection: Over Temperature, Over load, Over voltage, Over current, Short circuit protection



### User Friendly

The industrial design with modern aesthetic style is portable and easy to use.

## Specifications

Model	Merak PESS 500W 1KWh
<b>AC Input</b>	
Rate Input Voltage(VAC)	230;L+N+PE
Voltage Range(VAC)	100~270
Frequency(Hz)	45~65
<b>AC Output</b>	
Rated Capacity(W)	500
Peak Power(VA)	500
Rate Voltage(VAC)	230;L+N+PE
Power Factor(PF)	> 0.99
Frequency	50Hz±0.5%
Transfer Time(ms)	≤20
Harmonic Distortion	≤3% (Linear Load) , ≤5% (Non-linear Load)
<b>Charger(PV/DC)</b>	
Solar Charger Type	MPPT
Max PV input power(W)	300
MPPT tracking range (VDC)	18~50
Max PV current(A)	10
<b>Charger(AC Mode)</b>	
Charge Current(A)	Settable:1-140
<b>Battery</b>	
Battery type	LiFePO4
Rated Battery Voltage(VDC)	3.2
Capacity(AH)	314
Energy(Wh)	1004.8
<b>Interface</b>	
Interface	USB 5V/1A
<b>General Data</b>	
Ingress Protection	IP20
Operating Temperature	-10~40°C
Relative Humidity	20%~95%(Non-condensing)
Storage Temperature	-15°C~60°C
Net Weight(kg)	~8.5
Dimensions(W*D*H)	245x140x320mm
Max.Operating Altitude	3000m(Derating above 100m)
Noise Emission	≤50dB