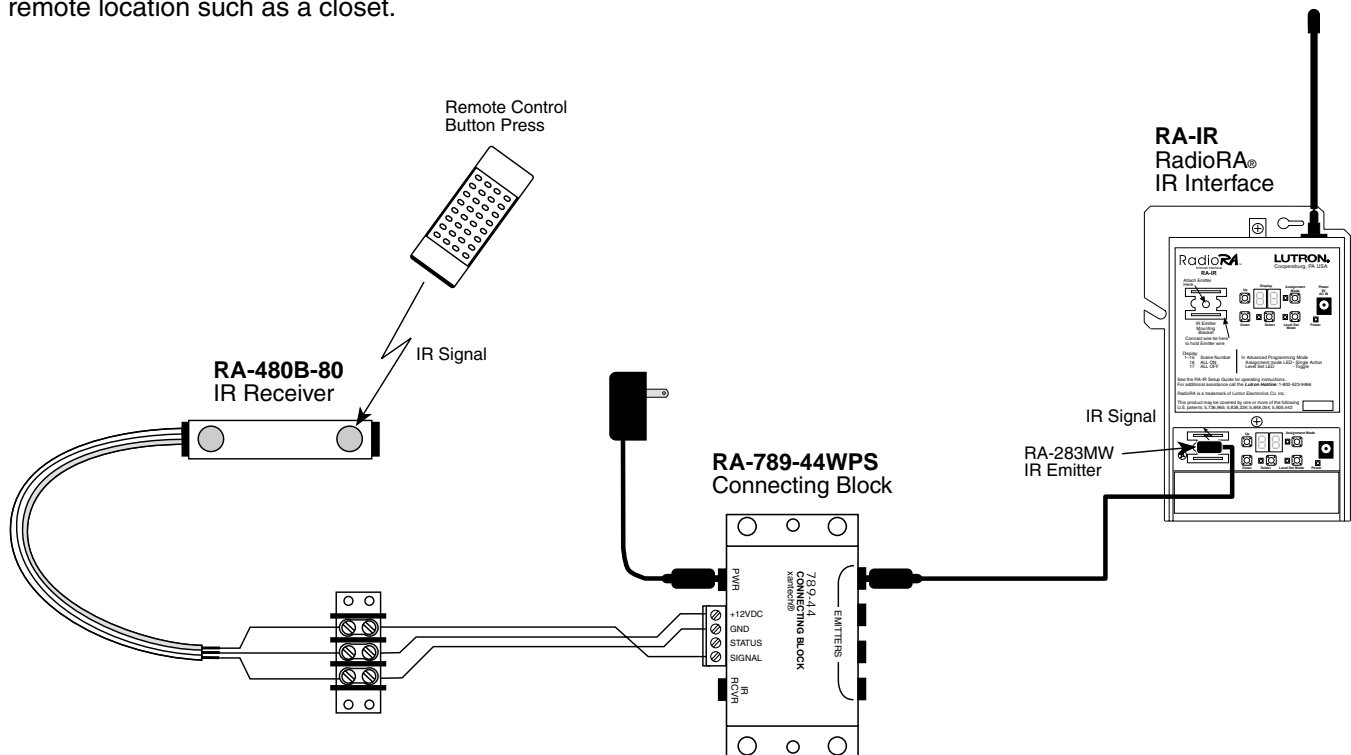


RadioRA® RA-IR-KIT Installation Instructions

Overview

The RadioRA® Infrared Interface (RA-IR) provides direct control of a RadioRA® system through any learnable universal remote control. Because infrared signals are line of sight, the RA-IR must be in a path of the users remote control. An alternate means of getting the infrared signal from the remote to the RA-IR is via an IR extension system. The IR extension system provides control of the RA-IR when placed in a remote location. An IR extension system includes a small IR receiver, a connecting block, and a small IR emitter. The small IR receiver can be mounted in inconspicuous places such as under shelves, behind speaker grills, or on cabinet ledges. A wire can be run from the IR receiver to the connecting block and the emitter can be plugged into the connecting block and placed inside the RA-IR. The connecting block, small IR emitter, and the RA-IR can be placed in a remote location such as a closet.



