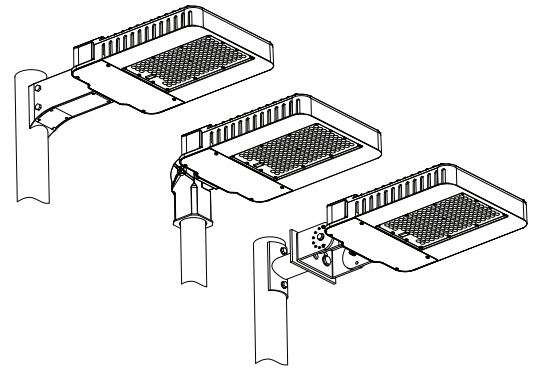




MaxLite® LED Medium Area Light

General Safety Information

- To reduce the risk of death, personal injury or property damage from fire, electric shock, falling parts, cuts/abrasions, and other hazards read all warnings and instructions included with and on the fixture box and all fixture labels.
- Before installing, servicing, or performing routine maintenance upon this equipment, follow these general precautions.
- Commercial installation, service and maintenance of luminaires should be performed by a qualified licensed electrician.
- **DO NOT INSTALL DAMAGED PRODUCT!**
- This fixture is intended to be connected to a properly installed and grounded UL listed junction box.



Picture is for illustration purposes only.
Your model may vary.

WARNING:

RISK OF ELECTRICAL SHOCK

- Turn off electrical power at fuse or circuit breaker box before wiring fixture to the power supply.
- Turn off the power when you perform any maintenance.
- Verify that supply voltage is correct by comparing it with the luminaire label information.
- Make all electrical and grounded connections in accordance with the National Electrical Code and any applicable local code requirements.
- All wiring connections should be capped with UL approved wire connectors.

CAUTION:

RISK OF INJURY

- Unit will fall if not installed properly. Follow installation instructions.
- Wear gloves and safety glasses at all times when removing luminaire from carton, installing, servicing or performing maintenance.
- Avoid direct eye exposure to the light source while it is on.
- Account for small parts and destroy packing material, as these may be hazardous to children.

CAUTION:

RISK OF FIRE

- Keep combustible and other materials that can burn away from luminaire and lamp/lens.
- **MIN 75°C SUPPLY CONDUCTORS.**

Models:

Example: AR60, AR100, AR140, AR210 and AR280 Series

Operating characteristics:

Operating temperature: -40°C to 55°C

Input voltage range: 100-277, 347-480V, 50/60 HZ

MaxLite® LED Medium Area Light

Installation & Operation

Straight Arm Pole Mounting:

This fixture can be configured to pole and an adapter plate has been included to mount to the pole. Hole pattern on the pole shall be in accordance with **FIG.1**. If there is no hole on the pole, drill holes according to the pattern in **FIG. 1**.

For round poles add a round pole adaptor which are available for 4" (AR-MAL-4RPA) or 5" (AR-MAL-5RPA) poles.

- Tighten the nut plate and adapter on the pole (see **FIG. 2**).
- Insert the fixture into the adapter (see **FIG. 3**).
- Tighten the four M8 screws on the straight arm and secure it to the adapter (see **FIG.4**).
- Connect the power lead properly, make wirings inside the straight arm, and tighten the arm door with screws (see **FIG. 5**).
- Inspect installation to ensure fixture is secure.

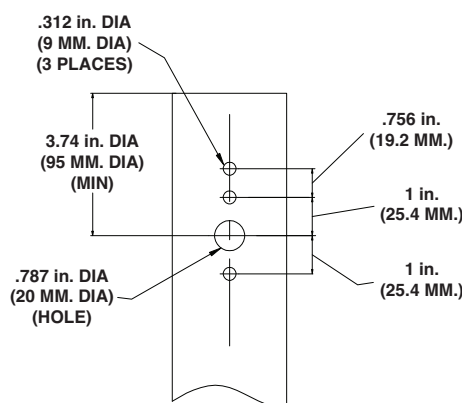


FIG. 1

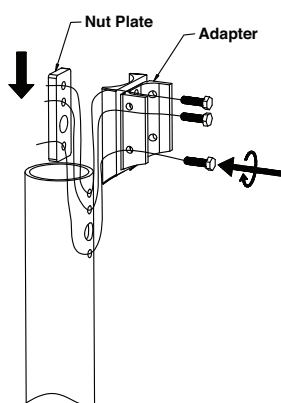


FIG. 2

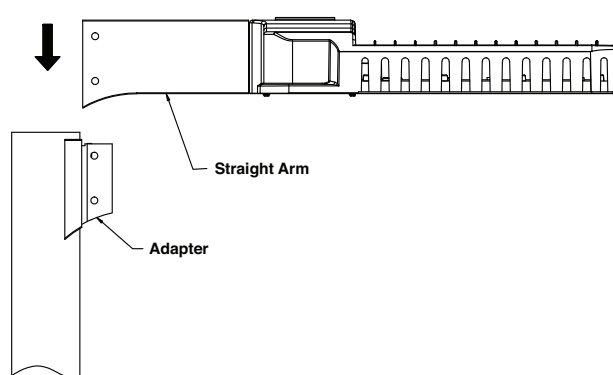


FIG. 3

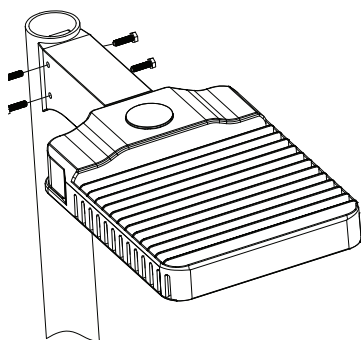


FIG. 4

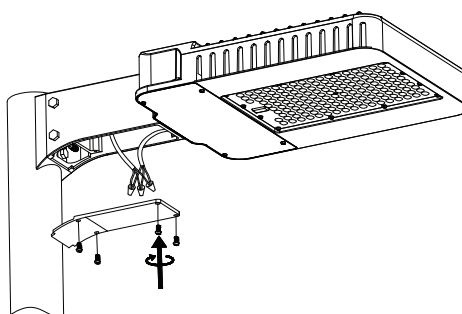
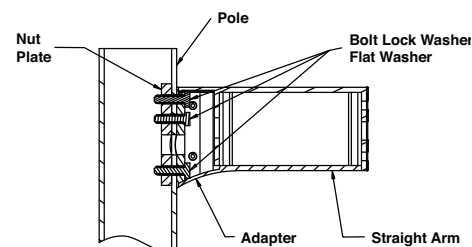


