

User Manual of Electric Skateboard Remote Controller MTSKR1512

V2.1 10/6/2016

By Eric Sun (Engineering Department)

By Yina Zhang & Sales Team



I Maytech Remote Controller for Electric Skateboards include the receiver,

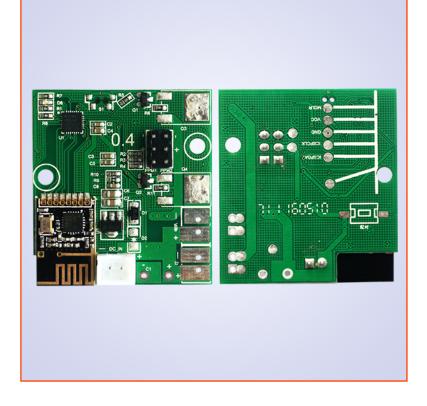
the USB cable, and the Silicon Protection Cover.

1、The Handheld Part



2、The Receiver Board:





3、The USB Cable for Charging:



4, Silicon Protection Cover:

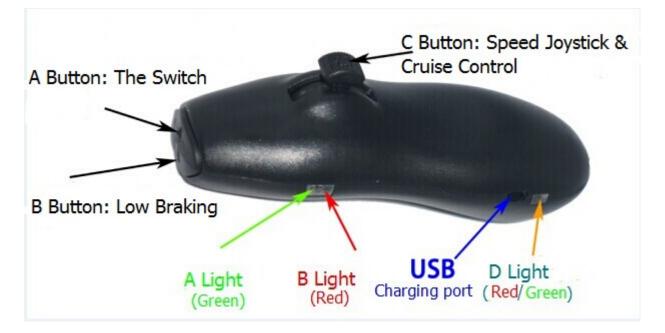




II Buttons and LED Lights

The Handheld Part of Remote Controller:

A Button = The Switch. B Button = Low Braking C Button = Speed Joystick & Cruise Control

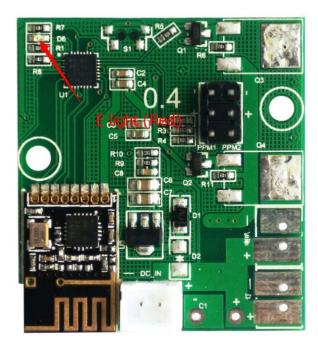






- A Lights: Green (Switching on / off & Cruise Control)
- B Light: Red (Communication Status)
- C Light: Red / Yellow/ Green (Battery Value)
- D Light: Red / Green (Charging Status)

Receiver Board:



E Light: Red (Receiver Status)



III Brief Procedures:

Check the battery first when you get a new remote controller. Please charge the remote controller if the battery is lower. Make sure the remote battery power is enough before you use it.

- 1. Connect the ESC signal cable to the receiver.
- 2. Switch on the remote.
- 3. Power on the ESC.

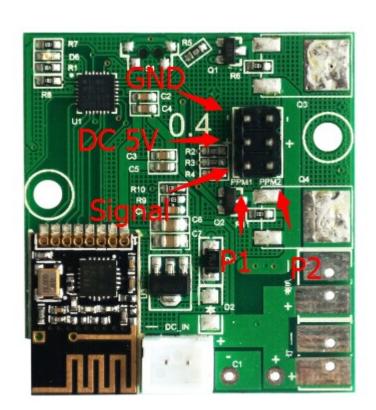
The receiver will start to work. Please refer to the E Light on Receiver to confirm if "Paring" is needed.

After "Paring" succeeds, the remote is ready to use. Please make sure "A", "B", and "C" Buttons work as well.

IV Instructions:

1. Hardwares Connection:

The receiver is connected with ESC signal cable through pins. P1 and P2 are in parallel and are able to connect 2 ESC signal cables at most.



The receiver input voltage is 5V. The BEC ESCs can supply the receiver 5V power through the signal cable. The separated 5V power supply is needed for OPTO ESCs.

2. Check the Battery:

Press A Button and B Light flashes. A Light and C Light flash three seconds later. At this moment, release the A Button. The remote is switched on successfully. If C Light is not on or flashes in red, the battery is low and should be



3. Charging

The USB cable in the package is the charging cable. One end connects the PC or USB charger, the other end connects the charging port. At this moment, the D Light is on. The remote is being charged. If the battery voltage is less than 3.6V, the D Light will flash in red, otherwise, in green. Continue to charge for 1 hour after the green light is on. The voltage will reach 4.2V. The charging is completed.

