Use and maintenance manual

ETR3
Safety precautions

• Please follow the instructions provided in this manual for your bike safety.
• Check the battery and battery charger regularly, especially the cable, the plug and the battery casing. If battery or charger are damaged, they do not have to be used until they are repaired.
• Please follow the safety precautions provided in this manual when using an e-bike. This bike is not suitable for use by children, people with reduced physical, mental or sensory abilities or without the necessary experience and knowledge unless they are supervised or have received the right instructions for the use of the bike from a person responsible for their safety.
• In case of any problem or error, consult the nearest dealer.
• Do not modify the electrical system. This could be illegal, cause malfunctions and cause the warranty decay.
• The product has been designed to be water resistant so it can be used even when it rains. In any case it cannot be deliberately immersed in water.
• Do not clean the e-bike with the hydro cleaner. If water enters some components, problems may arise.
• When carrying the bike on a high-speed vehicle exposed to rain, remove the battery and store it in a safe place away from rain.
• Handle the bike with care and avoid any kind of strong impact.
• Use a well-wrung wet cloth to clean the battery casing.
• For any questions regarding the maintenance and use of the product, please contact the dealer where you purchased the bike.
• We advise you to use your e-bike for the first time on a safe ground.

Quick start

In this section, you will find important information and instructions to know your e-bike as soon as possible.
• Read all safety precautions.
• Completely charge the battery
• If not assembled, assemble the battery
• Lock the battery with the use of the key.
• Press the “start” button on the remote control on the handlebars: the system will switch on.
• Select the assistance level through the control unit.

The bike is now ready to be used.
Specifications

- Rated voltage: 24V/36V/48V
- Rated working current: 10mA
- Max. working current: 30mA
- Off leakage current: <1μA
- The supply controller working current: 50mA
- Operating temperature: -20°C~ 60°C
- Storage temperature: -30°C~ 70°C

Appearance and Size

Display appearance and dimension figure (unit: mm)

Function Summary

The display can provide a lot of functions to fit the users’ needs. The indicating contents are as follows:

- Smart battery indicator
- Assistance-level indication
- Speed indication (incl. running speed, max. speed and average speed)
- Odometer and trip distance
- The push-assistance function
- Trip time indication
- Backlight On/Off
- Error code indication
- Motor-output indicator
General Operation

Switching the E-bike System On/Off

Briefly press the power button to switch on the E-bike system, to hold the power button for 2s, the E-bike system will be switched off. When switching off the E-bike system the leakage current is less than 1 uA. When parking the E-bike for more than 10 minutes, the E-bike system switches off automatically.

Display Interface

After switching on the E-bike system, the display will show Speed and Total Distance. Pressing the “i” button will show more riding data as belows:
Running Speed (Km/h) → Ave. Speed (Km/h) → Max. Speed (Km/h) → Trip Distance (Km) → Total Distance (Km) → Trip Time (Min.).
Switching Push-assistance Mode On/Off
To activate the push-assistance function, hold the “-” button always. The E-bike’s drive is activated at a uniform speed of 6 Km/h. The push-assistance function is switched off as soon as you release the “-” button on the operating unit.

Push-assistance Mode.

Push-assistance function may only be used when pushing the E-bike. Danger of injury when the wheels of the E-bike do not have ground contact while using the push-assistance function.

Switching the Lighting On/Off
To switch on the lighting (headlights, taillights and display backlight), briefly press the “ ” button.

Switching the Lighting Mode On/Off Interface.

Selezione del livello d Assistance Level Selection
The level of assistance of the E-bike drive when pedaling can be adjusted via the display. The assistance level can be changed anytime, even during riding. The default assistance level ranges from level “0” to level “5”. The output power is zero on Level “0”. Level “1” is the minimum power. Level “5” is the maximum power. To increase the assistance level, press the “+” button until the desired assistance level is displayed; to decrease the assistance level, press the “-” button.
The default value is level 1.

Assistance Level “5”.

**Battery Indicator**

The five battery bars represent the capacity of the battery. Each bar of the battery pack symbol is equivalent to a capacity of approx. 20%. When the battery is in low voltage, battery frame will flash to notice that the battery needs to be recharged immediately. When there is only one bar, it has a maximum range of 5-10 km.

![Battery Indicator](image)

**Motor Power Indicator**

The power of the motor can be read via the interface.

![Motor Power Indication](image)
Error Code Indication
The components of the E-bike system are continuously and automatically monitored. When an error is detected, the respective error code is indicated in text indication area.

