



新艾电气
SINY ENERGY



SINY-30K Photovoltaic and Energy Storage Integrated Converters



Product Overview

SINY-30K photovoltaic and energy storage integrated converters DC side can be connected with photovoltaic and energy storage cells respectively. The product is small in size and light in weight, suitable for on-grid or off-grid application. It is applicable to the diverse needs of customers and provides more valuable personal services for customers.

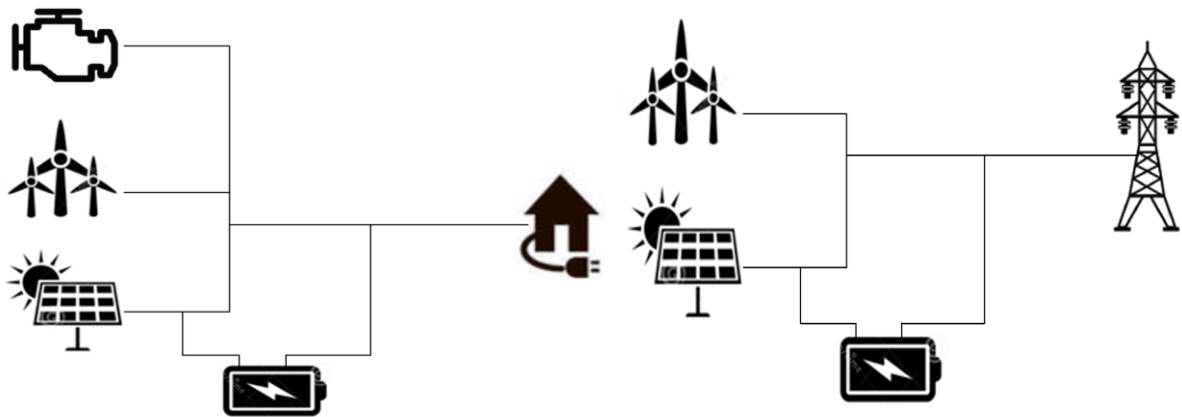


Appearance diagram

Features

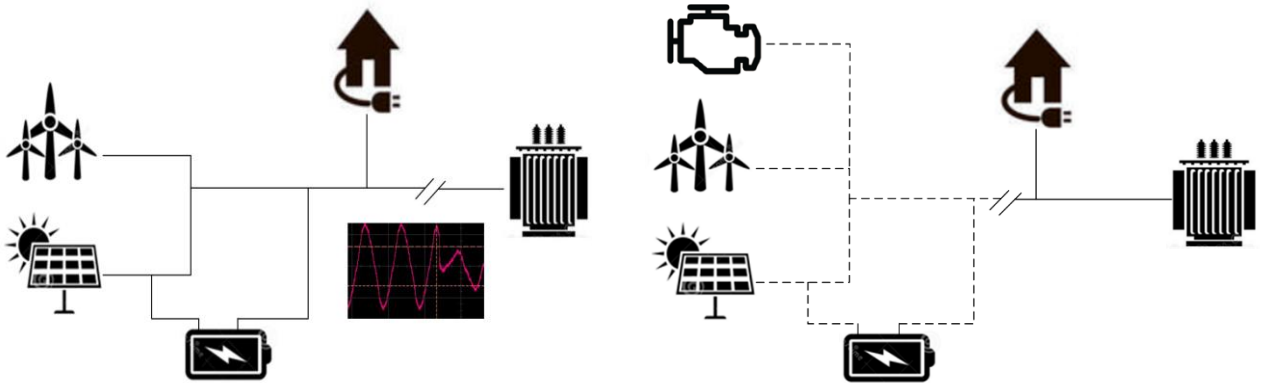
- The extremely strong load compatibility, adapts each type load perfectly, including half wave load, impact load.
- Flexible and adjustable control strategy to adapt to various scenarios
- Millisecond high speed balance system design, compatible with a variety of energy input
- Universal spare parts design, high maintainability and low operating cost

