

STORAGE INVERTERS

5.5kW On-Grid Parity Inverter with Storage

SUNSYNK-5.5K-SG01LP1 IP65

Here is a mid-range On-grid Parity Inverter that carries the same features as the larger inverters. The 5.5 kW inverter is our best-selling hybrid inverter with 2 MPPT ports. It is perfect for most applications.

The size is aimed at domestic premises with sufficient roof space for solar or wind power. Ideal for solar arrays ranging from 2.5kW to 4.8kW. It carries a weatherproofing rating of IP65 and is fitted with 2 x MPPT ports.



Features:

- Maximum efficiency of 97.6% with a wide input range.
- Double MPPT design with precise MPPT algorithm.
- Fan cooling - IP65 protection.
- Compact and light design for easy installation.
- Transformer-less GT technology.
- RS485 Wi-Fi interface.
- Built-in protection features.
- Built-in anti-overflow function.
- 25 years lifespan.

Model	Sunsynk-5.5K-SG01LP1
Battery Input Data	
Battery Type	Lead-acid or Lithium-ion
Battery Voltage Range	40~60V
Max. Charging Current	120A
Max. Discharging Current	120A
Charging Curve	3 Stages/Equalisation
External Temperature Sensor	Optional
Charging Strategy for Li-Ion Battery	Self-Adaptation to BMS
PV String Input Data	
Max. DC Input Power	6500W
PV Input Voltage	370V (100V~500V)
MPPT Range	125~425V
Full Load DC Voltage Range	240~425V
Start-up Voltage	150V
PV Input Current	11A+11A
No. of MPPT Trackers	2
No. of Strings Per MPPT Tracker	1+1
AC Output Data	
Rated AC Output and UPS Power	5000W
Max. AC Power	5500W
Peak Power (off-grid)	2 times of rated power, 10 S
AC Output Rated Current	21.7A
Max AC Output Current	25A
Max Continuous AC Passthrough	35A
Power Factor	0.8 leading to 0.8 lagging
Output Frequency and Voltage	50/60Hz; 220/230/240Vac (single phase)
Grid Type	Single Phase
Current Harmonic Distortion	THD<3% (Linear load<1.5%)
Efficiency	
Max. Efficiency	97.60%
MPPT Efficiency	96.50%
Euro Efficiency	99.90%
Protection	
PV Input Lightning Protection	Integrated
Anti-islanding Protection	Integrated
PV String Input Reverse Polarity Protection	Integrated
Insulation Resistor Detection	Integrated
Residual Current Monitoring Unit	Integrated
Output Over Current Protection	Integrated
Output Shorted Protection	Integrated
Output Over Voltage Protection	Integrated
Certifications and Standards	
Grid Regulation	VDE 0126, AS4777, NRS2017, G98, G99, IEC61683, IEC62116, IEC61727, RD1699:2011, XP C15-712-3:2019-05
Safety Regulation	IEC62109-1, IEC62109-2
EMC	EN61000-6-1, EN61000-6-3
General Data	
Operating Temperature Range	-25~60°C, >45°C Derating
Cooling	Fan
Noise	<30dB
Communication with BMS	RS485; CAN
Weight	20.5kg
Size (Length x Width x Height)	580 x 330 x 208 mm
Protection Degree	IP65
Warranty	5 years