When an error code appears, contact a dealer to solve the problem.

General Settings
To access general settings menu, hold both the “+” button and the “-” button for 2s. All the Settings are operated in the case of parking the E-bike.

Trip Distance Clearance
TC represents trip distance clearance setting. To clear trip distance, press the “+” button or the “-” button until the Y is displayed. To store a changed setting, press the “i” button and then access backlight contrast settings.
Backlight Contrast Settings.

bL represents backlight contrast settings. Level “1” is the low brightness, Level “2” is the middle brightness, Level “3” is high brightness. The default level is “1”.

To modify the backlight brightness, press the “+” button or the “-” button to choose the desired setting item.

To store a changed setting, press the “i” button and then access the unit Conversion Settings.

Unit km/mi Conversion

U represents unit settings, “1” is mile and “2” is kilometer. The default value is “2”.

To convert unit, press the “+” button or the “-” button to choose the desired setting item, and then press the “i” button to confirm.

To store a changed setting, press the “i” button and then access trip distance clearance settings.

To store a changed setting, hold the “i” button for 2s and then exit general settings.

If no operations are performed for one minute, the settings state will automatically exit.
Recover Default Settings

dEF represents recover default settings. The default value is N. To access recover default settings, hold both the “+” and the “−” button for 2s. Press the “+” or the “−” button to choose Y or N again. N means that do not recover default settings. Y means that recovers default settings. When it is Y, hold the “−” button for 2s to recover default settings; The display shows DEF-00 at the same time, and then return to general display state.

![Recover Default Settings Interface](image)

DISPLAY 2

**Indicatore batteria**

**Walk assistance**

**Lista funzioni**

**Indicazioni di testo**

**Unità di misura distanza**

**Unità di misura velocità**

**Livello di assistenza**

**Indicatore luci**

General Operation

**Switching the E-bike System On/Off**

Briefly press the M button to switch on the E-bike system, to hold the power button for 2s, the E-bike system will be switched off. When switching off the E-bike system the leakage current is less than 1 uA. When parking the E-bike for more than 10 minutes, the E-bike system switches off automatically.
Display Interface
After switching on the E-bike system, the display will show Speed and Total Distance. Pressing the “M” button will show more riding data as belows:
Running Speed (Km/h) → Ave. Speed (Km/h) → Max. Speed (Km/h)

Hold "M" and "-" buttons for 2 seconds to change the displayed information.
Trip Distance (Km) → Total Distance (Km) → Trip Time (Min.)

Switching Push-assistance Mode On/Off
To activate the push-assistance function, hold the "-" button always. The E-bike’s drive is activated at a uniform speed of 6 Km/h. The push-assistance function is switched off as soon as you release the "-" button on the operating unit.

Push-assistance function may only be used when pushing the E-bike. Danger of injury when the wheels of the E-bike do not have ground contact while use the pushassistance function.

Backlight regulation
To regulate the backlight of the display hold the "+" button for 2 seconds.
**Assistance Level Selection**

The level of assistance of the E-bike drive when pedaling can be adjusted via the display. The assistance level can be changed anytime, even during riding. The default assistance level ranges from level “0” to level “5”. The output power is zero on Level “0”. Level “1” is the minimum power. Level “5” is the maximum power. To increase the assistance level, press the “+” button until the desired assistance level is displayed; to decrease the assistance level, press the “-” button. The default value is level 1.

![Assistance Level Selection](image)

**Battery Indicator**

The five battery bars represent the capacity of the battery. Each bar of the battery pack symbol is equivalent to a capacity of approx. 20%. When the battery is in low voltage, battery frame will flash to notice that the battery needs to be recharged immediately. When there is only one bar, it has a maximum range of 5-10 km.

![Battery Indicator](image)

**Error Code Indication**

The components of the E-bike system are continuously and automatically monitored. When an error is detected, the respective error code is indicated in text indication area. When an error code appears, contact a dealer to solve the problem.

![Error Code Indication](image)

**General Settings**

To access general settings menu, hold both the “+” button and the “-” button for 2s. Do not change the general settings while using the e-bike.
**Trip Distance Clearance**
TC represents trip distance clearance setting.
To clear trip distance, press the “+” button or the “-” button until the Y is displayed.
To store a changed setting, press the “M” button and then access backlight contrast settings.

![Sample Image](image1)

**Backlight Contrast Settings**
bL represents backlight contrast settings. Level “1” is the low brightness, Level “2” is the middle brightness, Level “3” is high brightness. The default level is “1”.
To modify the backlight brightness, press the “+” button or the “-” button to choose the desired setting item.
To store a changed setting, press the “M” button and then access the unit Conversion Settings.

