

Self-Testing / Self-Diagnostic



FRONT COVER ASSY

MAIN PCA ELECTRONICS

BATTERY STRAP

LAMP CABLE

BATTERY

TRANSFORMER OUTPUT CABLE

TRANSFORMER

EXIT LED CABLE

BACK-PLATE ASSY

Circuit Assembly Code

T5 CCT Local /Rem-A 6W
T6 CCT Local/Rem-B 12W

Options

TD Re-strike TimeDelay
LX Laser Test
SL Simulated Load
FA Fire Alarm Intf
FI Flashing on EM



Flexible conduit only



No rigid conduit

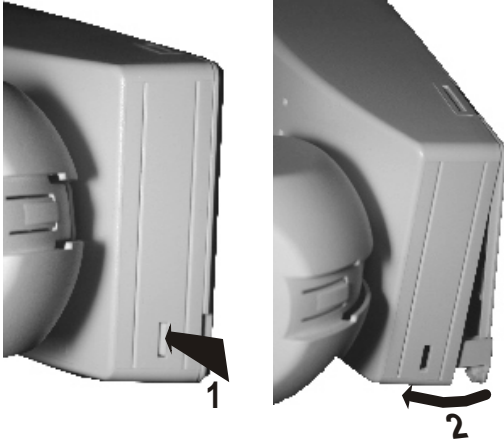
IMPORTANT SAFEGUARDS READ AND FOLLOW ALL SAFETY INSTRUCTIONS

- Do not use outdoors.
- Do not mount near gas or electric heaters.
- Do not let power supply wires 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 authorized by the manufacturer may cause an unsafe condition.
- Do not use this equipment for other than its intended purpose.
- Service of this equipment should be performed by qualified service personnel.
- No rigid conduit.

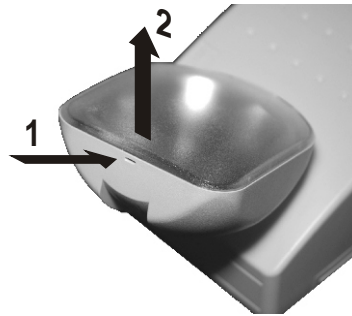
SAVE THESE INSTRUCTIONS

INSTALLATION

TO OPEN COVER



TO OPEN LAMP



Transformer Inputs:

=====

BLACK - 120V
WHITE - Common
RED - 277V

IMPORTANT NOTE:

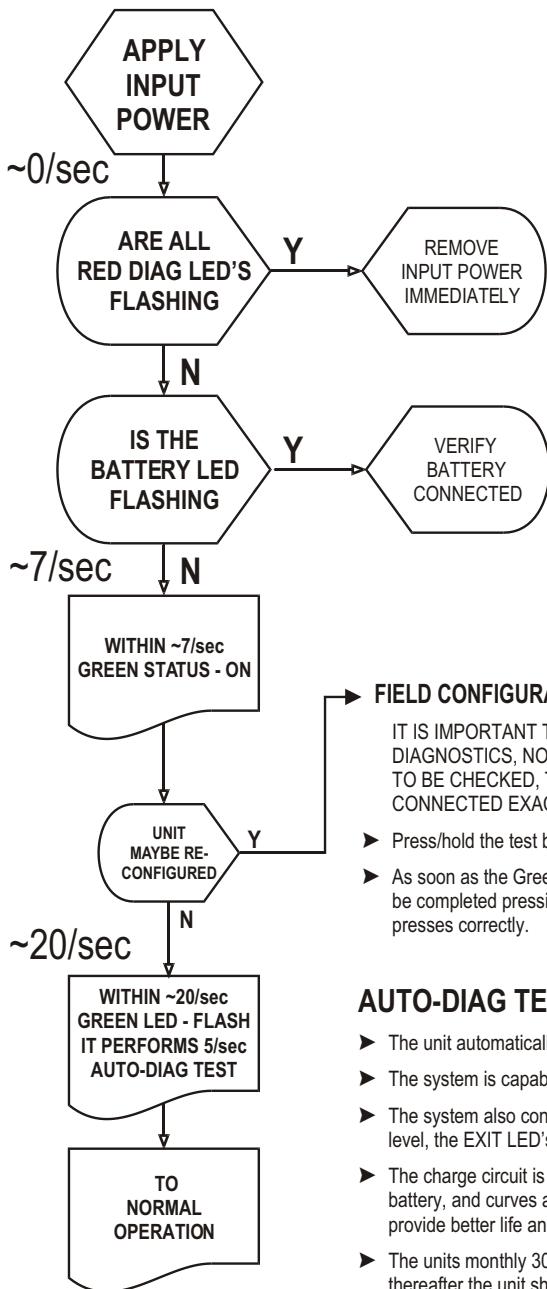
REMOVE THE INPUT POWER IMMEDIATELY IF ALL RED LED'S ON THE OP-PANEL FLASH: This indicates that the input power is incorrectly wired, and needs to be corrected. IF 277 is applied to the 120 tap for more than 7/sec, then the fusible-link may open requiring the transformer to be replaced. Note that this condition is not covered by warranty.



