EXPLORE THE SILENCE

MOTUL

USER MANUAL
MY 2025

INFORMATION

ELECTRIC MOTION
ZAC VIA DOMITIA
280 Rue du Trident
34740 VENDARGUES
FRANCE

www.electric-motion.fr

Projet cofinancé par le Fonds Européen de Développement Régional

Table of contents

1. Manual introduction

1.1 Important message from *Electric Motion*

Congratulation and thank you for purchasing an *Electric Motion* electric motorcycle. We welcome you in our family devoted to electrons.

Electrical production on national grids becoming more and more clean and renewable, we are proud to provide you with an alternative to internal combustion engines and therefore allowing you to take part in solving the serious challenges we all face with air pollution and global warming.

The use of this electric motorcycle requires you to respect some recommendations and precautions in order to enjoy all the advantage that can offer this new clean alternative.
It is therefore imperative to read this manual which contains all the necessary information for preparing for the motorcycle first use, on how to operate it, on how to maintain the motorcycle and on what checks need to be carried. Furthermore, this manual contains all the information to prevent yourself and third parties from risks and accidents linked to the use of an electric motorcycle.

Because the *Electric Motion* team is continuously improving their products, it is possible that some information contained in this manual might change due to updates. If you have any doubt, do not hesitate to check our website www.electric-motion.fr/en/ and download the latest version of the manual. Thus, no juridical claim can be conducted based on the information contained in this manual.

The content of this manual will allow you to maintain your bike in perfect working order in the most secure way possible.

1.2 About this manual

Keep the user manual in an easily accessible location, so that it is close to hand when required.

The "right" and "left" designations refer respectively to the right or the left of the rider when he is in the driving position.

To illustrate all the maintenance operations, or to clearly designate elements of the motorcycle, pictures were used. Since *Electric Motion* is constantly improving their product, it is possible that certain parts of the motorcycle will change in geometry or in colors. However, this does not affect the operational processes explained in the manual.

The owner's manual is an important part of the vehicle. It must be transferred from owner to owner upon resale of the vehicle.

⚠ In this manual, the **CAUTION** designation will alert you to an object or situation that may cause injury to you or a third party or also damage your vehicle.

2. Safety instructions

2.1 Regulatory use

The *Electric Motion* motorcycles have been designed and built to withstand mechanical stress resulting from road, trial and trial touring use.

EM bikes are not intended for Pit Bike, Enduro, Motocross, Freestyle use.

EM disclaims all responsibility for the above-mentioned use.

They have been assembled in order to be homologated (EU) and thus has all the equipment necessary to be ridden on roads opened to traffic. It is therefore forbidden to modify the accessories installed as standard on the motorcycle. *Electric Motion* cannot be held liable for any modifications to the accessories installed on the motorcycle.

⚠ Use only *Electric Motion* parts. These parts have been tested and approved by *Electric Motion*. Under no circumstances should you try to replace the motorcycle components such as the battery pack or the engine with components of another brand, at the risk of causing irreversible damages to your vehicle.
Electric Motion does not assume any responsibility for the adaptation of unapproved parts.

2.2 Operating information

In order to guarantee a safe operation of the motorcycle, it is forbidden to carry out any modification on the vehicle.

For example, it is formally prohibited to use the vehicle if the vehicle, or one of its components, hasn't been properly maintained or if it is used outside the scope of the intended use. It is also forbidden to open the motor or the battery pack.

⚠ Any modification carried out on the vehicle by the customer does not render *Electric Motion* liable and voids any form of manufacturer's warranty.

⚠ Do not use the vehicle under the influence of alcohol, any medicine that could alter your capacity to drive or illegal drugs, or if you are not physically or mentally able to drive.

⚠ When using the vehicle, some components will start moving (chain, wheels) and will become dangerous for the user. It is important to take the right measures to avoid any unnecessary risks.

2.3 Protective clothing

To reduce the risks of potential injury while riding an *Electric Motion* motorcycle, on road or off road, it is necessary to be equipped with all compulsory protective clothing.

For any kind of trip and for any person that will ride the motorcycle, it is necessary to wear the correct protective clothing (helmet, boots, gloves, trousers and jacket equipped with protective means).

⚠ Failure to wear safety clothing or wearing damaged safety clothing is a serious safety hazard and can result in serious injury or death.
Like the driver, the passenger must also carry all the necessary protective clothing when riding the motorcycle behind the driver.

⚠ Only use protective clothing that is in perfect condition and complies with the legal requirements of the country of use.

2.4 Environment

In order to guarantee the durability of motorcycle driving, it is necessary to respect the rules of goodwill on the road with other users, motorized or not. Ensure that you remain within the legal framework of the use of a motorcycle. Be respectful to the environment and road users and take into account the rights of other road users.

When the motorcycle parts are disposed of, be sure to comply with the recycling regulations of the country of use, in particular the battery pack.

⚠ Electrical components (motor, battery, etc.) and electrical appliances (battery charger) should not be treated as household waste and require strict recycling.
If you have any questions about the rules for recycling, contact *Electric Motion* Customer Service.

2.5 Location of important labels

Safety instructions are present in various places on the motorcycle. They allow the user to protect himself from certain risks associated with the maintenance of the motorcycle and to preserve the physical integrity of the motorcycle, its driver and its passenger.

- Epure FACTOR-e

1	Manufacturer label
2	Warning label

- Escape R

1	Manufacturer label
2	Warning label

Never remove the warning labels. They allow the driver to avoid getting injured by exposing himself to a danger that cannot be recognized without the presence of these stickers.

2.6 Fire hazard

As long as the battery pack remains in good working condition, there is no particular fire hazard on this vehicle. However, if the vehicle catches fire, it is necessary to inform the fire brigade that the fire originated from an electric vehicle with a lithium-ion battery.

When the battery pack is damaged, it may present a fire hazard. If the battery pack is damaged, contact *Electric Motion* customer service promptly.

2.7 Fall or accident

A fall or a road accident can damage the motorcycle significantly. After a fall or an accident, make a complete inspection of the vehicle to make sure that the users of the motorcycle do not expose themselves to any danger before riding again.

A vehicle damaged for any reason may become a danger to users. In case of damage to the electrical components, please contact the *Electric Motion* customer service promptly.

2.8 Waterproofing

Below is the maximum immersion level for the motorcycle. I If you suddenly feel a fault, please switch off the motorcycle and the battery and contact your dealer.

3. Important observations and general information

3.1 Emission information

The development of its motorcycles by *Electric Motion* has made it possible to obtain a zero-emission vehicle that does not emit any harmful particles for the environment. Therefore, it has no exhaust or evaporative emission.
This motorcycle does not use gasoline, engine oil or any other liquid fuel.

3.2 Manufacturer's warranty and legal warranty

All the work detailed in the maintenance guide must be carried out exclusively by a professional in order to retain the warranty right.

The warranty is cancelled in the event of damages resulting from manipulation or modification on the vehicle made by a person not certified by *Electric Motion*.

For additional information on the manufacturer's warranty and how to obtain it, contact *Electric Motion* customer service.

3.3 Vehicle range

The range of the motorcycles is defined as the distance the vehicle travels on a single full charge of the battery.
It is then easy to understand that the range of the vehicle depends on how it is used. The more conservative you ride, the better range you can expect from your motorcycle.

There are many factors affecting the range, such as speed, acceleration, number of regenerative braking, weather conditions, tire pressure and payload.

For the first use of your motorcycle, you are advised to remain cautious, so you become fully aware of the range of your vehicle according to your driving style.

After you were able to make your own idea about the potential of the model, you can adapt your driving style to the range you would like to achieve.

⚠ The range values in this manual are measured according to different standards, which may vary depending on the country of use.

In order to improve the range of your vehicle, all these characteristics must be considered:

Low range	Important range
Travelling at high speed	Low speed travel
Bad road condition	Good road condition
Important elevation	Low elevation
Aggressive driving	Smooth driving
Important payload	Low payload
Cold temperature	Hot temperature
Adverse weather conditions	Good weather conditions
Under inflated tires	Properly inflated tires
Poor general maintenance of the motorcycle	Good general maintenance of the motorcycle

3.4 Transport of the vehicle

The transport of the motorcycle can be carried out with the help of an approved trailer or a utility vehicle.
It is important to ensure that the motorcycle is securely fastened before transporting it on the public road. The use of certified straps to maintain the motorcycle is recommended to avoid any accidents related to the loss of the vehicle on public roads.

3.5 Spare parts and accessories

For safety reasons, we recommend that users of *EM* Motorcycles only use spare parts and accessories authorized and recommended by *Electric-Motion* and have them fitted by a professional.

The company *Electric Motion* will decline any responsibility in case of equipment deterioration caused by products not approved by the brand.

For information on spare parts and their installation, contact the *Electric Motion* customer service or on our website www.electric-motion.fr/en/.

3.6 Lifetime optimization

In order to optimize the life of the vehicle, it is important to perform the maintenance tasks listed in the user manual at the right mileage/time of use.
Maintaining maintenance intervals is important to keep a vehicle in good working condition and to avoid early wear.
Furthermore, incorrect adjustments of the chassis results in premature wear of the vehicle.
It is important to refer to the vehicle maintenance manual.

3.7 Power supply

Model	EPURE RACE - FACTOR-e / ESCAPE X – XR - R
Voltage	Min : 42V / Nom: 50.4V / Max: 58.8V

It is possible to mount / dismount the battery pack during some maintenance process. (☞ https://www.electric-motion.fr/en/my-em-en/instruction-videos).

3.8 Parts and consumables

To maintain your vehicle, it is important to use parts and consumables (lubricants and maintenance products) in accordance with the specifications given in the user manual.

3.9 Operation under extreme conditions

The motorcycles of Electric Motion are not sensitive to water drops and rain. However, care must be taken to ensure that the water level on the road being ridden does not exceed the foot-rest height.

⚠ In the event of the rider being stopped on a road with a high level of water, it is necessary to turn off the motorcycle to avoid a short circuit or a breakdown.

The motorcycles can be used over a wide range of temperatures: -15°C to +55°C (5°F to 131°F).

⚠ The battery life of the different models depends on the operating temperature:

Operating temperature (°C)	-15°C (5°F)	-10°C (14°F)	0°C (32°F)	25°C (77°F)	40°C (104°F)	55°C (131°F)
Decrease in battery range	-30%	-25%	-15%	-0%	-3%	-4%

⚠ Use of the vehicle in extreme conditions (sand, mud) leads to premature wear of the motorcycle's consumables (chain, brake pads, various bearings). It is then necessary to carried out the checks and the maintenance operations more often than prescribed in the manual of use.

⚠ High continuous solicitation ride can lead to a power and speed limitation to manage internal temperature. In this case, reduce the solicitation to continue ride.

3.10 Reception of the motorcycle

When receiving your motorcycle, it is necessary to perform some operations to make the motorcycle usable (assembly of parts protected during transport). Please refer to the corresponding chapter (☞ 8).

