

Single Phase Hybrid Inverter

SUN-14/16K-SG01LP1-AU-AM3



Colorful touch LCD, IP65 protection degree



AC couple to retrofit existing solar system

16

Max. 16pcs parallel for on-grid and off-grid operation; Support multiple batteries parallel

290

Max. charging/discharging current of 290A

6

6 time periods for battery charging/discharging



Support storing energy from diesel generator

Deye

Stock Code: 605117.SH

Model	SUN-14K-SG01LP1-AU-AM3	SUN-16K-SG01LP1-AU-AM3
Battery Input Data		
Battery Type	Lead-acid or Lithium-ion	
Battery Voltage Range (V)	40-60	
Max. Charging Current (A)	250	290
Max. Discharging Current (A)	250	290
Charging Strategy for Li-Ion Battery	Self-adaption to BMS	
Number of Battery Input	2	
PV String Input Data		
Max. PV access power(W)	28000	32000
Max. PV Input Power (W)	21000	24000
Max. PV Input Voltage (V)	500	
Start-up Voltage (V)	125	
MPPT Voltage Range (V)	150-425	
Rated PV Input Voltage (V)	370	
Max. Operating PV Input Current (A)	26+26+26	
Max. Input Short-Circuit Current (A)	44+44+44	
No. of MPP Trackers/ No. of Strings MPP Tracker	3/2+2	
AC Input/Output Data		
Rated AC Input/Output Active Power (W)	14000	16000
Max. AC Input/Output Apparent Power (VA)	14000	16000
Rated AC Input/Output Current (A)	60.9	69.6
Max. AC Input/Output Current (A)	60.9	69.6
Max. Continuous AC Passthrough (grid to load) (A)	100	
Peak Power (off grid) (W)	2 time of rated power, 10 S	
Power Factor Adjustment Range	0.8 leading to 0.8 lagging	
Rated Input/Output Voltage/Range (V)	230 /240 0.85Un- 1.1Un	
Rated Input/Output Grid Frequency/Range	50Hz/45Hz-55Hz	
Grid Connection Form	L+N+PE	
Total Harmonics Current Distortion (THDi)	<3%	
DC Current Injection	<0.5% In	
Efficiency		
Max. Efficiency	97.60%	
Euro Efficiency	96.50%	
MPPT Efficiency	>99%	
Protection		
Integrated	DC Reverse Polarity Protection, AC Output Overcurrent Protection, Thermal Protection, AC Output Overvoltage Protection, AC Output Short Circuit Protection, DC Component Monitoring, Insulation Impedance Detection, Arc Fault Circuit Interrupter (optional),DC Switch, Anti-islanding Protection(Active Frequency shift) , Residual Current Detection	
Surge Protection Level	TYPE II(DC), TYPE II(AC)	
Interface		
Communication Interface	WIFI,RS485,CAN	
LCD/LED Display	LCD	
General Data		
Operating Temperature Range (°C)	-40 to +60°C, >45°C derating	
Permissible Ambient Humidity	0-100%	
Permissible Altitude	2000m	
Noise (dB)	<50 dB	
Inverter Topology	Non-Isolated	
Over Voltage Category	OVC II(DC), OVC III(AC)	
Weight (kg)	48	
Cabinet Size (W*H*D) [mm]	464 x 763 x282 (Excluding connectors and brackets)	
Ingress Protection(IP) Rating	IP65	
Protection Level	Class I	
Type of Cooling	Intelligent Air Cooling	
Warranty	10 Years	
Grid Regulation	AS/NZS 4777.2	
Safety EMC / Standard	IEC/EN 61000-6-1/2/3/4, IEC/EN 62109-1, IEC/EN 62109-2	