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01 INTRODUCTION

This user manual contains important information for proper use and maintenance of the bicycle. In particular, this document contains specific information about the **iGRAVELX (EC296 / EC286 / EC276 / EC246 / EC226)**. Please read the entire manual carefully. The user manuals of all BH models can be consulted on the website at the following address:

<https://www.bhbikes.com/manuals>

Keep in mind that the manuals on the BH BIKES website are updated on a regular basis. Make sure you have downloaded the latest version from the website. You can check the version on the front page.

This document contains additional information to the general user manual, available at:

https://www.bhbikes.com/es_INT/quienes-somos/manuales-descargas

You can check the characteristics, recommendations and warranties of third-party parts on their corresponding official websites.

SYMBOLS

This document contains different icons that refer to use, maintenance and assembly warnings. Carefully read the meaning of each one to prevent improper handling or hazardous situations that may result in serious personal injuries or fatal accidents.

SAFETY



DANGER: refers to a hazardous situation that, if not avoided, will lead to serious injuries or even a fatal accident.



WARNING: refers to a hazardous situation that, if not avoided, could lead to serious injuries or even a fatal accident.



ATTENTION: refers to a hazardous situation that, if not avoided, could cause minor or moderate injuries.



RISK OF ELECTRIC SHOCK: refers to a hazardous situation that, if not avoided, could cause serious injuries due to electric shock or even death.



RISK OF SHORT CIRCUIT: refers to a hazardous situation that, if not avoided, could cause short circuits in the electrical components. Short circuits may cause damage to the electrical components and fire.

TOOLS



FLAT WRENCH



ALLEN KEY



TORX KEY



PHILLIPS SCREWDRIVER



TIGHTENING TORQUES: on one side of each tool symbol, the tightening torque will be indicated in newton metre.

TYPE OF ASSEMBLY COMPOUND



OIL: light lubrication for elements such as chains and cables.



GREASE: assembly grease.



CARBON PASTE: assembly paste used to increase the friction of the carbon elements.



ADHESIVE: use medium strength thread lock.



Adhesive is used to fasten bolts and make sure that they do not come loose due to vibrations when using the bicycle. Add a drop of thread lock to the tip of the screw thread in all cases. Never apply more than one drop around the thread, since this will make it very hard to remove the bolt.



02 BH WARRANTY

BH BIKES undertakes to offer long-lasting bicycles, in compliance with the highest standards of quality. Therefore, in addition to the statutory warranty, BH BIKES offers an additional coverage and warranty. This section defines the different types of warranty and the process that must be followed to register for the additional "LifeTime Frame" warranty.

STATUTORY WARRANTY

The statutory warranty covers the original purchaser in the event of manufacturing defects and/or non-conformities. This warranty applies to frames and components manufactured by BH BIKES. The warranty period will be established according to the current laws of the country where the bicycle was purchased, and will start on the date of purchase. During this period, the holder of the warranty will be entitled to have all manufacturing defects repaired or replaced free of charge, including the reimbursement of transport expenses and any losses caused as a result of this. Different conditions must be met in order to be covered by the warranty:

- This warranty does not affect the consumer's applicable rights, according to the current laws in each country.
- Faulty bicycles or parts will be covered by warranty upon the decision of our Technical Service.
- The warranty does not include the replacement of parts prone to wear and arising from normal use of the bicycle.
- The warranty does not cover defects or broken parts due to improper use of the bicycle, use for competitions, mounting of non-original accessories or improper handling and incorrect maintenance work.
- The warranty does not apply if the inspection before delivery and the corresponding inspection intervals included in this document have not been carried out, observed, documented as required and stamped by an authorised BH dealer.
- Should the repair not be satisfactory and not ensure that the optimum conditions are met according to the intended use, the holder of the warranty will be entitled to request the replacement of the purchased item or faulty part with one of identical characteristics, or to receive a refund of the amount paid for the damaged item or part.
- The warranty period will be interrupted during the repairs or, in the event of replaced items or components, it will be renewed.
- Any claim against this warranty shall expire six months after the end of the warranty validity period.
- All warranty claims must be processed by an authorised dealer.
- Geographical scope: refer to the User Manual or [www. BHbikes.com](http://www.BHbikes.com)

Visit the following link to read the terms and conditions:

https://www.bhbikes.com/es_INT/registro-garantia-vida-bh/registra-tu-bici-garantia-de-por-vida

LIFETIME FRAME WARRANTY

Through its authorised stores, BH Bikes provides the original buyer with a commercial policy to cover any manufacturing defects in frames for a period beyond that specified in the product's statutory warranty, pursuant to the following clauses:

1. **The LIFETIME warranty solely applies to BH frames and bikes that are sold through stores that are authorised by BHBIKES EUROPE S.L.**
 - The buyer must register the LIFETIME warranty online, with the information duly completed, within 30 calendar days of the purchase date, as it appears on the invoice issued by the authorised store.
 - This warranty cannot be transferred to subsequent buyers and it is cancelled when the bicycle is sold to a third party. Original buyer means the individual who registers the warranty at the time of the purchase; the commercial warranty cannot be transferred to third parties who are not the original buyer.
 - It shall be compulsory to have the bicycle serviced in an establishment that is authorised by BHBIKES EUROPE and according to the instructions in the user manual.
2. **The LIFETIME warranty does not cover:**
 - The rear swingarms of the double suspension models, fork, kids' bikes, defects and/or fading of the original paint, or rust caused by natural deterioration.
 - Defects or breakages resulting from an accident or improper and/or negligent use of the bicycle.
 - When components or accessories that are not intended for or are not compatible with the use for which the bicycle was designed have been installed.
 - Defects resulting from improper handling.
 - Scratches, discolouration, or stains caused by the use of abrasive fluids, sharp items, clamps and/or prolonged exposure to sunlight or other weather conditions.
 - Defects caused by the bicycle's normal wear and tear, including those due to material fatigue. Fatigue damage is a sign that the frame has been damaged by normal use, so it is the user's responsibility to regularly inspect the bicycle.
 - Improper use and/or maintenance of the product (carefully read the recommendations for use and cleaning).
 - Frames that have been used in competitions, demos or as rentals.

Read the full terms and conditions at:

https://www.bhbikes.com/es_INT/registro-garantia-vida-bh/registra-tu-bici-garantia-de-por-vida

EXTENDED WARRANTY OF UP TO 5 YEARS ON BH MOTORS

Activating the LIFETIME FRAME extended warranty will automatically activate a 5-year extended warranty for all BH motors. Through its authorised stores, BH Bikes provides the original buyer with a commercial policy to cover any manufacturing defects in BH motors for a period beyond that specified in the product's statutory warranty, pursuant to the following clauses:

- The BH motor extended warranty solely applies to BH motors installed in BH bikes and sold through stores that are authorised by BHBIKES EUROPE S.L.**
 - The buyer must register the warranty online, with the information duly completed, within 30 calendar days of the purchase date, as it appears on the invoice issued by the authorised store, on which the bike's serial no. must be specified.
 - This warranty cannot be transferred to subsequent buyers and it is cancelled when the bicycle is sold to a third party. Original buyer means the individual who registers the warranty at the time of the purchase; the commercial warranty cannot be transferred to third parties who are not the original buyer.
 - It shall be compulsory to have the bicycle serviced in an establishment that is authorised by BHBIKES and according to the instructions in the user manual.
- The BH motor extended warranty shall not ever cover:**
 - Fading paintwork and a loss of original colour, or corrosion caused by normal wear and tear.
 - Defects or breakages resulting from an accident or improper and/or negligent use of the bicycle.
 - When components or accessories have been installed that are not intended for/compatible with the use for which the bicycle was designed, and when the motor has been tampered with and/or de-limited.
 - Defects resulting from improper handling.
 - Scratches, discolouration, or stains caused by the use of abrasive fluids, sharp items, clamps and/or prolonged exposure to sunlight or other weather conditions.
 - Improper use and/or maintenance of the product (carefully read the recommendations for use and cleaning).
 - Motors that have been used in competitions, demos or in rentals.
 - Motors mounted on bicycles of the MONTY range.

Read the full terms and conditions at:

https://www.bhbikes.com/es_INT/registro-garantia-vida-bh/registra-tu-bici-garantia-de-por-vida

EXTENDED WARRANTY FOR BH BATTERIES

In a constant effort to improve our customer services on a daily basis, BH offers the best warranty conditions and the possibility of acquiring an extended warranty for its e-Bike range (an additional one or two years). Through its authorised stores, BH Bikes provides the original buyer with a commercial policy to cover any manufacturing defects in BH batteries for a period beyond that specified in the product's statutory warranty, pursuant to the following clauses:

- The BH battery extended warranty solely applies to BH batteries installed in BH bikes and sold through stores that are authorised by BHBIKES EUROPE S.L:**
 - The buyer must register the warranty online, with the information duly completed, within 30 calendar days of the purchase date, as it appears on the invoice issued by the authorised store, on which the bike's serial no. must be specified.
 - This warranty cannot be transferred to subsequent buyers and it is cancelled when the bicycle is sold to a third party. Original buyer means the individual who registers the warranty at the time of the purchase; the commercial warranty cannot be transferred to third parties who are not the original buyer.
 - It shall be compulsory to have the bicycle serviced in an establishment that is authorised by BHBIKES and according to the instructions in the user manual.
- The BH battery extended warranty shall not ever cover:**
 - Fading paintwork and a loss of original colour, or corrosion caused by normal wear and tear.
 - Defects or breakages resulting from an accident or improper and/or negligent use of the bicycle.
 - Deterioration or natural degradation due to age, even without use. Deterioration after 500 full charging and discharging cycles if it is below 30% of the nominal capacity (read the recommendations in the user manual carefully).
 - When components or accessories have been installed that are not intended for/compatible with the use for which the bicycle was designed.
 - Defects resulting from improper handling.
 - Scratches, discolouration, or stains caused by the use of abrasive fluids, sharp items, clamps and/or prolonged exposure to sunlight or other weather conditions.
 - Improper use and/or maintenance of the product (carefully read the recommendations for use and cleaning).
 - Batteries that have been used in competitions, demos or in rentals.
 - Auxiliary batteries (extenders).

Read the full terms and conditions at:

https://www.bhbikes.com/es_INT/registro-garantia-vida-bh/extension-garantia-bateria

REGISTERING EXTENDED WARRANTIES

You must register the bicycle within 30 days after purchase to enjoy the BH BIKES additional warranties. The process to activate the extended warranties is described below:

- **LIFETIME FRAME WARRANTY + 5 YEARS WARRANTY ON BH ENGINES**

You must register the bicycle on the BH BIKES website to enjoy the LIFETIME FRAME extended warranty:

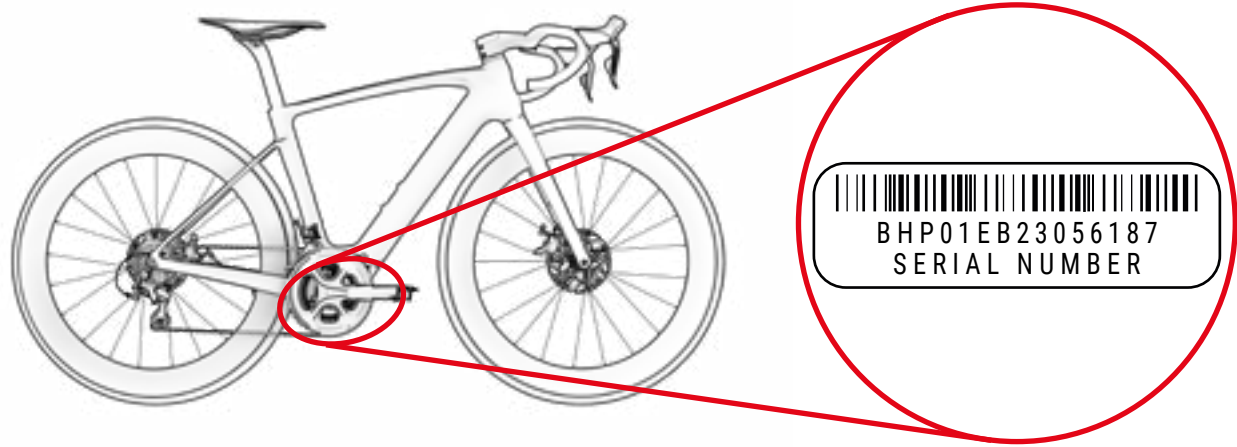
https://www.bhbikes.com/es_INT/registro-garantia-vida-bh/registra-tu-bici-garantia-de-por-vida

Watch this video to find out what you need to do:

<https://youtu.be/47aLVgUI248>



⚠ The serial number required to register the bicycle is located on the bottom of the bicycle, on the seat tube, above the bottom bracket:



SUBMITTING A WARRANTY CLAIM

All warranty claims must be channelled through an official BH dealer. The dealer will analyse the claim to identify its scope and perform a preliminary assessment of the incident. The dealer will submit and process the claim directly with BH. Once BH has defined the corrective measures required, the dealer will send this information to the customer.

All claims must be processed by the official dealer from which you purchased your bicycle. If this is not possible, please contact us directly. We will help you find an authorised dealer near you:

https://www.bhbikes.com/es_INT/quienes-somos/contacto

03 MAINTENANCE

This user manual contains important information for **iGRAVELX (EC296 / EC286 / EC276 / EC246 / EC226)**. Please read the entire manual carefully. The user manuals of all BH models can be consulted on the website at the following address:

<https://www.bhbikes.com/manuals>

This document contains additional information to the general user manual, available at:

<https://www.bhbikes.com/manuals>

You can check the characteristics and recommendations of third-party parts on their corresponding official websites.

INSPECT THE BICYCLE BEFORE USE

Bicycles are inspected several times throughout the manufacturing process and then at the BH workshop during the final check. As the bicycle's operation may be affected during transport or third parties may have modified the bicycle before its sale, the following must be checked before each trip:

- **FRAME:** no cracks, damage or strange noises.
- **CHAIN:** it must be lubricated and the transmission system must not make any strange noises.
- **BRAKES:** the brakes must be working properly. When stopped, press the brake lever with enough strength and check that it does not touch the handlebars.
- **TYRES:** the pressure must be correct and there must be no cuts on the tread or on the sides. Also check that the wear level does not exceed the maximum recommended level.
- **WHEELS:** the wheels must rotate freely in order to check how they rotate. Also check the space between the brake lining and the rim, as well as the space between the frame and tyre.
- **STEERING:** the steering must turn smoothly and with no strange noises.
- **SWINGARM ROTATION POINTS:** when weight is exerted on the bicycle, the suspension must work as expected and with no strange noises. If it is not working properly or there is play between the moving parts, this might mean that the tightening torques are incorrect or that the bearings are worn.
- **BEARINGS:** the bearings must work properly and with no strange noises. The bearings are subject to wear and must be replaced to prevent damage to the components on which they are installed.
- **ELECTRICAL SYSTEM:** if the bicycle features an electrical system, check that it is functioning properly by ensuring that the electrical assistance mode is running and that all parts are functioning properly (motor, display, change of assistance mode and speed sensor). If there is no electrical assistance, check that all connections are correct and show no signs of damage.

- 

Do not ride your bicycle if it does not meet any of these points! A faulty bicycle may cause serious accidents! If you are unsure or have any queries, please contact your nearest BH workshop!
- 

Check the tightening torques to make sure that they are as described in the recommendations in the user manuals. Failure to observe these recommendations may result in accidents and even death.
- 

The effect of the ground and the forces exerted on the wheel subject the bicycle to a lot of stress. The different parts will be subject to fatigue and wear because of these dynamic loads. Check the bicycle at regular intervals to look for signs of wear, scratches, bent parts, wear on the finish or the formation of cracks. Parts may fail suddenly after their service life has expired. Take your bicycle to an authorised BH workshop regularly to have these parts replaced if needed.

KEEP THE BICYCLE CLEAN

We recommend you follow these basic prevention measures to make sure that the bicycle is in perfect working order. Failure to observe these recommendations may lead to premature wear or even breakages in specific areas, such as gaskets or moving parts.

- Clean the dust and mud with a damp sponge and a gentle and neutral cleaning product.
- Plastic parts must only be washed with soapy water.
- Tyres can be washed with a sponge or brush and soapy water.
- After cleaning the bicycle, dry it by rubbing it firmly with a smooth cloth.
- After each cleaning, lubricate the transmission elements.

- 

Dirt may cause damage that can result in accidents or even death.
- 

Never use pressure washers or steam cleaners.

KEEP THE TRANSMISSION LUBRICATED AT ALL TIMES

After washing the bicycle, the chain transmission's lubrication may have also been washed off. Inspect and lubricate the chain's links, if needed. Excess lubrication may attract more dirt, causing premature wear and incorrect functioning of the system.

- 

Never use pressure washers or steam cleaners.

PART MAINTENANCE

The bicycle requires regular maintenance and a minimum number of regular inspections. The frequency of the maintenance operations depends on the type of vehicle (leisure, road or mountain bike), as well as the frequency and conditions of use.

PART MAINTENANCE CALENDAR

Part	Action required	Before each outing	Monthly	Annually
Lighting	Functional check.			
Tyres	Pressure check.			
	Inspect the height of the profile and sides.			
Brakes (on the rim)	Check the lever travel, lining strength and rim position.			
	Brake test when stopped.			
	Clean the brake pads.			
Brake cables	Visual inspection.			
Brakes (disc brakes)	Change the brake fluid (DOT fluid).			
Suspension fork	Check the bolts and the corresponding tightening torque.			
	Change the oil and lubricate the elastomer.			
Saddle seat post with suspension	Maintenance.			
	Play check.			
Rims on rim brakes	Inspection and replacement, if needed, of the wall linings.	At the latest after the second part of the brake lining.		
Bottom bracket axle	Check the play.			
	Re-lubrication.			
Chain	Check and lubrication.			
	Check and replacement.	After 800 km.		
Chainsets	Check and tightening.			
Wheels / Spokes	Check wheel spin and spoke tension.			
Headset	Inspection of the headset.			
	Re-lubrication.			
Metal surfaces	Maintenance.	At least once every six months.		
Hubs	Bearing inspection.			
	Re-lubrication.			
Pedals	Bearing inspection.			
	Lubrication, cleaning the anchoring mechanism.			

