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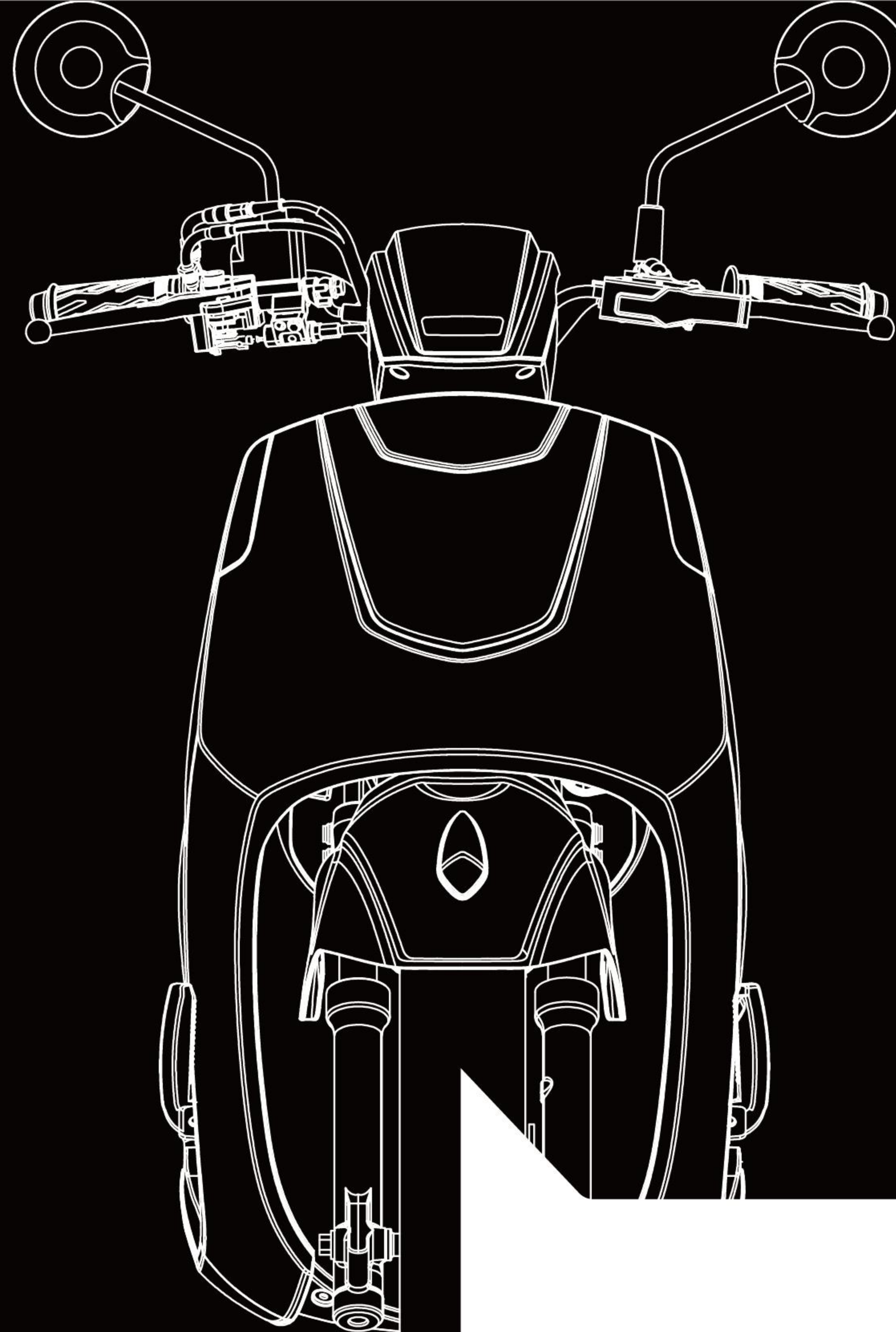
金浪科技有限公司 浙江·台州路桥区金清镇金林路1111号

JINLANG SCIENCE AND TECHNOLOGY CO.,LTD No.1111 Jinlin Road Luqiao District, Taizhou City, Zhejiang Province, China

深圳力刻科技有限公司 深圳市南山区粤海街道海珠社区文心一路99号金钟大厦8B

SHENZHEN ARIIC SCIENCE AND TECHNOLOGY CO.,LTD

Jinzhong Building 8B, No.99 Wenxin 1 Road, Haizhu Community, Yuehai Street, Nanshan District,Shenzhen City.



OWNER'S MANUAL

ARIIC | 力刻

Dear customer:

Thank you for purchasing ARIIC Gemma108 (LK110T/LK110T-2/LK49QT) scooter. In order to make you ride more safely and comfortably, please read this manual patiently. Inspection and regular maintenance before each trip are necessary. When periodic maintenance is required, please go to the ARIIC service shop for maintenance and repair work.

If the structure or parts of the motorcycle are modified, it will affect the performance, the life of the motorcycle and the safety of the rider.

Due to improvements or other changes, there may be information in this manual that differs slightly from your vehicle, ARIIC reserves the rights to make product and publication changes at any time without notice and without incurring any obligation.

Owner Name

Purchase Date

Model No.

Engine No.

Frame No.

Dealer stamp:

• This owner’ s manual applies to Gemma 108 (LK110T/LK110T-2/LK49QT) version.

• If your vehicle differs slightly from this manual ,the vehicle shall prevail.

Jinlang Science And Technology Co.,Ltd

Address: No.1111 Jinlin Road,Jinqing Town,
Luqiao district,Taizhou,Zhejiang,China

Website: www.ariic-scooter.com

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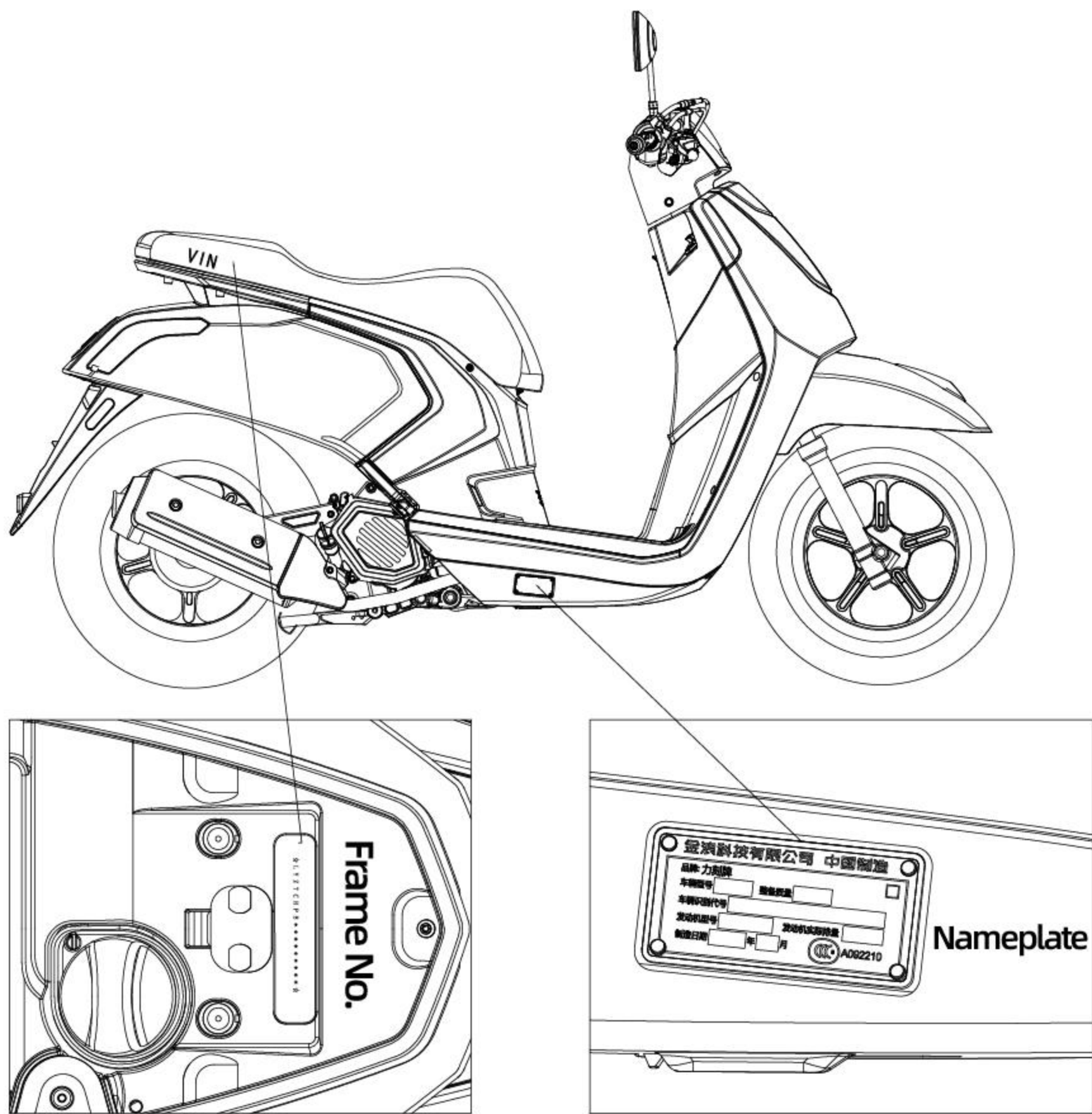
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Vehicle maintenance and repair

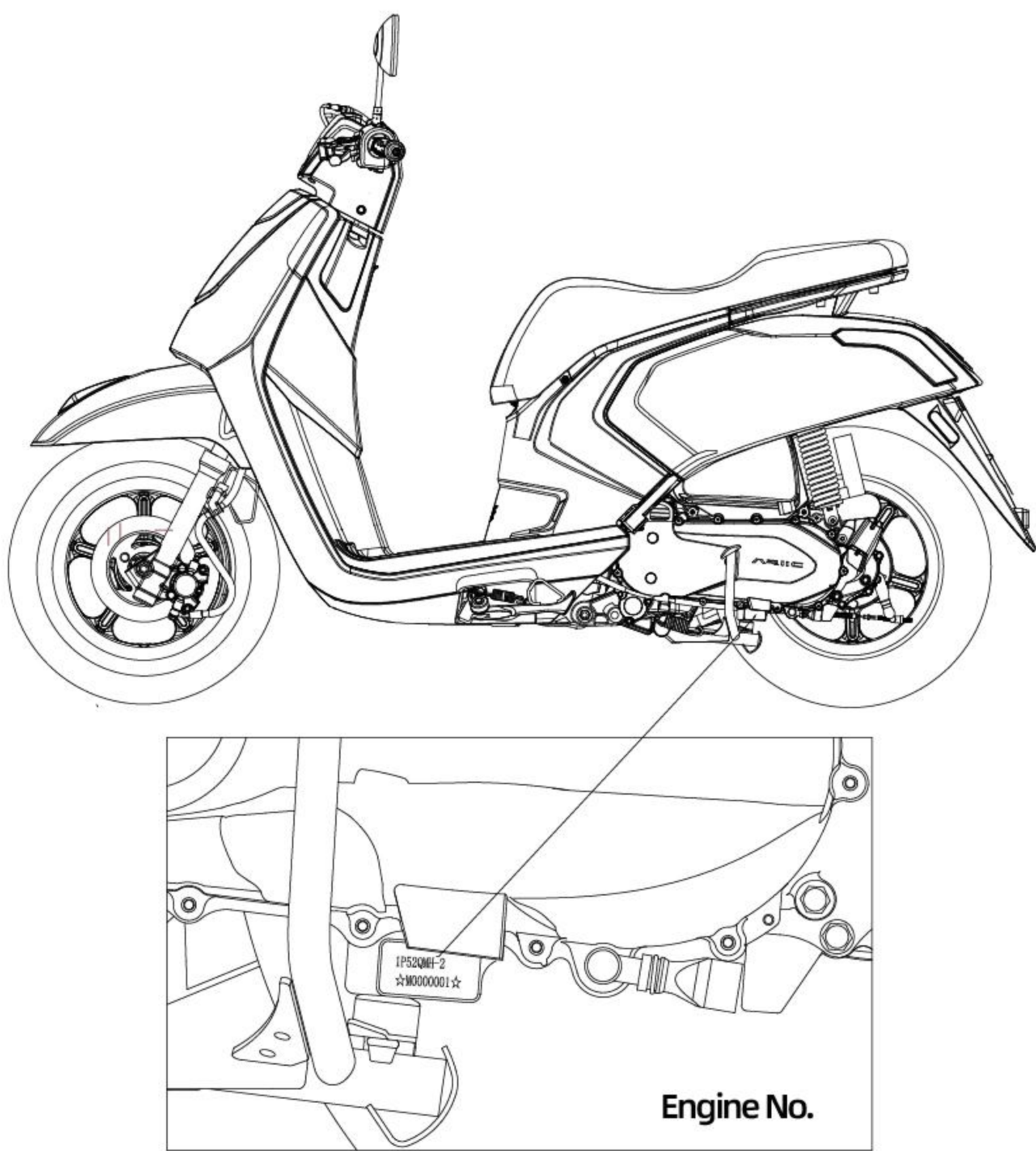
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Vehicle information

1.Position of frame No. and nameplate



2.Position of engine No



Specification (LK110T/LK110T-2)

Item	Parameter
Engine type	Single cylinder,4-stroke.air-forced cooling
Displacement	117.3ml
Borexstroke	52.4mmx54.4mm
Compression ratio	9.5:1 / 11:1
Max power	6.2kW/7500rpm
Max torque	9.3N.m/6000rpm
Minimum idle speed	1600±100rpm
Gear Type	Automatic stepless transmission
Clutch	Dry clutch shoes,Automatic centrifugal
Ignation type	ECU
Starter	Electric (kick option)
Spark plug	NGK CPR8EA-9
lubrication type	Splash lubrication +pressure lubrication
Overall dimensions (LxWxH)	1840mmx685mmx1050 mm(LK110T)
	1840mmx685mmx1165 mm(LK110T-2)

Item	Parameter
Net Weight	102 kg
Wheelbase	1270mm
Front tire	100/90-12
Rear tire	110/90-12
Fuel type	92# and above
Oil capacity	0.85L
Fuel tank capacity	5.0L
Oil type	SAE:10W-40,API:SL
Battery type	12V6.5AH
Fuse	20A/10A/10A/10A
Max speed	90km/h
Fuel consumption	2.5L/100km
Brake type	Front disc rear drum(with CBS)
Ground clearance	135mm

Specification (LK49QT)

Item	Parameter
Engine type	Single cylinder,4-stroke.air
Displacement	49.4ml
Bore×stroke	37.8mmx44.0mm
Compression ratio	11:1
Max power	2.4kW/8500rpm
Max torque	3.2N.m/6500rpm
Minimum idle speed	1800±100rpm
Gear Type	CVT
Clutch	Dry clutch shoes,Automatic centrifugal
Ignation type	Electric
Overall dimensions (L×W×H)	1840mmx685mmx1050 mm(LK49QT)

Item	Parameter
Net Weight	100 kg
Wheelbase	1230mm
Front tire	100/90-12
Rear tire	100/90-12
Fuel type	92# and above
Oil capacity	0.85L
Fuel tank capacity	4.8L
Oil type	SAE:10W-40
Battery type	12V 6.5AH
Fuel consumption	2.2L/100km
Brake type	Front disc rear drum

2、 Out of schedule maintenance

Item	phenomenon and handle
Ignition system	If there is obvious persistent ignition failure 、 engine overheating 、 engine flameout ,then maintenance or inspection
Gear oil	Between 10000 kms to 15000 kms,if the horsepower is significant dropped ,please remove the carbon deposits from the exhaust system,cylinder head and on the top of piston .
Carbon deposit removal	Between 10000 kms to 15000 kms,if the max speed is significant dropped ,please maintain or inspect the CVT system .
Piston	The first 1000kms is the break-in period of the vehicle ,if you are overloaded or driving at high speed atthis stage (before 500kms ,the max speed does not exceed 70km/h ,from 500kms to 1000kms avoid prolonged high speed), may caused piston 、 piston rings and cylinder wearness or cylinder stuck,please clean or replace new parts in time

Notice before riding

Before riding

This manual explains about the correct use method, safe riding, simple inspection method of the motorcycle that you bought.

In order to make your ride more comfortably and safely, please read it carefully. If you have any questions about this manual, please contact ARIIC distributor or ARIIC Motorcycle Sales Service Department .

For your rights, please obtain the user's manual from the dealer when purchasing.please accept the following instructions:

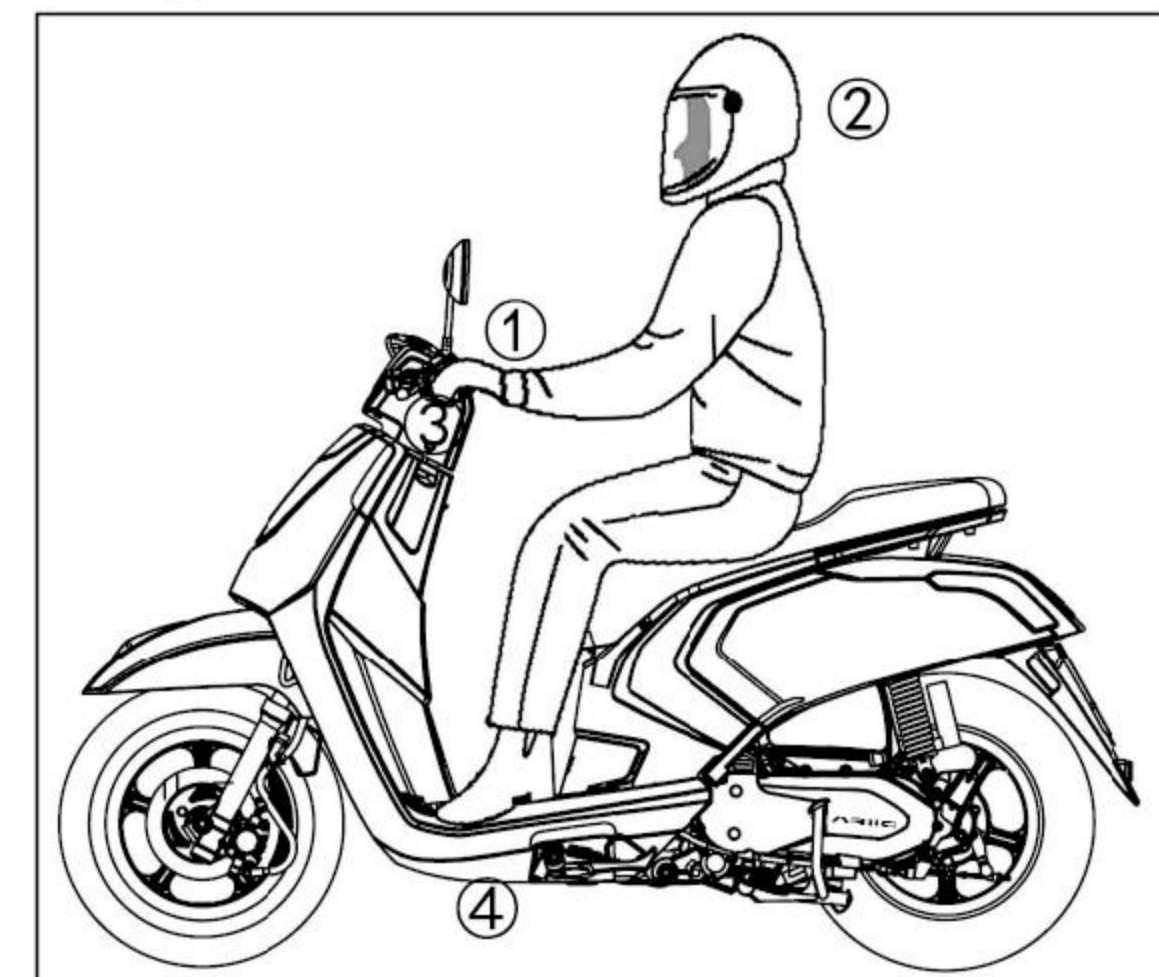
- 1. The correct use of the motorcycle.
- 2. Checking and maintenance matters before receipt.
- 3. If there are any changes to the style of the motorcycle, if the photos or pictures on the manual are different from the real ones, the actual motorcycle shall prevail.

Notes:

In order to maintain the best performance of your motorcycle, you must implement a complete periodic inspection process, we hope that you carry out the initial inspection and maintenance of the new motorcycle when the new motorcycle travels 500 kilometers.

Safe riding

Keep relax and wear comfortable clothes,which are Essentials of safe riding.



①The cuffs should be buttoned well,the clothes should be neatly dressed,avoid cuff hooking on brake lever .please do not wear the clothes which may hinders driving safety to avoid danger

②Wear an approved helmet

③Hold the handlebars with hands while riding . Do not ride with one hand , it is very dangerous.

④It is safer to wear flat shoes.



During riding or riding after 30 minutes, the temperature of the exhaust pipe is very high, please do not touch it to avoid burn

When parking, keep away from sparks, flames, or flammable objects to avoid fire



Do not run the engine in enclosed or partly enclosed room.- Carbon monoxide in exhaust gases is toxic and deadly.

Riding method

● Maintain a natural posture to operate freely.

● The operation safety of the two-wheeled vehicle is affected by the sitting position of the rider. Please sit in the center of the cushion during riding. If the rider sits on the rear half of the cushion, the load on the front wheel will be reduced, and the handle may swing,prone to danger



●When the vehicle turns, the body leans slightly inwards, so it is easier to turn.If the vehicle and body do not keep leaning inwards, riding is not safe.

●Damaged、 gravel or uneven road,it is unstable when riding. During riding, first check the road conditions, then slow down, relax your wrists and shoulders, and hold the handlebars tightly.

Loading

●Loading or without loading ,the feeling of the handlebar will be changing ,please be careful on it .overload ,the handlebar is easier swing ,please avoid overloading .

●The temperature of the exhaust pipe is very high, and the passenger should be careful when getting on and off the vehicle to prevent burn.

●Load weight

①front box :1.5kg

②luggage box :10kg

▷ Do not put valuables in any box of the motorcycle to avoid losing .



The structure of the scooter is related to its function. Any modification will deteriorate the performance, shorten the life of the scooter , and affect riding safety



The arbitrary refit of the scooter is illegally. Once the scooter has been modified, it will lose the warranty rights.

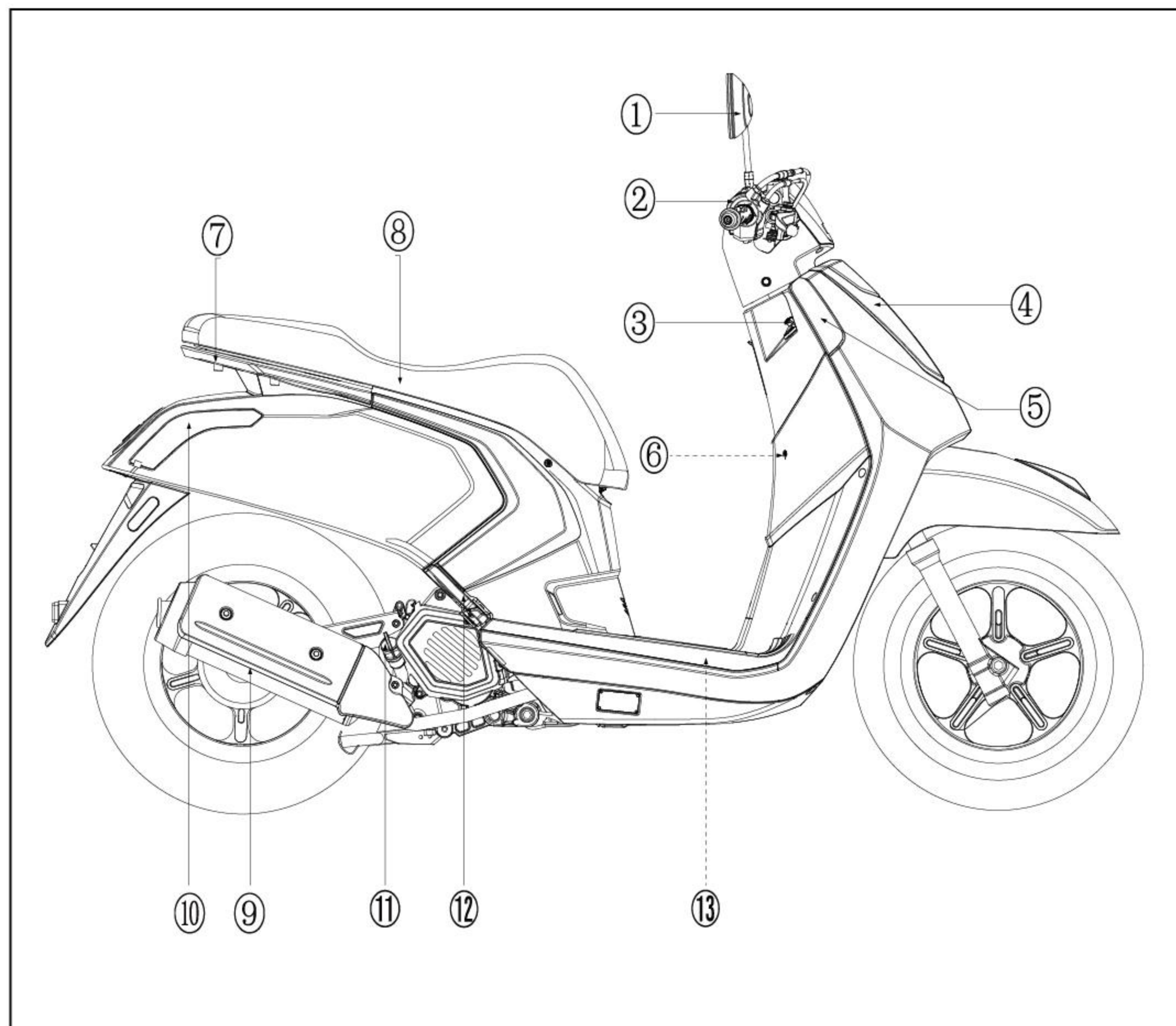


It is prohibited to place any cloth between the body cover and the engine to avoid fire except the designated storage box

Part name and operation

Part Name

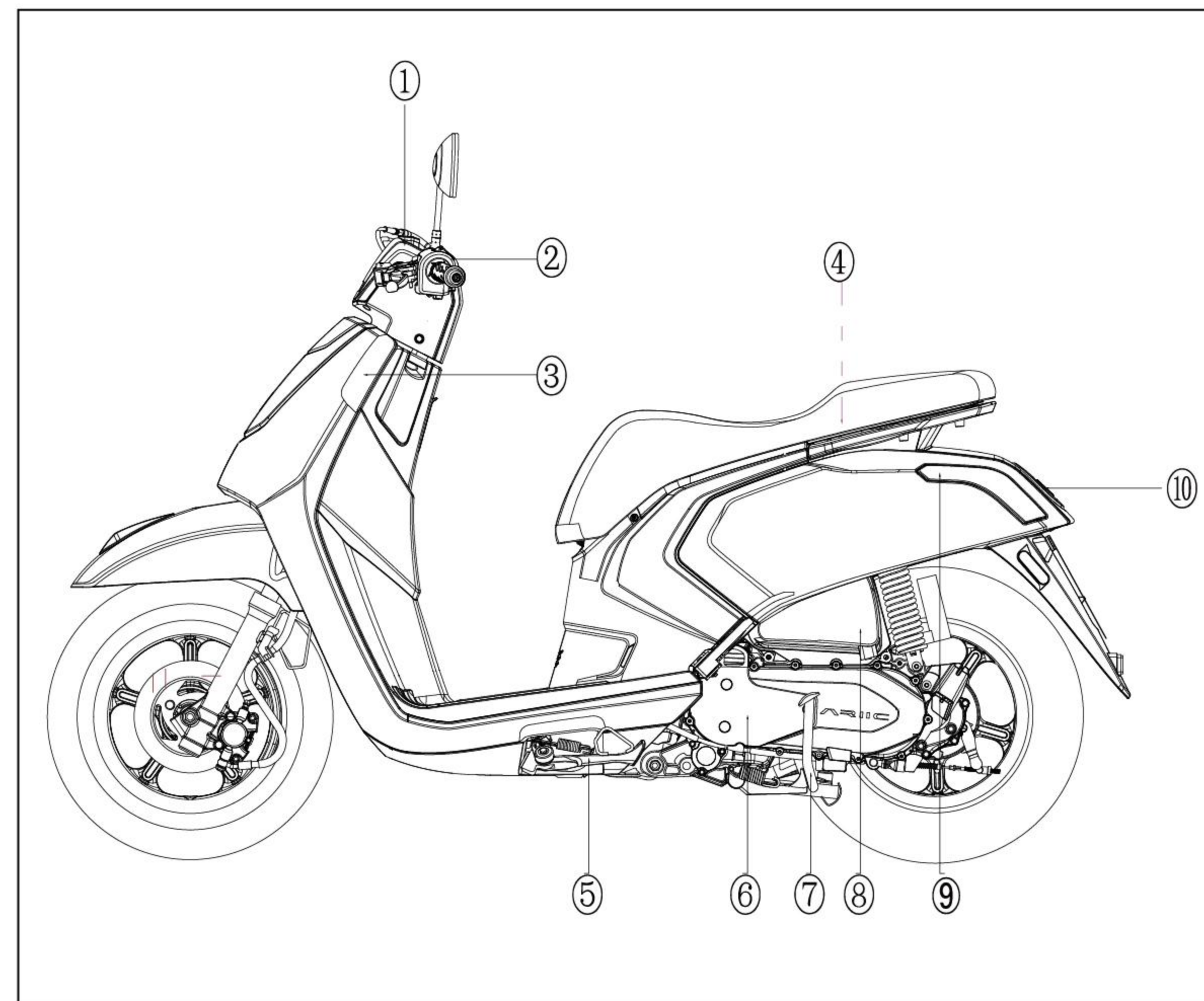
- ① Mirror
- ② Auto start-stop switch /start switch
- ③ Ignition switch
- ④ Headlight
- ⑤ Front right turning indicator
- ⑥ Antenna(under the lock set)
- ⑦ Rear carrier
- ⑧ Seat
- ⑨ M uffler
- ⑩ Rear right turn indicator
- ⑪ Engine oil injection port
- ⑫ Pedal
- ⑬ Battery (right side of the foot rest)



Part name and operation

Part Name

- ① Speedometer
- ② High/Low beams switch
Horn switch
Turning indicators switch
- ③ Front left turning indicator
- ④ Fuel injection port
- ⑤ Side stand
- ⑥ Engine
- ⑦ Main stand
- ⑧ Air filter
- ⑨ Rear right truning indicator
- ⑩ Taillight



Parts operation

TFT Speedometer function and operation

① Speed meter

the speed is measured in km/h and mph

② Odometer

a. Riding mileage is measured in km and mile

b. Total mileage (ODO)、one way mileage (TRIP)

c. Press the buttons MODE and SEL at the same time ,exchange the KM、miles

③ Tachometer (RPM)

It is the engine rotating speed per minute, each scale $\times 1000\text{rpm}$, it is the transient speed.

