

### SAFETY WARNINGS

### IMPORTANT SAFETY INFORMATION

**! DANGER** Risk of shock. Disconnect power before installation.  
*DANGER- RISQUE DE CHOC- COUPER L'ALIMENTATION AVANT L'INSTALLATION*

**! WARNING** Risk of fire or electric shock. LED Retrofit Kit installation requires knowledge of luminaires electrical systems. If not qualified, do not attempt installation. Product must be installed in accordance with NEC or your local electrical code. If you are not familiar with these codes and requirements, contact a qualified electrician.

*ATTENTION- Risque d'incendie ou de choc électrique. L'installation du kit upgrade LED exige la connaissance des systèmes électriques pour luminaires. Si non qualifié, ne tentez pas d'installation. Ce produit doit être installé conformément à NEC ou votre code électrique local. Si vous n'êtes pas familier avec ces codes et ces exigences, veuillez contacter un électricien qualifié.*

**! WARNING** Risk of fire or electric shock. To prevent wiring damage or abrasion, do not expose wires to the edge of sheet metal or any other sharp objects.  
*ATTENTION- Pour éviter les dégâts de câblage par l'abrasion, ne pas mettre en contact les fils électriques avec des bords de tôle ou d'autres objets pointus.*

**! WARNING** Risk of fire or electric shock. Check the existing wiring for damage before installing upgrade kit. Do not install if existing wires are damaged.  
*ATTENTION- Risque d'incendie ou de choc électrique. Vérifier si le câblage existant n'est pas endommagé avant l'installation du kit upgrade LED. Ne pas installer si des fils sont endommagés.*

**! WARNING** Risk of fire or electric shock. Luminaire wiring and electrical parts may be damaged when drilling for installation of the LED upgrade kit. Check for enclosed wiring and components.  
*ATTENTION- Risque d'incendie ou de choc électrique. Câblage électriques peuvent être endommagés lors du perçage pour l'installation du kit upgrade LED. Vérifier les fils et composants.*

**! WARNING**

SUITABLE FOR DRY LOCATIONS.  
 NOT FOR USE WITH PHASE CUT DIMMERS.  
 CONVIENT AUX EMPLACEMENTS HUMIDES.  
**NE PAS UTILISER AVEC GRADATEUR À COUPURE DE PHASE.**

Risk of fire or electric shock. Install this kit only in luminaires that have the construction features and dimensions shown in the photographs and/or drawings.  
*ATTENTION- Risque d'incendie ou de choc électrique. Installez ce kit seulement dans les luminaires qui ont les caractéristiques de construction et les dimensions dans les photographies ou les dessins de la page suivante.*

**Only the holes indicated in the photographs or drawings may be made or altered as a result of the kit installation. Do not leave any other holes open in a wiring enclosure or electrical component.**  
*Seulement les trous indiqués dans les photographies ou les dessins peuvent être faits ou altérés pour l'installation du kit upgrade LED. Ne laissez aucun trou ouvert dans le compartiment électrique.*

**NOTE** THE RETROFIT KIT IS ACCEPTED AS A COMPONENT OF A LUMINAIRE WHERE THE SUITABILITY OF THE COMBINATION SHALL BE DETERMINED AUTHORITIES HAVING JURISDICTION. LE NÉCESSAIRE DE MODERNISATION EST ACCEPTÉ À TITRE DE COMPOSANT D'UN LUMINAIRE LORSQUE LA PERTINENCE DE LA COMBINAISON DOIT ÊTRE DÉTERMINÉE PAR LES AUTORITÉS COMPÉTENTES.