FIG. 5



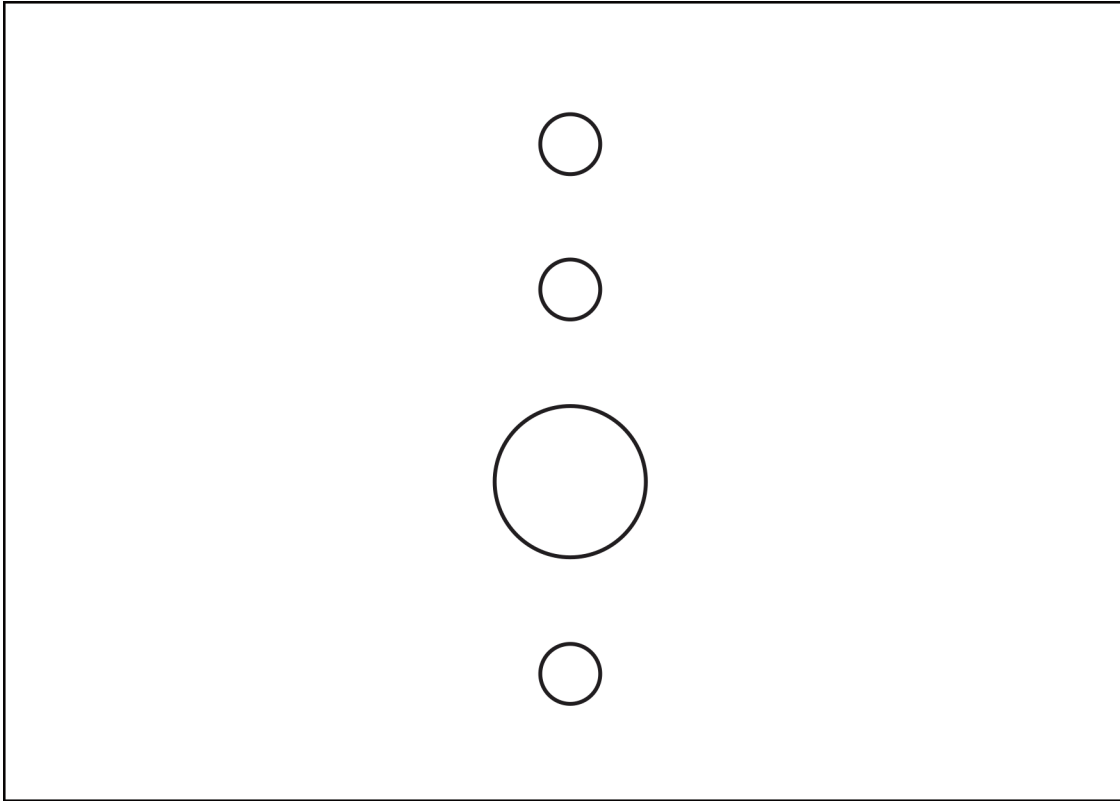
Sectional drawing of the pole and straight arm mounting

FIG. 6

MaxLite® LED Medium Area Light



Straight Arm Pole Drill Pattern

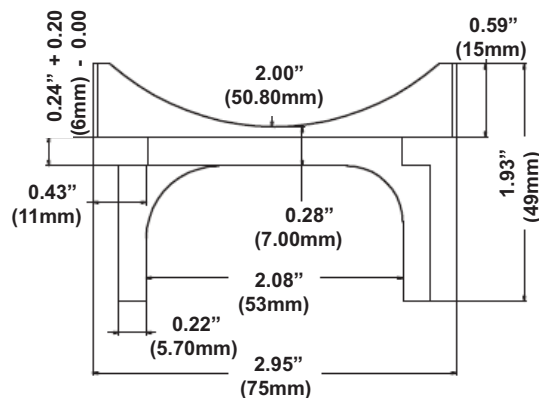
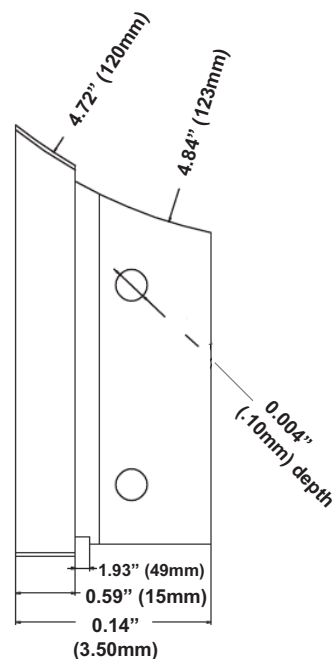
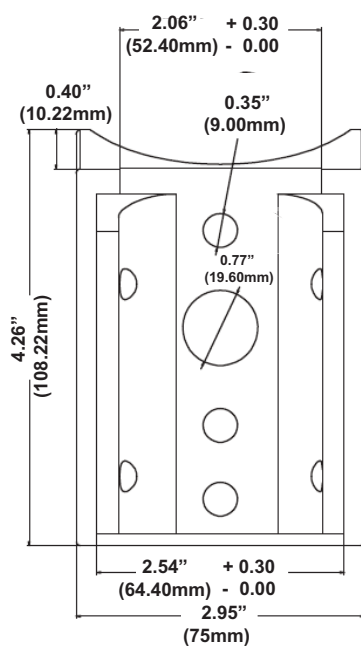


