NEPT S

RESIDENTIAL ESS SOLUTION

SE-F16 Lite

Comprehensive Protection
Advanced BMS with active fuse

Superior Performance
Support Max.160A charge & discharge

Optimized Energy Density
Integrated PACK: reduced line loss, enhanced energy density

Flexible Expansion
Max. 32 units in parallel

Easy Maintenance
Auto-networking, Local monitoring mode for battery, remote monitoring mode for ESS

Reliable Durability
Operates reliably in -20℃ to 55℃, natural cooling

Model		SE-F16 Lite
Main Parameters		
Battery Chemistry		$LiFePO_4$
Capacity [1]		314 Ah
Scalability [2]		Max. 32 pcs in parallel
Nominal Voltage		51.2 V
Operating Voltage		41.6~58.4 V
Nominal Energy		16 kWh
Charge Current [3]	Recommend	104A
	Max. Continuous	160A
	Peak	192A(10 sec)
Discharge Current [3]	Recommend	104A
	Max. Continuous	160A
	Peak	192A(10 sec)
Other Parameter		
Depth of Discharge [4]		100%
Dimension (W × H × D) (Without hanging board)mm		400.5 x 732.5 x 235
Weight Approximate		108 kg
Display		LCD or LED
IP Rating of Enclosure		IP21
Operating Temperature		Charge :0~55°C/Discharge: -20~55°C
Storage Temperature		0°C~35°C
Relative Humidity		95% (non-condensing)
Altitude		≤3000m
Cycle Life [1]		≥6000(70%EOL)
Installation		Floor-Mounted
Communication		CAN2.0,RS485,Bluetooth+APP
Warranty Period [5]		5 Years
Energy Throughput [5]		25 MWh
Certification		UN38.3，IEC62619，CE-EMC， IEC 63056 ， TISI

[1] Test conditions : 0.2C Charging & Discharging, 25°C±2°C.

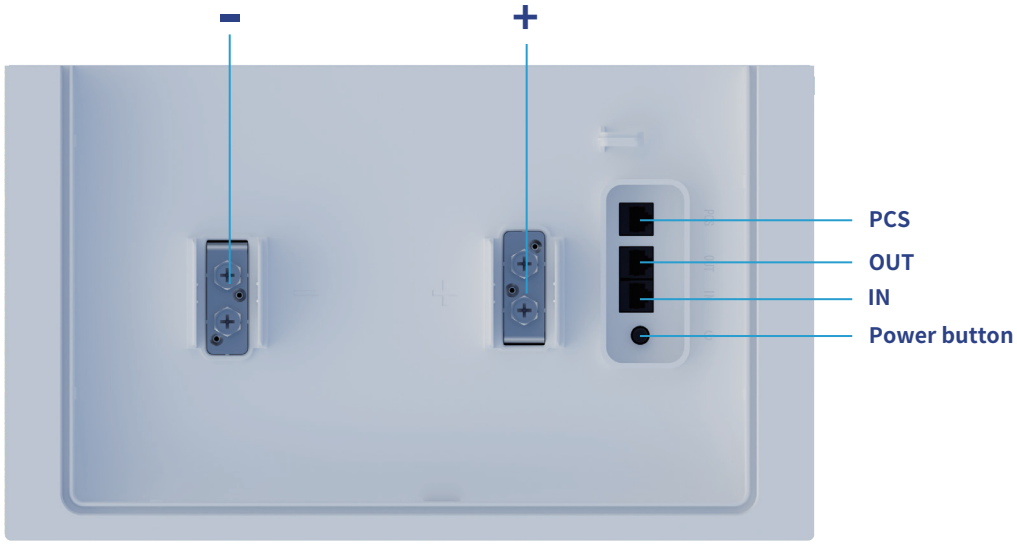
[2] Max. 64 pcs can parallel with CAN-Bridge.

[3] The current is affected by temperature and SOC.

[4] Adjustable as required.

[5] Conditions apply, refer to Deye Warranty Letter.

