

Low Voltage Battery 5.12kWh

# Ai-LB-E Series



Model:  
ASW5120-LB-E



## Optimal Performance

- LFP safe technology, long cyclelife, high efficiency and high power density
- Supports up to 1C charge / discharge rate with short-term 2C overload capability
- Cell level monitoring and balancing



## Safe & Reliable

- Smarter and safer battery management system for precise diagnostics
- Provides complete protection to keep battery healthy and safe
- Designed in accordance with global safety standards



## User-Friendly

- Stackable and expandable up to 163.48 kWh (supporting 8 modules per unit, 4 units in parallel)
- Streamlined design for easier handling
- Various mounting methods: wall-mounted, floor-standing, and racked

Technical Datasheet

System Data	Battery module	ASW5120-LB-E
	Cell type	LiFePO4
	Rated capacity	100 Ah (≥ 100 Ah)
	Rated energy <sup>1</sup>	5.12 kWh
	Usable energy <sup>2</sup>	4.6 kWh
	Nominal battery voltage	51.2 V
	Cell voltage range	2.5 V ~ 3.65 V
	Battery voltage range	43.2 V - 57.6 V
	Recommended charge / discharge current	60 A
	Peak discharge current	200 A @ 3 s
	Max. charge / discharge current	100 A / 100 A
	Max. charge / discharge power	5.12 kW
	Peak discharge power	10.24 kW @ 3 s
General Data	Dimensions (W / D / H)	390 / 500 / 155 mm
	Weight	43.0 kg
	Installation location	Indoor
	Mounting method	Floor mounted / Wall mounted / Rack mounted
	Operating temperature range	Charge: 2 °C ~ 58 °C
		Discharge: -18 °C ~ 58 °C
	Storage temperature range	-20 °C ~ 45 °C
	Cooling concept	Natural convection
	Protective class	II
	Degree of protection	IP20
	Relative humidity	5%~95%, non-condensing
	Max. operating altitude	3000 m (> 2000 m derating)
	Scalability	Max.32 sets in parallel
	Communication	CAN
	Certification	IEC 62619 / EMC / UN 38.3
	Life cycle <sup>3</sup>	6000 times
	Round-trip efficiency	≥95%
	Standby power	≤ 1 W

1. Nominal energy is defined under the following conditions: battery voltage 43.2 V ~ 57.6 V, 0.2C charge / discharge at +25 °C.  
2. Usable energy is defined under the following conditions: 90% DOD, 0.2C charge / discharge at +25 °C.  
3. Life cycle is defined under the following conditions: 80% DOD, 70% EOL, 0.2C charge / discharge at 25 °C (One cycle a day).

This page is for reference purposes only. Please refer to the final installation manual and other documents included with the most up-to-date and detailed product information.