4. Vehicle identification

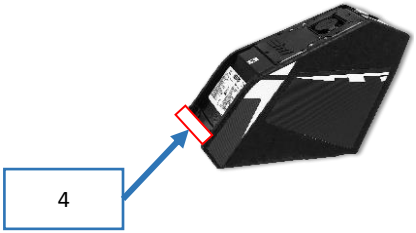
4.1 Epure FACTOR-e

4.1.1 Chassis number

4.2 European certification label

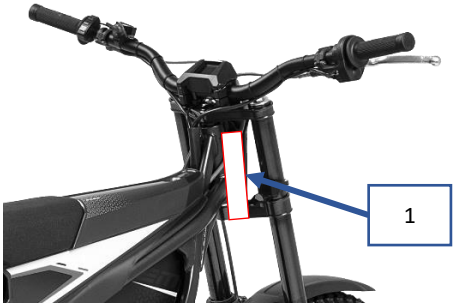
4.3 Engine number (references)

4.4 Battery number (references)

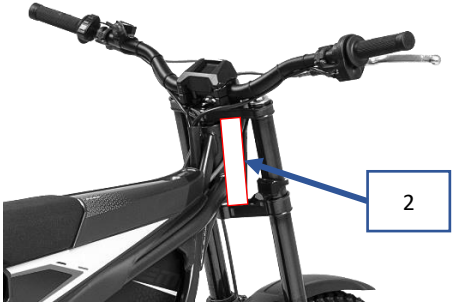


4.3 Escape R

4.3.1 Chassis number

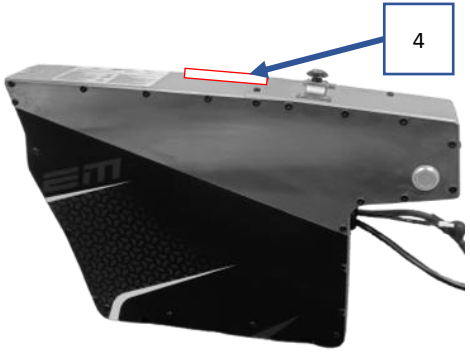


4.3.2 European certification label



4.3.3 Motor number (references)

4.3.4 Battery number (references)



5. Overall view of the vehicle

5.1 Epure FACTOR-e

5.1.1 Right view

5.2.1 Left view

5.4 Escape R

5.4.1 Right view

5.4.2 Left view

6. Technical data

Model	Epure Race / FACTOR-e / ~~Epure Sport~~ ~~Epure Race~~ ~~Escape S~~ ~~Escape R~~ ~~Comp~~Epure Race/FACTOR-e	Escape R
Tyres	MICHELIN X11	
Fourche	~~R 16 V~~ ~~Reiger~~ ~~R 16 V~~ ~~R 16 V~~ ~~Reiger~~ TECH Aluminium Ø39 mm	Tech Steel Ø39 mm

6.1 Engine

Motor type	Escape R Epure Race/FACTOR-e
Nominal power	BLDC permanent magnet motor
Peak power	~~6~~5.3 kW
Maximal torque	11 kW
	Air

6.2 Tires

6.3 Fork

6.4 Shock absorber

Model	~~Epure Sport~~ ~~Epure Race~~ ~~Escape S~~ ~~Escape R~~ ~~Comp~~Epure Race/ FACTOR-e	Escape R
Rear Suspension	~~R 16 V~~ ~~Reiger~~ ~~R 16 V~~ ~~R 16 V~~ ~~Reiger~~TECH TJ2	R16V

7. Controls and Components

7.1 Epure Race / FACTOR-e

7.1.1 Front/rear brake system and adjustment

The front brake lever is located on the handlebars right-hand side. The rear brake pedal is located near to the right foot peg.

⚠ Before each use, check the condition of the brake system. A faulty brake system makes you vulnerable as well as the other road users.

7.1.2 Throttle grip

The throttle grip is located on the handlebars right-hand side.

⚠ Before each use, check that the throttle grip rotates and returns correctly to prevent any accident.

7.3 Lighting system

The headlight is installed on the forks located on the vehicle front and the taillight is installed on the rear subframe of the vehicle.
Electric Motion advises to always have the lights turned on.

Headlight:

The headlight can get hot when it is turned on.

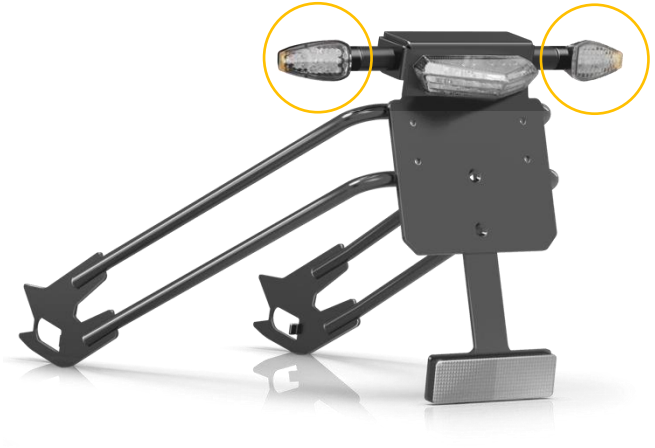
Taillight:

Make sure that the lighting system is always in working order. Riding without a lighting system does not allow other users to see you and does not allow you to see other users.
It is mandatory to have a lighting system in good working order.

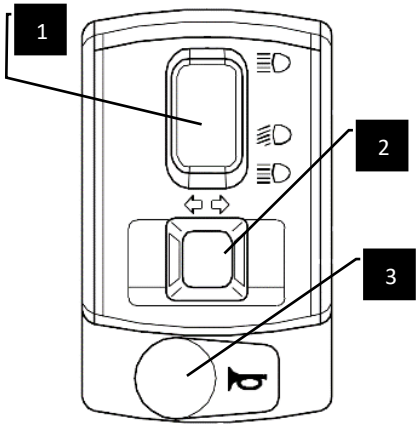
7.4 Turn signals

Front turn signals:

Rear turn signals:



7.5 Left-hand side handlebars switches



On the left side of the handlebar, le main magnet switch is lightning when the bike is ON and when the battery is ON

⚠ When you switch OFF the battery, this red LED will be OFF
The total extinction of this led can take a few minutes, but the battery is well shut.

7.6 Main magnet switch and map button

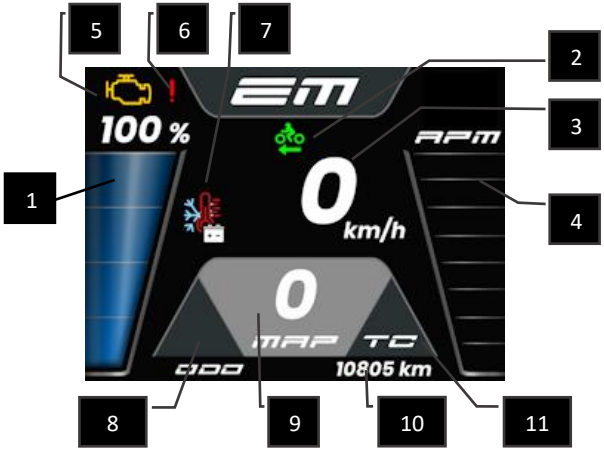
On the left side of the handlebar, the magnet switch is needed to switch ON the motorcycle.
When the magnet is installed, the motorcycle is ON.

Cluster switch ON.

Now you just need to push the map button to select the map needed.

7.7 Side stand

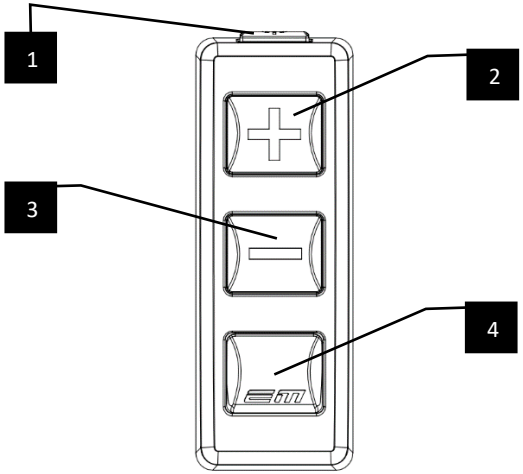
7.8 Dashboard



1	Battery charge indicator
2	“Ready to ride” Indicator
3	Speed (km/h to mph : >5 sec on ON/OFF button)
4	Engine Rpm
5	Engine default
6	High motor temperature
7	High/Low battery temperature
8	System warning indicator
9	Maps indicator
10	Total distance traveled or two partial trips
11	TKO or TC display

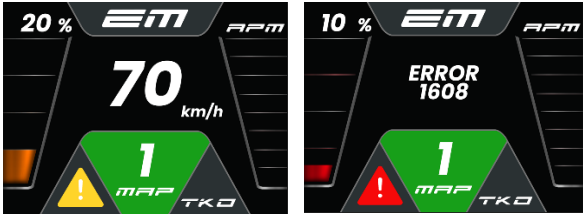
1	High beam light indicator
2	Blinkers indicator

7.9 MAP button



1	Button ⏻	**Simple click :** On/Off the screen **Prolonged press (> 5 s.) :** km/h to mph
2	Button +	**Simple click:** next superior MAP **Prolonged press (> 10 s.) :** Auto-setting
3	Button -	Next inferior MAP
4	Button TC or FRB	Activation of TC or FRB

7.10 Error Code

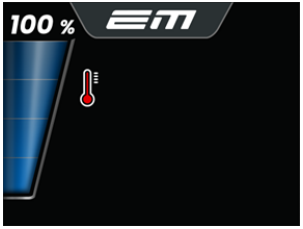


Limitation : The performance of the bike is reduced to avoid damaging the components. This indication is only informative.

Major warning : The bike has a default that prevents it from being used. An error code appears on the screen.
Try to start the motorbike 3 times by removing the safety magnet present to start the bike.
If the error code is still present, please contact Electric Motion customer service.

Error codes can be found in the list below:

Code displayed on screen	DTC	Description
200	P0C05	Motor phases disconnected
120	P0A2A + P0A3F	Encoder cable unplugged
100	P0A3F	Encoder malfunction
80	P0A3C	Controller overtemperature
40	P0A2F	Motor overtemperature
20	P0A2A	Motor temperature sensor fail
10	P0A1B	Generic controller malfunction



These temperature indicators appear when the battery temperature is below 10°C (Snowflake) or above 55°C (Thermometer).

The functioning of the bike is not affected by these indications. To avoid performance limitations, adjust your riding style.

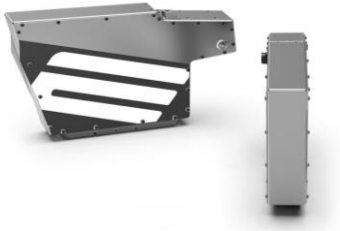
If the indicator is too high, avoid driving too sporty.

If the indicator is too low, you may run the bike or make sure you warm up the battery.

When your screen is in this configuration (only the battery level), the controller does not send a signal to the TCU, so you have to put the magnet in place to start the bike.

7.11 Battery pack

Epure battery



Escape battery

The battery is inside the battery pack. The casing of the battery pack makes it possible to protect all the cells composing the battery against the aggressions of the external environment. Up to a certain limit, the battery pack is protected against splashes of water, dust, and other harmful elements for the battery (rain, driving in dry weather). However, the user must be careful not to use the motorcycle under extreme conditions, otherwise the vehicle may be damaged irreversibly (full immersion of the motorcycle).

The battery pack uses a set of lithium-ion cells assembled in series. These elements have been tested to obtain the best performance while maintaining maximum reliability.

⚠ The battery pack is dimensioned to achieve the best possible reliability / performance ratio. It is possible, however, that certain maintenance operations will be carried during the lifetime of the vehicle.
All work on the electric components of the motorcycle, and especially on the battery pack, is accompanied with risks of causing electric arcs if precautions are not taken. Working on the electric components of the motorcycle requires special training, qualifications, and tools.
Therefore, all work that is not explicitly described in this manual, and which concerns an electronic device, must be done only by an *Electric Motion* qualified electrician.

Do not open the motor or the vehicle battery pack. If there are any problems with these items, contact *Electric Motion* Customer Service.

⚠ When receiving the motorcycle, it is important to charge the battery pack according to the recommended battery charging procedure.

⚠ Be sure to turn off the motorcycle after each use or whenever the motorcycle is not used for an extended period. Make sure that all the lights are turned off when the ignition key is switched off.

⚠ Please check the battery housing state after use and above all after a fall.

Battery management system (BMS)

The BMS (battery management system) is an internal component of the battery pack. It allows the management and the control of all the battery cells during charging and discharging of the vehicle.
The BMS therefore protects the battery with the help of an electric safety relay.

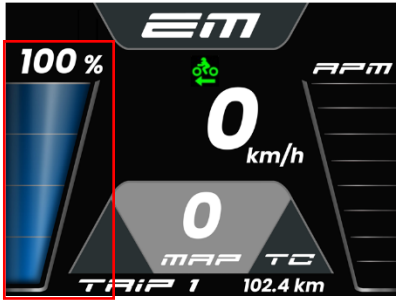
The main roles of the BMS are therefore:

- Prevent the charge of the battery when the outside temperature is below 0°C (32°F).
- Prevent the charge of the battery when the outside temperature is above 45°C (113°F).
- Prevent the discharge of the battery when the outside temperature is below -15°C (5°F).
- Prevent the discharge of the battery when the outside temperature is above 55°C (131°F).
- Allow a uniformly distributed charge of all cells in the battery pack.
- Optimize charging and discharging of the battery.

⚠ The BMS is a vital component of the motorcycle for its good working order. Do not try to modify it by any means.

Battery charge level

The battery pack is connected to the dashboard and therefore allows the display of the state of charge directly on the dashboard.



The battery charge indicator is composed of a gauge indicating the range of the motorcycle.

As you approach a 20% battery charge:

⚠ The battery is in low voltage, which means that the motorcycle can cut off to prevent any damages to the cells.

