

LV SERIES

Single Phase Hybrid Inverter

8 - 12 kW



Up to 130% PV Oversizing
Large PV input maximizing yield & high performance



Flexible PV Selection
Up to 32A per MPPT
150V startup voltage



UPS Level Transition
Switching Time < 10ms



Overload Ability
200% for 10s



Model	VEH-S8KA2-LV	VEH-S10KA2-LV	VEH-S12KA2-LV
Battery			
Battery Type	Li-ion/Lead-acid		
Battery Voltage Range	40-60V		
Max. Charge/Discharge Current	160/160A	200/200A	240/240A
Max. Charge/Discharge Power	8000/8000W	10000/10000W	12000/12000W
Charging Strategy For Li-ion Battery	Self-adaption to BMS		
Charging Curve	3 Stages/Equalization		
External Temperature Sensor	Optional		
Communication	CAN		
PV Input			
Recommended Max. PV Power	10400W	13000W	15600W
Max. Input Voltage	550V		
Rated Voltage	360V		
Start-up Voltage	150V		
MPPT Voltage Range	125-500V		
Max. Input Current	32/32A		
Max. Short Circuit Current	40/40A		
MPPT Number/Max. Input Strings Number	2/4		
AC Input and Output (On-grid)			
Rated Output Power	8000W	10000W	12000W
Max. Output Apparent Power	8800VA	11000VA	13200VA
Max. Input Power	23000W		
Grid Form	L/N/PE		
Rated AC Output Voltage/Range	220/230V, 154-276V		
Rated Grid Frequency	50/60Hz		
Max. Output Current	38.3A	47.8A	57.4A
Max. Input Current (A)	100A		
Power Factor	>0.99 (0.8 leading-0.8 lagging)		
THDi (@rated Output)	<3%		
AC Output (Off-grid)			
Rated Output Power	8000W	10000W	12000W
Max. Output Apparent Power	16000VA, 10s	20000VA, 10s	23000VA, 10s
Back-up Switch Time	<10ms		
Grid Form	L/N/PE		
Rated Output Voltage	220/230		
Rated Output Frequency	50/60Hz		
Max. Continuous Output Current	34.8A	43.5A	52.2A
THDv (@linear load)	<3%		
Efficiency			
MPPT Efficiency	99.9%		
Max. Efficiency	97.6%		
EU Efficiency	97.0%		
Max. Battery Discharge to AC Efficiency	95.0%		
Protection			
Anti-islanding Protection	Integrated		
PV String Input Reverse Polarity Protection	Integrated		
Insulation Resistor Detection	Integrated		
Residual Current Monitoring Unit	Integrated		
AC Over Current Protection	Integrated		
AC Short Current Protection	Integrated		
AC Overvoltage and Undervoltage Protection	Integrated		
Surge Protection	DC Type II/AC Type III		
General			
Dimensions (W*H*D)	502*740*202mm		
Weight	41 kg		
Mounting	Wall mounting		
Operating Temperature	-25°C to +65°C (>45°C, derating)		
Relative Humidity	0-95%, no condensing		
Cooling	Smart cooling		
Topology (Solar/Battery)	Transformerless/High-frequency isolation		
Altitude	≤2000m		
Protection Degree	IP65		
Noise	<40dB		
User Interface	LED, App		
Digital Input/output	1×DI, 2×DO		
Max. Parallel	10		
Communication	RS485, Wi-Fi/Ethernet/4G (optional)		
Certifications and Standards			
Grid Connection Standard	EN 50549, NRS 097-2-1		
Safety/EMC Standard	IEC 62109-1/-2, IEC/EN 61000-6-1/-2/-3/-4		