④ High beam indicator

This light illuminates to indicate that the headlight is in the high beam position.



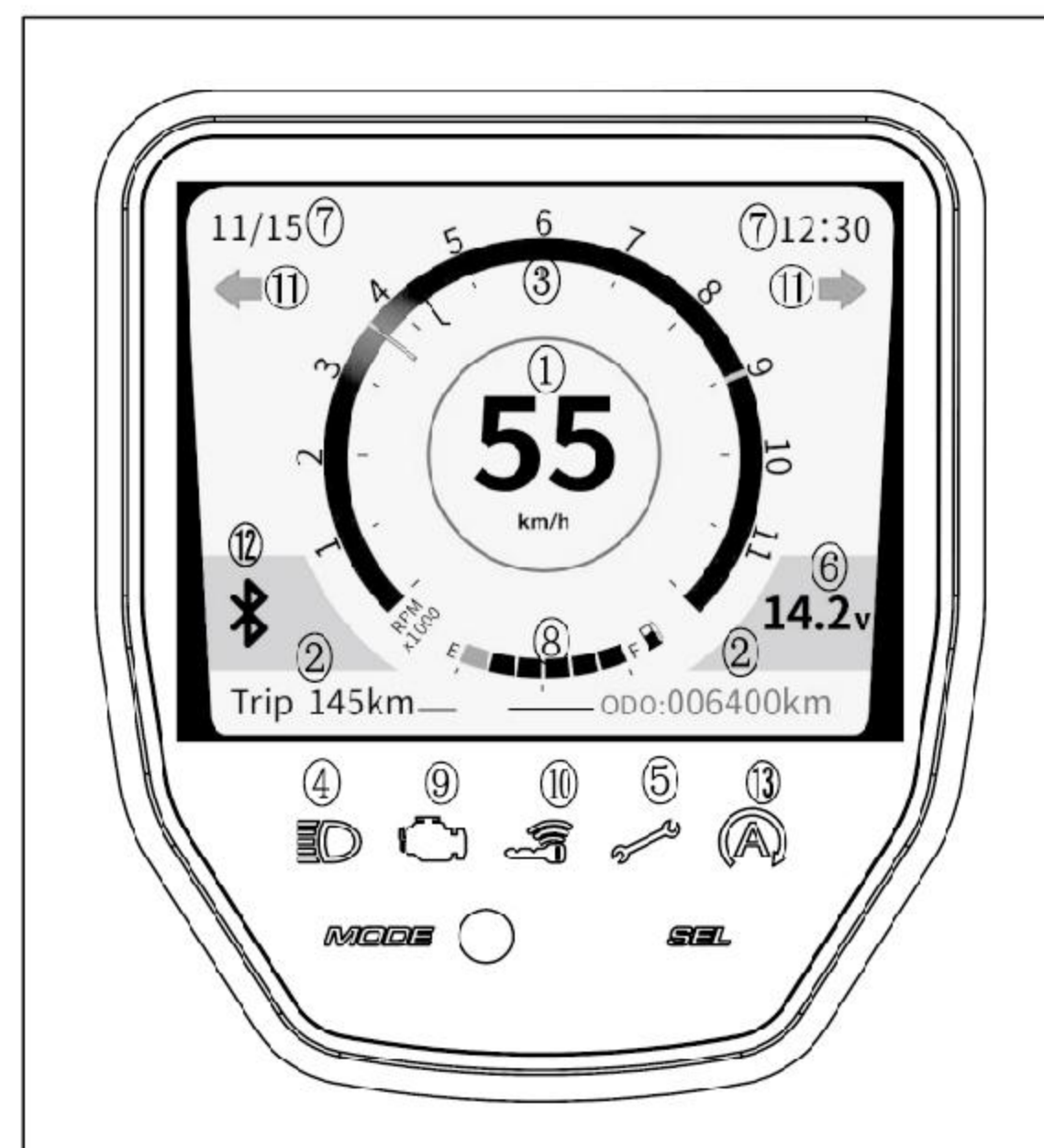
When riding in an urban area, please change the headlights to the low beam position to avoid disturbing the line of sight of the incoming car and ensure riding safety.

⑤ Maintenance indicator

a. The indicator light will be on every 3000km, it is reminding you to change the oil/maintenance the vehicle.

b. After the vehicle is maintained, the maintenance mileage needs to be reset.

c. Long press the buttons MODE and SEL at the same time ,the maintenance indicator will be off .



Maintenance indicator: at the first 500km, the maintenance indicator will not on, please don't forget the first maintenance .please check the oil in every 1000km, if it is not enough ,please add the oil

⑥ Battery voltage indicator

this position show VOLT (battery volt), if the volt is lower than 10.5V, the red light will be on .

⑦ Time

Long press MODE button to entry the set of time /alarm : first the Month will start to shine ,short press SEL to adjust the number ,after the number is confirmed ,short press MODE ,the Date will start to shine ,short press SEL to adjust the number; The adjustment for clock /mintue is the same as above .short press MODE to save the settings and exit .long press SEL to reset the hours

⑧ Fuel gauge display and fuel indicator light

Indicates the amount of gasoline in the fuel tank

When the display of the fuel gauge is close to the area of E ,and the fuel indicator will begin to shine , it indicates that the effective residual amount of gasoline is about 1.0L (can ride around 40km). Please replenish 92# or more unleaded gasoline as soon as possible.

⑨ Error light/Error code

When the engine is working ,the Error light will be off .Wrong operation or changing the electric components will cause the Error light on ,please follow the steps to clear the light (turn on the key ,start the engine ,turn off the key).Then start the engine ,the error light will be off automatically . if it is still on ,it means that the engine has problems ,please go to the ARIC service shop to inspect it .

⑩ key inductor light

PKE indicator light ,the function is introduced in the chapter of PKE

⑪ indicator light

operate the indicator switch ,indicator light will be on

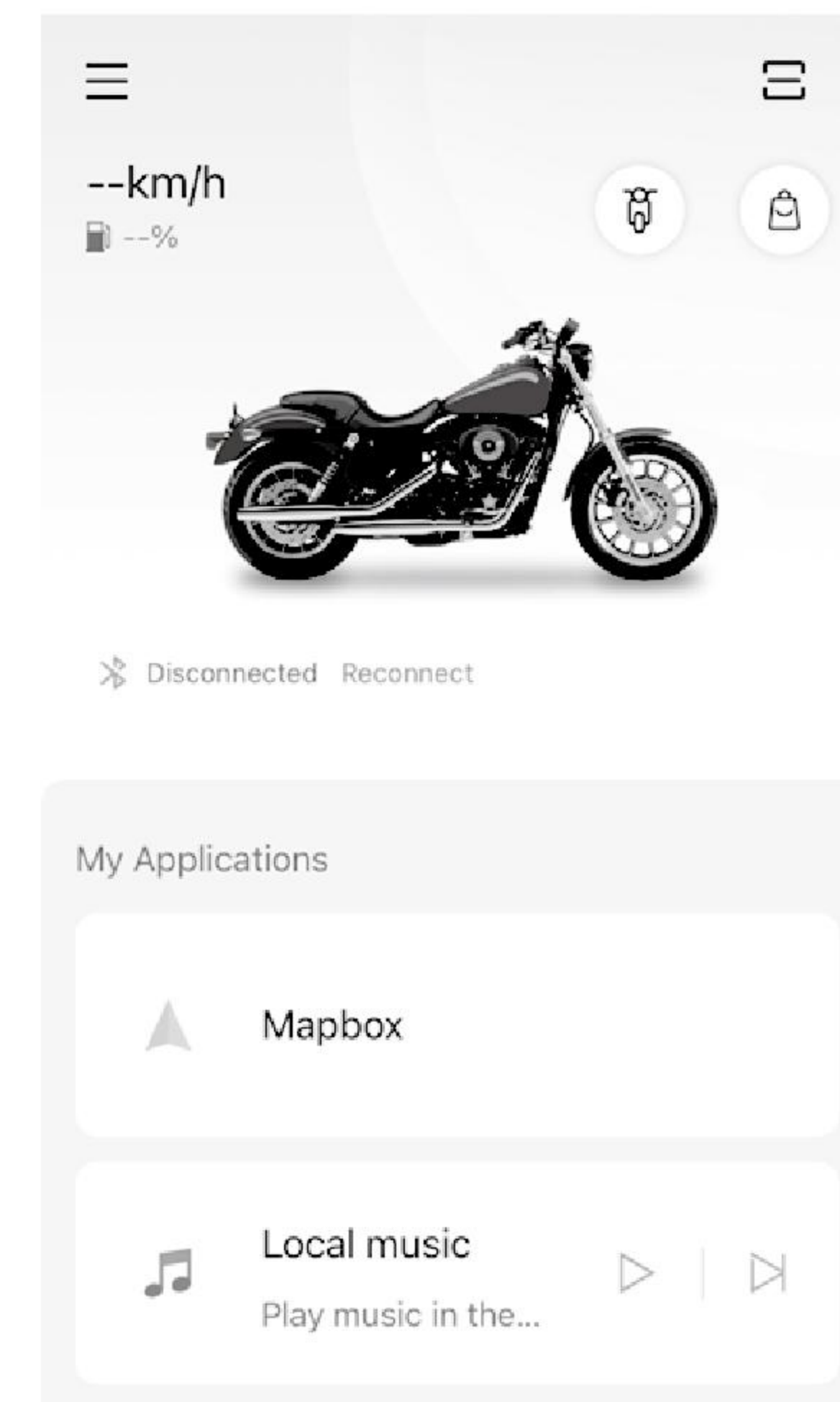
⑫ Bluetooth indicator light bluetooth connection navigation

Connected with Bluetooth TFT speedometer

1. Android and HarmonyOS user scan the QRcode to download "MotoFUN" App.

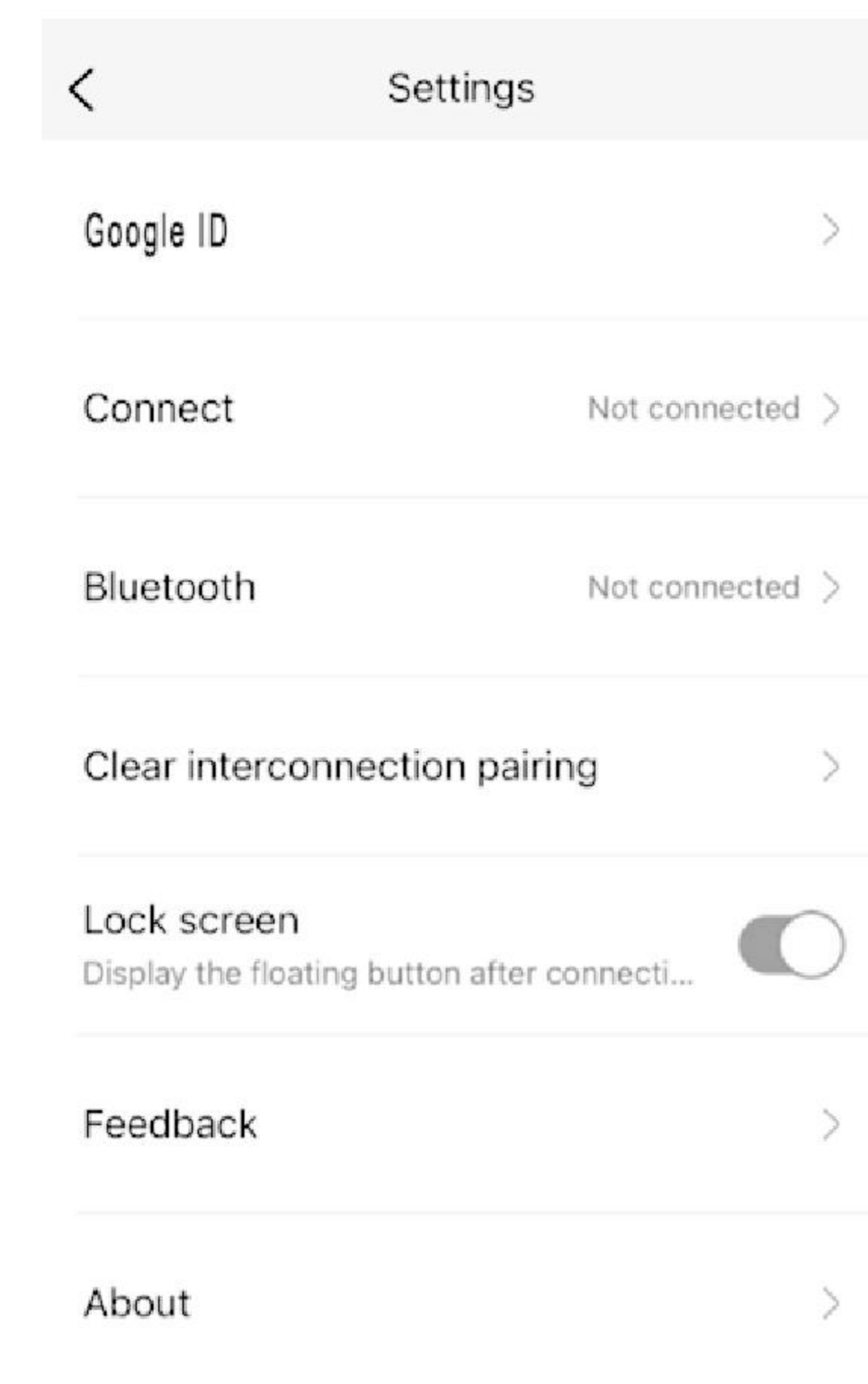


2 iPhone user download "MotoFUN-Int" at App store
3 Open the MotoFUN App ,as follow photo shows .



4 Connect the bluetooth with your phone.

Press

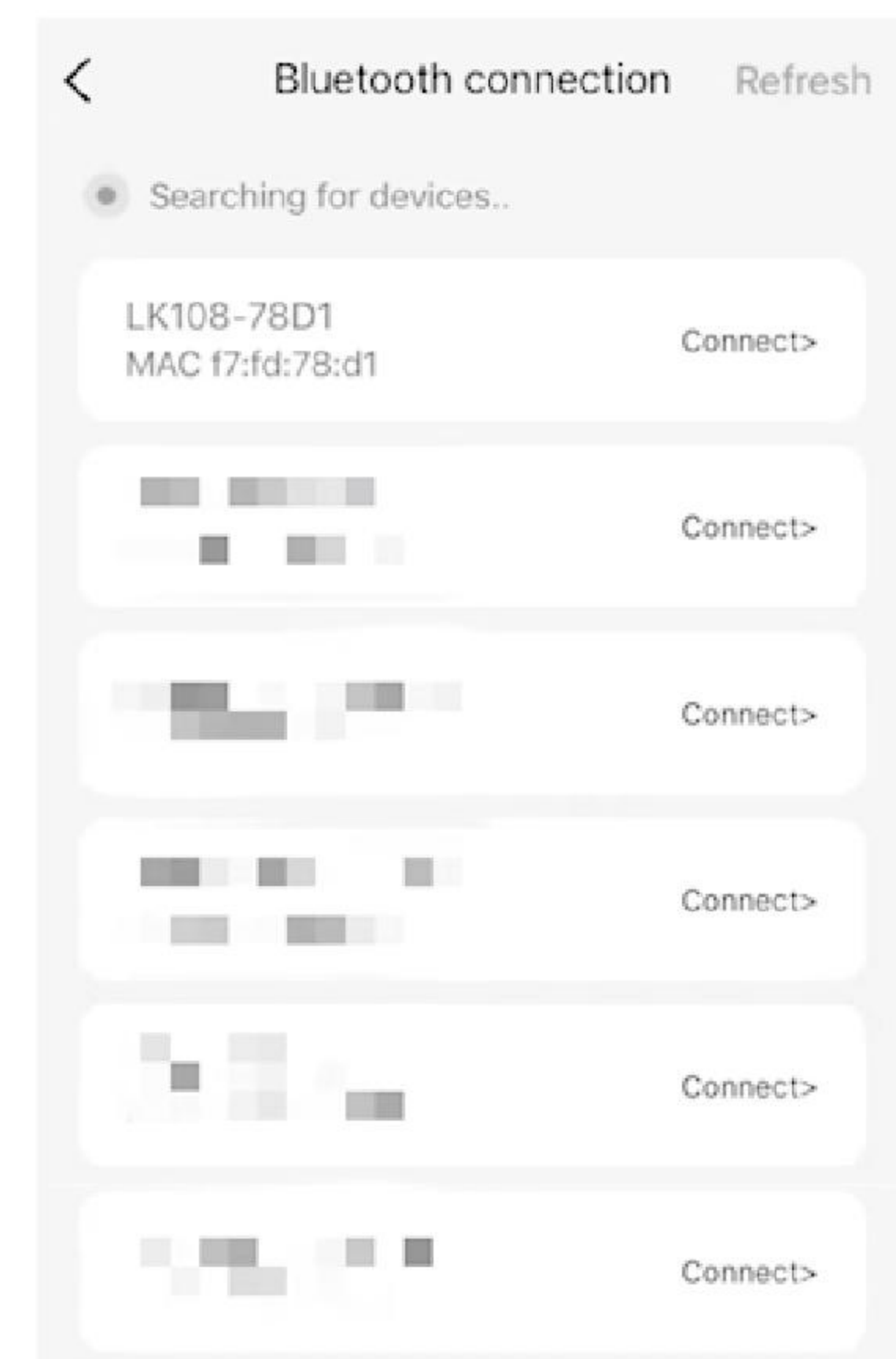


Press Google ID

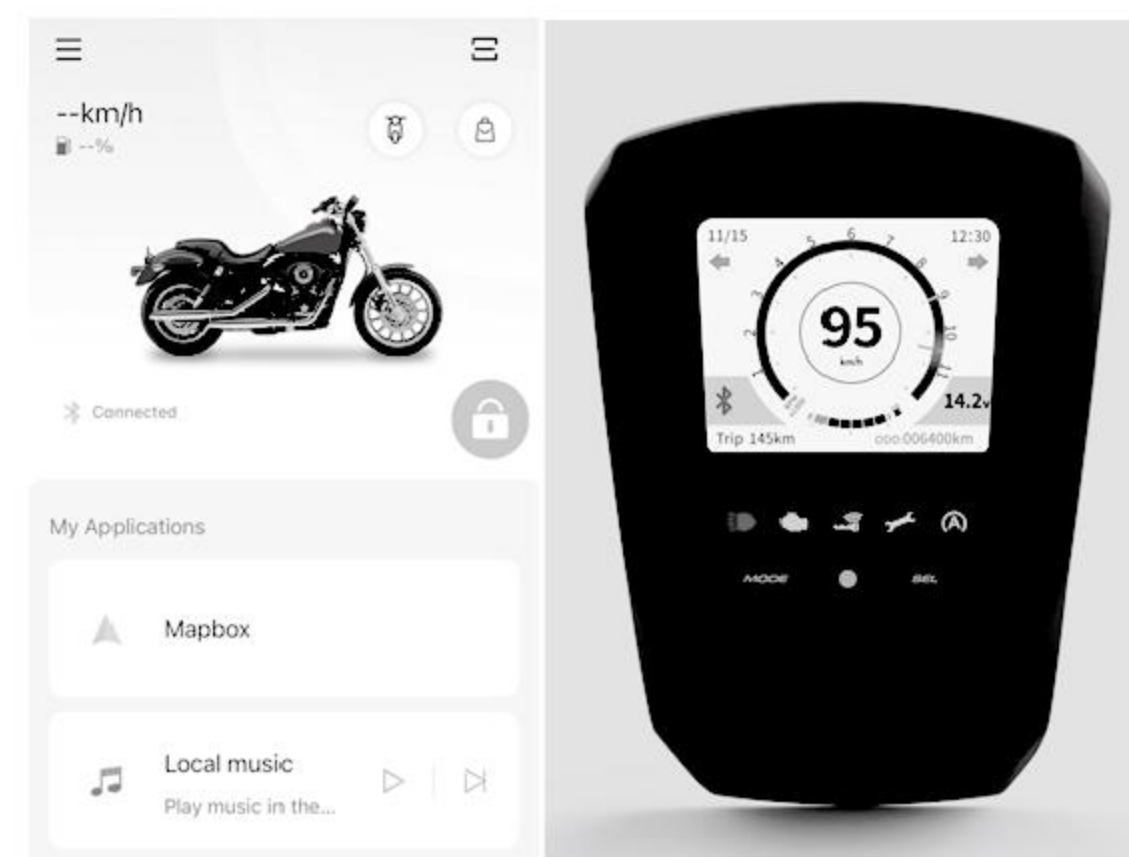
Log in with your google account

Press Bluetooth Not connected >

search for device

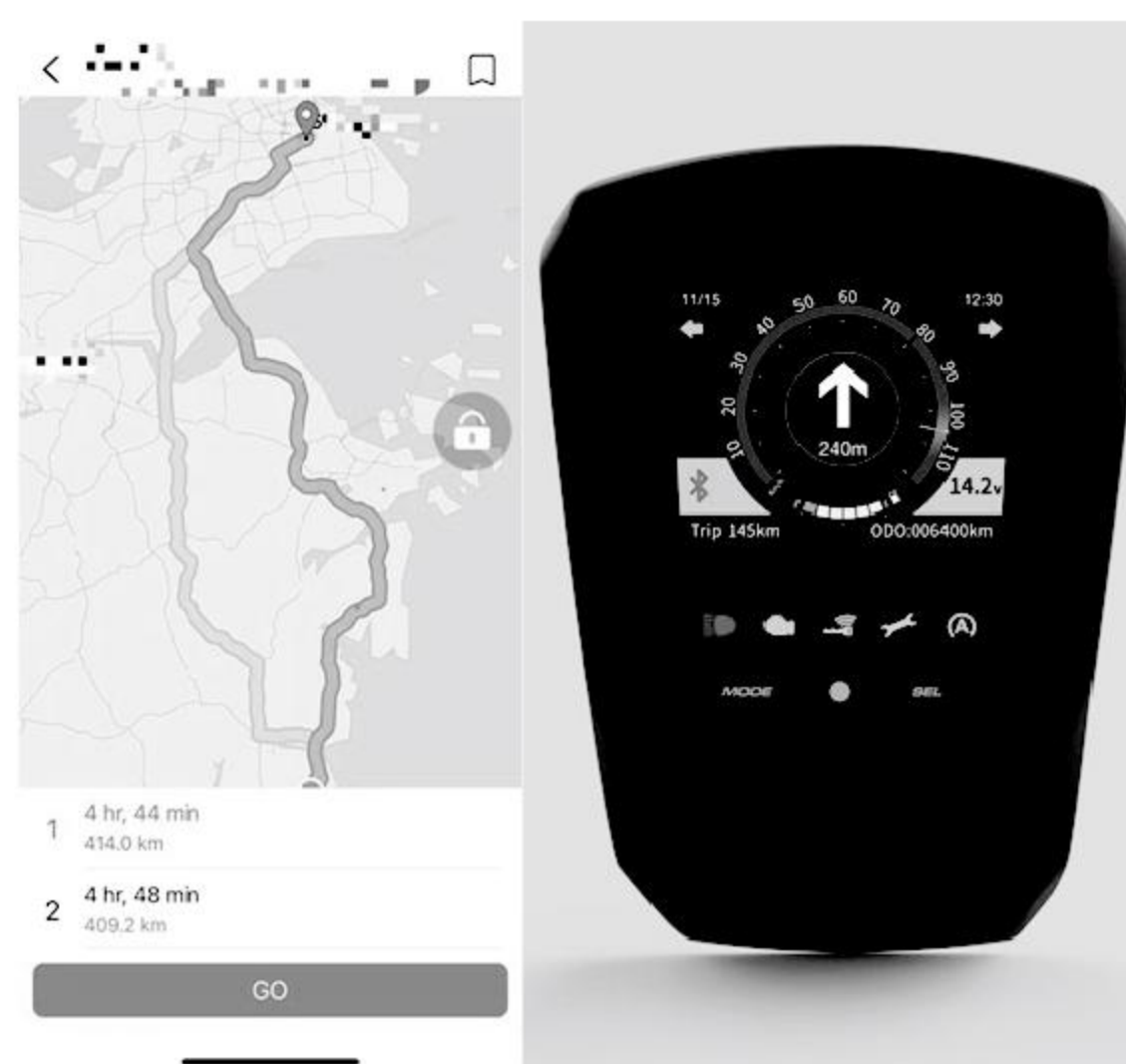


You will find the bluetooth name start with :LK108-XXXX
Press “Connect ” (make sure your bluetooth is open).
If the pairing is successful,
“CONNECTED” will be displayed on the APP and the Bluetooth icon on the vehicle will turn blue.



