

INVERTERS

SUN-7.6-12K-SG02LP2-US-AM2-AM3-P

Hybrid inverter · Split-phase · 7.6 – 12 kW · 4 models


7.6 – 12 kW

RATED POWER

Split-phase

PHASE

2

MPPT TRACKERS

97.6 %

MAX. EFFICIENCY

Parameter	Unit	SUN-7.6K-SG02LP2-US-AM2-P	SUN-8K-SG02LP2-US-AM2-P	SUN-10K-SG02LP2-US-AM3-P	SUN-12K-SG02LP2-US-AM3-P
PV input					
Max. PV input power	W	11400	12000	15000	18000
Max. PV input voltage	V	500			
Rated PV input voltage	V	370			
MPPT voltage range	V	150 – 425			
Start-up voltage	V	125			
Max. input current per MPPT	A	32			
Max. short-circuit current per MPPT	A	60			
Number of MPPT trackers		2		3	
PV strings per MPPT		2			
AC output					
Rated output power	W	7600	8000	10000	12000
Max. apparent power	VA	8360	8000	10000	12000
Rated AC voltage	V	240			
Rated AC output current	A	31.7	33.4	41.7	50
Phase		Split-phase			
Rated AC frequency	Hz	60			
Max. AC output current	A	31.7	33.4	41.7	50
Total harmonic distortion (THDi)	%	<3			
Power factor		0.8 leading to 0.8 lagging			
Peak (surge) power	W	15200	16000	20000	24000
Generator input		Yes			
Max. parallel units		16			
Grid connection form		2L+N+PE			
Max. continuous AC passthrough (grid to load)	A	200			
DC injection current		<0.5% In			

Parameter	Unit	SUN-7.6K-SG02LP2-US-AM2-P	SUN-8K-SG02LP2-US-AM2-P	SUN-10K-SG02LP2-US-AM3-P	SUN-12K-SG02LP2-US-AM3-P
Battery					
Battery type		Lead-acid or lithium-ion			
Battery voltage range	V	40 – 60			
Max. charge current	A	190		220	250
Max. discharge current	A	190		220	250
Charging strategy for Li-ion battery		Self-adaption to BMS			
Number of battery inputs		1			
Efficiency					
Max. efficiency	%	97.6			
European efficiency	%	96.5			
MPPT efficiency	%	>99			
Protection					
Protection functions		DC reverse polarity protection; AC output overcurrent protection; thermal protection; AC output overvoltage protection; AC output short-circuit protection; DC component monitoring; arc fault circuit interrupter (AFCI)(optional); anti-islanding protection; DC switch; insulation impedance detection; residual current detection			
Surge protection level		Type II (DC), Type II (AC)			
General data					
Dimensions (W x H x D)	mm	450 × 800 × 243			
Weight	kg	40			
Ingress protection (IP rating)		IP65			
Enclosure type		Type 3R			
Operating temperature range	°C	–40 – 60			
Relative humidity	%	0 – 100			
Max. operating altitude	m	2000			
Cooling		Intelligent air cooling			
Topology		Non-isolated			
Noise level	dB	<45			
Warranty	years	5 – 10			
Overvoltage category		OVC II (DC), OVC IV (AC)			
Communication					
Display		Colorful touch LCD			
Communication interfaces		Wi-Fi; RS485			
Certifications					
Certifications and standards		FCC; UL 1741			
Grid codes		IEEE 1547.1; SRD V2.0			

Specifications are subject to change without notice. Values are typical at 25 °C unless stated.
XUSION is a brand of Hunan New Lithium Aviation Technology Co., Ltd.

E-mail lidreamtec@163.com
WhatsApp +86 133 5280 0772