

INSTALLATION INSTRUCTIONS (1/1)

REQUIRED COMPONENTS

- Lighting Strips
Mounted on specific trim

- Driver
(1) Job-specific requirements

- 120° End Feed
(1) power connector per light strip

TERMS & CONDITIONS

To comply with Phantom Lighting System warranty policies and ETL Standards, all lighting strips must be used in conjunction with Phantom Lighting drivers. All Phantom Lighting drivers are ETL Approved and are strongly recommended for proper operation of lighting strips. Phantom Drivers should not be located in areas with no ventilation or subject to high ambient temperatures. If ambient temperature exceeds 115°F (46°C) around the driver, the circuit breakers may nuisance-trip due to excessive heat and void any warranty.

CAUTION: FAILURE TO CORRECTLY SIZE THE PRIMARY AND SECONDARY CONDUCTORS AND/OR THE OVERLOAD PROTECTION MAY RESULT IN BODILY INJURY OR SERIOUS PROPERTY DAMAGE

If you have any questions or concerns regarding your application, please contact the Phantom factory or a licensed electrician, or consult the U.S. National Electric Code.

READ AND UNDERSTAND THESE INSTRUCTIONS BEFORE INSTALLATION – SAVE THESE INSTRUCTIONS!

These fixtures are intended for installation in accordance with the National Electrical Code and local regulations. To ensure full compliance with local codes and regulations, check with your local electrical inspector before installation. To prevent electrical shock, turn off electricity at fuse box before proceeding. Remove all components from the shipping carton. The instructions are in a step by step sequence for correct and easy assembly. Save the shipping carton and packing materials until job is complete.

**IMPORTANT: THERE IS A LIMIT ON HOW MANY ULTRA STRIPS CAN BE CONNECTED IN A SERIES!
The maximum run length for Ultra strips is 45' whether it is a continuous connection or jumped together.**

1. CALCULATE DRIVER REQUIREMENTS

Ultra lighting strips *without a lens* use standard LED tape producing 4.2 watts per foot. Ex: a cabinet containing 10' of Ultra Lighting Strips, 10' x 4.2 watts/ft = 42 total watts. Always allow a 20% safety factor when sizing to prevent nuisance tripping. Ex: 42 watts x 1.2 = 72 watts, requiring a 96-watt driver.

2. DETERMINE LOCATION OF DRIVER

The drivers should be out of sight, but still accessible for servicing. The installer should use drop calculations when determining distance from the cove. Typically, the distance should not exceed 20' from location when using 16-gauge wire. If farther, use a larger gauge.
Note: the location of the end feed is important when deciding where to locate the driver. For cove mounted systems, it is either Left End Feed or Right End Feed.

3. DETERMINE TRIM AND MOUNTING METHOD

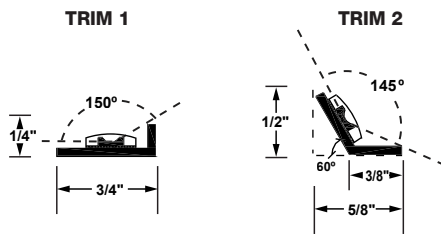
Different trim profiles are offered with this product. The profile of the trim will determine the space required for mounting. The illustrations depicted below are provided to assist in determining the exact location and verifying adequate space to install each of the trims.

Note: also consider the strip location in the header section of the cabinet/display case before choosing your trim and mounting method.

4. INSTALL ULTRA LIGHTING STRIP

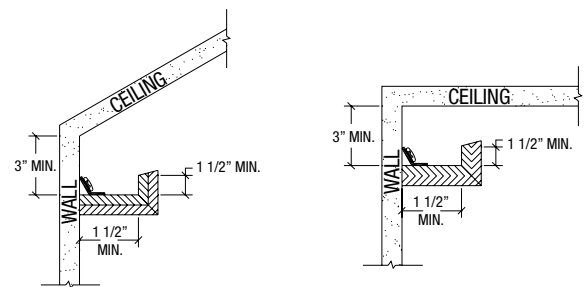
Use the diagram below to determine the correct location and position of your selected trim. If trim pieces are broken up to make a longer run, see previous step. Then use the pre-cut holes to mount the trim with the screws. First, attach all mounting trims, then carefully apply tape, paying close attention to the power connectors. Please note maximum run limits.
Hint: lights may be shimmed up/down to adjust spread of light from recessed cove.

CALCULATIONS



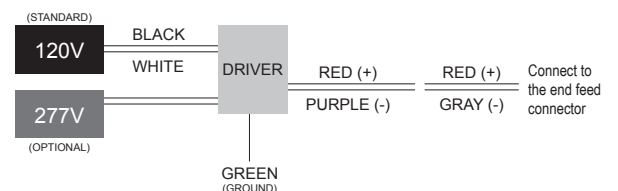
SPACE REQUIREMENTS

To achieve continuous illumination, CM Series strips require a 3 inch minimum clearance from the strip to any adjacent surface. Increase the clearance to 5 inches when working with delicate materials. Use shims to raise lights as needed to adjust the beam pattern for a smooth, continuous look.



5. CONNECT THE DRIVER

Using a dimmer is optional, but **not required** for this product. Low voltage dimmers are not included with this product; please visit our website for a list of compatible magnetic low-voltage dimmers or call technical support.



TECHNICAL SUPPORT:
800.863.1184