5 Navigation

Press “Mapbox” or "navigation",
Setting the destination,press "go",
you will find the simple guide line
on the speedometer .



Note:

As for a new meter ,your account will obtain the VIP rights of use given by for 180 days .

During this period,you will be free to use mapbox navigation .

Please make sure that the login account is the car owner's account.

Otherwise once the VIP right of use is given, it can't be given to other users.

⑬ Automatic idling speed inductor light

The function of this indicator will be introduced in the chapter of "start engine " “Automatic idling speed ”.

LCD Speedometer function and operation

① Speed meter

The speed is measured in km/h and mph.

② Odometer

a.Riding mileage is measured in km and mile

b.Total mileage (ODO)、 one way mileage (TRIP)

③ Tachometer (RPM)

It is the engine rotating speed per minute, each scale × 1000rpm,it is the transient speed.

④ High beam indicator

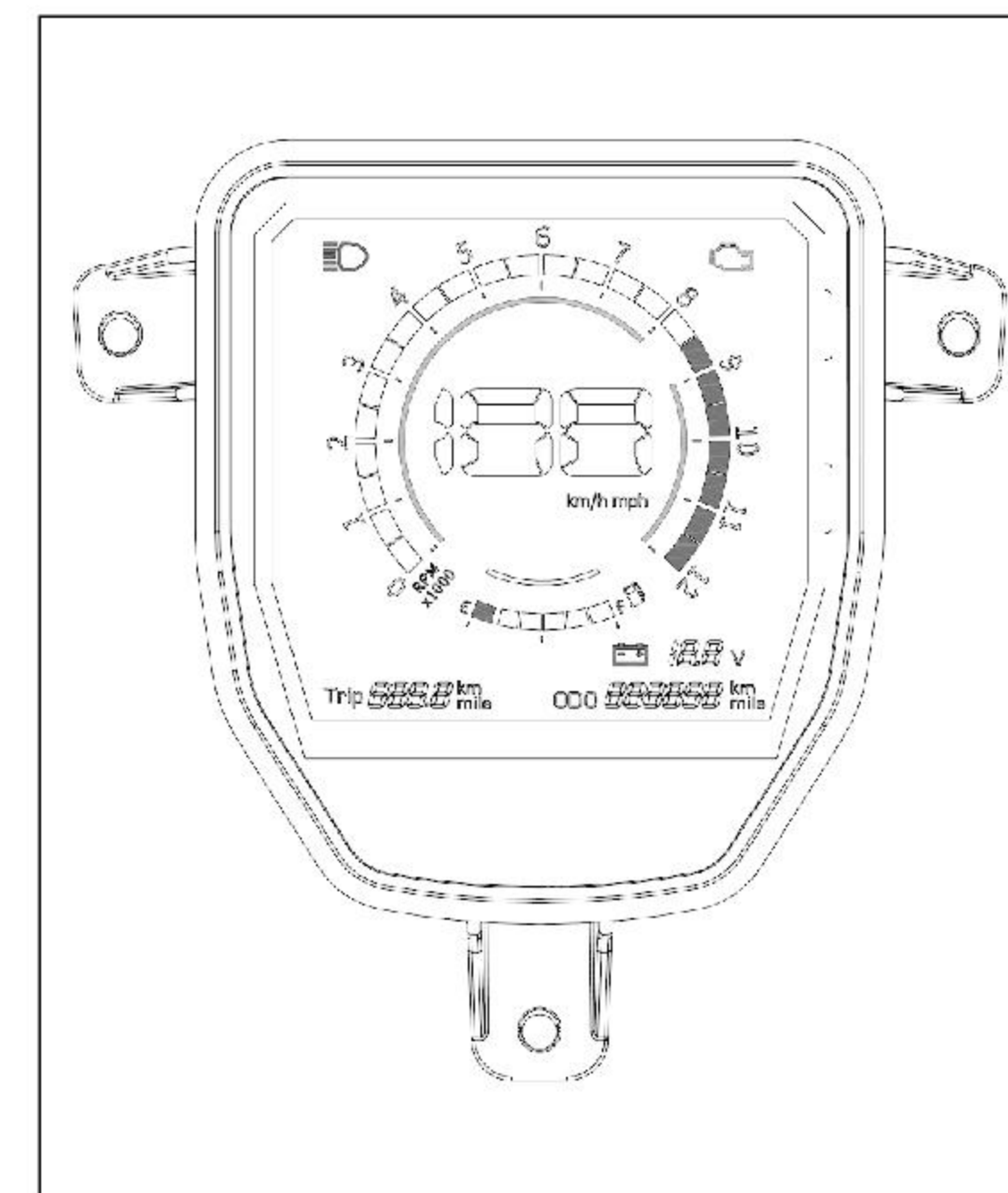
This light illuminates to indicate that the headlight is in the high beam position.



When riding in an urban area, please change the headlights to the low beam position to avoid sight of the incoming car and ensure riding safety.

⑤ Battery voltage indicator

The this position shows VOLT (battery volt),if the volt is lower than 10.5V,the red light will be on .



⑥ Fuel gauge display and fuel indicator light

Indicates the amount of gasoline in the fuel tank when the display of the fuel gauge is close to the area of E ,and the fuel indicator will begin to residual amount of gasoline is about 1.0L(can ride around 40km). Please replenish 92# or above unleaded gasoline as soon as possible.

⑦ Error light/Error code

When the engine is working ,the or changing the electric components will cause the Error light on ,please follow the steps to clear the light(turn the key).Then start the engine ,the it is still on ,it means that the engine has problems ,please go to the ARIIC service shop to inspect it .

⑧ Indicator light

operate the indicator switch ,indicator light will be on .

Ignition switch function and operation

1. Lock Position .Turn the Ignition switch to this position ,handlebar locked.

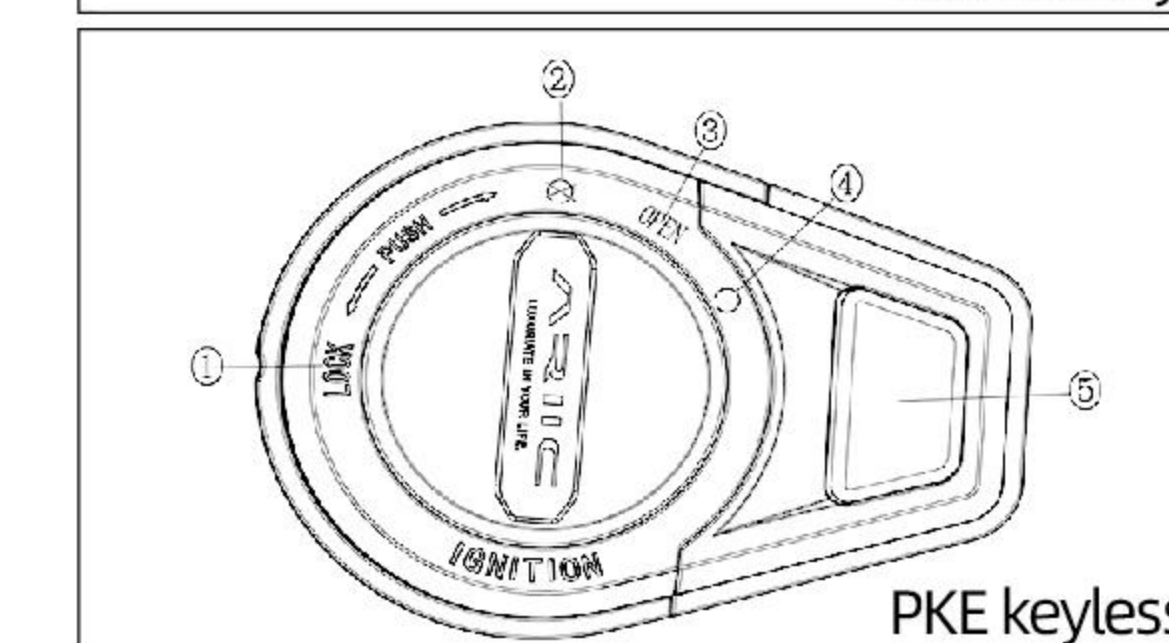
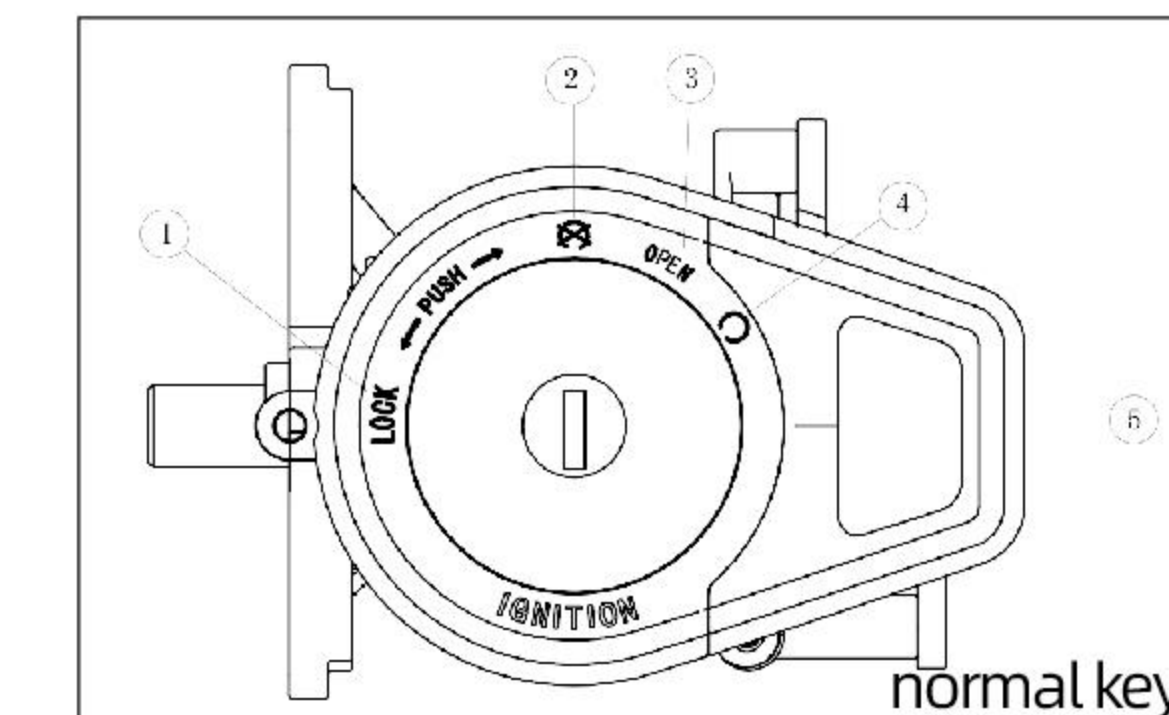
2. ☒ Position. Turn the Ignition

switch to this position ,means power off.

3.OPEN Position ,Turn the Ignition switch to this position,power is off ,press button to open the seat.

4. ○ Position Turn the ignition switch to this position ,power is on.

5.open seat switch . pressing this button can open the seat .the fuel tank cap is inside of the luggage box ,fuel tank cap can be opened closed according to tank label.



During the riding ,please do not turn the ignition switch to ☒ or open position ,this is the main cause of the accident.

PKE smart key control and operation(if have)

Remove anti-theft/set anti-theft

1: Remove anti-theft : The whole vehicle is at the anti-theft (the ignition switch is at the position of "⊗" or "LOCK"), press the ignition switch knob, find a key within the key sensing range (about 2 meters), and the whole vehicle is removing anti-theft . At this time The knob can be rotated, and after 5 seconds, if there is no other action, it will automaticall set anti-theft ; if the key is not found,can't remove the anti-theft ,the PKE signal light "📶"will lowly flash in 8 times

2: Set anti-theft : turn ignition switch from "○" to "⊗" position ,after 5 seconds the vehicle will be set the anti-theft .

Looking for the vehicle

Press the "🔍" button of the remote control key to find the vehicle , the turn signal flashes 2 times, and the electronic buzzer sounds 2times (the farthest distance can reach to 50 meters)

Safety tips of anti-theft for Parking

1: Within the key sensing range, if the ignition switch keeps in the OPEN position ,after 60seconds ,the sound and light safety warning will be activated for 15 seconds (the sound and light warning refers to the blinking of the turn signal and the electronic buzzer synchronously beeping), reminding the user that it is not safe to park the vehicle when the ignition switch at the position of OPEN (at this position , the seat can be open , and the property is not safe), should turn to the "⊗" position ,set the anti-theft .

2: Turn the ignition switch to OPEN position ,in 75seconds if the smart key leaves the key sensing range, and will immediately enter to the sound and light safety warning: reminding the user to turn to the "⊗" position to lock the vehicle . In this state, the ignition switch is rotated from the OPEN to the "○" , and the vehicle can not be started.

Alarm when the key is away from the vehicle

1"Key away from the vehicle Alarm" working mode I :turn on the ignition switch in half minute ,the controller will look for the key in every 5 seconds .after 10 mintues ,the controller will look for the key in every 10mintues to check

whether the key has left the vehicle.if it is detected that the key signal is lost, the instrument PKE signal light "📶" keeps flashing rapidly until the key is found and stops flashing within 1 minute.

2. After using PKE unlock the vehicle normally , after riding ,when the engine is powered off , if it is found that the key can not be found, the vehicle will immediately enter into the working mode of 30-second "key leaving

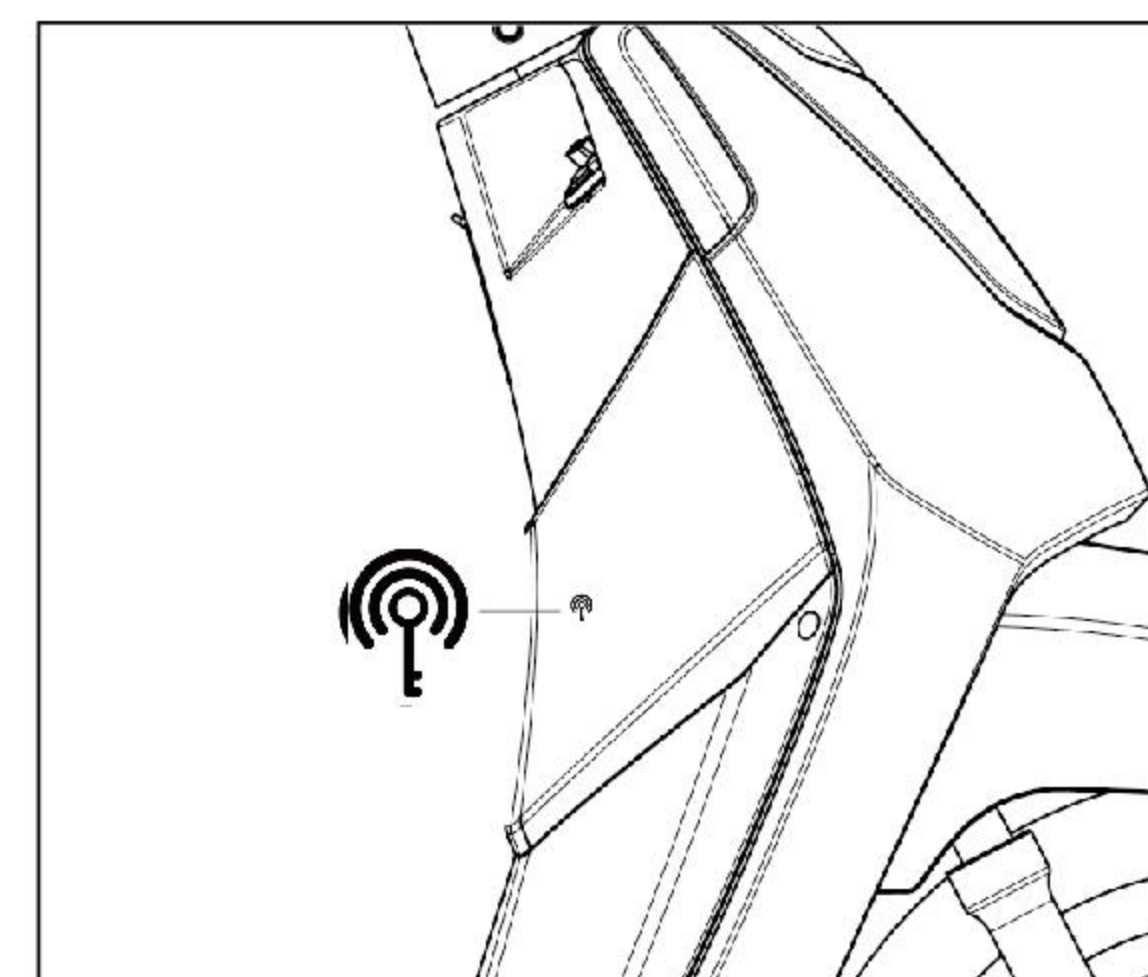
"continuous fast flashing for 30 seconds, sound and light warning 30 seconds (fast frequency 5 seconds, slow frequency 25 seconds), within this 30 seconds, you can remove anti-theft and start the vehicle without the key, giving the user a buffer time to deal with the accidental departure of the key from the vehicle , after 30 seconds, smart anti-theft system changes to normal set anti-theft 、 remove anti-theft 、 packing safety tips mode .



IMMO unlock function (option)

1. When the remote control is short of power or has no battery, and the ignition switch in the position of "⊗" or LOCK, press the ignition switch knob, and within 10 seconds (the PKE signal light "📶" of the instrument flashes slowly 8 times), keep the remote key close to the antennathe(following picture have the "📶"icon location),automatically unlock .

2.Using IMMO unlock to "○" position ,the function of mode I "Key away from the vehicle Alarm" will not start ,PKE indicator light will not alarm during riding .



Remote controller pairing learning

Press the ignition switch knob in the position "⊗" (hold on), wait for the instrument PKE signal light "📶" to be off (hold on at this time), then press the buttons "🔍" and "📶" at the same time , the PKE signal light of the instrument"📶"Long on,then all hands released at this time, and make a new remote controller to be paired approach to the antenna sensing area, the turn signal flashes once, indicating that the new key has been successfully learned.



Note :1.pairing learn is working only when you have the original remote controller .if you lose a remote controller ,please pair a new remote controller in time.

2. For safty ,original remote controller does not support re-pairing.



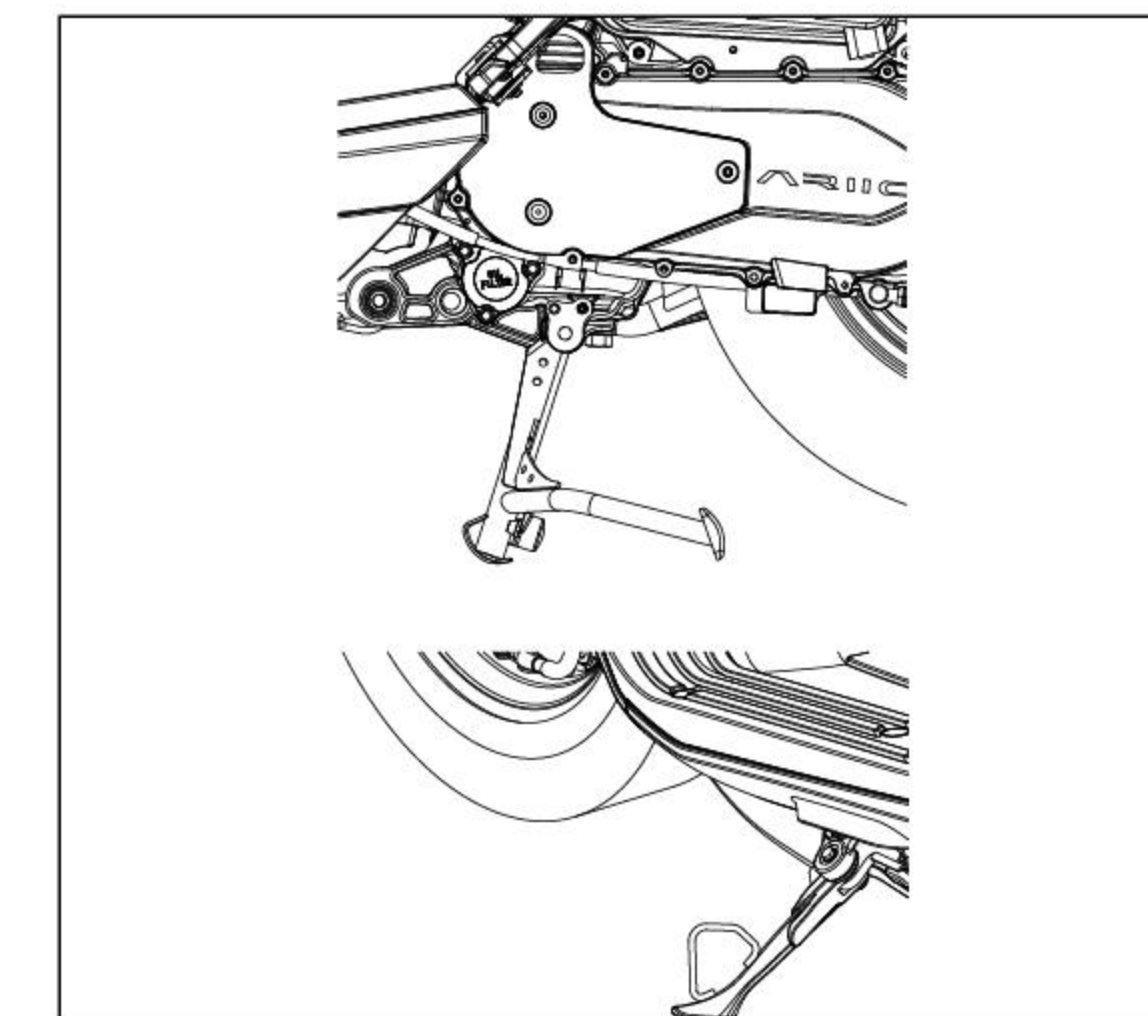
Pressing ignition switch knob , sometimes can unlock the scooter but sometimes can't , or long pressing seat-opening button "📶" 2 seconds, sometimes the seat can be opened

but sometimes can't , mostly because the battery power of the remote controller is not enough ,please replace the battery in time.

Side stand function and operation

The side stand is not only for parking, it contains a safety mechanism .when the side stand is down,the vehicle can't be started .(Check the side stand automatic flameout system)

1. Hold the main stand up on a flat surface.
2. After returning the side stand to the upper position, the engine can be started.
3. After putting down the side stand , you can check whether the flameout function of the side stand is normal or not



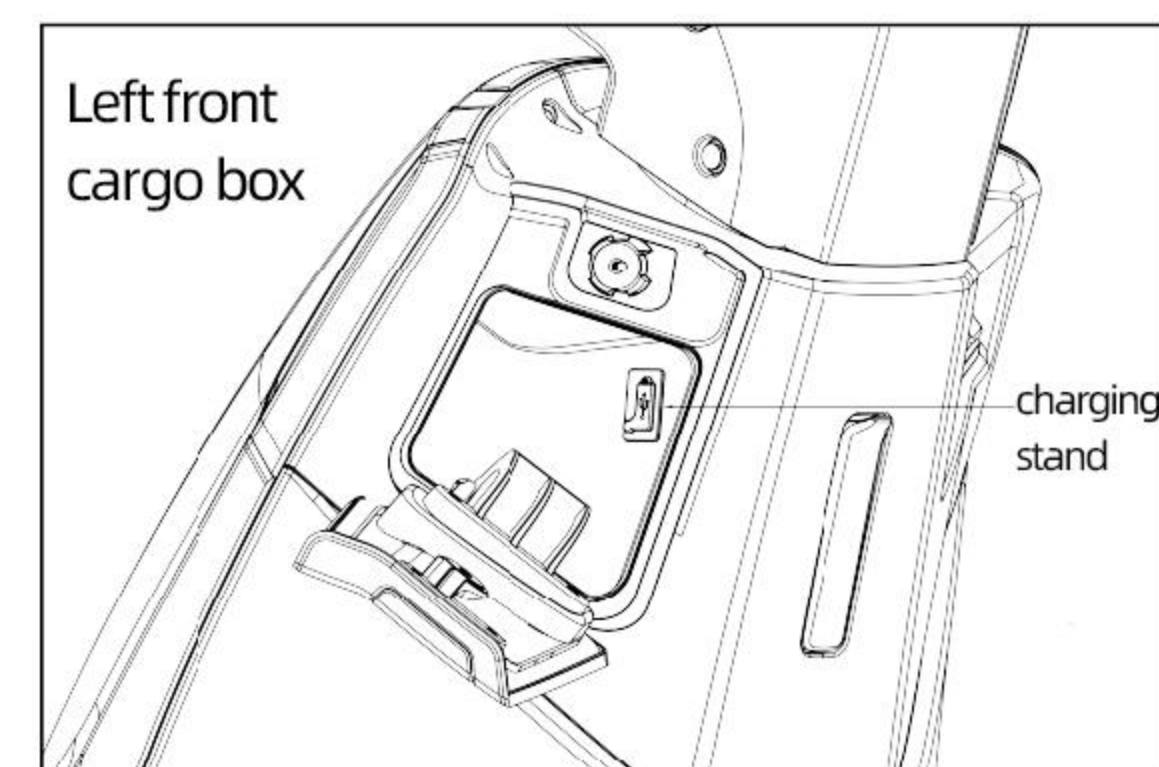


If there is any problem with the side stand operation, Please go to ARIIC dealer shop for inspection .

