

Commercial and industrial energy storage system

FGESS-100K/215K-0.40W

Overview

The equipment adopts “All In One” modular design. The battery PACK, battery management system (BMS), energy management system (EMS), energy storage conversion system (PCS), temperature control system (TCS) and fire protection system (FPS) are integrated into one cabinet, forming a standardized, plug-and-play modular energy storage system.



Features

•High safety

Single battery cluster design avoiding capacity loss due to parallel connection and decreasing the thermal runaway risk, Immersion active fire protection and intelligent safety warning.

•High performance

Support multi-stage parallel connection, demand control function, anti-backflow function and load tracking function.

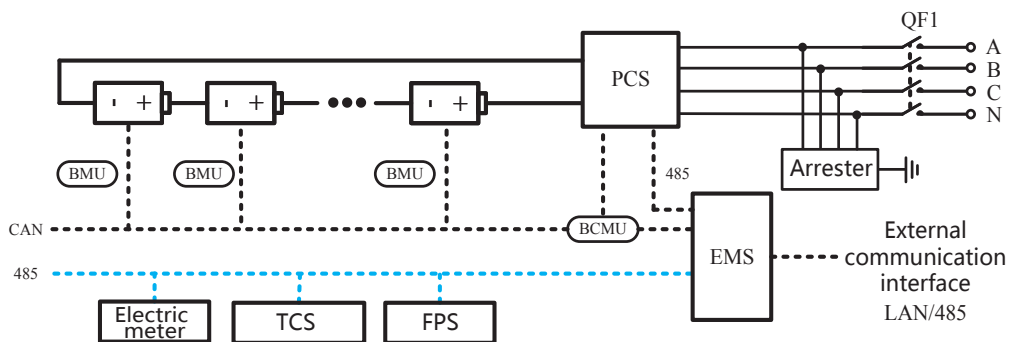
•High flexibility

Integrated design to decrease footprint and make construction easier and capacity expansion more flexible.

•High intelligence

Distributed database function, health management and active operations and maintenance function, cloud-edge collaborative energy scheduling function.

Electrical schematic diagram



Technical parameter

Model	FGESS-100K/215K-0.40W		
Cell type	LFP 3.2V/280Ah	Battery voltage	672~864V
Battery PACK	43kWh/1P48S	range DC production	Circuit breaker+Fuse
configuration Battery system configuration	215kWh/1P240S	Battery PACK IP degree	IP67
AC side parameter			
AC rated power	100kW	Grid rated voltage	400V
Max rated power	120kW	Grid rated frequency	50Hz
THDi	≤3%(Full load)	Adjustable range of PF	-1~+1
DC component	≤0.5%I _{pn}	Convention time of charge/discharge	<100ms
System parameter			
Max system efficiency	≥87%&0.5P	Cooling method	Liquid cooling
Charge/discharge ratio	≤0.5P	Operating temperature	-20°C~+50°C (>45°C derating)
Discharge depth	5~95%DOD	Relative humidity	0~95%RH,no condensation
Noise	≤75dB	Altitude	≤2000m
Refrigeration	3.0kW	Refrigeration input	1.4kW
capacity Cycle times	6000	Fire protection system	Aerosol
Communication interface	LAN/485	IP degree	IP54
Dimnesions(W*D*H)	1300*1300*2200mm	Weight	2700kg

