## **Technical Specifications**

WaterWorld 48-13600

Specifications of the WaterWorld 48-13600 lithium battery are listed below. For more information please visit:

www.waterworldelectronics.com









General Features		
Capacity	13600 Wh	
Nominal voltage	51.2 V	
Final charging voltage	56.8 V	
Final discharging voltage	43.2 V	
Continuous discharge rate	150 A	
Max peak discharge rate (10s)	200 A	
Weight	119 kg	
Dimensions incl sockets (LxBxH)	1268 mm x 253 mm x 213 mm	
Volume	68 L	
Battery chemistry	Lithium iron phosphate (LFP) LiFePO4	

Use Information		
Ambient temperature, discharging	-15°C up to +45°C	
Ambient temperature, charging	+2°C up to +45°C	
Ambient temperature, storage	-25°C up to +55°C	
Typical storage time at 50% SOC	40 weeks without any load (battery turned off)	
Max connections	Up to 1 Series 8 Parallel	
Max quick charge	130 A	
Protection class	IP67	

Battery Composition		
Cell type	Cylindrical	
Capacity per cell	6.05 Ah	
Nominal voltage per cell	3.2 V	
Cell connection	16S 44P	

Information System in Combination with WW Drivetrain		
Accurate SOC presentation	Yes	
Battery status indicator	Yes	
Error identification	Yes	

Battery Management and Safety		
On-off switch	Yes	
Cell balancing	Yes	
High current and short-circuit protection	Yes, up to 1500A	
Deep discharge protection	Yes, cut off at 43.2 V	
Protection against polarity reversal	Yes	
Individual cell string voltage monitoring	Yes	
Safety vent for each cell	Yes	
Cell temperature monitoring	Yes	
Temperature monitoring of battery electronics	Yes	
Low temperature shut off	Yes	
High temperature shut off	Yes	

Lifetime Data		
Cycle lifetime	>4000 cycles with 80% discharge depth at 25 °C to capacity loss of 20% at 0.5C	
Average annual capacity loss	Approximately 2% at 25°C ambient temperature	
Ideal storage temperature	10°C - 30°C	