Equipment

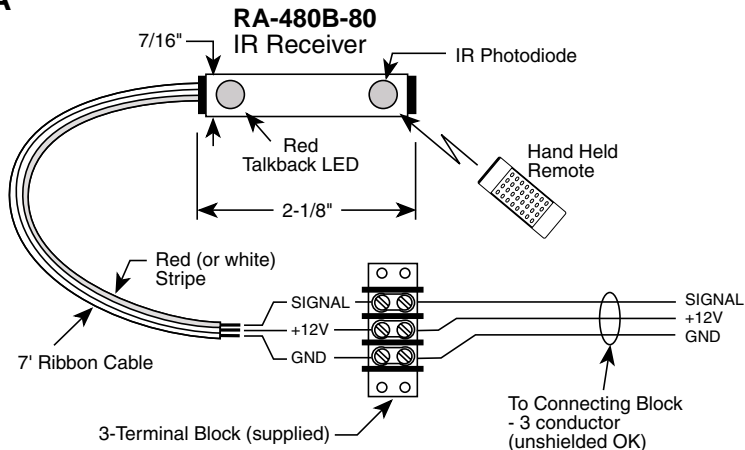
RadioRA® RA-IR-KIT

- RA-789-44WPS- Connecting Block with power supply.
- RA-480B-80- Infrared Receiver (black) – small (7/16" x 5/16" x 2 1/8"), compact fluorescent friendly IR receiver with 7 foot 3 inch conductor cable.
- RA-283MW- Infrared mini-emitter - 1/2 inch emitter with a 6 foot wire to mini plug.

Wiring

RA-480B-80 - Infrared Receiver (black): Mount the receiver in an inconspicuous spot. This must be within a 30 foot line-of-sight from where the customer will be using the remote control. Run the 7 foot ribbon cable wire to the 3-terminal block. From the 3-terminal block you can run 3-conductor cable to the RA-789-44WPS connecting block (Figure A). The 3-conductor cable can extend an additional distance depending on the wire gauge used (24 AWG up to 200 feet, 22 AWG up to 600 feet, 20 AWG up to 2000 feet, and 18 AWG up to 5000 feet).

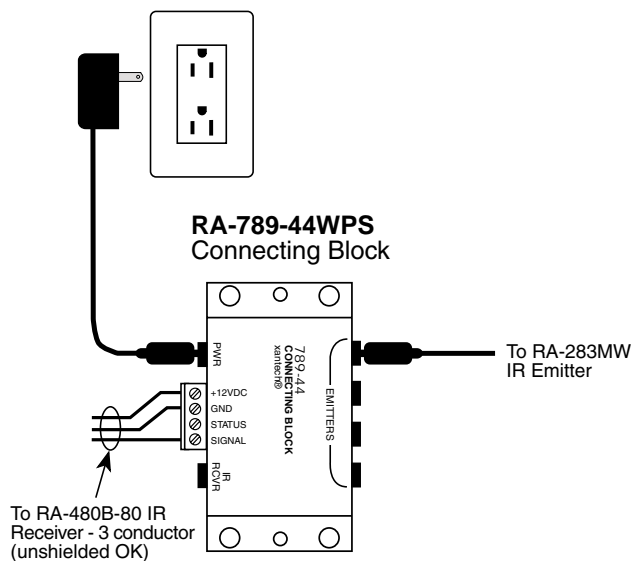
Figure A



- Connect the Red (or White) striped conductor of the IR receiver ribbon cable to the "Signal" screw on the 3-terminal block.
- Connect the Middle conductor of the IR receiver ribbon cable to the "+12VDC" screw on the 3-terminal block.
- Connect the last conductor of the IR receiver ribbon cable to the "GND" screw on the 3-terminal block.

