

Wireless Fixture Controller with Long Range Antenna

Overview

- 1 Channel 0-10VDC Dimming
- Mount in Fixture
- Antenna Rated For IP65
- Casambi Wireless Mesh
- High-End Trim, Zoning, Continuous Dimming
- 10-22 VDC Load Control Output (active high)
- 5dBi & 3dBi Indoor And Outdoor Antennas Available (order separately)
- ioXt Alliance cybersecurity certification



Controller Suitable For In-Fixture Use Only
Antenna IP65 (Extended Range Outside Of Fixture)



Applications

The (PSC-WCM-50-BLE-CB/EXA) Wireless Fixture Controller allows for one channel of 0-10VDC dimming, and load control output (active high). This device features an IP65 rated SMA, RP, female antenna connector. Antenna must be ordered separately.

PSC-WCM-50-BLE-CB/EXA is controlled wirelessly via Casambi Mesh technology allowing for wireless dimming of LED lighting. The controller communicates with other devices such as switches and sensors via the wireless mesh network. The device outputs a 0-10VDC dimming signal to compatible drivers (and controls dim-to-off products) as well as a 10-22VDC control signal (active high). This control signal can be used to control other devices such as power packs.

Specifically designed for indoor or outdoor lighting, this controller with long range antenna extends the range of Bluetooth mesh messages. Users can deploy cost-effective, robust Bluetooth mesh control across indoor and outdoor applications of all sizes.

Operation

Casambi Wireless Mesh Controls: The controller connects to a Low Energy (BLE) wireless mesh network via a mobile app, available as iOS or Android, to allow initial setup and subsequent parameters adjustments.

User Interface: Using the mobile app, features include: setup, control real time feedback, and scheduling without a gateway or internet access.

1 Channel Dimming: allows for one 0-10 dimming channel for zone control.

Relay Control: Load control output (active high) can be used to trigger relays or other control circuitry.

See the mwConnect Casambi Commissioning User Manual for more information.

Accessories

Power Pack: The PSC-WCM-50-BLE-CB/EXA operates on 12-24 VDC input and requires a separate mwConnect PacWave™ power pack. See mwConnect PacWave™ Power Pack data sheets.

Alternatively, the unit can operate with a dim to off driver that has a (12V-24V) auxiliary output.

Summary

Product Type:
1 Channel Wireless Fixture Controller

Input Voltage | Current Consumption:
12-24 VDC | 40 mA

0-10V Output: 30 mA

Load Control Output: Active High
Vin-2.5 V, 30mA source for sensor or relay

Mounting: Controller fixture mount, antenna mounts outside of fixture to maximize range

Max Wireless Range¹:
900ft (274.32m)

