

7 SPECIFICATIONS

Table 1 Line Mode Specifications

INVERTER MODEL	3.6KW	6.2KW
Input Voltage Waveform	Sinusoidal (utility or generator)	
Nominal Input Voltage	100Vac	
Low Loss Voltage	90Vac±5V (UPS); 90Vac±5V (Appliances)	
Low Loss Return Voltage	95Vac±5V (UPS); 95Vac±5V (Appliances)	
High Loss Voltage	145Vac±5V	
High Loss Return Voltage	140Vac±5V	
Max AC Input Voltage	150Vac	
Nominal Input Frequency	50Hz / 60Hz (Auto detection)	
Low Loss Frequency	40±1Hz	
Low Loss Return Frequency	42±1Hz	
High Loss Frequency	65±1Hz	
High Loss Return Frequency	63±1Hz	
Output Short Circuit Protection	Circuit Breaker	
Efficiency (Line Mode)	>95% (Rated R load, battery full charged)	
Transfer Time	10ms typical (UPS); 20ms typical (Appliances)	
Output power derating: When AC input voltage drops to 100V, the output power will be derated.	The graph illustrates the output power derating characteristic of the inverter. The vertical axis represents Output Power, with specific levels for 50% Power and Rated Power marked. The horizontal axis represents Input Voltage, with key points at 90V, 100V, and 145V. The power remains at its rated level for input voltages up to 145V. As the input voltage decreases from 145V to 100V, the output power is derated linearly, reaching 50% of the rated power at 100V. Below 100V, the output power continues to decrease linearly, reaching 0% at 90V. For input voltages below 90V, the output power is zero.	

Table 2 Inverter Mode Specifications

INVERTER MODEL	3.6KW	6.2KW
Rated Output Power	3.6KW	6.2KW
Output Voltage Waveform	Pure Sine Wave	
Output Voltage Regulation	100/105/110/115/120Vac±5%	
Output Frequency	50Hz / 60Hz	
Peak Efficiency	93%	
Overload Protection	3s@≥150%; 5s@101%~150% load	
Surge Capacity	2* rated power for 5 seconds	
Nominal DC Input Voltage	24Vdc	48Vdc
Cold Start Voltage	23.0Vdc	46.0Vdc
Low DC Warning Voltage @ load < 50% @ load ≥ 50%	22.0Vdc 21.0Vdc	44.0Vdc 42.0Vdc
Low DC Warning Return Voltage @ load < 50% @ load ≥ 50%	22.5Vdc 22.0Vdc	45.0Vdc 44.0Vdc
Low DC Cut-off Voltage @ load < 50% @ load ≥ 50%	20.5Vdc 20.0Vdc	41.0Vdc 40.0Vdc
High DC Recovery Voltage	32Vdc	62Vdc
High DC Cut-off Voltage	33Vdc	63Vdc
No Load Power Consumption	45W	50W

Table 3 Two Load Output Power

INVERTER MODEL	3.6KW	6.2KW
Full Load	3600W	6200W
Maximum Main Load	3600W	6200W
Maximum Second Load(battery model)	1200W	2066W
Main Load Cut Off Voltage	26VDC	52VDC
Main Load Return Voltage	27VDC	54VDC

Table 4 Charge Mode Specifications

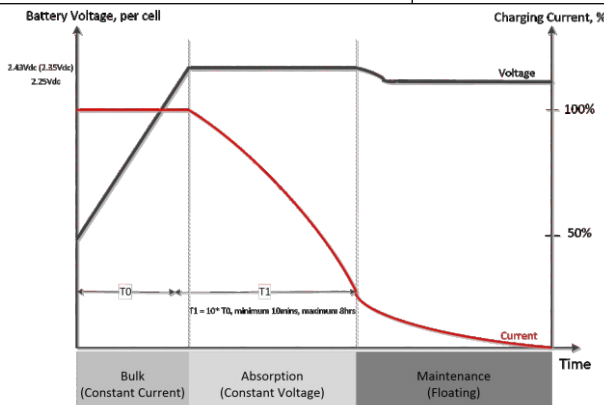
Utility Charging Mode			
INVERTER MODEL		3.6KW	6.2KW
Charging Algorithm		3-Step	
AC Charging Current (Max)		80Amp (@V _{I/P} =100 Vac)	
Bulk Charging Voltage	Flooded Battery	29.2	58.4
	AGM / Gel Battery	28.2	56.4
Floating Charging Voltage		27Vdc	54Vdc
Charging Curve			
MPPT Solar Charging Mode			
INVERTER MODEL		3.6KW	6.2KW
Max. PV Array Power		4200W	6500W
Nominal PV Voltage		240Vdc	360Vdc
PV Array MPPT Voltage Range		60Vdc~500Vdc	
Max. PV Array Open Circuit Voltage		500Vdc	
Max Charging Current (AC charger plus solar charger)		120Amp	120Amp

Table 5 Grid-Tie Operation

INVERTER MODEL	3.6KW	6.2KW
Nominal Output Voltage	100/105/110/115/120VAC	
Feed-in Grid Voltage Range	90~150VAC	
Feed-in Grid Frequency Range	49~51±1Hz/59~61±1Hz	
Nominal Output Current	30A	51.7A
Power Factor Range	>0.99	
Maximum Conversion Efficiency (DC/AC)	97%	

Table 6 General Specifications

INVERTER MODEL	3.6KW	6.2KW
Safety Certification	CE	
Operating Temperature Range	-10°C to 50°C	
Storage temperature	-15°C~ 60°C	
Humidity	5% to 95% Relative Humidity (Non-condensing)	
Dimension (D*W*H), mm	110X334X423	
Net Weight, kg	9	10