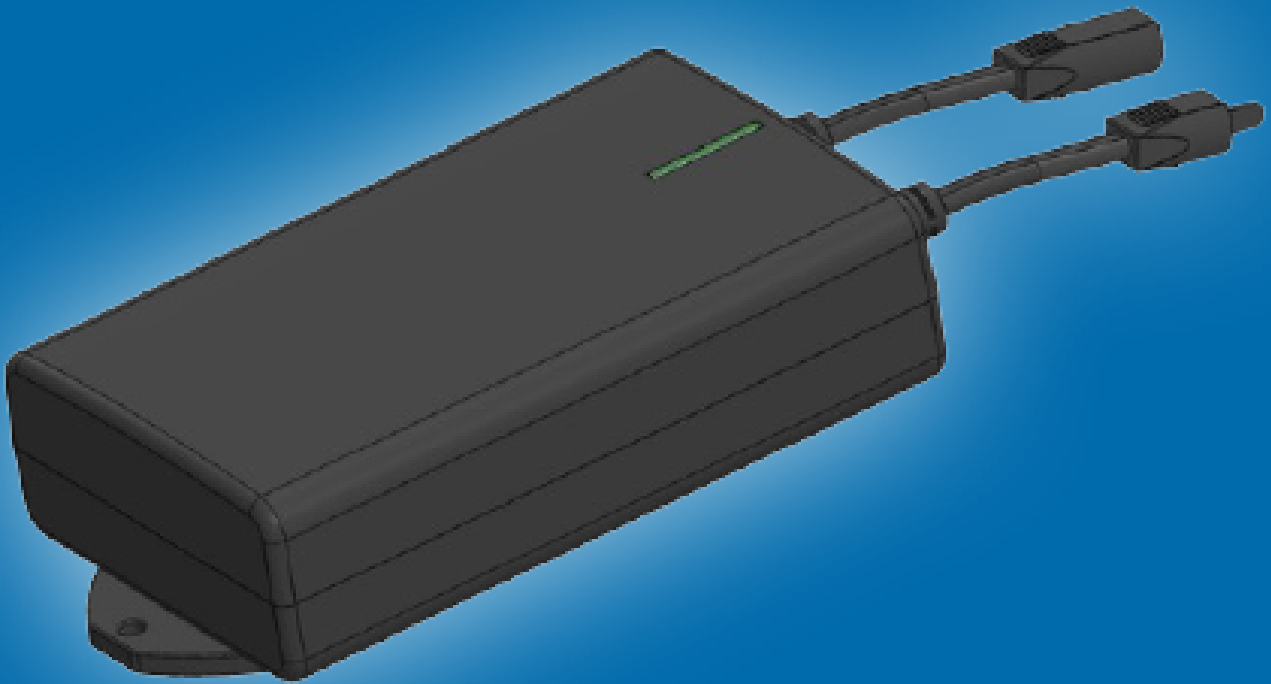


L A  B O Y<sup>®</sup>

## POWER PACK 1800

Instruction Manual



## Foreword

### Disclaimer and exclusion of liability

La-Z-Boy is not responsible for damage resulting from:

- failure to observe these instructions,
- changes made to this product which have not been approved by La-Z-Boy, or
- the use of replacement parts which have not been approved or manufactured by La-Z-Boy.

We reserve the right to make unannounced technical changes in the course of our continual product improvement process.

## Table of Contents

<b>Foreword</b>	<b>2</b>
Disclaimer and exclusion of liability	2
<b>Table of Contents</b>	<b>2</b>
<b>General</b>	<b>3</b>
Conventions used	3
Warranty	3
<b>Safety notices</b>	<b>4</b>
Product identification	5
<b>Description</b>	<b>6</b>
Dimensions	6
Connection	8
<b>Operation</b>	<b>9</b>
<b>Charging the battery</b>	<b>9</b>
<b>Commissioning</b>	<b>10</b>
Notes for operation	10
Acoustic warning signal	10
Deep-discharge protection	10
Optical charge level indicator	11
<b>Cleaning and care</b>	<b>11</b>
<b>Disposal</b>	<b>11</b>
<b>Troubleshooting</b>	<b>12</b>
<b>EU Declaration of Conformity</b>	<b>13</b>

## General



Read attentively and follow this information carefully before handling the rechargeable batteries. Keep this document in a safe place.

