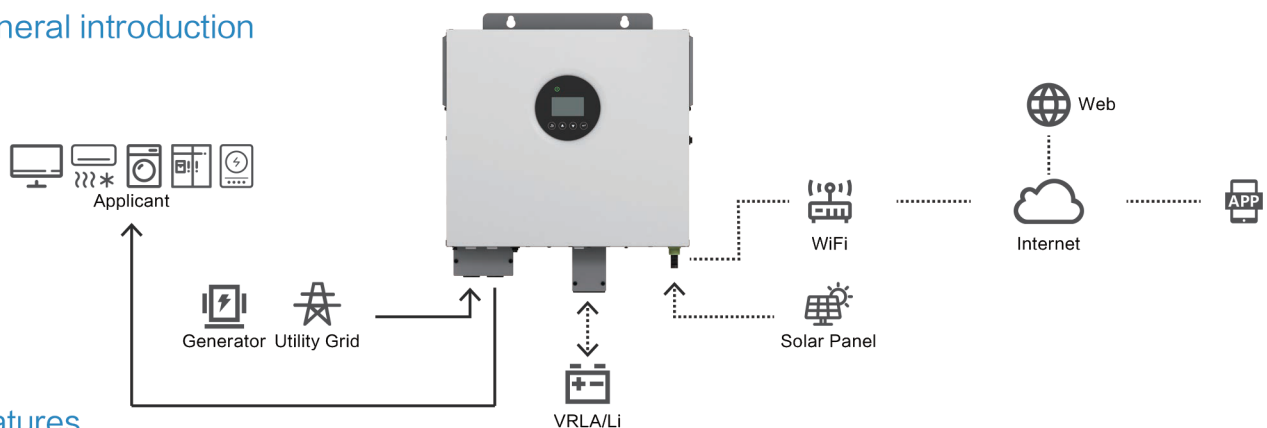




General introduction



Features

Safety

- 6kV lightning protection
- DC – DC high frequency isolating converter (Battery)
- Waterproof PV terminal

Green

- Up to 93.5% efficiency
- Output power factor is 1.0
- Intelligent cooling fan control
- Low THDv

Reliable

- Widely input voltage of AC and PV
- Pure sine wave output
- Compatible with generator
- Built-in Intelligent temperature sensors
- Dust cleaning alarms and dust-proof components

Fast charging

- PV and AC charging current is up to 120A
- Intelligent charging (Multiple charging modes)

User-friendly

- Dot-matrix screen and physical button
- Built-in WiFi module (Optional)
- APP support (Optional)
- Built-in PV terminal for easy installation

Applications

- Support home appliances/office equipment/lighting equipment etc.
- Support lead-acid and lithium-ion battery
- Max. 6 units in parallel
- RS232/USB

Technical Specifications

Model	Knight 3600–24		Knight 3600–48		Knight 6000–48	
Input(AC)						
Nominal Voltage	220/230/240Vac					
Selectable Voltage Range	170~280Vac (For Personal Computers) 90~280Vac (For Home Appliances)					
Frequency	50/60Hz (Auto Detection)					
Power Factor	0.98					
AC Switch	Optional					
Generator input	Support					
PV String Input(DC)						
Max PV Array Open Circuit Voltage Range	500Vdc					
Start-up Voltage	120Vdc					
Initial Feeding Voltage	150Vdc					
MPPT Voltage Range	120Vdc ~ 450Vdc					
Number of MPPT Trackers	1					
Maximum PV input Power	4000W		4000W		6700W	
DC Switch	Optional					
AC Output						
Nominal output Power	3600W/3600VA		3600W/3600VA		6000W/6000VA	
Nominal Voltage (Batt. Mode)	220/230 (Default)/240Vac ± 5%, User Settable					
Surge Power	7200VA		7200VA		12000VA	
Transfer Time	15ms (For Personal Computers); 20ms (For Home Appliances)					
Waveform	Pure sine wave					
Output THDv (@Linear Load)	<3%					
Battery Mode Efficiency (Peak)	93.5%					
Battery & Charge						
Norminal Votage (LiFePO4)	25.6Vdc		51.2Vdc		51.2Vdc	
Norminal Votage (Lead Acid)	24V		48V		48V	
Max. AC charge Current	120A		60A		120A	
Max. Solar Charge Current	120A		60A		120A	
Max. Charge Current (Solar + AC charge current)	120A (User Selectable)		60A (User Selectable)		120A (User Selectable)	
Interface & Mechanical						
Display	LCD & LED					
Parallel Function	Optional, max 6 units					
Communication Interface	RS232/USB; Optional: RS485/CAN/Dry Contact/WIFI					
Dimension (D*W*H/mm)	134.0*427.5*460.8					
Net Weight (kg)	11.5		11.6		13.2	
Protection						
Output Over-current Protection	Yes					
Function Protection	Short Circuit; Over voltage; Under voltage;					
Insulation Detection	Yes					
AC/DC Surge Protection	Yes					
General Specifications						
Operating Temperature	-10℃~50℃					
Storage Temperature	-15℃~60℃					
Relative Humidity	5%~95%, non-condensing					
Altitude	<3000m					
Protection Class	IP21					
Standards						
Safety	IEC/EN62109-1&2					
EMC	EN61000-6-1&2&3&4					

1. Specifications are subject to change without prior notice
2. Data above are typical values for reference only, not as a basis for engineering design
3. Output load will not be derated if the working altitude is under 2000m

