

# ARC-ACEM INSTALLATION

## WARNINGS AND INSTRUCTIONS FOR LUMINAIRES

**IMPORTANT:** FOR YOUR PROTECTION, YOU MUST CAREFULLY READ ALL WARNINGS AND INSTRUCTIONS IN THEIR ENTIRETY PRIOR TO INSTALLATION, OPERATION, SERVICE, OR MAINTENANCE. FAILURE TO DO SO CAN RESULT IN DEATH, PERSONAL INJURY AND PROPERTY DAMAGE. If you do not understand these warnings and instructions, or if additional information is desired, please contact the Customer Care Call Center at 800-555-0050.

- Installation, service, and maintenance of luminaires must be performed by a qualified professional and in accordance with all federal, state, and local laws, regulations, and electrical codes. This professional should be familiar with the construction and operation of this product and any hazards involved. If not qualified, do not attempt installation, service or maintenance.
- To reduce the risk of death, personal injury or property damage from fire, electric shock, falling parts, cuts, abrasions, and other hazards, please read all warnings and instructions included with the luminaire, on the luminaire's packaging and affixed to the luminaire itself.
- Maintenance of the luminaires should be performed by person(s) familiar with the luminaire's construction and operation and any hazards involved.



### WARNING

#### RISK OF FIRE, ELECTRIC SHOCK OR PERSONAL INJURY

- Disconnect or turn off power before attempting any installation, service or maintenance.
- Verify that supply voltage is correct by referencing the luminaire label information.
- Make all electrical and ground connections in accordance with the National Electrical Code (NEC) and any other applicable laws, regulations, or codes.
- All wiring connections should be capped with UL-approved wire connectors.



### WARNING

#### RISK OF PERSONAL INJURY

- 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.



### WARNING

#### RISK OF PERSONAL INJURY

- Keep combustible materials away from LED/lamp & lens.
- Do not operate in close proximity to persons, combustible materials or substances affected by heat or drying.



### WARNING

#### RISK OF FIRE, ELECTRIC SHOCK OR PERSONAL INJURY

- Allow LED/lamp & lens to cool before handling.
- Do not touch enclosure or light source.
- Do not exceed maximum wattage marked on luminaire label.
- Follow all manufacturer's warnings, recommendations, instructions, and restrictions for driver type, burning position, mounting locations and replacement.



### CAUTION

#### RISK OF PRODUCT DAMAGE

- Never connect luminaires and/or components under load with supply voltage turned on.
- Do not mount or support these luminaires in a manner that can cut the outer jacket or damage wire insulation.
- Do not restrict fixture ventilation. Allow for some volume of airspace around the luminaire. Avoid covering the luminaire with insulation, foam, or other material that will prevent convection or conduction cooling.
- Do not exceed luminaire maximum ambient temperature.
- Do not modify the luminaire.
- Only use luminaire in its intended application and location.
- LED products are polarity sensitive. Ensure proper polarity before installation.
- Electrostatic Discharge (ESD) can damage LED. Personal grounding equipment must be worn during all installation and servicing of the luminaire.
- Do not touch individual electrical components as this can cause ESD, shorten LED life, or impact LED performance. Some components inside the luminaire may not be serviceable. In the unlikely event, your luminaire may require service, stop using it immediately and contact the Customer Care Call Center at 800-555-0050.
- Always read the luminaire's complete installation instructions prior to installation for any additional luminaire-specific warnings.
- In the case of HID or Fluorescent luminaires, regular re-lamping is required to keep the luminaire operating within safe limits.
- **Do not install damaged products.** Handling and installing damaged products can potentially increase the risks mentioned. In case of damage and/or missing parts upon arrival of the luminaire, please contact the Customer Care Call Center at 800-555-0050.
- These instructions do not purport to cover all details or variations in equipment nor to provide every possible contingency to meet in connection with installation, operation, or maintenance. Should further information be desired, or should particular problems arise which are not covered sufficiently for the purchaser's or owner's purposes, this matter should be referred to the Customer Care Call Center at 800-555-0050.
- Please see luminaire-specific Installation and Maintenance Instruction for additional warnings or any applicable FCC or regulatory statements. Failure to follow any of these instructions could void luminaire warranties.