### LED Driver Compatibility Requirements

Qty of Lamps	Kit Part Number 1800 Lumens/Lamp	Driver Rating		Input Voltage	Drivers Catalog#
		Current	Voltage		
1	LR14T5-18L8xx-DU	260mA	46V	120-277V	D70C20UNVPW-C
	LR14T5-18L8xx-DU-XCT				D70C20UNVPWX12-C
2	LR24T5-36L8xx-DU	520mA	46V	120-277V	D10CC30UNVPW-C
	LR24T5-36L8xx-DU-XCT				D10CC30UNVPWX12-C
3	LR34T5-54L8xx-DU	780mA	46V	120-277V	D15CC55UNVPW-C
	LR34T5-54L835-DU-XCT				D15CC55UNVPWX12-C
4	LR44T5-72L8xx-DU	1040mA	46V	120-277V	D15CC55UNVPW-C
	LR44T5-72L835-DU-XCT				D15CC55UNVPWX12-C

Qty of Lamps	Kit Part Number 3400 Lumens/Lamp	Driver Rating		Input Voltage	Drivers Catalog#
		Current	Voltage		
1	LR14T5H-34L8xx-DU	480mA	46V	120-277V	D10CC30UNVPW-C
	LR14T5H-34L8xx-DU-XCT				D10CC30UNVPWX12-C
2	LR24T5H-68L8xx-DU	960mA	46V	120-277V	D15CC55UNVPW-C
	LR24T5H-68L8xx-DU-XCT				D15CC55UNVPWX12-C
3	LR34T5H-10K8xx-DU	1440mA	46V	120-277V	D21CC80UNVPW-C
	LR34T5H-10K8xx-DU-XCT				D21CC80UNVPWX12-C