Operating Temperature:
-30° C to 70° C

Storage Temperature:
-40° C to 85° C

Relative Humidity:
90-95% non-condensing

Color: White

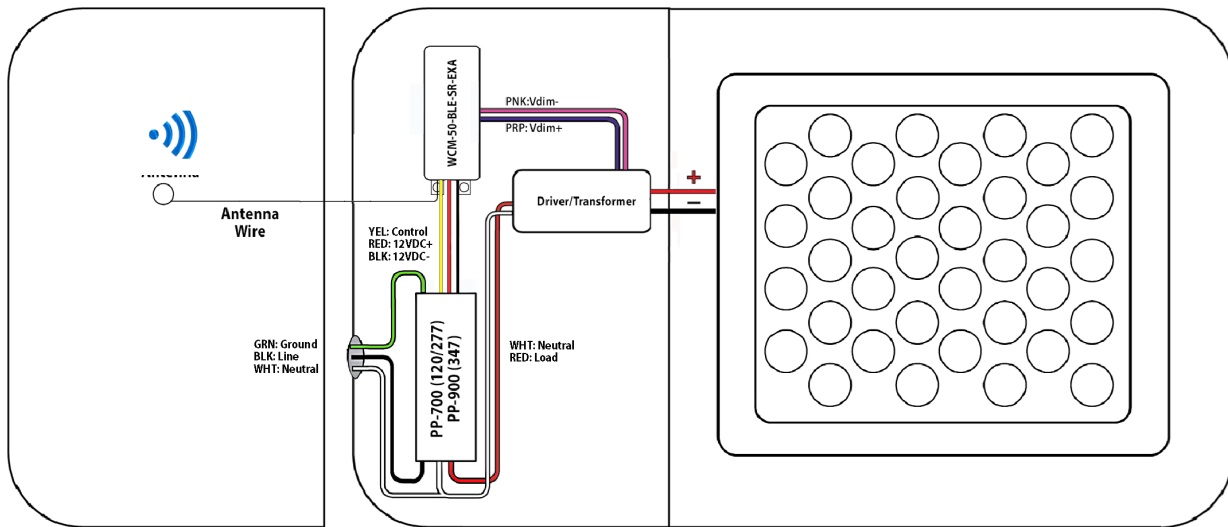
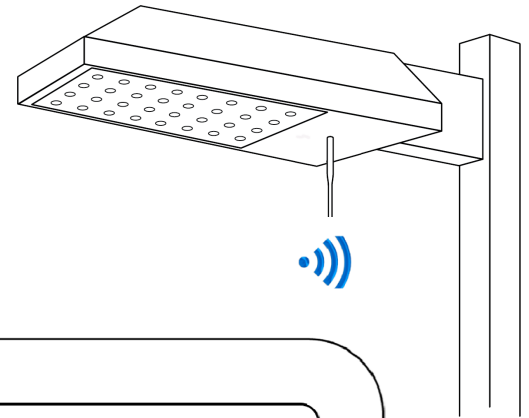
Warranty: 5 years

Note:
1. Wireless Range is highly dependent on the integration of fixtures, surrounding environment and conditions. It is recommended to conduct testing for range accuracy.

