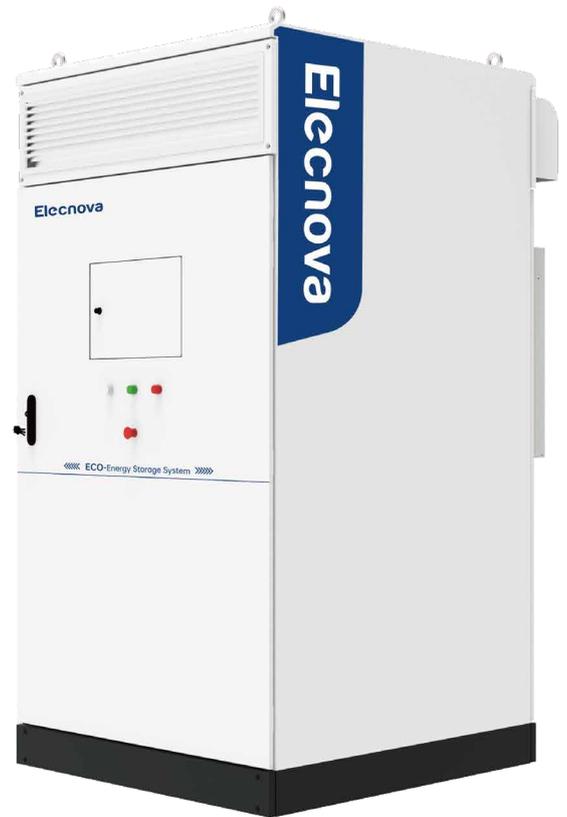# All-in-one Air-cooled ESS Cabinet

ECO-E101WX

The all-in-one air-cooled ESS cabinet integrates long-life battery, efficient balancing BMS, high-performance PCS, active safety system, smart distribution and HVAC into one cabinet, enabling long-term operation with safety, stability and reliability. Through AC side parallel connection, it achieves agile deployment of ESS power station with flexible capacity expansion.

Fast response
1P fast charge/discharge rate.

Energy Saving
Achieve utilization of new energy via energy storing & releasing of renewables.

Economical & Efficient
RTE up to 87%, DOD up to 100%.

Smart O&M
Diversified access of monitoring by HMI(local), APP/web (remote).

Flexible Expansion
Modular design, simplified parallel expansion, fast expansion.

Safe & Reliable
IP55, fully tested and optimized thermal management, cell difference ≤ 6°C.

Specifications

DC Side

Cell Type	LFP / 120 Ah
Pack Configuration	9.2 kWh / 1P24S
System Configuration	101 kWh / 1P264S
Rated DC Voltage	844.8 V
DC Voltage Range	739.2 ~ 950.4 V
Max. Charge/Discharge Rate	1 P
Max. Depth of Discharge	100% (25 ± 2 ℃)

AC Side

Rated Output Power	100 kW
Rated AC Voltage	400V
AC Voltage Range	±15%
Grid Type	3W+N+PE
Rated Frequency	50 Hz / 60 Hz
Power Factor	0.99/-1~+1
THDi	≤3%
DC Ratio	<0.5% Ipn

General

Max. Round Trip Efficiency	87%
Cycle Life	≥ 5,500 cycles
Communication	Modbus TCP/IP
Fire Suppression System	Aerosol
Ingress Rating	IP55
Cooling	Air cooling
Operating Temperature	-25℃~55℃ (Derating after 45℃)
Anticorrosion Rating	C4 (C5 optional)
Humidity	0~95% RH (non-condensing)
Noise	≤ 75 dB
Altitude	3000m (Derating above 2000m)
Dimensions (W*D*H)	1,250*1,200*2,150 mm
Weight	2,000 kg
Safety/EMC	UN38.3, IEC62619, IEC63056, IEC62477-1, IEC61000-6-2/4
Grid code	EN50549-1/-10, EN50549-2/-10, G99, VDE4105, NRS097, C10/11