xx: 35/3500K, 40/4000K, 50/5000K

**Module (Lamp) p/n: LR4FT5M32L/8xxA**

### Bluetooth Control:

Included with models having the XCT suffix

Catalog #: BT-LRT-B

LED Retrofit Kit Model Number	Retrofitted Fluorescent Luminaire Type(s)
LR14T5H-32Lxxy-DDU LR24T5H-64Lxxy-DDU	<ul style="list-style-type: none"> <li>• 3 lamp linear fluorescent, lensed, recessed strip channel luminaires, Type IC, 31°C max ambient, overall external dimensions of 47.5 by 5.875 by 3.75 inches and internal wiring compartment dimensions overall 5.5 by 1.0 by 46.5 inches</li> <li>• Luminaires fluorescents linéaires à 3 lampes, à lentilles, encastrés, type IC, température ambiante maximale de 31 °C, dimensions extérieures globales de 47,5 x 5,875 x 3,75 pouces et dimensions globales du compartiment de câblage interne 5,5 x 1,0 x 46,5 pouces</li> </ul>
LR14T5-18Lxxy-DU LR14T5-18Lxxy-DU-XCT LR14T5H-34Lxxy-DU LR14T5H-34Lxxy-DU-XCT	<ul style="list-style-type: none"> <li>• Single lamp non-lensed strip light with minimum wiring compartment dimensions of 2-1/8 by 1-1/2 by 48 inches, suitable for damp locations, maximum 40°C ambient rating.</li> <li>• Bande lumineuse sans lentille à lampe unique avec des dimensions minimales du compartiment de câblage de 2-1/8 par 1-1/2 par 48 pouces, adaptée aux endroits humides, température ambiante maximale de 40 °C.</li> </ul>
LR24T5-36Lxxy-DU LR24T5-36Lxxy-DU-XCT LR24T5H-68Lxxy-DU LR24T5H-68Lxxy-DU-XCT All combinations of two one-lamp kits	<ul style="list-style-type: none"> <li>• Dual lamp non-lensed strip light with minimum wiring compartment dimensions of 2-1/8 by 1-1/2 by 48 inches, suitable for damp locations, maximum 40°C ambient rating.</li> <li>• Bande lumineuse sans lentille à double lampe avec des dimensions minimales du compartiment de câblage de 2-1/8 par 1-1/2 par 48 pouces, adaptée aux endroits humides, température ambiante maximale de 40 °C.</li> <li>• Dual lamp lensed vaportight fixture with minimum dimensions of 4-1/2 by 6-1/2 by 49-5/8 inches, suitable for damp locations, maximum 40°C ambient rating.</li> <li>• Luminaire étanche à la vapeur à double lampe avec lentille de dimensions minimales de 4-1/2 x 6-1/2 x 49-5/8 pouces, adapté aux endroits humides, température ambiante maximale de 40 °C.</li> </ul>
LR34T5-54Lxxy-DU LR34T5-54Lxxy-DU-XCT LR34T5H-10Kxxy-DU LR34T5H-10Kxxy-DU-XCT	<ul style="list-style-type: none"> <li>• 3 lamp linear fluorescent, lensed, recessed strip channel luminaires, Type IC, 35°C max ambient, overall external dimensions of 47.5 by 5.875 by 3.75 inches and internal wiring compartment dimensions overall 5.5 by 1.0 by 46.5 inches</li> <li>• Luminaires fluorescents linéaires à 3 lampes, à lentilles, encastrés, type IC, température ambiante maximale de 35 °C, dimensions extérieures globales de 47,5 x 5,875 x 3,75 pouces et dimensions globales du compartiment de câblage interne 5,5 x 1,0 x 46,5 pouces</li> </ul>
	<ul style="list-style-type: none"> <li>• 3 lamp louvred or non-louvred linear fluorescent high bay fixture with minimum wiring compartment dimensions of 46-1/8 by 2-3/8 by 1-7/8 inches, suitable for damp locations, maximum 40°C ambient rating.</li> <li>• Luminaire fluorescent pour grande hauteur linéaire à 3 lampes ou sans persiennes avec des dimensions minimales du compartiment de câblage de 46-1/8 x 2-3/8 x 1-7/8 pouces, adapté aux endroits humides, température ambiante maximale de 40 °C.</li> </ul>
LR44T5-72Lxxy-DU LR44T5-72Lxxy-DU-XCT	<ul style="list-style-type: none"> <li>• 4 lamp non-lensed linear fluorescent high bay fixture with minimum wiring compartment dimensions of 47-3/4 by 2-3/16 by 1-5/8 inches, suitable for damp locations, maximum 40°C ambient rating.</li> <li>• Luminaire fluorescent pour grande hauteur linéaire à 4 lampes sans lentille avec des dimensions minimales de compartiment de câblage de 47-3/4 x 2-3/16 x 1-5/8 pouces, adapté aux endroits humides, température ambiante maximale de 40 °C.</li> </ul>
One and two lamp kit combinations	<ul style="list-style-type: none"> <li>• 3 lamp linear fluorescent, lensed, recessed strip channel luminaires, Type IC, 35°C max ambient, overall external dimensions of 47.5 by 5.875 by 3.75 inches and internal wiring compartment dimensions overall 5.5 by 1.0 by 46.5 inches</li> <li>• Luminaires fluorescents linéaires à 3 lampes, à lentilles, encastrés, type IC, température ambiante maximale de 35 °C, dimensions extérieures globales de 47,5 x 5,875 x 3,75 pouces et dimensions globales du compartiment de câblage interne 5,5 x 1,0 x 46,5 pouces</li> <li>• 3 lamp louvred or non-louvred linear fluorescent high bay fixture with minimum wiring compartment dimensions of 46-1/8 by 2-3/8 by 1-7/8 inches, suitable for damp locations, maximum 40°C ambient rating.</li> <li>• Luminaire fluorescent pour grande hauteur linéaire à 3 lampes ou sans persiennes avec des dimensions minimales du compartiment de câblage de 46-1/8 x 2-3/8 x 1-7/8 pouces, adapté aux endroits humides, température ambiante maximale de 40 °C.</li> </ul>
Dual 3 lamp kits All 2 and 4 lamp kit combinations	<ul style="list-style-type: none"> <li>• 6 lamp non-lensed and non-louvred linear fluorescent high bay fixture with minimum wiring compartment dimensions of 46-1/8 by 2-3/8 by 1-7/8 inches, suitable for damp locations, maximum 40°C ambient rating.</li> <li>• Luminaire fluorescent linéaire à 6 lampes sans lentille et sans persiennes avec des dimensions minimales du compartiment de câblage de 46-1/8 x 2-3/8 x 1-7/8 pouces, adapté aux endroits humides, température ambiante maximale de 40 °C .</li> <li>• 6 lamp lensed linear fluorescent vaportight fixture with overall dimensions of 52 by 6 by 14-5/8 inches, suitable for wet locations, maximum 40°C ambient rating.</li> <li>• Luminaire étanche à la vapeur fluorescent linéaire à 6 lampes avec des dimensions globales de 52 x 6 x 14-5/8 pouces, adapté aux endroits humides, température ambiante maximale de 40 °C.</li> </ul>

