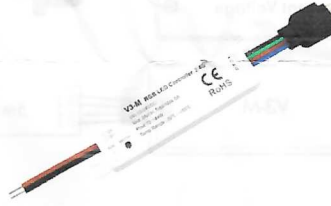# V3-M, V3-M(CJ), V3-M(DJ)

RGB LED Mini RF Controller

V3-M
Cable In /Cable Out Version

V3-M(CJ)
Cable In /4P Female Jack Out Version

V3-M(DJ)
DC Female Jack In /4P Female Jack Out Version

CE RoHS emc RED   3 channel constant voltage / Max 6A output / Step-less dimming / Wireless remote control

Model List

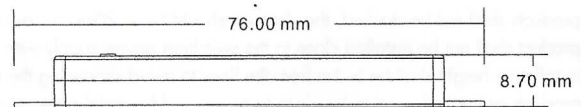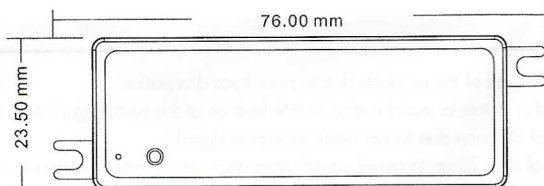| Model	Photo	Power Connector	LED Connector
V3-M		Red/Black Cable 10cm	4-color Flat Cable 10cm
V3-M(CJ)		Red/Black Cable 10cm	4-pin Flat Female Jack 10cm
V3-M(DJ)		5.5mm DC Female Jack	4-pin Flat Female Jack 10cm

Features

- 3 channel constant voltage RGB LED mini RF controller.
- 2A per channel, output connect with 5 meters RGB LED strip.
- Match with RF 2.4G single zone or multiple zone RGB/RGBW remote control.
- One RF controller accept up to 10 remote control.
- 4096 levels 0-100% dimming smoothly without any flash.
- Built in 10 dynamic mode, include jump or gradual change style.
- Light on/off fade time 3s selectable.
- Auto-transmitting function: Controller automatically transmit signal to another controller with 30m control distance.
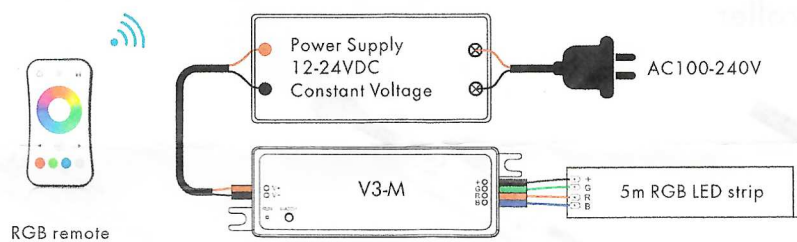- Synchronize on multiple number of controllers.

Technical Parameters

Input and Output		Dimming data		Safety and EMC	
Input voltage	12-24VDC	Input signal	RF 2.4GHz	EMC standard (EMC)	ETSI EN 301 489-1 V2.2.3
Output voltage	12-24VDC	Control distance	30m(Barrier-free space)		ETSI EN 301 489-17 V3.2.4
Output current	2A/CH, Total Max. 6A	Dimming gray scale	4096 (2^12) levels	Safety standard	EN 62368-1:2020+A11:2020
Output type	Constant voltage	Dimming range	0-100%	Radio Equipment(RED)	ETSI EN 300 328 V2.2.2
Environment		Dimming curve	Logarithmic	Certification	CE,EMC,RED
Operation temperature	Ta: -30℃ ~ +55℃	PWM frequency	2000Hz (default)	**Package**	
Case temperature (Max.)	Tc: +85℃	**Warranty**		Size	L90x H130mm
IP rating	IP20	Warranty	5 years	Gross weight	0.021kg

Dimension

76.00 mm

23.50 mm

76.00 mm

8.70 mm

Power Supply
12-24VDC
Constant Voltage

AC100-240V

V3-M

5m RGB LED strip

RGB remote

Match Remote Control

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

Use the controller's Match key

Match:
Short press match key, immediately press on/off key (single zone remote) or zone key (multiple zone remote) on the remote.
The LED indicator fast flash a few times means match is successful.

Delete:
Press and hold match key for 5s to delete all match, the LED indicator fast flash a few times means all matched remotes were deleted.

Use Power Restart

Match:
Switch off the power of the receiver, then switch on power.
Immediately short press on/off key (single zone remote) or zone key (multiple zone remote) 3 times on the remote.
The light blinks 3 times means match is successful.

Delete:
Switch off the power of the receiver, then switch on power.
Immediately short press on/off key (single zone remote) or zone key (multiple zone remote) 5 times on the remote.
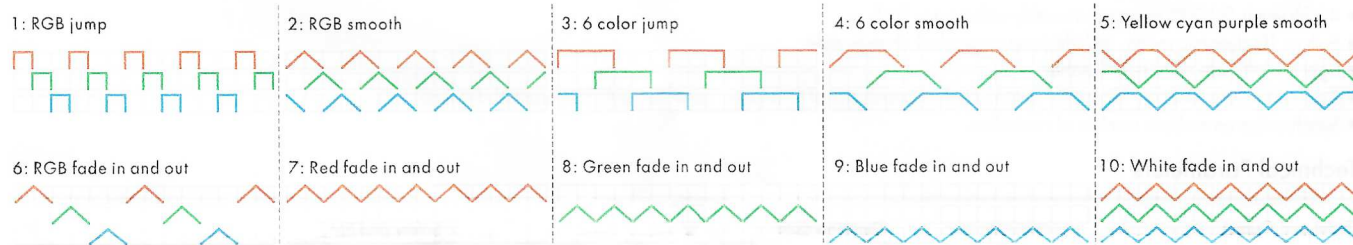The light blinks 5 times means all matched remotes were deleted.

Another way to match:
The receiver is power on for five consecutive times, the LED strip light start blinking slowly for 10s, Immediately short press on/off key (single zone remote) or zone key (multiple zone remote) on the remote.
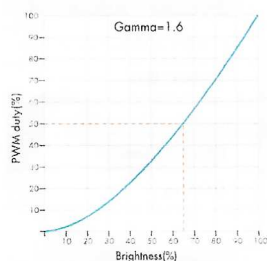The light blinks 3 times means match is successful.

Light on/off fade time

Long press match key 5s, then short press match key 3 times, the light on/off time will be set to 3s, the indicator light blink 3 times.
Long press match key 10s, restore factory default parameter, the light on/off time also restore to 0.5s.

RGB Dynamic mode list

| 1: RGB jump | 2: RGB smooth | 3: 6 color jump | 4: 6 color smooth | 5: Yellow cyan purple smooth |

| 6: RGB fade in and out | 7: Red fade in and out | 8: Green fade in and out | 9: Blue fade in and out | 10: White fade in and out |

Dimming curve

Gamma=1.6

PWM duty[%]

Brightness(%)

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.
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.

Installation Precautions

1. The products shall not be stacked, the distance should be ≥ 20cm, so as not to affect lifespan of the products due to poor heat dissipation.
2. The product shall not be installed close to the switching power supply with an interval of ≥ 20cm to avoid radiation interference of the switching power supply.
3. The installation height shall be ≥ 1m from the floor to avoid shortening the remote control distance due to too weak reception signal.
4. The products are not allowed to be close to or covered by metal objects, with an interval of ≥ 20cm to avoid signal attenuation and shorten the remote distance.
5. Avoid installation at the corner of the wall or the corner of the beam, with an interval of ≥ 20cm to avoid signal interference.