

Attention! This is the abbreviated version of the manual. The original can be found at <https://www.babboe.de/kundenservice/lastenfahrrad-anleitungen>

BABBOE



Babboe Curve-E

Gebruikershandleiding • User Manual • Gebrauchsanleitung • Manuel d'utilisation

CYCLING WITH PEDAL ASSISTANCE

What is pedal assistance?

Your Babboe cargo bike is equipped with electric pedal assistance. This means that an electric motor enhances your efforts, thus increasing your performance while you deliver less power. If the pedals are not rotated the motor will not work. When pedal assistance is enabled, the acceleration is high so you have an easy start. From experience, cyclists say that pedal assistance is similar to cycling with tailwind.

Cycling with pedal assistance

With the powerful pedal assistance you will easily reach a higher speed than you are used to. We therefore recommend that you first try the Babboe cargo bike in a low traffic environment and without children in the cargo bike. This is the best and safest way to get used to riding your new cargo bike. Only turn on the pedal assistance once you feel confident about safely cycling on the Babboe cargo bike. We recommend that you pay attention and reduce speed to walking pace when turning corners. The pedal assistance will stop if you stop pedalling. Once you start pedalling again, the pedal assistance will automatically start again.



When the pedal assistance is on, cycling off with your Babboe cargo bike is very different to a non-electric (cargo) bike. It is easier than you might be used to. We recommend to use a low pedal assistance level when starting to cycle from stand. Also, if you are cycling slowly, we recommend using a low level; when you increase speed you can increase the level of pedal assistance. To avoid dangerous situations and to cycle more efficiently and economically use the highest levels only when needed. The pedal assistance is legally limited to a speed of 25 km/h. This means that when you reach the speed of 25 km/h, the pedal assistance will gradually decrease to zero.

If the pedal assistance is turned off, it is slightly more strenuous to cycle on this Babboe cargo bike in comparison to a non-electric cargo bike.

Important! Please note:

- Change the pedal assistance to the 0 level or switch the system off completely when you step off the Babboe cargo bike. Never walk with the pedal assistance activated because the Babboe cargo bike can suddenly shoot forward if you rotate the pedals by accident. If you wish to turn on the pedal assistance when walking, use the walk-assist function (see 'Display & Controls' on the next page)
- Always keep your fingers on the brake levers, so you can respond quickly if you have to brake. Stop pedalling when braking and try to brake with both hands simultaneously and evenly. Hold both brake levers tight when stationary with the pedal assistance in gear, for example by a traffic light.
- Switch the pedal assistance off when cycling on a bad or slippery road or when you want to cycle slowly.

Shifting Gears

Your Babboe cargo bike has 7 gears. When cycling you can shift gears from 1 to 7. Through the gripshifter (right on the handlebar) you can select the desired gear. Of course it is also possible to use your Babboe cargo bike without electric assistance. When the motor is off, you can simply use the 7 gears.

Important! Please note:

- Your bike features a Shimano derailleur system. Unlike a hub gear, you need to keep cycling (but without force on the pedals) when you shift gears. This means that you have to downshift well in time before stopping (for example, at traffic lights).
- Make sure you always start in first or second gear. You can not shift gears from standstill.
- Never pedal backwards! The chain can fall off and it can cause damage to the Babboe cargo bike.

DISPLAY & CONTROLS

To cycle with pedal assistance, place the battery in your Babboe cargo bike.

Informatie op display

The following displays the buttons on the LCD display of the ibo- C500 model. The display will turn on when the ON/OFF button is pressed.