Part	Action required	Before each outing	Monthly	Annually
Saddle seat post / Stem	Inspection of the fastening screws.			
Rear derailleur / Derailleur	Cleaning, lubrication.			
Quick-release mechanism / Thru-axle	Efficacy check.			
Nuts and bolts	Check and tightening.			
Spokes	Tension check.			
Stem / Saddle seat post	Removing and applying new assembly paste.			
Circuit / Brakes	Disassembly and greasing.			
Components of the electrical assistance system	Check the connections.			
	Check there is no dirt.			

 You do not need to take the bicycle to an expert if you are skilled, experienced and have the appropriate tools. Immediately implement the corrective measures if you detect problems. If you are unsure or have queries, please contact BH.

 The tasks described above must only be carried out by a trusted bike repair expert.

SPARE PARTS

Original parts must be used to ensure the optimum performance of your bicycle and the utmost safety. Failure to use original parts may cause damage that is not covered by the warranty.

The most common spare parts are parts prone to wear. The most common ones are tyres, inner tubes, brake pads, disc brakes and brake pads, as well as rims, when these are part of the brake unit, headlights, position lights, batteries and accumulators.

- **TYRES:** Replace them with an equivalent type of tyre. Check the marking on the outside of the tyre (ETRTO standard). Keep in mind that using a tyre with a larger outer diameter than the recommended one may cause the tip of the foot to touch the front wheel or rear wheel guard when the handlebars turn. The cyclist may lose control of the bicycle and suffer an accident with serious consequences. This can also occur when the pedal chainset is replaced with a longer one.
- **INNER TUBES:** Replace them with a suitable type of inner tube, according to the type of tyre. Refer to the information on the outside of the inner tube (ETRTO standard).
- **DISC BRAKES AND BRAKE PADS:** Follow the instructions supplied by the manufacturer.
- **HEADLIGHTS AND POSITION LIGHTS:** Replace the bulb with one of the same type. Check the indication on the metal area.

- **CHAIN, COG AND CHAIN RINGS:** Follow the instructions supplied by the manufacturer.
- **BATTERIES AND ACCUMULATORS:** Change for the same type. Check the indication on the outer area.

 Remember that the failure to use original parts may cause damage that is not covered by the warranty.

AFTER A FALL, BLOW OR IMPACT

If you suffer a fall, blow or impact, first make sure that you are okay to continue cycling. Do not use the bike if you are injured and ask for medical assistance if needed.

If you are okay to continue cycling, check the bicycle to make sure that it is in perfect working order:

- Check that the wheels are firmly secured and that the rims are in the centre of the frame and fork. Turn the wheels. If they cannot be centred in situ because the gap is too small, separate the brakes from the rim so it can move freely.

 In this case, keep in mind that the braking efficacy will be less.

- Check whether the handlebars or the front of the frame are twisted or broken. Check that the front is firmly seated on the fork, holding the front wheel firmly between your legs and trying to twist the handlebars with respect to the front wheel.
- Check that the chain is fitted correctly. If the bicycle fell onto the transmission side, check that it is working properly. Ask for help to place the bicycle on its saddle and change gears. When the chain fits on the largest cog, check the distance between the gear and the spokes. If the gear or bracket are bent, the first one may become stuck on the spokes - Danger of falling! The gear, rear wheel or frame may be damaged. Check the derailleur. If it has shifted, the chain may come off the gear. The bicycle's transmission will become less effective (also refer to the "Traction" section).
- Check the saddle, upper tube or the bottom bracket box to make sure that there are no defects.
- Lift the bicycle slightly and let it drop onto the ground. If there are any noises, inspect the bicycle for any loose bolts.
- Inspect the entire bicycle again to check for bent areas, worn finish or cracks.
- Ride again carefully if no problems have been detected during the inspection. Do not brake or accelerate suddenly or pedal when going uphill. If you are unsure, wait for a car to pick you up instead of risking an accident. Once home, you should inspect the bicycle carefully again. If you are still unsure or have any queries, please contact your nearest BH workshop!

 Bent aluminium parts must not be straightened, i.e., they must not be repaired. Even afterwards, there is a high risk of breakage, especially in regards to the fork, handlebars, front part, chainsets and pedals. Replace them for greater safety.

04 WARNINGS ON USE

MAXIMUM TYRE SIZE

If you install a tyre of a different size on your bicycle, check and make sure that there are at least 6 mm between the tyre and other parts of the frame and fork.

MINIMUM AND MAXIMUM INSERTION LENGTH OF THE SEAT POST

Failure to observe the maximum and minimum seat post insertion dimensions indicated in this manual may cause a lever effect on the frame. The pressure exerted could damage the frame and cause serious accidents. The warranty does not cover the damage generated by failing to observe these indications.

MAXIMUM FORK LENGTH (AXLE-TO-CROWN)

Observe the maximum length between the fork axle and the lower part of the steering tube (axle-to-crown). If this maximum length is not observed, the frame could be damaged due to withstanding a greater load than that for which it was designed and may cause serious accidents.

MAXIMUM NUMBER OF STEERING SPACERS

This manual specifies the maximum number of steering spacers that can be fitted under the stem. If this maximum quantity is not observed, the materials could be damaged due to withstanding a greater load than that for which they were designed and may cause serious accidents.

POSITION OF THE SPINDLE INSIDE THE FORK TUBE

No steering spacers must be fitted above the stem. Otherwise, the materials could be damaged due to withstanding a greater load than that for which they were designed and may cause serious accidents.

INTENDED USE

Each bicycle has been designed according to a specific intended use. The models described in this manual meet the requirements associated with their intended use:

This is a set of components designed for road use. The wheels must remain in constant contact with the asphalt to ensure the structural longevity of the frame and fork.

05 WARNINGS ON USE OF THE ELECTRICAL ASSISTANCE SYSTEM

CARE AND INSTRUCTIONS FOR USE OF THE ELECTRICAL COMPONENTS AND BATTERIES

All BH products and parts have been designed to withstand splashed liquids and rain. However, some practices may cause damage to the parts and short circuits. Do not do the following:

- Wash the bicycle with pressure devices.
- Use the bicycle under adverse weather conditions.
- Transport the bicycle on the outside of a vehicle when it is raining.
- Expose the batteries to very high temperatures. If the temperature exceeds 70°C, this could cause leaks and there could be a risk of fire.
- Fail to observe the working temperature, storage and charging range of the bicycle.

RECOMMENDATIONS TO MAXIMISE THE BATTERY LIFE

We recommend the following to maximise the battery life:

- Charge it on a flat and stable surface.
- Make sure that it is not exposed to direct sunlight.
- Make sure that there are no children or pets near.
- Make sure that there is no rain or dampness.
- The place must be well ventilated and dry.
- The temperature must be between 15-25°C.
- Do not use the battery with a charge of less than 10%. The useful life of the cells may be affected below this charge level.

 Any unauthorised handling of the electrical system's components may cause serious accidents and will void the warranty.

WARNINGS ON THE USE OF BATTERIES

Improper use of the batteries may cause damage and serious accidents. Follow these recommendations to prevent this:

- Always use the original battery charger.
- Never leave the battery near sources of heat.
- Do not heat the battery or throw it into a fire.

- Prevent the battery connections from coming into contact with metal objects.
- Do not submerge the battery in water and prevent splashes and dampness.
- Do not hit or drill holes into the battery.
- Make sure that the battery liquid does not touch your hands or eyes in the event of a leak.
- Do not use it if there are external signs of damage.
- Only clean the battery with a dry or damp cloth.

UNSUITABLE CHARGING AND DISCHARGING ENVIRONMENTS AND SOLUTIONS

The hot and cold environments described below may lead to charging entering standby or sleep mode without fully charging the battery.

- **Winter discharging sleep mode or DUT (Discharge Under Temperature):** Battery discharging will enter the deep sleep mode if the temperature is below -20°C, stopping the pedal assistance system from working and protecting the battery. In such cases, sleep mode will automatically be disabled when the battery exceeds -20°C.
- **Winter charging sleep mode or CUT (Charge Under Temperature):** Battery charging will enter sleep mode if the temperature is below 0°C. If charging starts and the temperature falls below this level due to night cooling or other factors, charging will stop and sleep mode will be activated to protect the battery. In such cases, sleep mode will automatically be disabled when the battery exceeds 0°C.
- **Noise on televisions/radios/computers:** Charging near televisions, radios or similar devices may cause static electricity, flickering images and other interference. If this happens, recharge somewhere that is away from the television or radio (e.g. in another room).

RECYCLING

Ion-lithium batteries can be recycled but they may harm the environment if they are not managed properly after the end of their service life. Follow these steps after the end of their service life:

- Classify and recycle each electrical component in a place prepared for the sustainable recycling of such parts.
- Check and make sure that the applicable regulations of your country are observed with regards to batteries.

MOTOR

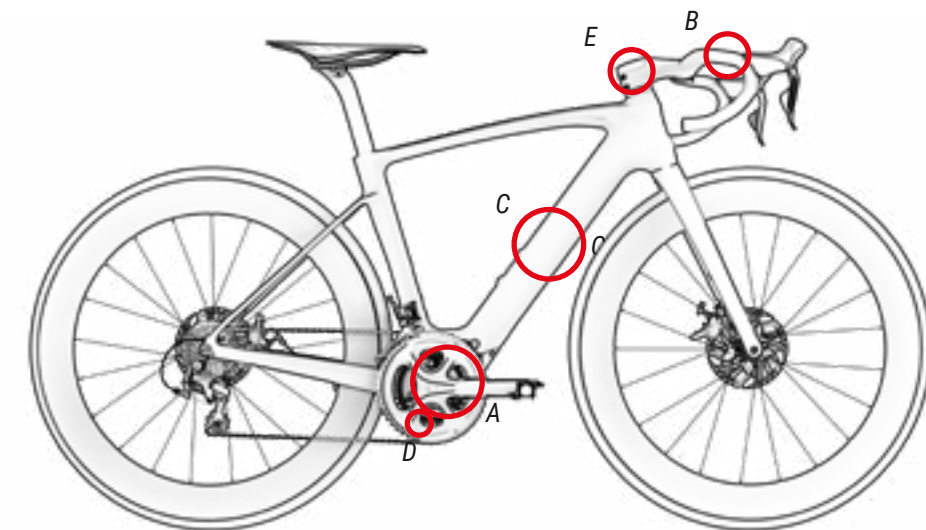
The DC motor is located on the bottom bracket axle. The motor's service life depends on its use, as in the case of any other part of the bicycle. Under normal conditions, the motor can last for 10 to 20 years, or up to 100,000 km.

06 PEDAL ASSISTANCE SYSTEM OPERATION

COMPONENTS OF THE PEDAL ASSISTANCE SYSTEM

The BH Bikes pedal assistance system is made up of the following components:

- **A. A motor**, which drives the bicycle.
- **B. A control panel**, among other things, allows you to select the assistance mode.
- **C. A battery**, which powers the motor.
- **D. A torque sensor**, which reads the force applied to the pedal by the user.
- **E. A display** (CORE DISPLAY), which shows relevant system information.



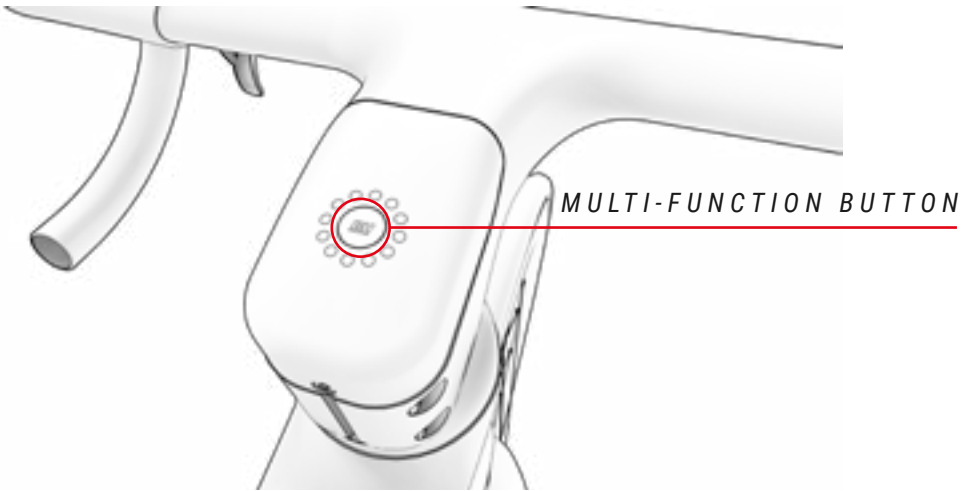
PEDAL ASSISTANCE SYSTEM

The pedal assistance system is designed to provide the optimal amount of assisted power. It provides assistance within a standard range, based on factors such as the pedalling force, the speed of the bicycle and the transmission. The system does not provide assistance in the following situations:

- If the control panel is off.
- When travelling at 25 km/h or faster.
- If you are not pedalling and the throttle function is released at 6 km/h.
- If there is no remaining battery capacity.
- If the assistance mode selected is 0% assistance.

PARTS OF THE CONTROL PANEL

The Core display is made up of a ring with 12 LEDs and a button inside the ring, used as the control panel:



SWITCHING THE PEDAL ASSISTANCE SYSTEM ON AND OFF

The pedal assistance system is activated from the Core display. It is located on the bicycle's stem. Press the power button to start the system. The Core display will be lit, showing a blue animation moving counterclockwise. The current pedal assistance mode will be shown next.

To disconnect the pedal assistance system, press and hold the multi-function button for 3 seconds. The screen will turn off and the system will shut down.

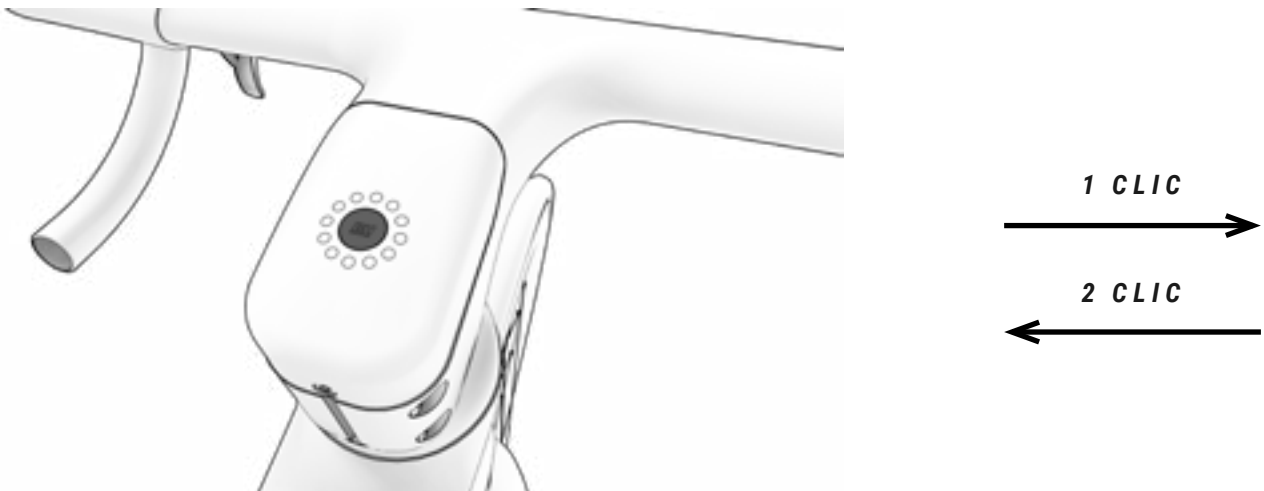


SELECTING THE PEDAL ASSISTANCE MODE

The system features the following pedalling assistance modes:

- **Boost:** Identified by the colour **Red**. Use when you want to get peak power from the system.
- **Trail:** Identified by the colour **Orange**. Use when climbing difficult terrains.
- **Eco:** Identified by the colour **Green**. Use when you want to travel as far as possible.
- **No assist:** Identified by the colour **White**. Use when you want to travel without assisted power. You can continue to use the other functions of the control panel.

To toggle through the assistance modes, the user must press once the multifunction button to increase the level of assistance and press it twice to reduce the level of assistance.



ASSISTANCE LEVEL

In order to increase the life of the battery and prevent a full discharge which may damage it, the assistance modes are limited based on the state of charge of the battery:

- Battery charge above 20%: 100% of the highest assistance level is available.
- Battery charge between 10% and 20%: assistance level limited to 50% of the highest assistance level.
- Battery charge between 5% and 10%: assistance level limited to 25% of the highest assistance level.
- Battery charge between 1% and 5%: assistance is not permitted. Only the lights can be turned on.

WALK ASSIST MODE

The walk assist mode helps the user to transport the bike by foot. To activate this mode, press and hold the + button on the control panel (it doesn't matter which assistance mode is selected when the button is pressed). The LEDs on the CORE DISPLAY will flash blue, indicating that this mode has been activated. Release the button to exit this mode.

START OF PEDALLING

Before resting your feet on the pedals, you must sit on the saddle and hold the handlebars firmly. Special care should be taken if you start pedalling when using a high assistance mode (TRAIL and BOOST modes), as the motor will respond with maximum thrust and you may lose control. To facilitate acceleration, the motor provides an additional initial thrust as soon as you start pedalling. Therefore, minimal force is required to put the bicycle in motion, helping you to join the traffic quickly and safely.

- ⚠ Start pedalling with a short gear ratio (higher gears) and low assistance mode (ECO mode). As well as providing greater control and safety on the bicycle, it requires less energy consumption and, therefore, ensures a longer range. Starting to pedal with a higher assistance mode (TRAIL and BOOST modes) may put the user at risk.
- ⚠ When the user pushes the bike while walking alongside it, they must make sure that the system is disconnected.