4. Switch on the Remote:

Press A Button and B Light flashes. A Light and C Light flash three seconds later. At this moment, release the A Button. The remote is switched on successfully.

5. Power on the Receiver:

Power on ESCs or external 5V power supply, E Light will flash. If E Light flashes 4 times per second, the communication between Receiver and Remote is good. The ESC can receive the speed signal.

6. Cruise Control

Press C Button and A Light flashes. The e-skateboard speed is fixed. The C Button can be back to middle position, and the skateboard is still running at the fixed speed. If you want to cancel cruise control, you can re-press C Button or put C to the lowest position.

7. Slow Braking:

Slow braking is needed for downhill. Pressing B Button. The motor will be forced into the low-speed operation in order to ensure safety with downhill.

V Paring Instructions:

The Remote and Receiver are paired in the factory. In case of the mixed channels caused by accidents, it would be better to pair the remote yourself again.

Pairing Process:

- 1, Turn off the Remote and Receiver.
- 2, Turn on the remote with A Button.
- 3, Press down and release C button. The A Light will blink green.





4. Press the B button 10 times in less than 10 seconds. All lights on your controller should turn off.



5. Turn on the receiver. E Light has some combination of flashing lights. The pairing begins.

6. The two lights (A & C) together tell you what frequency it is. The A Light is in terms of tens, and the C Light is the single digits. Simple add the two numbers together to determine which frequency you are on.

Example: The default frequency for this remote is 2. A Light flashes 2 times.

If the frequency is 15, A Light flashed 1 time and C Light flashes 5 times.

To change the frequency, simply slide the joystick (Do not press the C button) up or down to increase and decrease the frequency.

This should be changed if you are experiencing interference or if using multiple of these controllers in the same area.





7. Press C Button to save the frequency. All lights turn off.

8. Press and hold the A button to turn off the remote.

Turn on both your remote and electric skateboard. The receiver should blink red and become solid red if pairing was successful.

VI FAQ:

Q: What is frequency and channel of the remote controller?

- A: 2.4GHz Frequency; 64 Channels.
- Q: What's the default frequency?
- A: The default frequency is 2.

Q:Can the remote controller work with two ESCs or more?

A: It is OK for 2 ESCs (P1 and P2 for each ESC).

Considering the limited output capacity of the receiver and the interference cause by multiple ESCs, it is not recommended to connect with 3 or more ESCs.

Q: Can one remote work with two receivers or two remotes with one receiver?

A: No! It must be one-to-one paired.

- Q: Will it cause interference with multiple remotes in a small area?
- A: With different frequency, there will be no interference. With same frequency, it might cause interference. It would be better to set different channels.



Q: Sometimes, the frequency reflected by A & C lights is more than 64. Why?

A: The default frequency is 2. If you slide down C Button a lot, it comes into the minus channel zone.

The flashing lights of A & C will be different with the Part 6. Please slide up the C Button and get out of this minus zone.

Q: About pairing, E Light becomes solid red and there are no frequency numbers from A & C lights. What's wrong?

A: Re-start the receiver and try again.

Q: What should I do when errors happen during paring?

A: You can turn off the remote with A Button any time. Restart the remote and pair it again.

Q: How long does the remote last after recharging?

A: It can last 1 to 2 hours.

Q: How far can the remote control?

A: 10 meters

Q: The remote can not be turned on during charging?

A: The battery is still low, even though it is being charged. Please try to turn on half an hour later.

Q: What will happen if I do not use the remote for long time?

A: The battery will be damaged permanently without charging. The frequency save in the remote and receiver will be deleted. We recommend you to use and charge the remote within 3 months at least.

Q: The remote is off. Why does motor shake after the receiver and ESC are powered on?

A: This situation seldom happens, but if it happens, please get away from the surrounding interference of Wifi / Bluetooth 2.4G.

If the interference can not be avoided, please set the ESC speed signal dead zone to 0.15ms or the throttle calibration with middle position of 1.65ms.