diode led®

DMX WALL MOUNT ZONE CONTROLLER

| 12VDC | 24VDC | DMX COMPATIBLE | DRY LOCATION | COLOR-CHANGING |

INSTALLATION GUIDE

SAFETY & WARNINGS

1. Install in accordance with national and local electrical code regulations.
2. This product is intended to be installed and serviced by a qualified, licensed electrician.
3. DO NOT connect directly to high voltage power. Install with a compatible Class 2 constant voltage LED driver (power supply).
4. Only install compatible 12V and 24VDC constant voltage luminaires.
5. This product is rated for indoor installation and is not protected against moisture.
6. Do not modify product beyond instructions or warranty will be void.
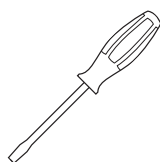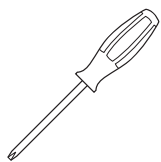
QUICK SPECS / MODELS

DI-DMX-WIFI-WMUS-3Z-WH
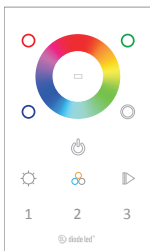
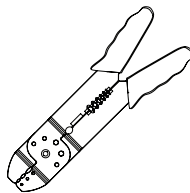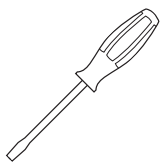|	
Input Voltage	12 - 24VDC Constant Voltage
Output Signal	DMX512
WiFi Transmitting Distance	40 ft.

TOOLS FOR INSTALL

Phillips-head screwdriver

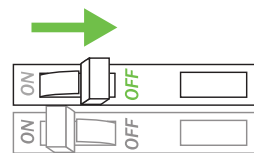Flat-head screwdriver

Mini flat-head screwdriver

Wire stripper

INSTALLATION
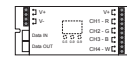
① TURN POWER OFF AT CIRCUIT BREAKER

⚡ **SHOCK HAZARD! May result in serious injury or death.** Turn power OFF at circuit breaker prior to installation.

② DETERMINE LOCATION TO INSTALL COMPONENTS

See **SYSTEM DIAGRAM** for more information. DMX luminaires can be connected directly to controller. DMX Decoders are only utilized to control Non-DMX type luminaires.
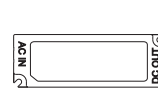
LED Driver   Controller   DMX Decoder   Luminaire

③ CONNECT COMPONENTS

Only use copper wiring. Reference **WIRING CONNECTIONS** and **SYSTEM DIAGRAM** further in this guide for visuals.

④ TURN POWER ON AT CIRCUIT BREAKER

If system remains unresponsive or is working improperly, turn OFF main power at breaker and verify all connections.

INSTALLATION CONT.

Power Indicator
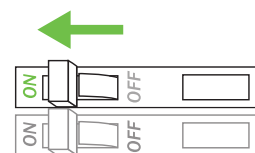Red indicates unit is OFF.
Blue indicates unit is ON.
Blue flash indicates DATA is transmitting.

Color Wheel
Adjust RGB color mixing.

Power
Short press to turn ALL zones and channels ON/OFF.

RGB Brightness
Long press to adjust brightness of RGB colors simultaneously (7 steps of brightness). Adjust W (4CH) channel seperately to adjust tone.

1   2   3

diode led

R, G, B, W Channel Adjustment
Short press to turn channel ON/OFF.
Long press to adjust brightness.

RGB 'White' Presets
Short press for 3 types of 'White' RGB presets: warm white, neutral white, cool white. Useful for applications that don't utilize W (CH4) for RGBW applications.

Dynamic Mode
Short press changes mode/pauses mode. Long press adjusts speed of dynamic mode. See 'Dynamic Mode Chart' for mode descriptions.
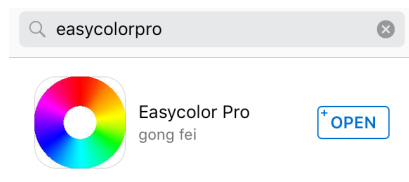
Zone Control
Short press to conrtol zones 1, 2, or 3.
Long press to turn individual zone ON/OFF.
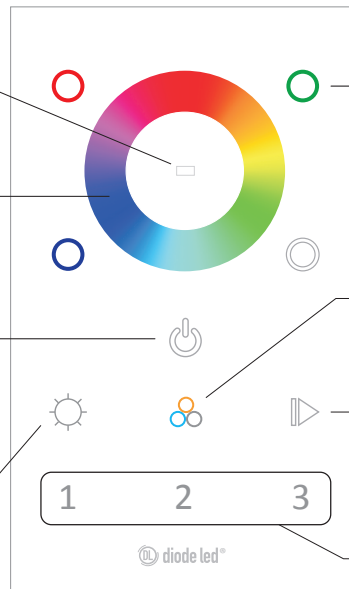
MOBILE DEVICE OPERATION

The DMX controller can also be controlled remotely via WiFi with a compatible IOS/Android mobile device. Go to iOS or Google Play App Store. Search for "EasyColor Pro" and download application.