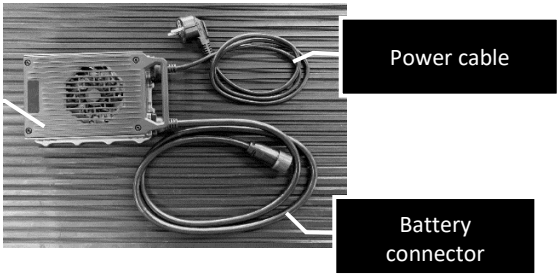
It is important to avoid excessive speeds and abrupt accelerations when the low battery indicator lights up and to reach a charging station as fast as possible.

⚠ If you plan on using any highway and depending on the battery charge left and the distance left to travel, check first that there is a charging station on your way or that there is a highway exit, so you don’t get stranded.

7.12 Battery charger

7.12.2 Escape R / Epure Race – FACTOR-e

The vehicle is delivered with a 15A charger.



⚠ In a wet environment, there is a risk of creating electric arcs when charging the vehicle. The battery charger is not humidity-proof. It is important to use the battery charger in a dry environment and to ensure that no liquid is spilled on the charger.

⚠ In case of incorrect handling of the battery charger, the safety of the user is not guaranteed.

⚠ Use the battery charger only with an *Electric Motion* battery pack.

Use the battery charger only by connecting it to a safe electric socket in accordance with the regulations in force in the country of use.
Do not use an adapter or extension cord other than the one already presents on the charger.

⚠ Do not modify the battery components by any means. Check that the charger's power cable and battery cable are in good condition before each use.

8. Commissioning

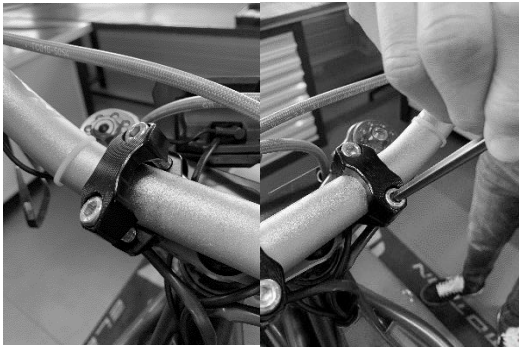
8.1 Preparation on receipt of the motorcycle in a shipping box

On receipt of the vehicle, the handlebar is disassembled.
It is therefore necessary to assemble all these components to use the motorcycle.

Assembling the handlebars upon receipt
The handlebar is supplied in the vehicle packaging and must be assembled in accordance with the following procedure:

- Unscrew the 4 M8 screw of the upper handlebar holder and remove them.
- Install the handlebar like the picture below.

- Install again the handlebar holder and the 4 M8 screw with a 6mm Allen key, tightening them at 14 Nm and taking care of the position of the handlebar.



- Take care of the wires during mounting, maintain them with cable tie.
- The handlebar inclination is at user's discretion.

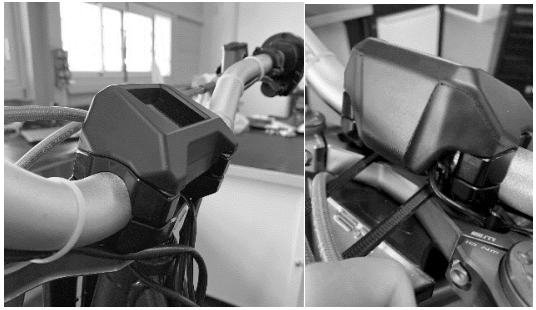
Assembling the dashboard upon receipt

The dashboard is supplied in the box in the vehicle packaging and must be assembled in accordance with the following procedure:

- Insert both plastic clamps supplied in the holes behind the dashboard.

- Slide the female part of the plastic clamps between the handlebar and the upper T-shape.

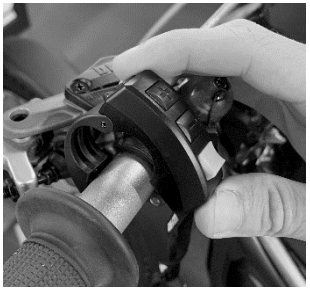
- Align the dashboard over the trigger guard and fasten the plastic clamps completely.

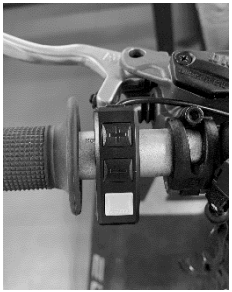


Assembling the command switch upon receipt

The command switch is supplied in the vehicle packaging and must be assembled in accordance with the following procedure:

- Loosen the fixing screw (pre-mounted on the switch) with a 2.5mm Allen key to release the clamp.
- Place the switch on the handlebar, taking care not to overstress the connection cable.





- Finalize the mounting and tighten the fixing screw.

8.2 Instructions for initial commissioning

Before using the motorcycle, the user must carefully read the entire user manual.
Because driving an electric motorcycle is a new driving experience, a period of adaptation is necessary to become familiar with the new sensations that it brings before being fully confident when traveling on roads open to others traffic users.
Before using the motorcycle on the road, ride it in a secure area to get acquainted with riding an electric motorcycle. Try all settings on the vehicle and get familiar with the results.
To maintain control of your vehicle, always hold the handlebars with both hands and keep your feet on the foot pegs.

⚠ Do not use the vehicle if you are not in full possession of your means.
Adapt a cautious behavior for you and other road users.
Do not exceed the vehicle's permissible payload.
Do not leave your vehicle unattended (risk of theft).

⚠ An electric motorcycle makes no noise when it is turned on, do not let yourself be caught by surprise.

⚠ When the battery level is low, the motorcycle keeps working on an energy saving mode. The vehicle power is reduced but it is in no way a breakdown. After charging the battery, full power will be available again.

⚠ When the battery has been over discharged, the motorcycle will not start charging straight away. It is necessary to wait until the vehicle automatically start charging again.

8.3 Battery Charging Procedure

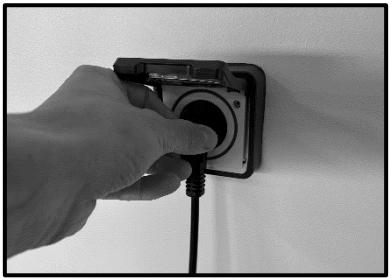
8.3.2 Escape R / Epure Race – FACTOR-e

The procedure for charging the vehicle being meticulous, it is important to be familiar with this procedure before the first charge of the battery.
The battery must be charged over a temperature range from 0°C to 40°C.

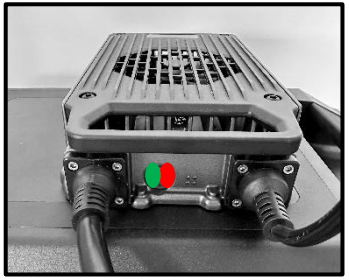
⚠ For a better battery life, it is advised to no charge the battery directly after riding, but to wait 30min.

⚠ Due to the strong current involved, electrical arcs may occur when connecting the connector to the battery.
Use only the charger supplied with the motorcycle to charge the battery. This charger is designed to operate only with a lithium polymer battery.
Always place the charger on a flat, solid surface in a dry, ventilated area.
Never cover the charger while charging the battery, otherwise it may interfere with its ventilation and cause the charger to overheat.

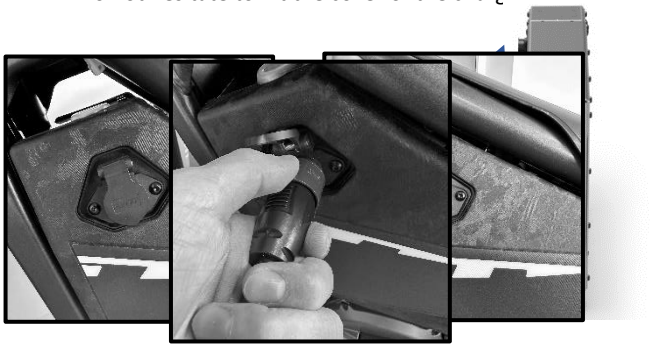
- Stop and switch off the motorcycle (👍 9.10).
- Plug the charger on the wall plug.



- Verify that the LED is blinking green and red:

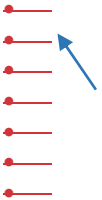


- Plug the charger to the battery.
- Do not hesitate to lift the cover of the charg



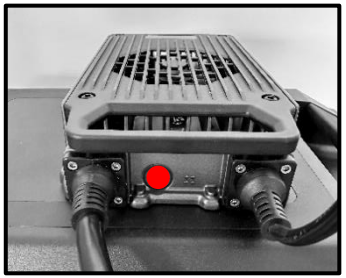
stop position. ~~Côté gauche~~ ~~Côté droit~~

- To plug the connector to the battery, you'll need to

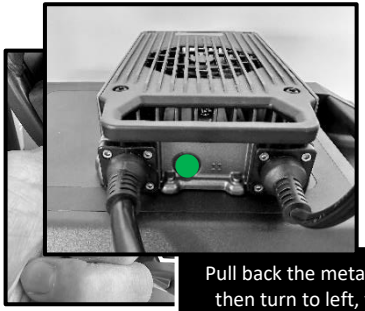


- push the socket inside the battery until you hear a click, which means that the plug is locked in.

⚠ When the connector is inserted in the battery, a "click" can be heard indicating that the battery has switched to a charging mode. The battery will then start charging automatically. When switching to charging mode, the LED is blinking red.



- When the charge is finished, the LED will go to Green like the below picture.



Pull back the metallic part of the connector, then turn to left, then pull the connector.

- Disconnect the charger from the battery.
- Unplug the charger from the wall plug.

Remark: If any issue occurs during the charging process, please repeat the process **from the beginning** in order to set the battery on charge

⚠ When the motorcycle is charging, do not turn on the motorcycle using the ignition key, it would immediately stop the charging process.

⚠ Take care to do not put any metal object or water inside the battery charge plug on the battery.

⚠ **Do not leave the charger connected to the battery after charge.**

⚠ **In the event of abnormal symptoms:**

- **LED remains green and red when connected but does not turn red (the battery is not charging)**
- **Incomplete charge (< 90%)**
- **Noise**
- **Excessive heating**

Please stop using or charging the battery and contact your official EM dealer as soon as possible.

9. Operating the motorcycle

9.1 Inspection before use

It is important that the user of the motorcycle checks that the condition of the vehicle is intact and that it can be safely used before each journey.
To be used, the motorcycle must be in perfect technical condition.

The pre-ride inspection consists of:

- Check the state of charge of the battery.
- Check that all the screws and bolts are tight.
- Check for correct function of all the electrical equipment.
- Check that the brake system is in proper condition (brake fluid, brake pad wear and system operation).
- Check the condition and pressure of the tires.
- Check the condition of the final drive system (chain and sprocket, lubrication)
- Check for correct function of all the control devices.

⚠ If there are any abnormalities on the motorcycle during the pre-trip inspection, do not take any risk, contact *Electric Motion* customer service.

9.2 Starting the motorcycle

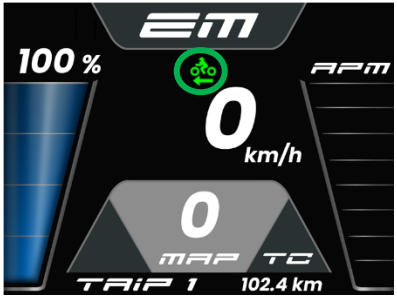
- Switch on the battery by pushing main switch.

Batterie Epure

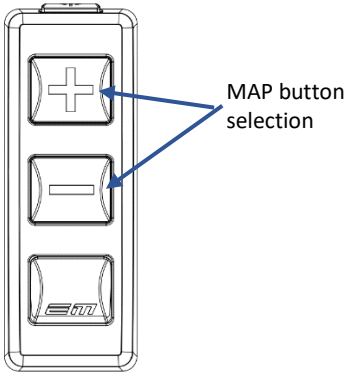
Batterie Escape

- Install the magnet on the base.

- The motorcycle is now ON, in security map.



- Then push the map button to be in the first map and change then as desired with map button.



- The Bike is now ready to ride.

⚠ The motorcycle should be at a complete stop before turning it on.

⚠ When the bike is in working order, it does not make any noise!

⚠ Under no circumstances should the kickstand be unfolded when the motorcycle is used.

9.3 Motor's behavior adjustment

The motorcycle is equipped with 3 driving maps which you can select by the 2-map button.

