

# SV Series – Survive-All

## Emergency Light unit

### IMPORTANT SAFEGUARDS

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

### READ AND FOLLOW ALL SAFETY INSTRUCTIONS

1. Do not let power supply cords touch hot surfaces.
2. Do not mount near gas or electric heaters.
3. Use caution when handling batteries. Avoid possible shorting.
4. Equipment should be mounted in locations and at heights where it will not readily be subjected to tampering by unauthorized personnel.
5. The use of accessory equipment not recommended by the manufacturer may cause an unsafe condition.
6. Do not use this equipment for other than intended use.
7. All servicing should be performed by qualified service personnel.

### SAVE THESE INSTRUCTIONS

#### Installation Instructions

1. Turn off unswitched AC power.
2. Open clear cover by removing the screws.
3. Remove the electronic module. Pull on the cover until snapping features disengage or use a screw driver by inserting it into the slots shown in figure 12 and prying the cover open.
4. Remove the battery in order to access the knockouts (k'out).
5. Install back plate:

#### Wall mounting on a junction (figure 2)

- a. Route unswitched AC circuit wires k'out into the junction box and leave 6" of wire length.
- b. Remove the k'outs needed to mount back plate. Considering the important weight of the unit, it's recommended to use key hole for additional securing.
- c. Remove AC harness from electronic module. Wire to AC circuit wires using wire nuts (see figure 2). Refer to hookup instructions on page 2.

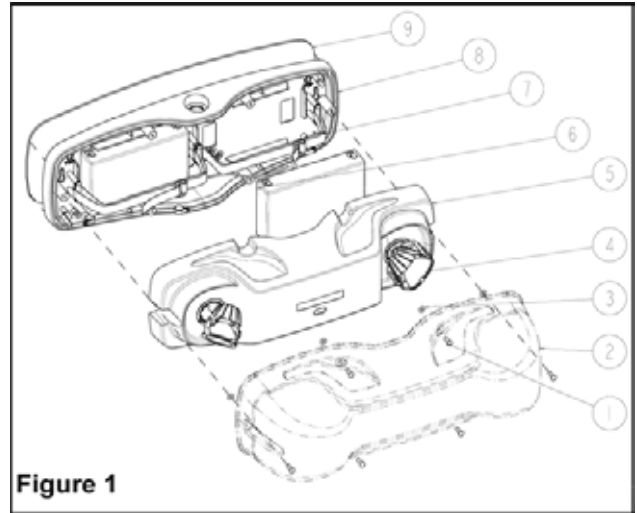


Figure 1

#### Part List

- |                             |                                 |
|-----------------------------|---------------------------------|
| 1. Tamper-proof screws (6x) | 9. Gasket                       |
| 2. Clear cover              | 10. AC harness                  |
| 3. Gasket screw             | 11. Ground wire                 |
| 4. Lamps                    | 12. Wire nut                    |
| 5. Electronic module        | 13. J-box (not supplied)        |
| 6. Battery                  | 14. J-box screws (not supplied) |
| 7. Battery strap or bracket | 15. Screw cover                 |