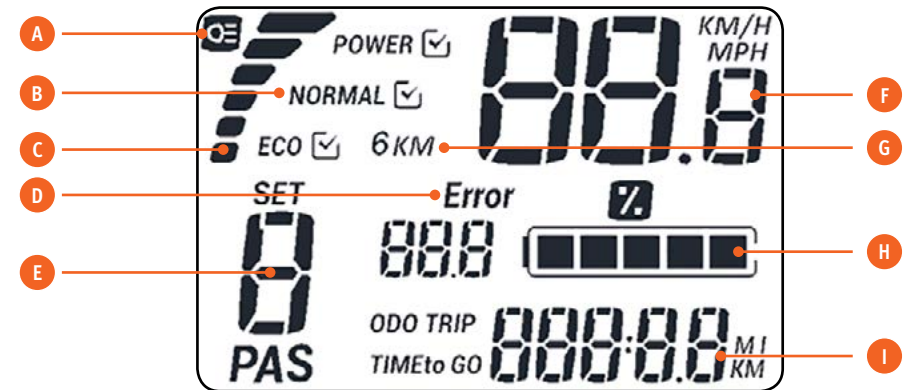


ON/OFF
System On / Off & Screen Lighting

SET
Options selection & Menu

UP
Increase Power Mode & Walk Assist

DOWN
Decrease Power Mode



| | |
|----------|------------------------------------------------------------------------------------------------------------------|
| A | LCD Backlight Indicator Turns on when the backlight of the LCD is on |
| B | Additional Mode Display Mode 0 - 2 = Eco Mode 3 - 5 = Normal Mode 6 - 8 = Power |
| C | Energy Consumption Meter More/Higher bars = Higher Consumption = Less Range |
| D | Error Indicator Lights up with Error Code if there's an error |
| E | Assistance Mode Level (0 - 8) Modes, 0 = No Assistance |
| F | Speed (KM/H or MPH) |
| G | Walk Assist Indicator Lights up when in walk-assist mode |
| H | Battery Capacity Indicator Shows the remaining capacity of the battery |
| I | Odometer/Trip Distance/Trip Time Shows the corresponding values of the odometer, trip distance, and trip time |

DISPLAY & CONTROLS

System On and Off

When the system is off, press the 'ON/OFF' button to turn on the system. To turn off the system, press the 'ON/OFF' button for 2 seconds to turn it off. This will only function if the display is connected to the controller and battery. If the display is turned off while riding the battery, it is possible that random values are displayed as the motor generates small powerstreams. If that happens, everything that is shown when the system is not activated can be ignored. The display and system will automatically shut down if the speed is 0 km/h and not used for 10 min.

Selecting Menus

Pressing the 'SET' button allows you to rotate between the following options: odometer (ODO), trip distance (TRIP), distance to go (TRIP TO GO), and time to go (TIME TO GO).

Odometer

Shows the total distance traveled by the bike since manufacturing.

Trip Distance

Resets whenever the system is turned on or when the user manually resets it via the settings menu. It shows the distance traveled for the current trip.

Distance To Go

The approximate distance the bike can go before running out of battery, based on the current battery capacity level and current motor assistance mode.

Time to Go

The approximate time remaining on the bike before running out of battery, based on the current battery capacity level and current motor assistance mode.

Adjusting Motor Assistance

The 'PLUS' and 'MINUS' buttons will allow the user to select the different motor assistance levels for the bike. This varies from 0 to 8, 8 being the strongest assistance. At level 0, the motor provides no power, but the display of the bike is still usable with all functions available. The battery will run out of power faster when using a higher level than a lower level. Levels 1-5 are appropriate for flat roads, while level 6-8 are much stronger and only meant for hills, slopes, and tough circumstances.

Controlling Walk Assist

Using walk assist of the bicycle helps the user more easily walk the bicycle. When the 'PLUS' button is held down, the '6KM' icon will appear on the display, and the bike will start moving at 6 km/hr. When the 'PLUS' button is released, the walk assist mode will

end and the motor will no longer provide the 6 km/hr speed. When using walk assist, keep your hands on the handlebars and the brake lever in case its needed.

Display Backlight

When the system is turned on, pressing the 'ON/OFF' button will toggle the backlight of the display to on or off.

Settings Menu

When the system is turned on, holding down the 'SET' button for over 3 seconds will enter the settings menu. Once inside, there are 2 options, SET 1 and SET 2. Pressing the 'SET' button will switch between them. To exit the settings menu, press and hold the 'SET' button for over 2 seconds.