WALL / CEILING INSTALLATION:

- ▶ **WALL MOUNT**> Always verify the input voltage source. Open front cover as shown above. Route the required transformer input wires (BLACK=120V, WHITE=common, RED=277V) out through the center K/O and make input connection in the box. Simply use the Box pattern K/O's in the back panel as needed to mount to wall box and secure unit to the wall. If the unit is shipped with the battery disconnected, connect/verify at this time the battery is connected to the BAT location on the main PCA. Connect the small transformer cable to the PCA at the XFMR location and replace/snap covers, then proceed to Power-Up Sequence...If needed you may secure the exit backplate to the wall with appropriate anchors.
- ▶ **CEILING MOUNT**> In order to mount to a ceiling, the CEILING KIT P/N: "CCFCK" is required. It provides for stable support of emergency combo unit using the threaded posts and hardware provided. It also provides a wire chase to the electrical box above the ceiling where the input wires (BLACK=120V, WHITE=common, RED=277V) may be connected.

Normal Power-Up Sequence



IMPORTANT NOTE:

REMOVE THE INPUT POWER IMMEDIATELY IF ALL RED LED'S ON THE OP-PANEL FLASH. This indicates that the input power is incorrectly wired, and needs to be corrected. IF 277 is applied to the 120 tap for more than 7/sec, then the fusible-link may open requiring the transformer to be replaced. Note that this condition is not covered by warranty.

IF BATTERY LED FLASHING AFTER POWER-UP:

- ▶ 1) Most likely the battery is not connected; verify that it is connected to the BAT location of the main PCA.
- ▶ 2) If the battery is connected, then it is faulty and needs to be replaced.

FIELD CONFIGURABLE REMOTES:

Presses	Description of Configuration
▶ 5	Internal Lamps only DEFAULT
▶ 6	Internal and Remote
▶ 7	Remote Lamps only

FIELD CONFIGURABLE REMOTES:

IT IS IMPORTANT TO REMEMBER THAT THIS CONFIGURING ONLY AFFECTS WHAT IS CHECKED BY THE DIAGNOSTICS, NOT WHAT IS ACTIVATED. IF YOU POPULATE LAMPS THAT YOU HAVE NOT CONFIGURED TO BE CHECKED, THEN SOME ERRORS MAY OCCUR. THE CONFIG MUST MATCH WHAT YOU HAVE CONNECTED EXACTLY

- ▶ Press/hold the test button for 6/sec until the Green goes out.
- ▶ As soon as the Green comes back on, start pressing the number of times for the desired configuration. You must be completed pressing before it starts flashing/Green auto test within ~10/sec, or it may not have read your presses correctly.

AUTO-DIAG TESTING:

- ▶ The unit automatically performs diag testing at each power-up, and initializes itself.
- ▶ The system is capable of instantaneously detecting lamp failures, which is indicated by a flashing LAMP LED.
- ▶ The system also constantly monitors and controls all functions: the charging circuit, the battery, the input power level, the EXIT LED's, and operator manual tests.
- ▶ The charge circuit is computer controlled by an algorithm that is monitoring the environment, levels of the battery, and curves associated to each. The system learns these parameters and then remembers them to provide better life and performance of the emergency lighting system.
- ▶ The units monthly 30/min discharge testing is randomized according to UL924. Then within each 30/day period thereafter the unit shall perform the 30/min test.

