

**Dual Accessory Dimmer (Extention Unit)**

**RDDU-252 (Dual Accessory Dimmer)**  
 Rated at: 220-240 V~ 50-250 W/VA per side  
 Compatible with all Rania® Dimmers and Controls.



**Important Notes**

**Please read before installing.**

- Caution:** To avoid overheating and possible damage to other equipment, do not use to control receptacles, fluorescent lighting fixtures, motor-operated or transformer-supplied appliances.
- Turn power OFF at MCB (circuit breaker) or remove fuse before performing any routine maintenance or servicing of lighting circuit.
- Connect earth wire in the backbox to the earth terminal if present (not all products have an earth terminal).
- Install in accordance with all national and local electrical codes.
- Do not paint Dimmer or Dual Accessory Dimmers.
- Dual Accessory Dimmer can not be used individually but must be used in conjunction with a Dimmer or Dual Dimmer in a 2-way/3-way application.
- The Dimmer is overload protected. If the rated wattage is exceeded, power to the circuit will shut off until the Dimmer cools. If this occurs, reduce the wattage connected to the Dimmer.
- Operate between 0 °C and 40 °C. For indoor use only.
- It is normal for the Dimmer to feel warm to the touch during operation.
- Recommended backbox depth is 35 mm.**
- Maximum wire length between the Dimmer and the furthest Dual Accessory Dimmer is 50 m.
- To ensure the best performance, the mains shall be free of noise; in particular, peak voltages exceeding 425 V, and other high frequency noises.
- A separate neutral connection from the load directly back to the breaker panel is required for best performance.
- Clean with a soft damp cloth only. DO NOT** use any chemical cleaners.
- Use fully loaded electronic or magnetic low-voltage transformers for best performance.
- DO NOT** mix magnetic and electronic low voltage transformers on the same dimmed circuit.
- Dimmer may not work with dioded lamps.
- Use only magnetic low voltage transformers with built-in thermal protection.**
- For use with compatible electronic low-voltage loads. For an up to date list of compatible transformers, see our web site at [www.lutron.com/rania/elv](http://www.lutron.com/rania/elv).
- Recommended torque for terminal block screws is 0,5 N·m.

**Technical Assistance**

If you have questions concerning the installation or operation of this product, call **Lutron's Headquarters**. Please provide exact model number when calling.

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**Limited Warranty**

Lutron EA Ltd. ("Lutron EA") warrants each unit to be free from defects in material and workmanship and to perform under normal use and service. To the extent permitted by law, Lutron EA and Lutron Electronics Co. Inc. ("Lutron") make no warranties or representations as to the units except as set forth herein. This warranty shall run for a period of two years from the date of purchase and Lutron's obligations under this warranty are limited to remedying any defect, replacing any defective part or replacement (at Lutron EA's sole option) and shall be effective only if the defective unit is shipped to Lutron EA postage prepaid within 24 months after purchase of the unit. Repair or replacement of the unit does not affect the expiry date of the warranty. This warranty does not cover damage or deficiencies due to abuse, misuse, inadequate wiring or insulation or use or installation other than in accordance with instructions accompanying the unit.

To the extent permitted by law, neither Lutron EA nor Lutron shall be liable for any other loss or damage including consequential or special loss or damages, loss of profits, loss of income, or loss of contracts arising out of or relating to the supply of the unit or the use of the unit and the purchaser assumes and will hold harmless Lutron EA and Lutron in respect of all such loss or damage. Nothing in this warranty shall have the effect of limiting or excluding Lutron EA's or Lutron's liability for fraud or for death or personal injury resulting from its own negligence, or any other liability, if and to the extent that the same may not be limited or excluded as a matter of law.

**This warranty does not affect the statutory rights of consumer purchasers of this product.**

Although every attempt is made to ensure that catalogue information is accurate and up-to-date, please check with Lutron EA before specifying or purchasing this equipment to confirm availability, exact specifications, and suitability for your application. These products may be covered under one or more of the following European patents: EP0587878; the following Hong Kong patent: 1037845; and corresponding patents of other countries. Patents Pending.

Lutron is a registered trademark in the United Kingdom and the Community Trademark System and Rania is a registered trademark in the Community Trademark System.

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**Installation**

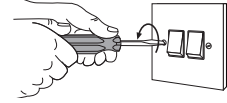
**1** **WARNING:** Turn power OFF at MCB (circuit breaker) or remove fuse.

**2** Remove switch mounting screws. Remove switches from wall.

**Note:** DO NOT disconnect wires from the switches.



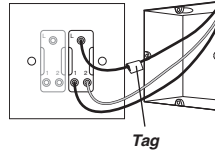
**Caution:** Verify power to each switch is OFF before proceeding.