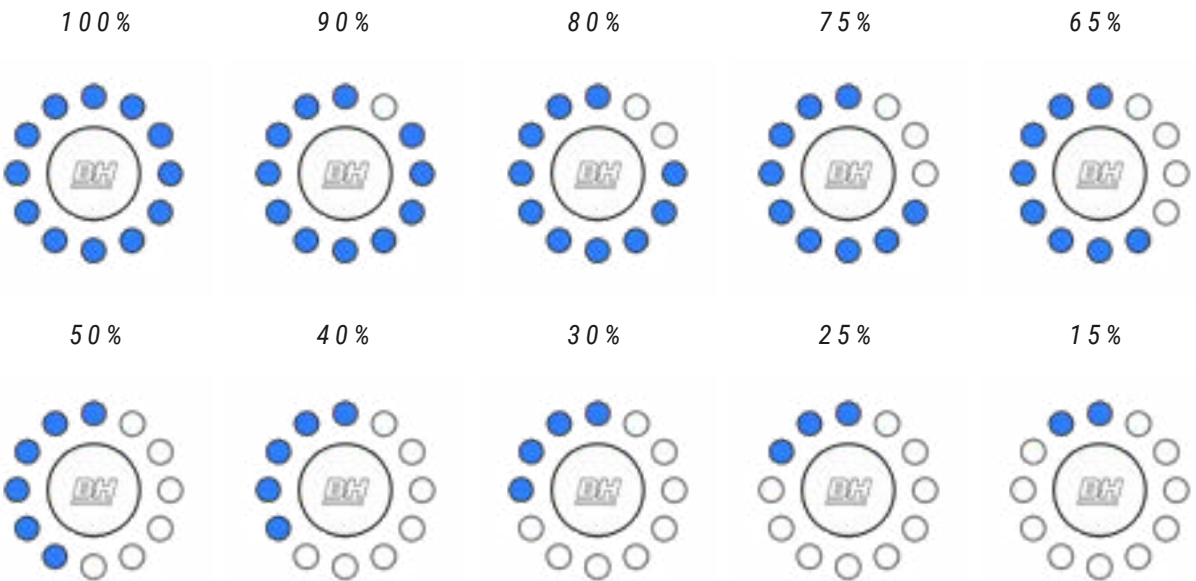
DISPLAYING THE BATTERY CHARGE LEVEL

A 100% charge can provide a range of up to 190 km. The battery charge level can be displayed in different ways. The battery charge level indicator shows the estimated remaining battery capacity in all cases:

- **Garmin devices:** Garmin devices also display the battery level on their interface:



In models equipped with the Core display, the battery charge level will be shown with the ring of LEDs. The current battery level can be interpreted according to the number of LEDs that are lit. Keep in mind that the colour shown only refers to the current assistance mode.



VISUALIZACIÓN NIVEL DE CARGA DE LA BATERÍA XPRO DUAL DISCHARGE

The XPRO DD external battery boosts the standard 190 km range up to 250 km. By pressing the XPRO DD battery button, a ring will be lit around the button. The colour of this ring indicates the XPRO DD battery charge level. Green 100-75%, blue 75-50%, yellow 50-25%, red 25-10% and flashing red 10-0%.



In models equipped with the Core display, the XPRO DD battery charge level will be shown with the ring of LEDs. The capacity of the XPRO DD battery will be added to the capacity of the bicycle's internal battery and the display will show the total charge of both batteries as follows:

If both batteries are 100% charged, the display will show the charge level as 100%.

100% INNER BATTERY: 410 WH
100%



100% INNER BATTERY + XPRO DD: 410 WH + 180 WH
100%



BATTERY AND CHARGER

The battery that your BH bike is equipped with contains lithium-ion cells and is the most advanced technology available in terms of energy density (energy stored per kilogram of weight and per cm³ of volume).

Lithium-ion batteries have the following characteristics:

- Their performance decreases in extremely hot or cold environments.
- An additional characteristic of BH's lithium-ion batteries is that they have no “memory effect”, and are not affected by incomplete discharging.
- They lose their charge naturally and gradually with use. The battery can be fully discharged (100%) approximately 500 times, with maximum battery deterioration of 20%. In the case of partial discharges, only the discharged part is counted. For example, if you charge the battery every time its charge level falls by 25%, you will be able to charge it to 100% of its initial capacity 2,000 times. In short, the guaranteed durability of the battery with maximum degradation of 20% is at least 20,000 km.

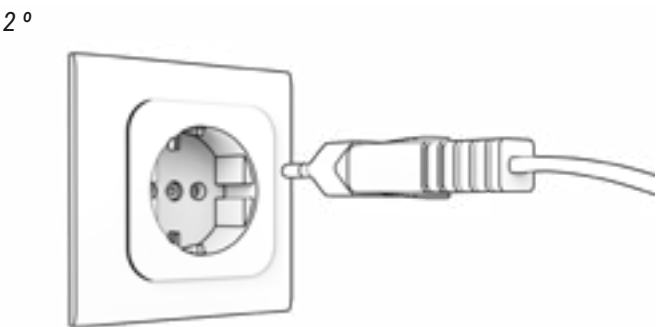
BATTERY CHARGE

Due to its advanced lithium-ion technology, there is no need to wait for the battery to completely discharge before connecting it to the charger. Likewise, it is also not necessary to charge it to 100% before using it again. But bear in mind that, in order to achieve a maximum operating range, a full charge is recommended.

1. TURN ON THE DISPLAY. IT WILL NOT CHARGE IF THE DISPLAY IS OFF.
2. OPEN THE COVER THAT GIVES ACCESS TO THE CHARGING PORT, LOCATED AT THE BOTTOM LEFT OF THE FRAME.



3. CONNECT THE BATTERY FIRST AND THEN PLUG INTO THE POWER SOCKET.

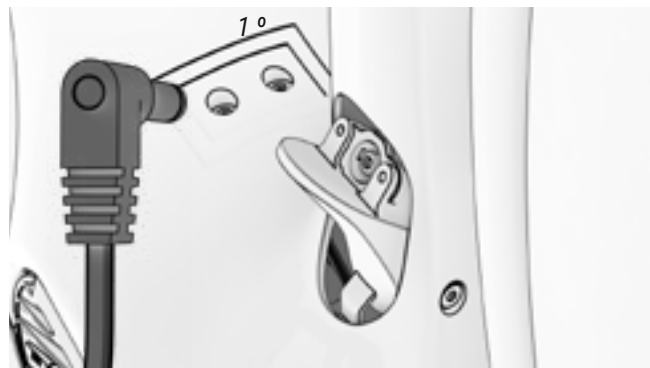


4. VIEW THE STATE OF CHARGE AND ERRORS.

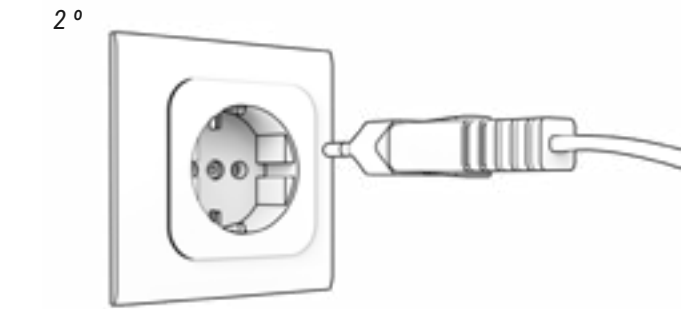


- | | |
|--|---|
| ■ 100% CHARGED | ■ CHARGING |
| ⋮ STANDBY (FLASH) | ⋮ CHARGING PROBLEM (FLASH) |

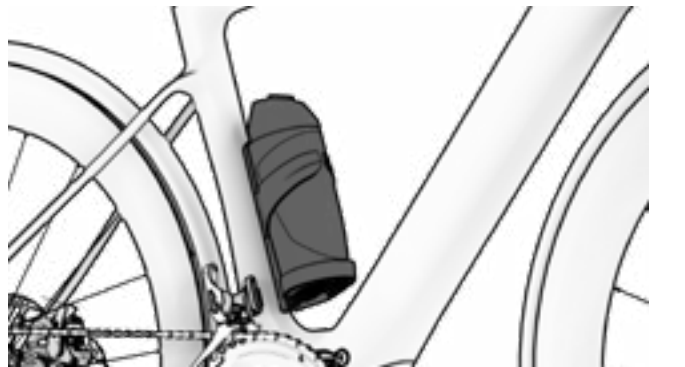
5. ALWAYS DISCONNECT THE BATTERY CHARGER FIRST AND THEN REMOVE THE PLUG FROM THE POWER SOCKET.



6. CAREFULLY CLOSE THE CHARGING PORT COVER, MAKING SURE NO DIRT OR WATER ENTERS.



7. THE XPRO DD BATTERY WILL BE CHARGED IF IT IS IN THE BOTTLE HOLDER AND THE BICYCLE IS CHARGING, WITH THE DISPLAY ON.



- ⚠ Never charge or use a damaged battery.
- ⚠ Be careful not to touch the charger during the charging process. It may be hot, especially in high ambient temperatures.
- ⚠ If a fault occurs while the battery is being charged, remove the charger's power plug from the socket and wait for the battery to cool down.
- ⚠ Never touch the power plug, charging plug or contacts with wet hands.
- ⚠ Make sure that there is no foreign matter on the battery's contacts before placing it on the bicycle.
- ⚠ Do not connect the charger's power plug to the battery or bicycle's charging port if it is wet or damp. Make sure that you only connect the power plug when the battery or bicycle's charging port is completely dry.
- ⚠ Do not apply excessive force on the power plug or pull the cable with the power plug connected to the battery.
- ⚠ Turn off the pedal assistance system before removing the battery from the bicycle.

⚠ Use both hands to remove the battery, taking special care not to drop it. Dropping the battery on your foot could cause injury and may damage the battery.

XPRO DUAL DISCHARGE BATTERY

The Xpro DD additional battery or extender allows you to extend the bike's range. This is a bottle-shaped external 180 Wh battery that fits a specific bottle holder, which must be properly installed and connected to the system by an authorised store. When the bottle holder has been installed, the external battery is connected to the system by simply inserting it into the bottle holder. In other words, this is a Plug&Ride battery that requires no additional connection or work to operate.



XPRO DD BOTTLE HOLDER

The bottle cage contains a connector that is designed to be waterproof, thus ensuring the protection of the system. Therefore, the user can mount a conventional water bottle on the cage or leave it bare.

ENERGY SAVING MODES

The battery has been designed to ensure a long service life. This is possible thanks to the energy saving modes that prevent inefficient battery consumption:

- **Transport mode:** In order to minimise internal consumption while transporting the bicycle from the factory to the store, the battery is in Transport mode. The user can finally exit this Transport mode by charging the battery to 100% before its first use.

If the battery does not charge fully, the Transport mode will not deactivate, repeatedly entering this mode quickly for its protection. Remember to fully charge the battery to finally deactivate the Transport mode.

- **Standby mode:** In order to minimise internal consumption, the battery automatically switches to Standby mode. This happens automatically when the system detects no charging, no discharging and no communication with the battery for a period of 10 minutes. So, for example, this mode will automatically turn off the control panel after 10 minutes without use, if the user has left it on after parking.

The user can exit this Standby mode by simply turning on the bicycle's control panel.

- **Deep Sleep mode:** In order to protect the battery during long periods of inactivity or storage (for example, during the winter), the battery automatically switches to Deep Sleep mode. This happens automatically when any of the following situations occur:
 - If the charge level of the battery is below 1%, the battery goes into Deep Sleep mode when the battery has continuously been in Standby mode for 10 minutes.
 - If the charge level of the battery is below 10%, the battery goes into Deep Sleep mode when the battery has continuously been in Standby mode for 48 hours.
 - If the charge level of the battery is below 40%: Deep Sleep mode is activated when the battery has continuously been in Standby mode for 14 days.
 - If the charge level of the battery is below 80%: Deep Sleep mode is activated when the battery has continuously been in Standby mode for 30 days.

The user can exit this Deep Sleep mode by pressing the power or multifunction button. 2 flashes will appear with all LEDs in Stand By mode and 1 flash in Deep Sleep mode.

APP BH BIKES ICONNECT-Z

The BH Bikes iConnect app can be used to customise the configuration of the pedal assistance system:

- Change the assistance level colours.
- Changing the assistance (0-100%) and acceleration parameters for each level of assistance.

Download the app (available for IOS and Android) and follow these steps to link your bicycle to the app:

App Store: <https://apps.apple.com/es/app/bh-bikes-icconnect/id1494346206>



Google Play: <https://play.google.com/store/apps/details?id=com.bh.ebikelight>



Watch the video from the following link to learn how the app works:

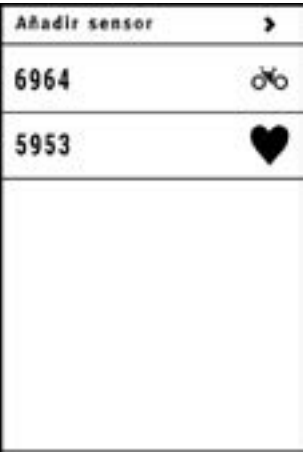
<https://youtu.be/k4s0iG0cX3U>



OPERATION WITH THE GARMIN DEVICE

The ANT+ connection to a Garmin device grants you access to additional assistance display and control functions. The Heart Rate strap connects via the Garmin device. The steps that must be followed to connect iRemote to the Garmin device are described below. The image in the sixth step shows that the Garmin device can be used to check the bicycle's battery status and to select the desired pedal assistance level.

1. TAP ON "ADD SENSOR".



2. TAP ON "EBIKE".



3. PAIR WITH YOUR GARMIN DEVICE.



4. SELECT THE E-BIKE.



5. SELECT THE SENSOR YOU HAVE CREATED.



6. GARMIN CONNECTED.



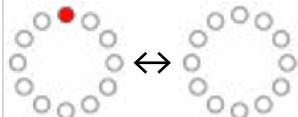
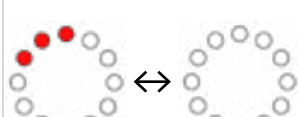
ERROR CODES

When an error occurs, it will be reflected on the display. Below are the errors and actions to be taken on the Core displays.

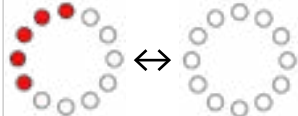
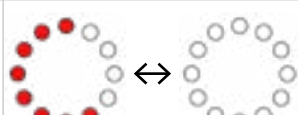
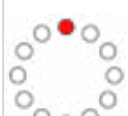
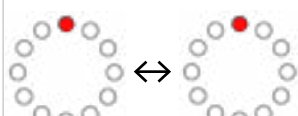
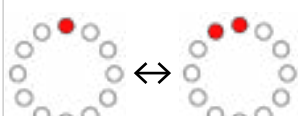
In models equipped with the Core display, errors will be shown by means of LEDs. Depending on the number of LEDs on and off, a specific error will be indicated. Below is a description of the possible problems:



ERROR DESCRIPTIONS

No.	Code	Description	Action required
0		System Normal	
1		Over current (Much current)	Pls. check if the connector between motor and controller is loose. If not, change a new controller!
2		Static current over limit	Please change the controller
3		Throttle or TMM Signal Abnormal	Pls. check if the connector between TMM sensor and controller is loose.
4		Motor phase lack	Please check the motor connector or controller.

ERROR DESCRIPTIONS

No.	Code	Description	Action required
5		Motor hall sensor error	Pls. check if the connector between motor and controller is loose. Hall sensor inside of the motor is broken, change a new Hall sensor or a new motor. The bad contact of the controller-motor cable, change a new controller.
8		Low Battery voltage	Change battery or check the battery output
9		Motor blocked	Motor stops by accident ; Motor stalled.
10		Current over limit	The bad contact of the controller-motor connector if needed, change a new one.
11		Motor over-heat alarm	If the temperature exceeds the setting value, then the current starts getting weak gradually
12		Motor over-heat protection	Entering into the temperature protection mode, the controller stops outputting
13		Communication error	1.Communication line was loosed ,please check the communication cable and its connector 2.The MCU of Controller was dead, change controller. 3.TMM wire was shorted, please disconnect TMM sensor to check. 4.Motor hall wires were shorted, please disconnect Motor connector and check again, 5.Motor power wires touched the Hall wires, cause Hall damaged and short. 6. display communication parts were dead, please change a new display. 7. Check Display and CAN convoter Communication line was loosed (ONLY REVO)
14		Foot error	Please remove your feet from pedals and switch on again.
33		Fault_e_SpeedSensorNoInts	Switch off the system completely and then back on . If the problem persists, contact your e-Bike dealer.