MaxLite® LED Medium Area Light

Installation & Operation

Straight Arm Pole Mounting (Continued):

4" Round Pole Adaptor

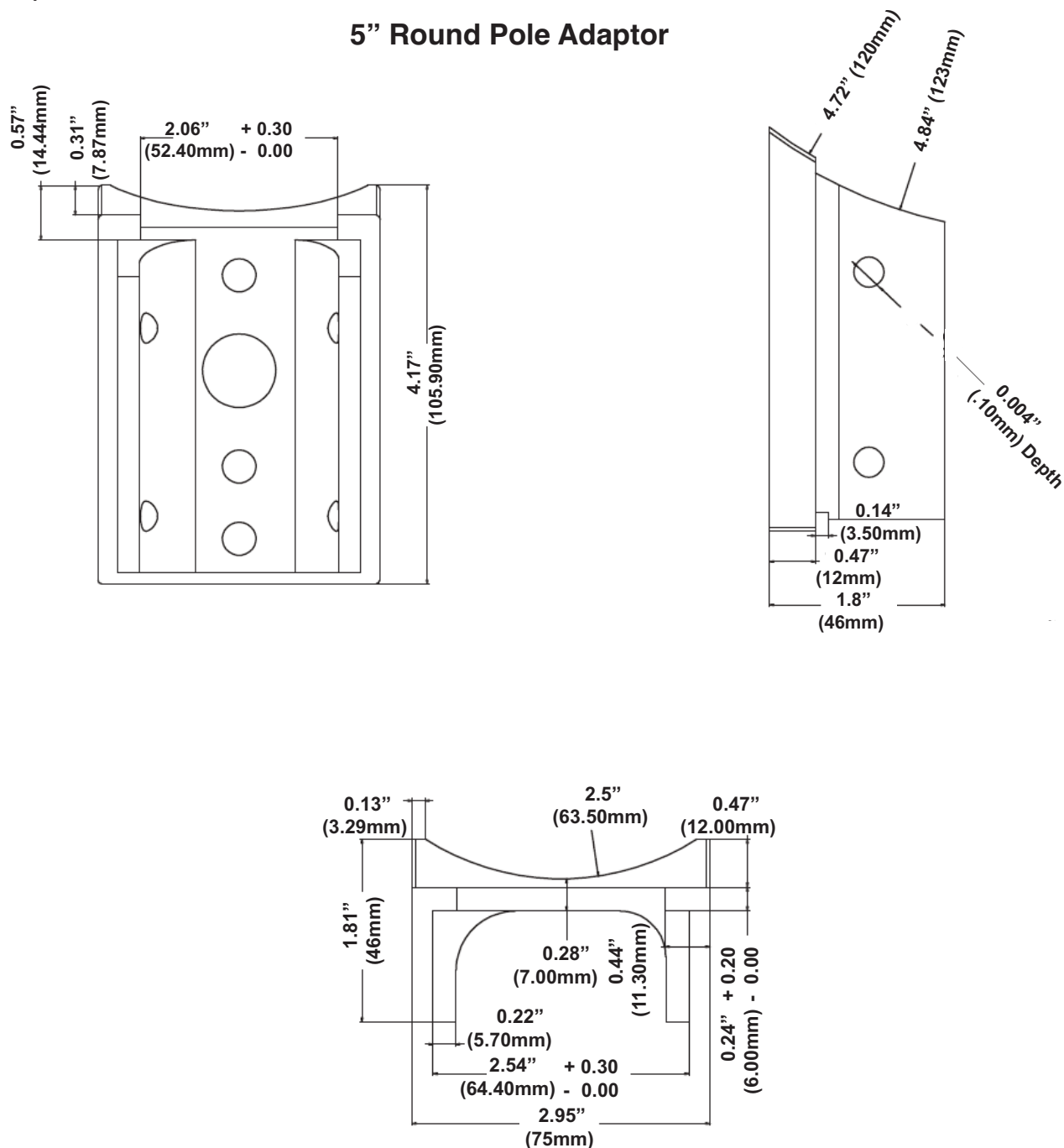


MaxLite® LED Medium Area Light

Installation & Operation

Straight Arm Pole Mounting (Continued):

5" Round Pole Adaptor



MaxLite® LED Medium Area Light

Installation & Operation (Continued)

Slipfitter Mounting:

This fixture can be configured to provide 0 to 60° both upward and downward aiming in 15° increments (see **FIG.7**).

- Connect the power lead properly, Make wiring connection (see **WIRING**) and lay the wires in the pole, insert the slipfitter to the pole (see **FIG.8**).
- Tighten the four M8 bolts on the slipfitter and secure it to the pole (see **FIG.9**).
- To aim the fixture, loosen and adjust the M12 knuckle bolt to right angle, adjust the aim 0 to 60° both upward and downward (see **FIG.10**).
- Inspect installation to ensure fixture is secure.