**Be sure to follow the notices and information found on the battery and packaging.**

## Conventions used

Notices which do not relate to safety are indicated in these instructions with a triangle:

▶ Triangular notice symbol

## Safety notice explanations

 <b>CAUTION</b>
CAUTION against dangerous situation, risk of injury.

<b>NOTICE</b>
NOTICE is used to address practices which are not related to personal injury but may result in damage to the product or surroundings.

## Warranty

Rechargeable batteries, by their nature, have a limited lifespan and are characterized by gradual power loss over time. The normal depreciation and continual power loss exhibited by the battery are not covered by any warranty claims.

## Safety notices

### **⚠ CAUTION**

#### **Leaking batteries present a health hazard!**

- Leaking battery fluid can injure your skin or eyes.
- The fluid is harmful when touched or swallowed.
- If you come into contact with battery fluid, clean the affected area with water and contact a doctor.

### **⚠ CAUTION**

- If the housing or cable are damaged, the battery must be disposed immediately.
- Do not open or destroy the battery.
- Do not solder or weld at the battery or in the vicinity of the battery.
- Avoid contact with water.
- Use only by La-Z-Boy approved Chargers.

The **POWER PACK 1800** should not be used:

- in any environment where combustible or explosive gases or vapours (e.g., anaesthesia) may be present,
- in the proximity of open fires or other heat sources (such as furnaces, ovens or direct sunlight),
- in any application that will be cleaned with an automated washing system,
- in a moist environment,
- outdoors,
- as a power source for toys or games.

The **POWER PACK 1800** can be used by children of 8 years and older, persons with reduced physical, sensory or mental capabilities, or persons with lack of experience or knowledge when they are supervised or instructed concerning the safe use of the device and when they understand the resulting risks. Do not allow children to play with this device. The cleaning and user maintenance must not be carried out by children without supervision.

### **NOTICE**

Improper storage can reduce the performance of your battery or damage it beyond repair.

## Product identification

A ratings plate on each product specifies the exact name and serial number of the product. It also states the technical specifications valid for that particular product.

- ▶ The ratings plate shown is an example; the specifications for your product may differ from this illustration.

**Fig. 1: Ratings plate Power Supply PD21 (example)**



**Fig. 2: Ratings plate POWER PACK 1800 (example)**



## Description

### POWER PACK 1800

The **POWER PACK 1800** serves for mains independent power supply of electro motorical adjustable applications. The **POWER PACK 1800** has the following special features:

- The **POWER PACK 1800** is used as a power supply at power failure.
- ▶ We reserve the right to make unannounced technical changes in the course of our continual product improvement process.

To charge the **POWER PACK 1800** the POWER SUPPLY PD21 with the appropriate country version is necessary.

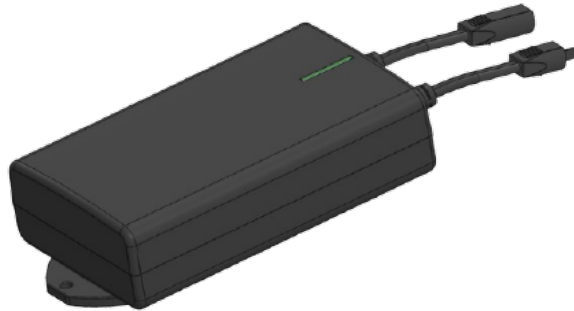


Fig. 03: POWER PACK 1800

### Important Features

- Very low self-discharge rate
- Short circuit proof
- Overcurrent switch off
- Deep-discharge protection
- Acoustic warning signal for low remaining charge
- Optical charge level indicator
- LED charge indicator:
  - LED lights red – Battery is charging
  - LED lights green – Battery is fully charged
- Mounting plates

