# **Universal Dimming Driver Wiring Guide**

## MOUNTING AND INSTALLATION INSTRUCTIONS

WARNING: The drivers specified here must be installed by a qualified electrician in accordance with the National Electrical Code (NEC) and local building codes. Failure to do so voids the warranty and may result in serious injury or permanent damage to the unit.

For connection, use 12-22 AWG copper wires insulated for a minimum of 90°C rated for 600 V. Use wire connectors suitable for the number and size conductors being connected and applied in accordance with the manufacturer's instructions. There must be at least 20 amp supply side branch current. A disconnect device shall be located in the field wiring.

# IMPORTANT SAFETY INSTRUCTIONS

When using electrical products, basic precautions should be practiced including the following:

- 1. READ AND FOLLOW ALL SAFETY INSTRUCTIONS.
- 2. Read and follow all instructions that are on the product or provided with the product.
- 3. Reference the National Code, ANSI/NFPA 70, specifically for the installation of wiring and clearances from power and lighting conductors.
- 4. Installation work and electrical wiring must be done by qualified person(s) in accordance with all applicable codes and standards, including fire-rated construction.
- 5. WARNING: Risk of fire. Installation involves special wiring methods to run wiring through a building structure. Consult a qualified electrician.
- 6. WARNING: Risk of electric shock. Mount the unit at a greater height than 1 foot from the ground surface.

### Troubleshooting

Wiring should be done by qualified people only. "Qualified" means, among other things, knowing what safety precautions to take to avoid injury. If you experience issues, double check all wiring and make sure your connections are secure. This goes for both the power supply and the load. If possible, substitute a known good power supply or LED load. This will help identify any defective parts in the unlikely event that you received one. Call Environmental Lights if you are still having trouble and need assistance.

SAVE THESE INSTRUCTIONS-This manual contains important safety and operating instructions for power units.

### Installation with Phase Dimmer



#### Wiring:

- 1. Turn off power at the building's breaker for safety.
- 2. Remove the appropriate knockouts on each end of the driver.
- 3. Remove the top plate of the metal enclosure.
- 4. Wire the primary side to the output of the dimmer and nearest earth ground connection. Black is line, white is neutral and green is earth ground.
- 5. Cap the purple and grey wires with wire nuts. Leaving them exposed could result in damage to the power supply.
- 6. Wire the secondary side to the LED lights. Red is positive and black is ground. Always make sure the power supply is the correct voltage for the LEDs you are using before turning on the power. Applying the incorrect voltage can permanently damage the LEDs. Primary side wiring should always be done inside the junction box. It is recommended that the same be done for the low voltage side as well.
- 7. Secure the cover(s) back onto the driver.
- 8. Once all connections are secure, turn the building circuit breaker back on and test.

# Installation with 0-10V Dimmer



#### Wiring:

- 1. Turn off power at the building's breaker for safety.
- 2. Remove the appropriate knockouts on each end of the driver.
- 3. Remove the top plate of the metal enclosure.
- 4. Wire the primary side to 120-277 VAC and nearest earth ground connection. Black is line, white is neutral and green is earth ground..
- 5. Connect the 0-10V wires (purple and grey) to the dimmer.
- 6. Wire the secondary side to the LED lights. Red is positive and black is ground. Always make sure the power supply is the correct voltage for the LEDs you are using before turning on the power. Applying the incorrect voltage can permanently damage the LEDs. Primary side wiring should always be done inside the junction box. It is recommended that the same be done for the low voltage side as well.
- 7. Secure the cover(s) back onto the driver.
- 8. Once all connections are secure, turn the building circuit breaker back on and test.