

BlueSpark Series Residential ESS **NEW**

Single Phase / All-in-one Hybrid System / 6-12 kW

Save Your Energy Bill

- ▶ Powered by Tier 1 Battery Cells
- ▶ Human-safe Low-voltage System
- ▶ Optional AFCI Protection

Smart Home Energy

- ▶ Supports Self Consumption, Peak Shaving, Time-of-Use, and Battery Priority Modes
- ▶ SG Ready Heat Pump Compatible

High Performance

- ▶ DC / AC Ratio Up to 2
- ▶ Long Battery Cycle Life

Easy Installation

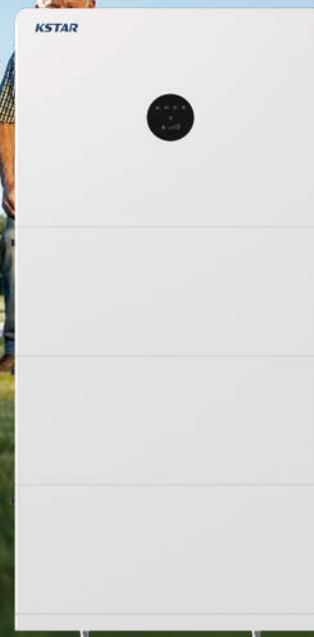
- ▶ Stackable Design, No Extra Wiring Required
- ▶ Compact and Space-saving
- ▶ IP66 Protection Rating

Flexible Expansion

- ▶ Supports On-grid & Off-grid Parallel Operation

Smart O&M

- ▶ 24 / 7 Cloud Monitoring Via KSTAR SYNC
- ▶ Easy Commissioning Via Bluetooth or Wi-Fi
- ▶ Remote Firmware Upgrades



Battery Model	BP48314P(F)1A ¹⁾
General Parameters	
Battery Type	LiFe (LiFePO4)
Cell Brand	EVE
Energy Capacity	16 kWh
Usable Capacity	15.68 kWh-discharge capacity from 100% to min SoE
Max.Depth of Discharge	98%
Norminal Voltage	51.2 V
Operating Voltage Range	44.8 ~ 57.6 V
Weight	130 kg
Dimensions (W x H x D)	725 x 300 x 600 mm
IP Protection	IP65
Warranty	5 Year Product Warranty, 10 Year Performance Warranty
Compatible Inverter	E6/8/10/12KS-D42 & E15/17/20/22/25KT-D42 & E3.68/5/6 KS-D22 & E4/5/6/8/10/12KT-D22
Operation	
Max. Continuous Charging Current	157 A (Single Battery Pack)
Max. Continuous Charging Power	8034 W
Max. Continuous Disharging Current	157 A (Single Battery Pack)
Max. Continuous Disharging Power	8034 W
Operating Temperature Range	-10°C to 50°C (Charging with heating film); -10°C to 50°C (Discharging)
Cooling Type	Fan Cooling
Humidity	0 ~ 95% (No condensation)
BMS	
Communication	CAN
Monitoring Parameters	System Voltage, Current, Cell Voltage, Cell Temperature, PCBA Temperature
Certificate	
Safety and Transportation	Pack: UN38.3; MSDS; IEC 62040; IEC 62477; IEC 62619; IEC 63056; IEC 61000-6-2/4; Cell: IEC/EN 62619; UN38.3;

1) Refer to two models of battery pack: BP48314P1 (without heating foil) and BP48314PF1 (with heating foil).

Hybrid Inverter Model	E6KS-D42	E8KS-D42	E10KS-D42AU	E10KS-D42	E12KS-D42
PV Input					
Recommended Max.PV Array	12000 W	16000 W	20000 W	20000 W	24000 W
Input Power @STC*2					
Max PV Voltage			600 V		
Nominal Voltage			380 V		
MPPT Voltage Range			100 ~ 550 V		
MPPT Voltage Range With Full Load	100 ~ 480 V	120 ~ 480 V	150 ~ 480 V	150 ~ 480 V	180 ~ 480 V
Start Voltage			120 V		
Number of MPPT Tracker			4		
String per MPPT Tracker			1		
Max. Input Current per MPPT			20		
Max.Short-circuit Current per MPPT			30		
AC Output & Input (Grid)					
Max. AC Continuous Output Power	6000 W	8000 W	9999 W	10000 W	12000 W
Max. AC Apparent Output Power	6000 VA	8000 VA	9999 VA	10000 VA	12000 VA
Max. Continuous Input Power	12000 W	16000 W	20000 W	20000 W	24000 W
Nominal AC Voltage			1P+N+PE, 220 / 230 / 240 Vac		
Norminal Frequency			50 Hz / 60 Hz (±5 Hz)		
Max. Output Current	27.3 A @ 220 Vac	36.4 A @ 220 Vac	45.4 A @ 220 Vac	45.5 A @ 220 Vac	54.5 A @ 220 Vac
Max. Input Current	54.5 A	72.8 A*	63 A	90 A*	100 A*
Power Factor (cosΦ)			0.8 leading ~ 0.8 lagging		
THDi			< 3%		
AC Output (Backup)					
Norminal AC Output Power	6000 W	8000 W	9999 W	10000 W	12000 W
Max. AC Output Power	6000 VA	8000 VA	9999 VA	10000 VA	12000 VA
Max. Output Current	27.3 A @ 220 Vac	36.4 A @ 220 Vac	45.4 A @ 220 Vac	45.5 A @ 220 Vac	54.5 A @ 220 Vac
Norminal Output Voltage			1P+N+PE, 220 / 230 / 240 Vac		
Norminal Output Frequency			50 Hz / 60 Hz		
Output THDv(@Linear Load)			< 3% (Linear Load)		
Battery Input					
Bttery Type			LFP(LiFePO4)		
Norminal Voltage			51.2 V		
Charging Vlotage Range			42 ~ 58 V		
Max. Charging / Discharging Current	200 A / 200 A	200 A / 200 A	200 A / 200 A	200 A / 200 A	200 A / 240 A
Max. Charging / Discharging Power	10000 W / 10000 W	10000 W / 10000 W	10000 W / 10000 W	10000 W / 10000 W	10000 W / 12000 W
Battery Capacity			314 ~ 942 Ah		
Efficiency					
Max.PV Efficiency			97.6%		
Euro. Efficiency			96.5%		
Protection					
DC Switch			Integrated		
Anti-islanding Protection			Integrated		
Residual Current Monitoring			Integrated		
PV Reverse Polarity Protection			Integrated		
AC Short Circuit Protection			Integrated		
AC Overvoltage Protection			Integrated		
AC / DC Surge Protection			DC Type III(DC typ II Optional); AC Type III		
Remote Shutdown			Integrated		
AFCI			Optional		
General Specifications					
Dimensions (W×H×D)			725 x 510 x 245 mm		
Weight			43 kg		
Operating Temperature Range			-25°C to +60°C (> 45°C derating)		
Cooling Type			Fan Cooling		
Max. Operating Altitude			≤ 4000m		
Operating Humidity			0 ~ 95% (No Condensation)		
IP Class			IP66		
Topology			Transformerless		
Comunication			RS-485 / CAN / WIFI		
Display			LED / WIFI+APP / Web		
Certification&Standard	IEC/EN 62109-1&2; EN61000-6-1; EN61000-6-2; EN61000-6-3; EN61000-6-4; EN61000-3-11; EN61000-3-12; IEC 61727; IEC 62116; IEC 60068; IEC 61683; AS 4777.2;				

* Max. AC input current is 63A for Australia.