GENERAL DESCRIPTION OF I-BUTTON

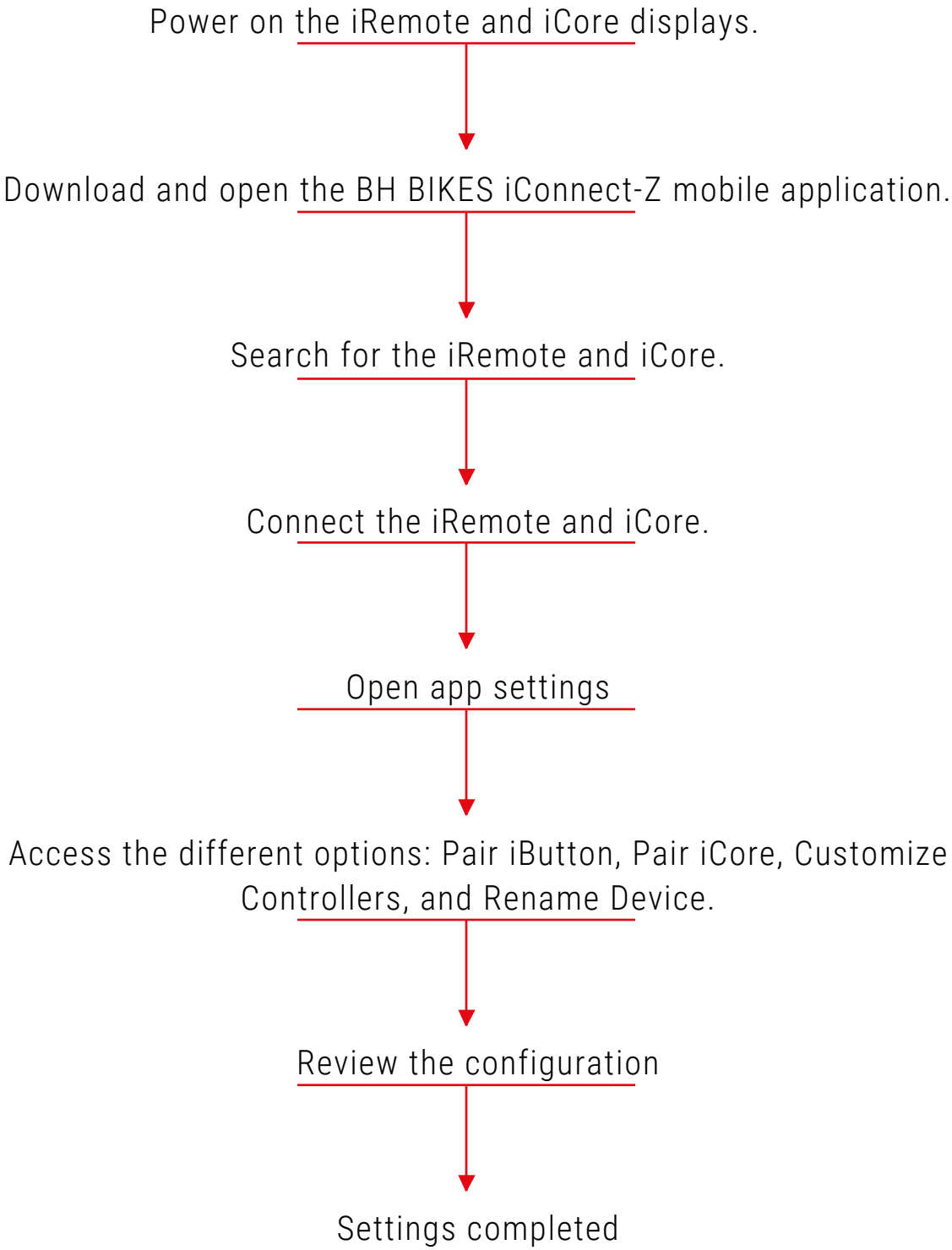
Throughout this document, you will find instructions for connecting, modifying, and customizing the iButtons used on the iAerolight, iGravelX, and iRS1 electric bicycles.

The iButtons are compact devices designed to be mounted on the handlebars of road bicycles using the handlebar tape, with no additional tools required. Each device can be assigned two distinct functions: one activated by a brief press (quick press) and another by a longer press (long press). These functions can include, for example, turning the bicycle's light on or off, or activating different pedal-assist modes.

Thanks to their flexible mounting system, each iButton can be positioned on the handlebar according to the cyclist's ergonomic comfort, facilitating intuitive use while riding.



PROCEDURE FOR PAIRING OR RENAMING THE IREMOTE OR ICORE VIA IBUTTON



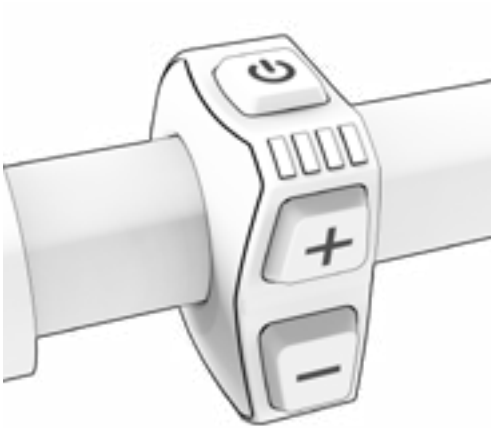
PAIRING ICORE OR IREMOTE WITH IBUTTON

The process for pairing the iCore or the iRemote with the iButton is as follows:

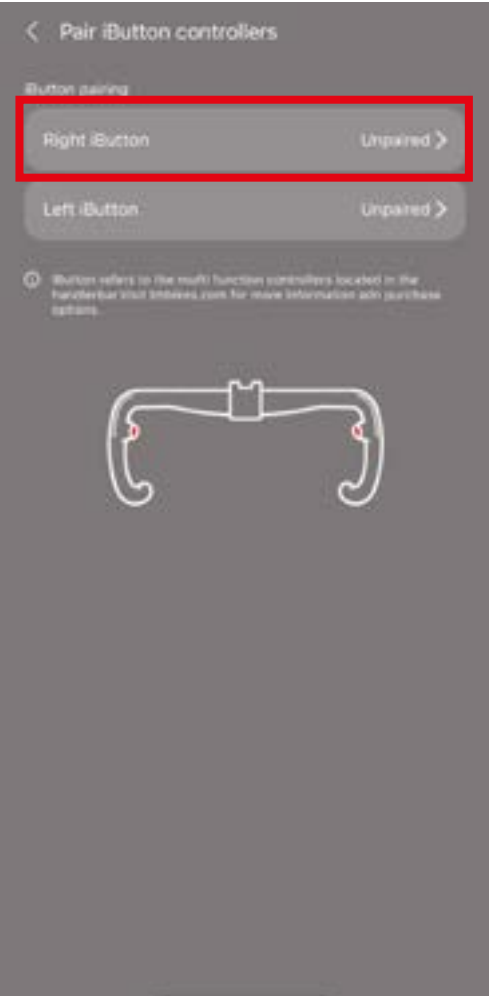
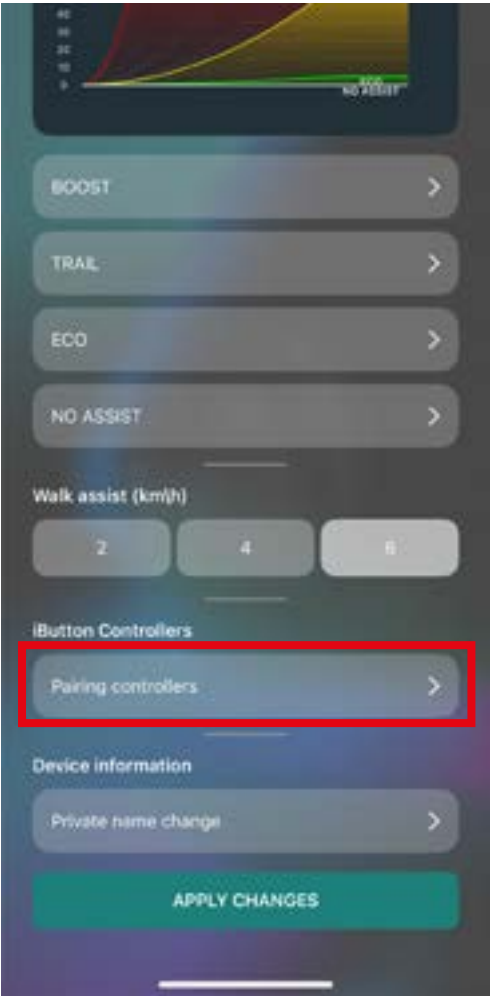
1. TURN ON THE ICORE / IREMOTE.
2. DOWNLOAD THE BH BIKES ICONNECT-Z APPLICATION.
3. OPEN THE APP AND CONNECT TO THE ICORE/IREMOTE.
4. CLICK ON "PAIRING CONTROLLERS" AND SELECT "RIGHT BUTTON"



iCore



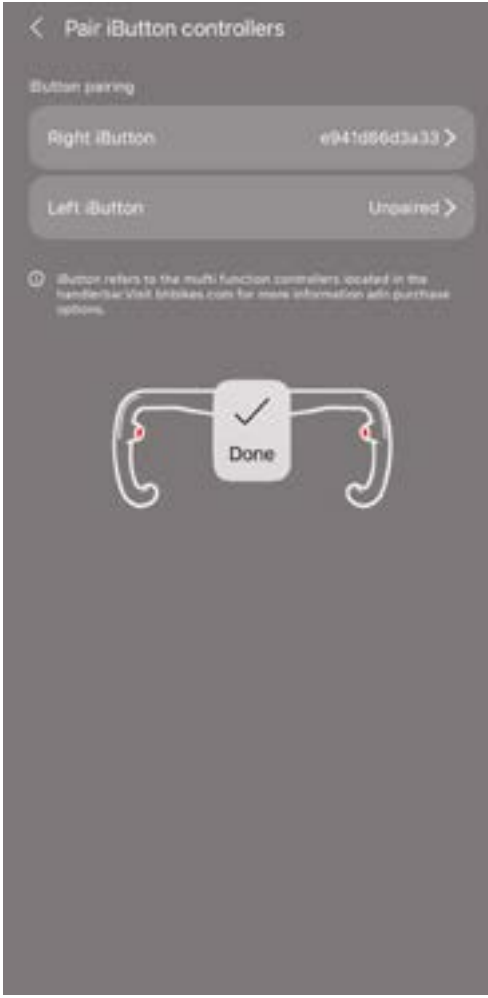
iRemote



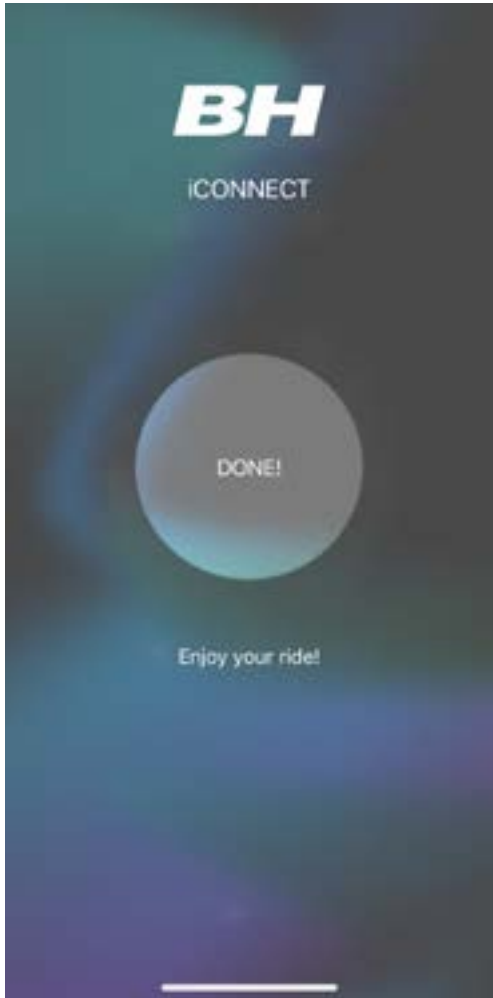
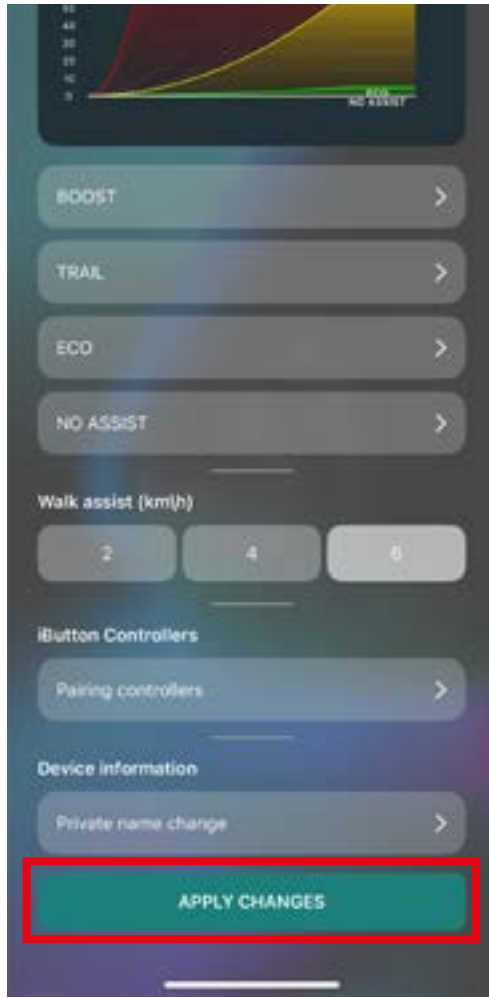
5. PRESS AND HOLD THE IBUTTON AND SELECT IT ON THE MOBILE SCREEN WHEN IT APPEARS.



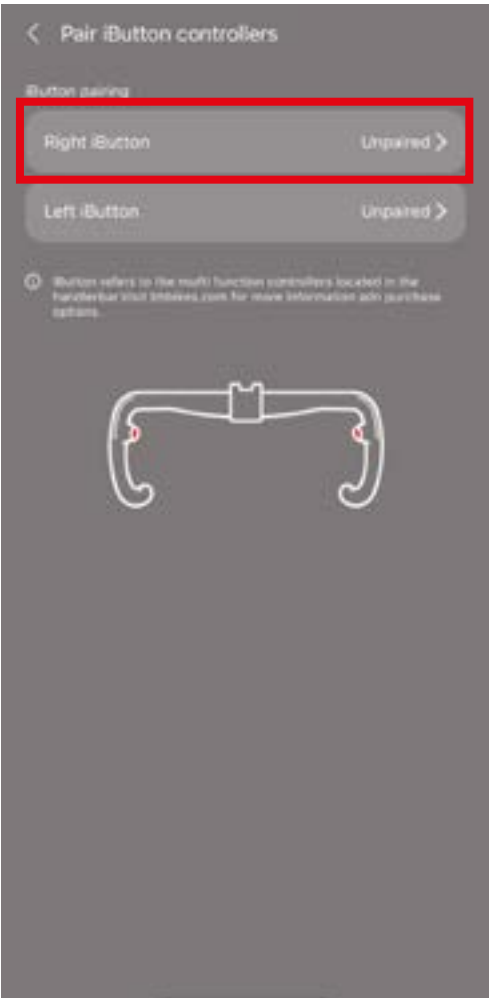
6. WAIT FOR THE APP CONFIRMATION TO ENSURE A PROPER PAIRING.



7. CLICK "APPLY CHANGES".



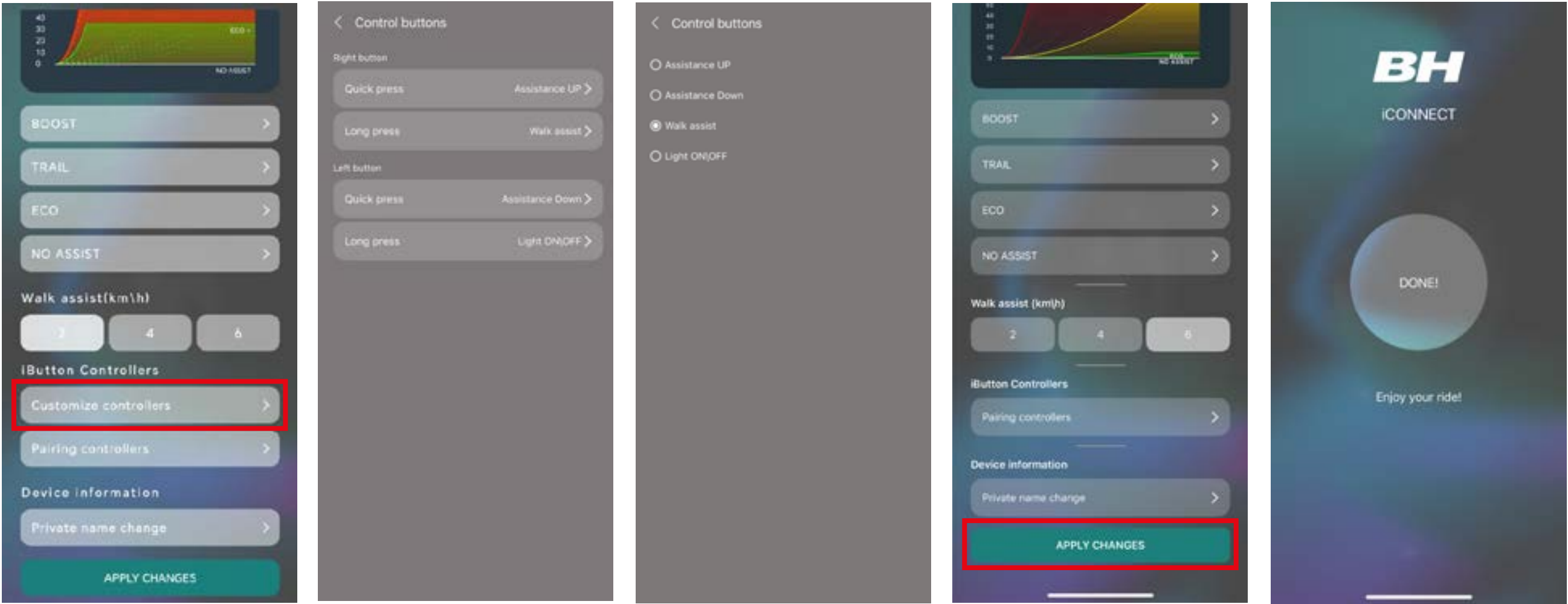
8. REPEAT THE PROCESS FOR THE PAIRING OF THE LEFT IBUTTON.



IBUTTON FUNCTIONS SETTINGS

The process for setting the functions of the iButtons is as follows:

1. CLICK "CUSTOMIZE CONTROLLERS"
2. MODIFY THE SHORT OR LONG PRESS FUNCTIONS OF THE IBUTTONS FROM THE AVAILABLE OPTIONS.
3. CLICK "APPLY CHANGES".



