HX-MINI006-RFBT15-DIM/CCT/RGB/RGBW

D006 MINI series WIFI led controller for DIM/CCT/RGB/RGBW

Controller adopts the most advanced PWM (Pulse Width Modulation) digital control technology, it is used for controlling constant voltage LED lamps. For instance, point source of light, flexible light strip, led modules, led strings and so on. HX-MINI006-RFBT15-DIM for single color, HX-MINI006-RFBT15-CCT for dual white, HX-MINI006-RFBT15-RGB for RGB, HX-MINI006-RFBT15-RGBW for RGBW. The WIFI control technology powered by Tuya.

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Powered by tuya
Intelligence Inside

Product Features

- WIFI technology powered by Tuya.

- DC12-24V, four channels output, Max. load current: 1ch*6A(DIM), 2chs*3A(CCT), 3chs*2A(RGB), 4chs*1.5A(RGBW).

- RF remote control is optional, compatible remote control item: RFBT15.

- Wireless-Sync control function. Receivers will transmit the control signals from the remote control and self-inspection the work statues for each other, so multiple receivers will wireless-sync-work completely.

- Memory function, each time power-on reserve the mode which stop in the last power-off.

- Warranty of this product is three years, exclude the artificial situation of damaged or overload working.
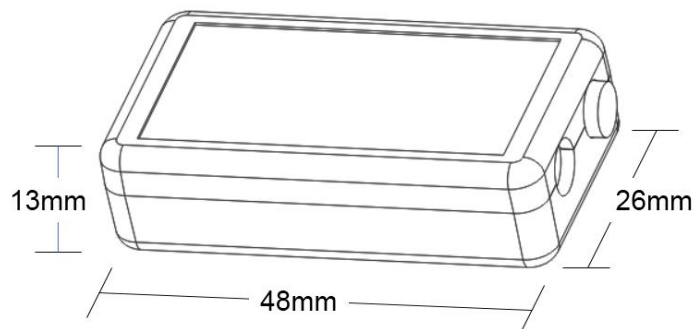
Technical Parameters

Receiver:

Working temperature	-20-60℃	Supply voltage	DC12V-24V
Static power consumption	<1W	Connecting mode	Common anode
Grayscale	1024 levels	Speed stage	1024 levels
External dimension	L48*W26*H13 mm	Net weight	20g
RF frequency	2.4GHz	RF distance	≤20m
Button control	Yes	Memory function	Yes
Output	Depends on DIM: 1 CH CCT: 2 CHs RGB: 3 CHs RGBW: 4 CHs	Output current	≤6A(total) DIM:1*6A CCT: 2*3A RGB: 3*2A RGBW: 4*1.5A
PWM frequency	1.95KHz	Max. Output power	12V:<72W, 24V:<144W

Remote control (optional)

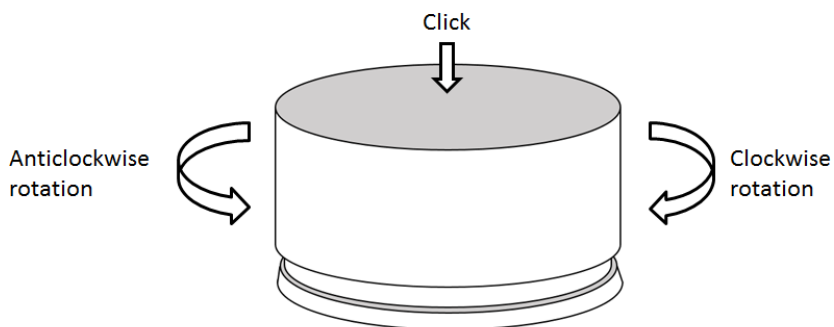| Working temperature	-20-60℃	Working voltage	3V(AAA*2PCS)
Sleep current	<25uA	Emission current	<17mA
Sleep power consumption	<75uW	Emission power consumption	<51mW
Net weight	80g	Dimension	Φ60*35mm
RF distance	≤30m	RF frequency	2.4GHz
Accessories	holder 1pc, 3M foam sponge glue 1pc.		

