

BESS-125KW/261KWH

BES-P125X261E / BES-P125X261U

The LIVOLTEK BES Series is a versatile solution applicable to charging stations, factories, industrial parks, and commercial buildings. Designed for power storage, models BES-P125X261 enable emergency power during outages, peak-load shifting, surplus energy trading, and virtual capacity enhancements. Boasting a high-density, modular design, this energy storage system minimize spatial needs, enhance transportability, and simplify installation and maintenance, ensuring top efficiency from deployment through operation.

High Performance

- Smaller size, high energy density
- Balanced between packs to improve energy utilization
- 3S fusion, short response time

Assured Safety

- Efficient liquid cooling temperature control to maintain optimal operating status
- With multi-level security architecture design such as cell level, PACK level, system level, cloud monitoring, etc.
- Multiple battery clusters are connected to independent modular PCS to achieve single cluster management of battery clusters and avoid capacity loss of parallel battery clusters

Intelligent Design

- Smart energy management cloud platform, cell-level refined monitoring and diagnosis
- All operating data of the energy storage system is connected to the cloud for real-time monitoring and unattended operation
- EMS supports 1-2 years of historical system data backup

Flexible Adaptability

- All in one design, flexible system expansion
- Occupying an area of only 1.35m², can be deployed in a dispersed manner, centrally dispatched, and convenient for flexible placement
- Pre-assembled at the factory, high system integration, simple transportation and deployment



BESS-125KW/261KWH

BES-P125X261E / BES-P125X261U

BESS

Model	BES-P125X261E		BES-P125X261U	
Battery Parameters				
Battery Type	LFP 314Ah			
Battery Module Specification	52.24kWh / 1P52S			
Battery Capacity/kWh	261			
Rated DC Voltage/V	832			
Battery Voltage Range/V	741 ~ 936			
Rated Charge/Discharge Current/A	157			
AC Parameters				
Rated AC Power/kW	125			
Max. Apparent Power/kVA	137.5			
Rated AC Voltage/V	380/400		480	
Rated AC Frequency/Hz	50/60			
Adjustable Power Factor Range	-1 (Leading)~ 1 (Lagging)			
Max. Output Current/A	198.5		165.4	
THDi(Rated power)	<3%			
GENERAL				
System Efficiency	88%			
Dimension (W*H*D)	1000*2380*1350 mm			
Weight	2600 kg			
Operation Temperature	-30 ~ 60 °C			
Relative Humidity	0 ~ 95%			
Max. Operating Altitude/m	4000 (>2000 derating)			
Cooling	Liquid Cooling			
Ingress Protection	IP55			
Anti-corrosion Level	C3/C5 optional			
Fire Protection	Aerosol /Water			
Topology	Non-isolated			
Communication Interface	RS485 / CAN / Ethernet / 4G / WiFi			
Certificates and Approvals	IEC 61000, IEC 62619, IEC 63056, IEC 62477, IEC 62933, RoHs, UN38.3			

ENERGY STORAGE PCS MODULE

PCS-125KG1 / PCS-125KMGI

The PCS125K series is a three-phase energy storage converter launched by Livoltek, with a maximum efficiency of up to 99%. This product features an intelligent air-cooling design and supports both rack-mounted and wall-mounted installation methods, making it suitable for a variety of installation environments. It is compatible with various mainstream battery cells such as 280Ah, 314Ah, and 320Ah, and has a charge and discharge conversion time of less than 20ms. With an IP65 protection rating and a comprehensive protection mechanism, it ensures the safe and stable operation of the energy storage system.

Flexible Configuration

- Flexible Installation: Supports both rack-mount and wall-mount installations, accommodating various installation settings with ease.
- Modularized design: supports up to 10 units in parallel operation, and can be adapted to different power ranges of energy storage systems, such as 250kW, 500kW and 1W.

High Compatibility

- Voltage Adaptability Range: Offers a voltage adaptability range up to 1000V, compatible with 52 battery packs, meeting diverse battery pack requirements.
- Three-Phase Four-Wire Compatibility: Compatible with three-phase four-wire systems, suitable for off-grid, grid-tied, and hybrid applications

Efficient & Cost-effective

- High Efficiency: Achieves a maximum inverter efficiency of up to 99%, significantly improving energy utilization.
- Cost-effectiveness: High efficiency helps reduce operating costs, enhancing economic benefits.

