



T-Premium Series



SAFETY

- Pack: UN38.3, CE, IEC62619, IEC62133, E-Mark, UL1973
Cell: UN38.3, UL9540A, IEC62619
- Waterproof IP67, with safety valve
- Insulated enclosure to prevent short circuit



FLEXIBLE

- Support up to 4 batteries in series to form a 48V system
- Support 4 batteries in series and parallel at the same time
- Up to 16 batteries can be connected in parallel



INTELLIGENT

- Support Bluetooth APP, APP support customization
- Communication modes: CAN/RS485. can be compatible with mainstream inverters
- On/off switch, LED indicator, check the SOC of the battery
- Cloud platform OTA, Bluetooth upgrade BMS firmware



RELIABLE

- Independent charge and discharge protection
- Intelligent BMS management includes protection functions for high/low voltage, high/low temperature, overload, and short circuits
- Support low temperature heating, can charge at temperatures down to -20°C(-4°F)

Model	R-T12100B	R-T12120B	R-T12200B	R-T12300B
Nominal voltage	12.8V			
Nominal energy@0.2C	1280Wh	1536Wh	2560Wh	3840Wh
Nominal capacity@0.2C	100Ah	120Ah	200Ah	300Ah
Internal resistance@1khz AC	≤30mΩ			
Allowed MAX. charge current	100A @25°C	100A @25°C	200A @25°C	300A @25°C
Allowed MAX. discharge current	150A @25°C	150A @25°C	200A @25°C	300A @25°C
Recommend charge current	50A	50A	100A	150A
Recommend discharge current	100A	100A	100A	150A
Peak/Surge current limit	500A@3s	500A@3s	800A@5s	1000A@5s
Short circuit protection	1000A@500μs	1000A@500μs	1200A@500μs	1200A@500μs
Charge voltage	14.2V			
Floating voltage	13.8V			
End of discharge	11.2V			
Communication	Bluetooth, CAN and RS485			
IP rating	IP67			
Cycle life	≥6000 cycles, @25°C, @0.2C, @80%DOD			
Weight	≈12kg (26.6 lbs)	≈14.0kg (30.8 lbs)	≈23kg (50.81 lbs)	≈37.5kg (82.7 lbs)
Dimensions(W*H*D)	308*168*211mm (12.1*6.6*8.3 inch)	308*168*211mm (12.1*6.6*8.3 inch)	485*172*231mm (19.0*6.7*9.0 inch)	500*265*231mm (19.6*10.4*9.0 inch)
Parallel and series connection	Support Max. 16 in parallel or Max. 4 in series			
Terminal and torque	M8 bolt 8-10N·M			
Operation altitude	< 3000m			
Operation temperature	Charge -20~60°C (-4°F ~ 140°F) , Discharge -20~60°C(-4°F ~ 140°F)			
Self-discharge rate(shutdown)	≤3% Per month			
Recommended storage temperature	-10°C ~ 40°C (14°F ~ 104°F)			
Recommended humidity	5 ~ 85%RH			
Certifications	Pack: UN38.3, CE, IEC62619, E-Mark, UL1973, IEC62133 Cell: UN38.3, UL9540A, IEC62619			