1 – MAP 1 / TRIAL 1 (GREEN LED)

TRIAL 1 map is dedicated to hard conditions and where traction is needed. Acceleration is smooth up to max speed.

2 – MAP 2 / TRIAL 2 (BLUE LED)

TRIAL 2 map is dedicated to dry trial use, more powerful and more response for trial use.

3 – MAP 3 / TRIAL 3 (RED LED)

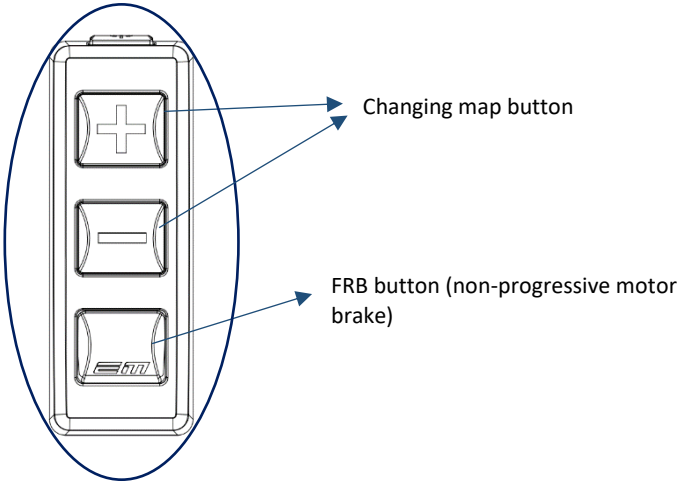
TRIAL 3 map is the most powerful map of the motorcycle with 100% of the performance.

⚠ Driving too fast or aggressive can cause overheating problems.

⚠ Make sure you are aware of the motorcycle different behaviors when changing maps before using them in traffic/open roads. These changes in behavior could surprise an uninformed driver.

Using the FRB – Non progressive engine braking (Escape R - XR / Epure RACE - FACTOR-e)

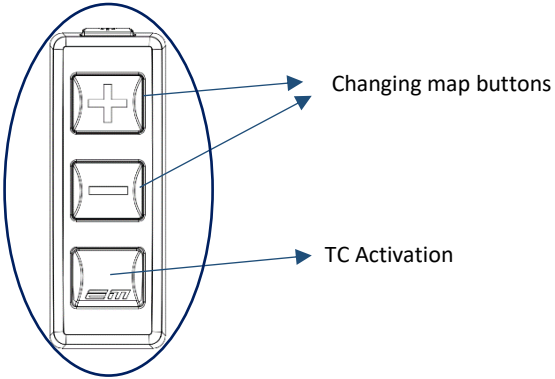
When pressing the button (grey on the bike), an engine brake will be activated, and slow down the bike. The intensity depends on the speed of the motorcycle.



Using the TC – TRACTION CONTROL (Escape X)

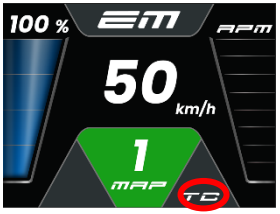
The TC (Traction Control) is developed for helping pilot in hardest conditions to avoid slippering.

TC is mainly working at low / mid rpm, with torque and speed calculation/regulation for 100% traction efficiency!



When the TC is activated, TC appears on your screen.

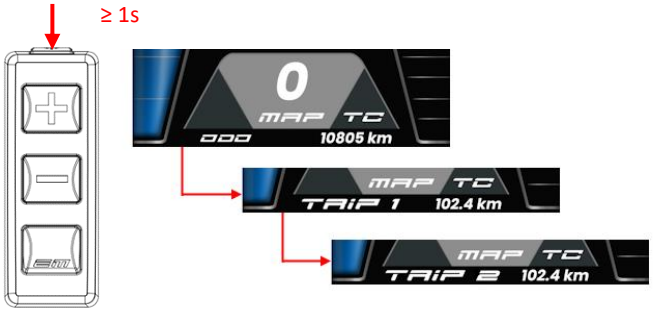
You can activate/remove the TC at any time during ride



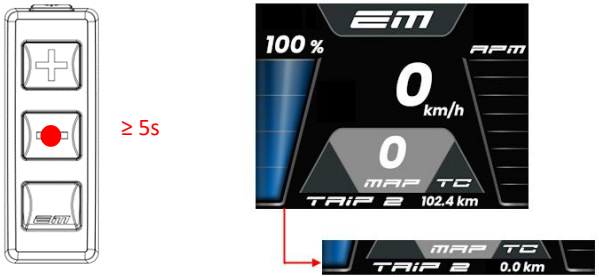
9.4 Odometer/Trip function

The odometer/Trip function is display at the bottom of the screen.

The display can be toggled between odometer / Trip 1 / Trip 2 by pressing and holding (≥ 1s) the on/off button on the command switch **while the motorbike is in map 0**.



Trip 1 and Trip 2 can be set to zero by a long press (≥5s) on the "-" button of the map selector **when the motorcycle is in map 0**.



9.5 Braking

The front brake lever, located on the right-hand side of the handlebars, brakes only the front wheel.
The rear brake lever located near to the right foot peg brake the rear wheel.
The brake levers control the brakes when the lever is squeezed.
It is important to be fully aware of the motorcycle's braking capacities for safe driving on public roads.
To brake properly, under normal traffic conditions, first close the throttle. Then brake using simultaneously the front and rear brake levers for strong braking.

⚠ When braking, the throttle grip must be in the closed position (acceleration stopped).

⚠ Braking too strongly causes the wheels to lock and makes the motorcycle dangerously uncontrollable. It is necessary to adapt your braking to the situation and to the pavement condition.

⚠ Check the condition of the brake system before each use. A wet or dirty brake system reduces braking performance. Clean and degrease the system if grease or dirt is present.

If there is any doubt about the condition of the brake system, contact *Electric Motion* customer service.

9.7 Anti-Reverse by EM

All the models integrate the Anti-Reverse by EM function.

This function helps you when you are in difficulty in steep slopes. When you cannot climb anymore, you can activate the anti-reverse as explain after, to heavily brake the rear wheel, allowing you to reposition yourself without having the bike rolling backwards.

⚠ The anti-reverse function is only functional when the magnet is on. Taking off the magnet will disactivate the anti-reverse function.

The function could only be activated at **low negative speed: from 0 km/h to - 3km/h.**

To activate this function:

- Escape X

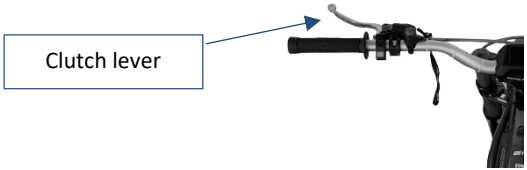
  Engage the **PRB** lever to activate the function: the rear wheel is immediately heavily braked.
  You can release the lever as the function will stay on until the throttle is activated.

- Escape R - XR / Epure RACE - FACTOR-e

  Press the **FRB (or PRBR in option)** button to activate the function: the rear wheel is immediately heavily braked.
  You can release the button as the function will stay on until the throttle is activated.

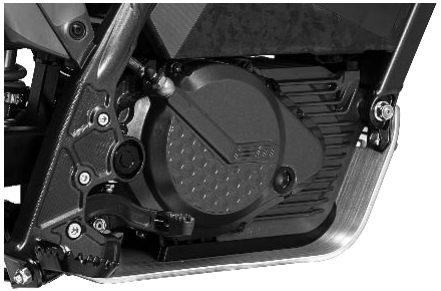
9.8 Clutch (Escape R / Epure Race - FACTOR-e)

The FACTOR-e are equipped with multi-disc clutch with hydraulic command who allow to uncouple the motor from the transmission.



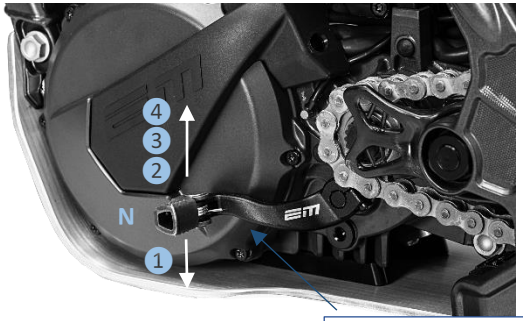
It can be very useful for trial, but it can be dangerous for amateur rider.

When the lever is released suddenly, the motorcycle will be very aggressive and dangerous.



9.9 Gearbox (Epure FACTOR-e)

The FACTOR-e model also features a 4-speed gearbox plus a neutral position.



Gears are shifted in the standard way, with the 1st gear shifted down and the 2nd to the 4th gears shifted up.

This gearbox is essential for optimizing performance and efficiency in different situations also maximizing rider control of the bike.

⚠ Please actuate the clutch lever before changing gear.

⚠ Please do not change gear when the engine is stationary, and the engine speed is above the TKO.

9.10 Stopping your motorcycle

To turn off the vehicle, follow the procedure below:

- Remove the magnet switch from his support.
- Switch off the battery (the LED around the battery switch ignition will goes to OFF).
- Unfold the kickstand so it is down and lean the motorcycle on it. Make sure that the motorcycle is stable and on a hard and stable ground to avoid falling. Beware of where you park your motorcycle and if there is a slope or not, the motorcycle having no gear to stop it moving.

⚠ Do not leave your motorcycle unattended after use.
After riding, some parts of the motorcycle may be hot, so be sure not to touch them before they are fully cooled to avoid any risk of burns.

9.11 Cleaning the motorcycle

The motorcycle must be cleaned with clear water. It is possible to use soap to clean it.
To clean your motorcycle, it is necessary to:

- Wash the motorcycle without insisting on the components vulnerable to moisture (electrical components, external controls, and external bearings).
- Rinse the motorcycle thoroughly with clean water.
- Dry the motorcycle, insisting on the electrical contacts.

⚠ Do not clean the handlebars directly with a high-pressure washer.

⚠ **Be sure to dismount the battery before cleaning.**

⚠ **Take care that the charge battery cap is well install on the charge connector on the battery.**

⚠ If, by mistake, you forget to shut down the battery after use, or to not have the bike turn on but not use it for 5 hours, it will go in standby mode. This security shut down the relays and the battery level indicator, which implies the indicator will be off, but the battery in standby, so be sure to turn it off.

⚠ **DO NOT CLEAN THE MOTOR SENSOR WITH HIGH PRESSURE WASHER.**

⚠ **DO NOT CLEAN THE BATTERY WITH HIGH PRESSURE WASHER.**

⚠ **DO NOT CLEAN THE CONTROLLER WITH HIGH PRESSURE WASHER.**

9.12 Motorcycle storage

In case of long-term storage of the vehicle, it is important to apply additional measures.

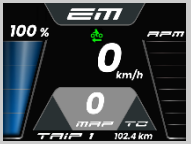
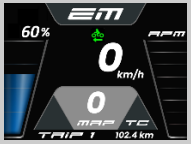
It is necessary to:

- Clean the motorcycle correctly (☞9.11).
- Raise the motorcycle using a bike stool or dirt bike lift stand (allowing the suspensions of the vehicle to be relieved) (☞11.1).
- Park your vehicle in a dry place, where the temperature is between 10°C and 25°C, which is not subjected to excessive temperature variation and protected from UV radiation.
- Cover the motorcycle with a breathable cover.

Note: There is no special precaution to be taken to restart the motorcycle.

When storing your motorcycle, it is important to follow a strict procedure to protect the battery during storage:

- Place the battery pack in an environment not exposed to direct sunlight and at temperatures below 25 ° C.
- Adjust the battery level regarding the storage time desired.

Storage time	< 15 days	>1 month
Battery level advised	100 % 	60 % 

Note: After long storage, the battery will be in deep sleep, to switch ON again the battery, you must make several ON/OFF ignitions to wake up the battery

⚠ The battery charge level should be checked monthly, recharge the battery, if necessary, with the supplied charger.

⚠ If the motorcycle does not start after the storage period, do not attempt to recharge the battery, and contact *Electric Motion* Customer Service immediately.

⚠ Make at least 2 discharge/charge per year.

9.13 Use of the application EM Connect

9.13.1 Connection

To download the application, please follow the link below:

- IOS : https://apps.apple.com/fr/app/em-connect/id6449296285

Download on the App Store

- ANDROID : https://play.google.com/store/apps/details?id=com.em.emconnect

GET IT ON Google Play

Open the application **EM Connect**

At the first connection, go to the **"Sign Up"** section.

Read and accept the 3 different documents: Privacy information protection act, Service agreement, Disclaimer.

