

Home Series Residential ESS

Hybrid / All-in-one System / Single-phase input & output 3.6–6 kW



Safety

- 1. Aerogel Insulation:** Superior protection against heat and fire.
- 2. Consistent Quality:** Automated production ensures top-tier standards.



Reliability

- 1. Top Lithium Cells:** Powered by CATL & EVE, the world's TOP 3 lithium cell brands.
- 2. All-in-One Design:** Integrated system for smooth and coherent operation.



Friendly

- 1. Quick-Connect Terminals:** Easy and secure installation.
- 2. Remote Monitoring:** Control your system anytime via WiFi and app.



Battery Model	H-PACK-5.1
Battery Module Specification	
Nominal Energy	5.12 kWh
Continucus Output Power(charge/discharge) for a Single Module	2560 W / 2560 W
Warranty	5 years Warranty
Voltage Range	44.8 ~ 56.5 V
Communication Interfaces	CAN & RS-485
Modules Per Inverter	Up to 8 connected in parallel
Battery Type	LFP (LiFePO4)
Life Cycle	6000 cycles @25°C ±2°C or 0.5C Condition
Standard Compliance	
Cell	IEC/EN 62619, UN 38.3, UL 1973
Module	IEC/EN 62619, UN 38.3
Mechanical Specifications	
Dimensions(W×H×D)	435 x 580 x 155 mm
Weght	48 kg
Mounting	Rack Mount
Operating Temperature (charge/discharge)	0 ~ 50°C(Charging), -10 ~ 50°C (Discharging)
Storage Temperature (12 months between recharges)	-10 ~ 50°C
Max. Operating Altitude	2000 m
Enclosure Protection	IP21
Cooling	Natural convection
Noise (at 1m distance)	< 25 dBA

Hybrid Inverter Model	HH3.6KS		HH6KS
PV String Input			
Max. PV Array Input Power	6.0 kWp		9.0 kWp
Max. DC Voltage	500 V		
Nominal Voltage	270 V		300 V
MPPT Voltage Range	120 ~ 450 V		120 ~ 450 V
MPPT Voltage Range (Full Load)	270 ~ 425 V		300 ~ 425 V
Start Voltage ¹⁾	120 V		
Number of MPPT	1		
Strings Per MPPT	1		
Max. Input Current Per MPPT	18 A		27 A
Max. Short-Circuit Current Per MPPT	21 A		30 A
AC Output (Grid)			
Nominal AC Output Power	3.6 kW		6.0 kW
Max. AC Apparent Power	3.6 kVA		6.0 kVA
Nominal AC Voltage	230 Vac		
AC Grid Frequency Range	50 Hz / 60 Hz (±5 Hz)		
Nominal Output Current	15.6 A		26.0 A
Max. Output Current	21.0 A		35.0 A
THDi	<5%		
Battery Input			
Battery Type	LFP (LiFePO4)		
Nominal Battery Voltage	51.2 V		
Charging Voltage Range	44 ~ 57.6 Vdc		
Max. Solar Charging Current	50 A(1*pack)	60 A(2*packs)	100 A(2*packs)
Max. AC Charging Current	50 A(1*pack)	60 A(2*packs)	100 A(2*packs)
Max. Overall Charging Current	50 A(1*pack)	60 A(2*packs)	100 A(2*packs)
Max. Discharging Current	50 A(1*pack)	78 A(2*packs)	100 A(2*packs)
Battery Capacity	5.12 kWh (Single Pack)		
AC Output (Backup)			
Dual Output	No		
Nominal AC Output Power(Battery Mode)	2.3 kW	3.6 kW	4.7 kW
Nominal AC Output Power(Battery + PV Mode)	3.6 kW		6.0 kW
Nominal Output Voltage	230 Vac		
Nominal Output Frequency	50 Hz / 60 Hz		
Output THDv (@Linear Load)	<3% (Linear Load)		
Protection			
Anti-islanding Protection	Yes		
Output Over Current Protection	Yes		
DC Reverse Polarity Protection	Yes		
DC / AC Surge Protection	DC Type II;AC Type III		
Insulation Detection	Yes		
AC Short Circuit Protection	Yes		
General Specifications			
Dimensions (W x H x D)	435 x 410 x 155 mm		435 x 410 x 155 mm
Weight	13.7 kg		15.2 kg
Operating Temperature Range	-10°C ~ 50°C		
Cooling Type	Fan		
Max. Operation Altitude	3000 m (> 2000m Derating)		
Operation Humidity	5% ~ 95%		
IP Class	IP20		
Topology	Battery Isolation		
Communication	RS232 / RS485 / USB / CAN / DRY Contact		
Display	LCD / APP		
Certification & Standard	IEC62109-1&2; EN/IEC 62920:2017+A1:2021; EN55011:2016+A2:2021; ISTA-2A; IEC 62116; IEC 61727; IEC60068		

* 1) Minimum voltage for inverter to start power output.