Safe & Reliable

- Multiple protection functions: it has multiple protection functions to ensure safe and stable operation of the system
- IP65 Protection Rating: Ensures stable operation of the device in harsh environments.



ENERGY STORAGE PCS MODULE

PCS-125KG1 / PCS-125KMGI

PCS

Model	PCS-125KG1	PCS-125KMGI
DC Input		
Max. DC Voltage/V	1000	1000
Battery Voltage Range/V	580 ~ 950	700 ~ 950
Max. Continuous DC Current/A	211.5	188.9
AC Output [On-grid]		
Rated AC Power/kW	125	125
Max. Apparent Power/kVA	137.5	137.5
Rated Output Current/A	180.4	150.4
Max. Output Current/A	198.5	165.4
Rated AC Voltage/V	380/400	480
Rated Output Frequency/Hz	50±5/60±5	50±5/60±5
Power Factor	-1 ~ 1	-1 ~ 1
Total Harmonic Distortion/THDI	<3% (Rated Power)	<3% (Rated Power)
Output Method	3L/N/PE, 3L/PE	
AC Output [Off-grid]		
Rated AC Voltage/V	400	480
Rated AC Power/kW	125	125
Max. Output Power/kW	137.5	137.5
Unbalanced Load Capacity	100%	100%
Output Voltage Harmonics	≤2% (Resistive Full Load)	≤2% (Resistive Full Load)
Efficiency		
Max. Efficiency/%	99.00%	99.00%
Euro Efficiency/%	98.50%	98.50%
Protection		
Anti-islanding Protection	Integrated	
DC Short Circuit/Over Current Protection	Integrated	
AC Short Circuit/Over Current Protection	Integrated	
Residual Current Detection	Integrated	
Over/Under Frequency Protection	Integrated	
Over/Under Voltage Protection	Integrated	
Insulation Resistance Monitoring	Integrated	
Overtemperature Protection	Integrated	
DC Reverse-polarity Protection	Integrated	
General Data		
Operating Temperature	-30 ~ +60°C (>45 Power Derating)	
Ingress Protection	IP66	
Operating Altitude	4000m (>2000 Power Derating)	
Installation	Rack-mounted (Horizontal, Side-mounted)	
Noise	≤75 dB	
Cooling	Intelligent Air-cooled	
Dimension(W*H*D)	600*270*800 mm	
Weight	≤75 kg	
Interfaces	Ethernet / RS485 / CAN	
Communication	Ethernet / Modbus TCP / RS485 / CAN	

C&I BATTERY CABINET

BHF-X261D

The LIVOLTEK BES Series is a versatile solution applicable to charging stations, factories, industrial parks, and commercial buildings. Designed for power storage, models BES-P125X261 enable emergency power during outages, peak-load shifting, surplus energy trading, and virtual capacity enhancements. Boasting a high-density, modular design, these battery cabinet minimize spatial needs, enhance transportability, and simplify installation and maintenance, ensuring top efficiency from deployment through operation.

Product Benefits

- Flexible layout with a footprint of only 1.3m²
- Supports 100% three-phase unbalanced loads
- High-efficiency liquid cooling temperature control, temperature difference between cores ≤ 2.5°C
- Intelligent energy management cloud platform, fine monitoring and diagnosis at the core level
- Proactive fire safety: comprehensive protection measures ensuring high security
- Long cycle life and high-quality LFP batteries



C&I BATTERY CABINET

BHF – X261D

BATTERY

Model	BHF-X261D
Battery Parameters	
Cell Type	LFP 3.2V / 314Ah
Battery Module Specification	52.24kWh / 1P52S
Battery Module Number	5
Battery System Configuration	261kWh / 1P260S
Nominal Voltage	832V
Operating Voltage	741 ~ 936V
Rated Charge/Discharge Current	157A/157A
System Parameters	
Topology	Non-isolated
Charge/Discharge Multiple	≤0.5 P
Depth of Discharge	90% DOD
Operation Temperature	-30 ~ 60 °C
Relative Humidity	0 ~ 95% RH, Non-condensing
Dimension(W*H*D)	1000*2380*1350 mm
Weight	2520 kg
Altitude	≤4000m (>2000m derating)
Ingress Protection	IP55
Anti-corrosion Level	C3/C5 optional
Cooling	Liquid Cooling
Fire Protection System	Aerosol / Water
Communication Interface	RS485 / CAN / Ethernet / 4G / Wi-Fi