**3** **Tag the wire(s):**

**Note:** Only one switch is shown to simplify for clarity. Repeat steps for other switch.

**Two-Location control**

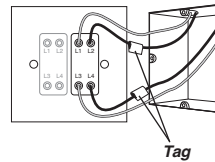


**Two switches controlling a light fixture.**

**TAG** the wire connected to the terminal labeled L or LINE on both switches for identification during wiring. Both switches will be 2-way. Each switch will have insulated wires connected to three terminals.

**See Step 6a when wiring.**

**Three-Location control or more**



**Three or more switches controlling a light fixture.**

Two switches will be 2-way and the rest will be 3-way. The 3-way switch(es) will have insulated wires connected to four terminals.

**TAG** the two 2-way switches as in the Two-Location diagram above.

**TAG** the two same colour insulated wires which are connected to opposite sides of the 3-way switch. Follow this procedure for each 3-way switch.

**See Step 6b when wiring.**

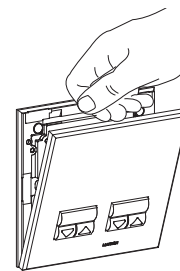
**Note:** Terminal placement may be different on your switch.

**Important Note:**

Your wall switch may have two wires attached to the same screw. Tape these two wires together before disconnecting.

**4** Disconnect switch wires.

**5** Prepare Dual Accessory Dimmer for installation.



**Snap off Front Plate**

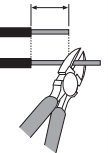


**Important Wiring Information**

**WARNING:** Permanent damage can be caused by overtightening the terminal screws.

Trim or strip backbox wires to 5 mm. Insert wires fully into the terminals and tighten screws. Terminals can take two 1,5 mm<sup>2</sup> or smaller wires.

5 mm



**6** **Wiring the controls.**

**Notes:** Connect earth wire in the backbox to the earth terminal if present (not all products have an earth terminal).

If two wires were taped together, connect both wires to the terminal.

**Note:** Perform one of the following procedures on each set of terminals on the Dual Accessory Dimmer.

## 6a - Two-Location Wiring

### A. Wire the Dimmer or Dual Dimmer

- Connect the earth wire in the backbox to the earth terminal, if present.
- Connect the Tagged wire removed from the switch to terminal L.
- Connect one of the remaining wires removed from the switch to the  $\sim$  1 terminal on the Dual Dimmer (or  $\sim$  terminal on the Dimmer). Note wire colour.
- Connect the remaining wire removed from the switch to terminal 1 (Dual Dimmer has a terminal marked 2 for the second lighting load).

### B. Wire the Dual Accessory Dimmer (RDDU)

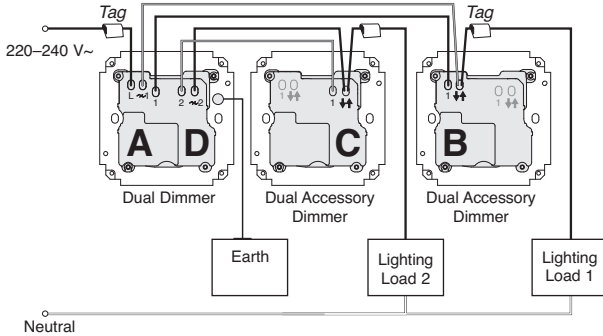
- Connect the Tagged wire removed from the switch to the  $\downarrow\uparrow$  terminal.
- Connect the same colour wire noted in Step A to the same  $\downarrow\uparrow$  terminal as above.
- Connect the remaining wire removed from the switch to the terminal 1 next to the  $\downarrow\uparrow$  terminal used above.

### C. Wire the second Dual Accessory Dimmer (RDDU)

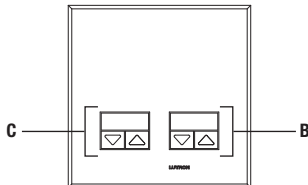
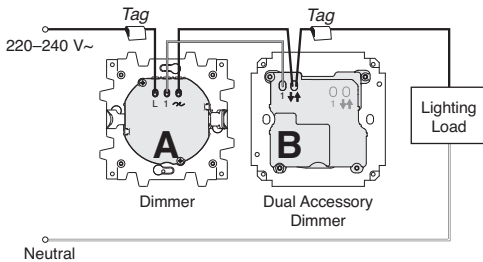
- Connect the Tagged wire removed from the switch to the  $\downarrow\uparrow$  terminal. (This wire goes to the lighting load).
- Connect one of the remaining wires removed from the switch to terminal 1. Note wire colour.
- Connect the remaining wire removed from the switch to the same  $\downarrow\uparrow$  terminal as above.