🔍 easycolorpro   ⊗

[icon] Easycolor Pro
gong fei   ⁺ OPEN

PAIRING CONTROLLER TO MOBILE DEVICE

1. Go to WiFi settings of mobile device.
2. Connect to WiFi Network 'EasyLighting'.
3. Type in Password '0123456789'.
4. Open EasyColor Pro Application.

For further operating instructions see 'DMX Wall Mount Mobile Application' Operation Guide at www.DiodeLED.com.

WIRING CONNECTIONS

DO NOT connect directly to 120VAC.
See 'System Diagram' for a general system design.

○ Reset

| V− | V+ | D− | D+ | GND |

From 12-24V Driver

To DMX Decoder or DMX Fixture
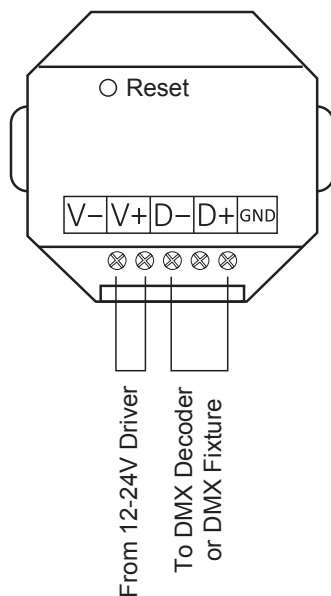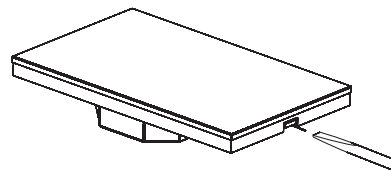
MOUNTING

Pop off faceplate with a flathead screwdriver.

Mount to a standard switchbox.

SETTING DMX ADDRESS

Each DMX decoder or DMX luminaire needs to be addressed correctly so the controller can distinguish between each decoder. To pair a DMX decoder or luminaire to a specific zone of the controller (1-3), set each decoder/luminaire to one of the following addresses:

- Zone 1: Set to address '001' (will be fixed to address 001 – 004)
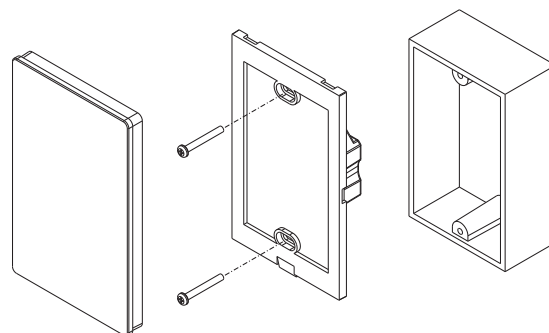- Zone 2: Set to address '005' (will be fixed to address 005 – 008)
- Zone 3: Set to address '009' (will be fixed to address 009 – 012)

Each zone of the controller is fixed with 4 DMX addresses to control the 4 channels:

CH1 – Red, CH2 – Green, CH3 – Blue, CH4 – White or X.

Once DMX address is set on luminaire or DMX decoder, ensure to Press Zone 1, 2, or 3 on the controller to control desired zone.

**Example of DMX Addressing Display**

Digital Display

PINOUT CONNECTION GUIDE

The following diagrams/tables indicate the appropriate connections for patching your own CAT5/RJ45, and XLR-3 splice cables. These diagrams are for general reference and may slightly differ between different cable manufacturers.
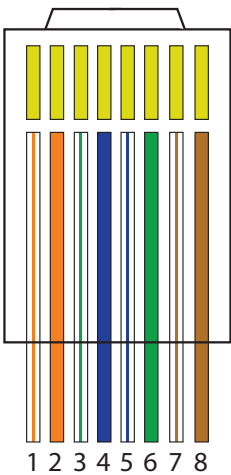
Pin No.	Wire Color	Function
1	White/Orange	Data +
2	Orange	Data -
3	White/Green	None
4	Blue	None
5	White/Blue	None
6	Green	None
7	White/Brown	May be used as 2nd ground
8	Brown	Ground

Pin No.	Function
1	Ground
2	Data -
3	Data +

Female   Male
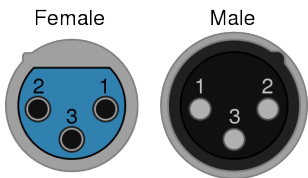
DYNAMIC MODE CHART

The Dynamic Mode tool plays factory-programmed scenes. Choose up to 10 different scenes. Short press switches/pauses the mode. Long press adjusts speed of the dynamic mode.