Set 1: Reset Trip Distance

In the settings menu, option SET 1 is to reset the trip distance to 0, pressing the 'MINUS' button should result in resetting the trip distance to 0.

Set 2: Metric or Imperial Selection

in the settings menu, option SET 2 is to change the units between metric (KM/H) and imperial (MPH), pressing either the 'PLUS' or 'MINUS' buttons will alternate between the 2 settings. Once the desired units are selected, press 'SET' to save the setting.

“With the **electric** Babboe Curve,
always the wind behind you”

ERROR CODES

If the pedal assistance is not working properly, we recommend that you first check the various cable connections and verify that the battery is sufficiently charged. As with any electronic system, a malfunction is possible. If this is the case, please contact your Babboe dealer so that any repairs can be performed quickly.

The following table shows the error codes and their significance in the system. Potential causes and sources serve as a guideline to determining where the error may occur.

| ERROR CODE | DESCRIPTION | POTENTIAL CAUSES | POSSIBLE SOURCES |
|------------|-----------------------------|-------------------------------------------------------------------|---------------------|
| 1 | Current Detection Error | Internal short circuit, MOSFET failure, current detection failure | Controller |
| 2 | Battery Communication Error | I2C bus failure, poor battery connection | Battery, Controller |
| 3 | Battery Cell Voltage Error | Single cell voltage below 2.56V or above 5.12V | Battery, Controller |
| 4 | Temperature Error | Temperature of battery >50 or <-20C of controller > 80 or < -20C | Battery, Controller |
| 5 | Motor Stall | Motor malfunction causing stalling | Motor, Controller |
| 6 | Battery Calibration Error | Real voltage and read voltage difference larger than 0.1V | Controller |
| 9 | Communication Error | No communication between display and controller | Display, Controller |

“The **world** at your feet,
and your **kids** right in
front of you”

BATTERY & CHARGING

Range

The range is the total distance you can travel with your electric Babboe cargo bike on a single trip without recharging.

The average range of your electric Babboe cargo bike is typically > 40 km. However, the range is dependent on many factors that can significantly shorten the range. Many of these factors can be overcome to positively affect the range.

Influencing factors:

- The total weight (weight of the cargo bike + rider + load in the box)
- The resistance (wind, tire pressure*, speed, road conditions and differences in altitude)
- Your driving behaviour (shifting gears up and down in a timely manner and driving speed)
- The outdoor temperature
- Age of the battery (battery capacity decreases as the battery ages)

* Tires slowly deflate. Make sure you pump more air in the tires of your Babboe cargo bike every two weeks.

Important! Please note:

- To extend the range, the top speed of the assistance will slowly decrease as the battery drains.
- The performance of your battery will decrease at low temperatures. The range is optimal at a measured temperature of approximately +/-25 °C. The guideline is that the capacity decreases by 1% with a temperature drop of 1 °C.

Capacity of the battery

The battery of your Babboe cargo bike has a capacity of 11.4 Ah and a voltage of 32.85 volts. The battery provides 374 Wh.

Important! Please note:

- In order to reach the maximum capacity of the battery, it must be fully charged/discharged at least 10 times.
- Each year, the capacity may be reduced with up to 15%. The decrease is dependent on the usage and charging cycles. It may happen that Babboe cargo bikes purchased at the same time have different ranges. New batteries provide at least their minimum specified values, but there could be a slight variation. It is possible that one of the Babboe cargo bikes performs above the specifications.

Inserting and disconnecting the battery

Inserting and disconnecting the battery

The pedal assistance must always be switched off when inserting or disconnecting the battery. If you want to insert the battery in your Babboe cargo bike, slide the battery into the controller box (by the rear carrier). Then lock the battery using the battery key, which is located on the left side of the controller box. To lock the battery, insert the battery key into the lock and turn it counter clockwise.



To disconnect the battery, unlock the battery lock with the battery key clockwise. Then remove the battery from the controller box by pulling the handle at the bottom of the battery.

Tip

Remove the battery key from the battery lock after inserting or disconnecting the battery to ensure the key is less likely to be lost. For example, keep the battery key attached to your bike key. After locking the battery, keep both keys with you and you can never forget the battery key. Always keep spare keys on a separate key ring.