RA-789-44WPS - Connecting block with power supply: Mount the connecting block near the RA-IR. The power supply requires a 120VAC receptacle. The connecting block and the RA-IR may be located in places such as closets. Connect 3-conductor cable from the RA-480B-80 IR receiver and the mini plug from the RA-283MW IR emitter to the RA-789-44WPS connecting block (Figure B).

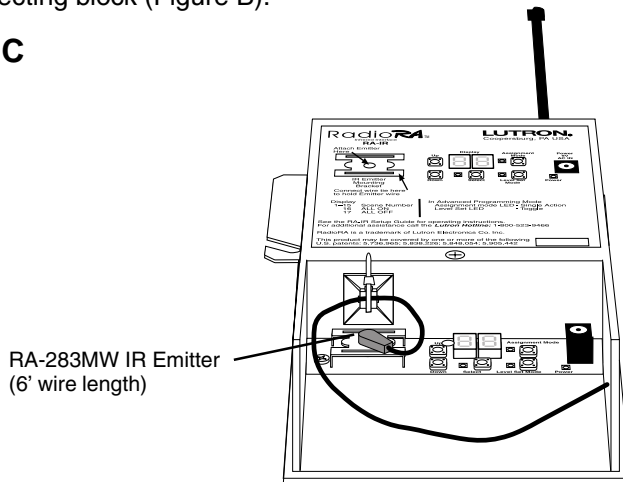
Figure B



- Connect the Red (or White) striped conductor of the IR receiver ribbon cable to the "Signal" screw on the Connecting Block.
- Connect the Middle conductor of the IR receiver ribbon cable to the "+12VDC" screw on the Connecting Block
- Connect the last conductor of the IR receiver ribbon cable to the "GND" screw on the connecting block
- Plug in power supply.
- Plug in IR emitter after attaching to the RA-IR (see next step).

RA-823MW - Infrared mini-emitter: Place the mini emitter through one of the knockouts of the RA-IR. Remove the protective film from the adhesive strip on the emitter shell. Place the adhesive side of the emitter on IR emitter mounting bracket inside the RA-IR, be certain to line up the emitter with the hole in the shield (Figure C). Secure the emitter wire to the anchor with the supplied wire tie. Plug the 1/8" mini plug into any of the emitter terminals on the connecting block (Figure B).

Figure C



Operation

Program up to 15 different scenes into the RA-IR as per the RA-IR Setup and Installation Guide Addendum. Point the remote control with the proper IR coding (see Button Mapping Table) at the IR Receiver (RA-480B-80) and press a programmed scene. The “Red Talkback” LED should light, indicating that the signal has been received. The emitter will blast the RA-IR with the IR code and the corresponding scene number will be indicated on the RA-IR display. The select LED on the RA-IR will flash if the scene is programmed.

IR Mapping

Remotes used with the RA-IR-KIT must already have the proper IR codes programmed or must be able to learn the IR signals in the chart below. Lutron Electronics has available the GRX-IT-WH, GRX-8IT-WH, or GRX-8IT-CSTM which are programmed to work with the Lutron IR systems. The Button Mapping Table shows how the IR codes are distributed and which IR Code’s each Lutron remote transmits.

Button Mapping Table

IR CODE	RadioRA® RA-IR	GRX-IT-WH Control Functions	GRX-8IT-WH Control Functions	GRX-8IT-CSTM Control Functions
1	IR1	X	X	
2	IR2	X	X	
3	IR3	X	X	
4	IR4	X	X	
5	IR5		X	
6	IR6		X	
7	IR7		X	
8	IR8		X	
9	IR9			X
10	IR10			X
11	IR11			X
12	IR12			X
13	IR13			X
14	IR14			X
15	IR15			X
16	ALL ON			X
OFF	ALL OFF	X	X	X

Technical Specifications:
Operating frequency 41.7 kHz

**Need additional assistance? Call the Lutron Technical Support Center 1-800-523-9466
Please provide exact model number when calling.**

**Worldwide Technical and
Sales Assistance**

If you need assistance call the toll-free **Lutron
Technical Support Center**. Please provide exact
model number when calling.

(800) 523-9466 (U.S.A. and Canada)

Other countries call (610) 282-3800

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