#### Luminaire Maintenance

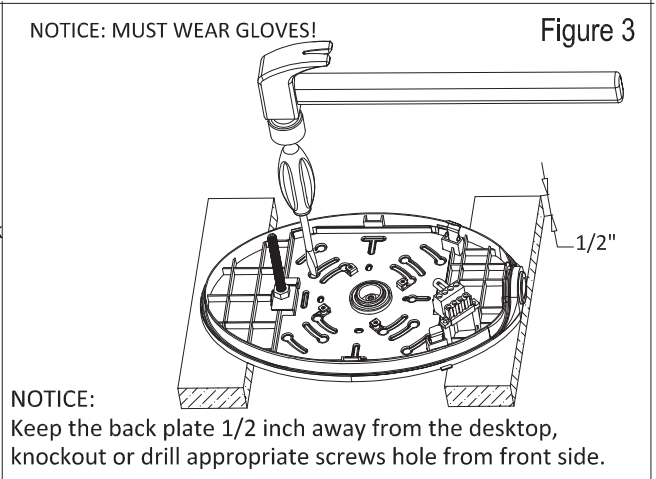
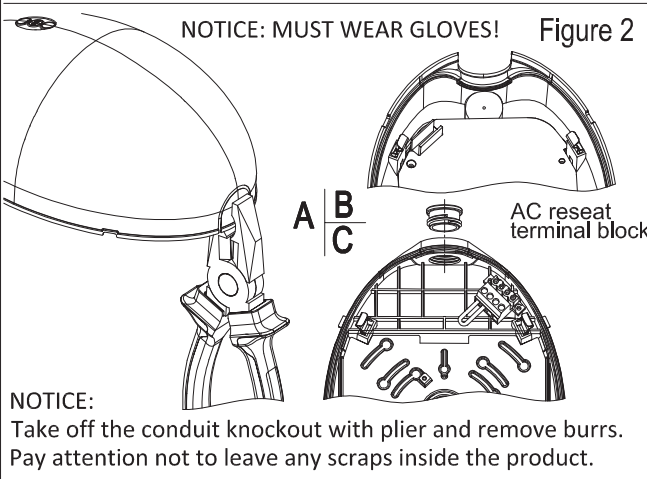
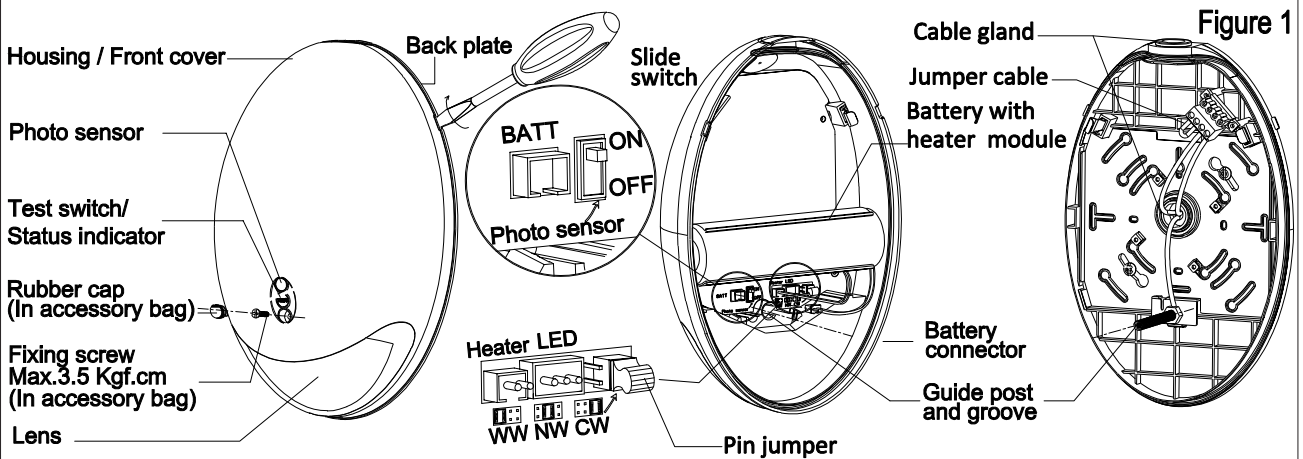
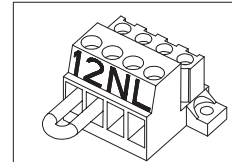
- Regular luminaire maintenance programs are recommended.
- It is recommended to clean the outside of the luminaire and the refractor/lens.
- Frequency of cleaning will depend on ambient dirt level and minimum light output which is acceptable to the user.
- If clean water is not sufficient for cleaning, use a neutral, synthetic, non-scratching, and non-abrasive cleaning substance.
- Never use alkaline and/or acetous cleaning substances.
- Make sure that the cleaning substance is carefully removed by rinsing with lots of clean water.
- Signify recommends using a cleaning solution that has a PH between 5 and 8.
- Recycle: For information on how to recycle electronic products and components, please visit [www.epa.gov](http://www.epa.gov).

