

PV and Battery All-In-One

4.6-6kW

-  The maximum charging/discharging current can reach 120A
-  Can quickly stack batteries for expansion
-  Flexibly arrange the charging and discharging time of the inverter
-  Multiple working modes can be configured
-  Support off grid applications of diesel generators
-  Support grid connected operation
-  UPS level switching time (less than 10ms), always supporting critical loads



Product Model	ESS1-4.6K1P-02-LV-AIO	ESS1-5K1P-02-LV-AIO	ESS1-6K1P-02-LV-AIO
PV String Input Data			
Recommended Max. PV Power		8kW	
Max. Input Voltage		580V	
Rated Input Voltage		350V	
Start-up Voltage		120V	
MPPT Voltage Range		120-520V	
Max. Input Current		15A/15A	
Max. Short Circuit Current		22.5A/22.5A	
MPPT Number / String Number per MPPT		2/2	
Battery Input Data			
Battery Voltage Range		42-58V	
Max. Charging/Discharging Power		5kW	
Max. Charging/Discharging Current	100A		120A
Communications		RS485/CAN	
AC Output Data			
Rated Output Power	4.6kW	5kW	6kW
Rated Output Power	4.6kW	5.5kW	6.6kW
Max. Apparent Output Power	4.6kVA	5.5kVA	6.6kVA
Rated Output Current	20.9A	22.7A	27.3A
Max. Output Current	23.2A	25.2A	30A
Switching Time		< 10ms	
Rated Output Voltage/Frequency		L/N/PE 220V/230V 50Hz/60Hz	
Power Factor		0.8leading...0.8 lagging	
THDv		< 3%	
THDi		< 2%	
AC Input Data			
Max. Input Power		10kW	
Max. Apparent Input Power		10kVA	
Max. Input Current		50A	
Rated Input Voltage /Frequency		L/N/PE 220V/230V 50Hz/60Hz	
General Data			
Dimension D*W*H		610*436*257mm	
Cooling Concept		Natural	
Ingress Protection		IP65	
Operating Ambient Temperature		-25℃~+60℃ (> 45 derating)	
Max. Operation Altitude		3000m	
Communications		RS485/WIFI/GPRS	
Battery Data			
Battery Type		lithium iron phosphate	
Battery Module Capacity		5.12kWh	
Rated voltage		51.2V	
Working voltage range		40-58.4V	
Max. Number of Parallel Modules		4	
Module Cycle Life		≥6000	
Max. Charging/Discharging Current		95A/95A	
Weight		610*436*212mm	
Dimension D*W*H		49kg	
Cooling Concept		Naturel	
Ingress Protection		IP65	
Operating Ambient Temperature		-25℃~+55℃	
Max. Operation Altitude		3000m	