Application Scene



Islanding applications in power-free area

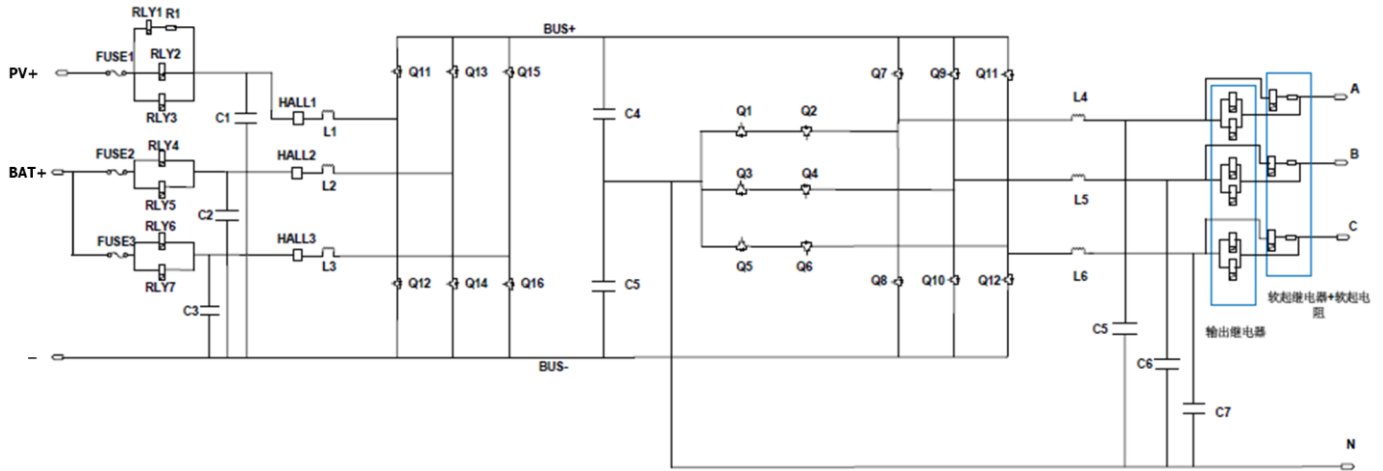
The occasion of abandoning wind and light



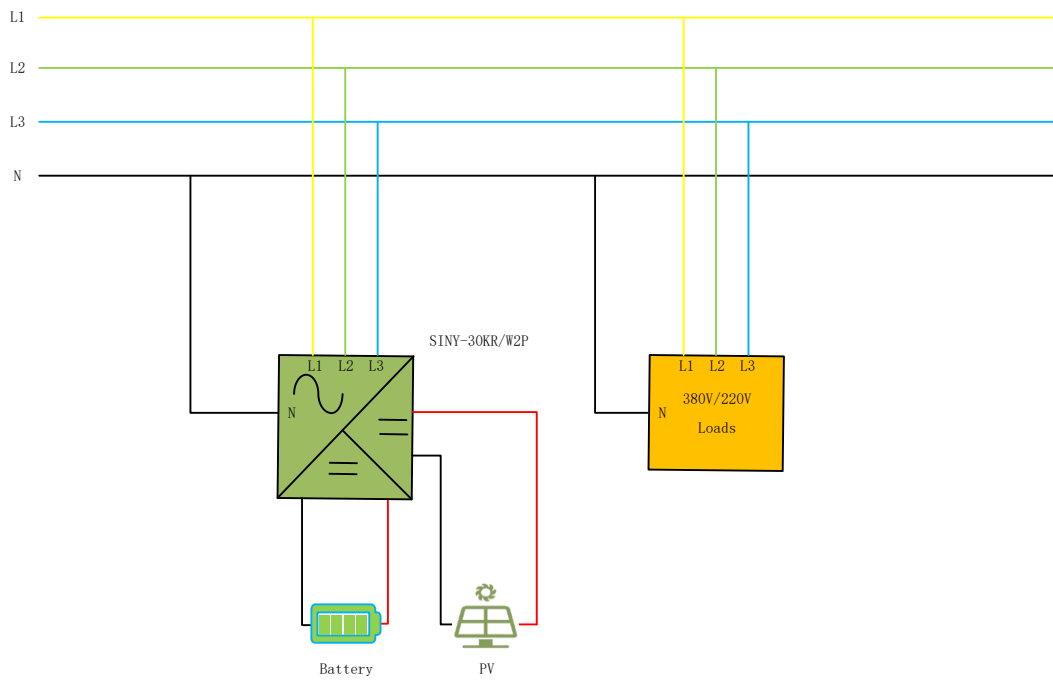
Instability of voltage and frequency at mains terminal