*NOTE: This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment.*

*This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference, in which case the user will be required to correct the interference at his own expense.*

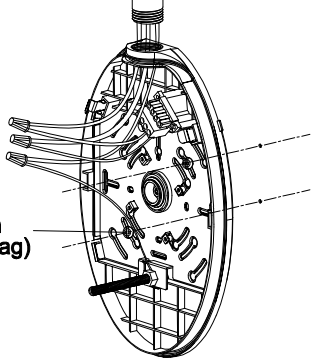
**FUNCTION**

1. Photo sensor and wall switch functions are only available for general light mode, photo sensor function is factory's default setting. During emergency mode these functions are not available.
2. In photo sensor mode, if ambient luminance < 10Lux, fixture will be turned on automatically, and if ambient luminance > 30Lux, fixture will be turned off.
3. In wall switch mode, make a wall switch between 1 and 2.
4. Remove the jumper cable to get non-maintain (emergency only) function.
5. 4000K color temperature is factory's default setting, change the pin jumper position to obtain different color temperature.
6. -30°C ~ 50°C ambient temperature is factory's default setting.
7. The battery pack assembly contains the battery, heater pad and thermal protection. If necessary, please contact the manufacturer to replace it. If the pack scrapping in further, please separate them.



# ARC-ACEM INSTALLATION

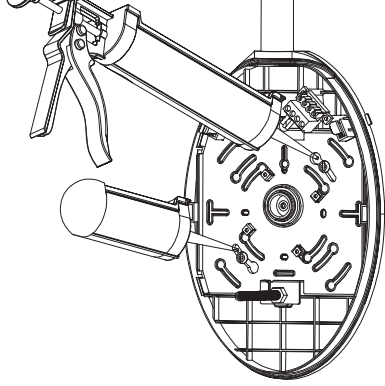
**Figure 4**



Fixing screw  
Max.4.0 Kgf.cm  
(In accessory bag)

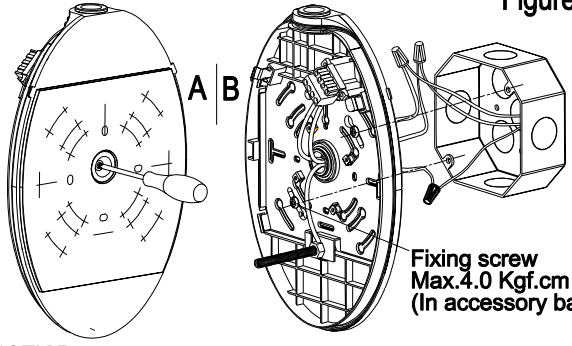
**NOTICE:**  
Fix the screws with proper force to ensure that the back plate will not be pressed into deformed and will not affect the waterproof function