Front box and USB charger

USB socket

The USB socket is for charging

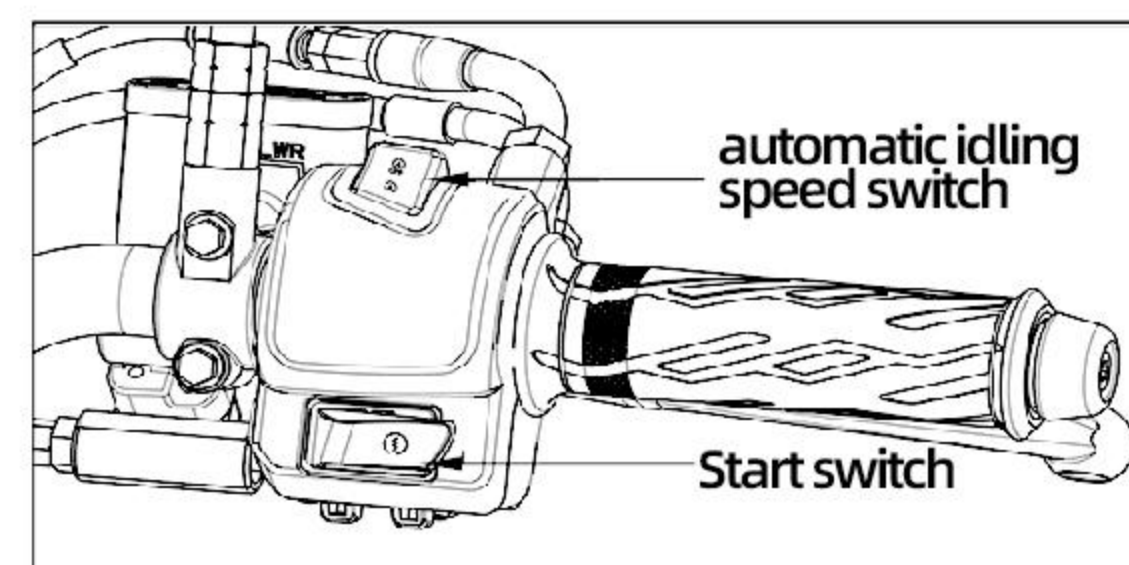


Start switch

turn the ignition switch to " " position , make the side stand up ,press the start button and hold the brake levers . press the start button to start the engine

Automatic idling speed switch Only ISG have

When "  in the position ,the function of the automatic idling speed function " is off . change it to "  "position ,the function of the " automatic idling speed " is on .



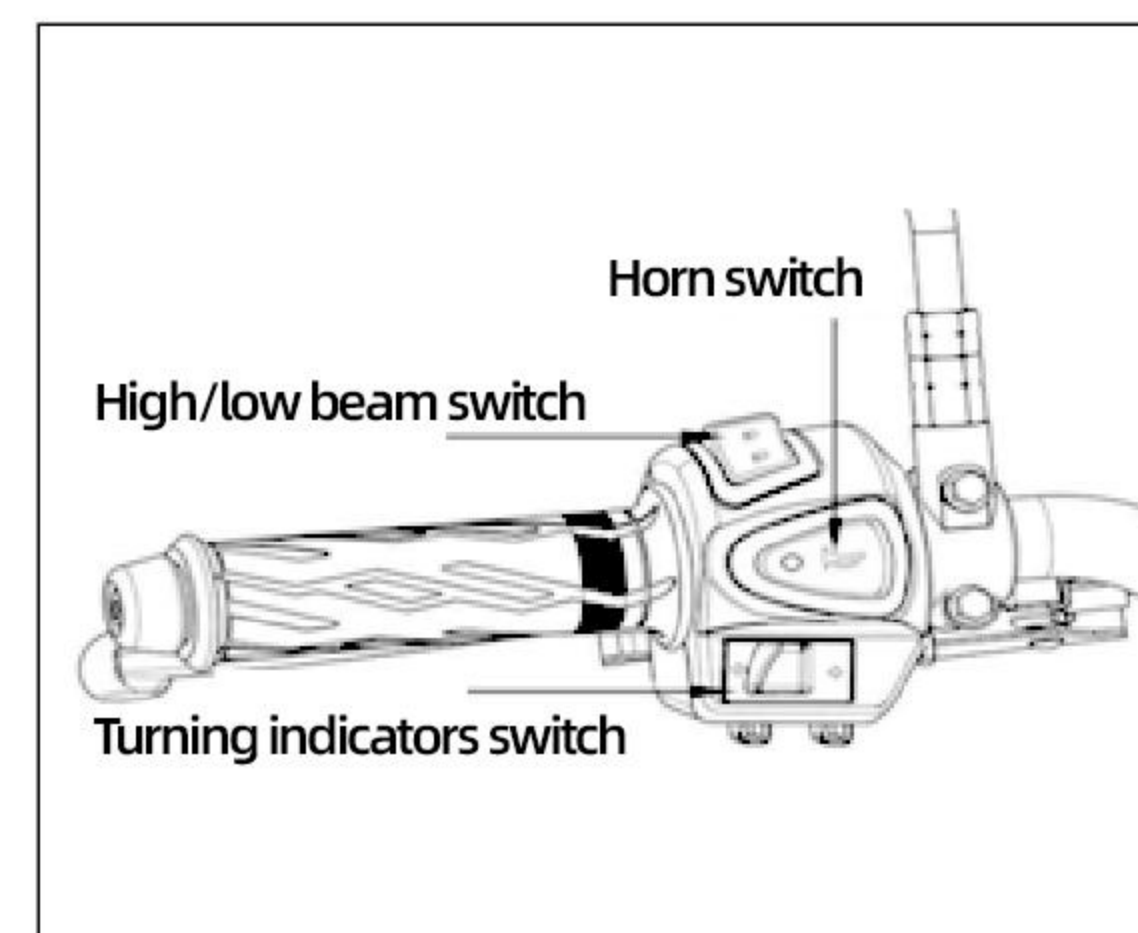
Low beam switch

"  " in this position, the high beam is on.

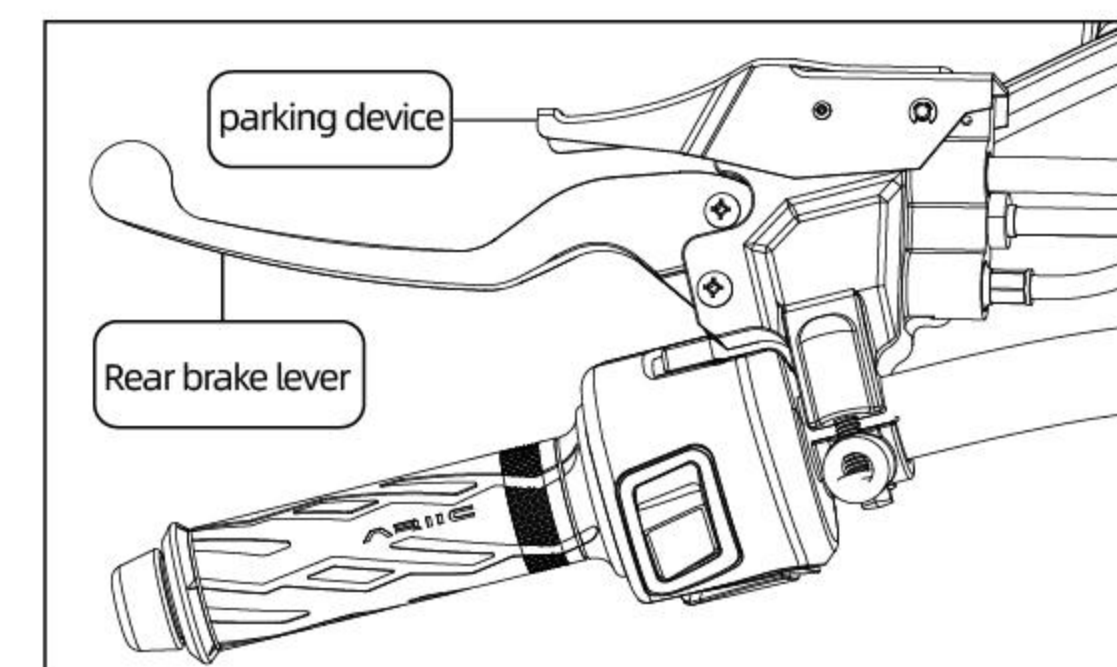
"  " When driving in urban areas or facing oncoming vehicles, use low beams so as not to affect the field of view of oncoming vehicles.

Turning indicators switch

1. When turning or changing lanes, use the turn signal in advance, and the turn signal will flash when the switch is pulled left or right.
In this position "  " , turn left
In this position "  " , turn right.
2. To reset, press the turn signal button down once.
3. When the turn signal is used, the indicator lights of the instrument flash at the same time.



Parking Safety Mechanism (if have)

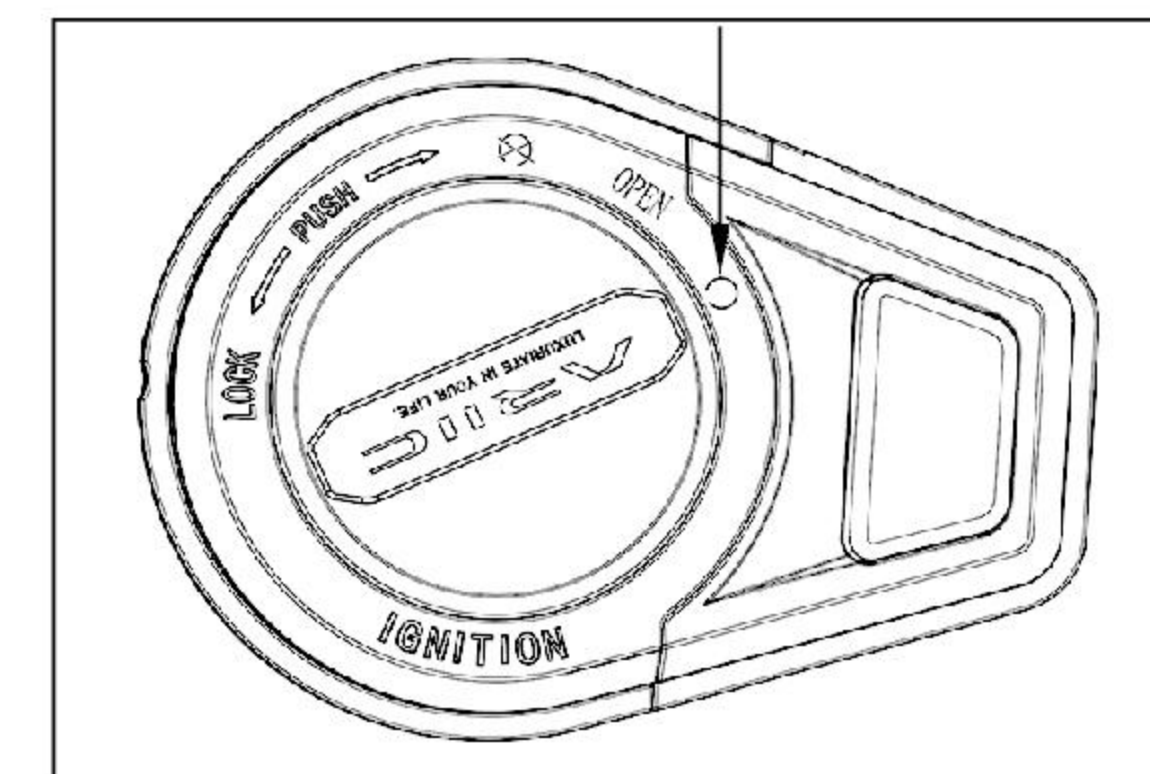


When the motorcycle is parked with the side stand, in order to prevent the motorcycle from sliding unexpectedly use the parking device to lock the rear wheel.

Operation method: Pull the rear brake lever back with your left hand, make the end of the parking device close to the rear brake lever with your right hand, release the rear brake lever with your left hand, if the rear brake lever is locked and will not rebound, then the parking device operation is completed. To release the parking device, squeeze the rear brake lever again, the lock of the parking device will pop open, and the parking will be released.

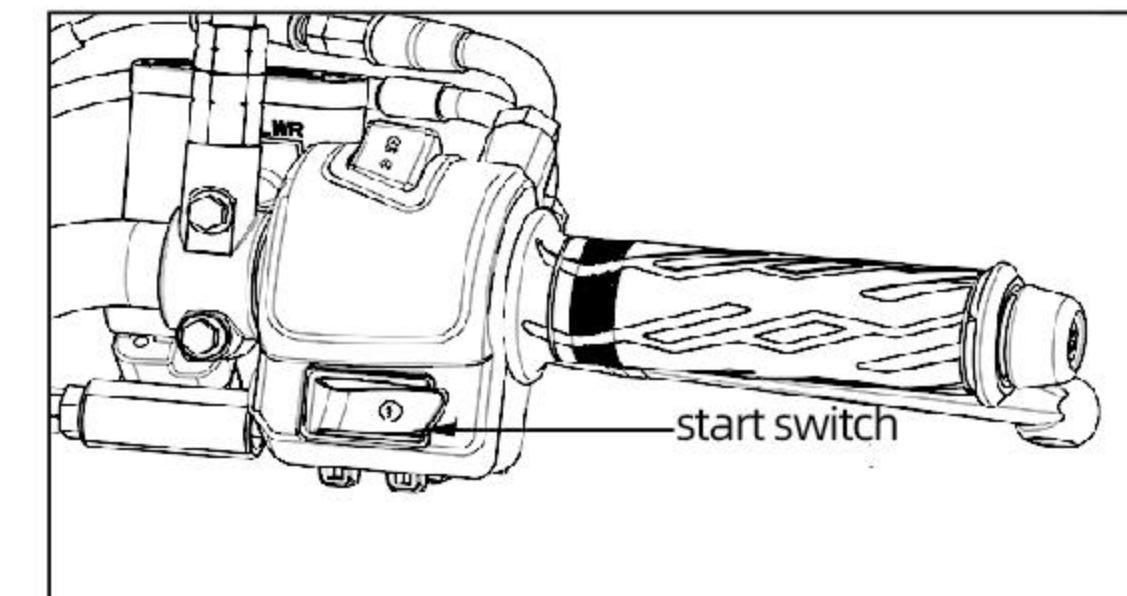
engine start

1. Turn the main switch to the  position.



When the main switch knob points to the  position, press the horn switch, the horn will sound, press the turn signal switch the turning light will flash.

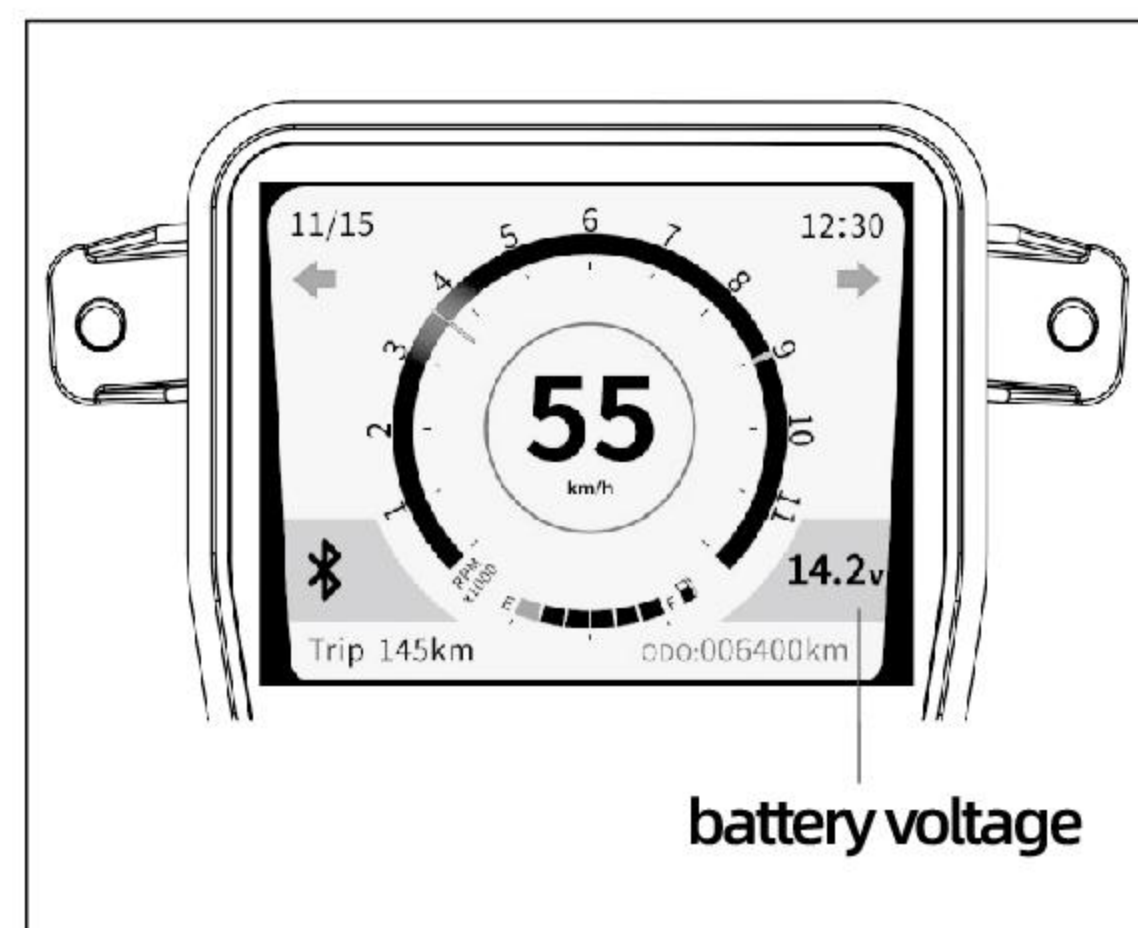
2. Before starting, Kick up the side stand, hold the brake lever, press the start switch button , and the engine can be started automatically without long pressing.
3. When starting the engine, no need to turn the throttle grip.
4. If start the cold motorcycle, keep the motorcycle at idling speed for a while to protect the engine



- a. Press the start switch button, if there is no starting response, please check whether the side stand is up.
- b. After the engine is started, before riding, the brake lever should be kept in the braking state.
- c. Before the vehicle is started, if the indicator light of the automatic idling speed on the meter flashes, and the vehicle can not be started. Probably the reasons are the failure of the smart idling speed system or related electrical components. Please find an official dealer to check.
- d. Battery undervoltage

When the motorcycle can not be started, please check whether the battery voltage displayed by the meter is too low, if so, check the charging system or the battery, and repair or replace it if necessary.

Note : When the battery voltage is lower than 10.5V, the meter voltage will flash in red light to warn.



When the engine is started, please install the battery in a locked mode; if the battery voltage is abnormal, the engine fault light may be on and the battery voltage on the meter may be red. Please go to the dealer or special service station for inspection. ◀

Smart start-stop system (if have)

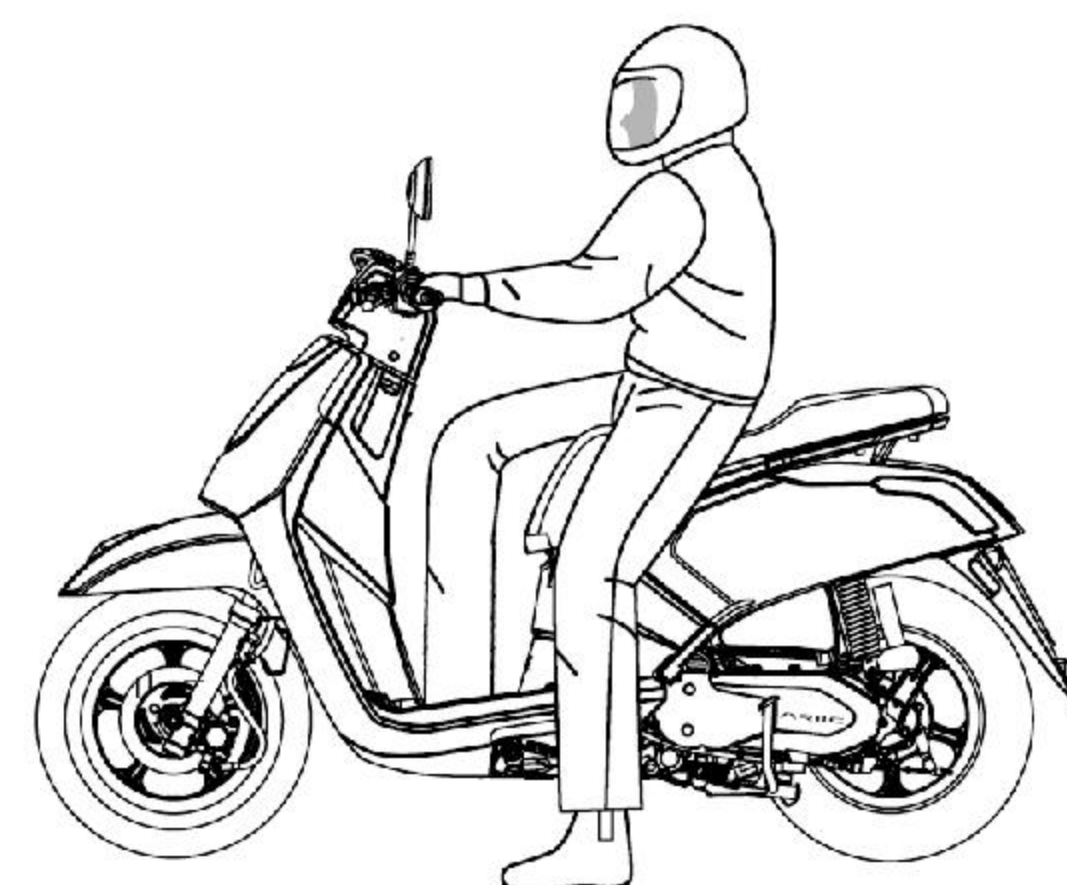
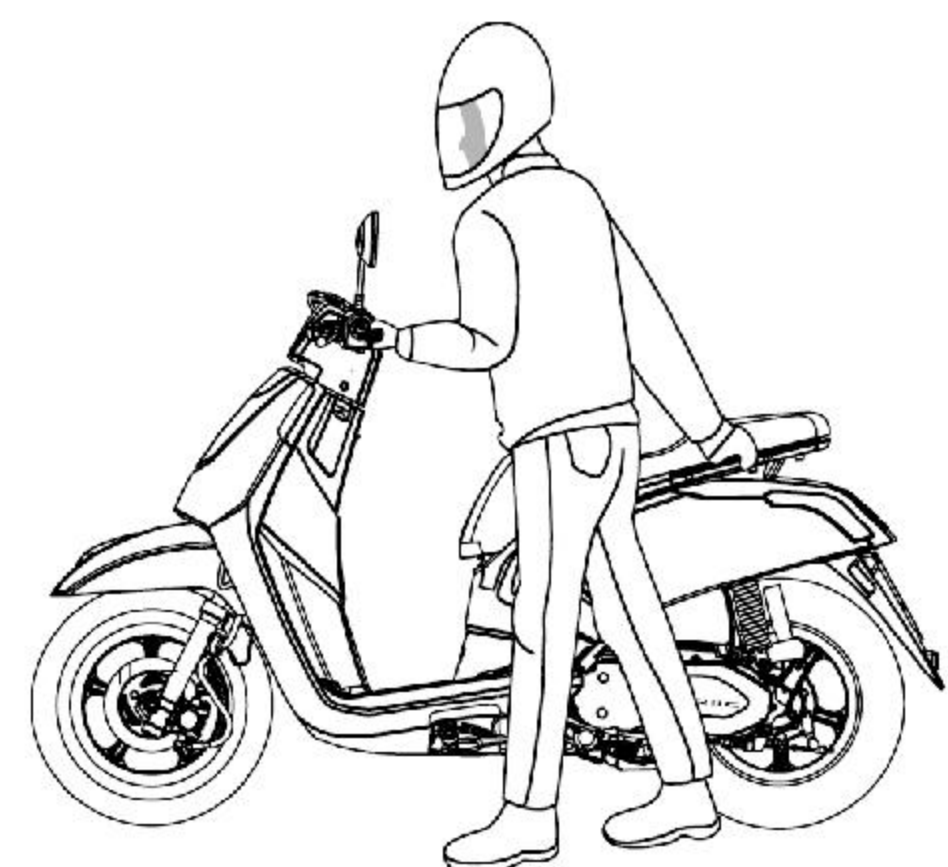
1. Turn the main switch to the position O, and move the automatic start-stop switch in the position (A). The start-stop indicator light turns on for 2s and then turns off.
2. During riding, when the engine temperature exceeds 65° C, the speed exceeds 15km/h for more than 3s, and the battery is not undervoltage, the basic conditions of smart start-stop are reached, and the start-stop indicator (A) is on, if the bike stops at the idling speed. After 3 seconds, the engine will automatically turn off, and the start-stop indicator (A) of the meter will flash continuously.
3. Lightly pulling the throttle grip can realize the smart start, and the indicator light (A) is always on, and the start-stop indicator will flash



- a. The engine temperature exceeds 65 ° C, the ambient temperature is high in summer, it will be reached in a short time, and it is relatively slow when it is cold in winter.
- b. In the state of automatic flameout, do not pull the accelerator to start, and do not be distracted while driving. If you are not ready to start, pull the accelerator to start by mistake, which may cause an accident.

