

Cost Effective Battery Tripping Unit





- ◆ Economical small footprint battery tripping unit (BTU)
- ◆ Available in 24, 30, 48 and 110VDC output
- ◆ Single phase input
- ♦ 4 or 10Ah VRLA battery included
- ◆ Single 20A DP fused output
- Digital multi-meter for output voltage and current
- ◆ Proven electronic control for long life
- ♦ 5-year warranty on electronics
- ♦ Available ex-stock

PB Design have been supplying charger systems and battery tripping units for over 40 years and have a proven track record for longevity.

ecoharge is our most cost effective battery tripping unit (BTU). Based on proven technology, **ecoharge** provides long life for the most demanding of applications.

ECOHARGE is available with a 4 or 10Ah VRLA battery in a range of voltages: 24, 30, 48 and 110V DC.

A single distribution way is available for connecting to the load. A simple user interface is provided allowing the user to select between volts and amps on the digital multimeter display.

The life of the product and hence its impact on the environment can be further extended by

replacing the batteries when they are due. The **ecoHARGE** is fitted with Sealed Lead Acid (VRLA) batteries with a 5-year life, requiring the minimum of maintenance.

Available ex-stock,

eCoHARGE is supported by a 5-year warranty on the electronics.

Typical Installations:

- Factories
- Shopping Centres
- Apartment Complexes
- Hotels
- Sports Facilities
- Office Blocks
- Health Care Buildings

Technical Specification

DC Nominal Ratings:	24 VDC / 6A	30 VDC / 5A	48 VDC / 4A	110 VDC / 2A
AC Input Voltage and Frequency	230VAC single phase ± 10%, 50Hz			
Input Power Factor	> 0.8 Inductive			
Float Voltage Range (VDC)	±15% of nominal voltage			
DC Voltage Output Tolerance	Maximum ± 1% Vrms, ±2% within 100ms			
DC Ripple Voltage	< 1% without battery connected			
Noise Level (db)	≤ 55db			
Operating Temperature (°C)	-10 to +40 °C (note temperatures above 25C will reduce the life of the battery)			
Storage Temperature (°C)	-20 to +50 °C			
Battery Operating Temperature (°C)	15 to 25 ℃			
Maximum Altitude (m)	1000 m derated 1%/100m			
IP Rating	IP22			
Relative Humidity	> 95% non condensing			
Output protection	1 no. 20A DP fused way (10x38mm type)			e)
Battery protection	1 no. 32A DP fused way (10x38mm type)			
Colour	Light Grey BS381c631			
Cubicle dimensions HxWxD (mm)	500 x 460 x 350			
Wall Mount	Yes			
Weight - including battery (kg) - 4Ah 10 Ah	31 37	32 42	39 44	48 71
Warranty	5 years return to factory. Electronics only excluding battery			

Applicable Standards		
EMC	Directive 2014/30/EU	
Safety	IEC/EN 62040-1	
Certification	CE,UKCA	
Quality	ISO 9001:2015	
Environment	ISO 14001:2015	
Other	Achilles certificate no 029428	

Ordering Information

Voltage/Ah	Part Number
24 VDC 4Ah Battery	PCE13024-006S02S004-A24A
24 VDC 10Ah Battery	PCE13024-006S02S010-A2DA
30 VDC 4Ah Battery	PCE13030-005S02S004-A24B
30 VDC 10Ah Battery	PCE13030-005S02S010-A2DB
48 VDC 4Ah Battery	PCE13048-004S02S004-A24C
48 VDC 10Ah Battery	PCE13048-004S02S010-A2DC
110 VDC 4Ah Battery	PCE13110-002S02S004-A24D
110 VDC 10Ah Battery	PCE13110-002S02S010-A2DD

eCoHARGE is complemented by the **FLX** range of battery tripping units (BTU) which offer more capabilities such as:

- Larger battery
- NiCad battery for higher temperature applications
- Alarm relay outputs
- Earth fault monitor

Contact PB Design for further information on this range.