### Technical data

- Lithium-Ion Accu (li-Ion)
- Capacity: 1800 mAh
- Energy: 45 Wh
- max. voltage 30 V DC
- Output voltage: 25.2 V DC
- max. output current 5 A
- Acoustic signal:  $\leq 23$  V
- Temperature range 0 °C – 40 °C
- Charging time approx. 5 - 8 h (depending on charging state)
- Low weight: approx. 550 g
- approx. 300 charging cycles (depending on usage and operational conditions)

## Power Supply PD21

Input: 100-240V AC, 50-60 Hz , 1,6 A

Output: 29 V DC, 2 A

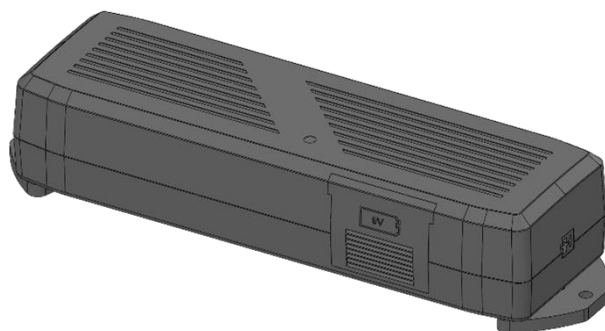


Fig. 04: Power Supply PD21

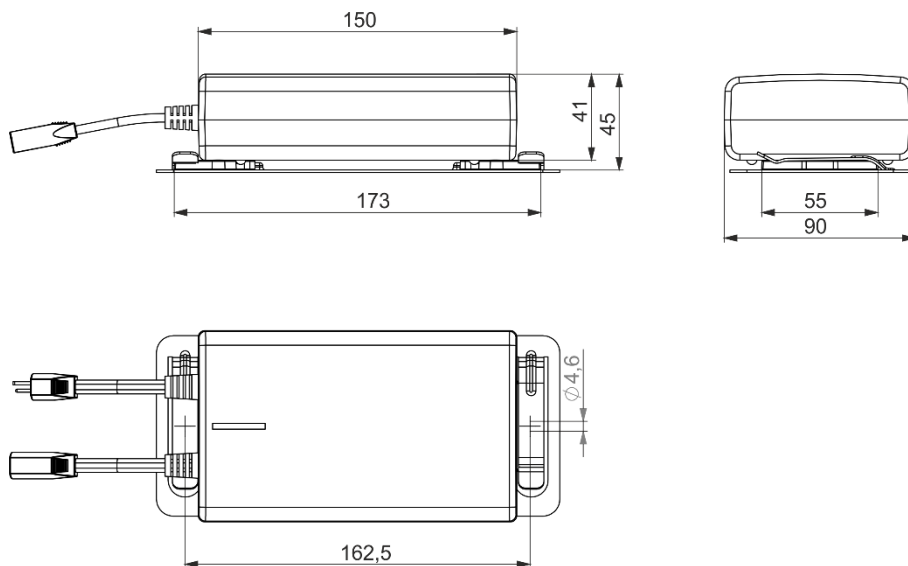
### Warning:

For charging the **POWER PACK 1800** must be used with a PD21 POWER SUPPLY or a power supply with compatible connections and identical technical specifications.

