

MOBILITY *POWER* *PACK*



Ⓞ GB Installation- and instruction-manual

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1. Product description

The Mobility Power Pack is a light weight 12V Li-ion battery pack. It can deliver high currents and can be used for caravan movers as a light weight replacement for a heavy lead acid battery.

The Mobility Power Pack has a built in charger. It can be charged by the supplied power adapter, but also by a 12V connection from the car or a solar panel.

2. Security advice

It is important that you read this manual carefully before installing and operating the Mobility Power Pack.

Do not connect the Mobility Power Pack with any other battery in series to get a higher voltage.

The Mobility Power Pack can only be charged by the supplied power adapter or by the terminals. It may not be charged by the output terminals.

The Mobility Power Pack can deliver currents up to 200A. The cable to the caravan mover must be able to conduct 200A current. If you connect an other load (such as a control lamp), you must install a fuse close to the Mobility Power Pack. If you do not use a fuse, and a short circuit occurs, the Mobility Power Pack will not switch off and the wires can blow and fire might occur.

Do not short circuit the Mobility Power Pack

Do not open the Mobility Power Pack

Do not expose to rain

Do not expose to temperatures above 50 °C

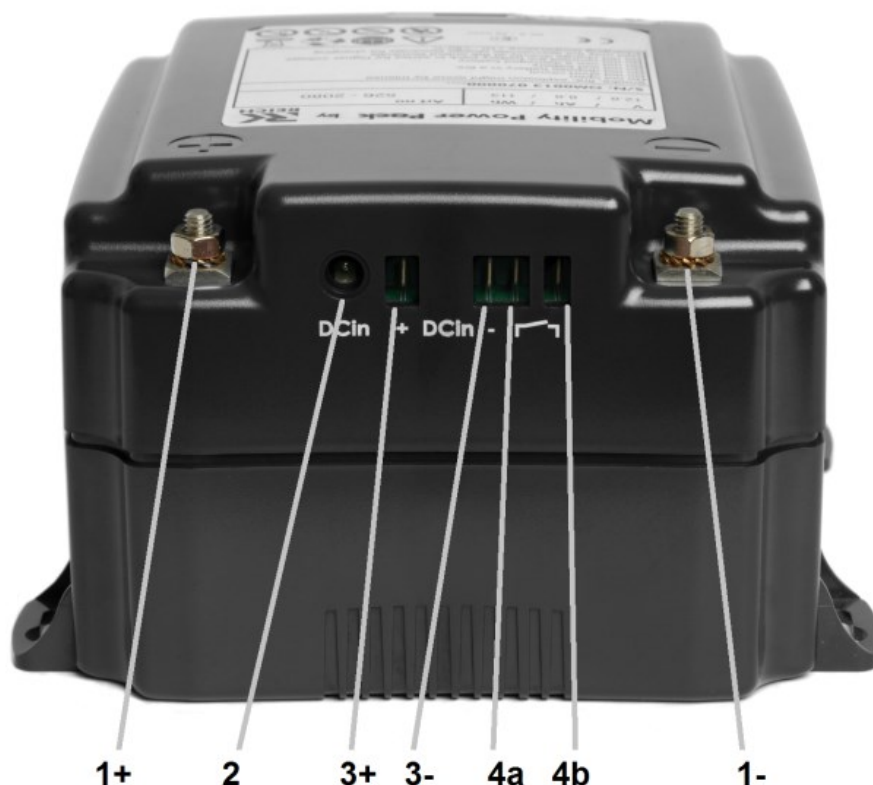
Do not put into fire.

Do not use a damaged Mobility Power Pack.

Do not dispose of the Mobility Power Pack in the household waste. You can return it free of charge to the collection points in your community or to the supplier.

3. Installation

The Mobility Power Pack can be mounted on the wall or on the floor. It must have 10 cm space around for ventilation.




(1+) (1-) Mount the caravan mover plus and minus cables at the output terminals with M6 nuts. Beware the correct polarity.

(2) To charge the Mobility Power Pack from the mains, connect the supplied 12Vdc, 1A, power adapter to the round DCin connection.

(3+) (3-) To charge the Mobility Power Pack from the car or from a solar panel, use the “+DCin-“ terminal connections.

The wires must be fetched twice through the supplied ferrite ring close to the Mobility Power Pack to prevent radio jam during charge. Beware the correct polarity.



(4a) (4b) An external push button can be connected to the terminals at  This external push button has the same function as the internal push button near the LEDs (switch on/off and clearing an error).

4. Operation

To switch the Mobility Power Pack on, press the button or the external switch. The Mobility Power Pack can be switched off by pressing the button again. It will also switch automatically off after 15 minutes inactivity (i.e. the output current is lower than 1 A).

Charging the Mobility Power Pack is performed automatically if the “DCin” voltage is present (from power adapter or from terminals input).

To prevent deep discharges, it is important that the caravan mover is not turned more tight to the wheels than required. Otherwise the current consumption can be double and the driving time halved. Also the tubes of the caravan must not be soft and the weight at the front wheel must not be much, to avoid excessive power consumption.

Charge the Mobility Power Pack after every trip.

Charge the Mobility Power Pack at least every 12 months.

Charge the Mobility Power Pack before you leave it in the caravan in the winter store.

5. LED indications

The green LED indicates if the output voltage is present and what the state of charge (SOC) during discharge is. This is indicated by the following blinking sequence (a period of 8 seconds is shown):

	output on, charging
	output on, 76..100%SOC
	output on, 51..75% SOC
	output on, 26..50% SOC
	output on, 1..25% SOC
	output off

The orange LED indicates if the Mobility Power Pack is charging and what the state of charge (SOC) during charge is. This is indicated by the following blinking sequence (a period of 8 seconds is shown):

	Full, 100% SOC
	76..99% SOC
	51..75% SOC
	26..50% SOC
	1..25% SOC
	Not charging

If both LEDs are blinking a number of times (followed by rest), this indicates a failure.

Number of flashes by the LEDs followed by rest	Description/remedy
1	Deep discharge. Charge is necessary.
2	High temperature. Let cool down.
3	Low charge temperature. Bring to warm room.
4	Electronics high temperature. Cool down.
5	Overcurrent.
6	Short circuit. Check cabling.
7	Short circuit. Check cabling.
8	High voltage at DCin terminals.
9	Charged from output terminals.
10 or more	Other failure. Contact supplier

A failure indication can be cleared by pressing the button.

6. Specifications

Input voltage:	Power adapter:	12.0 Vdc
	Terminal:	11.0..21.0 Vdc
Input current:	Power adapter:	1.0 Adc
	Terminal:	5.0 Adc
Output voltage:	Nominal:	12.8 Vdc
	Maximum:	14.4 Vdc
Output current maximum:	80 Adc (continuous), 140 Adc (for 2 seconds)	
Capacity:	8.8 Ah, 113 Wh	
Charge time (max.) :	4 hours (by terminal input) 16 hours (by power adapter)	
Weight:	2.2 kg	
Dimensions:	109(H) x 181(W) x 192(D) mm	
Temperature amb.:	0..40 °C (use) -10..30 °C (storage)	
Relative humidity:	max. 95%	
IP class:	IP21 (vertical use)	
Cell configuration:	4S4P, Li-ion	
Cell chemistry:	Lithium-iron-phosphate	
Protections against: :	overload, short circuit, low/high temperature, under/overvoltage	
Supplied power adapter:	Input:	100..240Vac,50..60Hz,0.5Aac
	Output:	12Vdc, 1Adc, 12W