

# RS Series - Emergency light unit

## 6 and 12 volt Decorator Recessed

### 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 use outdoors.
2. Do not let power supply cords touch hot surfaces.
3. Do not mount near gas or electric heaters.
4. Use caution when handling batteries. Avoid possible shorting.
5. Equipment should be mounted in locations and at heights where it will not readily be subjected to tampering by unauthorized personnel.
6. The use of accessory equipment not recommended by the manufacturer may cause an unsafe condition.
7. Caution: If optional Halogen cycle lamp(s), symbol (H—), are used in this equipment, to avoid shattering: do not operate lamp in excess of rated voltage, protect lamp against abrasion and scratches and against liquids when lamp is operating, dispose of lamp with care.
8. Halogen cycle lamps operate at high temperatures. Do not store or place flammable materials near lamp.
9. Do not use this equipment for other than intended use.
10. All servicing should be performed by qualified service personnel.

### SAVE THESE INSTRUCTIONS

#### Installation Instructions

1. Turn off AC power.
2. Remove the four cover screws and retain. Set cover/electronics assembly aside (see fig. 2).

Choose the proper mounting solution: wall mount, new construction wood framing or suspended ceiling. Follow the proper mounting section and continue the installation at step 3.

##### Wall mount

- a. Remove appropriate knock out for AC supply.
- b. Cut hole in sheet rock & frame.
- c. Mount back box permanently into place by leaving the edge 3/8 of an inch away from the sheet rock surface.

##### New construction wood framing

- a. Determine the desired orientation between framing members. Locate sides of the back box that will be at right angles to the framing members. Mount the adjustment brackets to these sides using the studs on the brackets and nuts. Do not tighten (see fig. 3)

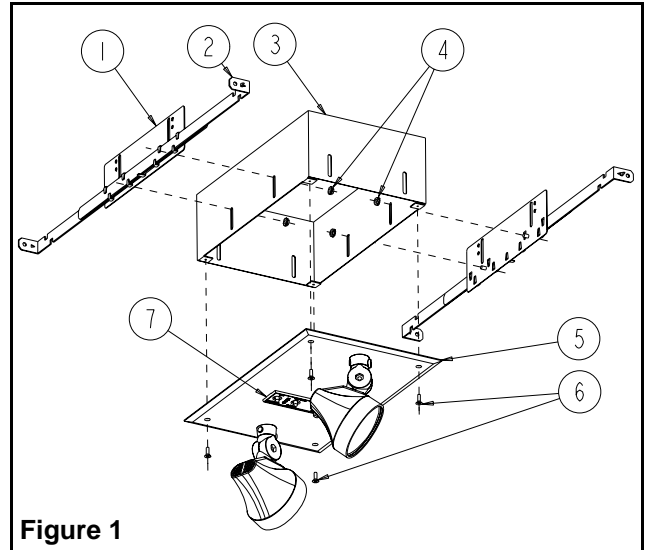


Figure 1

#### Part List

- |                            |   |
|----------------------------|---|
| 1. Adjustment brackets (2) | 5. Cover                                    |
| 2. Hanger bars (4)         | 6. Cover screws (4 provided)                |
| 3. Back Box                | 7. Test switch and/or diagnostics indicator |
| 4. Kep nuts (4 provided)   |   |

