# **Sure-Lites**

# Installation Instructions for the Sure-Lites LPXW Compact Wet Location Exit Sign

# **WARNING**

#### Risk of Fire / Electric Shock

If not qualified, consult an electrician.

# **A** WARNING

#### Risk of Electric Shock

Disconnect power at fuse or circuit breaker before installing or servicing.

#### IMPORTANT SAFEGUARDS

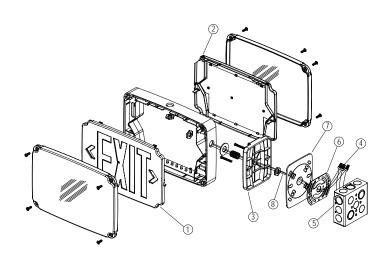
When using electrical equipment, basic safety precautions should always be observed including the following:

- READ AND FOLLOW ALL SAFETY INSTRUCTIONS
- Disconnect AC power and unplug battery before servicing.
- Before wiring to power supply, turn off electricity at fuse or circuit breaker.
- All service should be performed by qualified service personnel. This product must be installed and maintained in accordance with the applicable installation codes by a person familiar with the construction operation of the product and the hazards involved.
- Consult your local building code for approved wiring and installation.
- UL Listed for wet locations (-20° C 50° C).
- Do not mount near gas or electric heater.
- Do not let power supply cord touch hot surfaces.
- Equipment should be mounted in locations and at heights where it will not readily be subjected to tampering by unauthorized personnel.
- The use of accessory equipment not recommended by the manufacturer may cause an unsafe condition.
- Do not use this equipment for other than intended use.
- This product must be installed in accordance with the applicable installation codes and ordinances.
- The AC voltage rating of this equipment is specified on the product label. Do not connect equipment to any other voltage
- SAVE THESE INSTRUCTIONS

# PARTS DESCRIPTION

All parts provided unless noted otherwise

- 1) Face Plate
- ② Back Plate
- 3 Canopy
- (4) Wire Nuts
- ⑤ Junction Box (not provided)
- (6) Steel Mounting Plate
- (7) Gasket
- (8) Input Wires



On fixture with battery: Connect battery only after continuous power can be supplied to fixture. Allow 24 hours before initial test or for full charge.



#### INSTALLATION

#### **Top or End Mounting**

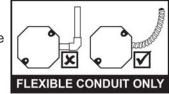
- 1. Use flat head screwdriver to loosen the screws on the lens.
- 2. Remove lens from sign and set aside.
- 3. Remove EXIT stencil from housing and set aside.
- 4. Drill a ¾" hole through the desired mounting knock out located on the frame of the sign. For ceiling mount, knock out will be located on the top of the housing. For wall mount, knock out will be located on the side of the housing.
- 5. Using provided hardware, thread nut onto pipe nipple. Slide pipe nipple through canopy center hole.
- Remove backing from self adhesive junction box gasket and adhere to back of mounting canopy. Remove backing from self adhesive pipe thread gasket and adhere to front of mounting canopy.
- 7. Place screws (provided) in holes on the canopy.
- 8. Route EXIT input wires through knockout in EXIT frame, pipe nut and metal mounting plate.
- Make wiring connection. For 120V, use black and white wires and for 277V, use red and white wires. WARNING: Properly insulate the unused lead with a wire nut (provided) or other approved means.
- 10. Push wire connections into the J-Box (not provided). Secure mounting plate to junction box.
- 11. Secure the canopy to the steel mounting plate with screws installed in step 7.
- 12. Place pipe nipple through the mounting hole of the housing until the gasket is touching the housing frame. Thread a second nut onto the pipe nipple on the inside of the housing to lock the canopy into place. Once canopy is locked into position, there will not be any side-to-side movement of the canopy.
- 13. Remove proper chevron(s) as required. When removing chevrons it may be helpful to remove the color diffuser panel to allow easier access to the chevrons. If removing color diffuser panel, it is important to remember to reinstall the diffuser panel once chevron(s) have been removed.
- Connect battery to lamp board (battery back up models only).
- 15. Secure face plate(s) to the housing.
- 16. Secure lens to face plate and securely torque screws.
- 17. Apply continuous AC power and press "TEST" button to check operation.