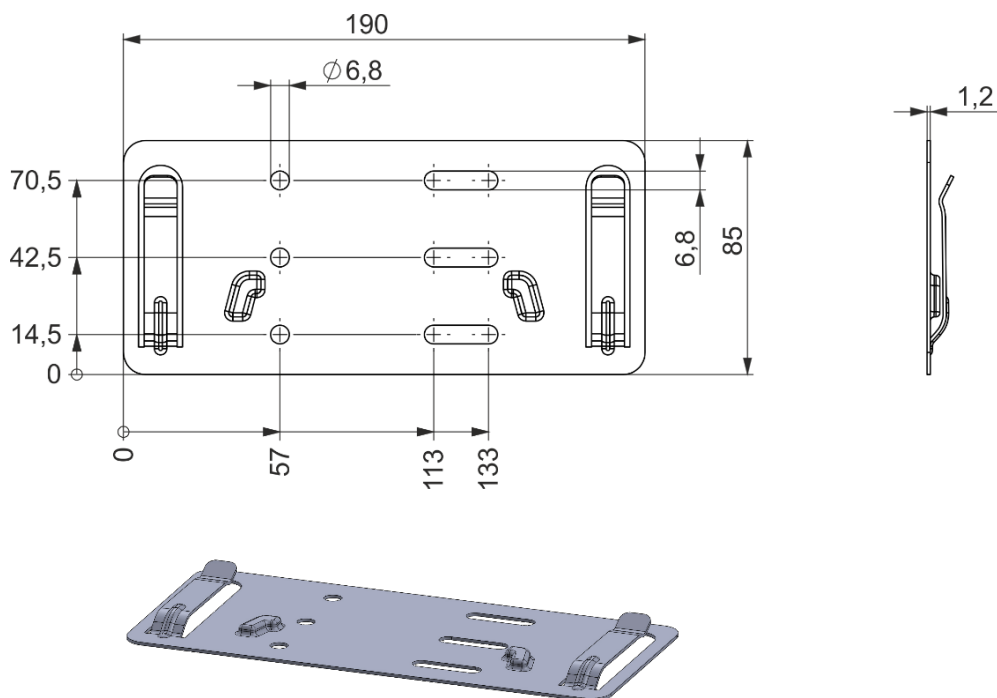
## Dimensions

### POWER PACK 1800

Fig. 05: Dimensions of POWER PACK 1800



## Mounting plate (options)



## Connection

As standard the **POWER PACK 1800** is charged as needed with the PD21 POWER SUPPLY

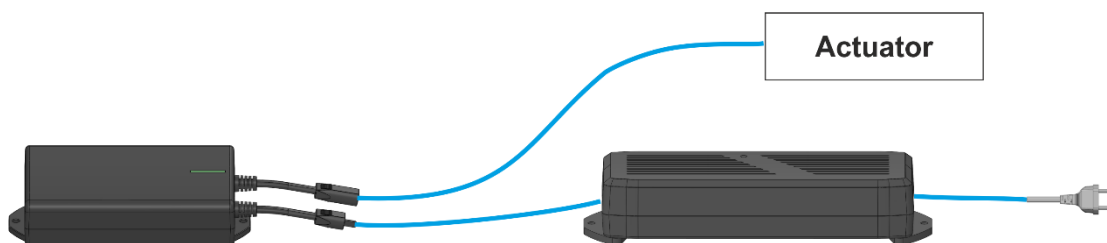


Fig. 06: Overview of charging

### NOTICE

Should the POWER PACK 1800 be used in combination with operating elements that have a power consumption at rest, such as touch sensors, RF-systems or Bluetooth-adapters it perhaps must be charged more frequently.

**Please contact your supplier/dealer.**



## Operation

Type of check / action	Explanation	Time interval
Recharging	To maintain battery performance	No longer than six months after date of manufacture.
Recharging during storage	Recharge during storage to maintain battery performance capability	At least every six months.

## Charging the battery

### **NOTICE**

Due to the chemical reactions the POWER PACK 1800 warms-up during charging.

If the POWER PACK 1800 becomes very hot, the protective circuit is defective. In this case remove all connection cables of the drive / control unit and check the unit (POWER PACK 1800 and PD21 POWER SUPPLY) by an authorized technician or producer.