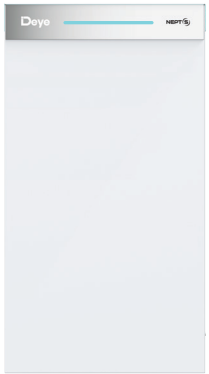
Model



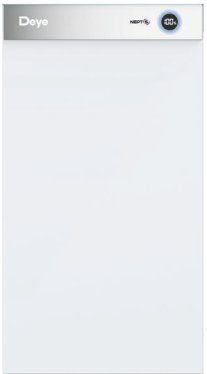
◎ -: Battery negative terminal connection position.
◎ +: Battery positive terminal connection position.
◎ Power button: Power on or off the control battery.
◎ PCS: Inverter communication terminal:(RJ45port) follow the CAN protocol (baud rate:500kbps),and RS485(baud rate:9600bps),used to output battery information to the inverter.
◎ OUT: parallel Communication Terminal:(RJ45port) Connect "IN"Terminal of Next battery,for Communication between multiple parallel batteries.
◎ IN: parallel Communication Terminal: (RJ45 port) Connect "OUT" Terminal of Previous battery,for Communication between multiple parallel batteries.

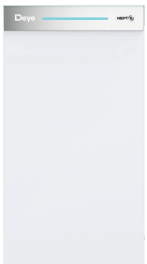
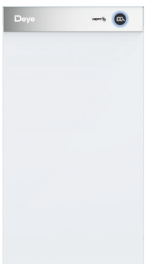
SE-F Series Model Selection and Appearance Reference