#### **Wall Mount Installation**

- Use flat head screwdriver to loosen the screws on the lens.
- 2. Remove lens from sign and set aside.
- 3. Remove EXIT stencil from housing and set aside.
- 4. Drill or knock out appropriate knockouts on back plate to fit junction box mounting points.
- Drill or knock out center hole in back plate for EXIT supply wire leads.
- 6. Remove backing from self adhesive junction box gasket and adhere to back plate.
- 7. Route EXIT input wires through center hole of the back plate and make wiring connection. For 120V, use black and white wires and for 277V, use red and white wires.
- 8. Secure back plate to junction box (not provided).
- Remove proper chevron(s) as required. When removing chevrons it may be helpful to remove the color diffuser panel to allow easier access to the chevrons. If removing color diffuser panel, it is important to remember to reinstall the diffuser panel once chevron(s) have been removed.
- 10. Connect battery to lamp board (battery back up models only).
- 11. Secure face plate(s) to the housing.
- 12. Secure lens to face plate and securely torque screws.
- 13. Apply continuous AC power and press "TEST" button to check operation.

#### **CONDUIT ENTRY**

 Drill a ¾" hole through the desired conduit entry knock out located on the top or side of the frame of the sign.



- 2. Route the AC input conduit into housing.
- All conduit connections must use UL LISTED and SUIT-ABLE FOR WET LOCATION parts.
- 4. To finish installation of EXIT sign, reference Wall, Ceiling or End Mount instructions.

#### **MAINTENANCE**

Caution: Always turn OFF AC power to the equipment before servicing. Servicing should be performed only by a qualified service technician. Only manufacturer SUPPLIED or APPROVED replacement parts must be used.

- BATTERY: The battery supplied in this equipment requires no maintenance. However, it should be tested periodically (see TESTING) and replaced when it no longer operates the connected fixtures for the duration of a 30-second or 90-minute test. The battery supplied in this equipment has a life expectancy of 5 years when used in a normal ambient temperature of 72°F.
- 2. OTHER: Clean exit clear lens with non-abrasive cloth and cleaner when required.

# **OPERATION** (Self Powered Models)

Once the unit is properly installed according to the Instrallation Instruction Sheet and AC power is supplied, the EXIT will come ON. The dual-color LED indicator will also come ON, automatically iniitiating the self-diagnostic test function. The LED indicator points out the current unit status. A STEADY GREEN on the LED indicator indicates a normal service; BLINKING GREEN indicates the unit is in testing mode; GREEN/RED FLASING indicates the battery is charging; RED (STEADY and BLINKING) would indicate a fault or a service alert. Refer to the Fault Indication section for more details. The LED indicator would be OFF when the unit is in Emergency mode.

#### **AUTOMATIC TESTING**

The self-diagnostic function is factory preset without any field adjustment. The automatic self-diagnostic feature serves the following tests:

- 1. On-line real time monitoring of battery and LED(s): Identifies battery charging, disconnection and failure along with LED failures.
- 2. Self-testing and a 30-second discharge once every 30 days (conforming to NFPA code requirements), after AC power has been supplied for a minimum of 24 hours.
- Self-testing and a 30-minute discharge once every 180 days, after AC power has been supplied for a minimum of 24 hours.
- 4. Self-testing and a 90-minute discharge once every 365 days (conforming to NFPA code requirements), after AC power has been supplied for a minimum of 24 hours.

#### **INDICATORS**

FAULT DESCRIPTION	LED INDICATION
Battery disconnection	STEADY Red
Battery recharge failure *	FLASHING Red
Battery failure **	Red BLINKING '2' times
LED failure	Red BLINKING '3' times
EXIT is in Normal Mode	STEADY Green
EXIT is in Emergency Mode	OFF
Battery Charging	Red & Green (alternate flashing)

<sup>\*</sup> A battery recharge failure is more likely seen after a monthly or annual auto-discharge.

#### MANUAL TESTING

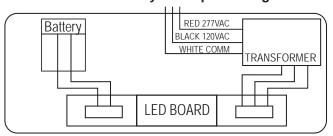
This unit also provides for manual testing by pushing the test switch in a specific pattern. The different patterns and the resulting tests are listed in the table below.

ACTION	REACTION & LED INDICATION
Push test button Once (within 2 seconds)	30-second test: FLASHING GREEN
Push test button Twice (within 2 seconds)	30-minute test: Green BLINKING '2' times
Push test button Thrice (within 2 seconds)	90-minute test: Green BLINKING '3' times
Push & Hold test button (for 3-5 seconds)	Interruption
Push & Hold test button (for more than 6 seconds	System reset

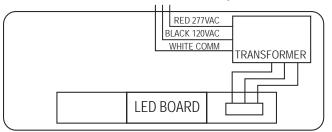
<sup>\*\*</sup>A battery failure is more likely seen when the unit goes into a monthly/annual discharge test and/or fails to run the LED strip for the designated amount of time in Test/Emergency mode.

# **WIRING DIAGRAMS**

# 120/277 VOLT Battery Backup/Self Diagnostic



# 120/277 VOLT AC Only



# 120/277 VOLT Dual Circuit