Choose your country code, enter your telephone number without country code, space or special character, example: 612345678

Enter the code received by SMS.

Scan the QR code on the last page of the Quick Guide.
If the scan function doesn't work, you can enter the code below the QR code manually.

A second QR code is located on the TCU (on the right-hand side of your bike) in case you lose the Quick Guide.

A Bluetooth connection window appears. To pair the bike with your smartphone, enter the Bluetooth connection code.

Bluetooth connection code : 999 999

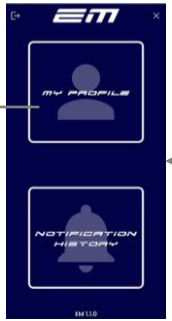
If the connection window does not appear after a few moments, activate Bluetooth on your phone and restart the application.

The application could not function properly if the Bluetooth pairing have not been done. Please ensure to complete the pairing process before using the App.

When your bike is connected to the application, the link icon in the top right-hand corner is displayed in white.

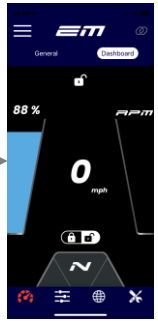
9.13.2 General presentation

My profile
You can enter your personal information (username, name, surname, date of birth, e-mail address, country).
You can also change the speed unit (km/h to mph).

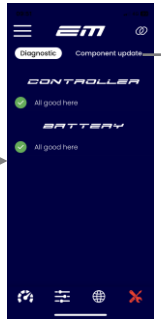


Options
Access to your profile
Notification history
Account logout

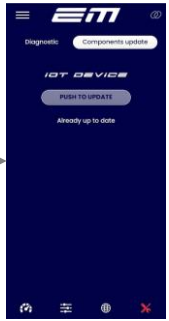
General page
Here you'll find the model and year of your bike, its VIN number, its number of hours and the number of battery cycles.



Dashboard
Find here all the information displayed on your bike's screen in real time (battery percentage, RPM, speed, MAP engaged). You can also lock and unlock your bike from this page.

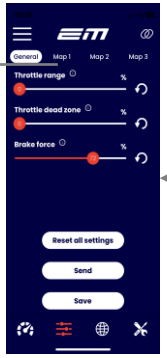


Diagnostic
Any controller or battery error codes will be displayed here.
The error codes can be found in section 7.9 of this manual.

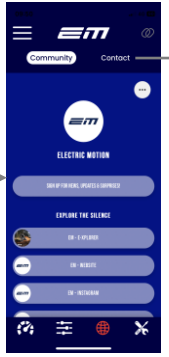


Update
IOT updates are available in this section.

MAP settings
You can modify the various parameters of your 3 MAP.
The detailed procedure for modifying and saving your MAP can be found in section 9.11.3 of this manual.

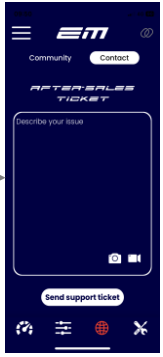


General MAP settings
These are the general settings that apply to your bike.
The detailed procedure for modifying and saving your MAP can be found in section 9.11.3 of this manual.



Community
Here you'll find all the information and links you need about *Electric Motion*.

Contact
You can use this page to contact us for information or to submit an after-sales ticket.



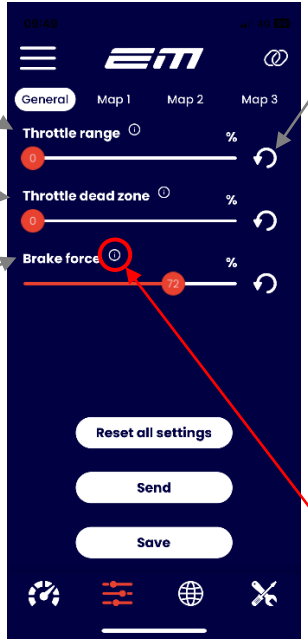
After-sales ticket
You can send an After-Sales ticket if your bike has a problem. You can attach a photo or video to help us understand the problem.

9.13.3 MAP configuration

A higher value gives the throttle more travel for a more progressive throttle response.

Adding a throttle dead zone allows more throttle free play before the engine turns.

A higher value increases the braking force when the PRB (lever) or FRB (button) is activated.



Resets the selected parameter to its original value

Change throttle response from smooth to firmer.

A higher value increases the maximum motor power.

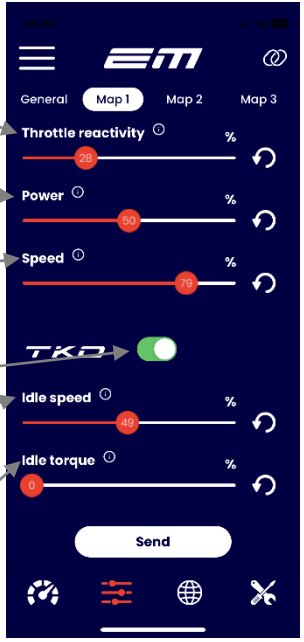
A higher value increases the engine speed and the motorcycle speed.

Activation button - TKO

Change engine speed without throttle input.

Control the power and traction at low revs while disengaging the clutch until fully disengaged.

Detailed information on the selected parameter

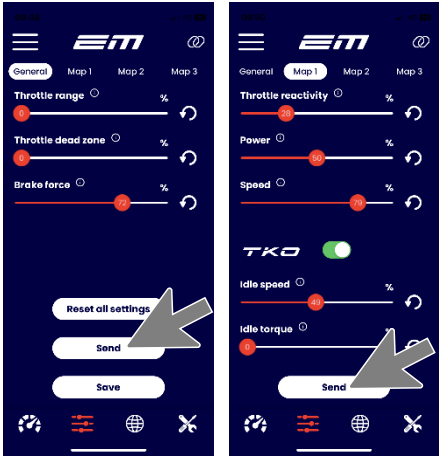


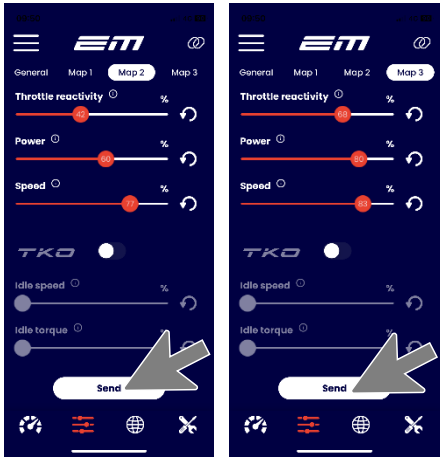
Registering and sending MAP

Once you have modified your MAP, you must follow the procedure below to save and send the new settings to your bike. MAP must be modified and sent with Neutral MAP engaged.

1 – Sending the configuration to the bike

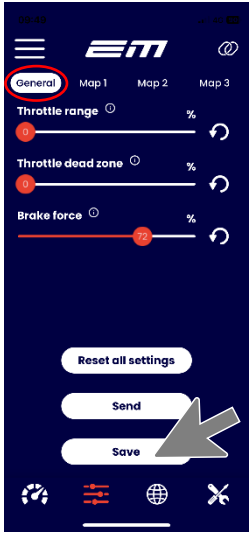
Click on the **SEND** button on **each** page to send the modified parameters of each MAP independently and the "General" parameters.





2 – Saving your modified settings

Click on the **SAVE** button in the **"General"** section to save all the modified settings on your bike.



If you do not save your settings after sending them, they will disappear when you switch off the bike.

9.13.4 Dashboard

Display of the last connection with your bike, this message disappears when you switch on your bike, so you have the information displayed in real time.

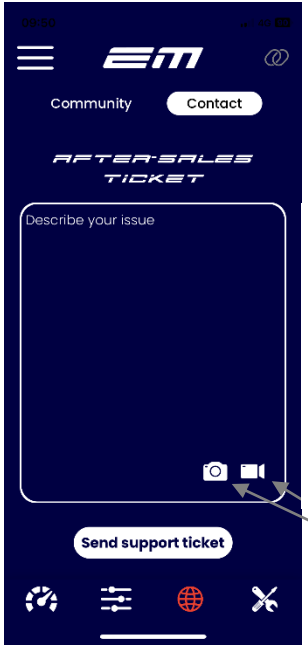
Status bar
Displays a non-optimal battery temperature.
Also displays the lock status of your bike.

This message appears on the application when there is a ⚠ limitation.

Lock and unlock button
To lock or unlock your EM, Neutral MAP must be activated. The lock remains active when you switch off your motorbike, so it is useful as a safety device.

Warning
Warnings are displayed in the same way as on your bike's screen.
The meaning of these warnings can be found in section 7.9 of this manual.

9.13.5 SAV



Please insure to indicate an email address in your profile(top left button) before sending a after-sales ticket.

When you send an after-sales ticket, the diagnostic of your bike is automatically sent to the after-sales service.
So, there's no need to attach your bike's error codes.

You can send photos or videos to complement your message.

⚠ Photos and videos are limited in size.

9.13.6 Updates

This screen is used to update the IOT device with new features or fix any problems.

To complete the update, the bike must be connected to the application. The bike and the phone must be switched on and in close proximity to each other.

⚠ The update can take several minutes to download. Wait for the update notification before leaving the page.

9.13.7 Troubleshooting

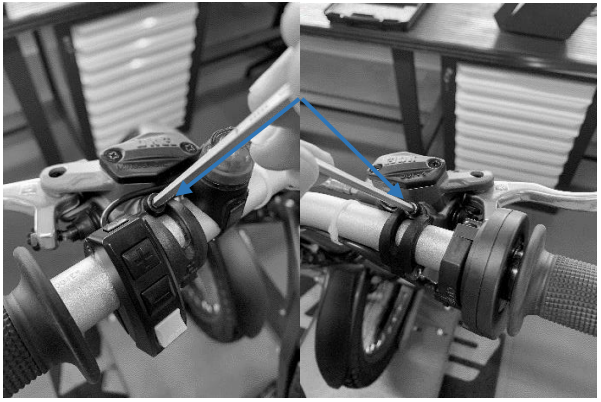
Problem	Cause	Solution
The Bluetooth connection indicator remains grey.	The Bluetooth device does not connect.	1 - Check that the battery is switched on and the magnet is in place 2 - Bluetooth activated on your smartphone 3 - Relaunch the application and proceed with Bluetooth pairing.
It is not possible to modify a parameter. 	Bluetooth pairing problem.	1 - Switch Bluetooth off and on again If this does not work, restart the application, and perform the Bluetooth pairing.

10. Setting the motorcycle controls

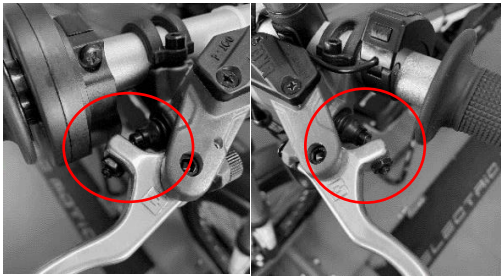
It is important to find your place on the motorcycle before starting to drive. Being at ease on your vehicle makes it possible to travel safely on public roads and to have a fluid riding style.
To adjust your *Electric motion* motorcycle at your convenience, adjust the position of the different parts following these procedures below.

10.1 Levers position adjustment

- The levers can be adjusted using a 4mm Allen key. Tightening torque of 8 Nm.



- For the lever positioning, you have to adjust these 2 screws.



⚠ We recommend to not change the lever stroke.

⚠ Take care to frequently check your lever tightening.

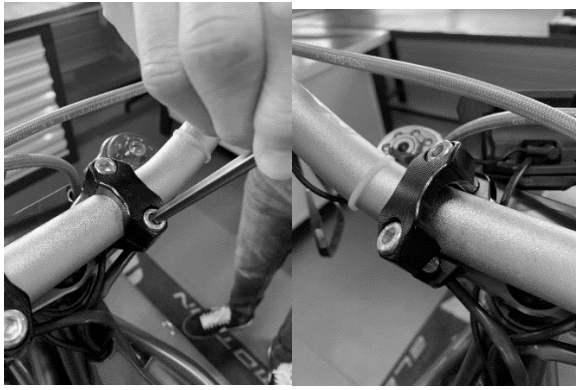
10.2 Mirrors position adjustment

- Tighten the mirror with a 13mm tool.

10.3 Handlebar position adjustment

The handlebars can be adjusted by untightening the 4 screws holding the handlebars on the bar mounts.