![Sample Image](image2)

To store a changed setting, hold down the "M" button for 2 sec and exit the general settings menu. If no operations are performed for one minute, it will automatically exit settings status.

**Battery**

![Sample Image](image3)

504 Wh Integrated battery. 504 Wh Integrated battery. 630 Wh Integrated battery.

**Instructions for user**
Please read the battery instructions carefully.
• Do not open, disassemble or puncture the battery under any circumstances, it could cause serious damages.
• In the event of a fall, impact or similar events, do not continue to use the battery and bring it to a dealer to check it as soon as possible.
• Use only the special charger provided with the battery.
• Disposal of used batteries must follow local disposal regulations.

Please read carefully the following before use.
• The battery is not supplied fully charged.
• Fully recharge the battery before using it for the first time and before storing it.
• After the first three charging cycles, fully charge the battery. This will give maximum capacity to your battery. If the battery is continuously and completely discharged during use and never fully charged, this will reduce its life.
• Never leave the battery completely empty and recharge it even after a short period of use
• Do not destroy or disassemble the battery.
• Do not store the battery in a humid place to avoid damage.
• When removing the battery, be sure to follow the rules.
• Do not immerse in water and do not throw it on fire.
• Do not drop the battery.
• When storing the battery for a long time, make sure it is charged for at least half of its capacity, and charge it again at least every two months.
• Do not wrap it with any driver material to prevent it from any damage due to direct contact between metal and battery.
• Store the battery in a dry place.
• The battery should always be kept away from children. Do not allow children to remove the battery or play with it.
• If the battery seems to be in a strange condition, it seems dirty or has a strange smell, do not use it.

**Warnings**

• The battery should not be left in direct sunlight to avoid overheating and to avoid the decrease of its performance and duration.
• Do not touch a battery that leaks liquid. The liquid can cause problem to the skin. If it meets the eyes do not rub but rinse immediately with clean water and go to the hospital.
• Do not put in microwave or other kitchen ovens
• Keep the battery away from the mobile phones or from the charger if it is hot to the touch, if it leaks liquids or has a strange smell. Dispose of it. Defective batteries can cause overheating, they can catch fire.
• If the battery is completely discharged, charge it as soon as possible. Leaving the battery empty for long periods could damage its capacity.
Specifications

<table>
<thead>
<tr>
<th>Specifications</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Power</td>
<td>468/504/630 Wh</td>
</tr>
<tr>
<td>Charge time</td>
<td>4,5 h</td>
</tr>
<tr>
<td>Temperature during the charge</td>
<td>0°~45°C</td>
</tr>
<tr>
<td>Temperature during the discharge</td>
<td>-20°~60°C</td>
</tr>
<tr>
<td>Range</td>
<td>Min. 60 Km</td>
</tr>
<tr>
<td>Position</td>
<td>intégrée dans le cadre</td>
</tr>
</tbody>
</table>

Battery charger

The charger is specifically designed to charge lithium-ion batteries. It is equipped with an integrated fuse and overload protection. Keep the battery charger away from children and animals to prevent them damaging the cable while playing and to avoid malfunctions.

General warnings

• Children or persons with limited physical and mental abilities, except under the strict control of an adult, should not use the charger.
• Make sure the charger is clean to avoid the risk of electric shock.
• Do not use the charger in places that are humid or full of dust.
• Avoid direct exposure to sunlight.
• Unplug the charger from the power outlet when it is not in use.
• Use only the charger that is supplied with the electric bike.
• Do not cover the charger while it is in use.
• When cleaning the charger, unplug it from the power outlet.
• When the charging time exceeds what indicated on the specifications table, stop charging.
• After charging, disconnect the battery from the charger and the charger from the power outlet

**Operation: Battery Installation**

For a correct installation of the battery, it must be inserted in the appropriate position and locked. Without the contact with the battery the e-bike system does not work. To insert and remove the battery, the safety lock must be unlocked. You can lock and unlock the battery using the supplied key.

Proceed as follows to install the battery:

1. Unlock the battery safety lock
2. Place the battery in its housing inside the frame, first with the bottom and then rotate the upper part sideways towards the frame to insert it.
3. Turn the key to lock the battery.
4. Remove the key to avoid losing or breaking it.

