

PHILIPS DDC116 Signal Dimmer Controller



# PHILIPS DDC116 Signal Dimmer Controller Installation Guide

[Home](#) » [Philips](#) » PHILIPS DDC116 Signal Dimmer Controller Installation Guide 

## Contents

- [1 PHILIPS DDC116 Signal Dimmer Controller](#)
- [2 Product Specifications](#)
- [3 Product Usage Instructions](#)
- [4 Frequently Asked Questions \(FAQ\)](#)
- [5 BOX CONTENT](#)
- [6 TOOLS REQUIRED \(NOT INCLUDED\)](#)
- [7 DIMENSION](#)
- [8 INSTALLATION INSTRUCTION](#)
- [9 Service Switch](#)
- [10 IMPORTANT SAFEGUARDS](#)
- [11 Documents / Resources](#)
  - [11.1 References](#)

# PHILIPS

**PHILIPS DDC116 Signal Dimmer Controller**



## Product Specifications

- **Model:** DDC116
- **Product Name:** Signal Dimmer Controller
- **UL Ratings:** UL 2043 Plenum-rated, Chicago Plenum-rated
- **Output Ratings:**
  - **Control Channel Ratings:**
    - **General Use\* Electronic Driver:** 20 A, 277 V
    - **Pilot Duty:** 16 A, 277 V
    - **Motor:** 16 FLA (1 HP), 120 V
    - **DALI Broadcast:** 0-10 V
- **IEC Standards:** IEC Pollution Degree II, IEC Overvoltage Category III

## Product Usage Instructions

### Installation Guidelines

Devices must be installed by a qualified electrician following all national and local electrical and construction codes and regulations.

### Output Load Limitation

To prevent electrical overload, ensure that the total connected load does not exceed the specified output ratings.

### Connection Instructions

Follow the provided color-coded guide for connecting the different terminals:

- **BLACK:** LINE
- **GREEN:** EARTH
- **WHITE:** NEUTRAL
- **RED:** SWITCHED LINE
- **VIOLET:** 0-10 V+ / DA+

- **PINK:** 0-10 V- / DA-

### Emergency System Connection

If connecting to an Emergency or other system, remove the jumper wire between GND and AUX/UL924 terminals. For DMX512, add a 120 Ohm, 0.5 W termination resistor across D+ and D- on the last DMX512 device.

### Frequently Asked Questions (FAQ)

- **What should I do if the Service LED is not turning on?**

Check the wiring connections and ensure the power source is active. If the issue persists, consult a qualified electrician for further assistance.

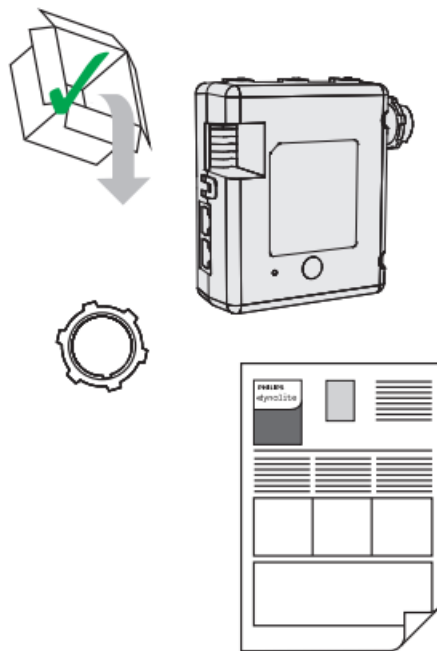
- **Can the product be used outdoors?**

No, this equipment is not suitable for outdoor use as per safety guidelines.

