

JinkoSolar's to Supply 3.44MWh C&I ESS Safety Solution to Enaiter Electrical Co., Ltd.

JinkoSolar has supplied 16 sets of its liquid cooling C&I energy storage system (ESS) SunGiga, with a capacity of 3.44MWh for Enaiter Electrical Co., Ltd., located in Zhongshan, Guangdong.

This system is mainly used to implement peak valley arbitrage, manage demand charges, and improve power supply reliability. The unique ESS safety solution of JinkoSolar's SunGiga is the main reason that enables it to be selected and preferred by C&I customers and owners who regard "safety" as a top concern about ESSs.

The featured liquid cooling system of JinkoSolar's SunGiga controls the temperature difference between cells within the industry's lowest level of 2 Celsius degrees. The uniformity batteries and

packs significantly minimize battery regionally overheating and prolong the life circle to 20 years. More importantly, the highly efficient and uniform cooling aided by smart monitoring of coolant flow and replenishment avoids the overheat of battery cells which is the primary factor causing fire.

In addition, based on AI technology, early ESS safety management integrates smart safety pre-warning to identify potential faults. For example, if cell inconsistency is identified, short circuits of a large number of cells can be prevented in a timely manner. Furthermore, multiple-level overcurrent protection, active shutdown, and quick isolation of thermal runaway spread minimize the risk.



SUNGIGA

JKS-215KLAA-100PLAA

Liquid cooling outdoor allin-one cabinet

Jinko 215 KWh liquid cooling all-in-one product integrates packs, BMS, PCS and fire fighting equipments to provide customer with 1000V ESS solution. The system has a battery capacity of 215kWh and the rated power is up to 100 KW. It is characterized by flexible expansion, safety and reliability, intelligent liquid cooling and convenience. The modular design meets the needs of various application scenarios.



Flexible expansion

- ☐ All-in-one design with integrated PCS, reducing shipping and installation costs
- Flexible multi-cabinet expansion:
 Modular design, support multi-cabinet parallel connection

Reliable and safe

- ☐ Intelligent monitoring and linkage to ensure system security
- ☐ Temperature, smoke, and combustible gas sensors to apply rapid suppression of thermal runaway

Intelligent liquid cooling

- □ Non-uniform flow channel design to control cell temperature difference
- Multiple liquid cooling control modes to reduce system power consumption

Smart and convenience

- ☐ Remote upgrade support
- Cloud-based monitoring and operating platform supporting multiple device access

Application Scenarios



Peak shaving

Peak & valley arbitrage



Energy backup

Supply power to facilities when the grid is down, or apply in areas without power.



Improve the stability of the electricity system

Enhance the stability, continuity and controllability of new energy generation



Optimizing the use of renewable energy

Maximizing the use of PV to store spare power and discharge the power at night



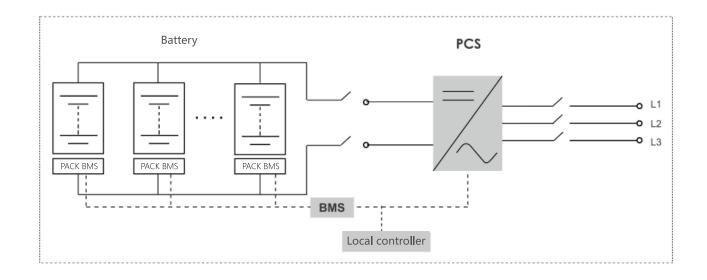
Arbitrage

Arbitrage by using peak and valley tariffs for different time periods.



Cost reduction

Discharge during peak electricity demand to reduce expensive electricity bills



Battery Parameter		
Cell type	LFP 3.2V/280Ah	
Max. charging/discharging rate	0.5P	
Cell combination method	1P240S	
PACK number	5 pcs	
Rated power	215 kWh	
Rated voltage	768V	
Voltage range	672V~864V	
Cooling method	Liquid cooling	
AC parameter		
Rated AC power	100 kW	
Rated voltage	400 Vac	
AC side wiring method	Three-phase, Four-wire	
Rated frequency	50 Hz	
Cooling method	Intelligent forced air cooling	
System parameter		
Ambient temperature	-20°C∼50°C, Derating over 45°C	
Humidity	≤95%RH, no condensation	
Altitude	≤2000m	
Protection level	IP55	
Firefighting method	Aerosol	
Anti-corrosion grade	C3	
Communication	RS485/CAN/Ethernet	
Dimension(WidthxDepthxHeight)	1300x1300x2300 mm	
Weight	~2800kg	
Certification	IEC62619, IEC63056, IEC61000, IEC62477	