RENAMING OF THE IREMOTE AND ICORE

The process for renaming the iRemote and the iCore is as follows:

1. CLICK "PRIVATE NAME CHANGE"

2. ENTER THE NEW NAME AND THEN CLICK "OK".

3. IF THE CHANGE IS SUCCESSFUL, A "SUCCEED" NOTIFICATION WILL APPEAR.



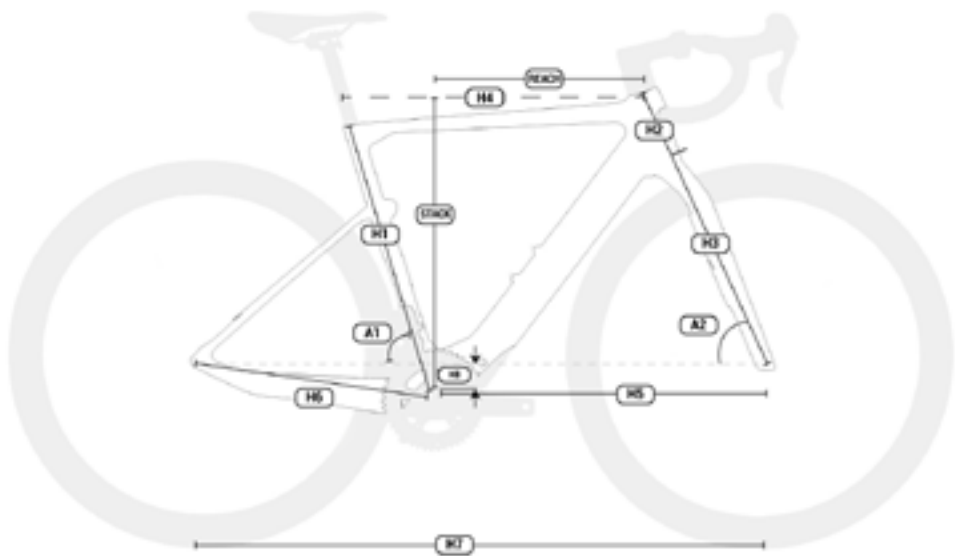
AFTER THE NAME MOFICIATION, THE MONITOR WILL AUTOMATICALLY TURN OFF.

PLEASE RESTART IT AGAIN.

07 SIZES AND DIMENSIONS

ALL MODELS
IGRAVELX

	H1	H2	H3	H4	H5	H6	H7	H8	A1	A2	REACH	STACK
SM	498	120	390	528	592	428	1009	75	73.75	70.5	370	540
MD	515	140	390	548	601	428	1019	72	73	71	377	557
LA	540	160	390	566	614	428	1031	73	72.75	71.5	387	579
XL	560	180	390	585	630	428	1048	73	72.75	71.5	398	601



08 TECHNICAL SPECIFICATIONS

GENERAL SPECIFICATIONS

Characteristics	Models	Specification
Material		
Frame	EC246 / EC226	Aluminium
	EC296 / EC286 / EC276	Carbon
Fork	All	Carbon
Recommended use	All	Gravel
Sizes	All	SM, MD, LA, XL
Fork travel	All	60mm
Maximum height of steering spacers	All	2x15 + 1x10mm (already cut)
Fork steering tube	All	Full carbon 1.5", cónico
Wheel size	All	700C
Maximum size of the tyre	All	45mm
Pedaliar	All	BB386
Bottom bracket width	All	86,5 mm
Inner diameter bottom bracket shell	All	46 mm
Standard front dropouts	All	Thru Axle
Standard front axle	All	100 mm
Front axle pitch thread	All	12x1.0mm
Standard rear dropouts	All	Thru Axle
Standard rear axle	All	145mm
Rear axle pitch thread	All	12x1.0mm
Seat post	All	Carbono Gravel X
Seat post clamp diameter	EC296 / EC286 / EC276	Integrated
Derailleur angle	All	66-63°

Characteristics	Models	Specification
Minimum size large chain ring	All	48 teeth
Maximum size large chain ring	All	42 teeth
Minimum size small chain ring	All	34 teeth
Maximum size small chain ring	All	42 teeth
Compatible triple chain ring	All	No
Minimum Q-Factor	All	145mm
Maximum crank length	All	177mm
Dropout	All	Removable Gravel X Carbon
Compatible transmission	All	Shimano, Sram (non mechanical) y Campagnolo (non mechanical).
Front brake	All	160 mm
Min/max diameter rear disc	All	140mm min / 160mm max
Cabling	All	Intern System ACR
Bottle holder	All	2
Mudguard assembly	All	No
Compatible with trailers	All	No
Child seat assembly	All	No
Compatible with trailers	All	No
Potentiometer compatibility	All	Yes
Maximum recommended weight (cyclist+equipment+bags)	All	120 kg (depends on the tyres)

MOTOR BH-2EZMAG SPECIFICATIONS

Characteristics	Specification
Rated power	250W
Voltage	36V
Type	Brushless DC
Assistance	Up to 25km/h
Maximum torque	65Nm
Weight	2100g
Pedal assistance modes	6
Walk assist	Yes (by pressing and holding the + button)
Cadence range	130/min.
Sensors	Cadence / Torque / Speed
System technology	CAN bus

BATTERY SPECIFICATIONS

Characteristics	Specification
Voltage	36V
Capacity	EC296 / EC286 / EC276: 410Wh+180Wh EC246 / EC226: 630Wh
Weight	410Wh: 1610g y 180Wh: 1000g
Cell pack	410+180Wh: (10S2P+10S1P) y 410Wh: 20 (10S2P)
Charge level	With battery inside the frame.
Dimensions	462x67x49mm
Connection	Cable connected to the motor and charging port.
Watertightness	IP65

CHARGER SPECIFICATIONS

Characteristics	Specification
Input	100-240V. 50-60Hz. AC
Output	42V
Charging current	4A
Charging temperature range	0°C - 40°C
Display of the charging progress	With the LED built into the charger

SPECIFICATIONS OF THE BH CORE DISPLAY

Characteristics	Specification
Functions	Display of the selected assistance mode. / Turning ON and OFF. / Display of the charge level. / Display of errors.

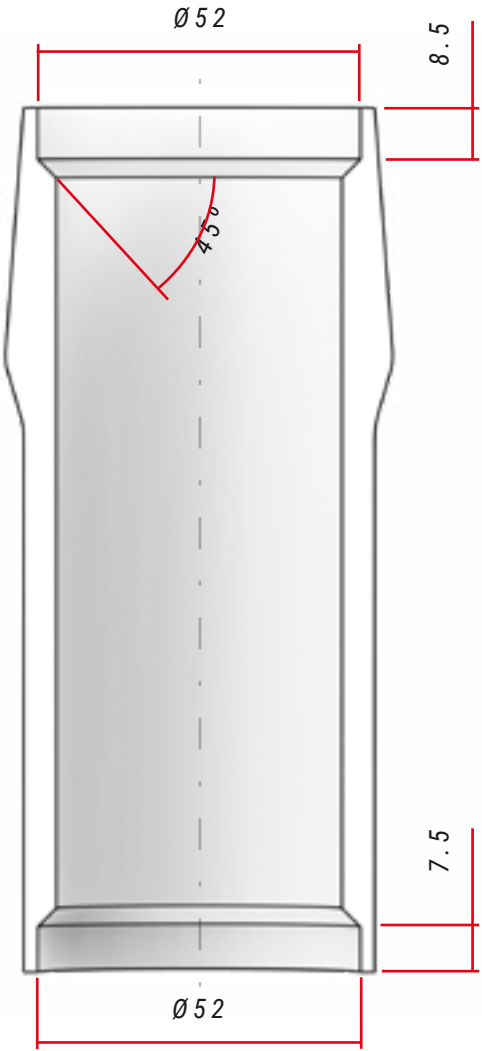
SPEED SENSOR SPECIFICATIONS

Characteristics	Specification
Assembly	On the left chainstay. Inner cabling.
Magnet	On the rear disc brake.

09 ASSEMBLY AND SPARE PARTS

STEERING TUBE DIMENSIONS

ALL MODELS

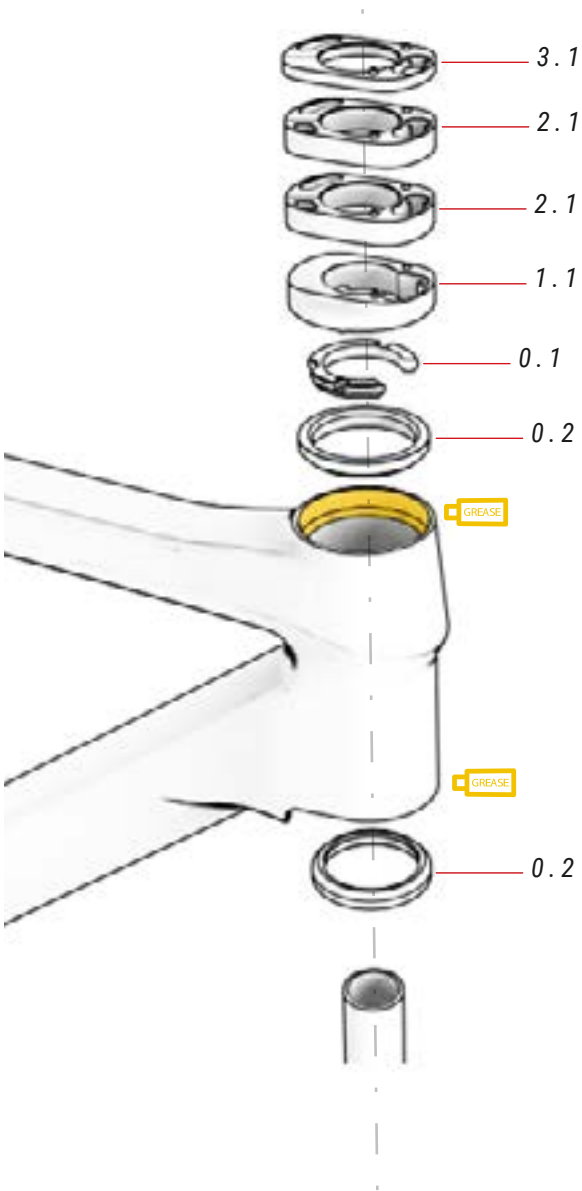


STEERING SPECIFICATIONS

	Type	Contact angle with the compression ring / fork track	Bearing dimensions
Upper	1.5" Steerer	45°	52x40x7
Lower	1.5" Steerer	45°	52x40x7

HEADSET ASSEMBLY

ALL MODELS



00 HEADSET ref.: 383245100

No.	Item	Quantity
0.1	Compressor	1
0.2	Bearing	2
0.3	Washer (do not assembly)	1
0.4	Expander	1



⚠ Carbon forks should never be mounted with a spider. The spider puts a strain on the fork for which it was not designed. This can lead to breakage and accidents.
Always mount them with an expander.

01 ACR STEERING COVER ref.: 383240800

No.	Item	Quantity
1.1	10mm Spacer	1

02 ACR STEERING COVER ref.: 383240900

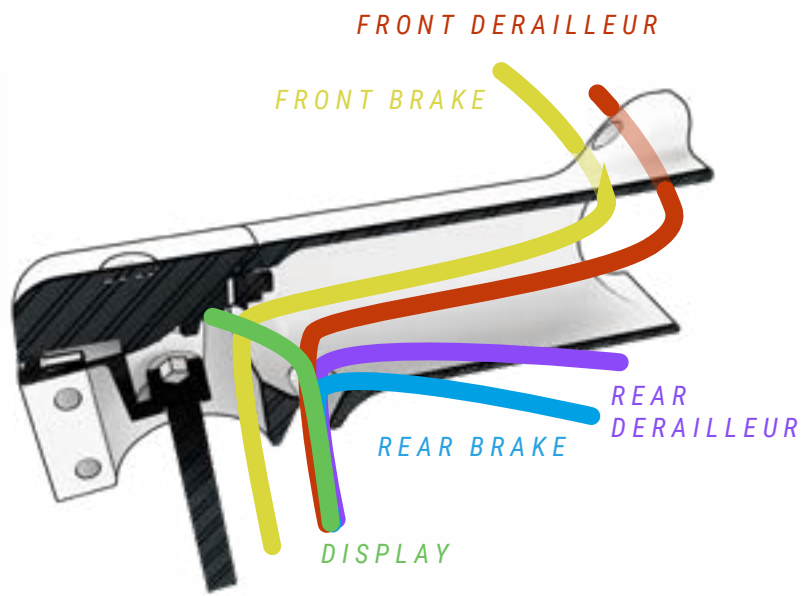
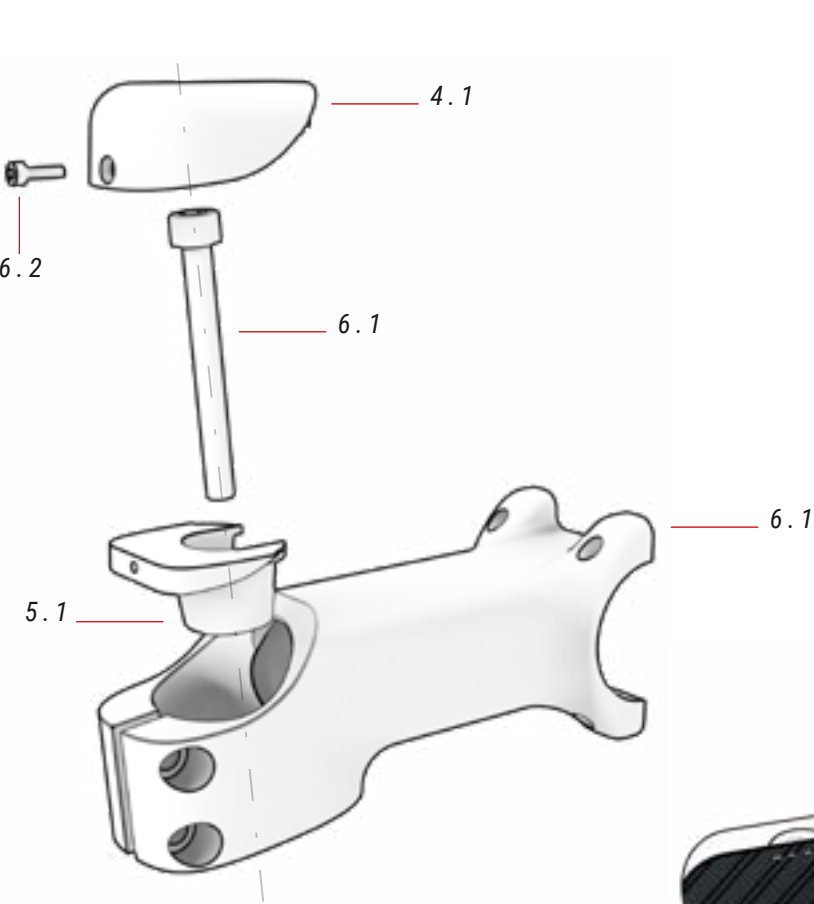
No.	Item	Quantity
2.1	10mm Spacer	2

