

**MODEL** TR-GC2-48-G  
**VOLTAGE** 51.2V  
**NOMINAL CAPACITY** 30Ah (1,536Wh)  
**CASE** Maroon Colored ABS/FR  
**BATTERY** Deep-Cycle Lithium Iron Phosphate  
**CYCLE LIFE** >4000 cycles @70% DoD (to 70% of initial capacity) at 25°C\*  
**INTELLIGENCE** Internal battery disconnect, redundant protections using three levels of fusing, state of charge indicator with aging compensation, CAN-Bus communication



**PHYSICAL SPECIFICATIONS**

BCI	MODEL	TERMINAL TYPE <sup>1</sup>	TERMINAL TORQUE IN-LBS (NM)	DIMENSIONS INCHES (MM)			WEIGHT <sup>2</sup> LBS. (KG)	HANDLES	INSTALLATION ORIENTATION
				LENGTH	WIDTH	HEIGHT			
GC2	TR GC2-48-G	M8-1.25 x 15mm Stud	80-90 (9-10)	10.4 (264)	7.1 (180)	10.9 (278)	37 (16.8)	Removable	Vertical / Horizontal

**ELECTRICAL SPECIFICATIONS**

VOLTAGE	CAPACITY AMP-HR (AH) @ 77°F (25°C)			ENERGY (WH)
	5-Hr (18A)	10-Hr (9A)	20-Hr (4.6A)	20-Hr
51.2V	30	30	30	1,536

**OPERATIONAL SPECIFICATIONS**

OPERATING TEMPERATURE RANGE	STORAGE TEMPERATURE RANGE
-4°F to 113°F (-20°C to 45°C)	-40°F to 140°F (-40°C to 60°C)

**CHARGER INSTRUCTIONS**

CHARGER SETTINGS (USING LITHIUM-ION CHARGER)	
Lithium-ion Charger Compatibility Guide	
Recommended Charging Voltage	55.2V to 57.6V
Maximum Charging Current @ Temperature	
< 32°F (< 0°C)	0A
32°F to 50°F (0°C to 10°C)	10A
50°F to 68°F (10°C to 20°C)	17A
68°F to 113°F (20°C to 45°C)	34A
> 113°F (> 45°C)	0A

**OTHER SPECIFICATIONS**

PERFORMANCE AND SYSTEM SPECIFICATIONS @ 77°F (25°C)	
Maximum Continuous Discharge Current	45A
Maximum Pulse Discharge Current (30 sec)	100A
Maximum Instantaneous Discharge Current (0.4 sec)	160A
Reserve Capacity @ 25A	72 Min
Battery Internal Protection	Short Circuit Current Temperature Over Voltage Under Voltage Over-current
Battery Functions	Cell Balancing State of Charge CAN-Bus Communication
Safety Systems	Fuse, hardware, BMS
Discharge Voltage Cutoff	40.5V
Environmental Protection	IP67
Shipping Classification	UN3480, Class 9
Case Flame Rating	UL94 V-0

**SAFETY/AGENCY INFORMATION**

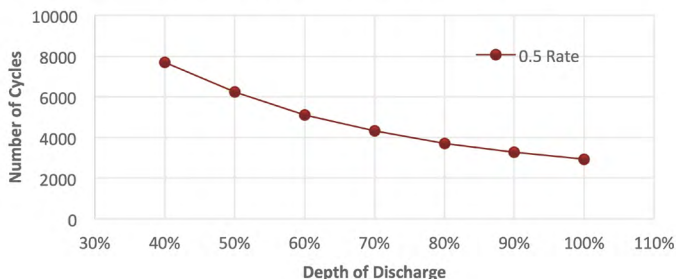
CERTIFICATIONS AND COMPLIANCE		
UN / DOT 38.3	Cells Certified To: IEC 62133-2, UL 1642, UN38.3	FCC Part 15
REACH	Complies With: UL 2271, UL 1998, UL 991	CE



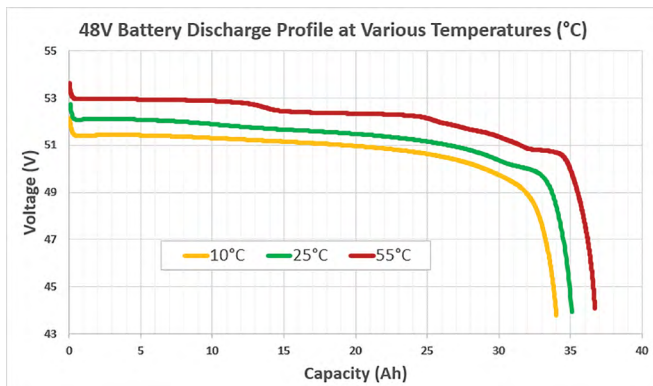
Do not mix with lead-acid batteries when recycling  
 \*At C/2 rate and depending on application/user conditions

## CYCLE LIFE

### To 70% INITIAL CAPACITY



## DISCHARGE PROFILE



## STATUS INDICATOR GUIDE

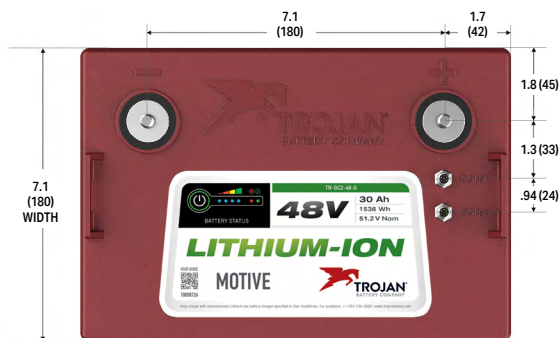
LED COLOR INDICATION	BATTERY CONDITION	INDICATOR VISUAL
4 Blue LEDs	76% to 100% Capacity Remaining	
3 Blue LEDs	51% to 75% Capacity Remaining	
2 Blue LEDs	26% to 50% Capacity Remaining	
1 Blue LED	0% to 25% Capacity Remaining	
Red LED	Active Alarm / Fault Condition in the Battery	
Green LED	Normal Operation	

The Trojan® GC2 48V Lithium-Ion features include a battery status push button and indicator light on the top of the case. A momentary press of the button displays the battery's State of Charge and operating status.

**NOTE:** Consult Trojan® GC2 Series Lithium-Ion Batteries User's Guide for more information at [trojanbattery.com](http://trojanbattery.com).

## BATTERY DIMENSIONS

Dimensions: inches (mm)



## TECHNICAL SUPPORT

**Call Trojan Battery Technical Support:**  
 United States and Canada: 800-423-6569, dial ext. 3045  
 International: +1-562-236-3045

**Email:** [technical@trojanbattery.com](mailto:technical@trojanbattery.com)

**On the web:** [trojanbattery.com/resources/technical-support](http://trojanbattery.com/resources/technical-support)



A. Terminal images are representative only  
 B. Weight may vary