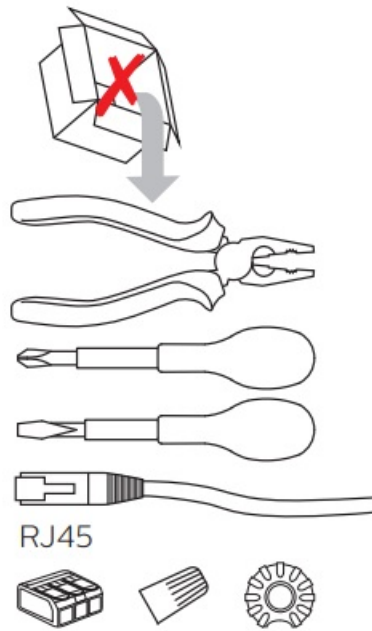
- **How long does the Program Mode last?**

The Program Mode times out after 30 seconds of inactivity, discarding any unsaved changes.

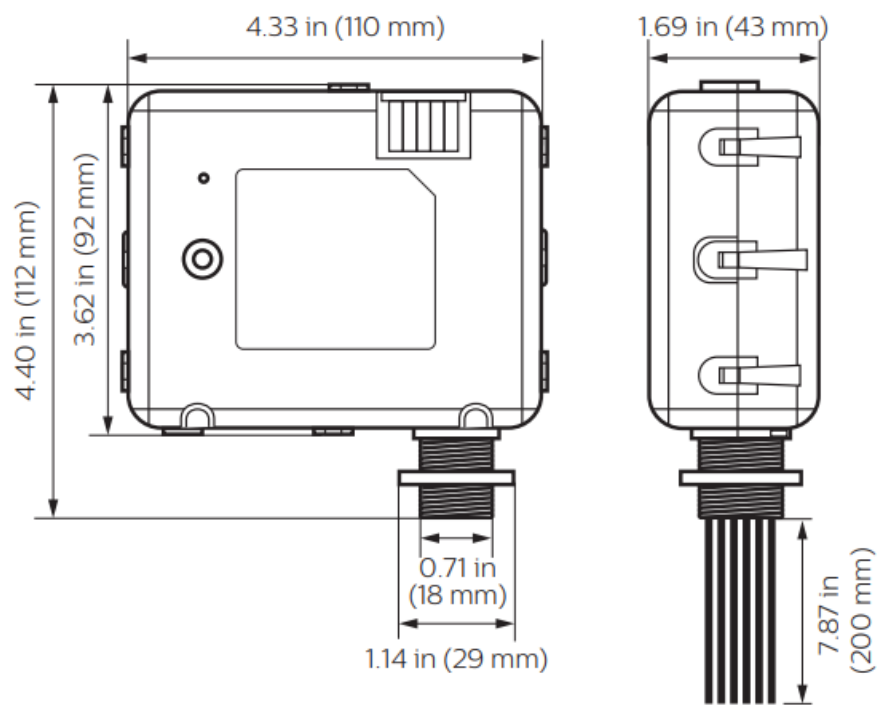
### BOX CONTENT



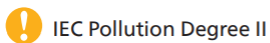
### TOOLS REQUIRED (NOT INCLUDED)