Emergency standby power supply

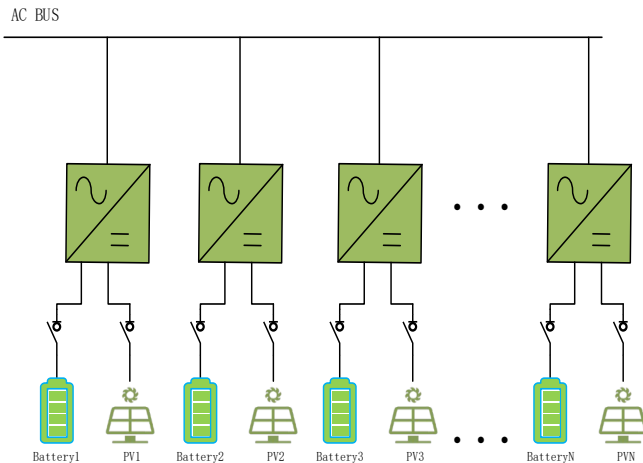
Product Internal Topology Diagram



Connection mode of distribution system



Multi-machine parallel application model



Grid Mode: Unlimited

Off-grid Mode: ≤ 10 set (Matching PMS)

Product Specification

Model class		NESI-30KR2P	NESI-30KW2P
PV parameter	Voltage Range	DC200V ~ DC900V (DC530V Full Power)	
	Channel maximum current	36.7A	
	PV channel number	1	
	Nominal power	20kW	
Battery parameter	Voltage Range	DC200V ~ DC850V (DC480V Full Power)	
	Maximum current	73.4A	
	DC channel number	1	
	Nominal power	30kW	
AC grid-connected parameter	Connection mode	3L+PE/3L+N+PE	
	Nominal power	30kW	
	Maximum current	45A	
	Nominal Voltage	AC380V/400V	
	Voltage Range	-15% ~ +15%	
	Nominal frequency	50Hz/60Hz	
	Frequency Range	± 3 Hz	
	Power Factor	-1 ~ +1	

	THD	≤3%	
AC off-grid parameter	Output Line System	3L+PE/3L+N+PE	
	Nominal power	30kW	
	Nominal voltage	AC380V/400V	
	Nominal frequency	50Hz/60Hz	
	Maximum current	45A	
	Voltage accuracy	1%	
	Frequency accuracy	0.2Hz	
	THD	3%@ Line full Power	
	Unbalanced load capacity	100%	
	Overload Capability	110% load: running time ≥ 10 min, 120% load: running time ≥ 1 min	
Environment	Working temperature	-20°C ~ 55°C (≥45°C Output power reduction)	
	Storage Temperature	-40°C ~ 70°C (No battery)	
	Relative humidity	0%RH ~ 95%RH, No condensation	
	Working altitude	45°C时, 2000m (No influence), 3000m ~ 4000m Output power reduction	
	Noise	< 68dB	
Communication and management	Communication interface	RS485、CAN、LAN	
	Communication agreement	CAN、ModBus TCP、ModBus RTU	
Installation		Rack Type	Wall Hanging
Peak efficiency		97.1%	
Isolation mode		No isolation	
Protection Grade		IP20	IP32
Cooling Mode		Forced air cooling with replaceable fan module	
Size (W*H*D)		435*135*650	460*190*800mm
Weight(kg)		35kg	45kg