

Solar Battery Comparison Chart

Brand & Model	Battery Type	Usable Capacity (kWh)	Nominal Voltage (V)	Operating Voltage Range (V)	Max Charge/Discharge Current (A)
Alpha ESS SMILE-G3-BAT-10.1P	LiFePO4	9.6	96	91.5 - 106.5	60
Alpha ESS SMILE-G3-BAT-8.2P	LiFePO4	7.8	256	240 - 288	32
Alpha ESS SMILE-G3-BAT-3.8S	LiFePO4	3.6	96	90 - 108	40
Sungrow SBR096	LiFePO4	9.6	192	150 - 219	30
Sungrow SBR128	LiFePO4	12.8	256	200 - 292	30
Sungrow SBR160	LiFePO4	16.0	320	250 - 365	30
Sungrow SBR192	LiFePO4	19.2	384	300 - 438	30
Sungrow SBR224	LiFePO4	22.4	448	350 - 511	30
Sungrow SBR256	LiFePO4	25.6	512	400 - 584	30

Brand & Model	Depth of Discharge (DoD %)	IP Rating	Weight (kg)	Warranty (Years)
Alpha ESS SMILE-G3-BAT-10.1P	95	IP65 (Outdoor) / IP21 (Indoor)	19.5	5 (Product), 10 (Battery)
Alpha ESS SMILE-G3-BAT-8.2P	95	IP65 (Outdoor) / IP21 (Indoor)	19.5	5 (Product), 10 (Battery)
Alpha ESS SMILE-G3-BAT-3.8S	95	IP65 (Outdoor) / IP21 (Indoor)	19.5	5 (Product), 10 (Battery)
Sungrow SBR096	100	IP55	114	10
Sungrow SBR128	100	IP55	147	10
Sungrow SBR160	100	IP55	180	10
Sungrow SBR192	100	IP55	213	10
Sungrow SBR224	100	IP55	246	10
Sungrow SBR256	100	IP55	279	10