

HS2/AS2 Single Phase All-in-One Solution

SAJ's first all-in-one solution for residential energy storage system, integrated PCS, BMS and battery, with module and IP65 design, no external wire, suitable for outdoor easy installation. HS2 covers from 3-6kW, 2 MPPTs and single phase grid.



- ❑ AC retrofit & easy installation
- ❑ Max 16A input current to better match high power panel
- ❑ Modular design and expandable up to 20.0kWh
- ❑ With UPS function switch time $\leq 10\text{ms}$
- ❑ IP65 outdoor design
- ❑ AFCI integrated(optional), RSD supported(optional)

HS2-3K-S2-X | HS2-3.6K-S2-X | HS2-4K-S2-X
HS2-4.6K-S2-X | HS2-5K-S2-X
HS2-5K-S2-B-X | HS2-6K-S2-X

MODEL	HS2-3K-S2-X	HS2-3.6K-S2-X	HS2-4K-S2-X	HS2-4.6K-S2-X	HS2-5K-S2-X	HS2-5K-S2-B-X	HS2-6K-S2-X
DC Input							
Max. PV Array Power [Wp]@ STC	4500	5400	6000	6900	7500	7500	9000
Max. DC Voltage [V]				550			
MPPT Voltage Range [V]				90 ~ 500			
Rated DC Voltage [V]				360			
Start Voltage [V]				100			
Max. DC Input Current [A]				16/16			
Max. DC Short Circuit Current [A]				19.2/19.2			
No. of MPPT				2			
Battery Parameters							
Battery Type				LiFePO4			
Battery Voltage Range [V]				85 ~ 450			
Max. Charging/ Discharging Current [A]				30/30			
Scalability	BU2-5.0-HV1/5 (up to 4 battery modules)						
AC Output [On-grid]							
Rated AC Power [W]	3000	3680	4000	4600	5000	5000	6000
Max. Apparent Power [VA]	3300	3680	4400	4600	5500	5000	6000
Rated Output Current [A]@ 230Vac	13.0	16.0	17.4	20.0	21.7 ^{*1}	21.7	26.1
Max. Output Current [A]	15.0	16.0	20.0	20.0	25.0	22.7	27.3
Current Inrush [A]				100.0			
Max. AC Fault Current [A]				55.0			
Max. AC Over Current Protection [A]				55.0			
Rated AC Voltage/ Range [V]	L+N+PE, 220,230,240/180 ~ 280						
Rated Output Frequency/ Range [Hz]	50,60/45 ~ 55,55 ~ 65						
Power Factor [cos ϕ]	0.8 leading ~ 0.8 lagging						
Total Harmonic Distortion [THDi]	<3%						
AC Input [On-grid]							
Rated AC Voltage/ Range [V]	L+N+PE, 220,230,240/180 ~ 280						
Rated Input Frequency [Hz]	50,60						
Max. Input Current [A]@ 230Vac	26.1	32.0	34.8	40.0	43.5	43.5	52.2
AC Output [Back-up]							
Max. Output Power [VA]	3000	3680	4000	4600	5000	5000	6000
Max. Output Current [A]	13.6	16.7	18.2	20.9	22.7	22.7	27.3
Peak Output Apparent Power [VA]	3600,60s	4416,60s	4800,60s	5520,60s	6000,60s	6000,60s	7200,60s
Rated AC Voltage/Range [V]	L+N+PE, 220,230,240/180 ~ 280						
Rated Output Frequency/Range [Hz]	50,60/45 ~ 55,55 ~ 65						
Output THDv (@ Linear Load)	<3%						
Efficiency							
Max. Efficiency				97.6%			
Euro Efficiency				97.0%			
Protection							
Battery Input Reverse Polarity Protection				Integrated			
Over load Protection				Integrated			
AC Short Circuit Current Protection				Integrated			
DC Surge Protection				Integrated			
AC Surge Protection				Integrated			
Anti-islanding Protection				Integrated			
AFCI Protection				Optional			
RSD Protection				Optional			
Interface							
PV Connection				MC4/D4			
AC Connection				Plug-in connector			
Battery Connection				Quick connector			
Display				LED+APP			
Communication				Wi-Fi/Ethernet/4G (Optional)			
General Parameters							
Topology				Non-isolated			
Operating Temperature Range				-10°C to +50°C (>45°C derating)			
Cooling Method				Natural Convection			
Ambient Humidity				0-100% Non-condensing			
Altitude				4000m (>3000m Power Derating)			
Noise [dBA]				<35			
Ingress Protection				IP65			
Dimensions [H*W*D] [mm]				354*626*365			
Weight [kg]				25			
Warranty [Year]				10			
Standard	EN 62109-1/2, EN 61000-6-2/4, EN 50438, EN 50549, C10/11, IEC 62116, IEC 61727, RD 1699, RD 413, UNE 206006, UNE 206007, NTS, CEI 0-16, CEI 0-21, AS 4777.2, NBR 16149, NBR 16150, VDE-AR-N 4105, VDE 0126-1-1						

Remarks: ^{*1} According to VDE-ARN-N 4105, Rated AC Current for HS2-5K-S2 is 20A.