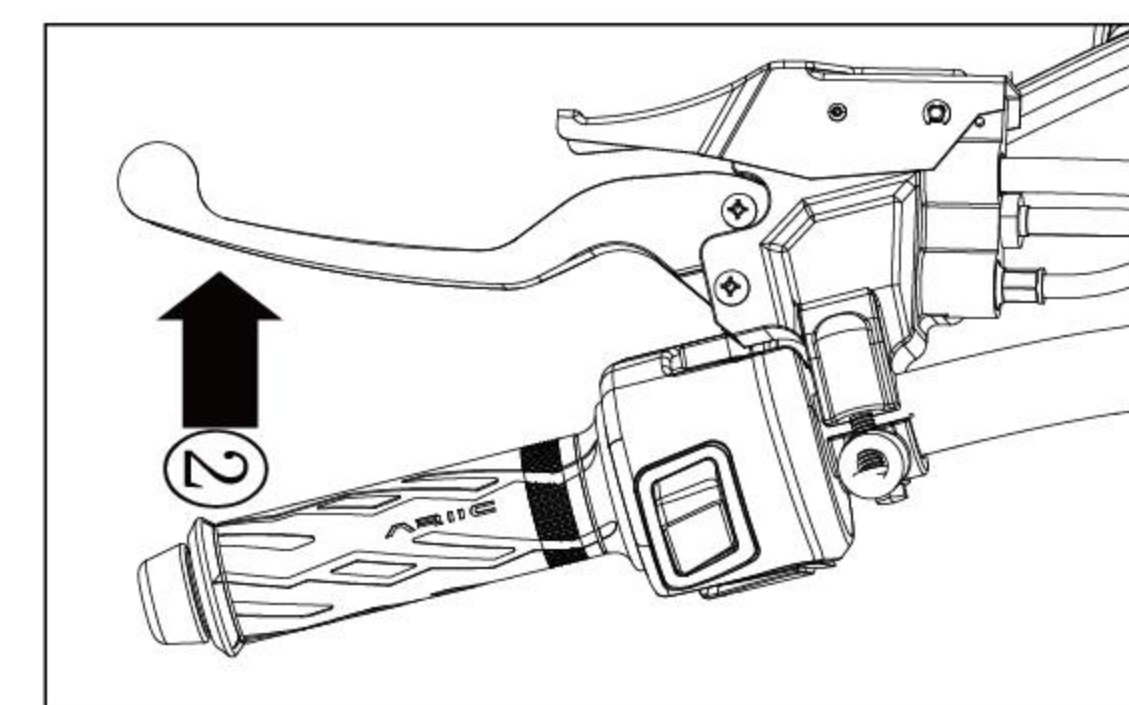
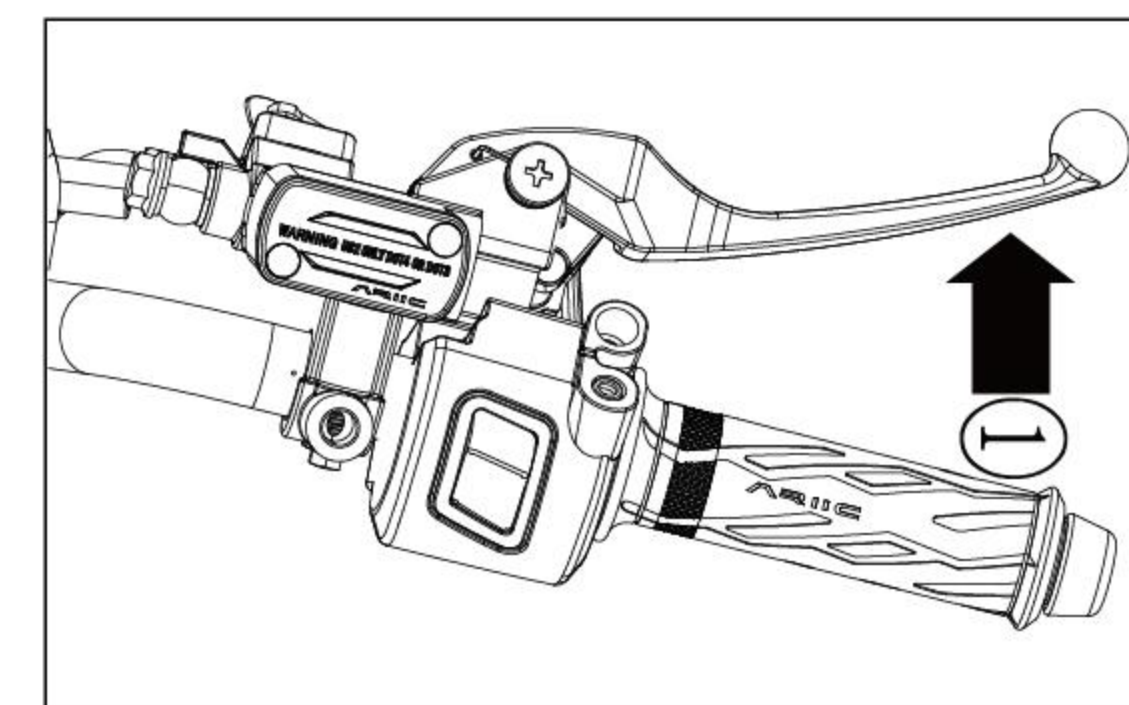
Ride and operate correctly

1. Put away the main stand first. Operate and hold the rear brake lever in the braking state, press the right foot against the left support foot of the main bracket, and then push the scooter forward, the main bracket will automatically spring up.
2. Step onto the scooter from the left side, sit upright, and touch the ground with your left foot to prevent falling;



Before riding, the rear brake should remain in the braking state. Before starting the engine, do not do any action to increase the engine speed by refueling to avoid danger.

3. Loosen the front and rear brake levers in the direction of the arrows shown in ① and ②.



4. Slowly turn the throttle inward to refuel, and the vehicle will move slowly. (See next chapter for illustration)

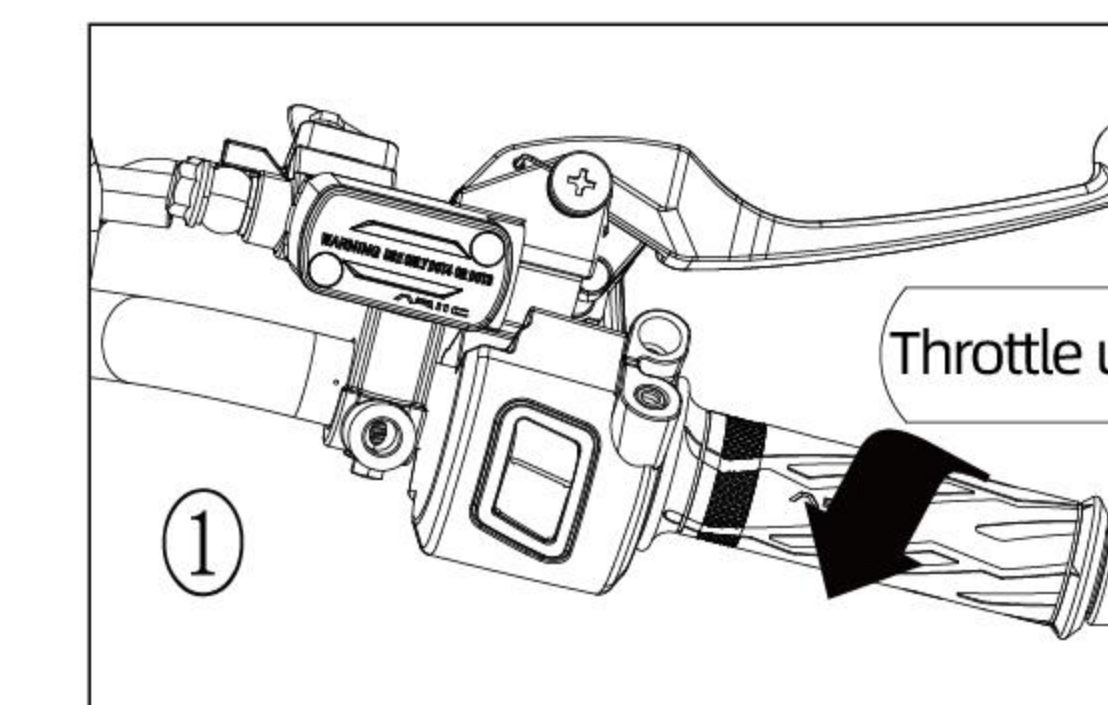


After the front and rear brakes are released, the refueling handle should not be rotated rapidly to avoid the danger of the scooter rushing forward.

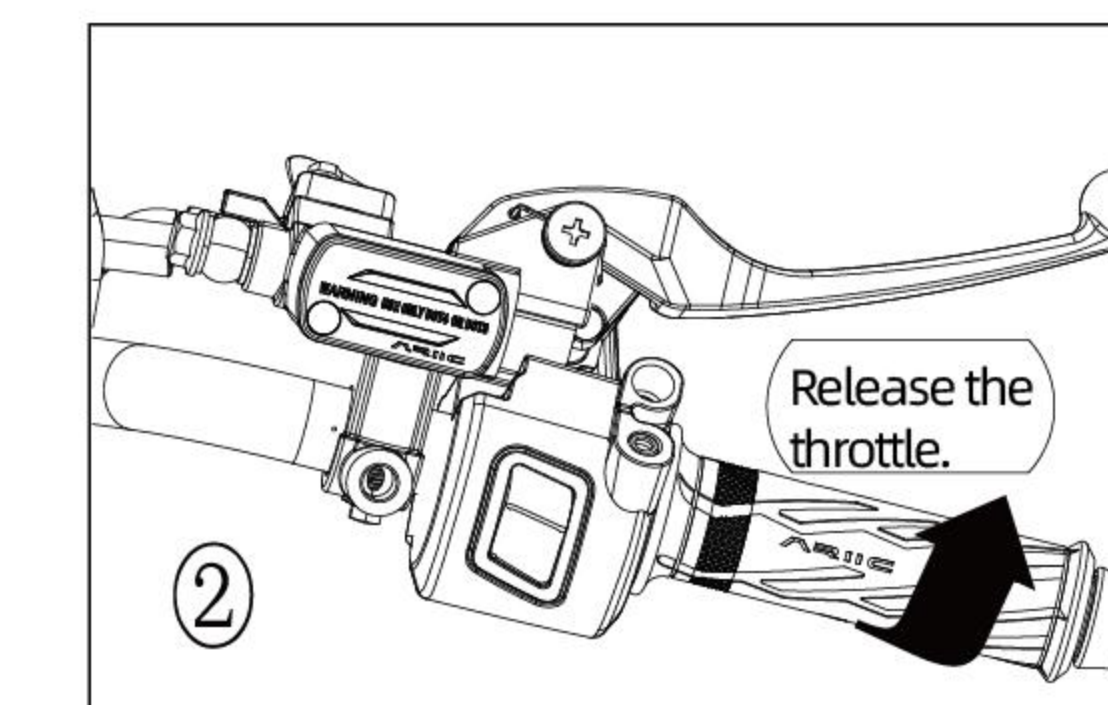
Before starting, turn on the turning light accordingly, ride after confirming it is safe

The speed is controlled by throttle.

① Pull inwards to throttle up the engine → the horsepower will increase and the vehicle speed will become faster. Go slowly. When starting or going uphill, slowly pull the throttle grip inwards to refuel, ride safely.



② Loosen or turn the throttle forward, the speed will be slower when the throttle is released. When braking, loosen the throttle grip quickly



Moderate ride can extend the vehicle's service Life

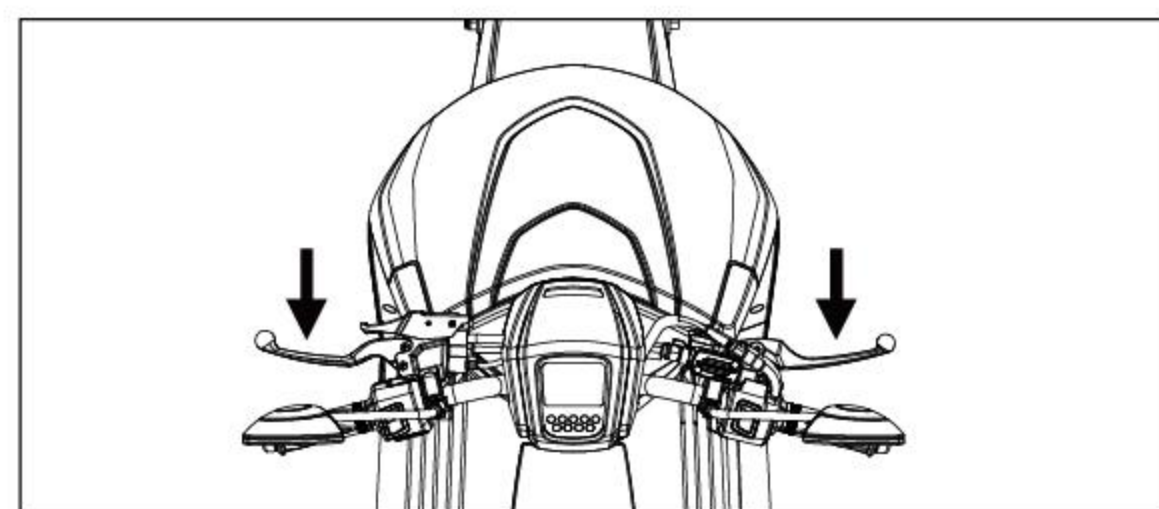
①The running-in period of a new motorcycle is 1000km. During this period, the engine should be avoided from idling at high speed when there is no load, and no heavy load or high-speed riding (the first 500 kilometers, the speed should not exceed 70Km/h, and the second 500 kilometers should avoid long-time high-speed).

Brake the front and rear wheels at the same time

①After throttle grip returns to the initial position, brake the front and rear wheels at the same time, and slow braking is the most ideal braking method that can generally predict the danger in advance.

② The left brake control system of this vehicle adopts the front and rear wheel linkage brakes. The front and rear brake forces are reasonably balanced, easy to control, and the braking is more stable and reliable. In non-emergency situations, the left brake control system can be used alone.

③In the case of emergency avoidance, please use the left and right brake control systems at the same time.



! When Sudden braking. Using the front brake alone may cause slip. When riding, avoid such sudden braking as possible as you can.

Do not turn sharply or turn when braking sharply.

A sharp turn or turn while braking is the cause of a side-slip rollover, which is very dangerous.

Ride with extreme caution in rainy weather.

On rainy days, the braking distance is longer than on sunny days. Speed should be slowed down and brake in advance



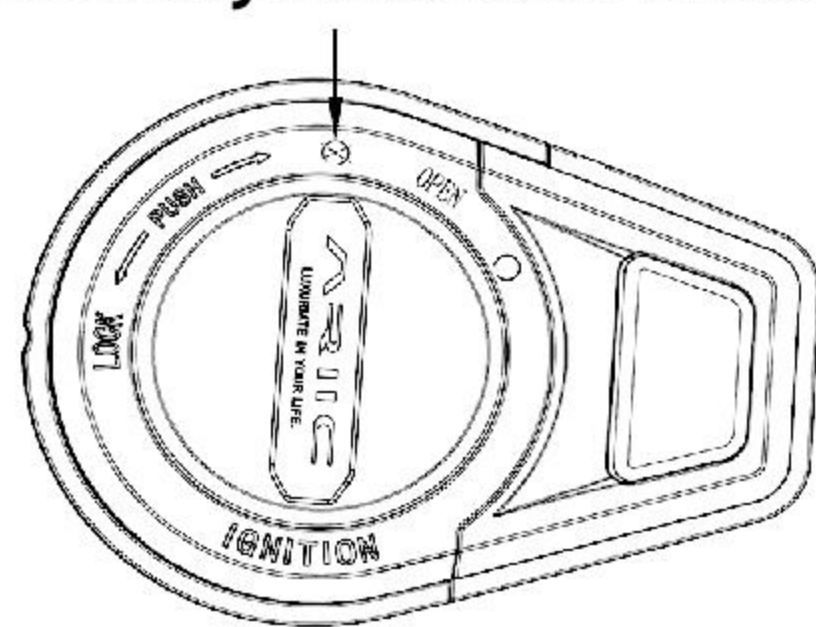
- When going downhill, first return the throttle grip to the initial position, brake discontinuously and ride slowly.

Stop and parking

When approaching to a parking spot. Turn on the turn signal in advance and pay attention to the vehicles behind or on the side, and stop slowly. Return the throttle grip to its original position, and brake early to decelerate. At this time, the rear brake light will be on to warn the vehicles coming from behind.

When the vehicle stops completely

Return the turning light switch to its original position, pull the main switch to the position , and the vehicle is automatically locked after 5 seconds.

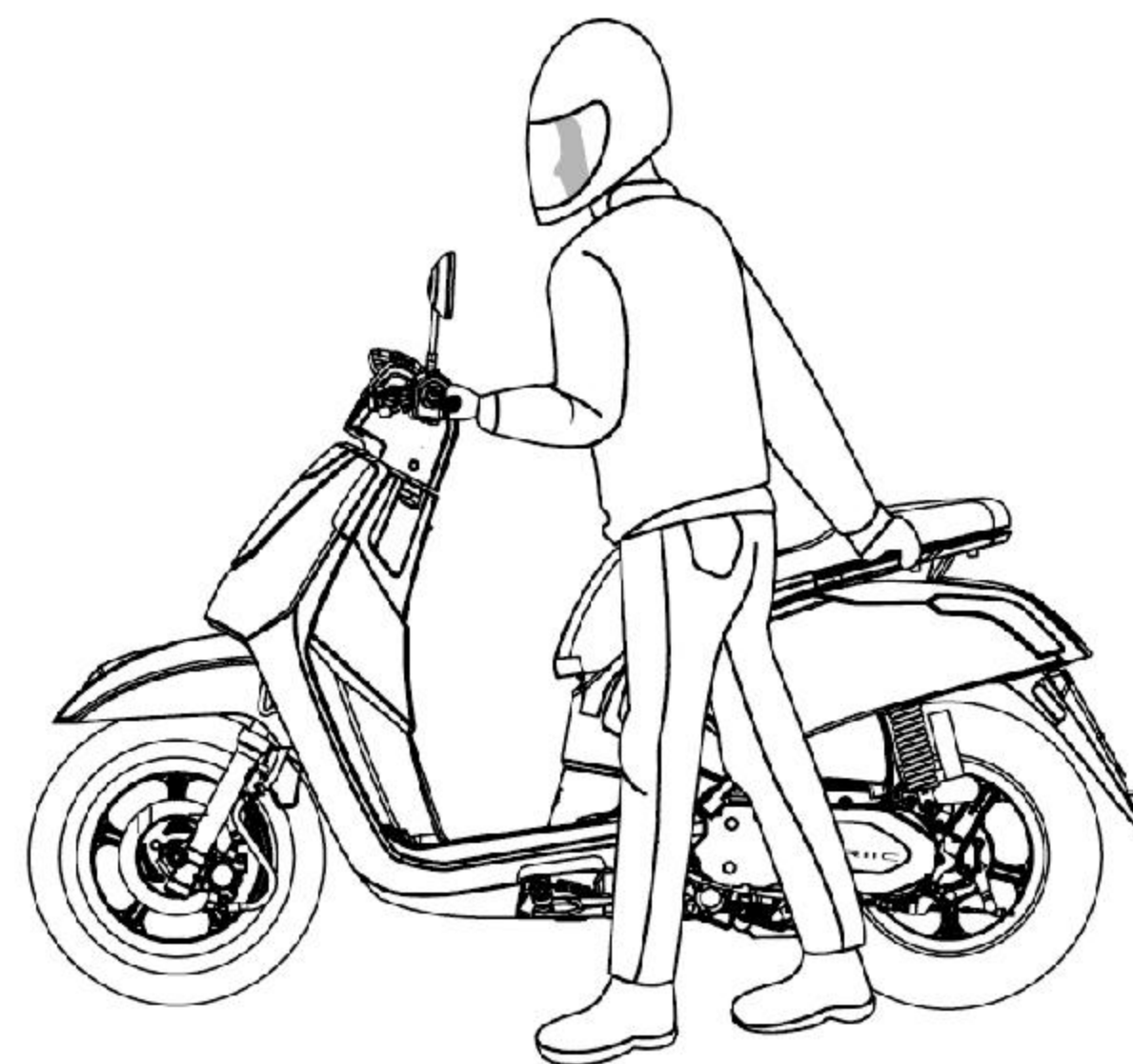


During riding, do not turn off the main switch, the electrical system will stop working, which is the root cause of the accident, please do it only after the engine stopped.

While parking

The person stands on the left side and on a flat surface, supporting the main stand or side stand.

① Support the main stand or side stand in a flat place that does not interfere with traffic, and the vehicle is likely to fall over on an uneven place.



In order to prevent theft, please turn the handle bar left to then end position when parking, press the main switch knob to the LOCK position, lock the handle direction, and take the smart key with you.

Inspection before riding

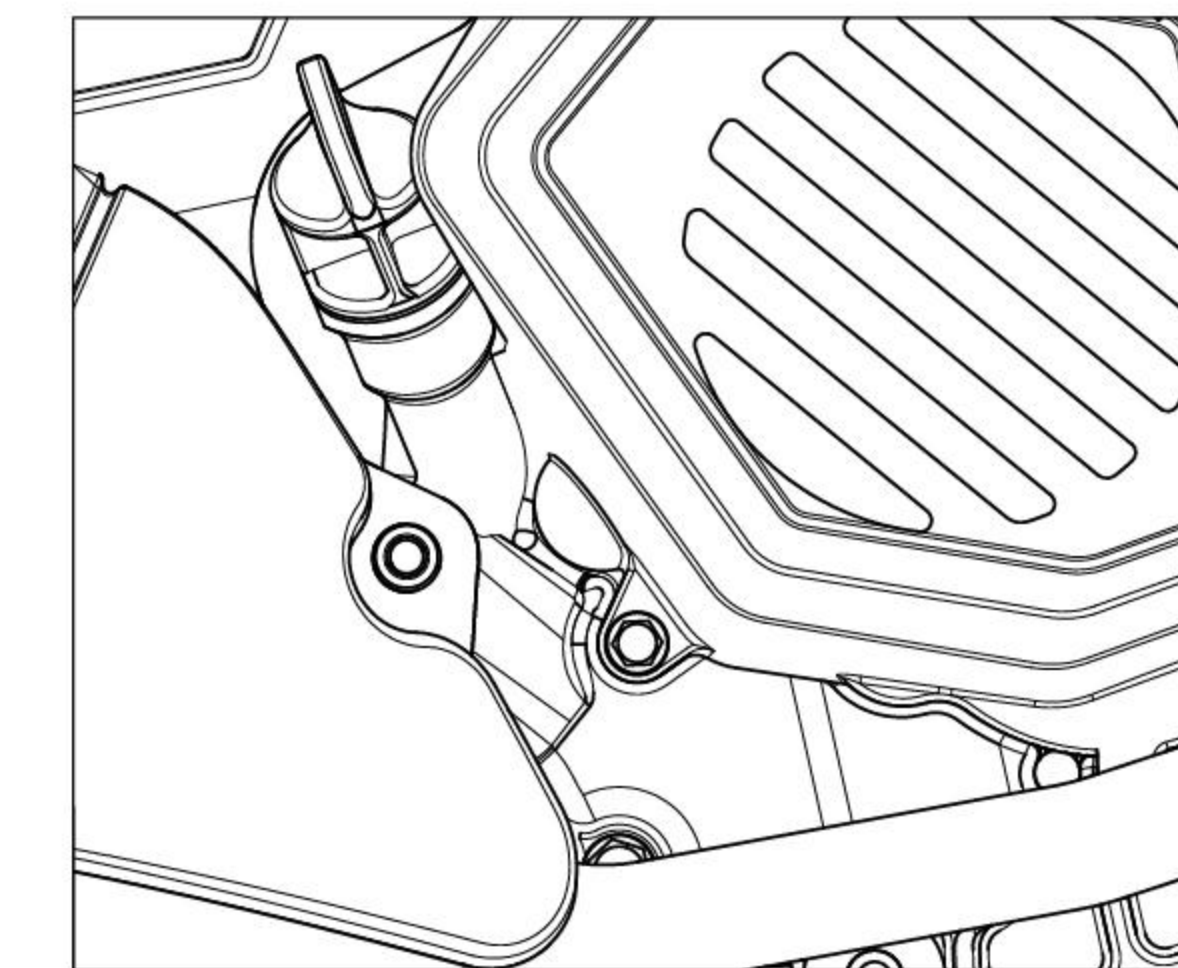
- Form a good habit of inspecting daily before riding.
- For safety and avoiding any breakdown or any accidents, a pre-riding inspection is necessary
- If there is any abnormal phenomenon, please find a ARILC 's dealer or special service station for maintenance.

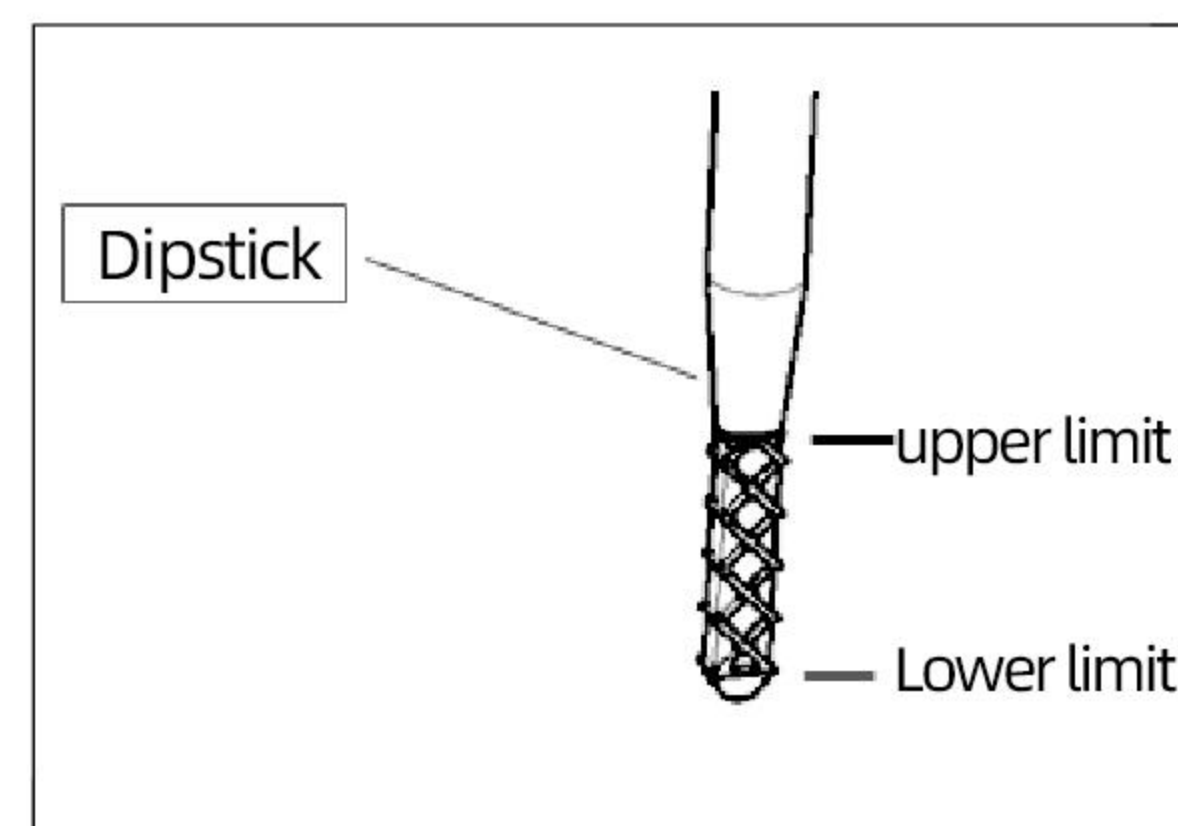
Daily inspection and operation (nineteen items)

(1) Oil inspection and replenishment

(do it after cooling down or warming up the engine after 10 minutes)

- Kick the main stand, take out the oil dipstick and wipe it clean.
- Insert the oil dipstick directly into the hole (do not screw it in).
- Take out the oil dipstick to check the oil level. When the oil level is close to the lower limit of the dipstick, please add oil to the upper limit.





Recommended oil:
SAE:10W-40 API:SL



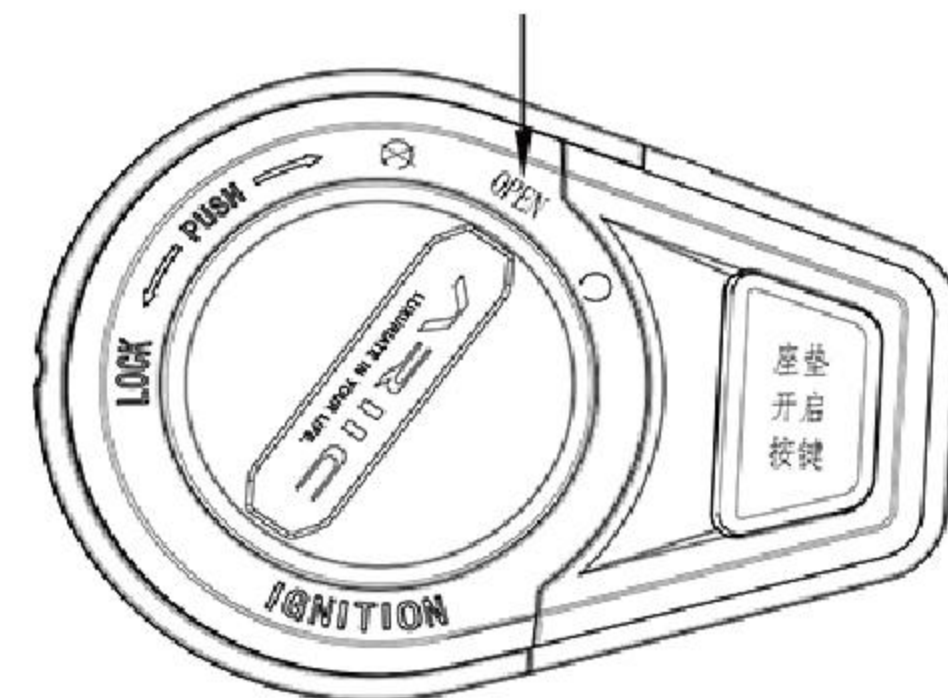
Higher level oil

Note: Different brands or grades oil could not be mixed . Please use the specified oil

① When the fuel volume pointer is pointing the red area, The effective rest amount of gasoline is about 1.0L.