- Do not set up the **POWER PACK 1800** in bath- or shower rooms. The battery and charger are not splash proof.
- Only recharge the **POWER PACK 1800** at the temperatures given below: Charging temperature: from +10°C to + 40°C
- The **POWER PACK 1800** deliver their full capacity after 5-10 charge and discharge cycles.
- Exclusively use the PD21 POWER SUPPLY for charging the **POWER PACK 1800** and make yourself familiar with the operation of the device.
- Charging time of the **POWER PACK 1800** may take approx. 5 - 8 h.
- The red LED flashes during the charging process. When the battery is fully charged, the electronics switch to standby and the LED lights green. The green LED switches off after the PD21 POWER SUPPLY has been disconnected from the **POWER PACK 1800**.
- A green LED on the PD21 POWER SUPPLY indicates that it is connected to a power supply. The system can be operated/moved while it is being charged.

## Commissioning

### NOTICE

Charge the POWER PACK 1800 completely before first use. This is necessary so that the maximum capacity can be reached. When the green LED switches off, the POWER PACK 1800 is fully charged. The maximum battery capacity is now available.

### NOTICE

Electrical components should be connected or disconnected only when the power supply cord is unplugged.

The **POWER PACK 1800** can then perform optimally when the product is being used at normal room temperatures from 18 °C to 25 °C. The operating temperature should never exceed 40 °C.

The acoustic low battery-warning built-in to the **POWER PACK 1800** is only active when the drive is moving!

It is possible that after long periods of storage, several cycles of charging and re-charging may be required to restore the performance of the **POWER PACK 1800**.

Connect the **POWER PACK 1800** to the PD21 POWER SUPPLY ensuring the correct connection port is used. The plug should fit securely in place.

Connect the PD21 POWER SUPPLY to the socket. During charging lights the LED **red**. If the charging cycle is complete and the PD21 POWER SUPPLY is disconnect from the socket the LED goes out.

## Notes for operation

### Acoustic warning signal

### NOTICE

If you do not use the sofa / chair for an extended period, disconnect the POWER PACK 1800 from the control unit/drive system as well as from the mains supply. It should then be re-connected if you plan to use the sofa / chair again. This will prevent the battery from losing its charge in certain applications.

An acoustic warning signal indicates that the battery charge state is very low. The **POWER PACK 1800** must be charged.

### Deep-discharge protection

The switch-off voltage of the **POWER PACK 1800** is  $\leq 22$  V. If the actual voltage falls below this level, the **POWER PACK 1800** is disconnected from the system. If the battery voltage rises back up over the switch-off level, then it will switch on again. Otherwise, the **POWER PACK 1800** will remain switched off.

## Optical charge level indicator

### Red LED:

If the charger is connected correctly, the red LED flashes and the **POWER PACK 1800** charges. If the LED does not light up, check the connections. There may be a disconnection or malfunction.

### Green LED:

The green LED switches on when the **POWER PACK 1800** is charged. It switches off when the **POWER PACK 1800** is discharged. The charging circuit switches to standby and the LED goes out. If the battery voltage falls below a certain level, the charging process resumes and the green LED lights up.

## Cleaning and care

The **POWER PACK 1800** is maintenance free.

1. Be sure to unplug all connecting cables before you begin cleaning it!
2. Clean the **POWER PACK 1800** as needed using a dry, antistatic cloth.
3. Be sure that you do not damage the connecting cables during the cleaning

### NOTICE

Never clean the **POWER PACK 1800** in an automated washing system or with a high-pressure cleaner. Do not allow fluids to penetrate the lighting. Damage to the system could result.

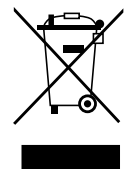
Do not use a cleanser that contains benzene, alcohol or similar solvents.

## Disposal

The **POWER PACK 1800** consists of electronic components, cables and metal and plastic parts. You should observe all corresponding national and regional environmental regulations when disposing of the system.