Mode	Description
1	Fade 1 - B M R O Y G C
2	Fade 2 - B G O W C M B
3	Fade 3 - R W C G C W B W
4	Skip 1 - R Y W C G W B M W Y
5	RGB Fade In/Out
6	RGB Fade In
7	RGB Fade Out
8	RGB Skip
9	Fade 4 - B M O G C
10	Fade 5 - W Y W M C W G W M C
11	All Channels Off

SYSTEM DIAGRAM

The following diagram is provided as an example system design. CAT5 (RJ45 connections) data cables are the most cost-effective solution for transmitting DMX-512 signals. XLR-3 cables may also be installed but require an additional adapter for connecting to DMX decoders. Always review each component installation guide for detailed and up-to-date wiring instructions. Install in accordance with NEC and local regulations.

Class 2 12-24VDC Driver**
Installed in Junction Box‡

DMX Controller
Installed in Wall Box‡

AC Power 50/60Hz

L
N
G*
Input

Output
V+
V-

V+
12-12VDC Input
V+

DMX Output

RJ45 Splice Cable Wiring Connections

Brown → Ground
White/Orange → Data +
Orange → Data -

White/Brown wire may be used as an additional ground.

CAT5 / Ethernet Cable (RJ45 Connections)

RJ45 Coupler

Install applicable wire gauge / type

V- V+
V+
V-
Data IN
Data OUT

0-5 0-9 0-9

V+
CH1 - R
CH2 - G
CH3 - B
CH4 - W

V+ → V+
CH1 → R

CH2 → G
CH3 → B

RGB Tape Light / Fixture‡‡

DMX Decoder

V- V+
V+
V-
Data IN
Data OUT

0-5 0-9 0-9

V+
CH1 - R
CH2 - G
CH3 - B
CH4 - W

V+ → V+
CH1 → R

CH2 → G
CH3 → B
CH4 → W

RGBW Tape Light / Fixture‡‡

DMX Decoder

CH4 - W connection only utilized for RGBW / RGB(X) installation.

RJ45 / XLR-3 Adapter Connector

AC Power 50/60Hz

Wall Washer / DMX-512 Fixture‡‡

* Driver may not require a fault ground connection. Refer to driver specifications for additional information.

** Install a compatible Class 2 constant voltage driver. It is recommended to load the driver no more than 80% its labeled rating for maximum longevity.

‡ Refer to driver specifications for a compatible junction box.

‡‡ See luminaire specifications for maximum series run limits.

TROUBLESHOOTING

For thorough troubleshooting of LED strip light and luminaires, see LED luminaire installation guides.

LED luminaires not responding to touch

1. Ensure the blue indicator light is on by pressing 'Power.' A red indicator signifies the device is off. The blue indicator light will blink rapidly when pressing/holding any key on the touch pad.
2. Ensure the appropriate zone number was pressed prior to controlling the DMX decoder/luminaire. For example, if you know the luminaire is addressed to zone 1, press '1' prior to controlling.
3. Ensure the individual zone has not been turned off. Long pressing zones 1-3 will turn the specific zone ON/OFF. Additionally, long pressing R, G, B, W will increase/decrease individual brightness and short pressing will turn R, G, B, W ON/OFF.
4. Ensure the DMX decoder/luminaire is addressed properly. For example, address '001' will respond to zone 1 of the controller. See 'Setting the DMX Address' for additional addressing information.

LED luminaire responding incorrectly

Ensure all wiring connections are correct. Reversing the Data + and Data - will cause lights to flicker and not respond to controller.

1. Check power connections of all components (drivers, DMX decoders/luminaires, DMX controller).
2. Check DMX Data connections - See **Pinout Connection Guide** and **System Diagram** for RJ45 hard-wiring connections.
3. Check DMX decoder connections – **See System Diagram** for CH 1-4 connections.

ADDITIONAL RESOURCES

Visit the online product page at www.DiodeLED.com for additional product specifications & warranty information.

- **DMX WALL MOUNT ZONE CONTROLLER SPECIFICATION SHEET**
  For full specifications.

- **VOLTAGE DROP CHARTS**
  Use to specify appropriate wire gauge for installation. Available at the 'Resources' page at www.DiodeLED.com.