 **Important! Please note:**

- Batteries slowly empty, even if the bike is not used. Therefore remove the battery from your Babboe cargo bike and keep it at home when the cargo bike is not in use.
- Storing and charging the battery should always be done in a (fire) safe place.
- Do not expose the battery to high temperatures (> 50 °C), such as heating and fire.
- Do not take the battery apart. Consult the service department at Babboe if you have a problem. Place the battery in a shady, cool and dry place for long-term storage.

Charging the battery

To charge your battery you will need the following items:

1. Adapter and cord (for the power socket)
2. COP1 adapter (connected to the battery while charging)

COP1-adapter

If you wish to charge the battery at home, you'll need to use the COP1 adapter (Cell Optimiser). Connect the COP1 adapter to the separate battery. The adapter not only indicates whether your battery has been fully charged, but also optimises the battery cells. When this process has begun a yellow LED light will start flashing. When the battery is fully optimised the LED light will stop flashing. You can simply interrupt the process if necessary. The optimisation will then continue the next time.

If you have connected the battery to the power supply, you can check the progress of the charging process on the charging component. If the battery is installed in your bicycle, you can check the capacity on the handlebar display.

 **Important! Please note:**

- Charging the battery should always be done in a safe place and not near anything flammable.
- Never connect the positive terminal of the battery to the negative terminal.
- Make sure the battery is fully charged at least once every 3 months (but do not charge longer than 48 hours). When the battery is not used for a long time it could become irreparably damaged.
- Charge the battery immediately when the battery is completely empty. Cells that are empty for a long time may be damaged irreparably.
- Only use the charger supplied and use the battery/charger only for your Babboe cargo bike.
- Do not insert objects into the charger. Also make sure the charger, the battery and electronics are not exposed to too much heat, water or other liquids.
- Use your charger only in a dry and well-ventilated place.
- The charger is not resistant to moisture and/or should not be dropped.

“Easy, fast, safe
and **Cosy**”



USER TIPS

Cycling

Cycling on a three-wheel cargo bike takes some getting used to, since the steering motion is different from a regular bike. The handlebar is fixed to the box and you actually steer from left to right and vice versa with the box. Always remain quietly seated in an upright position, even when turning corners. In very sharp turns you can let go of the outside handlebar to prevent hanging to one side. Keep this hand in the vicinity of the brakes, so you can brake immediately if necessary. For more information please refer to our website.

Parking brake

The electric Babboe cargo bike features a parking brake. The parking brake holds the Babboe cargo bike at standstill and prevents it from rolling away. The parking brake is located in the left brake lever. Pull the brake lever to operate the Babboe cargo bike parking brake. Then press the metal button/lever and release the brake lever again. The handle is now locked and Babboe cargo bike is in the parking brake position.

Adjustable handlebar

It is possible to adjust the height and the angle of the handlebar. Loosen the handlebar stem and place the handlebar in the desired position. Be careful not to pull the handlebar out too far. Pay attention to the marked indent on the handlebar stem that determines the maximum allowable position. When the handlebar is in the correct position, tighten the handlebar stem.

Tire and spoke tension

In order to continue cycling in a light and comfortable way, the tire pressure should remain the same. This means a pressure of 3.5-4 bar. The harder the tires, the more comfortable and lighter it is to cycle. Check the tension of the spokes regularly. When they are 'loose', get them tightened at an approved bicycle shop or at your Babboe dealer.

Lighting

The electric Babboe Curve is equipped with lights both on the front and the rear. The lights are battery powered and can be easily switched on.

Accessories

There are several fun and functional accessories available for the electric Babboe Curve. For example, to keep your children safe we have the Maxi-Cosi carrier, baby seat, toddler chair and various cushion sets. For convenience we have the rain tent, sunroof and several cargo bike covers. To make it more cheerful, we also have specially designed stickers. Babboe is continuously looking to expand its range with new and exciting accessories, so make sure you check the new range in the shop regularly.