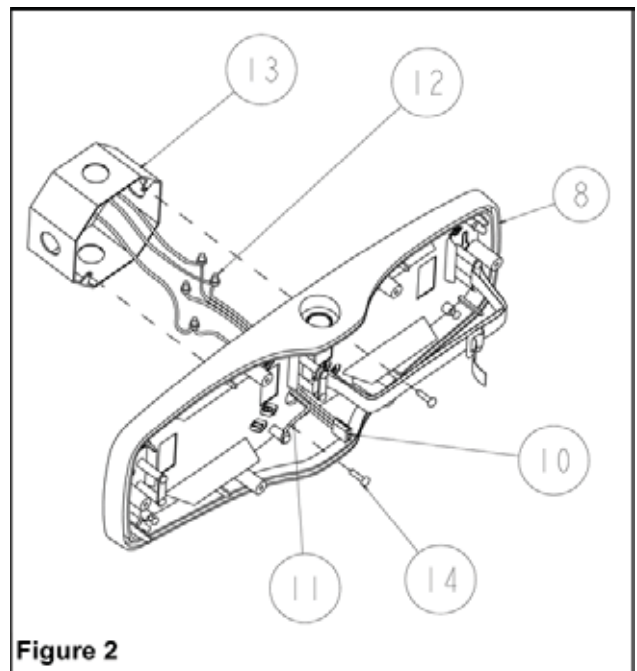


Figure 2

- d. Install the gasket on the back plate. Feed AC harness and the ground through the large hole in the backplate (see figure 2). Mount to J-box using the J-box screws (not provided). J-box should be properly secured directly to a stud.

Note: When back mounting the unit on uneven surface such as brick, silicone caulk should be used to prevent water from seeping in between the unit and the J-box.

### Wall mounting with conduit

- a. Remove K'out on top of the backplate for conduit entry and key hole K'out to fix the backplate to the wall.
- b. Install a liquid tight conduit fitting on the backplate. Conduit size: 1/2" NPT (not provided).
- c. Install the unit on the wall using screws (not provided).
- d. Connect the conduit to fitting and route unswitched AC circuit wires in the unit.
- e. Remove AC harness from electronic module. Wire to AC circuit wires using wire nuts. Refer to hookup instructions..

### Pole or I-beam mounting (Option)

- a. Universal bracket (part 16 on figure 4) is an accessory. Has to be ordered separately. Remove k'out on top of the backplate for conduit entry.
- b. Install a liquid tight conduit fitting on the backplate. Conduit size: 1/2" NPT (not provided).
- c. Install the universal bracket as shown in figure 4. Don't install the gasket (9). This type of installation is not NSF certified for food processing areas.
- d. Unit can be installed using steel banding for routing around the poles and I-beam. Standard banding 3/4" in width or less can be used (not provided). It can also be mounted on Superstrut® metal framing (1 5/8" channel series) using 1/4" bolt (not provided). Holes are placed at 9" apart horizontally.
- e. Connect the conduit to fitting and route unswitched AC circuit wires in the unit.
- f. Remove AC harness from electronic module. Wire to AC circuit wires using wire nuts. Refer to hookup instructions.

### 6. Complete electrical connection:

#### Standard product:

- a. Put batteries and electronic module back in place as shown on figure 5. See figure 6 for batteries wiring diagram.
- b. Connect tranformer harness to AC harness.

#### Cold weather option:

- a. Connect battery heater to thermostat (19) and to AC harness (10) (see figure 7).
- b. Refer to figure 8 for 120VAC input voltage and to figure 9 for 277VAC. Use wire taps provided with the hardware kit to connect battery heater. Unused wire must be insulated to prevent shorting.
- c. Put the batteries back in place . Battery heater is placed in between the battery and the backplate. See figure 6 for batteries wiring diagram. Put the electronic module back in place as shown on figure 5.
- d. Connect tranformer harness to AC harness.

