

American ESS split-phase inverter

battery voltage: 48V

Product features:

Safe & reliable

- Passed UL 1741:2021, IEEE 1547.1, UL1699B, South Africa NRS097-2-1:2017 test certification;

Friendly & flexible

- Support multi-machine parallel connection;
- Support multi-machine parallel mode sharing a battery pack;
- Single-machine load capacity 100A;

Economical & efficient

- Support parallel SOC equalization control and parallel current sharing control;
- Using split-phase topology and eliminating the transformers, to make the system efficiency higher;
- Support the diesel generator and the grid access at the same time;



Technical specification:

Technical specification	R5KLNA	R6KLNA	R8KLNA	R10KLNA
Input (PV)				
Max. power(kW)	7.5	9	12	13
Max. DC voltage (V)	500			
MPPT voltage range(V)	120~500			
Max.Input current of single MPPT(A)	12			
MPPT tracker/strings	4/1			
AC output				
Rated output power(kVA)	5	6	8	10
Max. output current(A)	24	28.8	38.3	47.8
Ac output voltage(V)	120/240(split phase), 208(2/3 phase),230 (single phase)			
Frequency (Hz)	50/60			
PF	0.8lagging-0.8leading			
THDi	< 3%			
AC output topology	Split phase, 2/3 phase, single phase			
Battery				
Battery voltage range(V)	40~58			
Max. charging voltage(V)	58			
Max. charge/discharge current(A)	120/120	135/135	190/190	210/210
Battery type	lithium /Lead-acid			
Communication interface	CAN/RS485			
EPS output				
Rated power(kVA)	5	6	8	10
Rated output voltage(V)	120/240 (split phase), 208 (2/3 phase),230 (single phase)			
Rated output current(A)	24	28.8	38.3	47.8
Rated frequency(Hz)	50/60			
Automatic switching time(ms)	<20			
THDu	< 2%			
Overload capacity	125%,60S/150%,1S			
General data				
Max. efficiency	≥98.2%			
North american efficiency	≥97.2%			
Ingress protection	IP65/NEMA 3R			
Noise emission(dB)	<25	<29	<29	<29
Operation temperature	-25°C ~ 60°C			
Cooling	Natural			
Relative humidity	0 ~95% (non-condensing)			
Altitude	2,000m(>2,000 Derating)			
Dimensions W *D *H (mm)	430*220*710			
Weight(kg)	41			
Isolation transformer	No			
Self-consumption(W)	<3			
Display and communication				
Display	LCD, touch screen			
Interface:RS485/Wifi/4G/ CAN/DRM	Yes			
Safety standard	UL1741SA all options, UL1699B, CSA 22.2			
EMC	FCC Part 15, Class B			
On-grid	IEEE 1547, IEEE 2030.5, Hawaii Rule 14H, Rule 21 Phase I,II,III,NRS			