**Operation: Removing the battery**

To remove the battery proceed as follows:

1. Turn off the electrical system.
2. Unlock the battery with the use of the key.
3. Remove the battery from the holder using the appropriate groove and pulling it sideways.
LED state of charge
Check the battery charge level by pressing the battery on / off button. The charge level is indicated by leds, which are illuminated differently depending on the charge level.

Charge the battery
You can charge the battery either when it is assembled on the bike or when it is not assembled.

Lithium-ion batteries are not subject to memory so you can recharge the battery at any time even after a short journey. Charge the battery at a temperature between 0 °c and 45 °c (ideal temperature around 20 °c).

Read the charger instructions (inside the box) before charging the battery.
Proceed as indicated:
1. Insert the charger cable plug into the battery socket and then the charging socket into the electrical socket.
2. As soon as the cable is plugged into the electrical socket, a red LED lights up.
3. When the charge is complete, the LED will be green.

Charging time depends on various factors. It can vary depending on temperature, age and use and battery capacity. If necessary, you can find information on charging times in the battery technical data. When the battery is fully charged, the charging process stops automatically. Remove the socket from the battery and the electrical outlet.
Use the own battery charger of the battery.
Be sure to use the correct main voltage. The correct main voltage required is indicated on the charge. It must respect the voltage of the current source. The 230V chargers can also operate at 220V.

Warnings
• Do not touch the socket with wet hands to avoid shock.
• Before using the charger, the cable and the socket, check that they are intact. If there are any damage, do not use the charge to avoid electric shocks.
• Charge the battery in well-ventilated areas.
• Do not cover the battery and charger during charging.
• Charge only on dry and non-flammable surfaces.

IMPORTANT:
The battery must be fully charged at least every 2 months to avoid damage or destruction of the cells.
If the charging time exceeds the usual charging time (see table), the battery may be damaged. In this case, stop charging immediately and bring both the battery and the charger to a dealer for a check.
Store the battery

If you do not use your e-bike for a long period, remove the battery, charge it (60-80%) and store it in a dry place.

Warnings

• Check the charge level every 2 months and recharge if necessary.
• Store the battery in a place between -10 ° C and 35 ° C. Be aware that temperatures around 45 ° C can be easily reached near the radiators and inside the vehicles left in the sun.
• Avoid storing the battery in direct sunlight.
• To prevent the complete discharging, the battery will go into “sleep” mode after a certain period.
• Do not expose the battery to temperatures lower than those allowed -10 ° c.
• If you notice that the battery becomes hot during use, during charging or during storage or if it gives off a strong odor, changes its appearance or any other anomaly, do not continue to use the battery but take it to a dealer for inspection before using it again.

Battery wear

The battery has a life of about 700-800 recharge cycles. As battery usage increases, battery capacity slowly decreases. This also reduces the travel range of your e-bike and does not constitute a defect. If the distance is still sufficient according to your needs, you can continue to use the battery.

Battery life depends on various factors:
• Number of recharges (about 700/800 charge cycles).
• The age of the battery
• Storage and use conditions.

Obviously, the battery deteriorates and loses capacity even if it is not used. The life of your battery may be affected by the following precautions:
• Charge the battery after each run even if it is a short journey. Lithium ion batteries are not subject to memory effects.
• Avoid riding for long distances with high gears on high slopes with assistance at the maximum level.
Disposal

If you replace parts of your e-bike, please take note of the local waste disposal regulations. Used batteries and accumulators do not have to be disposed with normal household waste.

Every consumer is required by law to dispose of used batteries at specific collection points at a recycling center, a battery trading company, a specialist retailer or manufacturer.

Batteries containing dangerous substances are marked with a symbol consisting of a waste bin and the chemical symbol (Cd, Hg or Pb) of heavy materials, which are responsible for their classification as pollutant.

For more information, please contact your local waste disposal service or your municipal administration.

Exhausted batteries, accumulators with LEDs, NiMH (nickel metal hydride) or lithium ion technology are to be considered dangerous goods.

Lithium-ion batteries must be insulated in each pole with insulating tape to prevent short circuits and potential dangerous reactions.

During the transport or the transfer of the exhausted batteries to the waste disposal facilities, the ADR regulations (regulation for the transport of dangerous goods) have to be applied.

In compliance with the European Directive 2006/66 / EC, defective or used batteries must not be used, and according to the European directives 2002/96 / EC, electrical equipment that can no longer be used must be collected separately and recycled in an environmentally friendly way respecting the environment.

The drive unit, the battery, the display, the control element, the accessories and the packaging must be recycled in an environmentally friendly manner.

Do not dispose electronic drive components with household waste.

Notes: