

# HM-12RGB5A3-RC-2 LED RGB CONTROLLER

(Version V2.00)

# Manual



# Safety

Thanks for choosing our HM-12RGB5A3-RC-2 Full Color Multifunction Controller. Before installation and usage, we strongly recommend you to read through this manual carefully.

- 1. Please don't install this controller in lightening, intense magnetic and high -voltage fields.
- 2. To reduce the risk of component damage and fire caused by short circuit, make sure correct connection
- 3. Always be sure to mount this unit in an area that will allow proper ventilation to ensure a fitting temperature.
- 4. Check if the voltage and power adapter suit the controller & if anode or cathode definition is the same as the controller's.
- 5. Don't connect cables with power on; make sure a correct connection and no short circuit checked with instrument before power on.
- 6. Please don't open controller cover and operate if problems occur.

For update information, kindly please consult with your supplier.



### Product brief

HM-12RGB5A3-RC-2 Full-color Multifunction Controller is dedicated to control color changes of LED lights with 4-pin 3-loop cables (common anode). It can be controlled through manual buttons and its match remote controller. Also this unit can run standalone or networking with multi controller (working with HM-12RGB5A3-EX power expansion, output voltage can be unlimitedly expanded)

# **Product features**

Three channels, 5 Amp maximum for each channel;

With output protecting function, it could extend the life of LED;

Maximum 32 modes can be selected, and 256 levels of grayscale;

Speed and brightness can be adjusted separately for each mode;

Mode, suspend power memory function;

Change patterns and suspension of power-off

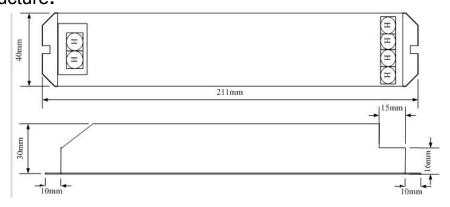
memory function;

ON/OFF switch.

# **Product Specification**

Power input	DC12~24V	
Power output	5A(Max) per channel, 12V≤ 180W; 24V≤ 360W	
Standby Power	<0.5W	
Size	211(L)X40(W)X30(H) mm	
Weight	300g	

### **Product Structure:**





### **Switch Mode Instruction**

1: Static Red	9: 7-color flicker	17: White jumping	25: White fade in, fade out
2: Static Greed	10: 6-color jumping	18: 7-color gradual change	26: RG fade in, fade out
3: Static Blue	11: 6 color flicker	19: RGB gradual change 27: RB fade in, fad	
4: Static yellow	12: RGB jumping	20: RG gradual change	28: GB fade in, fade out
5: Static purple	13: RGB flicker	21: RB gradual change	29: Red fade in, fade out
6: Static cyan	14: RG jumping	22: GB gradual change 30: Green fade in	
7: Static white	15: RB jumping	23: 7-color fade in, fade out	31: Blue fade in, fade out
8: 7-color jumping	16: GB jumping	24: RGB fade in, fade out	32: Switch

# **Operation Instructions**



#### The TEST function on the controller:

The 'TEST' button Make the RF controller work homologous with the controller.

The purpose to have this function is to make sure the RF controller will work correspondingly with this controller, as well as not to be interfered by other RF signals.

How to use this function? Power the controller, and then press the "TEST" button, then press any button on the RF remote controller.

#### **REMARK:**

For HM-12RGB5A3-RC-2, please clear code before match code;

To clear code: press and hold the "TEST" button. The Test light comes on at the moment and goes off in 10 seconds. The code is cleared.

To match code: press and release the "TEST" button. In 30 seconds press any button on the remote controller. If the test light flash, Remote controller is successfully matched.



### Instruction of buttons on RF remote controller:

RC	Function	Instruction
button		
1	Mode+	Press to change to next mode
2	Mode-	Press to go back to previous mode.
3	SPEED+	To increase speed by every press.
		(default is set to maximum speed)
4	SPEED-	To decrease speed by every press.
5	Pause	Press once to retain the current color, press
		again to keep changing color.
6	ON/OFF	Press this button to turn off, press again to
		turn on.

# **Troubleshooting Guide**

Problem	Reason	Solution
	The power wire not connected well or	Reconnect the power wire or change
1.All the lamps were off	no output	a power supply
	Lamp's power wire not connected well	Reconnect the power wire
2. Some color was off	Wire of this color not connected well	Reconnect the power wire
3. Irregular flicker	Line is too long or not connected well	Shorten the line or add a amplifier

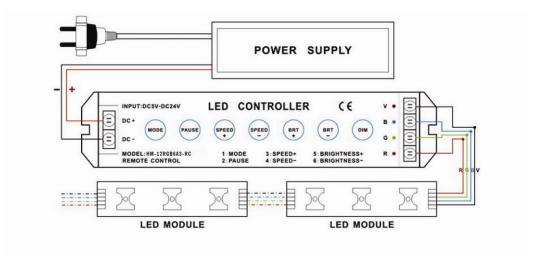
# Trouble shooting solutions:

Trouble chocking colutions.		
Fault Case	Reasons	Solutions
No Bala	1 No power from plug 2 At black mode	1 · Change the socket 2 · Change the running
No light	<ul><li>3 · The fuse broken</li><li>4 · Incorrect connection</li></ul>	mote  3 · Replace the fuse  4 · Check the connection
Incorrect	5 · Incorrect RGB connection	5 · Check RGB



Color, not	6 · Wrong	sync-cable	connection
synchronous	connection		6 · Check sync-cable
No running	7、Running light off.		7 Proce DIM to turn on
light			7 · Press DIM to turn on.

Wiring Diagram (LED module as an example)

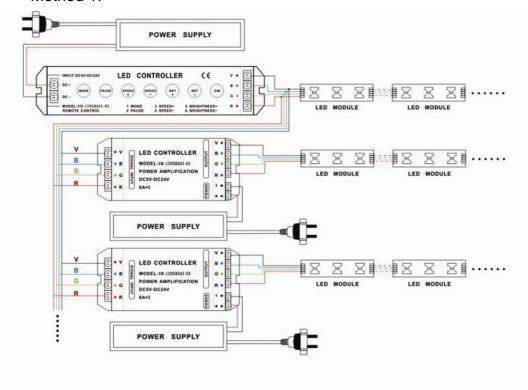


Connecting to extension controllers (LED module as an example)

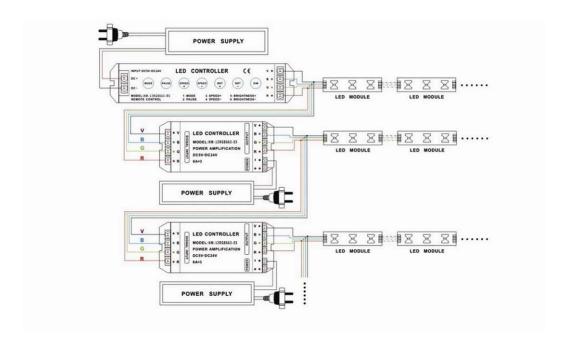
Three connecting methods, these three methods can be mixed in applications.



### Method 1:



#### Method 2:





### Method 3:

