

Datasheet: RacPower® Range

BN52V-100-5.2k BP

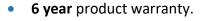
- Ultra-reliable Lithium Iron Phosphate Technology.
- High Performance:
  - Power output = 5.2kW (continuous)
  - o Fully rechargeable in 2 hours.

## Robust & Durable:

- Can be discharged to 100% DoD.
- Performance cycle life > 4000 cycles.

## Inverter compatibility:

- Serial communication (CAN/RS485) compatible with leading peripherals.
- Compatible via voltage-based setup with all other pure sine wave inverters.





GENERAL SPECIFICATIONS	
Battery Chemistry	Lithium Iron Phosphate (LiFePO4)
Nominal Voltage	51.2V
Ah Rating	100Ah @C3, 25°C
Installed Capacity @Vnom	5 120Wh
Cycle life @100% DoD, C1	2000 cycles (5 200Wh)
Cycle life @100% DoD, C2	3000 cycles (5 200Wh)
Cycle life @80% DoD, C2	4500 cycles (4 160Wh)
Internal Resistance	≤ 50mΩ @1kHz AC
VOLTAGE	
Operating Voltage Range	48.0V ~ 55.0V
Bulk Voltage (max.)	55.0V ± 0.3V
Float Voltage (recommended)	54.0V
Low-Voltage (min.)	48.0V
CURRENT	
Charge Current (max.)	50A continuous   ≤ 50A recommended
Discharge Current (max.)	100A for 30 mins.   ≤ 70A recommended
Self-discharge Rate	Residual capacity: ≤ 3% /month   ≤ 15% /year
	Recover capacity: ≤ 1.5% /month   ≤ 8% /year
ENVIRONMENTAL REQUIREMENTS	
Operating Temperature Range	@Charge: 0°C ~ +50°C
	@Discharge: -10°C ~ +50°C
Recommended Operating Environment	Temp. range: +15 ~ +35°C   Humidity: 5 ~ 75%RH
Storage Environment (stored ≤ 1 month)	Temp. range: -20 ~ +60°C   Humidity: 5 ~ 75%RH
Storage Environment (stored ≥ 3 months)	Temp. range: +10 ~ +45°C   Humidity: 5 ~ 75%RH
PHYSICAL ATTRIBUTES	
Dimensions – Main enclosure	442mm x 435mm x 135mm (L x W x H)
Dimensions – Front plate	465mm x 133mm (L x H)
Net Weight	43.0kg (unboxed, no accessories)
Serial Communication	CAN and RS485