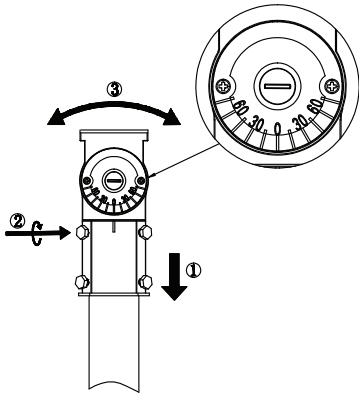


FIG. 7

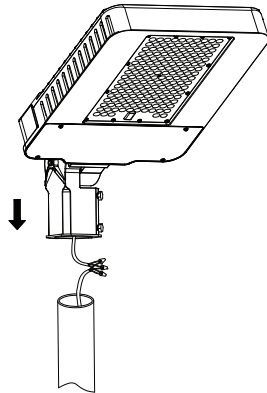


FIG. 8

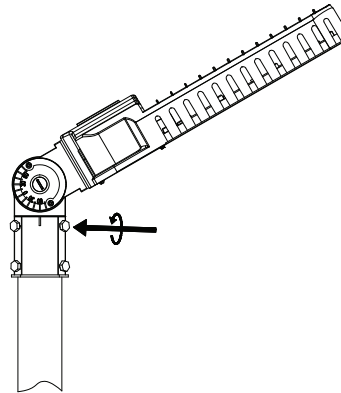


FIG. 9

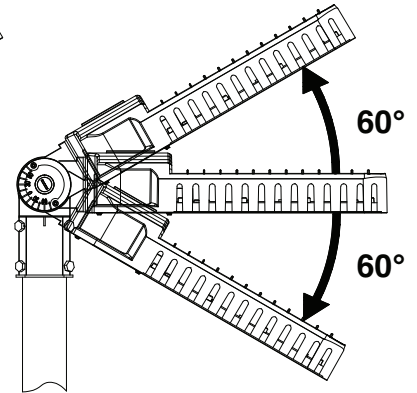


FIG. 10

Trunnion Mounting:

This fixture can be configured to mount to the tenon pole or tenon adapter.

- Tighten the fixture to the tenon pole or tenon adapter by two M12 bolts (see **FIG.11**).
- Loosen and adjust the adjusting bolts to the right angle, and the maximum is 60° (see **FIG.12**).
- Make wiring connection (see **WIRING**),
- Inspect installation to ensure fixture is secure.

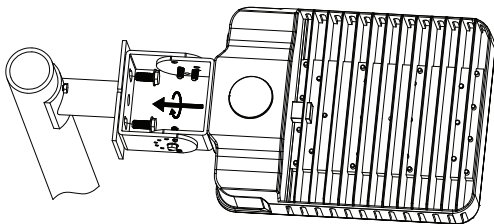


FIG. 11

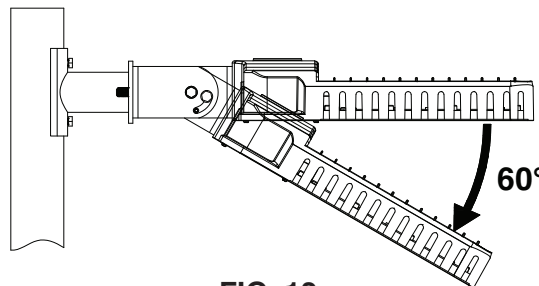


FIG. 12



MaxLite® LED Medium Area Light

Maintenance

The unit is designed for years with minimum care. For optimum performance, periodically clean lens with a mild, non-abrasive glass cleaner and soft cloth. Do NOT use solvents or cleaners containing abrasive agents. When cleaning the fixture, make sure you have the power turned off and do not spray liquid cleaner directly onto the LED, or wiring.

Wiring:

CAUTION: Turn off electrical power at fuse or circuit breaker box before wiring fixture to the power supply. All units must be individually connected to AC supply.

Note:

1. Verify that supply voltage is correct by comparing it to claimed voltage on the product label.
2. All Wiring inside the fixture use WAGO connector of 5 PIN, 3 PIN and 2 PIN (See **FIG.13**). If need to remove or replace any component in the driver compartment, please keep the WAGO connector for future use.

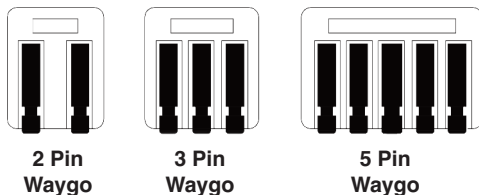


FIG. 13

3. The **FIG. 14** to **FIG.16** demonstrates the interior wiring of three different configurations in the driver compartment (When need to remove or replace any component in the driver compartment, please refer to the below wiring **FIG. 14** to **FIG. 17** and base on the actual condition, resume using the fixture by wire connecting).
4. Disconnect the AC power supply to prevent electric shock when making wiring or installation, removing or replacing any component in the fixture. Make sure to use WAGO connector properly to ensure proper and secure wiring, make sure of correct wiring before restoring power supply to light up the fixture.

MaxLite® LED Medium Area Light

Fixture wiring diagram:

3. FIG.14 is for standard wiring which includes a 10kV Surge Suppressor.

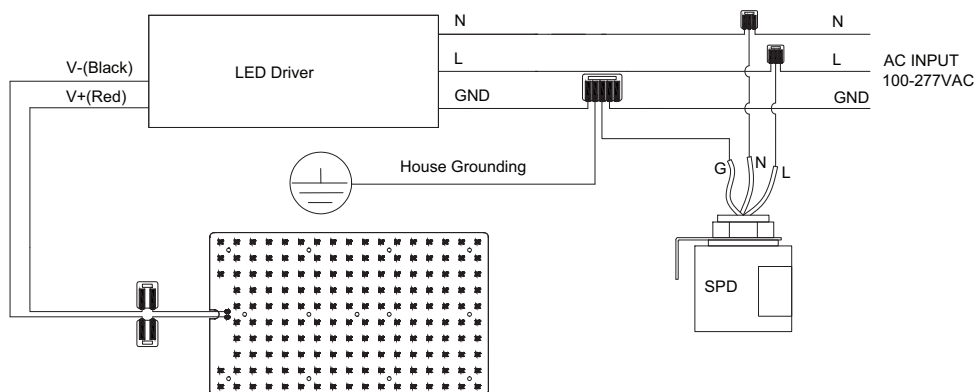


FIG.14

4. FIG.15 is for wiring when a photocell sensor is used.

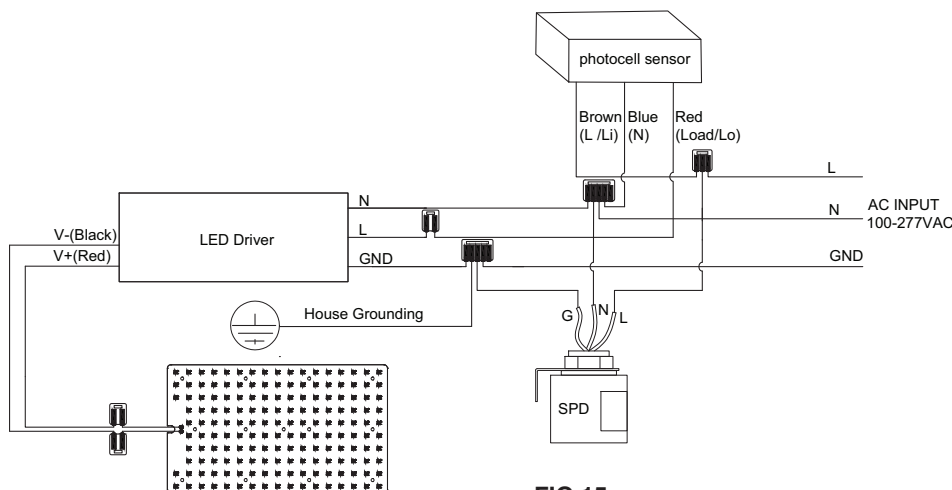


FIG.15

5. FIG.16 is for wirings when dimmable driver, surge protector, FSP-211 sensor are used.

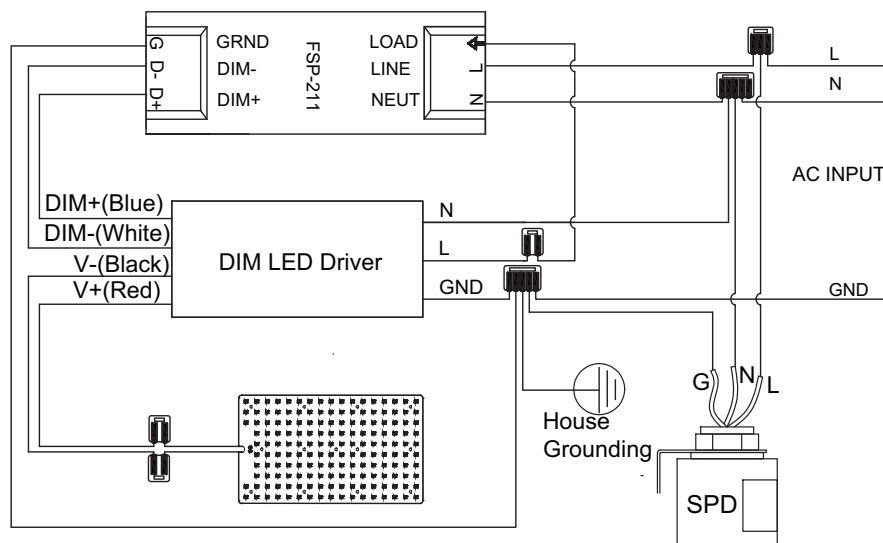


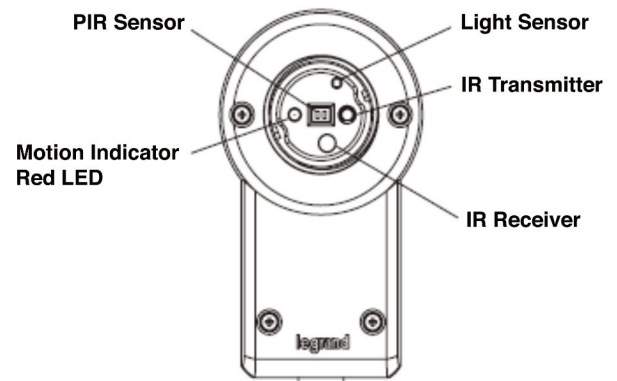
FIG.16

MaxLite® LED Medium Area Light

PIR Occupancy Sensor: FSP-211

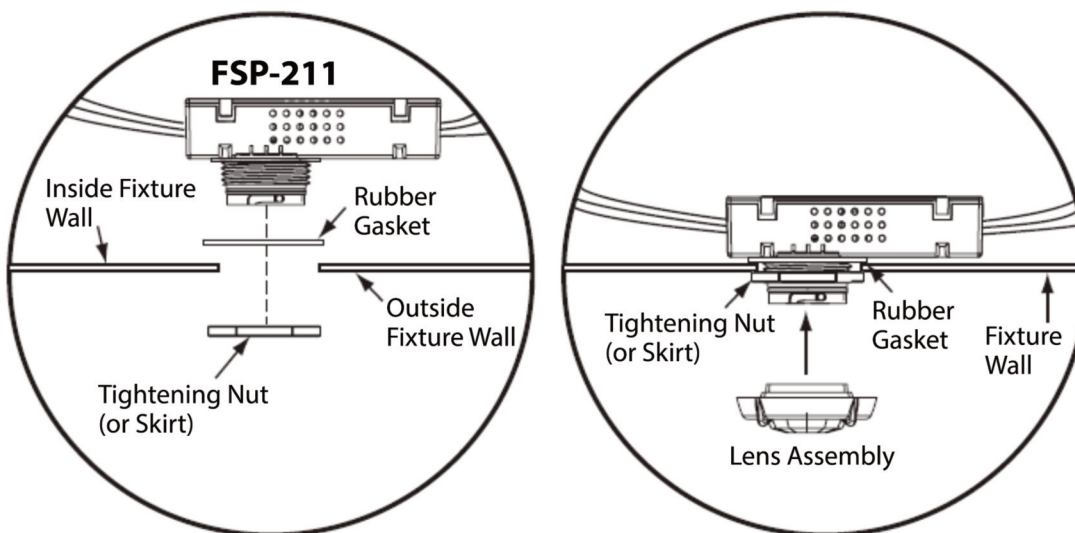
The FSP-211 is a motion sensor that dims lighting from high to low based on movement. This slim, low-profile sensor is designed for installation inside the bottom of a light fixture body. The PIR lens module connects to the FSP-211 through a 1.30" diameter hole in the bottom of the fixture.