- Loosen the 4 screws with 6mm Allen.
- Adjust the Handlebar.
- Tighten the 4 screws evenly at 14Nm.



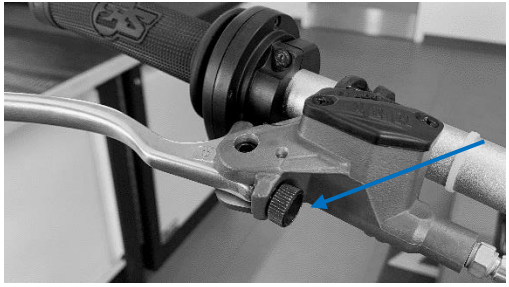
⚠ Please, frequently check that the screws holding the handlebars on the bar mounts are tight.

⚠ Please, make sure that the handlebars are centered on the bar mounts.

10.4 Front lever reach adjustment

The front brake lever reach is adjustable with a knurled screw.

- Loosen to increase lever reach
- Tighten to reduce lever reach

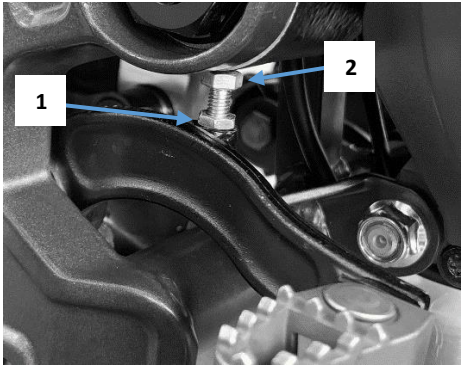


10.5 Rear brake pedal position adjustment

The rear brake pedal is located in front of the right footrest.

The position is adjusted as follows:

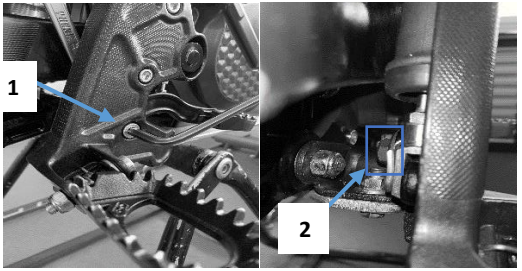
- Stop the vehicle (☞ 9.10)
- Raise the motorbike on a stand (☞ 11.1) or place it on a kickstand.
- Loosen nut 1 with an 8mm flat wrench.
- Screw in / out screw 2 as required.
- Lock the position by tightening nut 1 again.



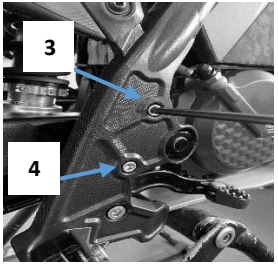
10.6 Rear brake pedal reach adjustment

This setting allows you to adjust the sensitivity of your brake pedal.

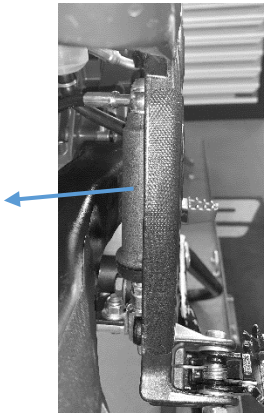
- Stop the vehicle (☞ 9.10)
- Raise the motorbike on a stand (☞ 11.1) or put it on a kickstand.
- Loosen screw 1 with a 6 mm Allen key, while holding nut 2 with a 13 mm flat wrench.

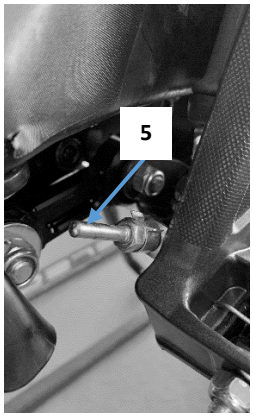


- The brake pedal is now free.
- Loosen screws 3 and 4 using a 5 mm Allen key.



- Shift the master cylinder slightly and pull the needle out of the master cylinder body.

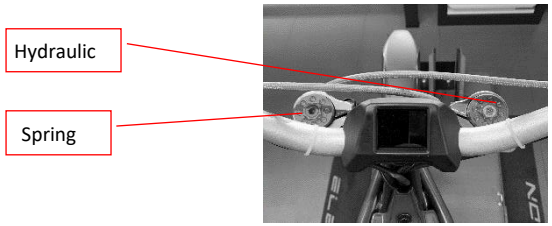




- Screw or unscrew nut 5 as required.

Reassembly: Carry out the disassembly steps in reverse order, taking care to reassemble the brake pedal before the master cylinder to make reassembly of the needle easier.

10.8 Fork settings (Escape R / Epure RACE - FACTOR-e)



10.8.1 Hydraulic setting

	HARD	MEDUIM	SMOOTH
Number of steps	0-11	11-22	22-33

When adjusting, it is best to always close the hydraulic valve by screwing it in as far as it will go and then unscrew it to go to the desired position. The factory setting is 16.

10.8.2 Spring setting

	HARD	MEDUIM	SMOOTH
Number of turns	0-4	4-7	7-11

The spring setting is adjusted using a 6mm Allen key. When adjusting, it is best to always screw in the stop and then unscrew the desired number of turns, 11 turns being sufficient for this adjustment. The factory setting is 6 turns.

10.8.3 Fork spring adjustment

As a standard, the spring fitted in the fork correspond to an ideal weight of 70-85kg.

Weight	k (N/mm)	Reference
60-70	8	TC01P-20109-02-00
70-85	8.6	TC01P-20109-00-00
85-90+	10.1	TC01P-20109-01-00

10.9 Shock absorber settings (Epure Race / FACTOR-e)

10.9.1 Hydraulic settings

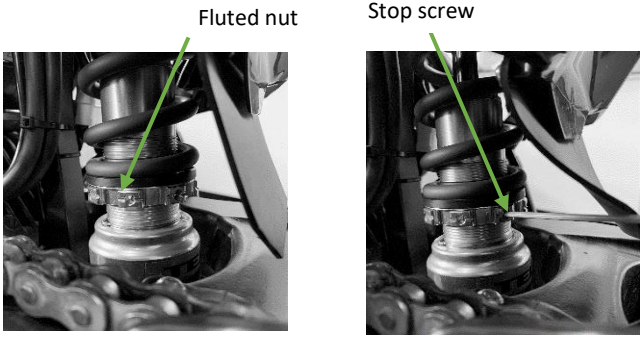
Adjustments are made from the right-hand side of the motorbike using a 4mm Allen key on the top of the shock absorber.

There are 24 adjustment steps for the hydraulics.

	HARD	MEDIUM	SMOOTH
Number of steps	0 – 8	8-16	16-24

When adjusting, it is best to start by closing the hydraulic valve by screwing in the screw as far as it will go and then unscrewing it to the desired notch. The factory setting is 10 notches.

10.9.2 Spring preload setting



The rear shock absorber can be accessed by lifting the rubber lip behind the tire.
The spring preload is adjusted by screwing and unscrewing the splined nut.
This nut is locked by a stop screw inserted in the splined nut. It can be adjusted using a 2mm Allen key.

10.9.3 Spring adjustment

As a standard, the spring fitted on the vehicle has a stiffness of 73.6 N/mm, corresponding to an ideal weight of 75-80kg.

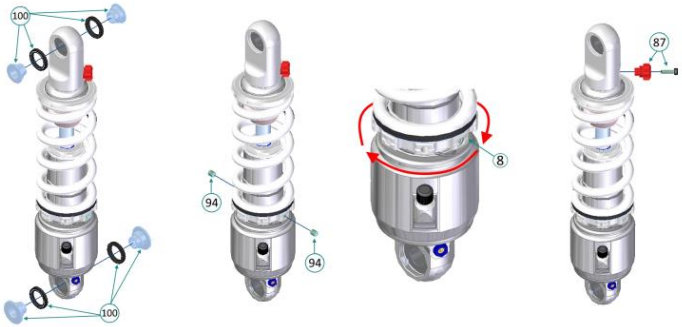
Weight	K (N/mm)	Reference
60-65kg	63.6	TC03R-30402-01-00
65-75kg	68.7	TC03R-30402-02-00
75-80kg	73.6	TC03R-30402-00-00
80-85kg	78.7	TC03R-30402-03-00
85-90kg	83.6	TC03R-30402-04-00

10.8.4 Spring replacement

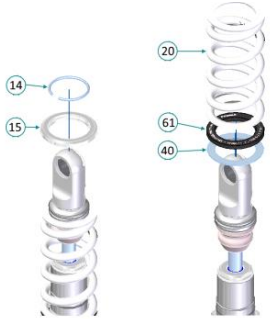
If the standard spring installed on your vehicle doesn't match your weight, here are the steps to replace it.

Disassembly

- Remove the uniball spacers (100). Check the state of spacers and dust seals before proceeding. Place the shock absorber in a bench vise with plastic jaws to prevent damage. Measure and track the preload spring.
- Unscrew the preload ring grub screws (94) and unscrew the spring regulation ring (8) until the spring is moving freely.
- Disassembly the rebound knob (87) by unscrewing its screw with a 2,5 mm Allen key
- Remove the Seeger ring (14) and the ring spring support (15)



- Extract the shock absorber's spring (20), the preload spacer (61) and the washer spring (40)



- Clean the shock absorber with isopropyl alcohol and ensure there are no oil leaks or damages. Get in touch with customer support if there are anomalies.
- Replace the spring (20) and the spacer (61) if necessary, following the recommendations (☞ 10.8.3).
  The spacer (61) is sold with a laser marking that shows the spring it needs to be coupled with in order to ensure that the maximum preload is 10 mm.

Reassembly

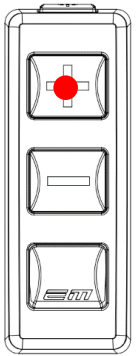
- Assembly the washer spring (40), the preload spacer (61) and the spring (20)
- Set the spring preload with the measure recorded in step n°1. Screw the preload ring grub screws with a 2,5 mm Allen key with a tightening torque of 4 Nm.
- Assembly the rebound knob (87), apply Loctite 242 on the thread of its screw and tighten it with 10 Nm.
- Apply grease on the outer diameter of the dust seal and reassemble the uniball spacers.

10.13 Auto-setting

It is possible to carry out an auto-setting on the motorbike, which will recalibrate the engine.

It is advisable to carry out an auto-setting if the user encounters acceleration problems.

- Stop the vehicle (☞ 9.10).
- Raise the motorbike on a stand (☞ 11.1).
- Start the vehicle (☞ 9.2).
- Press the + button on the selector for 10 seconds.
- Release the button when a noise is heard.
- The rear wheel will turn 3 times
- Auto-setting is complete.



.

11. Maintenance

Find all our maintenance videos on our web site:
https://www.electric-motion.fr/en/my-em-en/instruction-videos

11.1 Raising the bike on a stand

- Stop the vehicle (☞ 9.10).
- Raise the motorbike with an adjustable or non-adjustable stand, placing it under the engine block.

Ensure that you are on level ground to prevent the motorbike from falling off the stand.
Be careful when lifting the motorbike if you do not have an adjustable stand.
Ensure that the motorbike is securely held before releasing it to prevent the vehicle from falling.

11.2 Dismantle and reassemble the fork

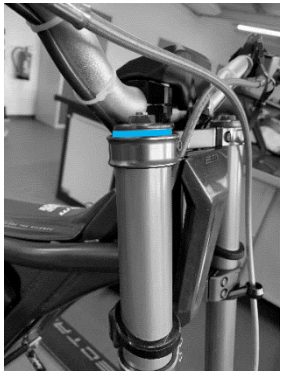
11.2.1 Epure Race - FACTOR-e / Escape R

Dismounting

- Stop the motorcycle (☞ 9.10).
- Install the motorcycle on a stand (☞ 11.1).
- Remove the front plate.
- Remove the front mudguard (☞ 11.5).
- Dismount the front brake caliper with a 5mm Allen key.
- Carefully let the front brake caliper/offset bracket assembly hang from the end of the brake hose.
- Unscrew the upper and lower clamp with 4mm Allen key.
- Loosen the upper tee bolts with a 4mm Allen key.
- Loosen the lower tee bolts with a 4mm Allen key.
- To remove the fork arms, carefully slide them out one by one, towards the ground.

Mounting

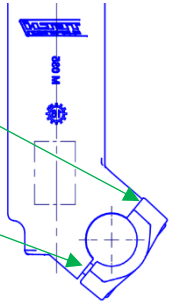
- Slide the fork inside the clamp one by one.
- Adjust the position on the fork with the distance of 8mm.