03 ACR STEERING COVER ref.: 383241000

No.	Item	Quantity
3.1	5mm Spacer	1

BH LITE AHEAD / AERO ACR STEM

ALL MODELS



04 CORE DISPLAY ref.: 386144800

No.	Item	Quantity
4.1	CORE display	1

05 DISPLAY HOLDER ref.: 384625000

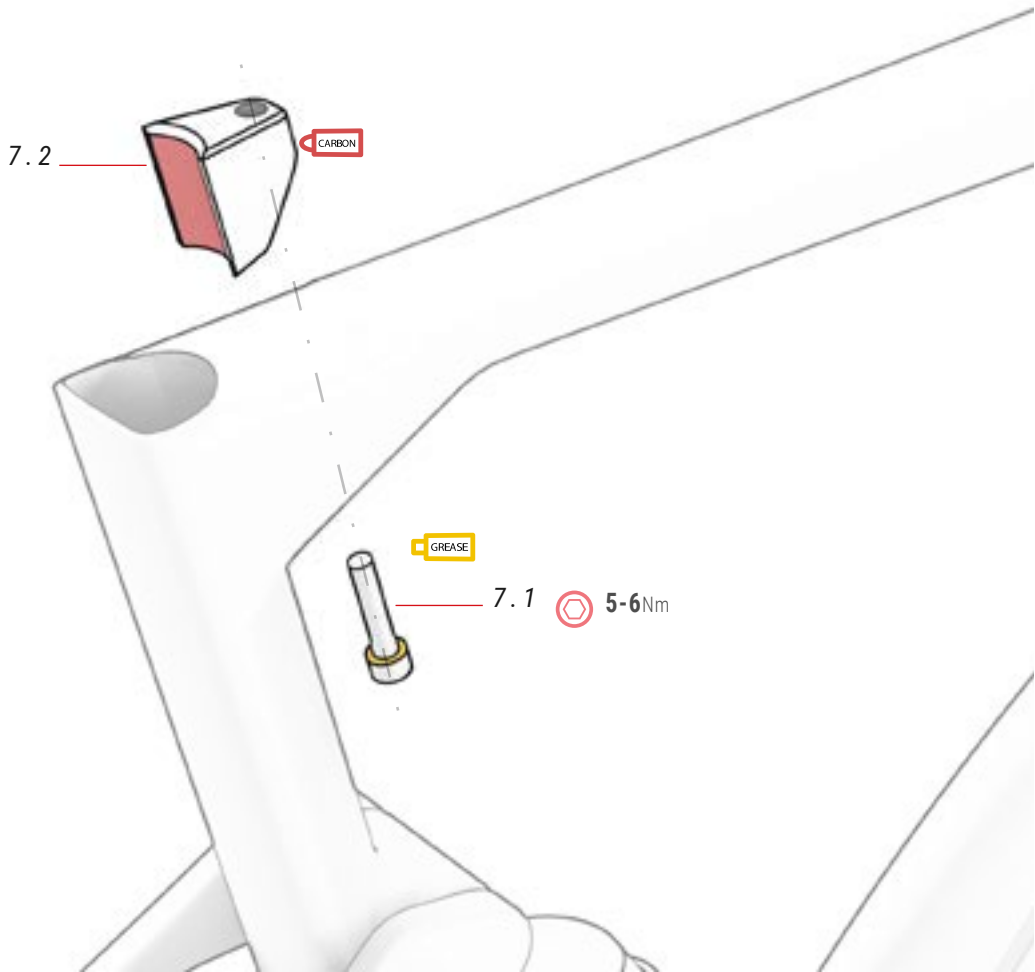
No.	Item	Quantity
5.1	Display holder	1

06 FSA ACR STEM

No.	Item	Quantity
6.1	Display bolt	1
6.2	Screw	1
6.3	Stem	1

BUILT-IN BH SEAT POST CLAMP

ALL MODELS



07 CLAMP

ref.: 391792400

No.	Item	Quantity
7.1	Bolt	1
7.2	Shim	1

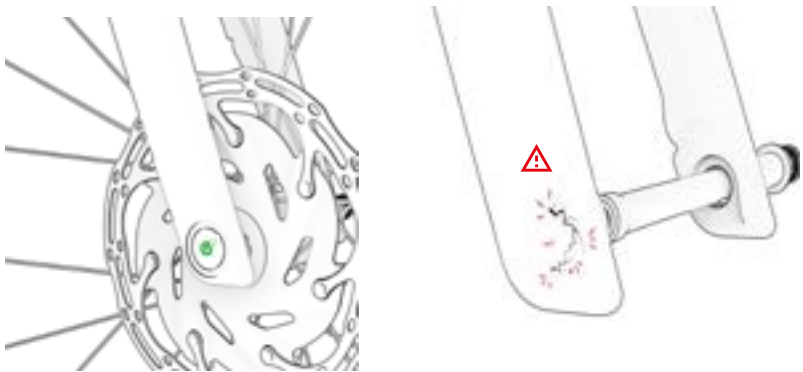


FORK AXLE ASSEMBLY

ALL MODELS

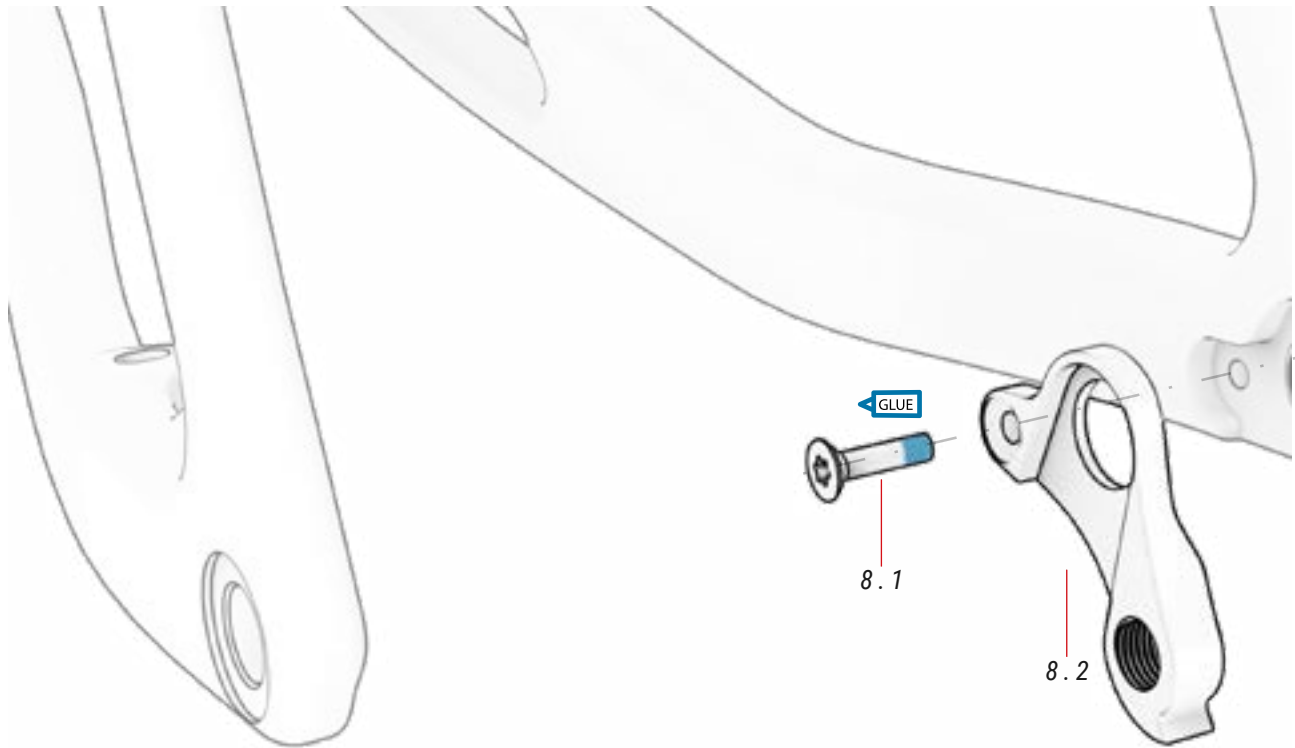
⚠ Tightening the axle without the wheel in place may cause the carbon to break after the housing.

Avoid tightening the axle when transporting the bicycle.



DROPOUT

ALL MODELS



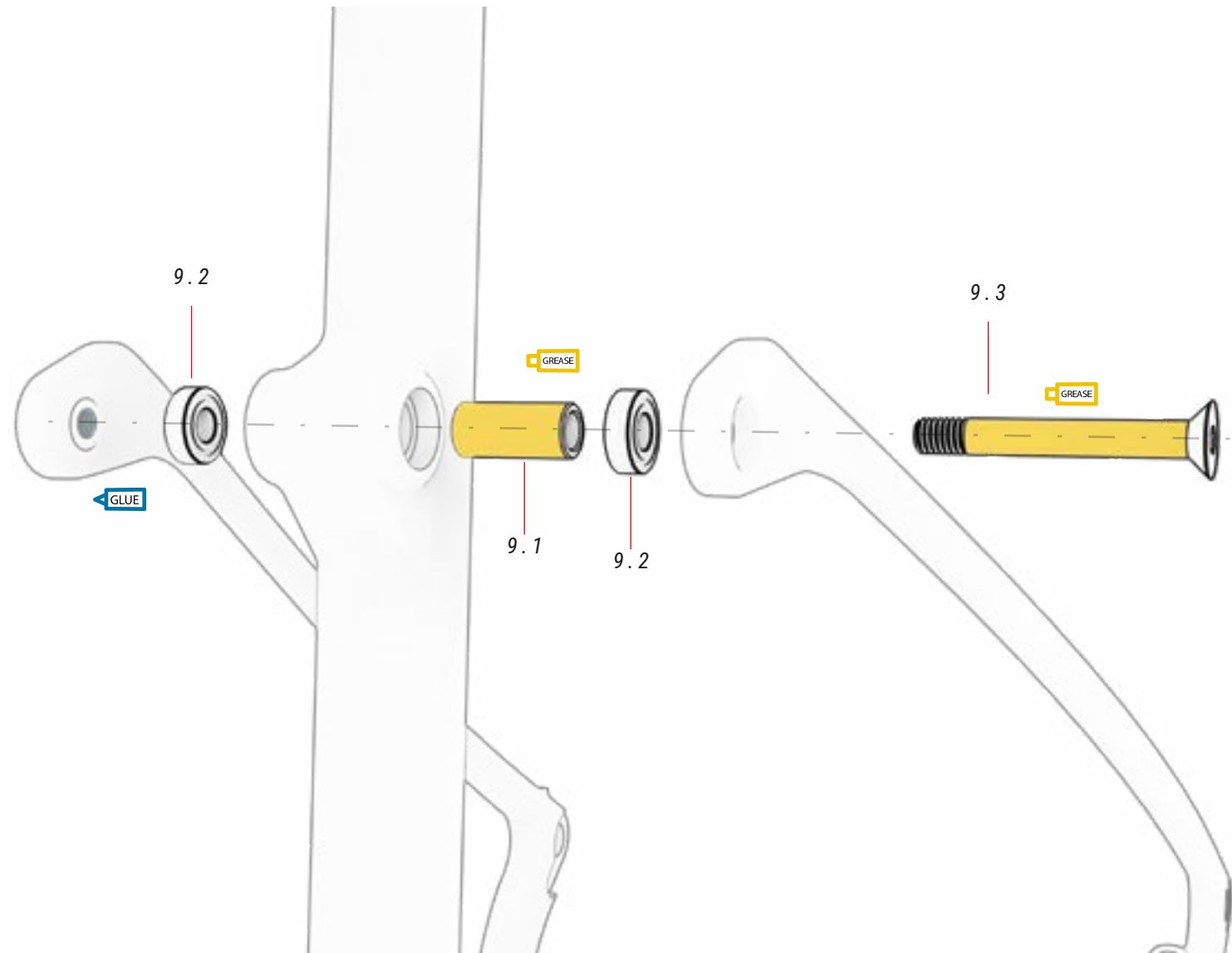
08 DROPOUT

ref.: 391780000

No.	Item	Quantity
8.1	Dropout	1
8.2	Screw M4xP0.7x10.5mm	1

FLEXIBLE JOINT ASSEMBLY

EC296 / EC286 / EC276 MODELS

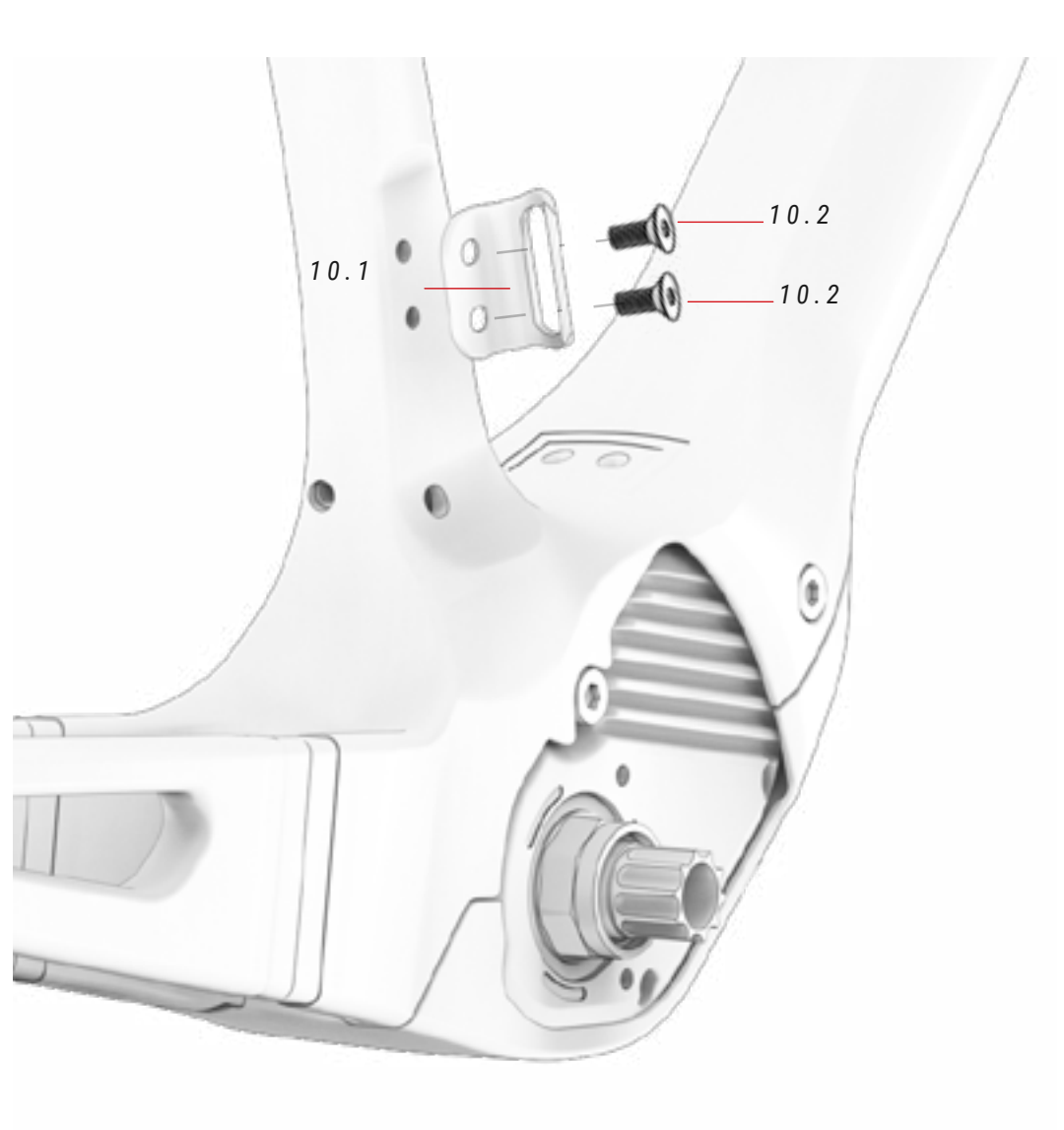


09 PIVOT ref.: 391836100

No.	Item	Quantity
9.1	Casing	1
9.2	Bearing	2
9.3	Axle	1

FRONT DERAILLEUR BRACKET

ALL MODELS

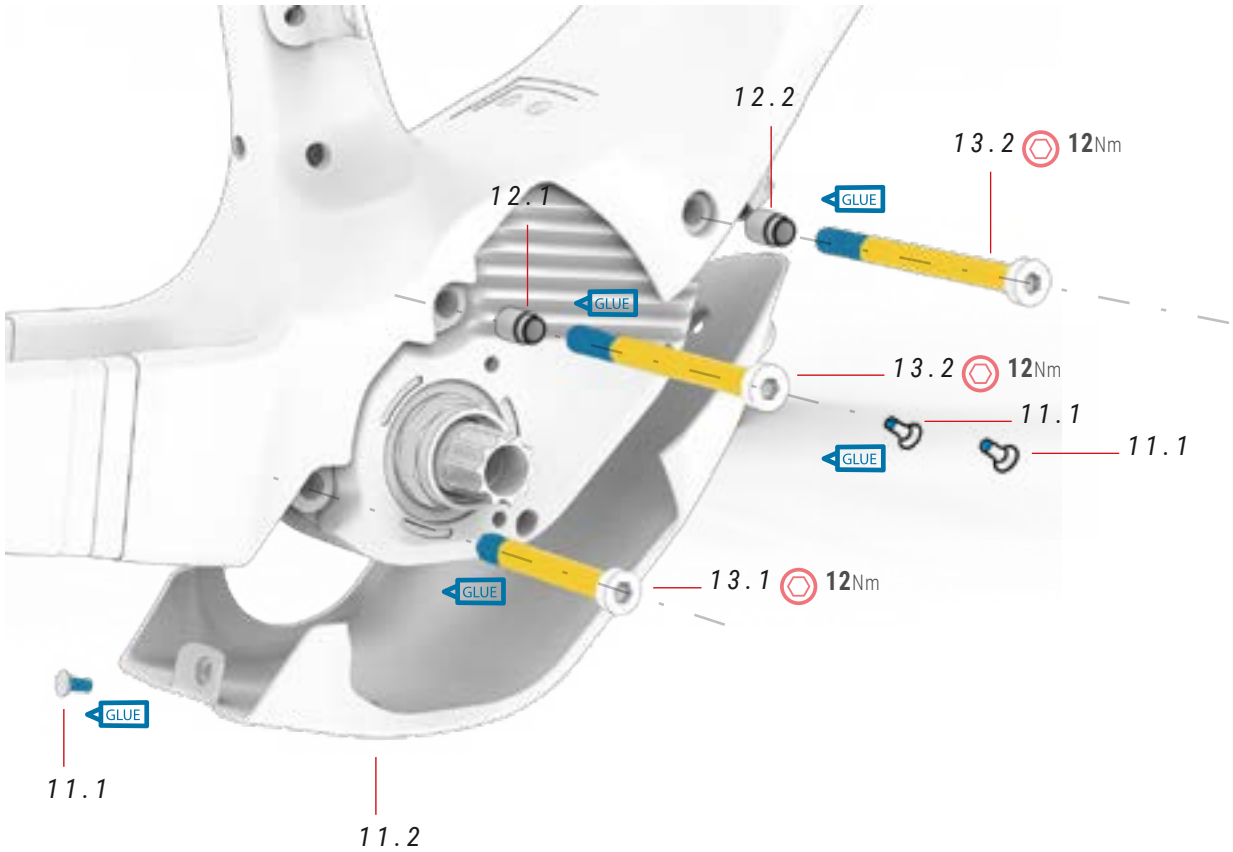


10 FRONT DERAILLEUR BRACKET ref.: 391813300

No.	Item	Quantity
10.1	Front derailleur bracket	1
10.2	Screws	2

MOTOR

ALL MODELS



EC295 / EC285 / EC275

11 MOTOR COVER *ref.: 391849400*

No.	Item	Quantity
11.1	Motor cover screw	3
11.2	Motor cover	1

12 MOTOR BUSHING *ref.: 381564700*

No.	Item	Quantity
12.1	Long engine bolt bushing	1
12.2	Medium engine bolt bushing	1
12.3	Short engine bolt bushing	1

EC295 / EC285 / EC275

13 MOTOR NUTS AND BOLTS *ref.: 381568800*

No.	Item	Quantity
13.1	Screw $\varnothing 13 \times 4.4 / \varnothing 8 / M8 \times P1.25 \times L23 / 65$	1
13.2	Screw $\varnothing 13 \times 4.4 / \varnothing 8 / M8 \times P1.25 \times L18 / 88.5$	2