The sensors use passive infrared (PIR) sensing technology that reacts to changes in infrared energy (moving body heat) within the coverage area. Once the sensor stops detecting movement and the time delay elapses lights will go from high to low mode and eventually to an OFF position if it is desired. Sensors must directly "see" motion of a person or moving object to detect them, so careful consideration must be given to sensor luminaire placement and lens selection. Avoid placing the sensor where obstructions may block the sensor's line of sight.



PIR Occupancy Sensor Installation Instruction

1. Determine an appropriate mounting location inside the light fixture minimizing the electric light contribution to the sensor's photocell. Allow a minimum distance of 0.2" (5.1mm) from the wiring end of the sensor to the wall of the fixture.
2. Drill a hole 1.30" (33.0mm) in diameter through the sheet metal in the bottom of the fixture.
3. Add the rubber gasket to the threaded collar, and install the sensor face down, parallel to the mounting surface. Ensure the rubber gasket touches the inside surface of the fixture. Install the plastic nut securely against the fixture to a torque of 25-30 in-lbs to ensure IP rating is maintained.
4. Align the locking features between the sensor and lens module and push the lens module forward until the o-ring seals firmly. Turn the lens module clockwise to ensure it locks in place.
5. Connect wires as shown in wiring diagram.
6. Restore power from the circuit breaker.

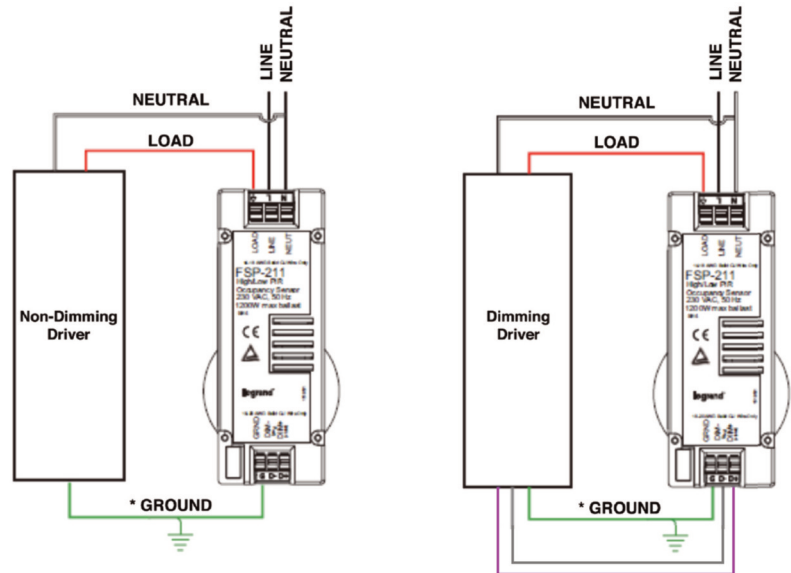


NOTE: The Outside Fixture Wall thickness should be no greater than 0.125" (3.18mm) for optimal sensor mounting and security.

MaxLite® LED Medium Area Light

PIR Occupancy Sensor: Wiring

NOTE: The FSP-211 must be grounded to ensure signal integrity, not for safety ground.



OUTDOORS - USE AT THE EXPOSED SENSOR COLLAR PART ONLY WHEN INSTALLED AT THE SPECIFIC LOCATION PER INSTALLATION INSTRUCTIONS WITH A LISTED OUTDOOR ENCLOSURE.

Sequence of Operation

Dimming: When motion is detected within the sensor's coverage area, the sensor sends a signal to ramp the load up to the selectable High Mode level unless the ambient light level is higher than the selected setpoint. When no motion is detected for the duration of the time delay setting (factory preset at 5 minutes), the lights will go to the selectable Low Mode level based on the signal from the sensor. If desired, a cut off time delay (factory preset at 1 hour) will trigger to eventually turn the lights OFF.

Non-dimming: When motion is detected within the sensor's coverage area, the sensor sends a signal to turn the load ON unless the ambient light level is higher than the selected setpoint. When no motion is detected for the duration of the time delay setting (factory preset at 5 minutes), the lights will go OFF based on the signal from the sensor.

Dusk to dawn control: When photocell on/off is enabled, and the ambient light falls below the photocell setpoint, the sensor ramps the load up to the selectable High Mode level. If no motion is detected for the duration of the time delay setting (factory preset at 5 minutes), the lights will go to the selectable Low Mode level. If the cut off time delay is disabled, the load will remain on, at High or Low level, based on motion detection, until the ambient light increases above the photocell setpoint.



MaxLite® LED Medium Area Light

SPECIFICATIONS	FSP-211	
VOLTAGE	120V/277V, 50/60Hz	UL/UL LISTED
	230-240V, 50/60Hz	SINGLE PHASE: TUV, CE
MAX LOAD RATINGS	@120V	800W
	@277V	1200W
	@230-240V	300W
WIRING TERMINALS	LINE VOLTAGE	14AWG-18AWG
	LOW VOLTAGE	18AWG-20AWG
OPERATING TEMPERATURE	-40°F (-40°C) to 167°F (75°C)	
DIMENSIONS	COLLAR	1.30" DIA
	COLLAR HEIGHT	0.64"
	BODY	1.38" x 3.8" x 0.9"
WEIGHT	2.8 OZ	
COVERAGE	FSP-L2 LENS @ 8FT	up to 44' DIA
	FSP-L3 LENS @20FT	up to 40' DIA
	FSP-L4 LENS @40FT	up to 40' DIA
	FSP-L7 LENS @40FT	up to 100' DIA
ADJUSTMENTS AND FEATURES	HIGH MODE	0V-10V
	LOW MODE	0V-9.8V, OFF
	TIME DELAY	30 SEC, 1 MIN-30MIN
	CUT OFF	DISABLE, 1MIN-59MIN, 1HR-5HR
	PHOTOCELL SETPOINT	1-250FC
FACTORY DEFAULTS	HIGH MODE	10V
	LOW MODE	1V
	TIME DELAY	5 MIN
	CUT OFF	1 HR
	SENSITIVITY	MAX

Optional Remote Control Configuration Tool

The configuration process establishes the appropriate parameters for the FSP-211 operation. This is done through the FSIR-100 configuration tool. If no configuration steps are taken, the sensor will use its default parameter values.