## DIMENSION



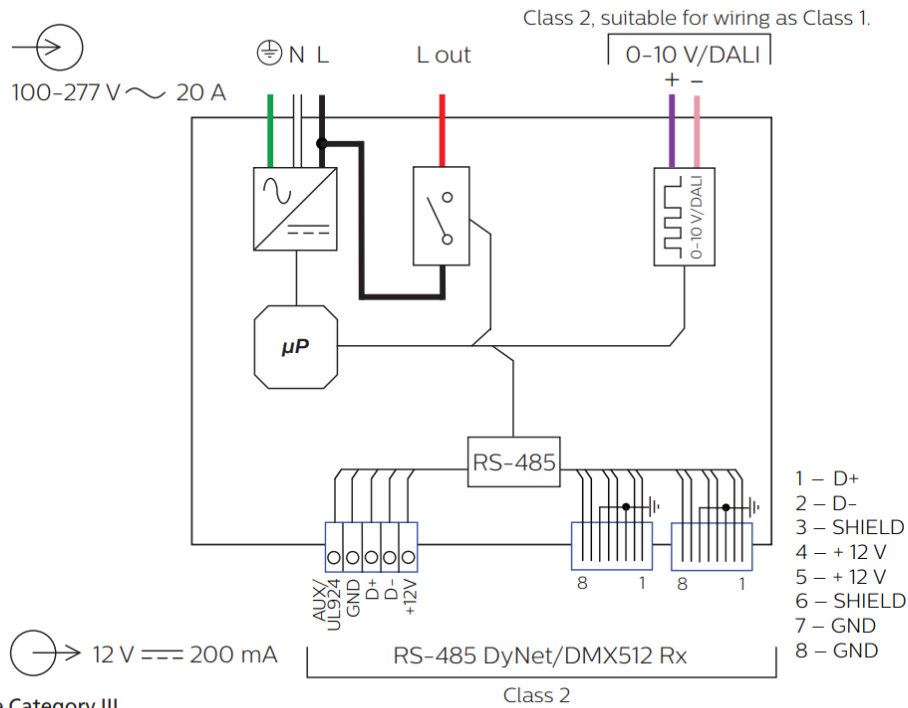
## INSTALLATION INSTRUCTION



<b>DALI</b> Broadcast	$\leq 40$ Guaranteed 100 mA Maximum 250 mA Insulation: basic
<b>0-10 V</b>	Sink 100 mA Source 100 mA

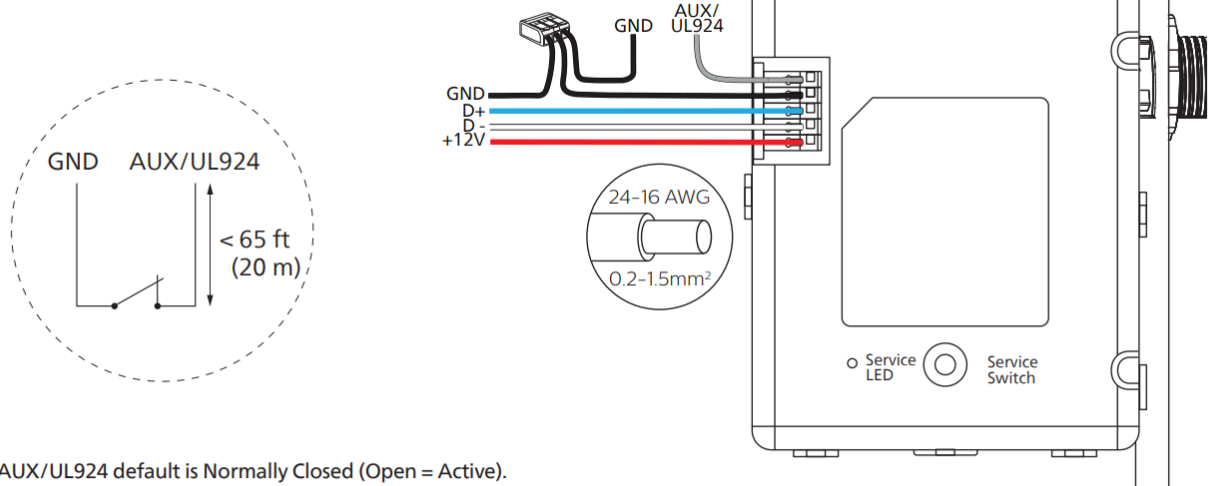
 To avoid electrical overload, total external connected load must not exceed output rating.

