Monet Series

Outdoor Cabinet Energy Storage System

SPECIFICATION

1. Product Introduction

1.1. Model Description

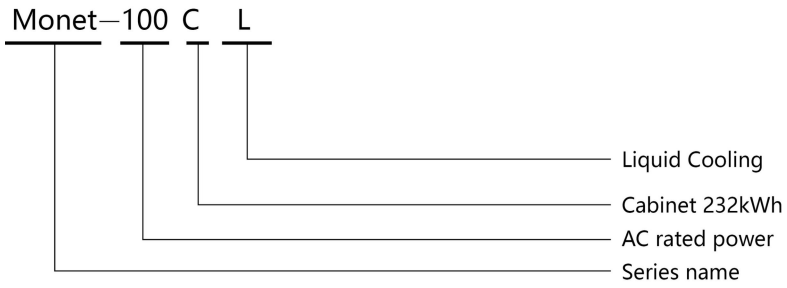

Figure 1-1Model identification

Description:

- **The rated output power and battery capacity can be flexibly configured according to project requirements.**

1.2. Product Function

The Monet series outdoor energy storage cabinet integrates energy storage batteries, modular PCS, energy management monitoring system, power distribution system, environmental control system, and fire control system. It adopts modular PCS for easy maintenance and expansion. The outdoor cabinet adopts front maintenance to reduce the occupied area and maintenance channel. It has the characteristics of safe and reliable operation, fast deployment, low cost, high energy efficiency, and intelligent management.

The operating strategy of the energy storage system in common application scenarios is as follows:

Peak shaving and valley filling:

- When the time-of-use tariff is at its valley segment: The energy storage cabinet automatically charges, and then remains idle after full charging; When the time-of-use tariff is at its peak segment: The energy storage cabinet automatically discharges, realizing the arbitrage of price difference and improving the economic efficiency of the photovoltaic-energy storage-charging system.

1.3. Electrical Wiring Diagram

Figure 1-2 Electrical Wiring Diagram

Description:

- **The diagram shows the system program with pure grid-connected, different projects with different configurations, lines are slightly different, the actual shipment of the attached map shall prevail.**

1.4. Product Features

- System productization, integrating liquid-cooled batteries, PCS and power distribution, temperature control and fire protection, flooding door magnets, and monitoring and communication, to fully control the system's operating status and risks.
- Patented outdoor cabinet protection design, optimized cooling air ducts, protection from sand, dust and rain; front and rear doors open for maintenance, which facilitates side-by-side arrangement of multiple systems on site and reduces floor space.
- Configuration of rack-modular PCS, support for multiple parallel connection, good scalability; according to the system capacity requirements of micro-grid and other scenarios to select the number of PCS modules and total battery power.
- Protection level IP55, able to perfectly cope with all types of outdoor weather.
- Intelligent liquid cooling temperature control system, reducing the temperature difference between the cells inside the PACK, guaranteeing the consistency of battery temperature control, improving battery life and reducing energy consumption.

1.5. Product Parameters

The following are typical configuration parameters of the Monet series outdoor cabinet-type photovoltaic-energy storage system. Actual delivery shall be subject to the technical agreement.

Table 1-1 Energy Storage System Parameter Sheet

Model	***Monet-100CL***
Model	***100（232kWh)***
Battery rated capacity	*232.96kWh*
Battery rated voltage	*832V*
Battery voltage range	*728V~936V*
Battery type	*Lithium iron phosphate battery(LFP)*
Battery cell capacity	*280Ah*
Series of Battery	*1P*52S*5S*
Maximum charge and discharge current	*140A*
Rated AC power	*100kW*
Rated AC current	*144A*
Rated AC voltage	*400V，3W+PE*
Rated AC frequency	*50/60Hz*
THDI	*< 3%（Rated power)*
Power Factor	*-1leading to+1 lagging*
THDU	*< 3%（Linear Load)*
Degree of protection	*IP55*
Protective Class	*I*
Isolation mode	*No-Isolation*
Shutdown self-discharge	*< 100W（Without transformer)*
Display	*LCD*
Relative humidity	*0 ~ 95% (no condensation)*
Noise	*< 78dB*
Ambient temperature	*-25℃ to +60℃(Derating above 45℃)*
Cooling mode	*Liquid-cooled*
Altitude	*3000m (> 2000m reduction)*
Communication interface	*CAN/Ethernet / 485*
*Size (W * D * H)*	*1600*1350*2300mm*
Weight (approx.)	*2700kg*

1.6. Human-machine Interface Introduction

The home page interface displays real-time power, voltage, current, generated energy, operation mode, working status and other information of the system.

1.7. Appearance Diagram