The FSIR-100 Wireless IR Configuration Tool is a handheld tool for changing defaults and testing of FSP-211. It provides wireless access to the FSP-211 sensors for parameter changes and testing. The FSIR-100 display shows menus and prompts to lead you through each process. The navigation pad provides a simple way to navigate through the customization fields.

Within a certain mounting height of the sensor, the FSIR-100 allows modification of the system without requiring ladders or tools; simply with a touch of a few buttons.

The FSIR-100 IR transceiver allows bi-directional communication between the FSP-211 and the FSIR-100 configuration tool. Simple menu screens let you see the current status of the sensor and make changes. It can change FSP-211 sensor parameters such as high/low mode, sensitivity, time delay, cut off, and more. With the FSIR-100 you can also establish and store FSP-211 parameter profiles.



MaxLite® LED Medium Area Light

Batteries

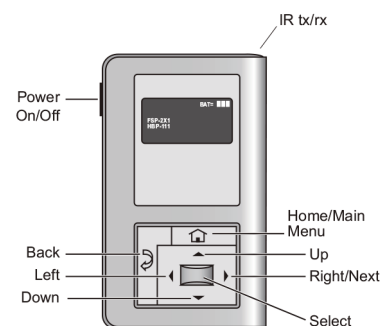
The FSIR-100 operates on three standard 1.5V AAA Alkaline batteries or three rechargeable AAA NiMH batteries. The battery status displays in the upper right corner of the display. Three bars next to BAT= indicates a full battery charge. A warning appears on the display when the battery level falls below a minimum acceptable level. To conserve battery power, the FSIR-100 automatically shuts off 10 minutes after the last key press.

- If communication is not successful, (if possible) move closer to the sensor.
- If still not successful, there may be too much IR interference from other sources. Programming the unit at night when there is no daylight available may be the only way to communicate with the sensor.

Navigation

Navigate from one field to another using (up) or (down) arrow keys. The active field is indicated by flashing (alternates) between yellow text on black background and black text on yellow background.

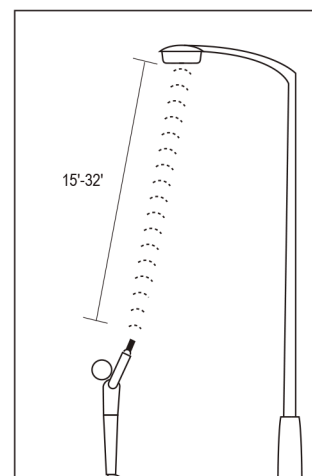
Once active, use the Select button to move to a menu or function within the active field. Value fields are used to adjust parameter settings. They are shown in “less-than/greater-than” symbols: <value>. Once active, change them using (left) and (right) arrow keys. The right key increments and the left key decrements a value. Selections wrap-around if you continue to press the key beyond maximum or minimum values. Moving away from the value field overwrites the original value. The Home button takes you to the main menu. The Back button can be thought of as an undo function. It takes you back one screen. Changes that were in process prior to pressing the key are lost.



IR Communication

IR communication can be affected by the mounting height of the sensor and high ambient lighting such as direct daylight or electric light such as floodlights, and some halogen, fluorescent lamps, LED's.

When trying to communicate with the FSP-211, be sure to be positioned under the sensor without any obstructions. Every time the commissioning tool establishes communication with the FSP-211, the controlled load will cycle.



* Distance may vary depending on the lighting environment



MaxLite® LED Medium Area Light

Troubleshooting

Lights will not go to High Mode:

- Check all wire connections and verify the load and the ground wires are tightly secured.
- Make sure that the sensor is not obstructed.
- Check light level parameter, to find out the amount of light that the sensor is detecting. Cover the sensor lens to simulate darkness in the room. If the lights come ON, the setpoint needs to be adjusted. If set for minimum, more than 1 fc at the sensor of ambient light will cause the lights to be held OFF. See the new settings section for instructions.

Lights will not go into Low Mode:

- The time delay can be set from a minimum of 30 seconds to a maximum of 30 minutes. Ensure that the time delay is set to the desired delay and that there is no movement within the sensor's view for that time period.
- To quickly test the unit operation, enable test mode and move out of the sensor's view. Lights should fade to low mode after 5 seconds.

Lights will not turn OFF:

- Cut Off time may be set to "None."
- Ensure that the Cut Off is set to the desired time and that there is no movement within the sensor's view for that time period when the lights are in Low Mode.
- To quickly test the unit operation, enable test mode and move out of the sensor's view. Lights should fade to low mode after 5 seconds, and the OFF (if cut off is enabled) after 10 sec.

False Triggering may occur if the sensor is exposed to high ambient temperature conditions and the unit is set to maximum sensitivity for PIR detection.

- If this occurs, reduce the PIR sensitivity setting from maximum to a medium point and re-check unit operation.
- If experiencing false triggering during fade down/Off, try increasing the fade time.

Lights do not turn ON:

Check for blinking red LED. If the LED blinks with long pulses, as opposed to short pulses, the sensor has reached its Hold Off setpoint or Photocell Light Level setpoint.

Lights suddenly turn off and will not come back on:

Check for blinking red LED. If the LED blinks with long pulses, as opposed to short pulses, the sensor has reached its Hold Off setpoint or Photocell Light Level setpoint.

