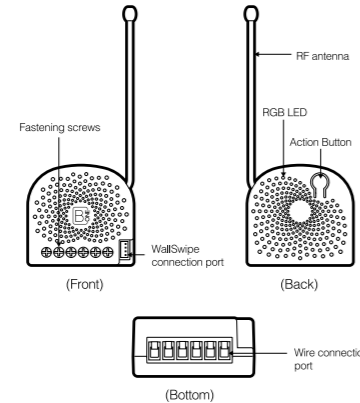


# Smart Dimmer

B1SD01-ZW-IN

**Warning:** Risk of electrical shock. The main circuit breaker or fuse must be shut off during installation. Only a licensed electrician with knowledge and understanding of electrical systems and safety should complete the installation.

## Used in this guide.



## Important safety information.

Please follow the instructions carefully. Failure to follow the recommendations set forth by Blaze Automation Services Pvt Ltd may be dangerous or cause a violation of the law. The manufacturer, importer, distributor, and / or reseller will not be held responsible for any loss or damage resulting from not following any instructions in this guide or in other materials.

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Smart Dimmer current can not exceed 1.2 amps. Its maximum rated power output is 144 watts for 110 volt models, and 278 watts for 230 volt models and comparable.

## Pre-installation checks.

Smart Dimmer has been designed to be able to dim the following bulbs: incandescent, halogen (with or without an electronic transformer), dimmable LEDs (leading edge or trailing edge), dimmable fluorescents. Smart Dimmer only offers on/off control to non-dimmables bulbs, CFLs with an electronic ballast, LED bulbs including separately controllable connected-bulbs.

Smart Dimmer works with or without neutral wiring; determine which installation your light switch's wiring requires and follow any subsequent steps accordingly.

If your lighting utilises less load than is required by the specifications of Smart Dimmer, you may also need to install Bypass for Smart Dimmer. For an installation with neutral, the minimum load is 10 watts. For an installation without neutral, the minimum load is 20 watts.

If your lighting utilises more load than the 144 watts Smart Dimmer can handle, it'll automatically turn off in order to prevent damage to itself and your home. If you are unsure of your lighting's total load, you can calculate the total value of any lights working on the circuit/switch; e.g. 4 x 40W incandescent bulbs = 160W load. Should the maximum load exceed 144W, replace bulbs with energy saving models appropriately.

## Quick start.

The following will step you through installing Smart Dimmer with an existing wall switch and connecting to your Z-Wave network.

To complete the installation you'll need Smart Dimmer, 2 x 18AWG copper wires, voltage tester, Philips head screwdriver.

1. Shut off electricity to switch at circuit breaker.
2. Detach light switch from wall.
3. Turn on electricity to switch at circuit breaker.
4. Use voltage tester to identify Live and Load wires.
5. Shut off electricity to switch at circuit breaker. Confirm that power is off using voltage tester to check Live wire and terminal. No electricity should be present.
6. Disconnect wires from back of switch. Safety: Ensure that the wires will not touch each other at any stage of installation; bend and spread them apart to avoid any potential short circuit.
7. If installing with neutral wiring, identify the Neutral wire.
8. Ensure that you have enough length on each wire for the following steps; gently pull at wires to lengthen them if needed.
9. Connect the Live wire to Smart Dimmer's L (first) terminal. Tighten the terminal's screw if no neutral wires are present.

10. If installing with neutral wiring, connect the Neutral wire to Smart Dimmer's N (second) terminal. Otherwise, bridge L and N terminals together. Tighten the terminal's screw.
11. Connect the Load wire to Smart Dimmer's OUT (third) terminal. Tighten the terminal's screw.
12. 0.27"/5mm of copper within the 2 x 18AWG copper wires should be exposed. Use a wire stripper to remove insulation if needed. Cut to shorten if necessary.
13. Connect the 2 x 18AWG wires to your wall switch. The wires are used for signalling Smart Dimmer, so it doesn't matter which terminal of the switch you attached them to.
14. Connect 1 x 18AWG wire from wall switch to Smart Dimmer's COM (fourth) terminal. Tighten the terminal's screw.
15. Connect 1 x 18AWG wire from wall switch to Smart Dimmer's S1 (fifth) terminal. Tighten the terminal's screw.