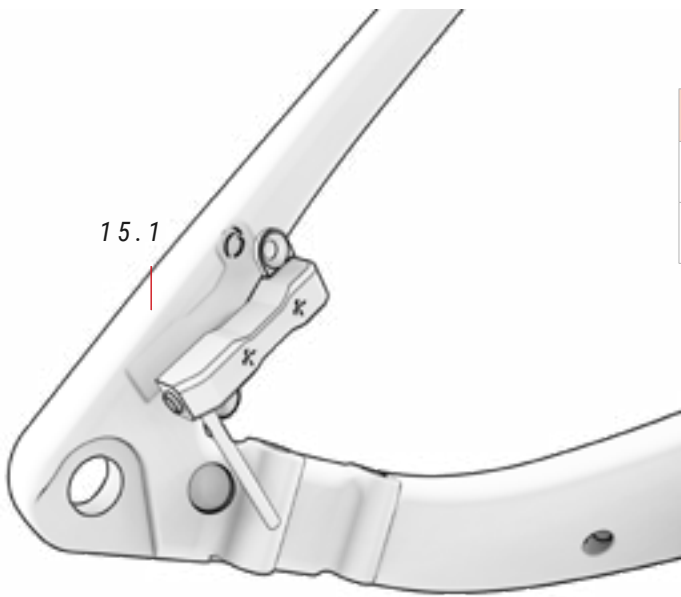
EC245 / EC225

14 MOTOR NUTS AND BOLTS *ref.: 381560400*

No.	Item	Quantity
14.1	Screw $\varnothing 13 \times 4.4 / \varnothing 8 / M8 \times P1.25 \times L17 / 82$	1
14.2	Screw $\varnothing 12 \times 4.5 / \varnothing 8 / M8 \times P1.25 \times L15 / 70$	1
14.3	Screw $\varnothing 13 \times 4.4 / \varnothing 8 / M8 \times P1.25 \times L17 / 87$	1

SPEED SENSOR MAGNET

ALL MODELS

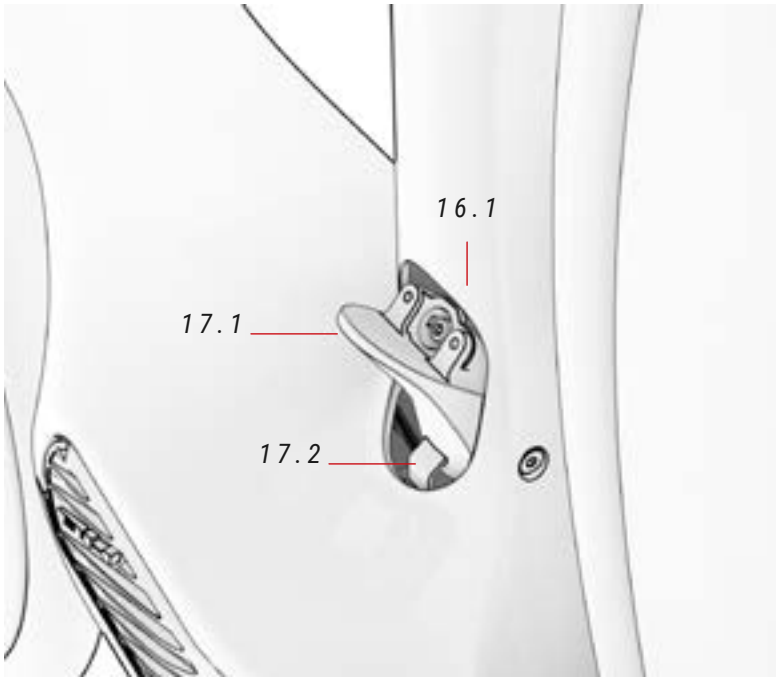


15 SPEED SENSOR *ref.: 387463300*

No.	Item	Quantity
15.1	Speed sensor	1
15.2	Speed sensor magnet	1

CHARGING PORT

ALL MODELS



16 CHARGING PORT *ref.: 386136200*

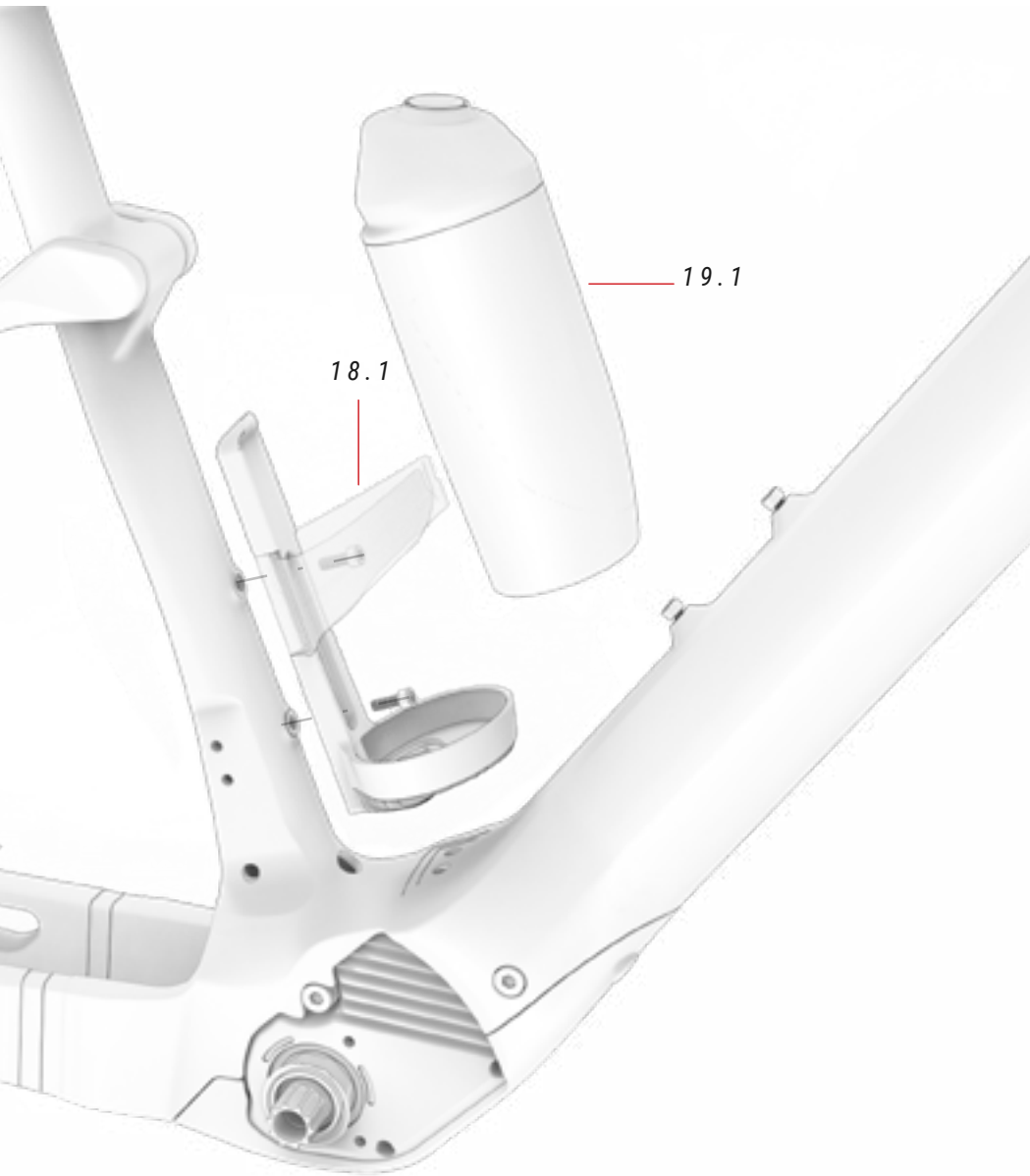
No.	Item	Quantity
16.1	Charging port	1

17 CHARGING PORT CAP *ref.: 391836400*

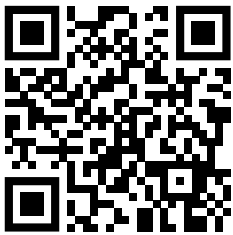
No.	Item	Quantity
17.1	Cap	1
17.2	Support	1
17.3	Screw	1

XPRO DUAL DISCHARGE BOTTLE HOLDER

ALL MODELS



XPRO DD BOTTLE HOLDER
ASSEMBLY VIDEO



0

<https://youtu.be/UrMfZvXCPnA>

⚡ Refer to the section "Wiring diagrams of the electrical system" in this manual for information about the proper fitting and installation of all electrical components.

⚠ Excessively long bolts on the down tube may cause damage to the battery that is not covered by the warranty. Never force the bolts.

⚠ Non compatible with XPRO+.

18 BOTTLE HOLDER KIT ref.: 387464000

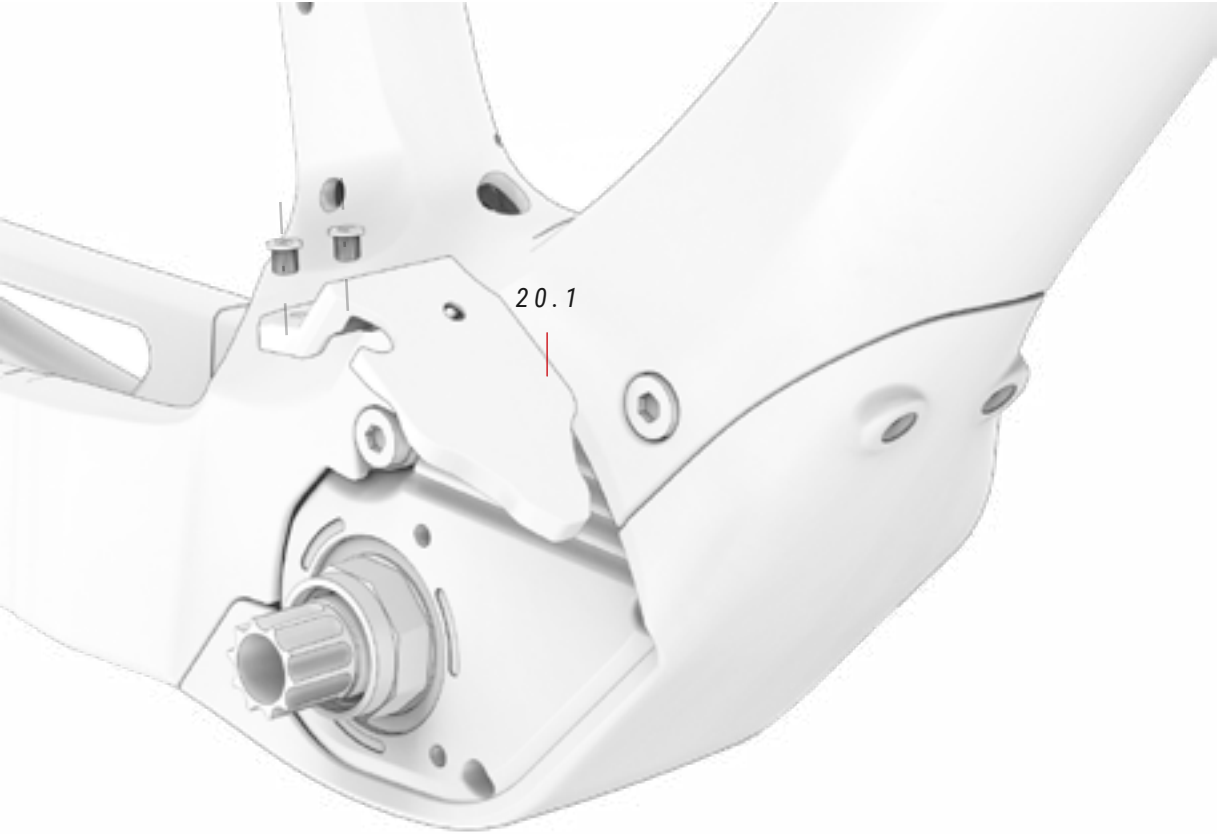
No.	Item	Quantity
18.1	XPRO DD bottle holder	1

19 XPRO DD BOTTLE ref.: 387464100

No.	Item	Quantity
19.1	XPRO DD bottle	1

BATTERY HOLDER

ALL MODELS

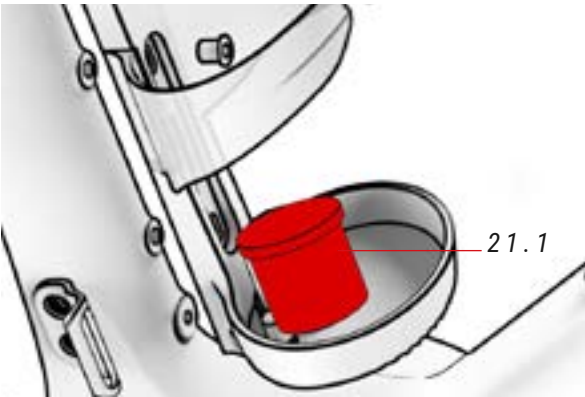


20 BATTERY HOLDER ref.: 387462900

No.	Item	Quantity
20.1	Battery holder	1

21 XPRO COVER ref.: 386139400

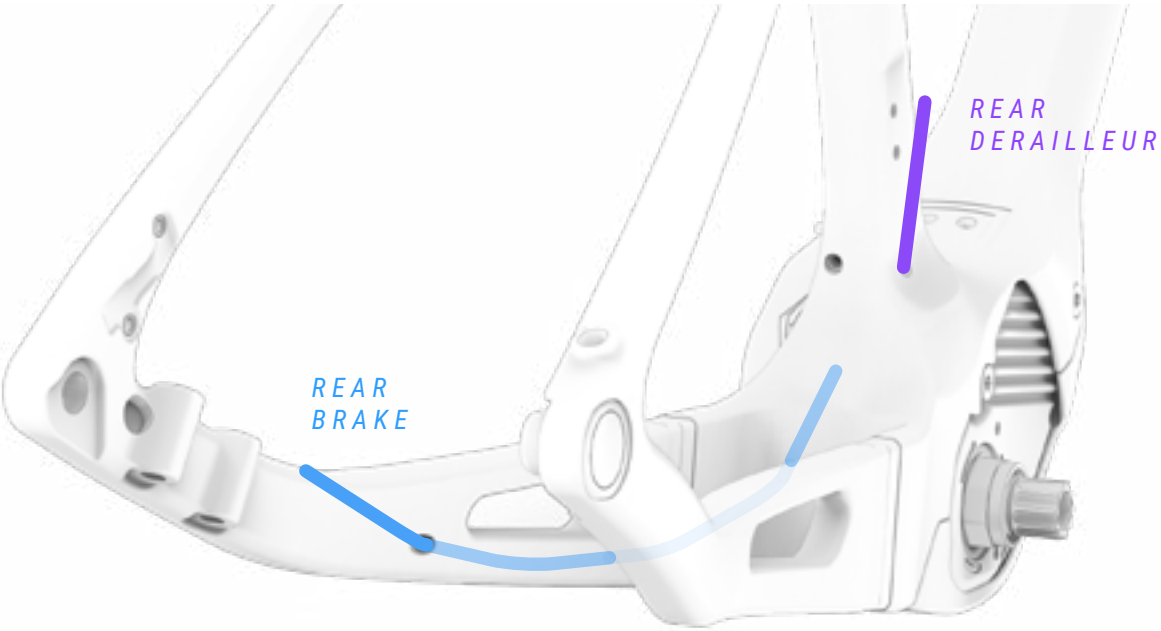
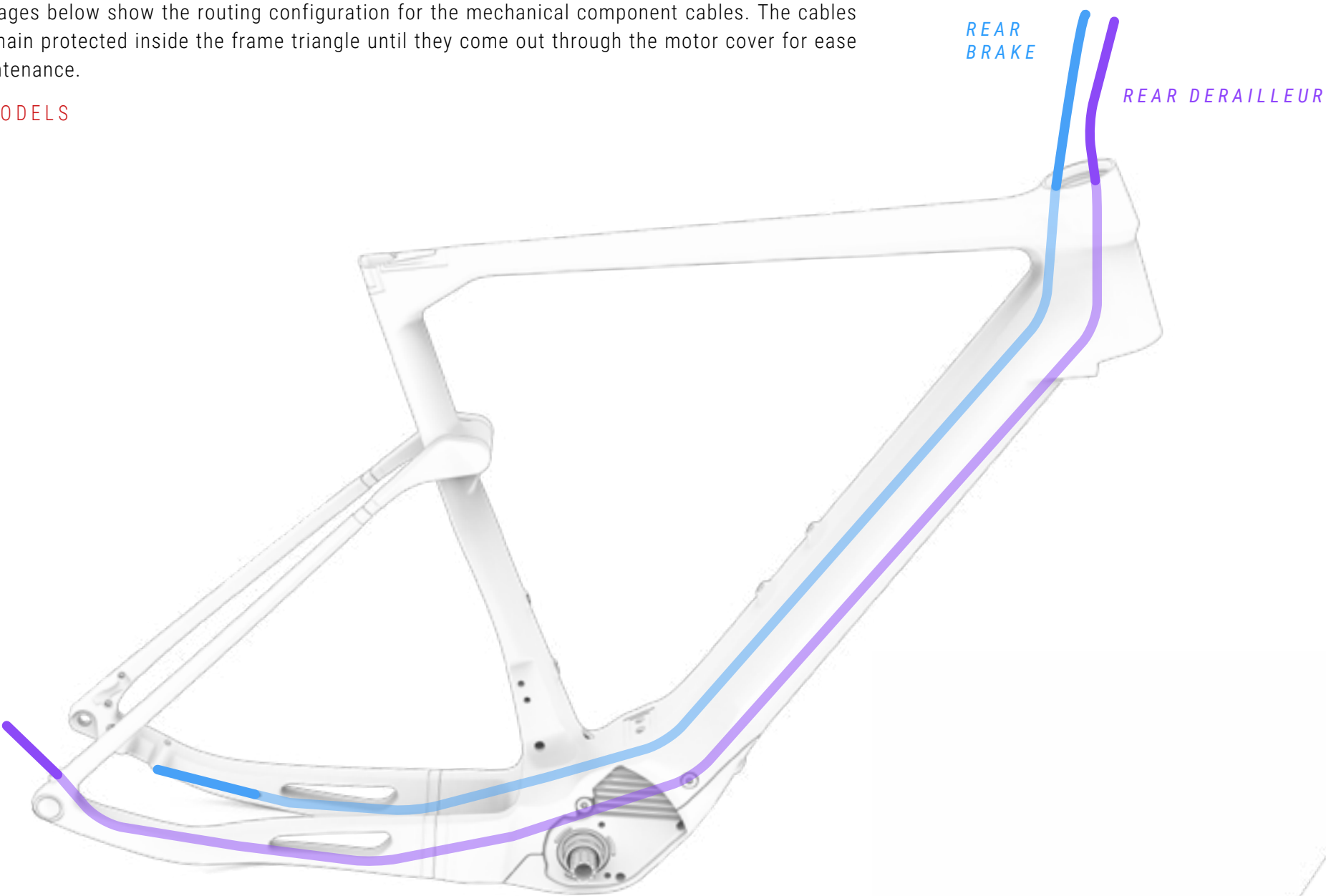
No.	Item	Quantity
21.1	XPRO cover	1