## INSTRUCTIONS - HOOKUP

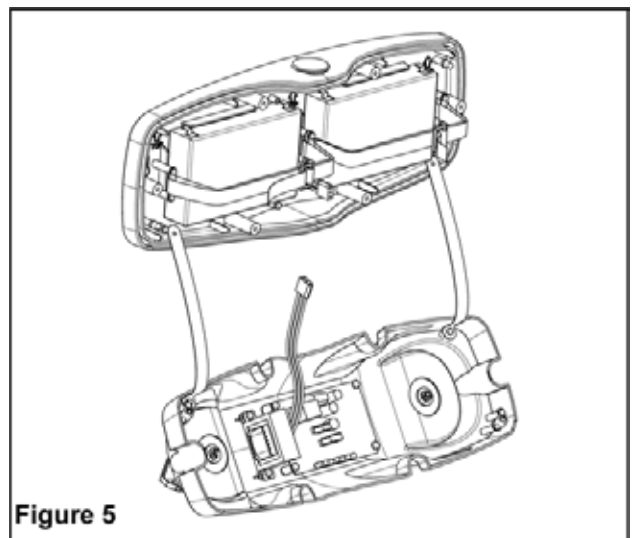
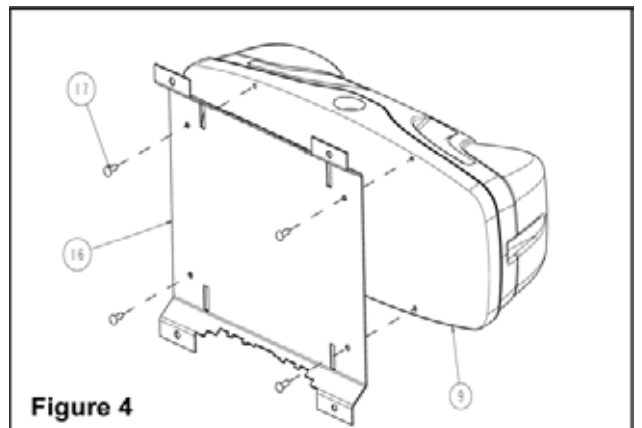
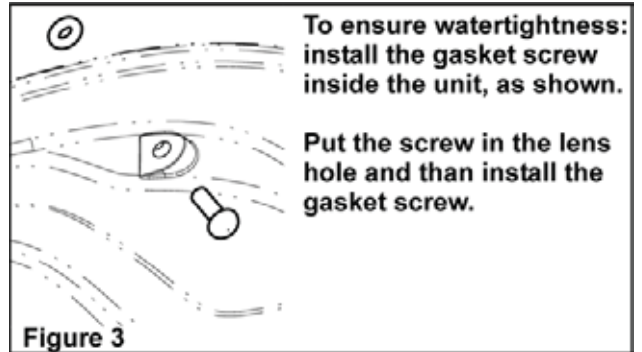
### - 120 VAC OPERATION -

White wire - Common  
Black wire - 120V Line  
Green wire - Ground

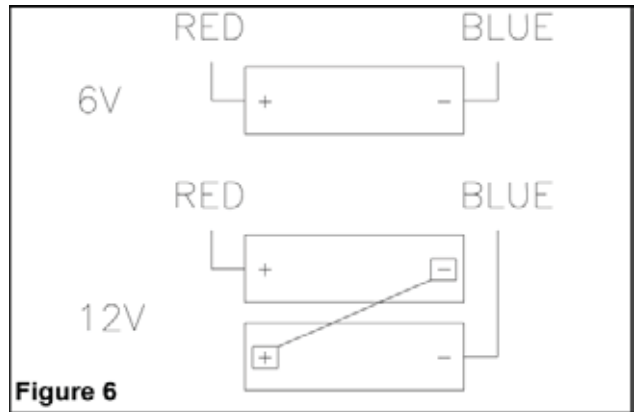
### -277 VAC OPERATION-

White wire - Common  
Orange wire - 277V Line  
Green wire - Ground

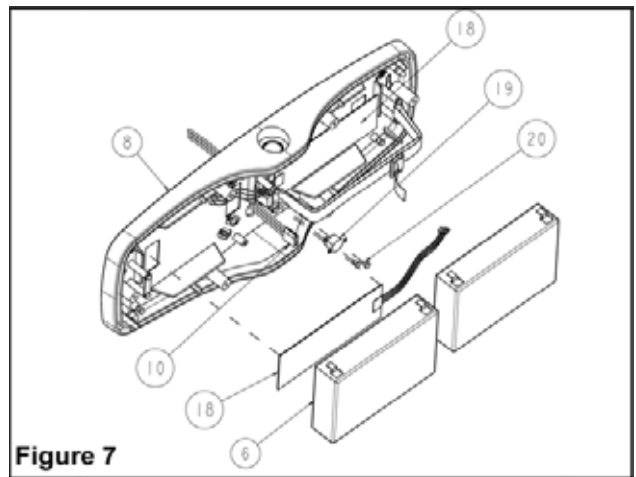
Unused primary wire must be insulated to prevent shorting



7. For unit with remote capacity, connect remote heads to terminal block TB1 (see figure 11).
  8. Snap electronic module on backplate.
  9. Adjust lamp aiming. .
  10. Install the lens by using the 6 tamper-proof screws (1).  
To insure water tightness, gaskets screw (3) have to be installed from the inside (see figure 3). The tamper-proof screws should be equally torqued to approximately 5 lbs-in (0.6 N-m) in order to compress gaskets screw.
- DO NOT OVERTIGHTENT.**
11. For food processing areas, in order to avoid food accumulation, screw caps have to be installed (provided with the hardware kit).
  12. Energize AC. Lamps will turn on for few minutes.
  13. See page 4 for testing procedure.