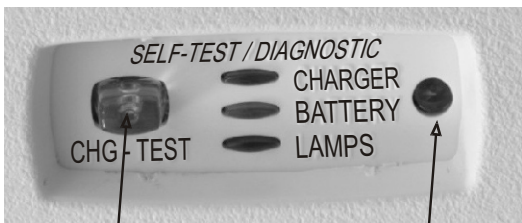
- ▶ It is normal for the CHARGER LED to go ON solid right after the power-up sequence from installation.
- ▶ This indicates the battery is charging, and the LED will go out when the battery is at full charge (this usually occurs within 24-96 hours after installation).
- ▶ The charger LED may cycle from off to on solid as the system charging algorithm dictates. This is normal.
- ▶ Before initiating manual tests, allow the system to fully charge until the CHARGER LED is off.

NORMAL OPERATION / MANUAL TESTS

OP-PANEL INDICATORS / OPERATION:

- ▶ **GREEN - Status:** Solid indicates system normal and charging current from the input source is available.
- ▶ **NOTE:** To reset/cancel a test, simply press the button once during any test.
- ▶ **1 Press:** performs a 5/sec brief test, all lamps operating from battery only.
- ▶ **2 Presses:** performs a 1/min test, all lamps operating from battery only.
- ▶ **3 Presses:** performs a 30/min discharge test, all lamps operating from battery only. The system allows only one 30/min test each 24/hr period.
- ▶ **CONTINUOUS MONITORING:** The system monitors the battery for proper levels and performs periodic low-level charger and battery exercising. Constant LAMP checking, should a LAMP fail, the system will flash the LAMPS indicator until repaired. The charger is fully checked once per day by a internally disconnected / isolated integrity check, at this time the battery is also completely isolated and then checked for proper capacity levels.
- ▶ **OPTIONAL FACTORY EQUIPPED ITEMS:**
 - ▶ **Remote-A:** Unit will be supplied with pigtail connector cable required to control and operate a remote of up to 6/w (per wiring diagram).
 - ▶ **Re-strike Time Delay:** After a power failure and power is restored, the lamps will remain lighted for a 15/min period (provided battery capacity remains).
 - ▶ **Remote Control:** To operate, use a laser pen passing the laser over the remote sensor; simply duplicate the manual button (1, 2, 3) pushes.
 - ▶ **Simulated Load:** This option provides for all un-attended / automatic testing to be run without illuminating the lamps eliminating any interruptions in the workplace and preserving lamp life due to not burning them in testing.

TROUBLE INDICATIONS / TROUBLESHOOTING



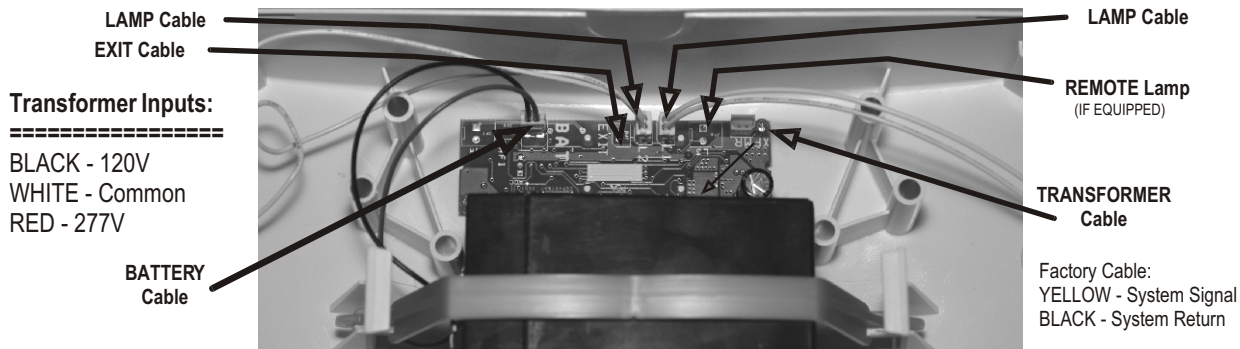
TEST Button

REMOTE SENSOR (IF EQUIPPED)

OP-PANEL INDICATORS:

- ▶ **GREEN - Status:** Solid indicates system normal and flashes during any manual/auto test cycle.
- ▶ **RED - CHARGER FLASHING:** a charger failure requires the main system PCA to be replaced.
- ▶ **RED - BATTERY FLASHING:** battery may be disconnected or if it is connected replacement is needed.
- ▶ **RED - LAMPS FLASHING:** indicates that a Lamp(s) has failed.

WIRING INFORMATION



PCA Configuration CODE (see front page for the table of codes)