Dimensions

13mm

26mm

48mm

Interface Specifications

Loading port: DC plug for DIM,

Input port: DC plug (2.1/5.5)   4PIN for CCT/RGB, 5 PIN for RGBW

4. Remote Control Function

Click

Anticlockwise rotation

Clockwise rotation

DIM (work with single color receiver), item: HX-MINI006-DIM

ON/OFF: Short-click

Adjusting brightness: Rotating / Pressing+Rotating (Turning from modes to adjust brightness:)

Modes: Double-short-click

Mode's list

No.	Mode	Marks
1	Flash	Rotating to adjust the speed

2	Fade	

CCT(work with CW+WW receiver) , item: HX-MINI006-CCT

ON/OFF: Short-click
Adjusting brightness: Rotating/ Pressing+Rotating (Turning from modes to adjust brightness:)
Adjusting CCT: Pressing+Rotating
Modes: Double-short-click
Modes list

No.	Mode	Marks	No.	Mode	Marks
1	WW+CW flash	Rotating to adjust the speed	3	WW/CW flash in turn	Rotating to adjust the speed
2	WW+CW fade		4	WW/CW fade in turn	

RGB(work with RGB receiver), item: HX-MINI006-RGB

ON/OFF: Short-click
Adjusting brightness/speed: Rotating
Adjusting color: Pressing+Rotating
Modes: Double-short-click
Modes list

No.	Mode	Marks	No.	Mode	Marks
1	3 colors flash	Rotating to adjust the speed	5	White flash	Rotating to adjust the speed
2	7 colors flash		6	White fade	
3	3 colors fade		7	Red-blue fade	
4	7 colors fade		8	Green-blue fade	

RGBW(work with RGBW receiver) , item: HX-MINI006-RGBW

ON/OFF: Short-click
RGB/W switching: 2s-long-pressing
Adjusting brightness/speed: Rotatin
Adjusting color: Pressing+Rotating
Modes: Double-short-click
Hotkey: 3 times-short-click to overall ON/OFF
Modes list

No.	Mode	Marks	No.	Mode	Marks
1	3 colors flash	Rotating to adjust the speed	5	White flash	Rotating to adjust the speed
2	7 colors flash		6	White fade	
3	3 colors fade		7	Red-blue fade	

| 4 | 7 colors fade | | 8 | Green-blue fade | |

5. Direction for use

1). WIFI controlled by Tuya Application to achieve smart control like group control, scene control, timer
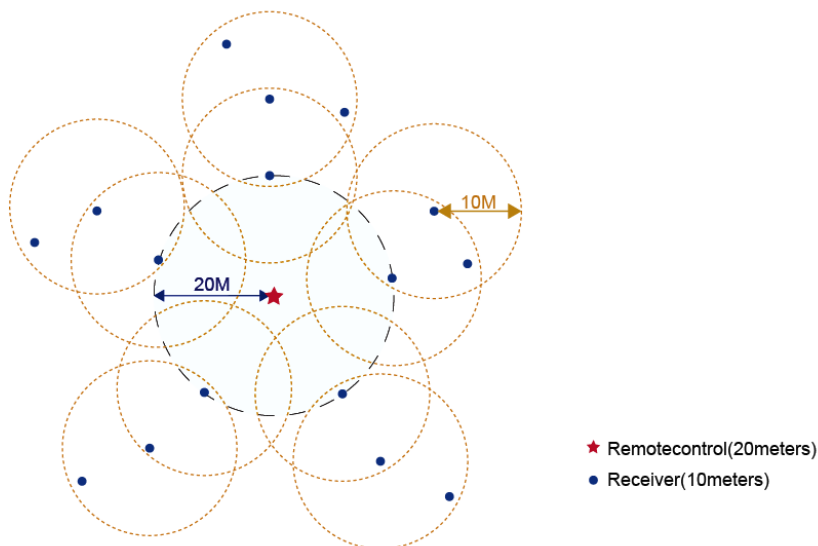control, music control and so on.

Scan QR code from controller to download Tuya application: (Tuya).
Long pressing "Set" button on controller and hold for 5 seconds until the loading LEDs flashing to start the
connection with Tuya APP. Please read operation instruction of App, or following the pop-up prompt message
with the APP, to finish the rest connection operation.
And compatible with voice control via Amazon Alexa, Google Assistant, Yandex Alice and so on.

2). Remote controlled by RFBT15
Please pair the controller to RFBT15 remote control before using. The operation instruction and functions can be find from manual of RFBT15 remote control.
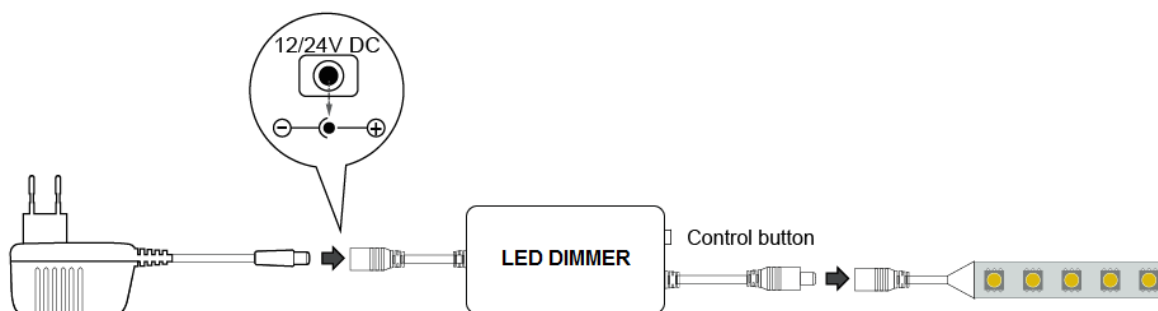
Wireless-synchronization function

