YOUR
SMART
ENERGY

AlphaESS

STORION-LC-TB150

Liquid-cooling C&I ESS

SYSTEM POWER

150 kW

SYSTEM CAPACITY

313 kWh



KEY FEATURES

- Stable performance and low noise (≤60 dB) with full liquid cooling
- Intelligent eight-layer fire protection
- Pre-assembled design for fast deployment
- Cell-level monitoring with second-level fault detection and cloud alerts
- Seamless switching to backup (≤ 20ms with STS cabinet)
- Up to 25 units in parallel connection at on-grid mode

V00.04152026 I Text and images correspond to the current state of technology at the time of printing. Subject to modifications. All information is without guarantee in spite of careful editing - liability excluded.

STORION-LC-TB150

Model	STORION-LC-TB150
System Specifications	
Nominal Capacity	313.0 kWh
Max. Cycle Rate	0.5 P
Cycle Life	≥ 8000 *
Depth of charge and discharge	0% - 100%
Backup Switching Time	≤ 20 ms **
AC Voltage harmonics THDu (linear load @off-grid)	< 3 %
Communication Interface	Ethernet
Communication Protocol	Modbus TCP
Fire Suppression System	Aerosol, Sprinkler, Flammable Gas Detector, Smoke Detector, Heat Detector, Alarm Sounder
Battery Specifications	
Battery Model	M166314-S
Battery Chemistry	LFP (LiFePO4)
Rated Capacity of Cell	314 Ah
Operating Voltage Range	842.4 V - 1123.2V
System Battery Configuration	1P312S
Number of Battery Packs	6
PCS Specifications	
PCS Model Name	ALP150-0.4
Nominal Output Power	150 kW
Max. Output Power	165 kVA
Nominal Grid Voltage	400 V (±15%), 3L/N/PE
Nominal Grid Frequency	50 Hz /60 Hz (± 5 Hz)
Environmental Specifications	
Operating Ambient Temperature Range	-30 ℃ ~ 50 ℃ (>45 ℃ Derating)
Operating Humidity Range	0 - 95 %RH
Cooling Method	Liquid Cooling
Max Operating Altitude	3000 m (> 2000 m Derating)
Enclosure Ingress Protection	IP55
Ingress Rating	IP67 (Battery Pack), IP55(PCS)
Corrosion Protection Class	C4-M
Noise	≤ 60 dB(A)
Mechanical Specifications	
Dimensions (W x D x H)	1340 x 1542 x 2413 mm
Weight	≤ 3.2 t
Installation Method	Floor-standing
Compliance Information	
Certifications	UN38.3, IEC 62619, IEC 62477, IEC 61000, IEC 61727, IEC 62116
Grid Connection	EN 50549, VDE4110, G99, C10/11, CEI 0-21, CEI 0-16
EMC Class	Class B
Fire Testing	Meets the unit level performance criteria of UL9540A
Environmental	RoHS Directive 2011/65/EU, REACH Regulation EC 1907/2006

* Cycle Life is tested at laboratory conditions with cycle rating at 0.5 P and with ambient temperature 25℃.
** Additional STS cabinet is required and can be added separately.

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