CABLING OF THE MECHANICAL PARTS

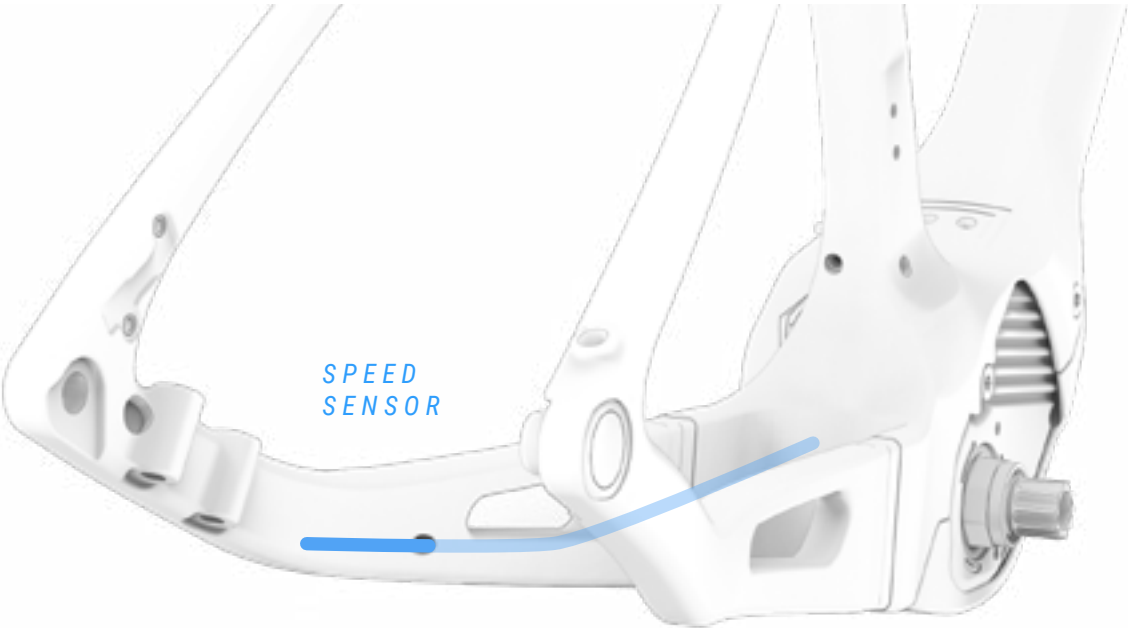
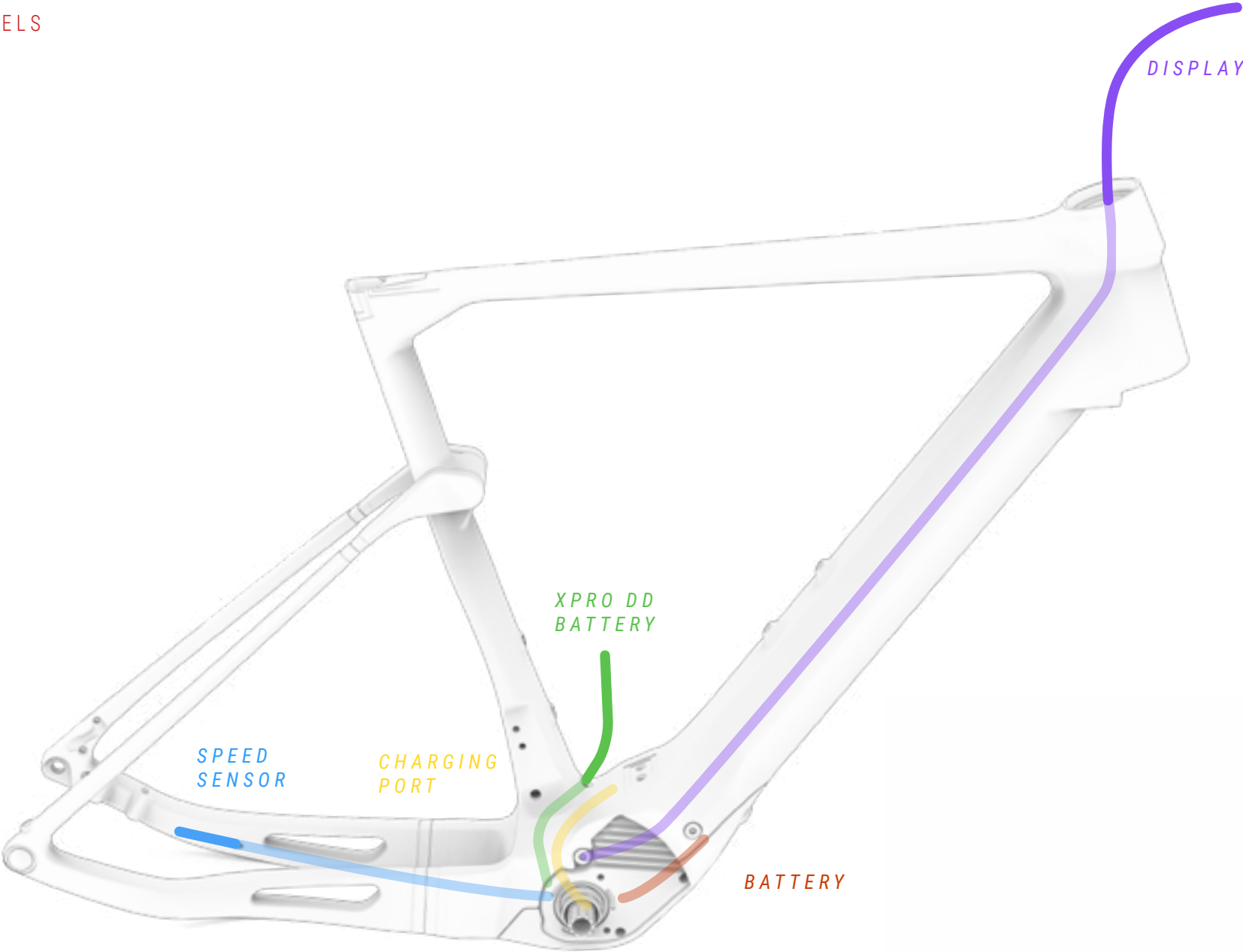
The images below show the routing configuration for the mechanical component cables. The cables will remain protected inside the frame triangle until they come out through the motor cover for ease of maintenance.

ALL MODELS



CABLING OF THE ELECTRICAL SYSTEM'S PARTS

ALL MODELS

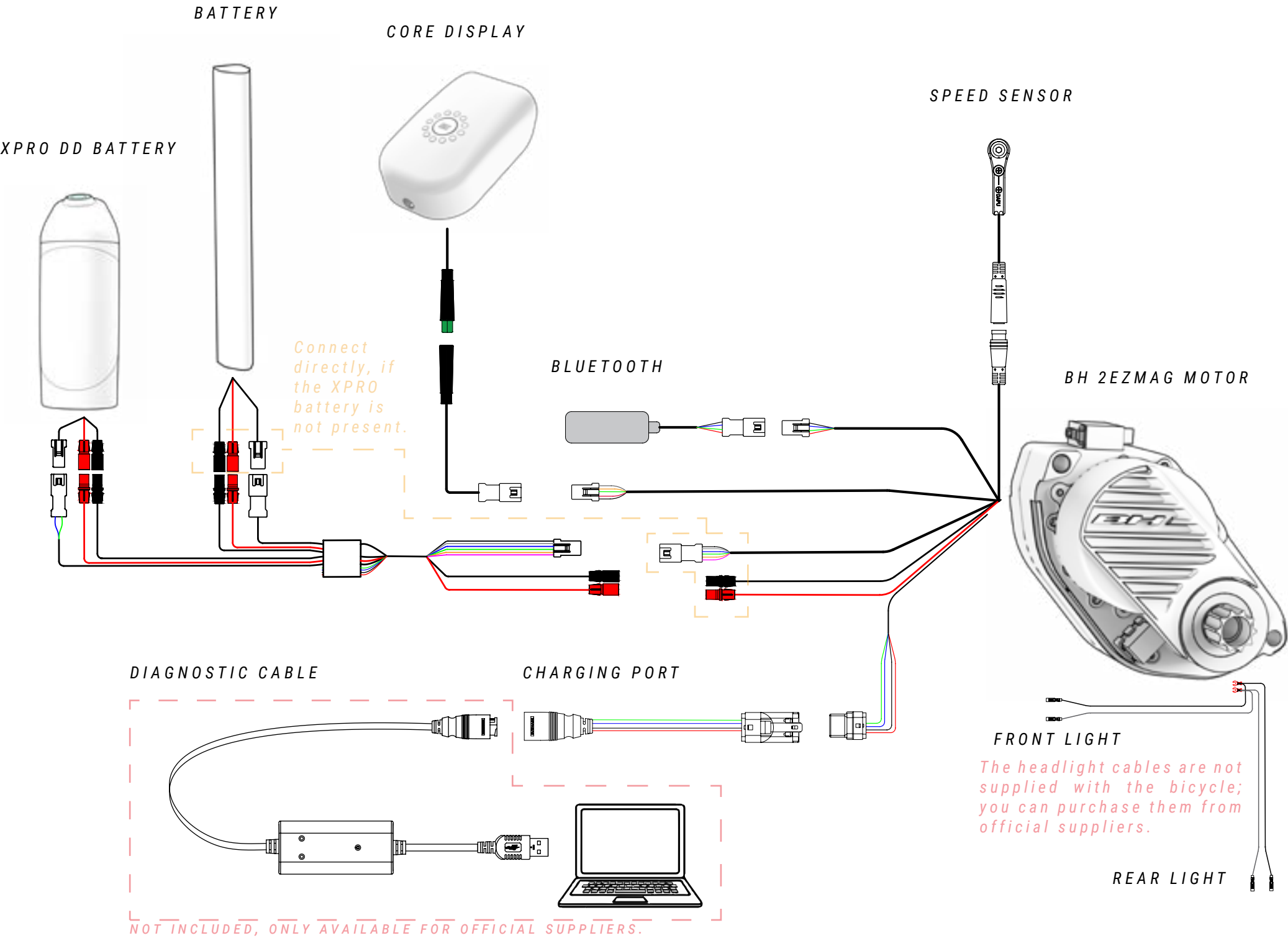


⚠ Incorrect handling of the electrical components may cause damage, which will not be covered by the warranty. Such damage may cause serious injuries or even death.

BH recommends going to an official dealer when a diagnosis, repair or installation of electrical components is required. These tasks require advanced technical knowledge.

WIRING DIAGRAM OF THE ELECTRICAL SYSTEM'S PARTS

ALL MODELS



⚠️ Incorrect handling of the electrical components may cause damage, which will not be covered by the warranty. Such damage may cause serious injuries or even death.

BH recommends going to an official dealer when a diagnosis, repair or installation of electrical components is required. These tasks require advanced technical knowledge.



⚠️ When electrical connections come into contact with damp spots or are clogged due to external contamination, a chemical reaction occurs, causing a build-up of lead sulphate crystals in the connections. In other words, the copper on the contacts will rust, resulting in conductivity problems.

The warranty does not cover damage caused by incorrect maintenance of the bicycle's connections. To prevent rust, simply clean the connections (male and female) at regular intervals, using dielectric deoxidisers like the one shown in the image above.

10 DECLARATION OF CONFORMITY

EU Declaration of Conformity



The manufacturer:

BH BIKES EUROPE, SL
c/ Perretagana 10,
01015 Vitoria, Spain

Hereby declares that the following products:

Product description:

 Cycles –Electrically power assisted cycles –EPAC Bicycles

Models designation:

ATOMX LYNX 9.9, ATOMX LYNX 9.8, ATOMX LYNX 9.7, ATOMX LYNX 8.7, ATOMX LYNX 9.2, ATOMX LYNX 9.0,
ATOMX LYNX 8.4, ATOMX LYNX 8.2, ATOMX CROSS,

iLYNX+ NX ENDURO CARBON 9.8, iLYNX+ NX ENDURO CARBON 9.7, iLYNX+ NX ENDURO CARBON 9.6,
iLYNX+ NX TRAIL CARBON 8.8, iLYNX+ NX TRAIL CARBON 8.7, iLYNX+ NX TRAIL CARBON 8.6,
iLYNX+ NX ENDURO 9.1, iLYNX+ NX ENDURO 9.0, iLYNX+ NX TRAIL 8.0, iLYNX+ NX TRAIL 7.9,

iLYNX+ SL ENDURO CARBON 9.8, iLYNX+ SL ENDURO CARBON 9.7, iLYNX+ SL ENDURO CARBON 9.6,
iLYNX+ SL TRAIL CARBON 8.8, iLYNX+ SL TRAIL CARBON 8.7, iLYNX+ SL TRAIL CARBON 8.6, iLYNX+ SL ENDURO 9.1,
iLYNX+ SL ENDURO 9.0, iLYNX+ SL TRAIL 8.0, iLYNX+ SL TRAIL 7.9,

iLYNX TRAIL CARBON 8.9, iLYNX TRAIL CARBON 8.7, iLYNX TRAIL CARBON 8.5, iLYNX TRAIL 8.2, iLYNX TRAIL 8.1,
iLYNX TRAIL 8.0, iLYNX TRAIL 7.9, iLYNX RACE CARBON 7.8, iLYNX RACE CARBON 7.7,

iAEROLIGHT 1.9, iAEROLIGHT 1.8, iAEROLIGHT 1.7, IRS1 CARBON 1.6, IRS1 CARBON 1.5, iRS1 CARBON 1.4, iRS1 1.2,

iGRAVELX NX CARBON 2.9, iGRAVELX NX CARBON 2.7,

iGRAVELX CARBON 2.9, iGRAVELX CARBON 2.8, iGRAVELX CARBON 2.7, iGRAVELX 2.4, iGRAVELX 2.2,

CORE 29 PRO, CORE 29, CORE JET, CORE CROSS, CORE CITY WAVE, CORE STREET,

ATOM+ NX SUV, ATOM+ NX SUV WAVE, ATOM+ NX DIAMOND, ATOM+ NX DIAMOND WAVE, ATOM+ NX JET,
ATOM+ NX WAVE,

ATOMe LYNX PRO 8.2, ATOMe LYNX 8.0, ATOMe PRO, ATOMe JET PRO, ATOMe CROSS PRO, ATOMe SUV PRO-SE,
ATOMe SUV PRO-S, ATOMe SUV PRO, ATOMe DIAMOND WAVE PRO, ATOMe CITY WAVE PRO,

ATOM LYNX PRO 8.2, ATOM LYNX 8.1, ATOM LYNX 8.0, ATOM 29, ATOM CROSS PRO, ATOM JET, ATOM CROSS,
ATOM SUV PRO, ATOM DIAMOND WAVE PRO, ATOM CITY WAVE PRO, ATOM CITY WAVE, ATOM CITY, ATOM STREET

Year of manufacture:

2025 and 2026

Comply with all of the relevant requirements of the Machinery Directive (2006/42/EC).
Comply with Low Voltage Directive (LVD) 2014/35/EU
Comply with all of the relevant requirements of RD 339/2014, de 9 de Mayo.

Furthermore, the machine complies with all of the requirements of the Electromagnetic Compatibility Directive 2014/30/EU.

The production control is assured by our Quality Management System, which fulfills the requirements of the standard ISO 9001

The following harmonized standards have been applied:

DIN EN 15194 Cycles – Electrically power assisted cycles – EPAC bicycles;
DIN ISO 4210-1/2/3/4/5/6/7/8/9 Safety requirements for bicycles

Technical documentation filed at:

BH BIKES EUROPE, SL
c/ Perretagana 10,
01015 Vitoria, Spain

Prepared and reviewed by the BH Quality Department (Headquarters)

Rev.19

03/06/2025

Page 1 of 1

11 HELP AND ADDITIONAL RESOURCES

BH offers different channels to resolve your queries. In addition, you can join our global cyclist community on our social media.

TECHNICAL RESOURCES

You can find all of the resources you need to fine-tune your bicycle on the BH Bikes website. Click on the link below to access the user manuals, apps, warranties, display update files and videos that explain different operations:

<https://www.bhbikes.com/manuals>

You can also check out our step-by-step tutorials to learn how to maintain and fine-tune your bicycle on our specialised Youtube channel:

<https://www.youtube.com/user/ServicioTecnicoBH>

CONTACT US

Our authorised dealers have the necessary knowledge and resources to help you with anything you need in relation to your bicycle. Don't hesitate to contact your nearest store. You can find it by clicking on the link below:

https://www.bhbikes.com/es_INT/tiendas/buscador-de-tiendas

To contact us directly:

Tel.: + 34 945 13 52 02

info@bhbikes.com

P.I. Jundiz- Perretagana 10, 01015 Vitoria, Alava (Spain)

SOCIAL MEDIA

Join our global cyclist community. Discover the BH experiences of other cyclists and share yours.

10 DECLARATION OF CONFORMITY

 I GRAVEL X 2026

V0.0 | BH | 33



www.bhbikes.com



BH