MaxLite® LED Medium Area Light

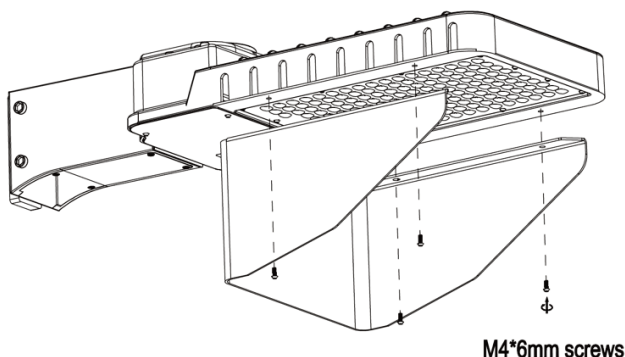
House Side Shield Installation Instructions

60W / 100W / 140W / 210W / 280W LED Area Lights:

1.) For 60W/100W/140W area lights:

- a.) Position and secure House Side Shield in place with (4) M4 x 6mm stainless steel screws, flat washer and split locker washer. See **Fig 1**.

Fig. 1



2.) For 210W / 280W area lights:

- a.) Remove (2) existing M4 x 14mm screws from driver cover plate. See **Fig 2**.
- b.) Position and secure House Side Shield in place with (2) existing M4 x 14mm and (4) M4 x 6mm stainless steel screws, flat washer and split locker washer. See **Fig 3**.

Fig. 2

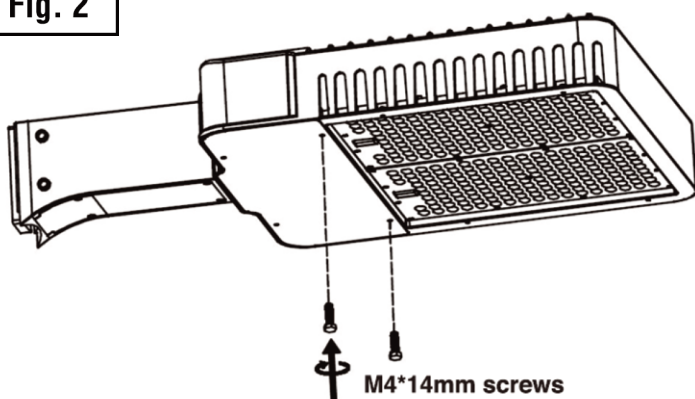
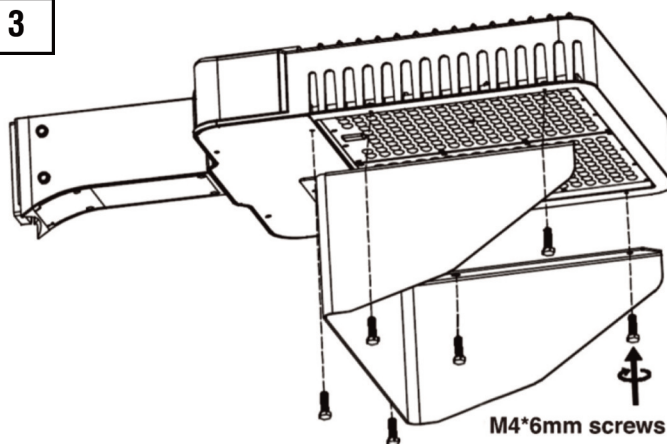


Fig. 3





MaxLite® LED Medium Area Light

Warranty Information

MaxLite Inc. warrants its products for a minimum period of **TEN (10)** years from the date of original purchase from MaxLite or its authorized distributor/dealer (the "Warranty Period"), as follows: If a Product fails to operate during the Warranty Period as a result of defects in materials or workmanship, MaxLite will, at its option, repair it, replace it with the same or like Product.

Please refer to Maxlite's website (at <http://maxlite.com/resources/warranties>) for the complete terms and conditions of our warranty.

Limitation of Liability

THE FOREGOING WARRANTY IS EXCLUSIVE, AND IS THE SOLE REMEDY FOR ANY AND ALL CLAIMS, WHETHER IN CONTRACT, IN TORT OR OTHERWISE ARISING FROM THE FAILURE OF PRODUCT AND IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING ALL WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE, WHICH WARRANTIES ARE HEREBY EXPRESSLY DISCLAIMED TO THE EXTENT PERMITTED BY LAW AND, IN ANY EVENT, SHALL BE LIMITED TO THE WARRANTY PERIOD SPECIFIED ABOVE. THE LIABILITY OF MAXLITE SHALL BE LIMITED TO THE TERMS OF THE EXPRESS WARRANTY SET FORTH HEREIN. IN NO EVENT WILL MAXLITE BE LIABLE FOR ANY SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES INCLUDING, WITHOUT LIMITATION, DAMAGES RESULTING FROM LOSS OF USE, PROFITS, BUSINESS OR GOODWILL, LABOR COSTS, REMOVAL OR INSTALLATION COSTS, DECREASE IN THE LIGHT OUTPUT OF THE LAMP, AND/OR DETERIORATION IN THE LAMP'S PERFORMANCE, WHETHER OR NOT MAXLITE HAS BEEN ADVISED OF THE POSSIBILITY THEREOF. UNDER NO CIRCUMSTANCES SHALL MAXLITE'S ENTIRE LIABILITY FOR A DEFECTIVE PRODUCT EXCEED THE PURCHASE PRICE OF THAT PRODUCT. WARRANTY SERVICES PROVIDED UNDER THESE TERMS AND CONDITIONS DO NOT ENSURE THE UNINTERRUPTED OPERATION OF PRODUCTS; MAXLITE SHALL NOT BE LIABLE FOR DAMAGES CAUSED BY ANY DELAYS INVOLVING WARRANTY SERVICE.

This Limited Warranty gives you specific legal rights and you may also have other rights that may vary from state to state. Because some states or jurisdictions do not allow the exclusion or limitation of liability for consequential or incidental damages, this limitation may not apply to you.