UHome-HV Single Phase Hybrid (On/Off-Grid) Energy Storage System



UHome-HV series is an on/off-grid single phase storage system, the output of single phase system is the form of L/N/PE; UHome-HV can connect with solar panels, grid (or generator), load, it built-in lithium battery, on/off grid inverter and energy management system. UHome-HV has three working modes: ECO mode, Peak shaving mode, EPS mode(emergency power backup mode). The three working modes are described referring to the setting part on user manual.





[4] Features

- Inverter (PCS) is separated design from the batter energy storage system, indoor or outdoor installation with access to Euro standard grid voltage.
- High voltage desig; Battery modules connected in series up to 12PCS at most. The biggest capacity is 30KWH with 15 years of cyclelife;
- Hybrid working mode (Load-matching mode, backup mode, peak-shaving mode);
- Easy to install and maintain; meet the requirements of customer's DIY; with iOS/Android APP mornitoring;
- Multiple protection and warning system from software to hardware, safe and reliable.
- Meet TUV, SAA, CE ,UN38.3 etc. certification requirements

Applications

- Self-Spontaneous use (ECO Mode, also solar first mode)
- Power Consumption and Backup (EPS mode)
- Smart home energy management
- Get profit from feedback energy to grid
- Grid peak and valley electricity price arbitrage (Peakshaving mode)
- Get subsidy from grid dispatching

UHome-HVSingle Phase Hybrid (On/Off-Grid) Energy Storage System

	Models	UHome-3K6H	UHome-5K0H	UHome-6K0H	UHome-7K0H	UHome-8K0H
	Rated power	3.6KVA	5KVA	6KVA	7KVA	8KVA
AC data (on-grid)	AC input voltage range	170~280Vac				
	AC input frequency range	47.5~51.5Hz/57~61.5Hz				
	THDi	<3%				
	Max AC Current			25A		
AC data (Battery mode)	Max output Power	3.96KVA	5.5KVA	6.6KVA	7.7KVA	8.8KVA
	Over Load	@120%;10min@150%;60s@200%				
	THDv	<3%@Linear Load				
	Rated output AC voltage	L/N/PE /220/230/240Vac±3%				
	Rated output AC frequency	50/60Hz				
	Output Wave	Pure Sine Wave				
	Automatic switching time	<10ms				
Battery data	Battery Voltage Range	85~500√dc				
	Battery Type	Li-ion(LFP)				
	Nominal Battery Capacity	2.56Kwh*N (N=2~8)				
	Max Charging/Discharging Current	30A/30A				
	Max. Battery Charging Conversion Efficiency	97.30%				
	Max. Battery Discharge Conversion Efficiency	97.30%				
	Communication	CAN/RS485				
PV data	Maximum PV power is recommended	4680W	6500W	7800W	9100W	10,400W
	Max PV Voltage			600Vdc		
	MPPT voltage range	100~550Vdc				
	Max Input Current	14A				
	MPPT Tracker/Strings/	2/1				
	MPPT Efficiency	>99%				
	Max. on-grid Efficiency	98.20%				
System data	Protections	PCS: Over/under voltage; Over/under frequency; Anti-islanding; ISO-resistance; RCD; Over load etc. Battery: Over/under voltage; Over load; Over Temperature, etc. System: Integrate SPD; MCB; Fuse; COM monitoring, etc.				
	Noise (typical)	<30dB				
	HMI	WIFI +App +LED				
	Working Temperature	0~45°C				
	Cooling method	Natural Convection				
	Humidity	10%~90%				
	Altitude	1000m(-1%/100m)				
	IP class	IP65+IP31				
	Installation	Wall mounting(inverter), cabinet(battery)				
	Dimension(W*D*H)	Depending on the capacity				
	Weight	Depending on the capacity				
	Warranty	5years(free);10years(option)				