16. **Safety:** Ensure that no wires touch each other.
17. Return to circuit breaker and temporarily turn lighting circuit back on.
18. Set your Z-Wave gateway into its 'add device' mode in order to connect Smart Dimmer to your Z-Wave system. Refer to the gateway's manual if you are unsure of how to perform this step.
19. Press Action Button on Smart Dimmer; its LED will blink green.
20. When Smart Dimmer successfully joins your Z-Wave network its LED will show a solid colour. Should the LED emit the colour red for 2 seconds and then alternate through a rainbow of colours, it has been unable to join your Z-Wave network; repeat steps 18 to 19 and please contact us for further support if needed.
21. Rapidly press Smart Dimmer's button 4 times within 2 seconds to activate switch identification mode; its LED should flash blue rapidly.

22. Toggle external switch once; wait 10 seconds.
23. Test external switch to determine if switch is working properly and able to control Smart Dimmer.
24. **Safety:** return to main circuit breaker and turn off power to lighting circuit again.
25. Push Smart Dimmer and wires back into wall's junction box.
26. Re-attach wall switch.
27. Return to circuit breaker and turn lighting circuit back on.

Smart Dimmer is now a part of your Z-Wave home control system. You can configure it and its automations, and monitor its energy consumption via your Z-Wave system; please refer to your software's user guide for precise instructions.

### Get help & learn more.

Should you encounter any problem with Dual Relay, visit [www.b1hub.com](http://www.b1hub.com) or contact our support team via [support@blazeautomation.com](mailto:support@blazeautomation.com).

**Disposal guidelines and WEEE.** B.One devices may contain batteries; remove when not in use. Do not dispose of device as unsorted municipal waste, use separate collection facilities. Contact your local government for further information.

**One-Year Limited Warranty.** Blaze Automation Services Pvt Ltd warrants included B.One branded hardware device when purchased new and delivered in new condition and in its original container against defects in materials and workmanship for one year from the date of original purchase from an authorized reseller when purchased and used in the region of original export. In line with the terms of sales between Blaze Automation Services Pvt Ltd and the authorized importer / reseller of this device, any claims against the foregoing warranty are to be handled by the authorized distributor / reseller directly. The foregoing warranty is subject to the proper installation, operation, and maintenance of the device in accordance with installation instructions and the operating manual supplied to customer and further documentation made available digitally. Liquid damage, including, but not limited to, internal liquid damage caused by improper use, closure or affixing of the hardware, is not covered by this warranty. Splash, water, and dust resistance are not permanent conditions and resistance might decrease as a result of normal wear. Not warranted for damage from open flames and heat, and exposure to sun. Not warranted for battery leak damage; always remove all batteries from products that not being used. Blaze Automation Services Pvt Ltd does not warrant against normal wear and tear, nor damage caused by accident or abuse. Please be sure to read this device's support notes, digital materials, and quick start guide fully. Subject to the full terms of obtaining service within 30 days of the manifestation of a problem, if you submit a valid claim under this warranty, Blaze Automation Services Pvt Ltd shall provide further information in obtaining warranty services from the authorized importer and / or seller of this device.

**FCC Notice.** The edition of this device made and certified for the US market and marked as such complies with part 15 of the FCC rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation. The manufacturer is not responsible for any radio or TV interference caused by unauthorized modifications to this equipment. Such modifications could void the user's authority to operate the equipment. This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures: (1) Reorient or relocate the receiving antenna. (2) Increase the separation between the equipment and receiver. (3) Connect the equipment into an outlet on a circuit different from that to which the receiver is connected. (4) Consult the dealer or an experienced radio/TV technician for help (5) Ensure this device and its antenna(s) are not be co-located or operating in conjunction with any other antenna or transmitter.

**RF Exposure Statement.** The device has been evaluated to meet FCC/CE general RF exposure requirement. The device can be used without restriction.

**California Proposition 65. WARNING:** This product contains a chemical known to the State of California to cause birth defects or other reproductive harm. Use only for intended purposes. Do not use for other purposes including, but not limited to, the consumption of food and drinks.

**Declaration of Conformity.** Blaze Automation Services Pvt Ltd declares that Smart Dimmer is in compliance with the essential requirements and other relevant provisions of RED 2014/53/EU, RoHS 2011/65/EU, IEC62321:2008 and EN50581:2012.