- Approach the upper and lower fork crown bolts loosely,
- Using a torque wrench, tighten the upper and lower fork crown bolts to 10 Nm.
- Mount back the front brake caliper/offset bracket assembly to the left fork arm. Use a 5mm Allen key to tighten to 20Nm. Be sure to put back the washers.

- After tightening the tees, tighten the wheel axle to 40 Nm.
- Compress the fork gently (approx. 3 to 4 cm) and repeat the operation 2 to 3 times to center the wheel axle.

- Tighten the upper screw clamp at **10 Nm up to contact.**
- THEN, tighten the lower screw at **10 Nm.**



- Fit the mudguard bracket, making sure that it does not have to be forced into place. Tighten to 10 Nm

11.3 Clean the fork

It is necessary to clean the fork after each use, to avoid any damaged seal.

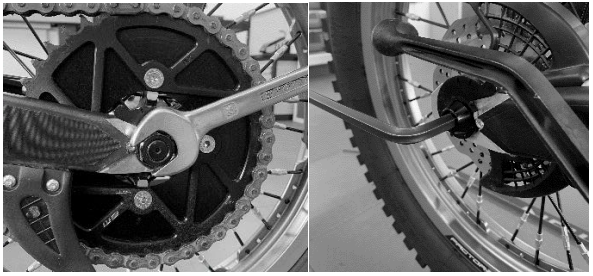
- Stop the motorcycle (☞ 9.10).
- Put the motorcycle on a stand (wheels in air) (☞ 11.1).
- Lubricate the dust seal protectors,
- Clean the fork tube with clean cloth and install grease.
- Remove the excess of grease.

⚠ Absolut forbidden, all aggressive products.

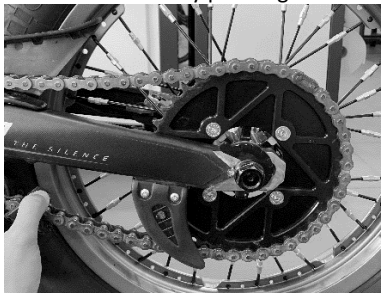
⚠ Do not use high pressure water jet directly on the seal.

11.4 Chain tension adjustment

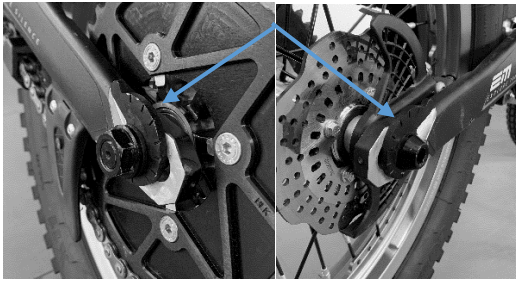
- Stop the vehicle (☞ 9.10)
- Raise the motorbike on a stand (☞ 11.1) or place it on a kickstand.
- Loosen the wheel axle using a 24 mm spanner and a 10 mm Allen key without removing it



- Slacken the chain by pressing on the tensioner



- Rotate the snails symmetrically on either side of the vehicle to obtain the correct tension.



- The top of the rubber chain tensioner should be approximately 25 mm from the swingarm.

11.5 Dismantle and reassemble the front mudguard

Disassembly

- Stop the vehicle (9.10).
- Raise the motorbike on a stand.
- Remove the fender fixing screws with a 8 key.

- Remove the front mudguard.

Reassembly

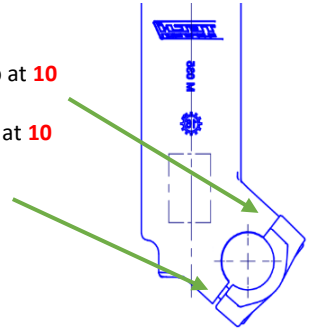
Perform all disassembly actions in reverse order for reassembly,

11.6 Dismantle and reassemble the front wheel

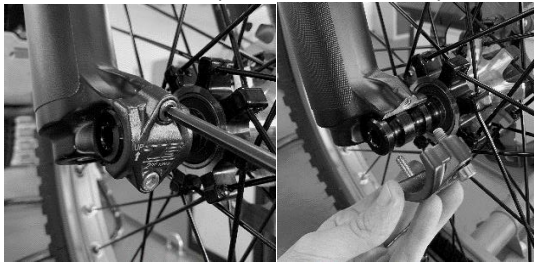
Disassembly

- Stop the vehicle (9.10)

- Tighten the upper screw clamp at **10 Nm up to contact.**
- THEN, tighten the lower screw at **10 Nm.**



- Raise the motorbike on a stand (11.1)
- Remove the fork clamp with a 5mm Allen key



- Loosen the wheel axle with a 10 mm Allen key and remove it.

- Remove the wheel

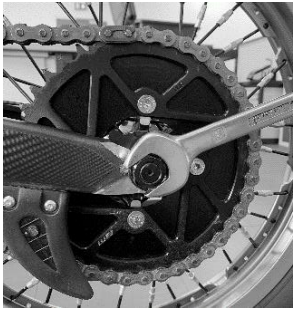
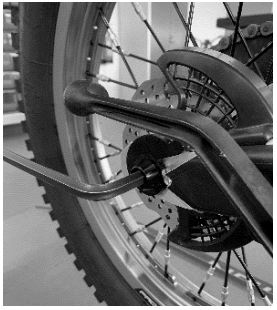
Reassembly

- Refit the wheel with its axle on the fork.
- Screw on the fork clamp following the instructions below
- Tighten the axle at 40Nm.

11.7 Dismantle and reassemble the rear wheel

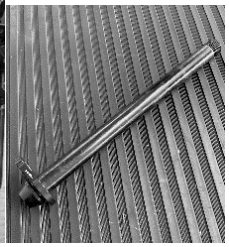
Disassembly

- Stop the vehicle (☞ 9.10).
- Raise the motorbike on a stand (☞ 11.1).
- Loosen the axle fixing nut using a 24 mm spanner, while

holding the other end of the axle with a 10 mm Allen key.
- Rotate the snails to the left to their minimum positions.
- Remove the fixing nut.
- Slacken the chain by pressing on the tensioner

- Remove the chain from the drive plate.
- Pull out the axle while holding the wheel to prevent it from falling off.

- Pull the wheel backwards, disengaging the brake disc from the rear caliper.

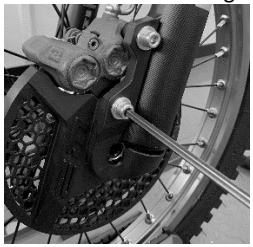
Reassembly

- Place the wheel in front of the swingarm axle.
- Position the brake caliper on the disc.
- Insert the axle with the right-hand tensioning snail.
- Position the chain on the drive plate.
- Insert the left-hand tensioning snail.
- Move the fixing nut towards the axle.
- Tension the chain (☞ 11.4).
- Tighten the rear wheel axle.

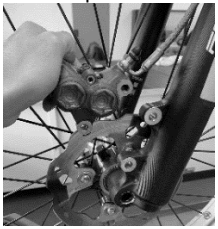
11.8 Dismantle and reassemble the front brake caliper

Disassembly

- Stop the vehicle (9.10)
- Raise the motorbike on a stand (11.1) or place it on a kickstand.
- Remove the disc cover screws using a 5mm Allen key.



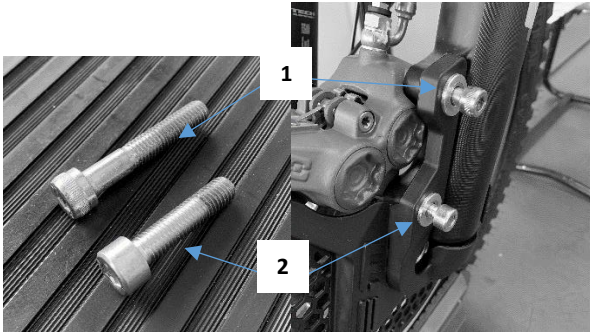
- Remove the disc cover.
- Remove the brake caliper.



⚠ Do not use the front brake lever when the disc is not fitted to avoid sticking the brake pads.

Reassembly

- Carry out the previous steps in reverse order.
- Refit the screws in the following positions:



⚠ As the screws are different, reversing them will cause the front wheel to lock.

11.9 ON road display setting

Setting up

- Bike on a stand.
- Start the battery.

To adjust the wheel ratio and perimeter, follow the steps below:

Wheel length

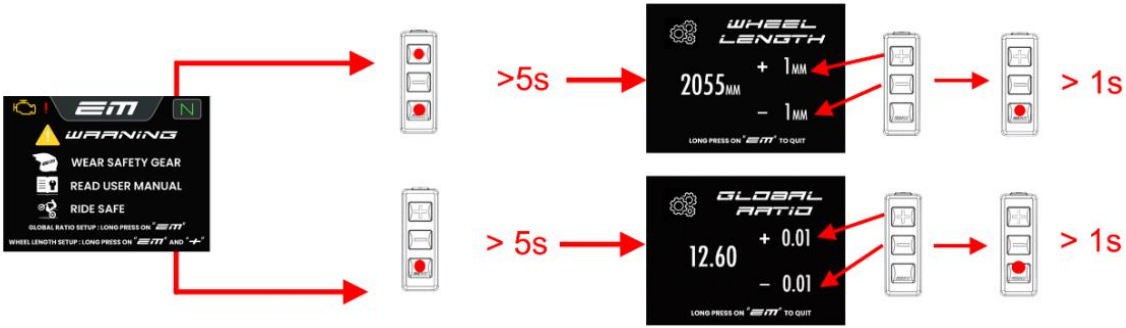
- Long press (>5s) on "+" and "EM" from the "Warning screen".
- Use the "+" and "-" buttons to change the values
- Long press (>1s) on "EM" to save and exit

Global ratio

- Long press (>5s) on "EM" from the Warning screen
- Change values using "+" and "-" keys
- Long press (>2s) on "EM" to save and exit

Find below the default settings:

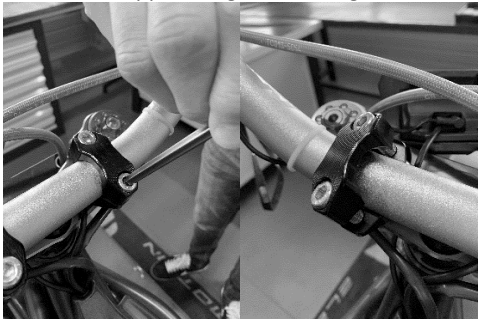
	FACTOR-e	Escape X	Escape XR	Escape R
Ratio	14.91	11.73	11.73	14.39
Wheel length	2060mm	2030mm	2030mm	2060mm



11.10 Dismantle and reassemble the handlebar.

Disassembly

- Stop the vehicle (9.10).
- Raise the motorbike on a stand (11.1).
- Remove the upper bridge bolts using an 8mm Allen key.



- Take out the handlebars.

Reassembly

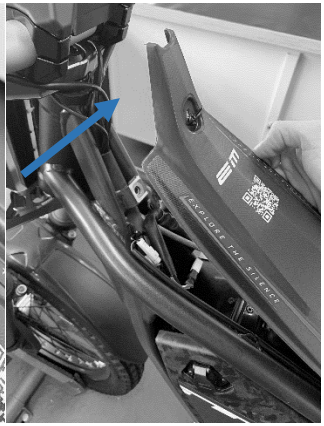
- Place the handlebars in the lower bridges.
- Place the top brackets and screws on the handlebar.
- Tighten the bolts of the upper bridges to a torque of 14 Nm.

⚠ **Before riding the motorbike again, make sure that the handlebars are securely fastened as this could cause serious falls.**

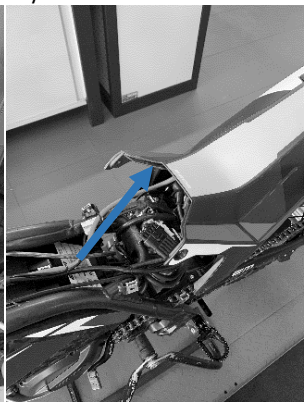
11.11 Dismantle and reassemble the motorbike cover

11.11.1 Epure FACTOR-e

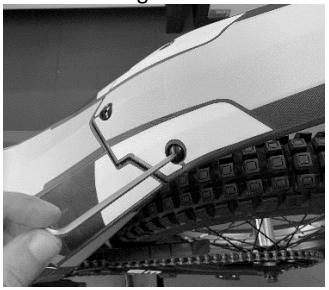
- Stop the vehicle (9.10),
- Raise the motorbike on a stand (11.1),
- Remove the headlight plate,
- Remove the front fender (☞11.11),
- Remove the central cover of the motorbike by unscrewing the quarter turn screw,



- Remove the rear cover with a 4mm Allen key and unscrew the 4 screws simultaneously



- Remove the rear mudguard



⚠ On a model with a rear LED light option, be sure to disconnect the connector between the controller and the LED:

- Remove the rear mudguard (☞ 11.11).