### D. Wire the second side of the Dual Dimmer

- Insulate end of the Tagged wire removed from the switch.
- Connect the same colour wire noted in Step C to terminal 2.
- Connect the remaining wire removed from the switch to the  $\sim$  2 terminal.



OR



## 6b - Three-Location or more Wiring

### A. Replace 3-way intermediate switch(es) with a Dual Accessory Dimmer (RDDU)

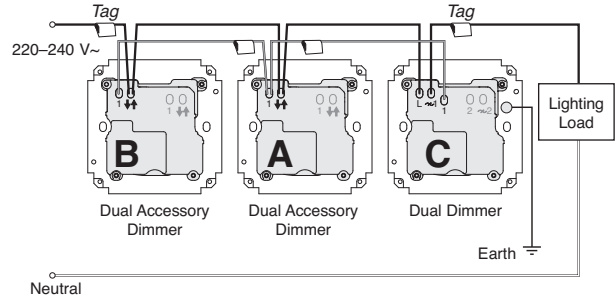
- Connect both Tagged wire removed from the switch to terminal 1.
- Connect the two remaining wires removed from the switch to the  $\downarrow\uparrow$  terminal.

### B. Replace the first 2-way switch with a Dual Accessory Dimmer (RDDU)

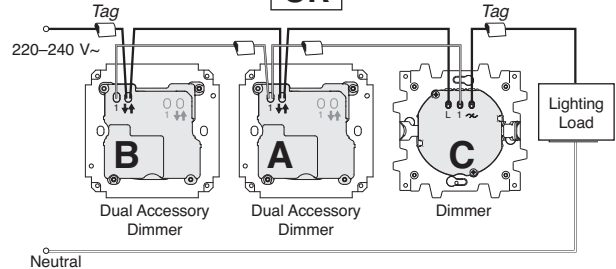
- Connect the Tagged wire removed from the switch to the  $\downarrow\uparrow$  terminal.
- Connect the same colour wire noted in Step A to terminal 1.
- Connect the remaining wire removed from the switch to the same  $\downarrow\uparrow$  terminal as above.

### C. Replace the last 2-way switch with the Dimmer or Dual Dimmer

- Connect the earth wire in the backbox to the earth terminal, if present.
- Connect the Tagged wire removed from the switch to the  $\sim$  1 terminal on the Dual Dimmer (or  $\sim$  terminal on the Dimmer).
- Connect the same colour wire noted in Step A to terminal 1 (Dual Dimmer has a terminal marked 2 for the second lighting load).
- Connect the remaining wire removed from the switch to terminal L.

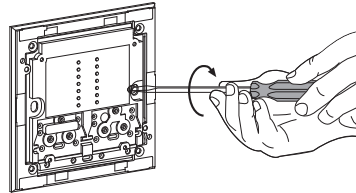


OR



## 7

### Mount and align Dual Accessory Dimmer.

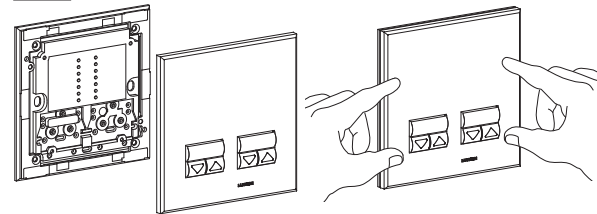


- Secure Dual Accessory Dimmer to the backbox using backbox screws.

**Caution - Do not pinch wires. Do not overtighten mounting screws.**

## 8

### Snap on Front Plate.



Align the Front Plate and the Dual Accessory Dimmer.

Press corners to ensure four snaps engaged.

## 9

### Turn power ON at MCB (circuit breaker) or replace fuse.

## Operation

**Model:** RDDU-252

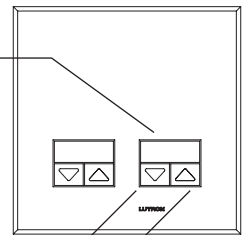
### Tap Button

#### Basic Operation

- **Tap once when unit is off** - Lights brighten smoothly to preset intensity.
- **Tap once when unit is on** - Lights dim smoothly to off.
- **Tap twice quickly** - Lights brighten rapidly to full intensity.

#### Advanced Operation

**Fade to OFF** - Press and hold to activate delayed fade to OFF.



**Lower Raise**  
Press to dim Press to brighten

## Problems

If your Dimmer does not work, check that the light bulb has not burned out before contacting Lutron Technical Assistance.