**Figure 5**



**NOTICE:**  
Apply silicone sealant to all open areas after installation.

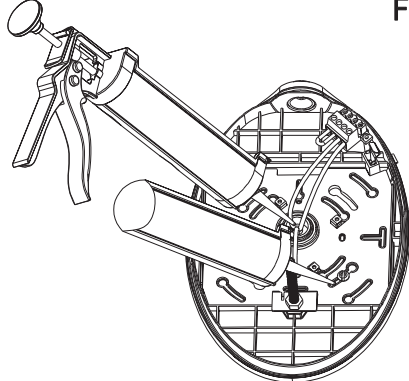
**Figure 6**



Fixing screw  
Max.4.0 Kgf.cm  
(In accessory bag)

**NOTICE:**  
Fix the screws with proper force to ensure that the back plate will not be pressed into deformed and will not affect the waterproof function

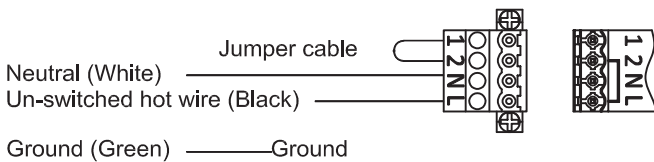
**Figure 7**



**NOTICE:**  
Apply silicone sealant to all open areas after installation.

**Wiring diagram for general light auto turn on/off by photo sensor**

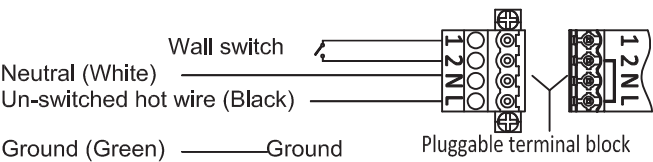
**ON** Refer to wiring details as below diagram, slide switch must be  
 **OFF** Original position(factory default setting) to utilize photo sensor.



Neutral (White) — Jumper cable — 1 2 N/L  
 Un-switched hot wire (Black) — 1 2 N/L  
 Ground (Green) — Ground

**Wiring diagram for general light with wall switch**

**ON** Toggle slide switch down to bypass the photo sensor, remove  
 **OFF** jumper cable, connect wall switch to terminal 1 and 2, terminal 1 is hot switched wire, terminal 2 is hot un-switched wire same as L



Neutral (White) — Wall switch — 1 2 N/L  
 Un-switched hot wire (Black) — 1 2 N/L  
 Ground (Green) — Ground Pluggable terminal block

- Wall mount for conduit wiring**
1. Use flat blade screwdriver insert the two slots and make rotation then remove front cover from back plate. (see Fig.1)
  2. Take off the conduit knockout with pliers and remove burrs, pay attention not to leave any scraps inside housing. (see Fig.2AB)
  3. Remove top cable gland from back plate. (see Fig.2C)
  4. Remove appropriate screws hole on back plate(see Fig.3), secure back plate to the wall. (see Fig.4)
  5. Feed input source wire through conduit, secure the conduit to the back plate.
  6. Connect the unit wires to power supply wires using the wire nuts provided. Connect the white wire to neutral, black wire to hot wire(120-277V), ground to green wire.
  7. Connect battery connectors, select correct color temperature and function, apply silicone sealant to all open areas. (see Fig.5)
  8. Assemble front housing using cover fixing screw(in accessory bag) with Phillips screwdriver, then insert the rubber cap to cover the screw.
- Wall Mount for back power feed**
1. Use flat blade screwdriver insert the two slots and make rotation then remove front cover from back plate. (see Fig.1)
  2. Remove appropriate knockout on back plate. (see Fig.2)
  3. Use small cross screwdriver knockout the center cable gland on the back plate. (see Fig.6A)
  4. Feed unit wires through center cable gland, connect the unit wires to power supply wires using the wire nuts provided. connect the white wire to neutral, black wire to hot wire(120-277V), ground to green wire.
  5. Secure back plate to J-box, apply silicone sealant to all open areas. (see Fig.7)
  6. Connect battery connectors, select correct color temperature and function.
  7. Assemble front housing using cover fixing screw(in accessory bag) with Phillips screwdriver, then insert the rubber cap to cover the screw.