4



5

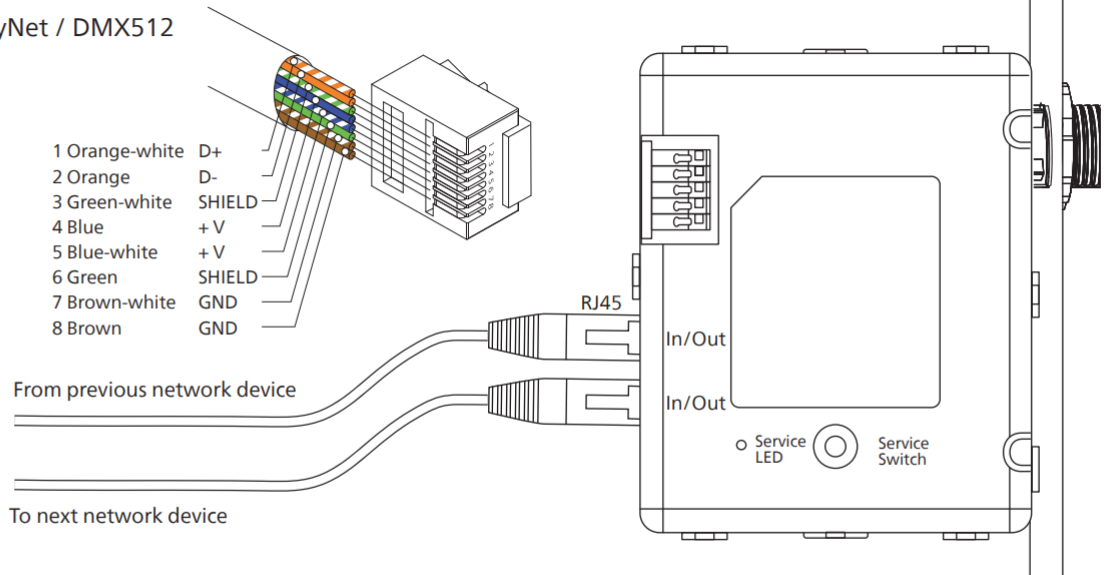
## RS-485 DyNet / DMX512 and UL924



- ⚠ AUX/UL924 default is Normally Closed (Open = Active).
- ⚠ Please remove jumper wire between GND and AUX/UL924 terminals if connecting to Emergency or other system.
- ⚠ For DMX512, add a 120 Ohm, 0.5 W termination resistor across D+ and D- on the last DMX512 device.

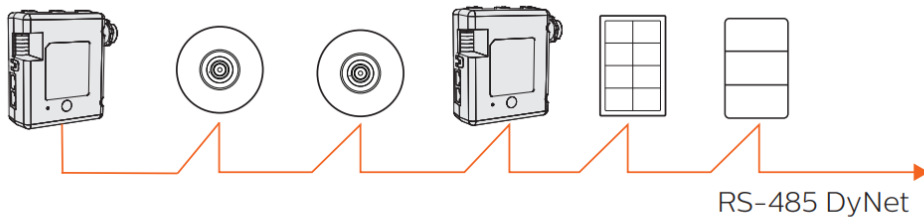
6

## RS-485 DyNet / DMX512

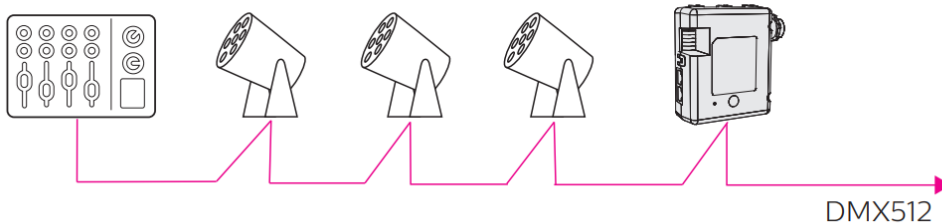


Pin numbering and color in accordance with ANSI/TIA/EIA-568 scheme T568B.