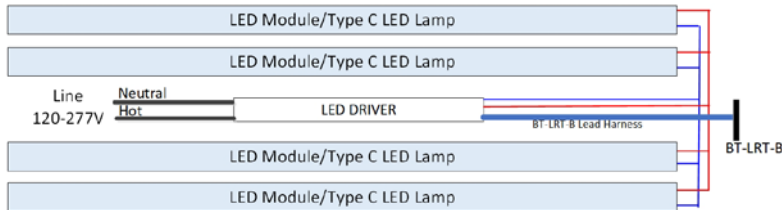
### INSTALLATION

- STEP 1: Disconnect Power to the fixture
- STEP 2: Remove existing lamps, ballast cover plate, and ballast. Leave existing wire in place and as long as possible. Replace lamp holders if necessary.
- STEP 3: Verify that the luminaire is connected to the ground wire from the AC supply.
- STEP 4: Secure the driver into the fixture. Use a self-tapping screw (not provided) if necessary.
- STEP 5: Connect existing leads to the driver as shown. The lamps are connected and operated in parallel for both ends of the lamps. Wires should be 18AWG solid conductor with ¼" strip length.
- STEP 6: Connect the BT-LRT-B controller and mount it adjacent to the LED tubes, outside of the ballast wiring channel in recessed troffers (where applicable).
- STEP 7: Insert the line and neutral wires into their connectors.
- STEP 8: Replace the ballast cover plate, take care not to pinch wires.
- STEP 9: Insert the lamps with the label side facing the back of the fixture.
- STEP 10: Place relamp label at a visible location in the fixture. Close or replace lens and secure latches or other fastening means.
- STEP 11: Restore power and confirm lamps are operating properly.

### BT-LRT-B INSTALLATION (where applicable)

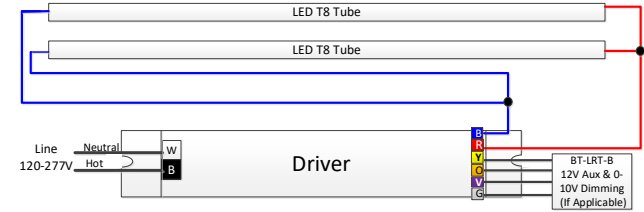
The sensor has a magnet which allows for it to be mounted to the metal tray or panel of the luminaire. The BT-LRT-B should not be mounted within the ballast channel where it is completely enclosed in metal. The leads of the BT-LRT-B are to be connected to the driver as shown in the wiring diagram.

For installation outside of the wiring channel of the fixture the leads should be routed away from the input power leads and not come in contact with the power leads. Leads should exit the end of the channel and the sensor be placed between lamps.

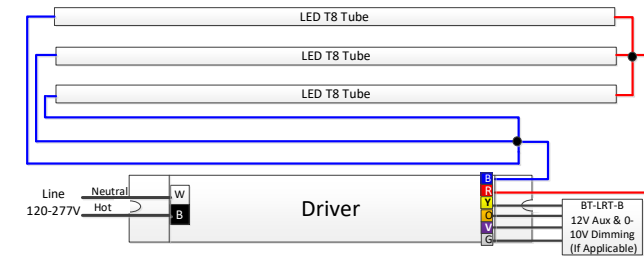


### CONNECTION DIAGRAMS

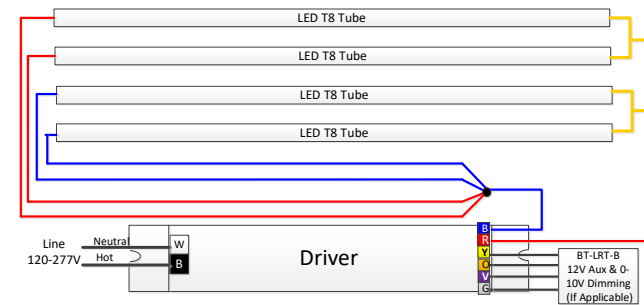
#### 2-LAMP



#### 3-LAMP



#### 4-LAMP



Models without Controls have Violet and Gray leads for 0-10V dimming and do not have aux power.