② Please refuel 92 # or above unleaded gasoline as soon as possible.

How to use the fuel tank cap:



- ① First stop the engine.
- ② Turn the ignition switch to the position Open , press seat lock and turn the button to the position , long press the remote control key  2 seconds to open the seat cushion
- ③ Open the fuel tank cap anticlockwise.
- ④ just turn the fuel tank cap clockwise to lock it, and then close the seat cushion.



Don't exceed the max level line of the fuel volume when refuelling, or the gasoline will probably leak.



Do not add other additives when refueling to avoid engine failure.



This model uses fuel evaporation and emission control. It is forbidden to overfill the fuel tank, to avoid fuel supply failure or damage to the active carbon canister

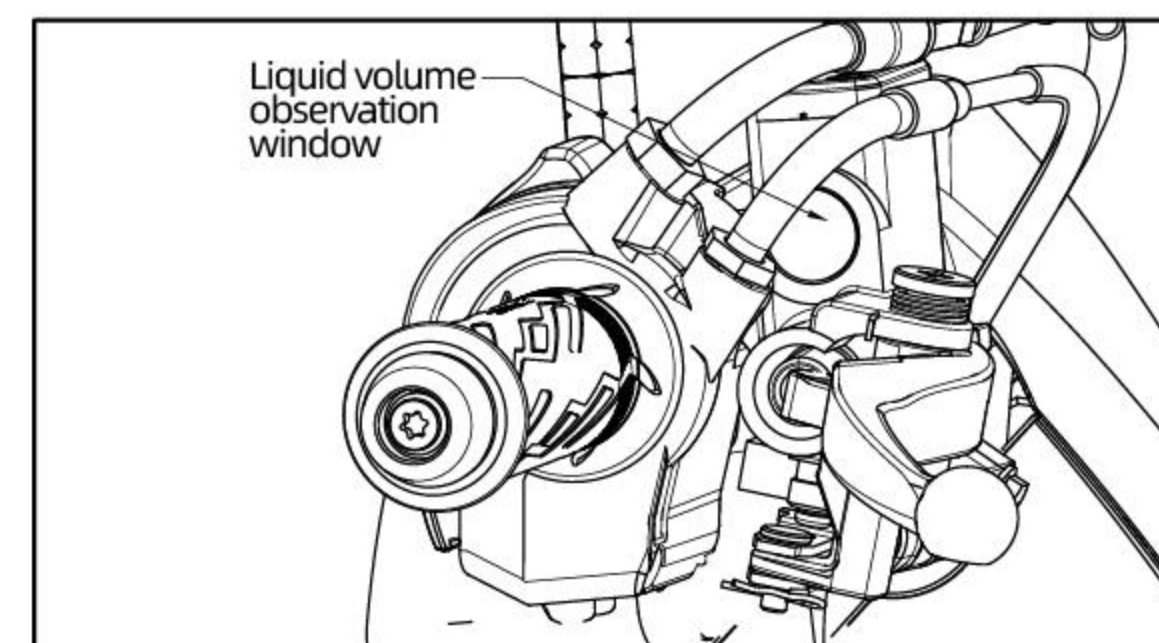
(3) Inspect the steering

- ① Swing the steering by every direction to see if there is any loose or any tight and uncomfortable phenomenon.
- ② If there is an abnormal phenomenon, please find a dealer shop or special service station for repair.

(4) Check front brake fluid and replenishment

Brake liquid volume inspection

- ① Place the handlebar in correct position and check the volume of brake liquid inside the upper pump of the disc brake. The surface of the brake liquid must be maintained between the upper and lower edges of the glass observation window.



② When the liquid surface is close to the lower limit, first check the wear of the brake disc/pad.

③ When the wear of the brake disc/pad does not exceed the specified limit, if the liquid level drops abnormally, it usually means that there is oil leakage. Please find an Ariic's dealer or service station for inspection.

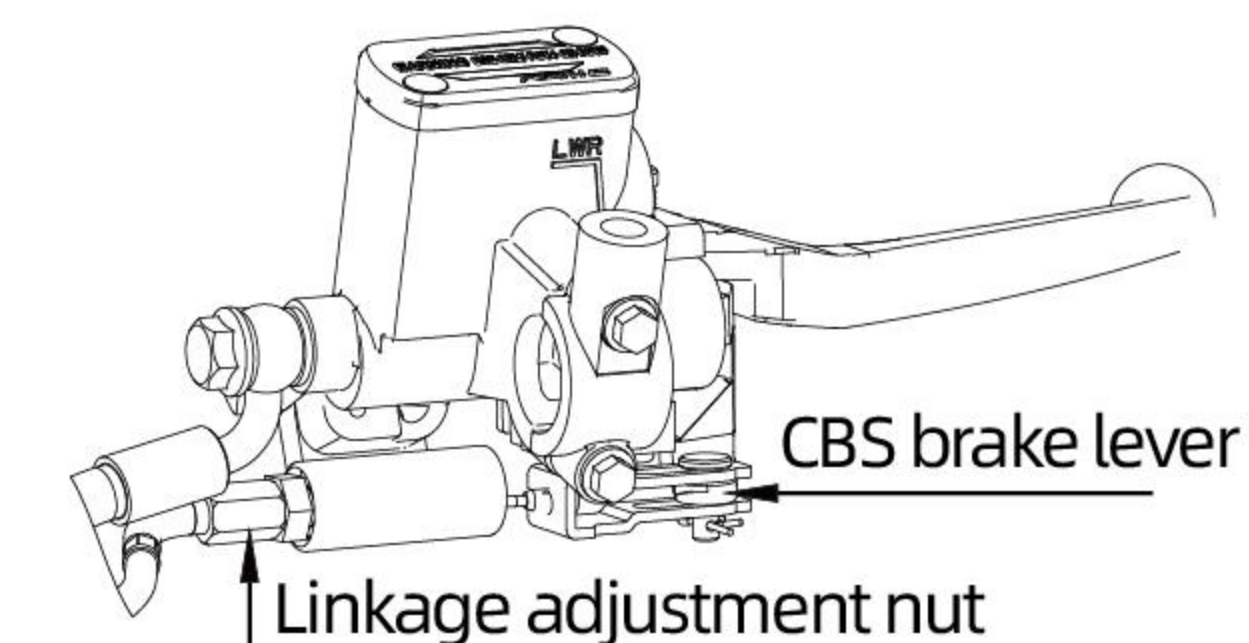
Brake fluid replenishment

- ① Straighten the handlebar and remove the front cover of the handlebar.
- ② First straighten the handlebar, then remove the 2 fixing screws on the oil storage tank, then remove the oil pump cover.
- ③ Prepare the brake fluid DOT-4, pour it into the oil storage tank to the level close to the upper limit, then tighten the screw on top cover ; when adding a small amount of brake fluid, do not replenish brake fluid of different grades, and when replenish a large amount, replace all of them.
- ④ The brake fluid is very corrosive. Please wrap the rag around the oil filling port when disassembling or assembling to avoid the brake fluid overflowing and damaging the parts . After assembling, please wipe it clean.

(5) Adjustment of CBS mechanism

When disassemble the linkage brake mechanism, it is necessary to adjust the linkage cable (the shorter cable linking front and rear brake) first, then adjust the rear brake cable.

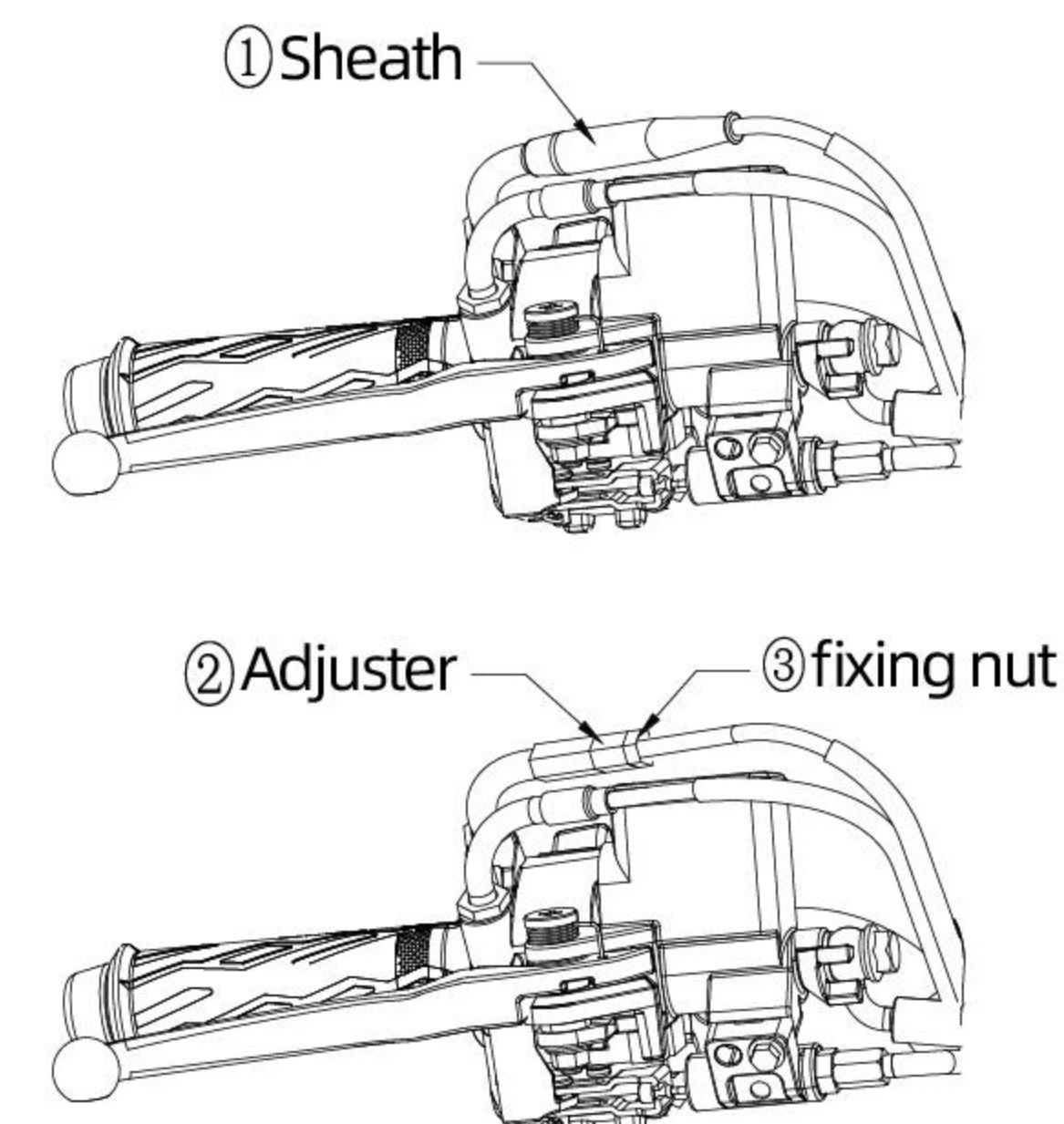
① The linkage cable adjustment : first loosen the drum brake adjustment nut in the end of rear brake cable, then adjust the linkage adjustment nut of linkage cable, until you can feel a bit gap (about 0.5mm) when you push the linkage brake lever slightly from right to left, then lock the linkage adjustment nut.



② Adjustment of the rear brake cable: After the "drum brake adjustment nut" is screwed into the screw rod, turn the rear wheel while screwing in the nut until the free stroke of the left brake lever is between 15~20mm; the free stroke of the newly replaced shoe can be adjusted to 10~15mm.

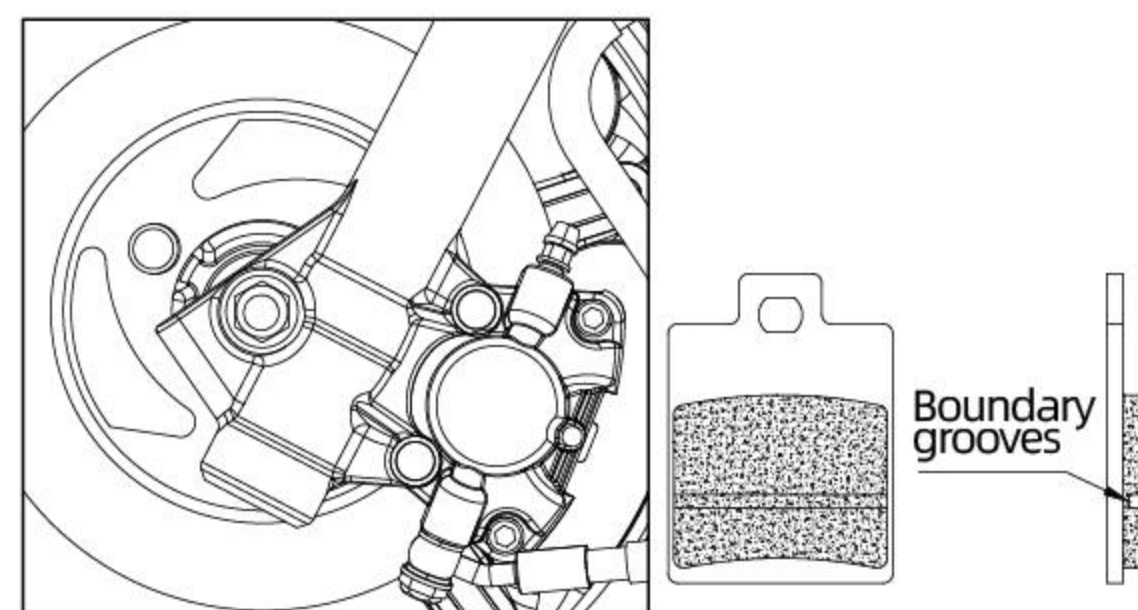
(6) Throttle valve operation

1. Check the throttle valve (accelerator) operating lever, when the steering handle is turned from the center to the left or right end position, check if it is smooth and stable from the fully open position to the fully close position
2. measure the free stroke of the lever the standard free stroke is about : 2-6mm.
3. Method to adjust the free stroke: open the sheath ①, loosen the fixed nut ③, then turn the adjuster ②, and check the free stroke at the same time. When the free stroke reaches the standard stroke, tighten the fixing nut ③.



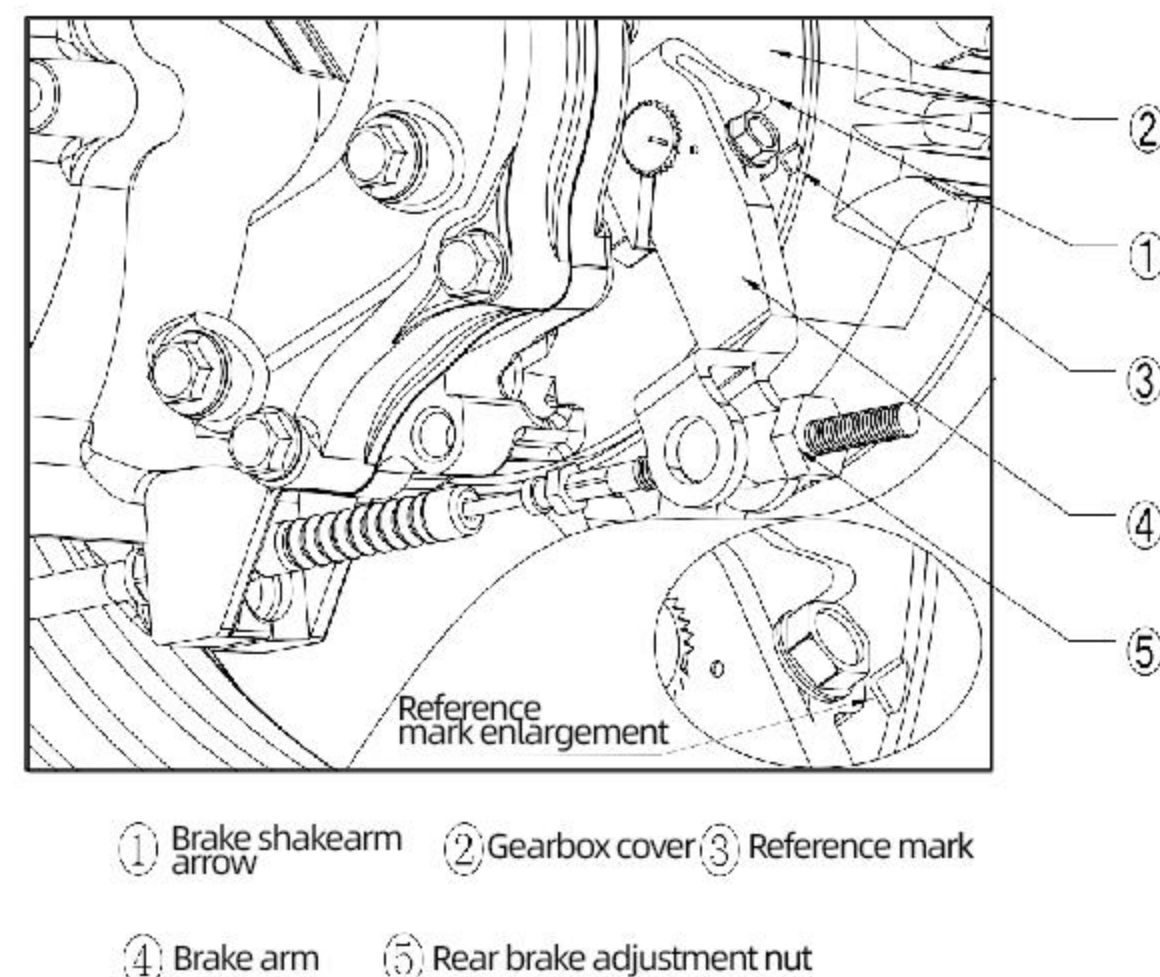
(7) Brake pad/brake shoe inspection

1. Check brake pads for wear.
2. If the brake pads are worn to the limit groove, replace the brake pads.



The front brake pads are required to be flat. If there is any deformation, please go to the dealer or service station to replace the brake pads.

2. Rear brake shoe wear inspection
The rear brake shoe will be worn after braking. For example, before riding, when you feel the rear brake ineffective, adjust the rear brake adjusting nut ⑤ inward to meet the braking demand. However, when the final adjustment is made, the arrow on the brake arm: ① points to the reference mark on the gearbox cover ②③ "◀", indicating that the shoes have been worn to the limit position, and new brake shoes must be replaced.

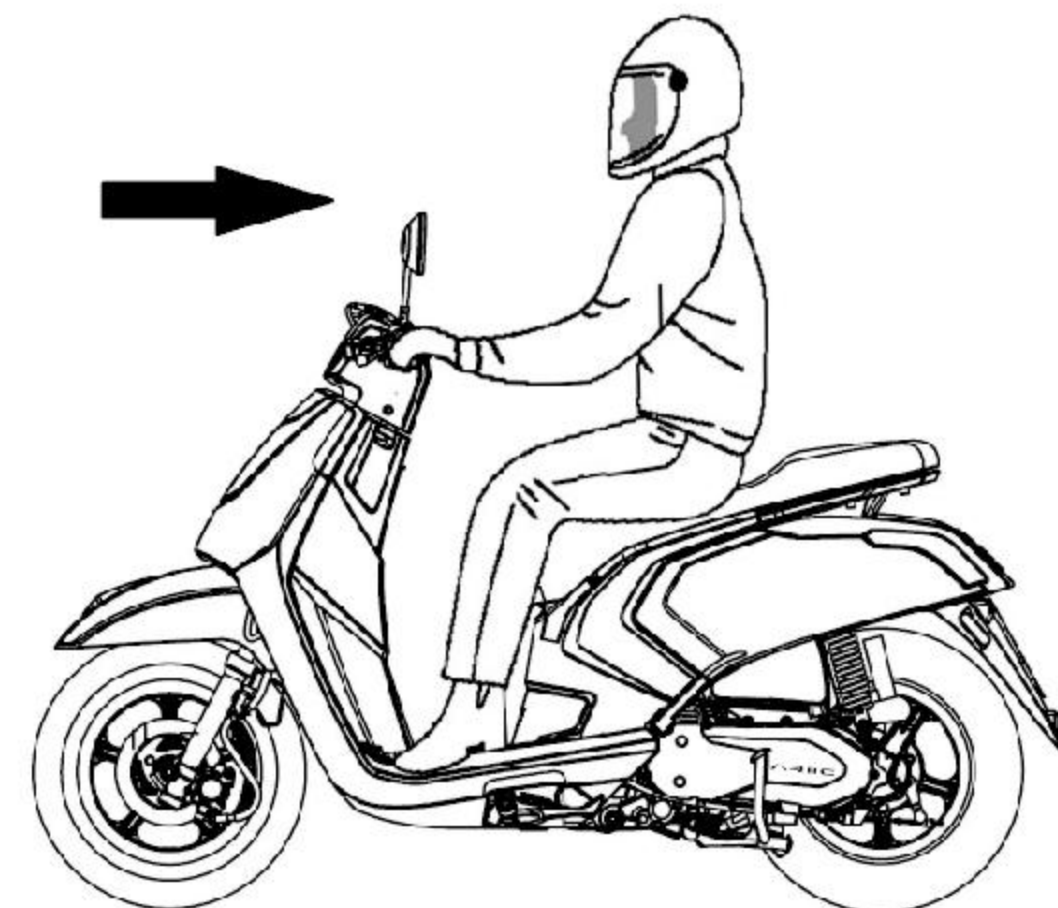


 If the shoe is worn to the limit, it must be replaced, otherwise it may endanger the life of the rider. Be sure to replace the original brake shoe to ensure quality and safety.

(8) Brake light inspection

1. Turn the main switch to the "○" position.
2. Pull the front and rear brake levers respectively to confirm whether the brake lights are on.
3. Check if the brake light housing dirty or damaged.

(9) If the brakes work well



 Ride for a while to confirm the operation feeling and the effect of the front and rear brakes. For new vehicles or vehicles with newly replaced brake shoes, the new shoes will wear out faster. Please adjust the rear "drum brake adjustment nut" in time to ensure reliable braking and prevent accidents.

(10) Turn signal inspection

1. Turn the main switch to the "○" position.
2. Operate the turn signal switch to confirm whether the front and rear turn signals and turn indicators flash.
3. Check if the turn signal housings dirty or damaged.

(11) Front and rear shock absorber inspection

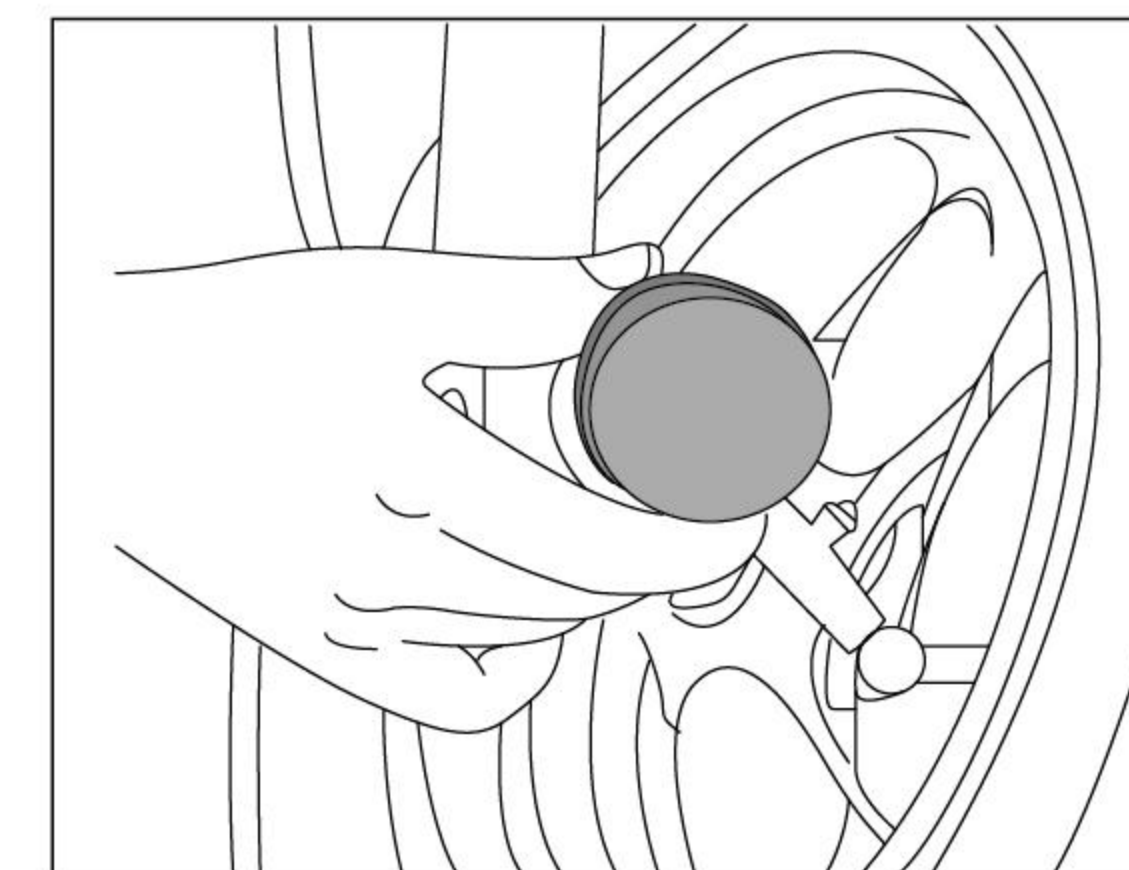
Put the weight on the handlebar or seat cushion and press down intermittently to check whether the front and rear shock absorbers are good.