LED strip version



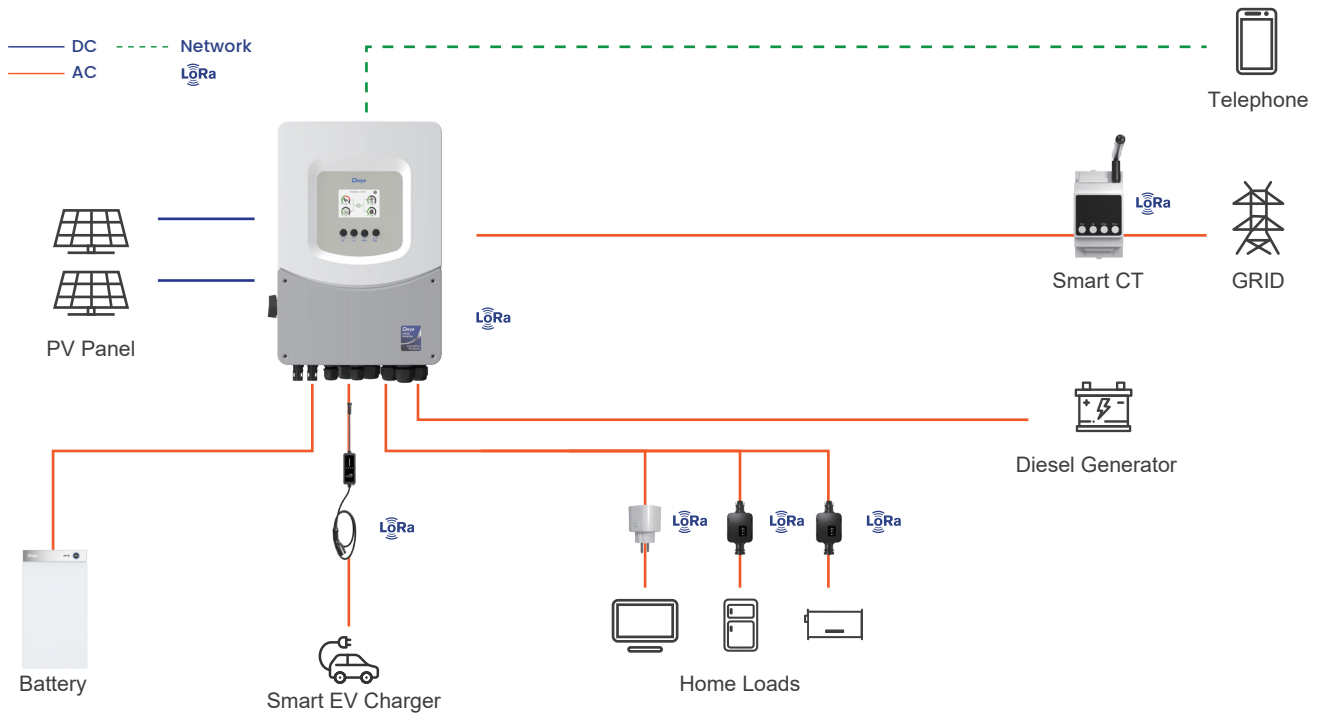
Display screen version



Config Version	Reference
E	
C	

Deye Smart Energy Management System(Optional)

The Deye Smart Energy Management System enables seamless control with smart CT, smart plug, smart switch and solar EV charging, ensuring efficiency and full compatibility with Deye inverters.



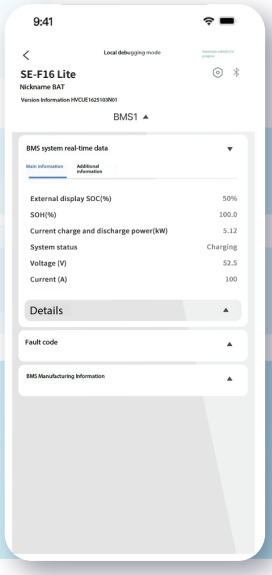
Key Features

- **Wireless Zero Export Control**
  Enables seamless zero export without the need for complex wiring, simplifying installation.
- **Intelligent Load Control**
  Automatically manages loads based on time schedules and battery SOC, optimizing energy distribution.
- **Solar-Powered EV Charging**
  Supports 100% solar charging with dynamic power adjustment for enhanced efficiency and sustainability.
- **Full Compatibility**
  All Deye hybrid inverters can be upgraded to support this system, ensuring seamless integration with existing setups.
- **Precise Off-Grid Load Management**
  Ensures that only non-essential loads are disconnected during off-grid operation, maintaining power supply for critical applications.

Deye APP

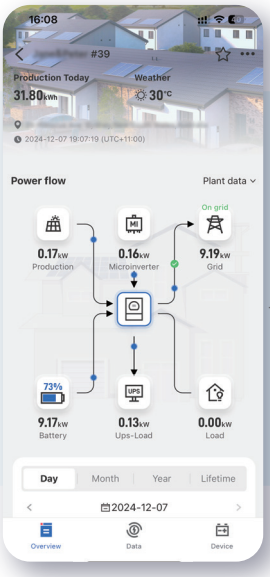
Local monitoring mode for battery

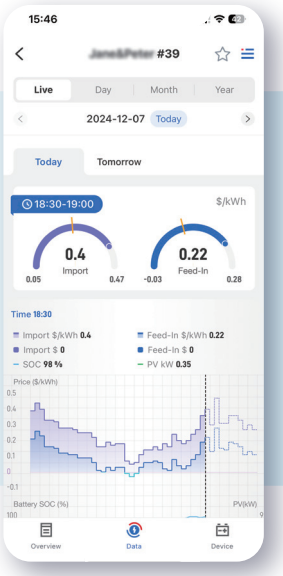
- Bluetooth APP Monitoring
- Low Power (Bluetooth LE)
- Automated upgrade



- Quick Pairing
- No Internet Needed
- Portable Control

Remote monitoring mode for ESS(Inverter&Battery)





- Real-time Equipment Monitoring
- Intelligent Charging/Discharging Strategies
- AI Data Analytics
- Customized Maintenance

Smarten Up Your Home Energy

→

Download Deye APP to join us!

Embrace a seamless, effortless energy experience that's both ecofriendly and budget-friendly with our intelligent assistant

Deye

POWERING YOUR LIFE

Scan to access Deye Partner Platform