RGB LED Controller Kit

Model No.: V3 + R13

3 channels constant voltage/Touch color slide/Step-less dimming/Wireless remote 30m distance



FC CE RoHS emc LVD RED

Features

- Ultra sensitive color adjustment touch slide
- Smooth dimming and switch without any flickering
- Built in 10 dynamic mode, including jump or gradual change style
- Auto-transmitting function: Controller automaticly transmit signal to another controller with 30m control distance
- Synchronize on multiple number of controllers
- Magnet on the back which can be easily stuck on back holder or any metal surfaces

Technical Parameters

LED Receiver's Input and Output	
Input voltage	12-24VDC
Input current	12.5A
Output voltage	3 x (12-24)VDC
Output current	3CH,4A/CH
Output power	144-288W(12-24V)
Output type	Constant voltage

Dimming data	
Dimming level	4096 levels
Dimming range	0-100%
Dimming curve	Logarithmic
PWM Frequency	750Hz

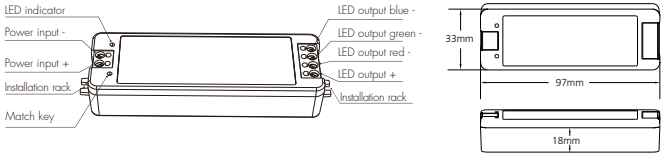
Warranty and Protection	
Warranty	5 years
Protection	Reverse Polarity

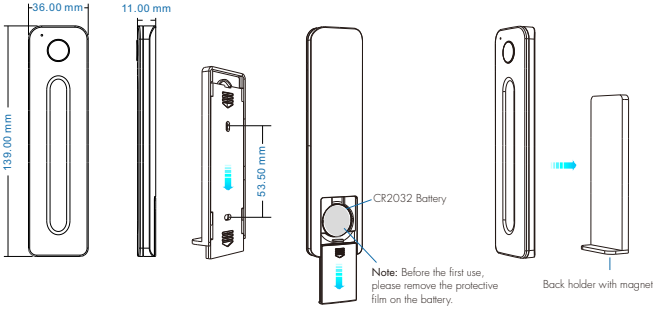
LED Remote's Input and Output	
Output signal	RF(2.4GHz)
Working voltage	3VDC(CR2032)
Working current	< 5mA
Standby current	< 10μA
Standby time	1 year
Remote distance	30m

Safety and EMC	
EMC standard (EMC)	EN301 489,EN 62479
Safety standard(LVD)	EN60950
Radio Equipment(RED)	EN300 328
Certification	CE,EMC,LVD,RED

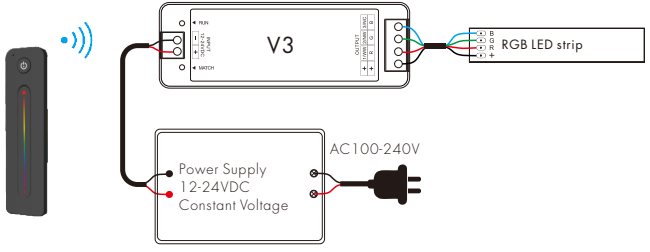
Environment	
Operation temperature	Ta: -30°C ~ +55°C
Case temperature (Max.)	Tc: +85°C
IP rating	IP20

Mechanical Structures and Installations

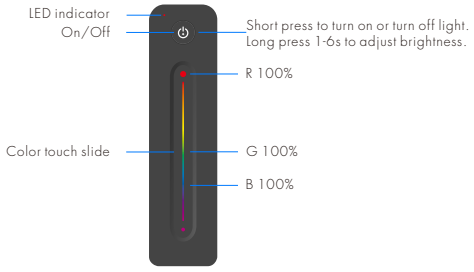




Wiring Diagram



Key function



* To extend battery life, no operation after 20 seconds, the touch slide will enter sleep state.
* If the light is on, long press on/off key exceed 1 second, then touch slide to dimming.
* If the light is off, short press on/off key to turn on light, then touch slide to dimming.

Match Remote Control (two match ways)

End user can choose the suitable match/delete ways. Two options are offered for selection:

Use the controller's Match key

Match:
Short press match key, immediately press on/off key of the remote.

Delete:
Press and hold match key for 5s to delete all match, The light blinks 5 times means all matched remotes were deleted.

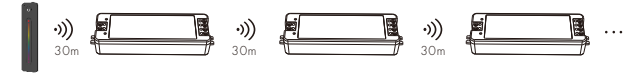
Use Power Restart

Match:
Switch off the power, then switch on power again, immediately short press on/off key 3 times on the remote. The light blinks 3 times means match is successful.

Delete:
Switch off the power, then switch on power again, immediately short press on/off key 5 times on the remote. The light blinks 5 times means all matched remotes were deleted.

Application notes

All the receivers are matched with one RF remote.



Auto-transmitting: One receiver can transmit the signals from the remote to another receiver within 30m, as long as there is a receiver within 30m, the remote control distance can be limitless.
Auto-synchronization: Multiple receivers within 30m distance can work synchronously when they are controlled by the same remote, under same dynamic mode and with same speed.
Receiver placement may offer up to 30m communication distance. However, we recommend for indoor applications that receiver placements should be no further apart than15m.

Dynamic mode list

No.	Name	No.	Name
1	RGB jump	6	RGB fade in and out
2	RGB smooth	7	Red fade in and out
3	6 color jump	8	Green fade in and out
4	6 color smooth	9	Blue fade in and out
5	Yellow cyan purple smooth	10	White fade in and out

Malfunctions analysis & troubleshooting

Malfunctions	Causes	Troubleshooting
No light	1. No power. 2. Wrong connection or insecure.	1. Check the power. 2. Check the connection.
Wrong color	1. Wrong connection of R/G/B wires.	1. Reconnect R/G/B wires.
Uneven intensity between front and rear,with voltage drop	1. Output cable is too long. 2. Wire diameter is too small. 3. Overload beyond power supply capability. 4. Overload beyond controller capability.	1. Reduce cable or loop supply. 2. Change wider wire. 3. Replace higher power supply. 4. Add power repeater.
No response from the remote	1. The battery has no power. 2. Beyond controllable distance. 3. The controller did not match the remote.	1. Replace battery. 2. Reduce remote distance. 3. Re-match the remote.