7 A



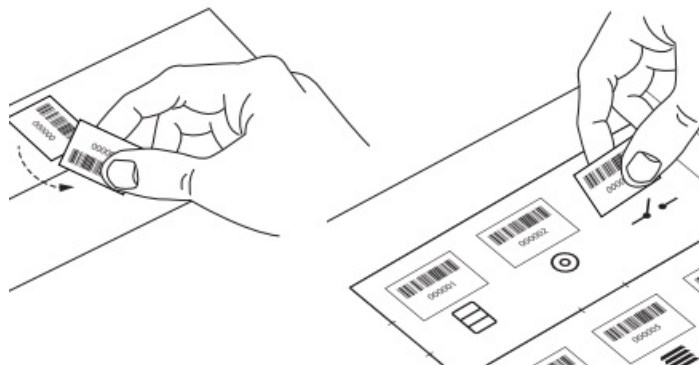
7 B



## Service Switch

- 1 short push – Network ID.
- 3 short pushes – Channel to 100%.
- 4 short pushes – Test Mode (room lights flash for 5 minutes).
  - Push and hold for 2 seconds – toggle control type between 0-10 V (Red LED) and DALI Broadcast (Green LED).
  - Push and hold for 2 seconds – Save control type and exit Test Mode.
- Push and hold for 4 seconds – Program Mode (Blue LED flash count indicates the controller zone assignment).
- 1 short push – cycle through channel numbers (after each push, the flash count indicates the controller zone assignment)\*
  - Channel 1 = Zone 1 Screen/blackboard (default).
  - Channel 2 = Zone 2 Generic Lighting Primary Zone.
  - Channel 3 = Zone 3 Generic Lighting Secondary Zone.
  - Channel 4 = Zone 4 Generic Lighting Primary Daylight Zone.

- Channel 5 = Zone 5 Generic Lighting Secondary Daylight Zone (20% brighter).
  - Channel 6 = Plug load.
  - Push and hold for 4 seconds – save changes and exit Program Mode.
  - Device reboots and starts normal operation.
- \*Program Mode times out after 30 seconds of inactivity, discarding changes.



## IMPORTANT SAFEGUARDS

When using electrical equipment, basic safety precautions should always be followed including the following:  
 READ AND FOLLOW ALL

## SAFETY INSTRUCTIONS

- Do not use outdoors
- Do not use this equipment for other than the intended use.

### SAVE THESE INSTRUCTIONS

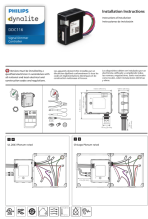
**Caution** – 0-10 V/DALI wires may be either Class 1 or Class 2 depending on the installation and ratings of the connected devices – Class 1 applications are not SELV and should never be considered touch safe. Basic insulation or higher is required between 0-10 V/DALI wires and mains cabling as per local electrical codes.

**Caution** – Any modifications not approved by the manufacturer of this device could void the user's authority to operate this device. FCC and RSS-210 of IC (Industry Canada) Rules – 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 and pursuant to RSS210 of the IC 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: Reorient or relocate the receiving antenna. Increase the separation between the equipment and receiver. Connect the equipment into an outlet on a circuit different from that to which the receiver is connected. Consult the dealer or an experienced radio/TV technician for help. Any modifications not approved by the manufacturer of this device could void the user's authority to operate this device.

This Class B digital apparatus complies with Canadian ICES-003: CAN ICES-3(B)/NMB-3(B). Cet appareil numérique de la Classe B est conforme à la norme NMB-003 du Canada: CAN ICES-3(B)/NMB-3(B).



## Documents / Resources

	<p><a href="#">PHILIPS DDC116 Signal Dimmer Controller</a> [pdf] Installation Guide</p> <p>DDC116 Signal Dimmer Controller, DDC116, Signal Dimmer Controller, Dimmer Controller, Controller</p>
---	---

## References

- [Philips Dynalite - Lighting Controls, Lighting Management](#)
- [User Manual](#)

### Manuals+. [Privacy Policy](#)

This website is an independent publication and is neither affiliated with nor endorsed by any of the trademark owners. The "Bluetooth®" word mark and logos are registered trademarks owned by Bluetooth SIG, Inc. The "Wi-Fi®" word mark and logos are registered trademarks owned by the Wi-Fi Alliance. Any use of these marks on this website does not imply any affiliation with or endorsement.