The disposal of the end product is regulated in Germany by Elektro-G, internationally by the EU Directive 2012/19/EC (WEEE), or by any applicable national laws and regulations.

The **POWER PACK 1800** should not be disposed of with normal household waste.



## Troubleshooting

This chapter describes troubleshooting methods for fixing problems. If you experience an error that is not listed in this table, please contact your supplier.

<b>Problem</b>	<b>Possible cause</b>	<b>Solution</b>
Handset does not operate or chair / sofa does not function	Handset or drive system defective	Contact your supplier/ dealer
	POWER PACK 1800 is discharged	Charge the POWER PACK 1800
Chair / sofa does not respond when control buttons are operated	The unit's fuse may have been triggered	Contact your supplier/ dealer
	A cable has been disconnected (mains power or handset, slave drive)	Check the cables, if necessary restore contact
	POWER PACK 1800 is discharged	Charge the POWER PACK 1800
	Overload fuse has been triggered	Stop operating the system for 5 sec. and charge the POWER PACK 1800

## EG-Konformitätserklärung

Nach Anhang IV der EMV-Richtlinie 2014/30/EU  
Nach Anhang IV der EU-Niederspannungsrichtlinie  
2014/35/EU  
Nach Anhang VI der RoHS-Richtlinie 2011/65/EU  
(inkl. Delegierte Richtlinie (EU) 2015/863)  
Der Hersteller:

## EU Declaration of Conformity

In compliance with Appendix IV of the EMC-Directive  
2014/30/EU  
In compliance with Appendix IV of the LVD-Directive  
2014/35/EU  
In compliance with Appendix VI of the EU RoHS  
Directive 2011/65/EU  
(incl. Commission delegated Directive (EU) 2015/863)  
The manufacturer:

DewertOkin GmbH  
Weststraße 1  
32278 Kirchlengern  
Deutschland - Germany

## POWER PACK 1800

**mit DewertOkin Antriebssystem  
mit DewertOkin Steuerungssystem**

die Anforderungen folgender EG-Richtlinien erfüllt:

**Richtlinie über elektromagnetische  
Verträglichkeit 2014/30/EU**

**Niederspannungsrichtlinie 2014/35/EU**

**DELEGIERTE RICHTLINIE (EU) 2015/863  
DER KOMMISSION vom 31. März 2015 zur  
Änderung von Anhang II der Richtlinie 2011/65  
EU des Europäischen Parlaments und des  
Rates hinsichtlich der Liste der Stoffe, die  
Beschränkungen unterliegen.**

Angewendete Normen

**with DewertOkin drive system  
with DewertOkin control system**

meets the requirements of the following  
EU directives:

**Electromagnetic Compatibility Directive  
2014/30/EU**

**Low Voltage Directive 2014/35/EU**

**COMMISSION DELEGATED DIRECTIVE (EU)  
2015/863 of 31 March 2015 amending Annex  
II to Directive 2011/65/EU of the European  
Parliament and of the Council as regards the  
list of restricted substances.**

Applied standards:

- EN 60950-1:2006/A1:2013
- EN 55014-1:2006/A1:2009/A2:2011
- EN 55014-2:1997/A1:2001/A2:2008
  - EN 61000-3-2:2014
  - EN 61000-3-3:2013
- EN 62133:2013 (POWER PACK 1800)

Konstruktive Änderungen, die Auswirkungen auf die  
in der Montageanleitung angegebenen technischen  
Daten und den bestimmungsgemäßen Gebrauch  
haben, das Produkt also wesentlich verändern,  
machen diese Konformitätserklärung ungültig!

This declaration of conformity is no longer valid if  
constructional changes are made which significantly  
change the drive system (i.e., which influence the  
technical specifications found in the instructions or  
the intended use)!



Kirchlengern, Germany 14 January 2020

Dr.-Ing. Josef G. Groß  
Geschäftsführer / Managing Director