Receivers will transmit the control signals from the remote control and self-inspection the work statues for each other, so multiple SAME MODEL receivers will wireless-sync-work completely.
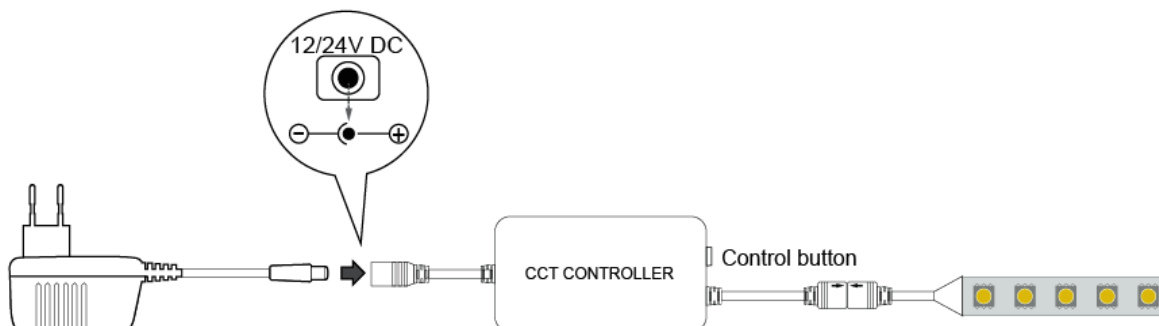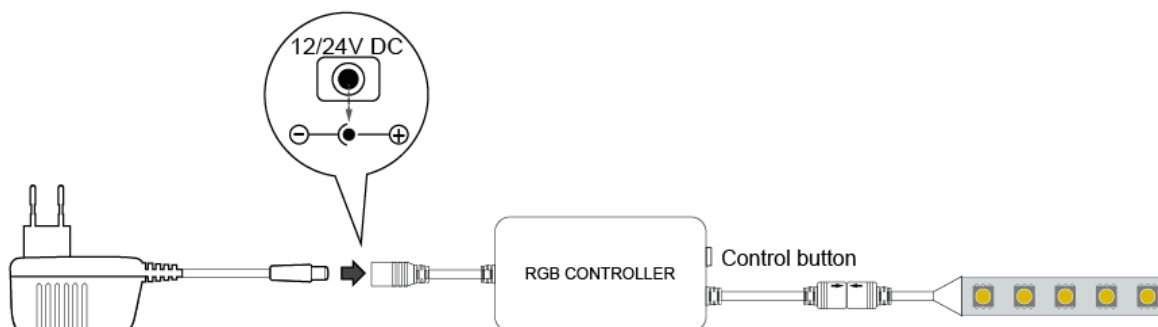

6. Typical Applications

Application Circuit 1: Single color (power input by DC male plug 2.1/5.5, led output by DC female plug 2.1/5.5)
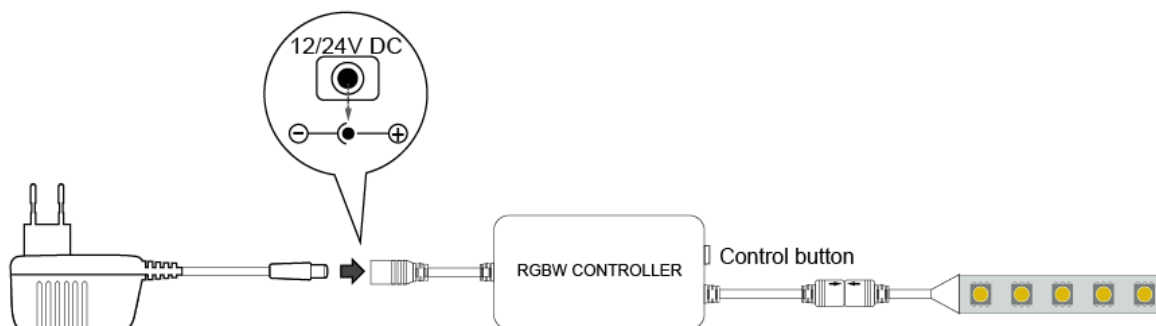
Application Circuit 2: CW+WW(power input by DC male plug 2.1/5.5, led output by 4 pin*2.54 connector: V+ CW NC WW)