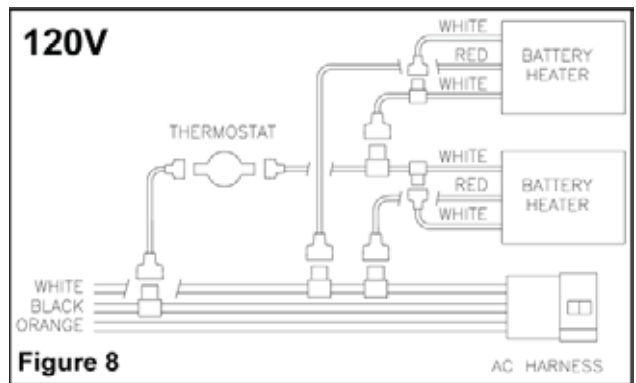


**Figure 6**

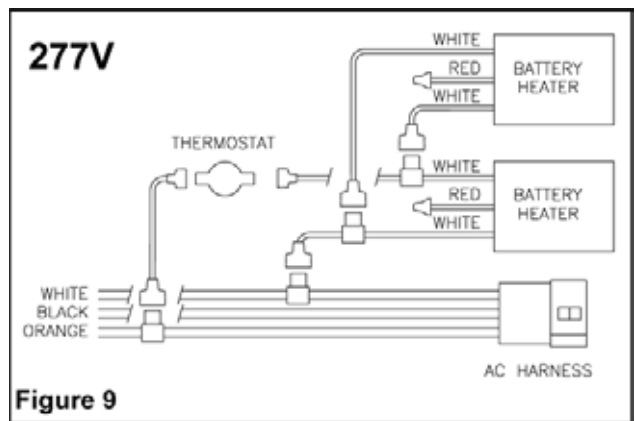


**Figure 7**

FOR COLD WEATHER  
OPTION ONLY



**Figure 8**



**Figure 9**

**Manual Testing**

Operate the magnetic “test switch” by holding the provided magnet near the AC pilot lamp, where indicated. This will initiate a one minute test. The DC lamps will illuminate for approximately one minute, then the unit will automatically return to stand by mode. Test can be cancelled by holding the magnet near the test switch again.

**Automatic Testing**

The unit will perform an automatic self-test of 1 minute every month, 30 minutes every 6 month and a 90 minutes self-test once a year.

**Automatic Diagnostics**

There are five diagnostic indicators: one external and four internal. Unit must be opened to gain access to internal indicators.

External: General alarm, “Service Required”. The LED will turn on if any alarm condition is detected (see figure 10).

Internal: Battery Failure, Battery Disconnect, Charger Failure & Lamp Failure. Steady ON if alarm condition exists. (see figure 11).

**Normal operation, No fault** — “Service Required” is OFF.

**Faulty operation** — “Service Required” is ON.

(See fig. 10).

(see AD charger owner manual for more details)

**Default setting**

Unit is factory preset with a 15 minutes time delay and a non audible diagnostic. This setting can be changed to either turn off the time delay or turn on the audible diagnostic. See AD charger owner manual for more details.

**Food processing facilities**

Screw covers are available in the hardware kit. These covers have to be installed on screws to avoid any food accumulation. Note: some detergent used in food processing industry can affect durability of Polycarbonate lens. Install unit on even wall surface to insure watertightness and avoid any gaps between the gasket and the wall.

**Maintenance (All Models)**

None required. If AC supply to the unit is to be disconnected for 2 months or more, the battery must be disconnected.

