

Powercore 50T-100A



Better Performance

- String current 22.5A, matching high power (210) PV panel
- 6 MPPT, support 200% oversizing
- Adopting C&I 280Ah cell, good performance and higher energy density



Ultimate Safety

- AFCI as standard to prevent fire
- Support core health warning, CO, fire detection, cabinet-level fire protection
- AC and DC type II SPD



Highly Integrated

- pre-installed in the factory, no need for on-site installation and debugging
- Accessing to DG(diesel generator), no need for additional equipment
- AC coupling available



Higher Revenue

- PV and Battery are dc coupled with high efficiency
- Wide environmental adaptability improves VPP revenue
- Intelligent scheduling, and multiple scheduling modes

MODEL(Preliminary)

Powercore-50T-100A

DC Input

Max. PV Array Power [Wp]@STC	100000
Max. DC Voltage [V]	1000
MPPT Voltage Range [V]	180 ~ 850
Rated DC Voltage [V]	600
Start Voltage [V]	200
Max. DC Input Current [A]	6*45
Max. DC Short Circuit Current [A]	6*55
Number of Strings per MPPT	2

Battery Parameters

Battery Type	LiFePO4
Rated Energy [kWh]	57.3 ~ 100.3
Voltage Range [V]	179.2 ~ 403.2
Max. Charging/Discharging Current [A]	140

AC Output [On-grid]

Rated AC Power [W]	50000
Max. Apparent Power[VA]	55000
Rated Output Current[A]@230V	72.5
Max. Output Current [A]@230V	79.8
Rated AC Voltage [V]	3+N+PE,380/ 400
Rated Output Frequency/Range [Hz]	50, 45~55
Power Factor [cos φ]	0i - 1 - 0c
Total Harmonic Distortion [THDi]	<3%

AC input [On-grid]

Rated AC Voltage/Range [V]	3+N+PE,380/ 400
Rated Output Frequency [Hz]	50
Max. Input Current [A]	150

AC Output [Back-up]

Max. Output Power [VA]	55000
Peak Output Apparent Power [VA]	75000,5s
Rated AC Voltage [V]	3+N+PE,380/ 400
Rated Output Frequency/Range [Hz]	50,45~55
Output THDv (@ Liner Load)	<3%

AC Input [Generator]

Max. Input Power [W]	50000
Max. Input Current [A]@230V	72.5
Rated Input Voltage [V]	3+N+PE,380/ 400
Rated Input Frequency/Range [Hz]	50,45~55

Efficiency

Max. Efficiency	≥98.0%
Euro Efficiency	97.3%
Max. Battery to AC Efficiency	96.0%

Protection

PV Reverse Polarity Protection	Integrated
Anti-islanding Protection	Integrated
AC Overcurrent Protection	Integrated
AC Short Circuit Protection	Integrated
AC Overvoltage Protection	Integrated
DC switch	Integrated
DC Surge Protection	II
AC Surge Protection	II
AFCl	Integrated
RSD	Optional

General Parameters

Communication	Wi-Fi/Ethernet/RS485
Topology	Transformerless
Operating Temperature Range	-30 to +50 (45 to 50 with derating)
Cooling Method	Air Conditioner
Ambient Humidity	5~95%(No Condensing)
Altitude [m]	2000
Ingress Protection	IP55, IP66(Inverter)
Dimensions [H*W*D] [mm]	1980*988*1065
Weight [kg]	1355(100.3kWh)
Warranty [Year]	5/10

Standard	VDE4105, IEC61727/62116, VDE0126, CEI 0-21, EN50549-1, C10-11, UNE217002, NBR16149/NBR16150, IEC62109-1/-2, NBT32004-2018, EN61000-6-1, EN61000-6-2,EN61000-6-3, EN61000-6-4
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