Reassembly

Do all the disassembly steps in upside down to reassemble.

11.11.2 Escape R

- Stop the vehicle (☞ 9.10),
- Raise the motorbike on a stand (☞ 11.1),
- Remove the front plate,
- Remove the front fender,
- Remove the central cover of the motorbike by unscrewing 1 screw with an mm allen key,

- Remove the screw that holds the seat with a 5m allen key then slide the seat to the back to remove it.

- Remove the main cover by en spreading the sides

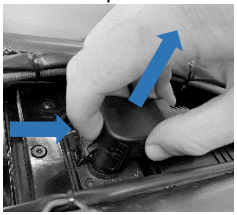
Reassembly

Do all the disassembly steps upside down to reassemble.

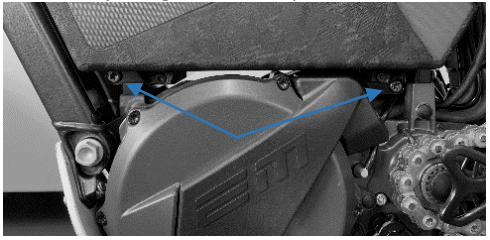
11.12 Remove the battery

Disassembly

- Stop the vehicle (☞ 9.10)
- Raise the motorbike on a stand (☞ 11.1) or place it on a kickstand.
- Remove the cover (☞ 11.11)
- Disconnect the battery by pressing the grey trigger and pulling the connector upwards.



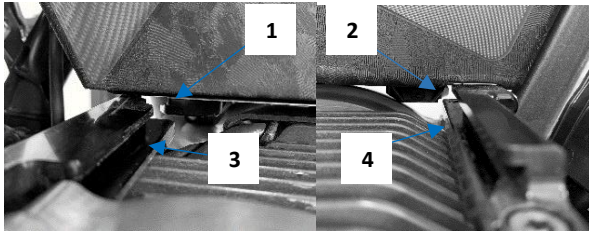
- On the left of the vehicle remove the two screws holding the battery using a TORX 30 spanner.



- Slide the battery out of the frame

Reassembly

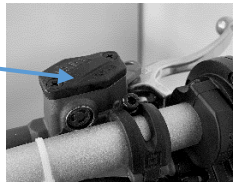
- Align both rails 1 and 2 on the underside of the battery with the brackets 3 and 4 and slide the battery as far as it will go.



- To complete reassembly, follow all the disassembly instructions in reverse order.

11.13 Check and adjust the front brake fluid

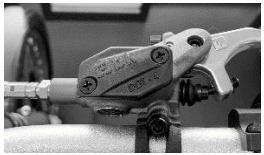
The brake fluid level can be checked by looking at the front brake master cylinder on the right-hand side of the handlebars.



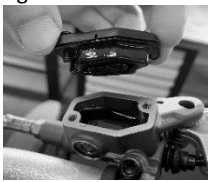
The level must not be less than halfway up the sight glass.

To djust the level

- Remove the two screws from the tank cover using a cross-headed screwdriver.



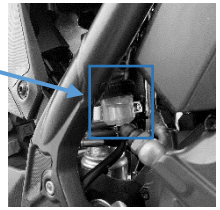
- Open the tank, taking care not to lose the seal.



- Tilt the vehicle slightly so that the fluid is level.
- Top up

11.14 Check and adjust the rear brake fluid

The brake fluid level is checked via the reservoir located above the rear brake pedal.



The level should be between the MIN and MAX indicators.

To adjust the level

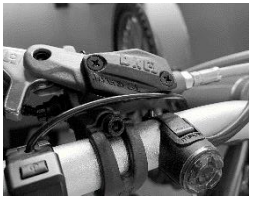
- Remove the tank cover.
- Tilt the vehicle so that the fluid is level in the tank.
- Top up.

Recommended brake liquid:
MOTUL DOT 4 LV Class 6

MOTUL

11.15 Check and adjust the clutch fluid

The clutch fluid level can be checked by opening the clutch lever master cylinder cover located on the left of the handlebars.



The liquid level must not exceed half the tank capacity.

To adjust the level

- Remove the two screws from the tank cover using a cross-headed screwdriver.
- Remove the cover

- Top up

Recommended clutch oil: MOTUL LHM+ MOTUL

11.16 Essential checks

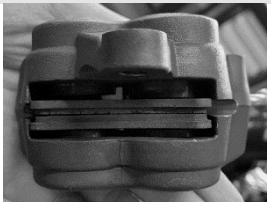
11.16.1 Condition of chain

The chain is a vital transmission element in the operation of the vehicle.
It must be properly greased before each ride.
The links must be free with no hard points between two links.

⚠ A chain in poor condition could cause premature damage to the sprocket and ring gear.

11.16.2 Condition of pad

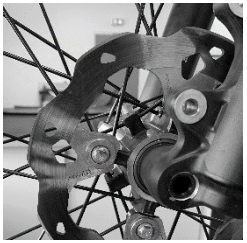
Brake pad wear occurs in the contact area between the disc and the brake pads.



⚠ We strongly advise against using pads with a thickness of less than 1mm.

11.16.3 Condition of brake disc

Disc wear occurs in the contact area between the disc and the brake pad.



⚠ We strongly advise against riding with discs less than 2.5mm thick.

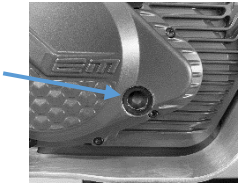
11.16.4 Condition of chain tensioner

The chain tensioner is a highly stressed component, particularly the spring, which is responsible for maintaining pressure on the chain.

⚠ Keep the chain tensioner clean and well-greased to prevent premature wear.

11.16.5 Clutch oil level

The minimum oil level should be in the middle of the eye on the clutch housing.

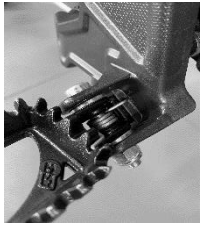


⚠ Operating the vehicle with an insufficient oil level can lead to premature wear or breakage of mechanical components essential to its operation.

11.16.6 Condition of springs

The footrests are retractable using springs to prevent them breaking in the event of an impact.

These springs must be clean and properly greased to ensure they work properly.



The stand and chain tensioner springs must also be properly maintained to ensure optimum performance.

11.17 Maintenance frequency

	Check	Changing
Tightening	2 first hour then each 20 Hour	
Clutch oil	5 first hour then each 20 Hour	20 Hours
Gearbox oil		60 Hours
Clutch discs assembly		Min Height 9.8mm
Chain	After each use	

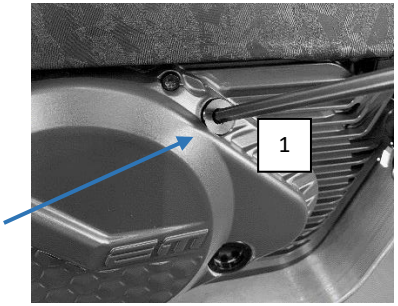
Element	Standard	Utilization limit
Wheels/tires		
Cold tire pressure For a drive on road Only for competition use Front Rear	100kPa (1.02kgf/cm²) 39-44 kPa (0.40-0.45 kgf.cm²) 29-34 kPa (0.40-0.35 kgf.cm²)	-

Parts	Tightening (Nm)
Wheels	
Front wheel axle	40
Fork flange wheel axle	10
Front caliper	20
Rear/Front discs screws	20 + Loctite
Rear wheel axle	60
Steering	
Steering axle	50
Clamp	15
Handlebar clamp	14
Suspension	
Upper rear shock axle	50
Suspension connecting rods	30
Swingarm axle	50
Motor	
Clutch diaphragm screws	6
Front transmission screws	25 + Loctite
Lower transmission screw	30
Carter screws	11
Motor/carter screws	20 + Loctite
Rear sprocket	20

12. Maintenance

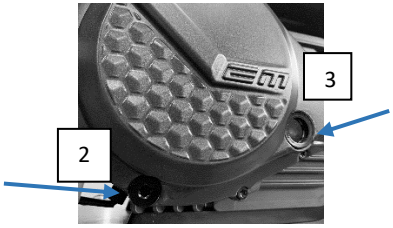
12.1 Clutch oil maintenance (Epure Race - FACTOR-e / Escape R)

- Remove the battery.
- Process can be done with or without the engine plate protector mounted.
- Open the filler cap 1 with a 6mm Allen key.



- Open the drain plug 2 with a 6mm Allen key.

Be careful: the oil will flow, install an oil container.



- Wait the complete oil change.
- Clean the magnet on the drain plug.
- Install again the drain plug with the cooper washer, screw tightening 17Nm.
- Fill the transmission with **200 ml of oil 75W.**

Recommended oil: MOTUL ATF VI MOTUL

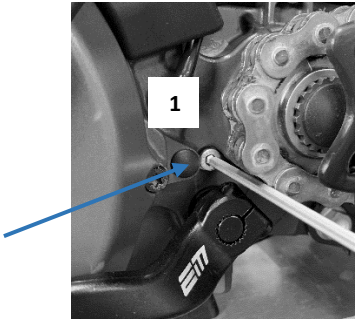
- Oil level should be on the middle of the oil level indicator 3
- Install again the filler cap 1 with the cooper washer, screw tightening 17Nm.
- Install again the battery.

Maintenance frequency:

Verify the oil level: each **5 hours.**
First oil maintenance: **10 hours**
Change clutch oil: each **20 hours.**

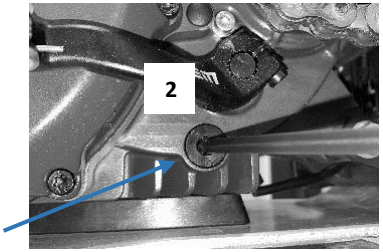
12.2 Gearbox oil maintenance (FACTOR-e)

- Remove the battery.
- Process can be done with or without the engine plate protector mounted.
- Open the vent screw 1 with a 4mm Allen key located over the gearshift padel.



- Open the drain plug 2.

Be careful: the oil will flow, install an oil container.



- Wait the complete oil change.
- Clean the magnet on the drain plug.
- Install again the vent screw 1.
- Fill the gearbox with **200ml of oil 10W**.

Recommend oil: MOTUL Transoil Expert 10W-40.

MOTUL

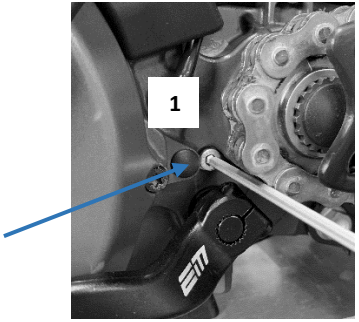
- Install again the drain plug 2.
- Install again the battery.

Maintenance frequency:

Verify the oil level: **each 5 hours.**
First oil maintenance: **10 hours**
Change the clutch oil: **each 60 hours**

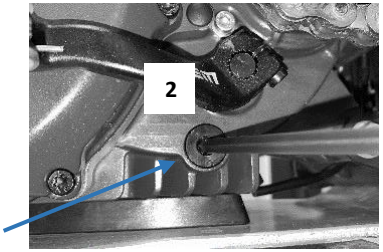
12.2 Gearbox oil maintenance (Epure RACE – ESCAPE R)

- Remove the battery.
- Process can be done with or without the engine plate protector mounted.
- Open the vent screw 1 with a 4mm Allen key located over the gearshift padel.



- Open the drain plug 2.

Be careful: the oil will flow, install an oil container.



- Wait the complete oil change.
- Clean the magnet on the drain plug.
- Install again the vent screw 1.
- Fill the gearbox with **350ml of oil 10W**.

Recommend oil: MOTUL Transoil Expert 10W-40.

MOTUL

- Install again the drain plug 2.
- Install again the battery.

Maintenance frequency:

Verify the oil level: **each 20 hours.**
First oil maintenance: **10 hours**
Change the clutch oil: **each 60 hours**