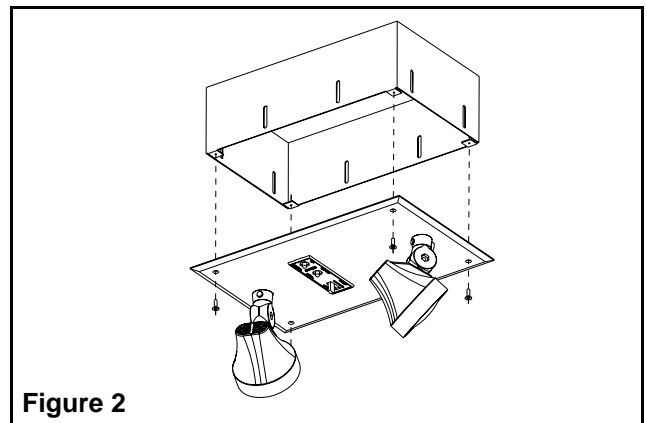


Figure 2

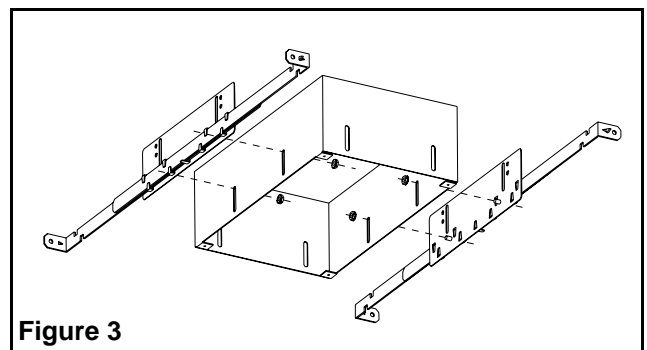


Figure 3

- b. Remove appropriate knock out for AC supply.
- c. Slide the hanger bars through the tabs in the adjustment brackets (see fig. 4) and place the assembly between the framing members. Align the back box as required and fasten bars to the framing members.
- d. Align the open surface of box where the finished surface of sheet rock will be and tighten nuts and studs (see fig. 5).

**Suspended ceilings**

- a. Determine the desired orientation between grid members. Locate sides of the back box that will be parallel to the longest grid members. Mount the adjustment brackets to these sides using the studs on the brackets and nuts. Do not tighten (see fig. 3).
- b. Remove appropriate knock out for AC supply.
- c. Slide hanger bars through the tabs in the adjustment brackets and rest assembly on top of grid members. Notch on bars should hook over grid member (see fig. 5). Align the back box as required and fix location by cutting a hole in the ceiling panel and allowing back box to hang through the panel.
- d. Align the open surface of the box flush with the surface of the ceiling panels and tighten the nuts and studs (see fig. 5). Hang the fixture from the framing above ceiling grid with solid wires, (provided by others), if required by code.

- 3. Route AC unswitched circuit of rated voltage into the back box, allowing approximately 6" of wire for connection.
  - 4. If required, extend DC wiring for remote DC fixtures into the back box.
- Note** — Wiring must comply with NEC Art, 700 and 720. Do not exceed rated wattage of unit.

- 5. Connect DC wiring to load terminals on circuit board marked, "L+ and L-".
- 6. If removed, reinstall battery.
- 7. Make the proper connections. Our system can accept input voltages of 120 VAC or 277 VAC (see fig. 6).

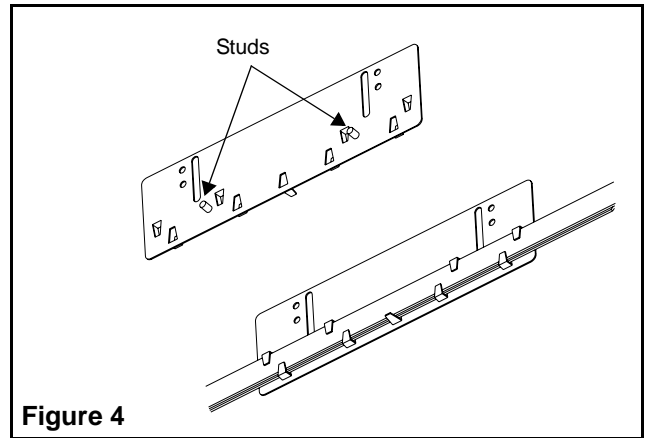
**120 VAC** — Connect the black (120 VAC) and white (Neutral) leads to the building utility. Insulate orange wire.

**277 VAC** — Connect the orange (277 VAC) and white (Neutral) leads to the building utility. Insulate black wire.

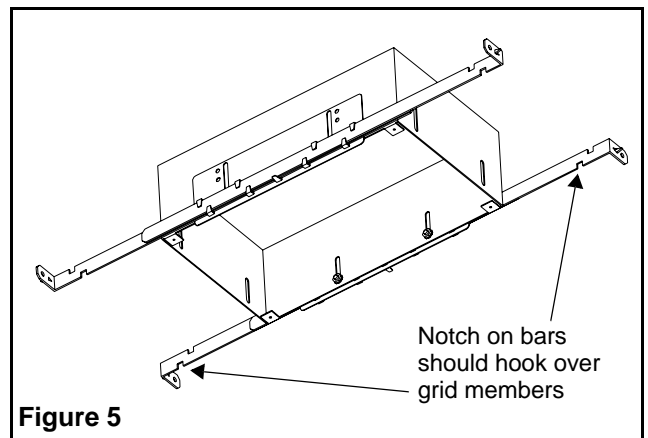
- 8. When ready to permanently energize AC circuit, plug polarized battery connector into the PC board.
- 9. Replace cover/electronics assembly.
- 10. Energize AC circuit. Pilot lights will come on. Red indicates that the charger is on high charge (not present on RSC units). Yellow is an indication that the AC supply is present (see fig. 7). After the unit has reached full charge, it is normal for the red light to pulse on occasionally. However, if the red pilot light remains on for more than a week, it is an indication of a malfunction.