# BATTERY REPLACEMENT INSTRUCTIONS

Caution: Must wear gloves and flat blade screwdriver is needed during new battery replacement.

Fig. 7

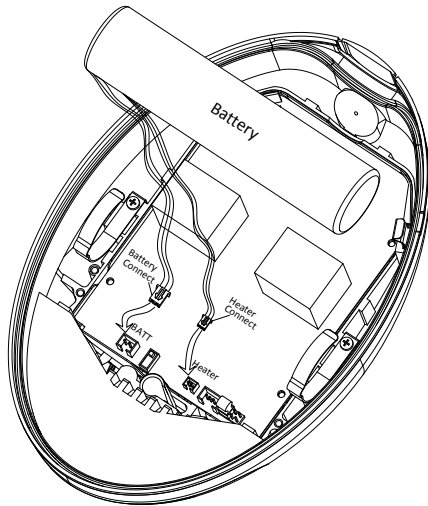
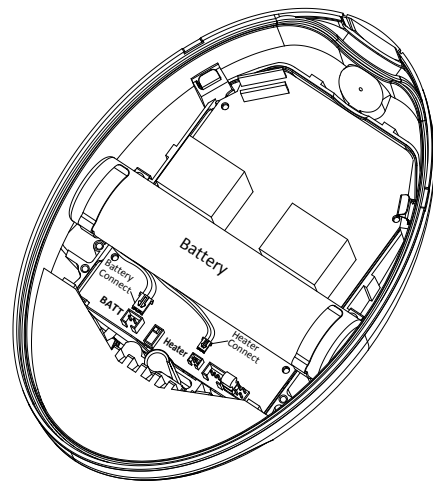


Fig. 8



## Removing the Battery:

1. Disconnect Power: Unplug the unit from the AC power source.
2. Access Battery: Use flat blade screwdriver insert the two slots and make rotation then remove front cover form back plate. (See Fig.1), afterwards locate the battery compartment.
3. Disconnect Battery: Carefully disconnect the battery terminal and heater terminal, ensuring proper polarity.
4. Removing battery: Carefully remove the battery pack assembly from the tension spring clips. (See Fig. 7)

## Installing the New Battery:

1. Prepare Battery: Ensure the new battery pack assembly correspond with the model number described for this device.
2. Assemble Battery: Carefully put the new battery pack assembly into the tension spring clips. (See Fig. 8)
3. Connect Battery: Connect the battery terminal and heater terminal to the corresponding connectors.
4. Reassemble Unit: Close the unit's case and reconnect the AC power source.

# ARC-ACEM INSTALLATION INSTRUCTION

## SELF-DIAGNOSTICS/SELF-TESTING OPTION

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### SAVE THESE INSTRUCTIONS

#### 1. When AC power is supplied to fixture, the unit will automatically initiate a self-test and self-diagnostic test as follows:

- (1) Verifies battery disconnection, charger board failure at every 4 seconds.
- (2) One-minute self-testing every month.
- (3) 90 minutes self-testing on the 12th month of the year after installation.

#### 2. Dual color LED lamp indicator shows the following status:

- (1) Green color: ON/ Ready  
Blinking: Testing
- (2) Red color (Service Alert)
- (3) Service Alert LED Code (Red color LED lamp indicator)

○	One blink ON/pause (4 seconds)	Battery is not connected
○○	Two blinks ON/pause (4 seconds)	Battery is shorted or battery voltage drops below acceptable level
○○○	Three blinks ON/pause (4 seconds)	Charger board circuit fault
○○○○	Four blinks ON/pause (4 seconds)	Transfer function failure
○○○○○	Five blinks ON/pause (4 seconds)	Emergency lamp fault

#### CAUTION:

After solving the fault of emergency equipment, Please press test button for 2 seconds then release to reset. LED indicator will show green.

#### 3. For manual test, press test button as follows:

Press test button once (within 2 seconds)	30 seconds discharge test
Press test button twice (within 2 seconds)	3 minutes discharge test
Press test button 3 times (within 2 seconds)	30 minutes discharge test
Press test button 4 times (within 2 seconds)	90 minutes discharge test