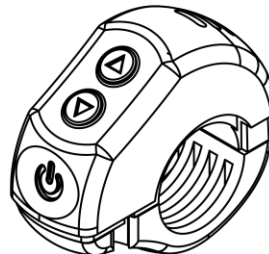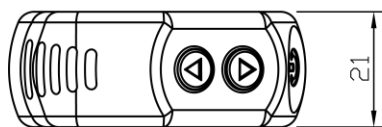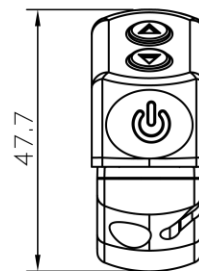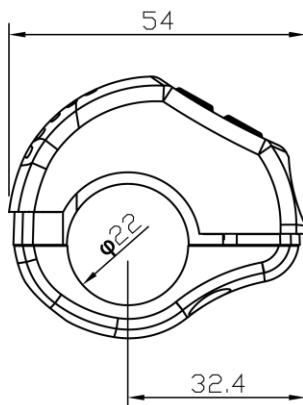# 1 About the user manual

Dear users, in order to operate your electric car better, please read the 51206 user manual carefully before use. We will tell you every step of the instrument in the most concise language, from hardware installation and setup to normal use of the instrument. At the same time help you solve the confusion and obstacles that may arise.

2 Outlook and size

2.1 Material and color

51206 products use PC and ABS materials. Under the temperature of -20 to 60℃, the shell material can ensure normal usage and good mechanical performance of the products.
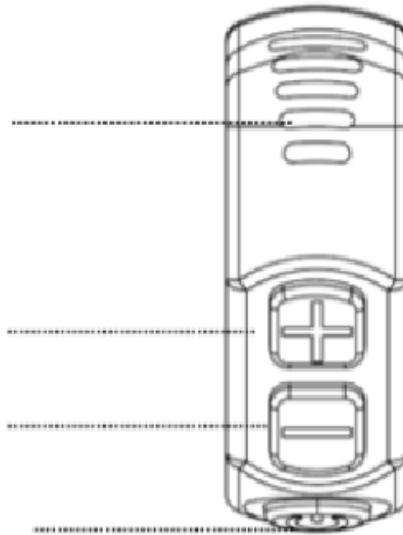
Dimension figure (unit: mm).

2.2 Button definition

51206 has three buttons, "ON/OFF"、 "+" and"-".

Blue and green bi-color
Blue indicates the battery
Green indicates gear

Function key +:

Function key -:

Function key ON/OFF:

3 Function summary

51206 provides a wide range of functions and indicators to fit the users' needs.

The indicated contents are as below.

3.1 The basic display functions are as follows

3.1.1 PAS level

3.1.2 Battery capacity indication (default)

3.1.3 Error information, reference to error code page

◆ The display area is indicated by blue-green dual-color light；

◆ When the blue indicator light is on, it indicates the battery capacity；

◆ When the green indicator light is turned on, it is represented as PAS level.

3.2 Turn on/off

When the display is turned off, press the " ON/OFF"; Power on the

system, the indicator light shows the battery capacity; In the power-on state of

the display, hold the "power key ON/OFF" up to 2 seconds to shut down bike system.

3.3 Switch Light

After powering on, hold the "+" up to 2 seconds then turn on the front light; hold the "+" again then turn off the front light.

3.4 Adjust PAS level

In the power-on state of the display, press the "+" or "-" button to increase or decrease the PAS level correspondingly, and return to the battery capacity display after display show the PAS level for 3 seconds. The default PAS level is level 1 and the maximum is level 5.

3.5 Error information

In the condition of a fault, the blue light of the instrument is all lit and flashed quickly the corresponding number of times, and the number of flashes is the error number.

Flash mobs	Error code	Definition	Content
1	1	Motor error	Motor cable detached/broken, winding, sensor, power issues, motor blocked for extensive period.
2	2	Controller error	Any internal issue in the controller detected, causing malfunction or functions to be disabled.
3	3	Throttle error	If throttle is applied during power up, or broken wire/connection detected.

4	4	Low battery voltage	If voltage from the battery is too low.
5	5	Brake switch error	If brake switch is activated during power up or broken wire/connection detected.
6	6	Speed sensor error	Broken wire/connection detected, or no wheel speed signal received.
7	7	Battery error	If an error is reported or detected, either by controller or by battery (Battery status data available in the BMS)
8	8	Overcurrent	If too much current is consumed, either due to error, malfunction, short circuit etc.
9	9	Communication error	If a communication error is detected.
10	10	Overvoltage	If voltage from the battery is too high.

3.6 **Battery capacity indicator**

◆   The battery capacity is divided into 5 levels, each level represents 20%,

after the battery is fully charged, all five levels are displayed;

◆   When the battery voltage is low, the last level is displayed as a flashing

state, indicating that the battery is about to run out and needs to be charged
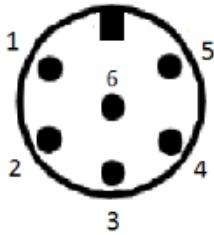
as soon as possible.

3.7 **Walk assistance**

Hold the ' - ' button more than 2 seconds, starting walk assistant until the

button is released and the walk assistant stops.

3.8 Auto power off in 5 minutes

Speed keep up 0KM / H and have no any operator, system will turn off

automatically in five minutes.

4 Wire map definition

JL-F35-Z608JG

Number	Function
1	Battery **-**
2	RX on Display
3	Battery +
4	NA
5	TX on Display
6	Lock

Performance parameters

4.1   Operating voltage : DC 36V, standard RS232 communication, baud

rate 9600BPS.

4.2   With IP65 waterproof ability, suitable for outdoor use.

5 General problems and solutions

Q: Why the display is not able to power on？

A: Checking the connector that between display and controller.

Q: How to deal with the error code?

A: Find the general repair methods according with error code, if cannot to resolve

it, please repair it to repair points.

6 Quality & Warranty

Under normal use conditions, the company will be responsible for the limited warranty during the warranty period for the failure caused by the quality of the product itself.

The warranty period is 18 months from the date of purchase of our products.

The following conditions are not covered by warranty:

1. Dismantling and refitting without authorization.

2. Fault or damage caused by user or third party misuse or incorrect installation

and debugging.

3. The outer shell of the instrument is scratched or damaged after leaving the factory.

4. The meter cable is scratched or broken.

5. Faults or damages caused by natural disasters, such as fire, earthquake, lightning strike, etc.

6. The product is beyond the warranty period.

7 Attention

Please take attention that changes or modification not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:
(1) This device may not cause harmful interference, and
(2) This device must accept any interference received, including interference that may cause undesired operation.

FCC ID: 2A9GA51206