**Manual testing**

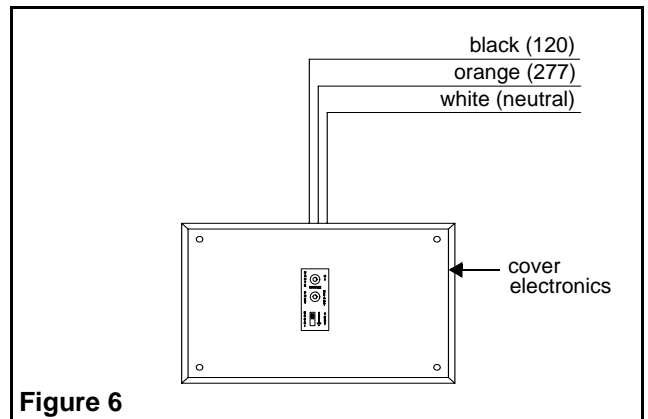
Press test switch (see fig. 7). Lights will illuminate, AC pilot lamp will extinguish. On release, pilot lamp will illuminate, lights will turn off, and the automatic charger will restore battery to full charge.



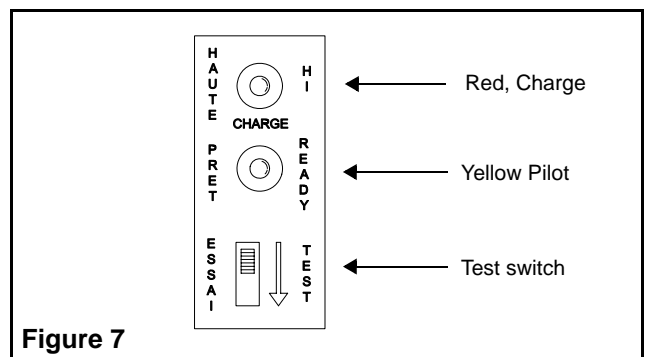
**Figure 4**



**Figure 5**



**Figure 6**



**Figure 7**

### Automatic testing and diagnostics, (optional)

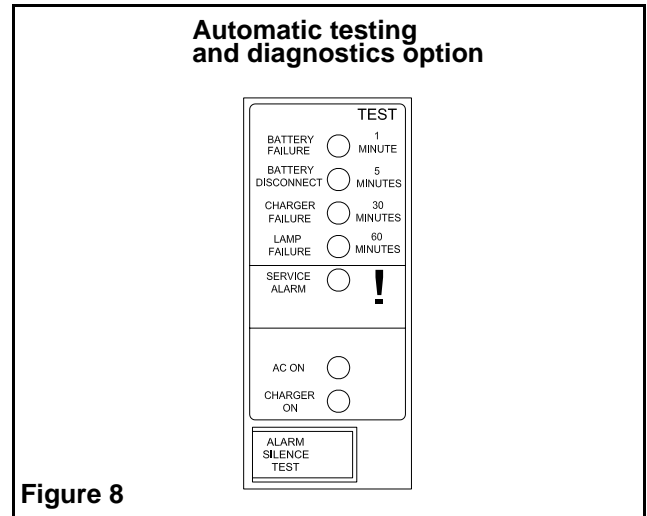
The models with automatic testing and diagnostics include a micro-controller which exercises, (self-tests), the unit on a monthly basis and identifies and notifies failures of the electrical components: battery, battery charger, lamps (LEDs) (see fig.8).

Please refer to the manual called "Advanced Diagnostic, Charger Board, owner's manual" for all diagnostics features and functions.

### Maintenance

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

**Note** — Nickel Cadmium battery units are shipped discharged and may require 10 minutes of connection to AC supply before start-up test procedure, and 96 hours to reach full charge.



**Figure 8**