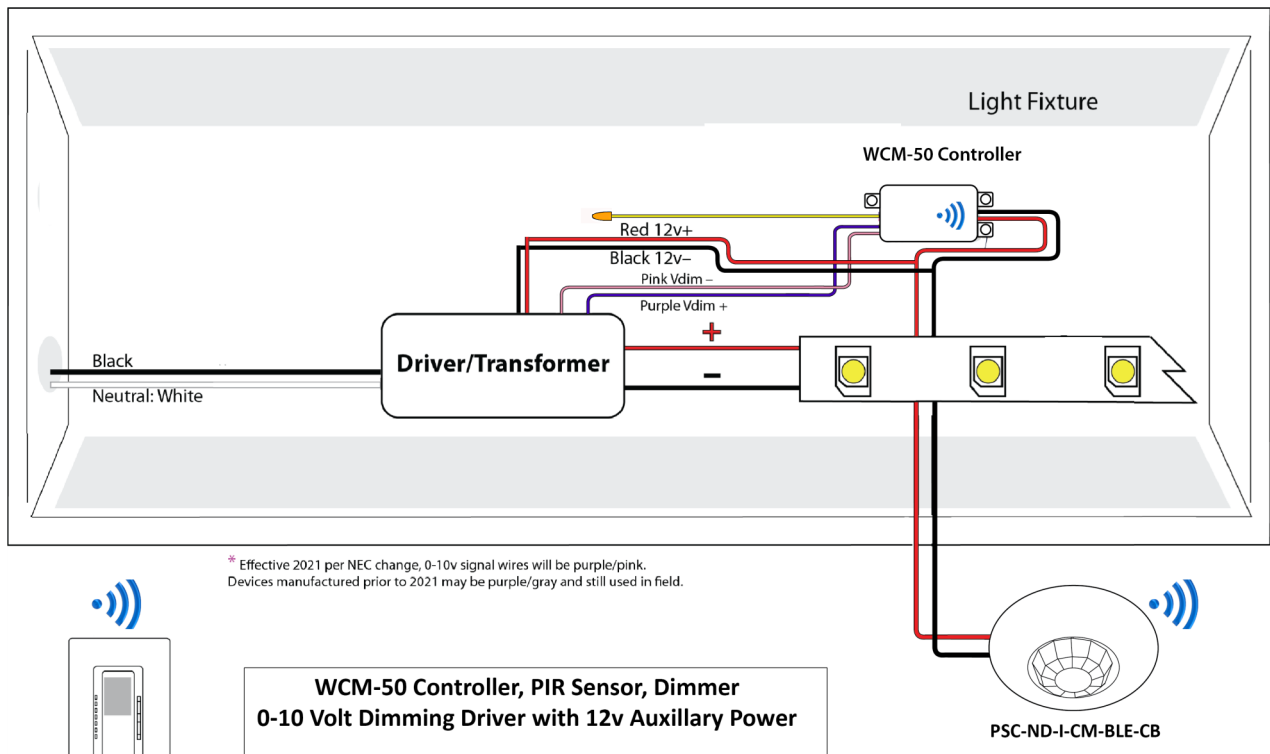
Project

Location/Type

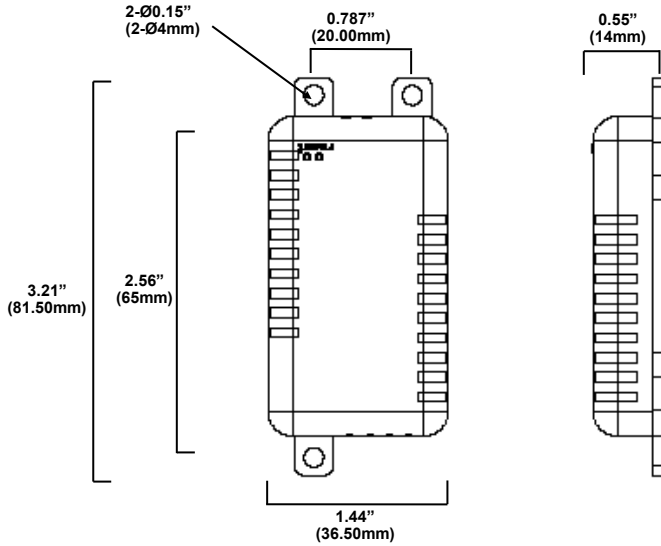
**Wiring Example Application:
Controller With PP-700 Power Pack And Long Range Antenna**



Wiring Dim to Off Driver with 12v Auxiliary Power

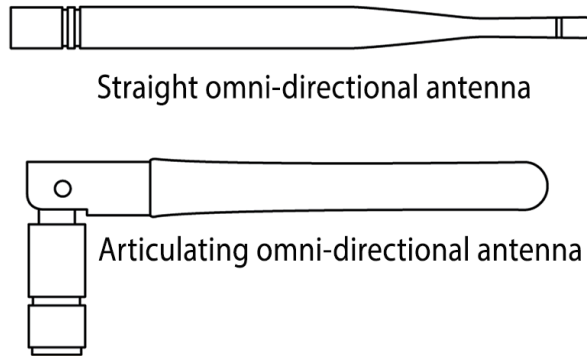


Physical Dimensions



Drawings are Not to Scale

Antenna Options



Straight omni-directional antenna

Articulating omni-directional antenna

Wiring Table

Wire	Designation	Notes	Size
Black	12VDC- Power Output	Power Input	#18 AWG, 180+/-20mm, Strip 10mm Tin Plated
Red	12VDC+ Power Output	Power Input	
Purple (Violet)	0-10V+ Dim Output	Luminaire Control Output	#22 AWG, 180+/-20mm, Strip 10mm Tin Plated
Pink/Gray	0-10V- Dim Output	Luminaire Control Output	
Yellow	10-22VDC Control Output	Output for Controlling Power Pack or Similar Devices (Active High)	

How to Order

Model No.	Description	Input Voltage	Output
PSC-WCM-50-BLE-CB/EXA	Fixture Controller, Single Channel, (requires antenna select one from below) Wireless Mesh	12-24VDC	0-10V,30mA & Control Output
SRM-24SW20C-G5-IP-BK	Straight, 7.87 inch (200mm) long by 0.51 inch (13mm) diameter, 5dBi omni-directional, outdoor rated (IP65) antenna with Black finish		
SRM-24FW11C-G3-WT	Articulating (up to 90deg), 4.33 inch (110mm) long by 0.51 inch (13mm) diameter, 3dBi omni-directional, indoor rated antenna with White finish		

For Line to Low Voltage Power Supply/Controller, please see mwConnect PacWave™ Power Pack data sheets.

Design and specifications are subject to change without notice.