

C&I ENERGY STORAGE SYSTEM

E-MATE 105-221-A

Air Cooling 105kW/221kWh

UN38.3 UN3480



Features



Battery + PCS On - Grid Storage System



Used in On - Grid Storage / PV AC Couple System



Supports 10 in Parallel in AC Side



20kWh Modular - Design Air Cooling Battery



Multi - Level Protection and Alarm (Gas, Water, Ventilation)



Intelligent EMS, Remote Monitoring and Fault Diagnose



Scenarios



Industrial Parks



Commercial Parks



Livestock Farms



Farms



Manufacturing Bases

DATASHEET

Model		E-MATE 105-221-A
Battery Parameters		
Cell technology	LFP-3.2 V / 314 Ah	
Battery pack	20.096 kWh, 64 V	
Number of packs	11	
Rated capacity	221.056 kWh	
Rated voltage	704 V	
Rated current	157 A	
Voltage range	616 V ~ 792 V	
Charge / discharge rate	0.5P	
AC Side Parameters (optional)		
PCS Brands	ENJOY	
Rated output power	105 kW	
Rated grid voltage	400 V	
Rated output current	167 A	
Allowable grid voltage range	340 V ~ 440 V	
Rated grid frequency	50Hz / 60Hz	
Output THDi	< 3%	
Power factor	-1 ~ 1	
AC output format	3W+PE+N	
Overload capacity	110% (long-term), 120% (1min)	
Charge / discharge switching time	<100ms	
Maximum efficiency	98.5%	
Other Parameters		
Dimension (W×D×H)	1380×1540×2330 mm	
	54×61×90 inch	
Weight	2750 kg (6062.71 lbs)	
Operating temperature	-20°C~+50°C (-22°F~+131°F) (Derating Below -15°C or above 45°C)	
Relative humidity	0 ~ 95% (No condensation)	
Maximum working altitude	≤4000 m (> 2000 m Derating)	
Noise	≤75dB	
IP Rating	IP55	
Cooling method	Forced air cooling	
FSS	Aerosol: stack-level, water firefighting, combustible gas detection and exhaust	
Communication	CAN / RS485 / TCP	
Cycle life	8000 cycles (25±2°C, 0.5P / 0.5P, 70% SOH)	
Rated Wiring Specification per Phase	2/0AWG (Copper Core Power Cable)	
Battery Cabinet — Hybrid Inverter Cable Specs	1/0AWG (Copper Core Power Cable)	
Standard Compliance		
Compliance	UN38.3 / UN3480	

SYSTEM DIAGRAM