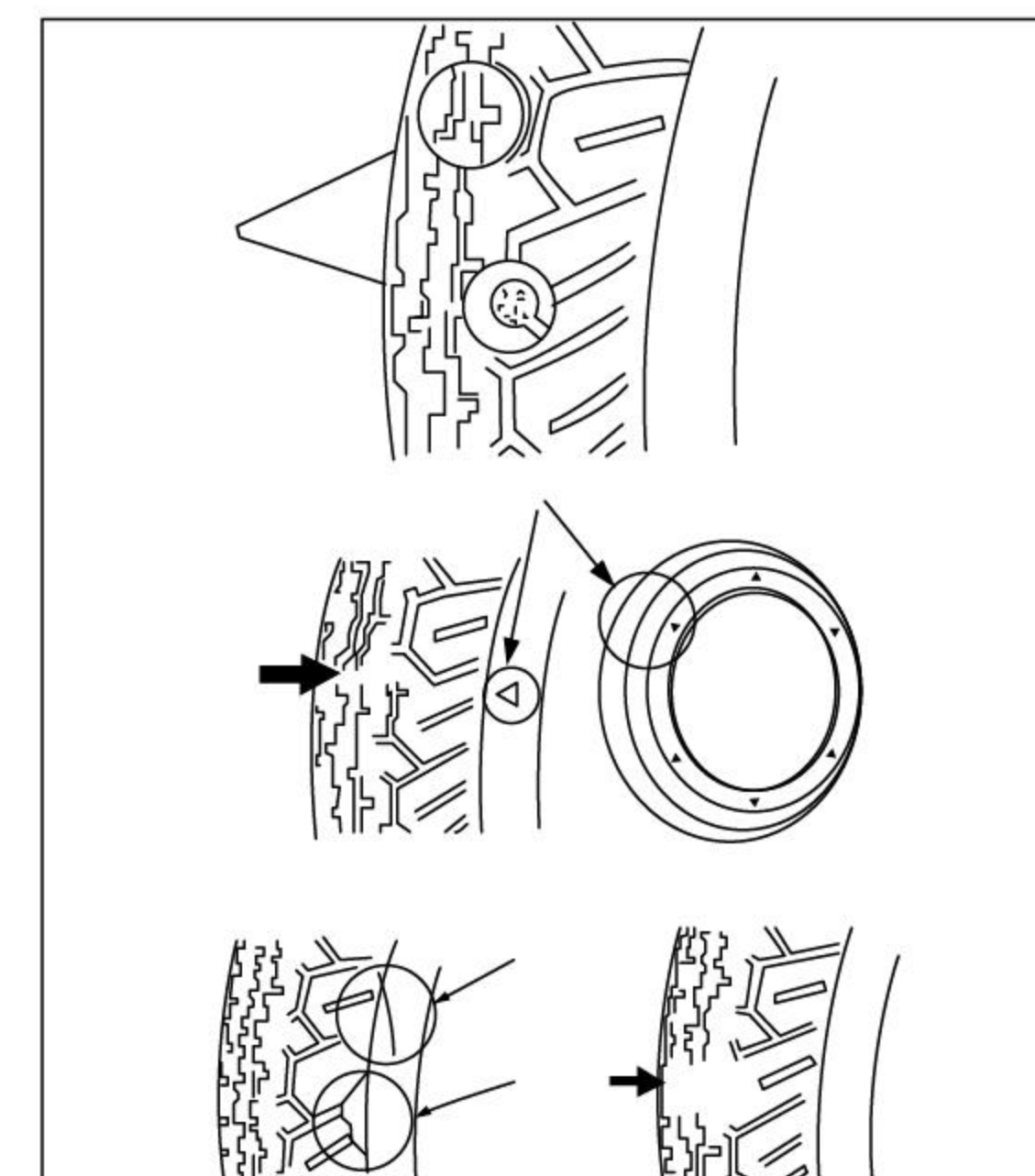
(12) Tire inspection

1. Check whether the tires are in contact with the ground and whether the tire pressure is normal.
The tire is in contact with the ground. If there is any abnormality, use a tire pressure gauge to check whether the tire pressure is normal.

	one person ride		two persons
F	1.85kgf/cm ²	F	2.0kgf/cm ²
R	2.0kgf/cm ²	R	2.25kgf/cm ²



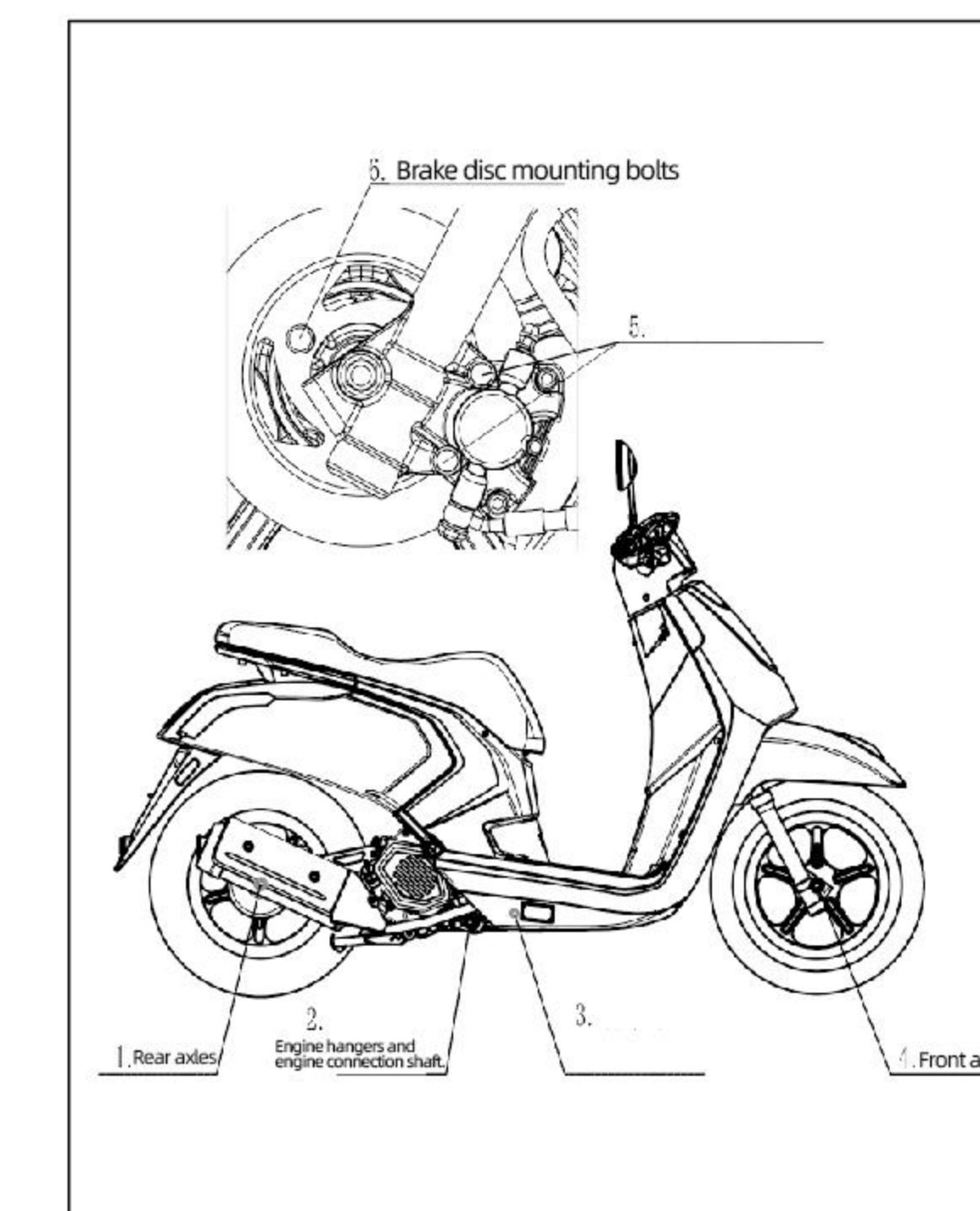
1. Whether there are metal fragments, gravel, etc. in the tire groove, if so, please remove it before riding.
2. When the tire is cracked or the groove depth wear exceeds the limit, please replace it with a new tire immediately.



(13) Is the speedometer display normal (including metric/imperial display)?

(14) Inspect key bolts of vehicle body

1. Is the rear axle tight?
2. Are the engine hangers and engine tight?
3. Are the engine hanger and frame fastened?
4. Is the front axle tight?
5. Is the disc brake pump installed and tightened?
6. Is the brake disc installed and tightened?



(15) Does the horn work?

Move the main switch in the " " position and press the horn button.

(16) Is the angle of the rearview mirror appropriate?

Sit on the seat cushion to confirm the rear position and check for damage or contamination

(17) Is the rear license plate defaced?

Check if the license plate is damaged or loose?

(18) Is the exhaust pipe normal?

Is the exhaust pipe loose or noisy?

(19) Do other abnormal phenomena in the past still exist now?

1. For safe and comfortable riding, be sure to do regular inspections and maintenance.
2. Ariic's dealers or special service stations will do after-sales service maintenance for you.
3. Please refer to "Periodic Maintenance List" for inspection time and inspection items.
4. Periodic inspections must also be carried out when the vehicle is out of use for a long time.

Vehicle Maintenance and Repair

Initial inspection and maintenance

Please be sure to undergo inspection and maintenance within one month after the purchasing date or the odometer is 500km.

oil replacement

(replacement period)

1. Change the oil when the new vehicle travels 500km for the first time, and change it every 3000km after that.

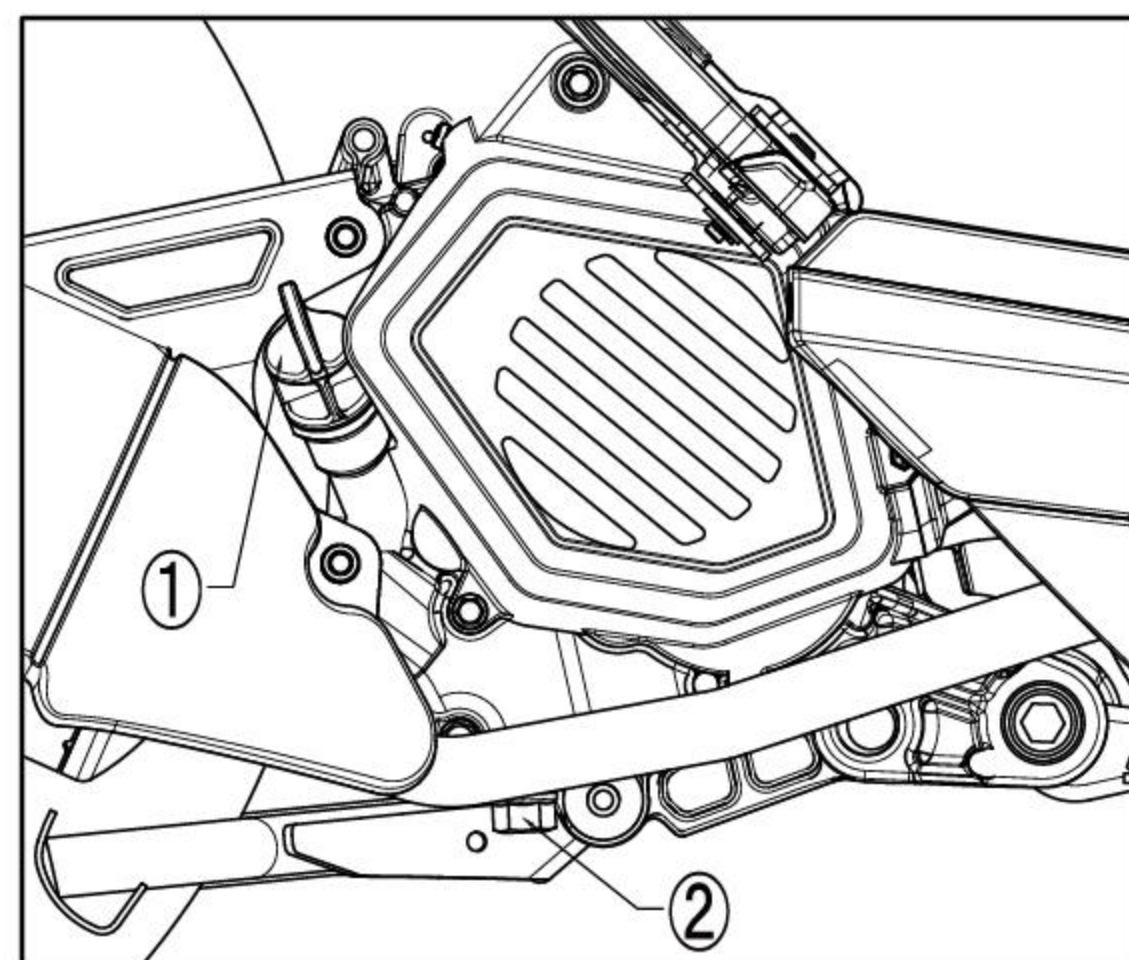
2.Oil capacity. When the body is decomposed: 0.85L.general replacement: 0.75L.

3. replacement method

a. Remove the oil dipstick.

①Remove the oil drain screw.

②Remove the oil filter, so that all the oil flows out.



★ Do not change the oil when the engine is at high temperature, but it can be changed after the engine is warmed up moderately, so that the oil can flow out more easily.

b Clean the oil drain screw and oil filter , then lock it tight.

c. Fill in new oil as required by the capacity.

★Use the oil dipstick to confirm.

d. Make sure to tighten the oil dipstick.

e. After the engine is warmed up, stop running for 10~20 seconds, check the oil level again.



Check the oil level every 1000km, and make up if it is insufficient.



Notice

a. Please use special oil for four-stroke engine.

Specification are:SAE:10W-40 API:SL
b. Under the following conditions, the oil will be easily deteriorated, please replace it in advance.

* Often ride on gravel roads.

*Usually ride in short distances.

*Idle time is too long.

*Use in cold areas.

C. When the oil is replenished, the oil volume should not exceed the oil

C. When the oil is replenished, the amount of oil should not exceed the oil volume upper limit

d. When changing the engine oil, be careful not to burn your skin.

Oil Change Precautions

1. Too much or too little oil will affect engine performance.

2. Too much: When the engine rotates, the running resistance increases, the output horsepower is reduced, the oil temperature rises too fast, and the oil deteriorates early.

3. Too little : When the engine is running, the oil supply of the friction part is reduced, causing excessive friction and burning of the parts.

4. Oil of different brands and grades, as well as low-quality oil, should not be mixed, otherwise it may cause engine failure.

5. If you buy additives and mix them in the market, it will deteriorate the oiliness, affect the lubricating performance and shorten the service life of the engine.

6. Please use genuine oil products. If you change and add non-genuine oil at will, the manufacturer will not be responsible for any defects caused.

Gear oil replacement

<Replacement Period>

1. For a new vehicle, replace it every 500km, then replace the oil every 6000km, depending on the road conditions.

2. Recommended gear oil SAE 85W-90; API GL -4 gear tanker

3. Gear oil capacity: (see the mark on the engine cover) Full capacity: 150ml
Exchange volume: 130ml

<replacement method>

1. Park the vehicle on a flat surface with main stand.

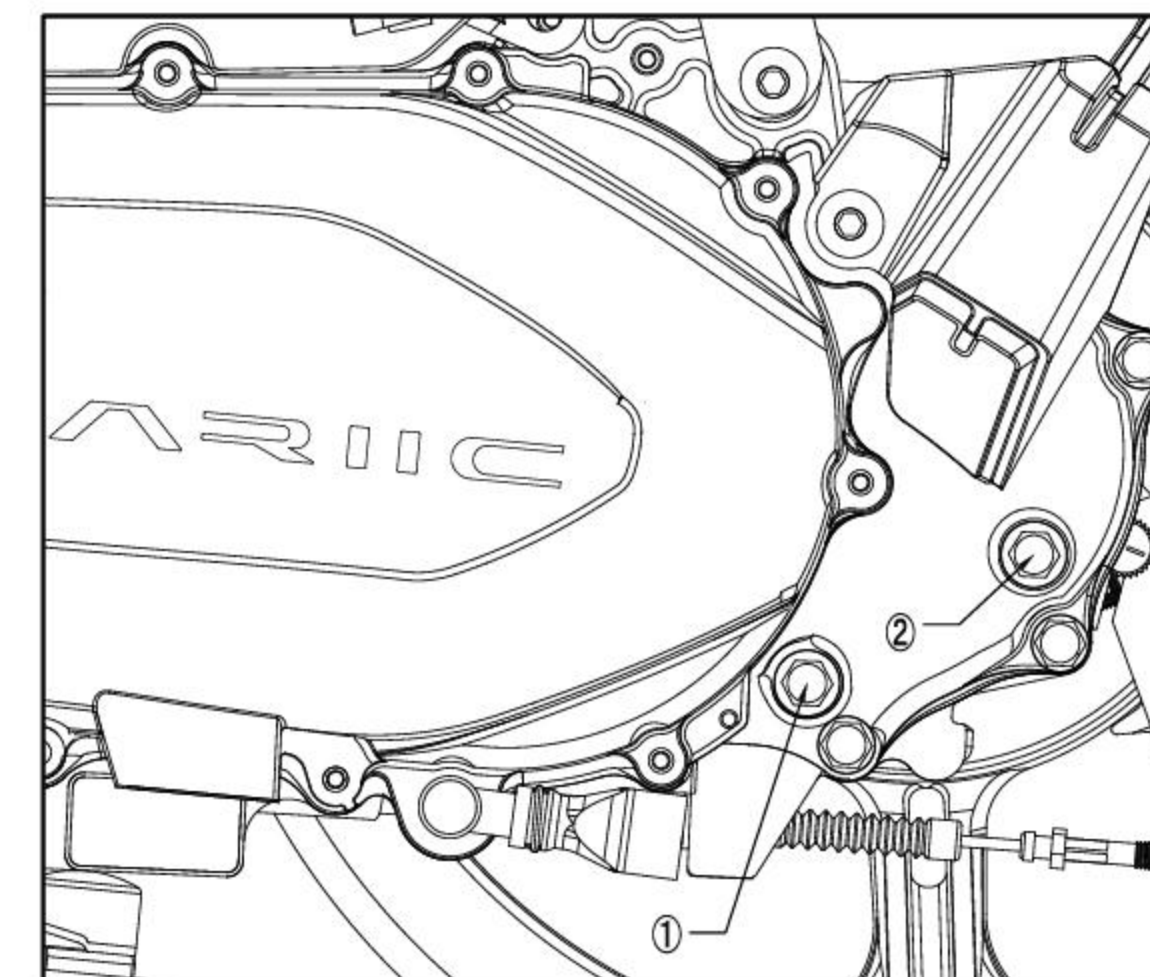
2. Remove the oil drain bolt ① and the gear oil injection bolt②.

3. When the engine is warmed up, the residual gear oil is more likely to flow out.

4. Clean and tighten the oil drain bolt.

5. Slowly inject the gear oil into the gear oil injection hole until the lower eye of the hole is parallel.

6. After the gear oil is injected, tighten the bolts to prevent oil leakage.



Often riding in the rain, if ride for a long time, please change gear oil diligently when riding under heavy load.

Spark plug inspection

If the spark plug electrode is dirty, and the gap is too large, which will cause poor flashover.

<Clear Method>

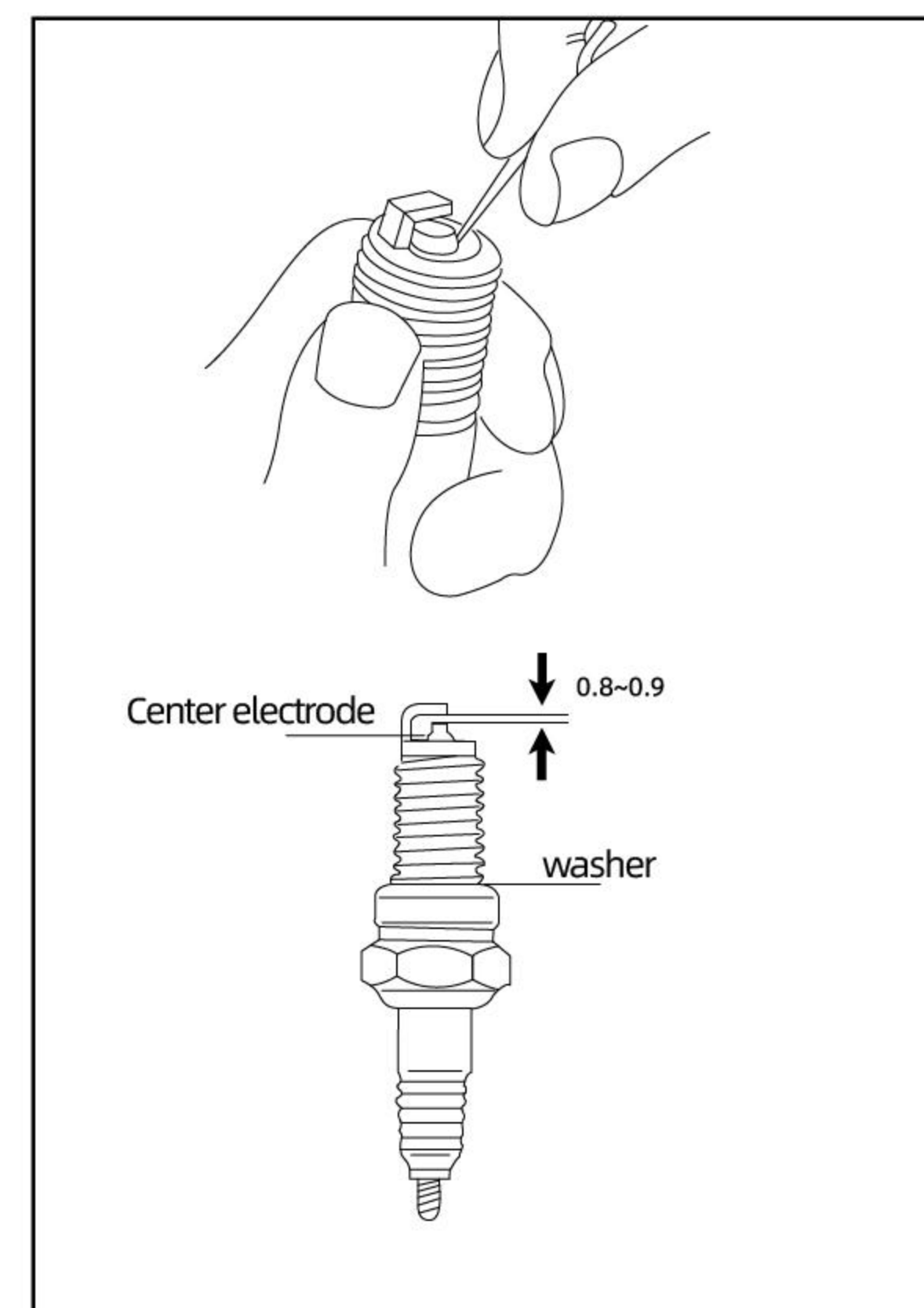
1. Best to clean with a spark plug cleaner.

2. If there is no cleaner, use a steel brush to clean.

<Adjustment>

1. The side electrode gap is normally 0.8-0.9mm "designated spark plug" CPR8EA9, do not use spark plugs other than those specified.

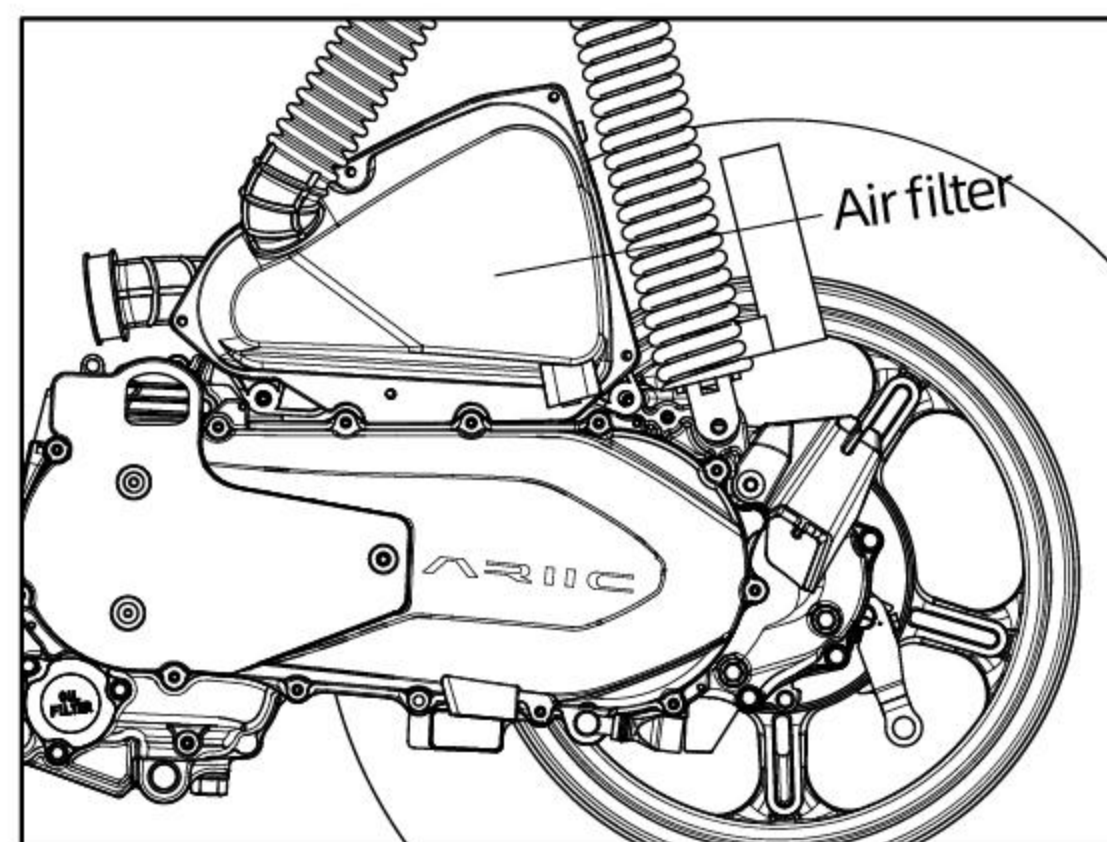
2. Please replace the high calorific value spark plug when riding at high speed or under heavy load.



When the engine is stopped to replace the spark plug, the temperature is very high, so be careful not to burn yourself. When installing the spark plug, first screw the spark plug with 2~3 threads by hand, and then lock it with the spark plug sleeve

Air filter cleaning and replacement

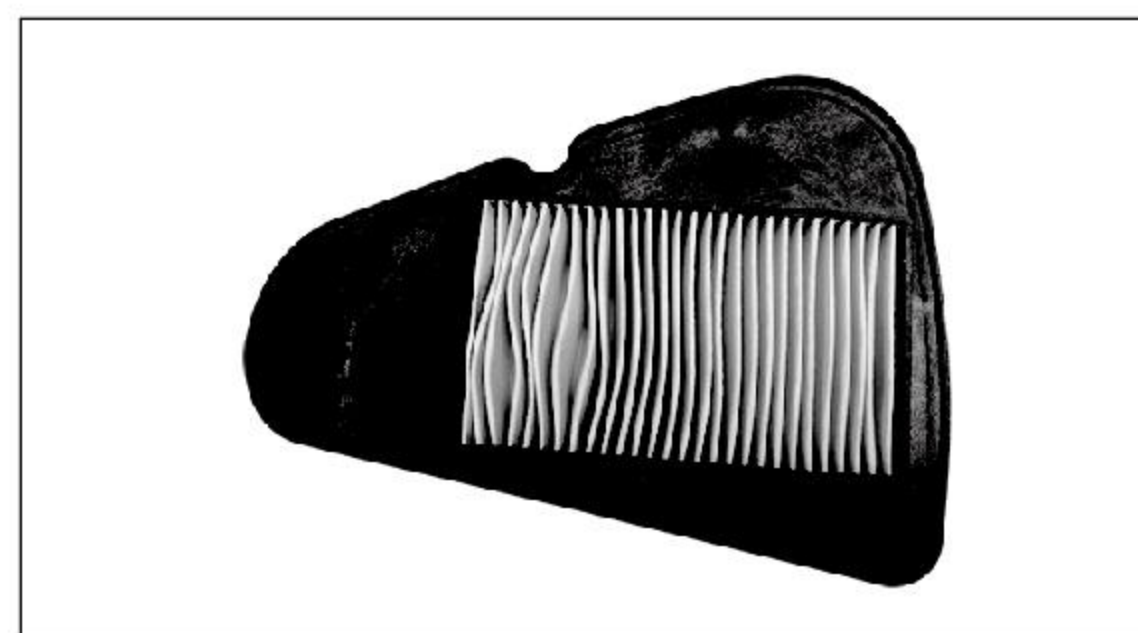
1. Remove the 5 fixing screws of the air filter cover and take off the air filter cover.
2. Remove the air cleaner element.