Application Circuit 3: RGB (power input by DC male plug 2.1/5.5, led output by 4 pin*2.54 connector: V+ G R B)
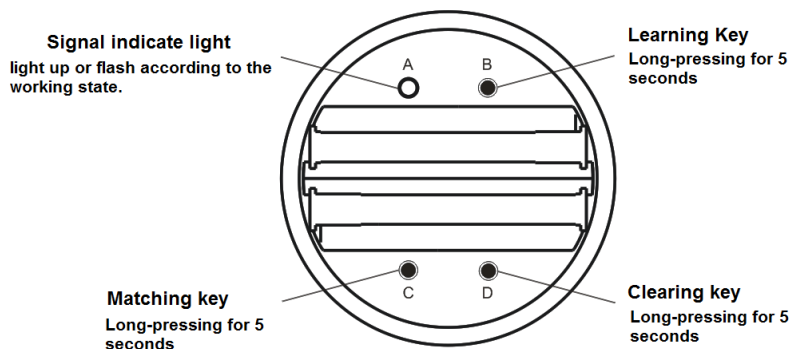

Application Circuit 4: RGBW (power input by DC male plug 2.1/5.5, led output by 5 pin*2.54 connector: V+ G R B W)

7. Wireless remote control code value setting method

The number of controllers and remote controls in one system is unlimited. 2.4G Smart system has one unique RF code for communication. Each controller and each remote control can remember only one RF code, recorded in the first programming. New RF code can be recorded after delete the old one.

Code matching operation: the receiver will only be controlled by the value code remote control.

Step	Operation	Instructions
1	Connecting the load to the receiver and power on it.	1.It is necessary to clear the code first, if the receiver was coded before. 2.Batch operation can be performed within the remote control range. 3. Please remember to cut off other un-code zones power, or will be paired together.
2	Press and hold "C" on the remote control for 5 seconds	The indicator of the remote control will flash quickly, see the load light flashes 3 times and return to the initial state, means matching coding is finished successfully
3	Press any key to exit and end the operation	Also will automatically exit code transmission status after 60 seconds

Code clearing operation: that the original code value of the receiver will be cleared and returned to the factory state. Then it can be controlled by any compatible remote control, also can be paired to a new code.

Step	Operation	Instructions
1	Connecting the load to the receiver and power on it.	1. The clearing operation should be finished within 1 minute after the receiver is powered on. 2. Batch operation can be performed within the remote control range.
2	Press and hold "D" on the remote control for 5 seconds	1. The indicator of the remote control will flash quickly, see the load light flashes 3 times and return to the initial state, means pairing coding is finished successfully.

		2. If the original remote control is lost, the new remote control can be used for clearing operations.
3	Press any key to exit and end the operation	Also will automatically exit code transmission status after 60 seconds.

Code learning operation between remote controls: Used to unify system code values or copy a new remote control.

Since each remote control has its own unique RF code at the time of delivery, when there are multiple remote controls in one system, one of them must be selected as a main, and other remote controls should copy its RF code.

1**) Main** remote control: Press and hold **"C"** key for 5 seconds. The indicator of the remote control will flash quickly, means it enters the pairing code transmission status.

2) New remote control: Press and hold **"B"** key for 5 seconds, indicator will turn from 100% to off means it enters learning code status.

3) Indicator of the new remote control flash three times after successful code learning.

Remote control RF code learning from controllers

1) Turn off the power supply of the controllers.

2) Press and hold **"B"** key for 5 seconds until indicator of remote control turns off.

3) Turn on the power supply of the controllers. Indicator of the remote control flashes three times after successful code learning.

Note: The distance from controllers to remote controls should be less than 2 meters.

Restoring factory settings of remote control

1) Press and hold "B" key for 20 seconds until indicator of remote control process the state as 100% -off-100%.

2) Press **"D"** button to submit and finish the operation. Indicator of the remote control will flash three times after successful operation.

8. Remote control accessories installation instructions

Accessories include holder 1pc, 3M foam sponge glue 1pc,AAA batteries 2pcs.

Installation instruction:

1) Using 3M foam sponge glue make free drilling installation of the holder onto the suitable wall or furniture surface.

2) Placing Knob on the holder to operate the controlling, or take the knob and use it on any tabletop as convenience.

9. Packing

Product information for placing order

Product name	Item number
HX-MINI006-RFBT15-DIM/CCT/RGB/RGBW	**Set packing:** HX-MINI006-RFBT15-DIM HX-MINI006-RFBT15-CCT HX-MINI006-RFBT15-RGB HX-MINI006-RFBT15-RGBW **Remote control:** HX-RFBT15 **Receiver:** MINI006-DIM MINI006-CCT MINI006-RGB MINI006-RGBW