3. Clean or replace.
4. When installing, follow the reverse order of disassembling.



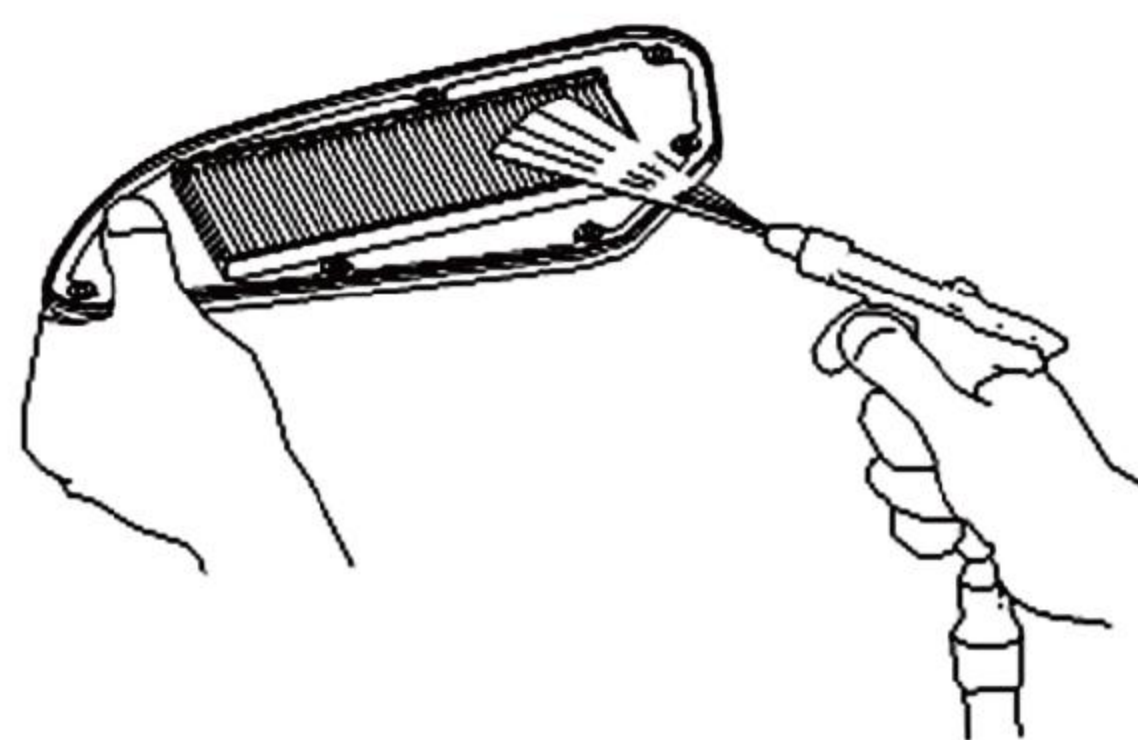
Every 1000km, check the oil collecting pipe of the lower inner air filter at the rear of the air filter. If there is oil accumulation, please drain the accumulated oil. When riding in bad weather (cold, hot, rain, snow ...), please check and clear the air filter oil collecting pipe regularly.



Please clean the filter element every 3000km and replace the filter element every 12000km (if the road is dusty, please replace it in advance to maintain the good performance of the engine). The air filter element must be installed tightly, otherwise the entry of dust will cause the engine to wear and shorten the service life.

Air filter inspection and cleaning

Remove the air cleaner element.



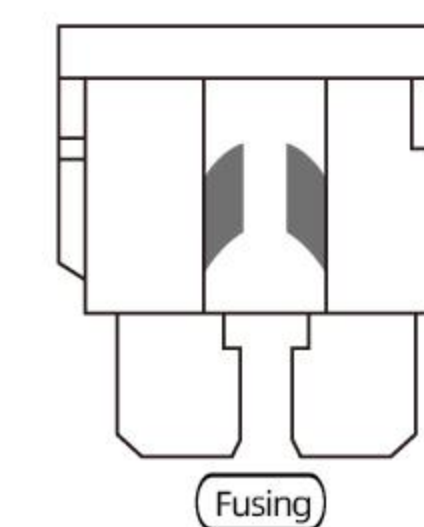
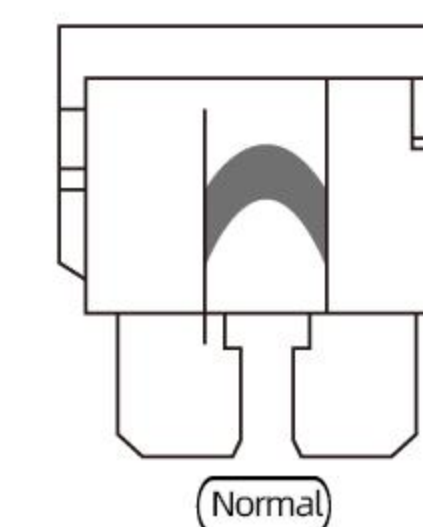
- Check the air filter element, if it is a bit dirty, just clean it, If it is very dirty, please replace it.
- Put the dirty side down first and tap lightly to shake off the dust. Then use compressed air, on the dusty side, along the crease of the air filter core, keep a safe distance (so as not to damage the filter element), blow in the compressed air to clean the air filter element.



Do not use solvents or oils to clean the air filter element. When washing the scooter, the element must not be soaked, otherwise it will cause starting issue.

Fuse replacement

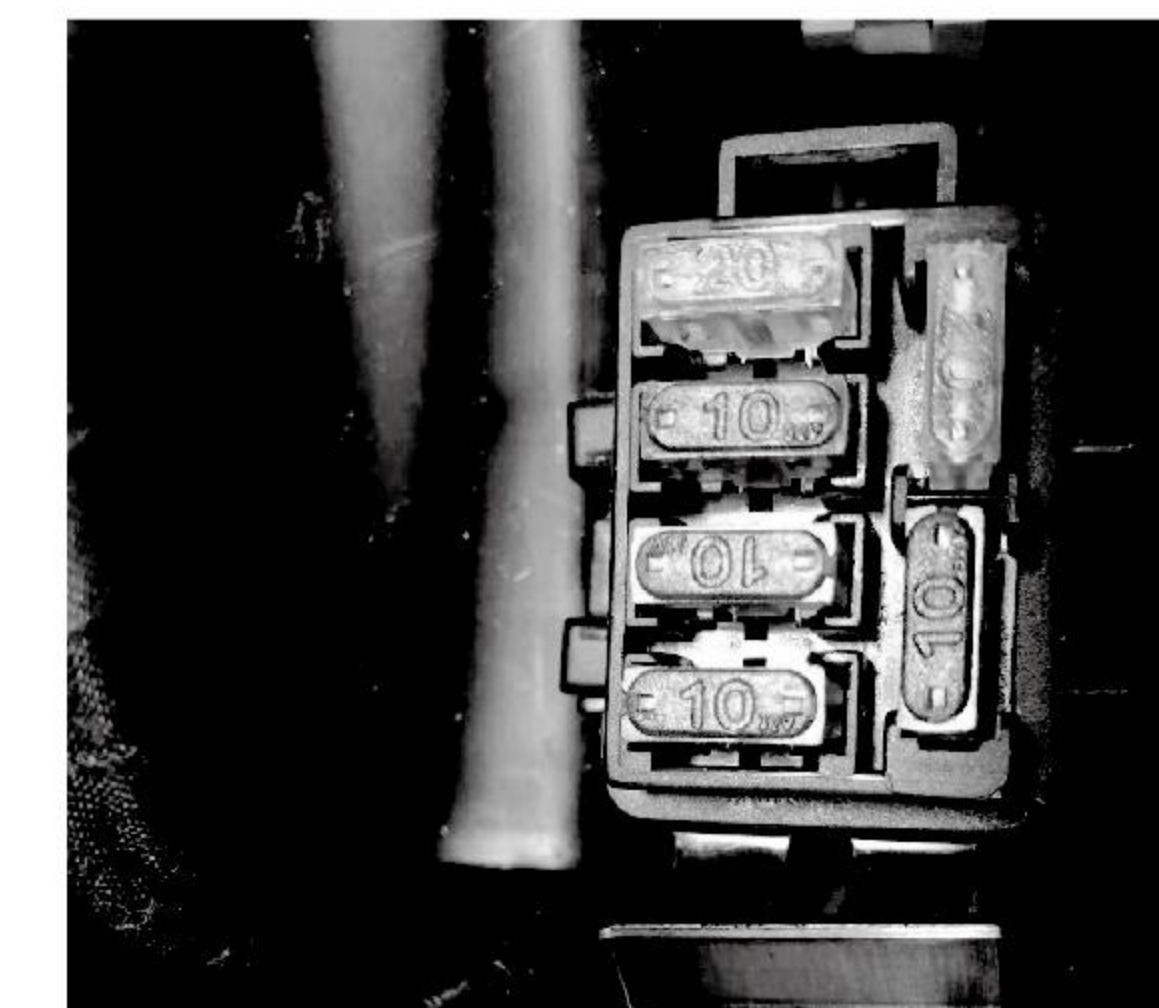
1. Before checking or replacing the fuse, turn the main switch to "OFF" to prevent short circuit.
2. Do not use fuses out of specification, otherwise the manufacturer will not be responsible
3. Using a fuse other than the specified capacity may cause the electrical wire to overheat, burn, and cause a fire or open circuit failure.
4. When replacing electrical components, please use Ariic genuine parts. If counterfeit products are used, electrical failures such as fusing may occur due to the electrical load not matching the design requirements.
5. If the fuse is blown, find out the reason first, and then replace a new one, otherwise it will be blown again, and it is strictly forbidden to replace the fuse with a wire.
6. If you can't find the reason, please go to the dealer or service station to check.
7. When washing the vehicle, try to avoid strong rinsing with water around the side cover.



When dismantling

1. Lift the top cover of the fuse and take out the fuse.
2. If the fuse is not in contact with the corresponding connector well, the fuse will easily heat up, which is one of the reasons for such electrical failures.

Fuse:20A (yellow) one piece
specification:10A (red) three pieces
Spare fuse:20A/10A each one piece



Installation

1. Put the fuse into the clip holder, press down the upper cover
2. After install the fuses, try to pull the fuses. If it is loose, it will cause the circuit to heat up and fault. please double confirm it.

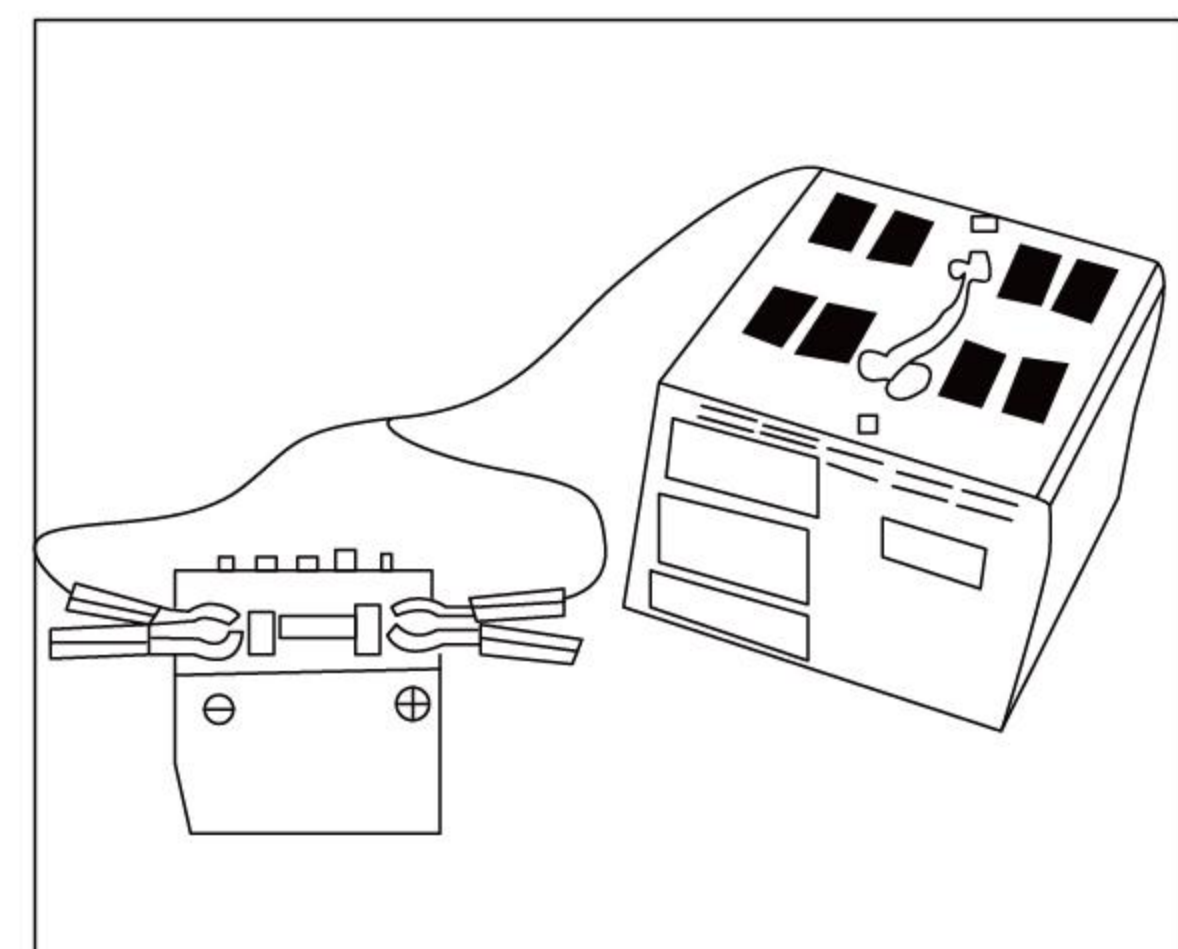
Battery check

1. This model adopts 12V maintenance-free lead-acid battery.
2. The electrolyte does not need to be checked and replenished.

Battery pile

1. When cleaning the head of the battery pile, please remove the battery cover on the foot rest first, and then remove the 2 screws on the battery that fix the battery wire.
2. When the head of the battery pile is corroded, please take out the battery and clean it.
3. After cleaning, please apply a thin layer of butter or Vaseline to the head of the battery pile before installing the battery.

Battery capacity: 12V6.5Ah



When disassembling the battery, keep far away from the fire source. When disassembling, you must first turn off the main switch, and then remove the negative electrode. When installing, install the positive electrode first, and then install the negative electrode. When the pile screws are loose, lock them.

Maintenance Precautions

1. The closed battery electrolyte cap should never be removed.
2. Batteries will produce flammable gas, so fire should be strictly avoided during installation.
3. The battery fluid is dilute sulfuric acid, which will harm the eyes or skin. In case of accidental dripping on the skin, it should be rinsed with water immediately, and then consulted by a doctor.
4. Pay attention to the electrode wiring when charging.
5. If it is not used for a long time, the battery will discharge itself. To prevent power leakage, fully charge the battery first and store it in a cool and ventilated place. The negative

pole should be removed when storing in the scooter.

6. When less riding in a month, please recharge it once to keep the battery in good condition.

7 For details, please inquire at the dealer or the special service station.

ARIIC repair shop



Emergency trouble shooting

If a fault occurs when the user starts the vehicle or is riding, the first step is to carry out self-check according to the following items:

1. Gasoline left?

The fuel volume indicator, whether the red indicator is flashing, and whether there is fuel in the fuel tank (Note: There is only a small amount of gasoline at the bottom of the fuel tank, and the fuel pump cannot pump it). Please refuel 92# and above unleaded gasoline.

2. Whether the battery is short of electricity, and whether the battery voltage indicator in the lower right corner of the meter is showing that the voltage is lower than 10.5V when it is not started or during electric starting, if so, please charge the battery.

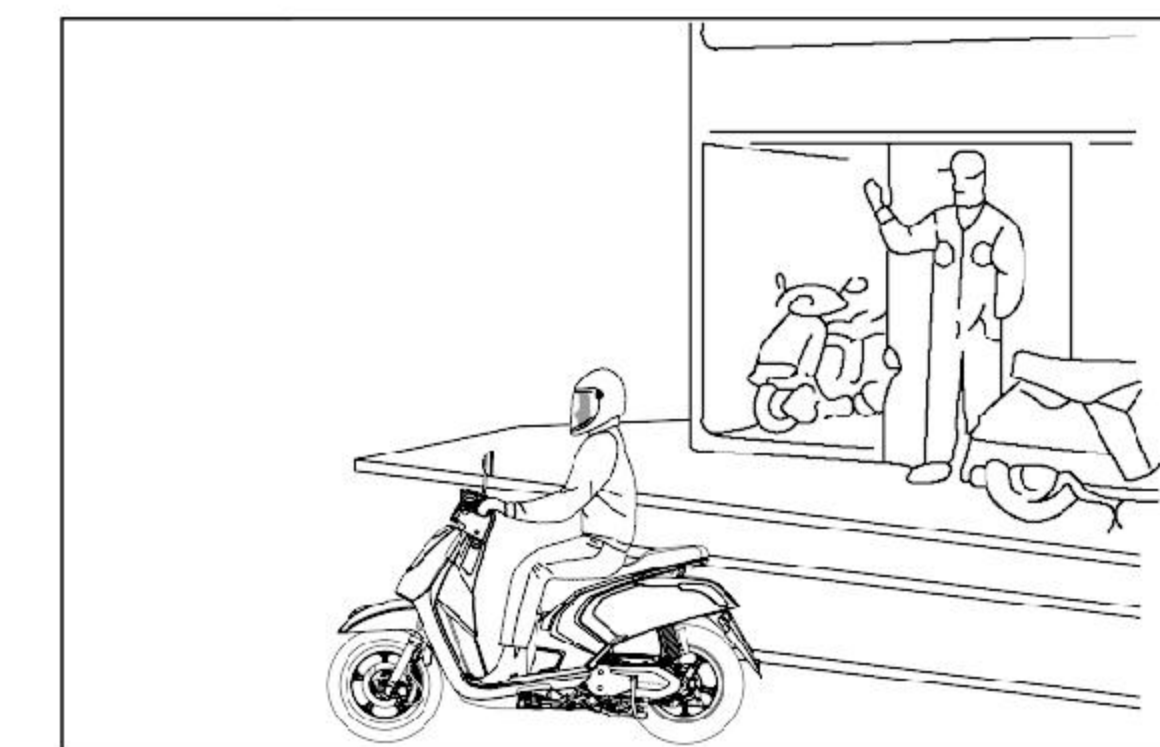
3. Is the engine starting method correct? (eg: whether the side stand is up)

4. After starting, the "engine fault light" of the instrument is always on. Follow the method to turn off the

"engine fault light 0" in the "piezoelectric . Instrument Function and Operation" of this manual. If it can not be turned off, please ride to the dealer or special service station at a medium or low speed to get inspection.

5. The "start-stop indicator A" of the instrument flashes abnormally (the normal start-stop indicator flashes as follows: Long on or continuous unlocking on and off at the same frequency), if the vehicle can not be started, please contact the dealer or a special service station for inspection.

6. Press ignition switch knob without turning, if the meter "PKE signal light" flashes 8 times, mostly because the remote control battery died or the battery is in poor contact, please press the knob



move the remote control close to the antenna position, and use the IMMO function to unlock. During riding, if the key is accidentally lost, there is an emergency treatment time of 30 seconds to unlock the lock without the key. For the specific treatment method, please refer to the "PKE Smart Lock Control and Operation" chapter in this manual. The second step self-inspection can not solve the problem, and the vehicle can not start or run normally. Please contact the dealer or the special service station, tell the fault phenomenon and describe the self-inspection process, and wait for their instruction

Emission control and system maintenance:

Complying with national regulations and reducing exhaust emissions and air pollution is the obligation of Ariic and every motorcyclist. In the production,

manufacture, use and maintenance of vehicles, we should follow the methods as follows:

1. The cleaning of the air filter element can improve the combustion efficiency and reduce the exhaust emission. Please refer to the chapter "Cleaning and Replacement of the Air Filter" in this manual.
2. All parts of the engine are well lubricated, which not only protects the engine, but also improves gasoline combustion efficiency and reduces exhaust emissions. Please change the oil every 3000km. Do not discard the replaced waste oil, please hand it over to a professional recycling organization or Ariic distribution.
3. The quality of gasoline directly affects the work and combustion efficiency of the ignition system. Please be sure to use 92# or above unleaded gasoline. It is strictly forbidden to use leaded gasoline. Lead is a toxic heavy metal. Using it will not only pollute the environment, but also lead to catalytic conversion in the exhaust pipe. The device deteriorates and fails, increasing exhaust emissions.
4. The muffler used by Ariic Company contains exhaust ternary catalytic catalyst, which is produced in strict accordance with national regulations and standards, and meets the national environmental protection requirements. Please do not replace sub-standard components or illegally refit. If you find that the exhaust gas emitted by the muffler is abnormal, please contact in time the dealer or special service station, check and fix it.
5. The company's products are equipped with fuel evaporative emission control system (E.EC), which can effectively reduce fuel evaporative leakage and exhaust emissions, and protect the environment. Therefore, if the system is faulty, please repair it in time, and never dismantle it without permission.

Fuel Evaporative Emission Control System Inspection:

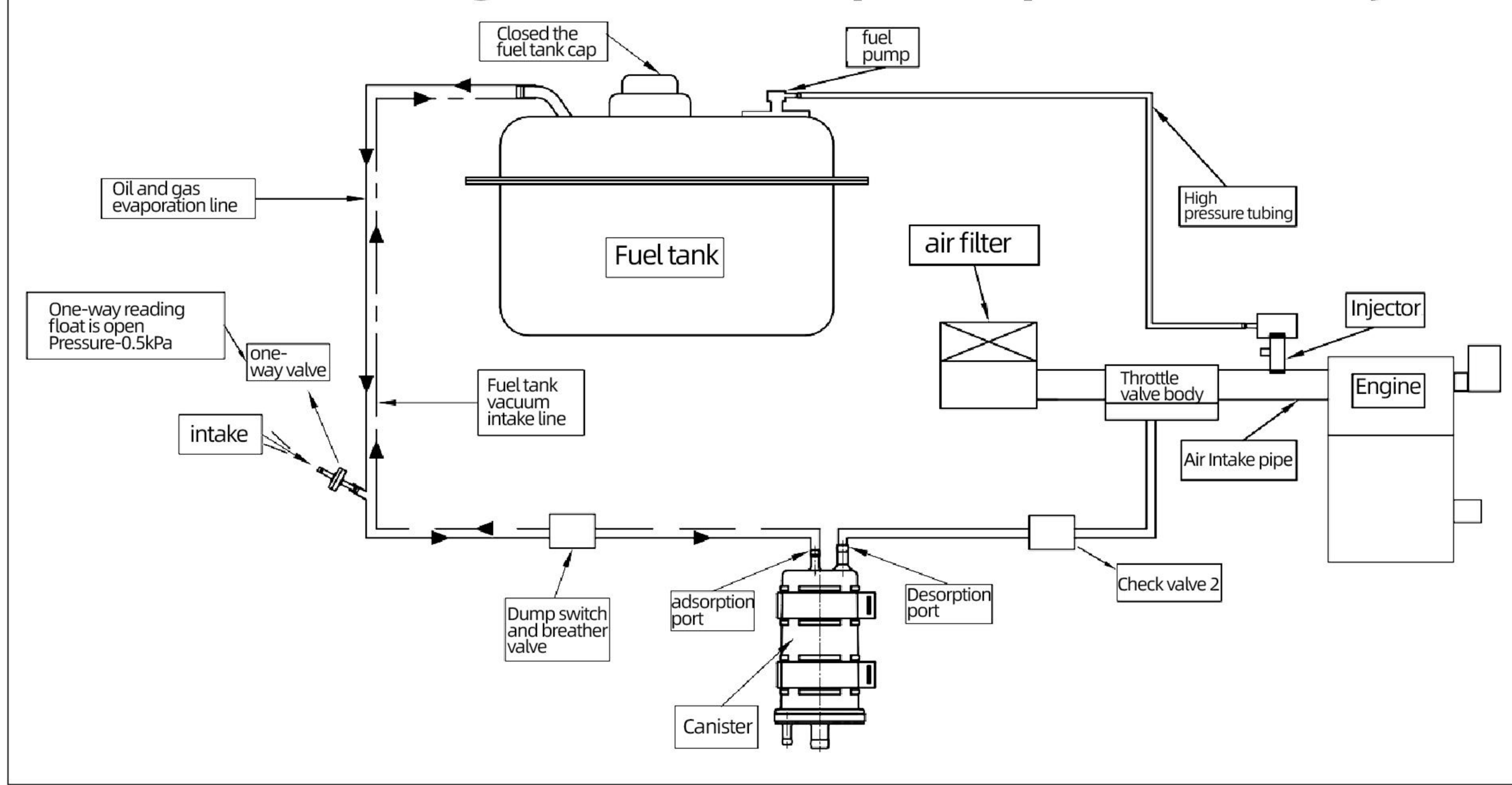
1. Check whether the pipe joints of the E.E.C system are locked or broken. If not locked well, lock it, if broken, then replace with new ones.
2. Activated charcoal canister - blow air with the mouth to test its ventilation, if there is poor ventilation or blockage, it should be replaced with a new one.
3. Remove the pipeline of the activated carbon tank, and use compressed air to blow it. If it is smooth, it is good. otherwise, replace a new one.
4. The wrong installation, failure or blockage of the check valve may cause difficulty in starting or failure of the evaporative emission control system. Please pay special attention when inspecting and replacing new components.
5. Please refer to the fuel pipeline system maintenance items list for regular inspection and maintenance. Irregular inspection In the event of an accident to the vehicle, check whether the pipeline parts in the E.E.C system are broken or loose. The inspection method is as above. Suggestions: The pollution emission value of this model is in line with the national environmental protection regulations and control standards. The settings of its adjustable parameters (such as modifying the exhaust pipe, illegally brushing computer programs, etc.) should not be adjusted arbitrarily.

1. Do not remove or modify the vacuum line of the evaporative emission control system.
2. In order to reduce emissions and pollution, do not reciprocate the throttle when idling.
3. In addition to regular maintenance, if any abnormal situation is obviously found (such as poor starting, black smoke, etc.), please go to the special service station designated by the company immediately for maintenance.
4. Only use 92# or above high-grade unleaded gasoline to ensure the function of preventing pollution of components.

Emission control and system maintenance:

E . E . C is the evaporative exhaust gas discharge device, which collects the evaporative oil and gas in the fuel tank to prevent the oil and gas from being released to the atmosphere and causing ambient air pollution. (As shown below)

Schematic diagram of the fuel evaporation pollutant control system



LK108 CISS

