

Project	
Notes	
Type	Date
Cat. No.	

## CM-DC-OS/BT Wireless aleoBlue, DC powered, Ceiling-Mount Occ. Sensor

### DESCRIPTION

The CM-DC-OS/BT uses digital PIR Motion Detector Architecture and Quad Element passive infrared (PIR) technology for improved detection coverage for ceiling mount applications. The sensor is suitable for a variety of indoor applications. It supports ceiling mounts up to 12ft high. Both sensor and power pack are rated for use in temperatures ranging from - 30° to 70°C and relative humidity from 90 to 95% at 30°C. High Vin-2.5V 100mA source. Low 100mA sink current.

### APPLICATIONS

Indoor: retail, education, hospitality, corporate, warehouse, self storage.



**CM-DC-OS/BT**  
Ceiling Mount | PIR



### Specification Features

#### Overview

- PIR sensor
- Bluetooth® SIG mesh
- LED Motion indicator
- Mounting height up to 12ft (3.6m).
- 360° coverage pattern

#### Accessories

**Power Pack:** The CM-DC-OS/BT operates on 12-24VDC input and requires a separate power pack. Alternatively, the sensor can also operate with a driver that has an auxiliary output (12V).

#### Certification

UL Listed. All components have UL certification.

#### Warranty

5-year Limited Warranty. See warranty documentation for more information.

#### Sensor Operation

**aleoBlue Controls:** Qualified for Bluetooth® Mesh 1.0.1 (SIG), the sensor can pair with an iOS application to allow initial setup and subsequent sensor adjustments. The mobile application enables adjustment of sensor parameters such as time delay, and more. Additionally, features such as parameter profiles, and real-time feedback from the sensor can speed up configuration and provide custom user control. See aleoBlue Commissioning User Manual for more info.

### Ordering Information

Example: CM-DC-OS/BT

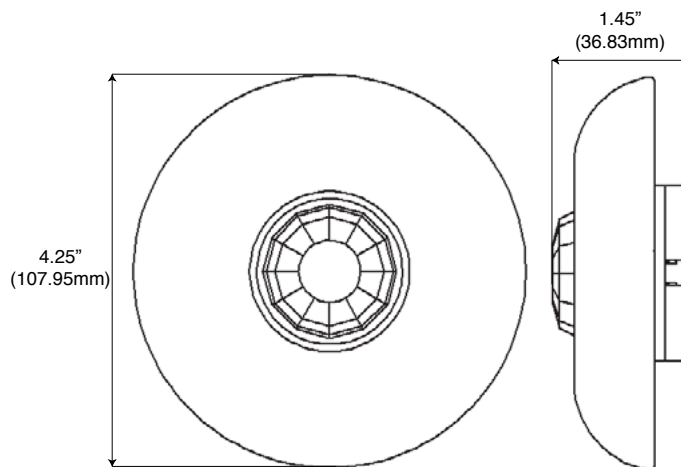
CM	DC	OS/BT	[Blank]
<b>Series</b>	<b>Power Source</b>	<b>Controls</b>	<b>Options</b>
<b>CM</b> Ceiling Mount	<b>DC</b> DC Powered	<b>OS/BT</b> Wireless Bluetooth Occupancy Sensor	<b>PP</b> Power Pack

Specifications and Dimensions subject to change without notice.

Performance Summary

Sensor Type	PIR occupancy sensor
Input Voltage	12-24VDC
Current Consumption	50mA
Mounting Height	Ceiling mount up to 12ft (3.6m)
Max Range*	37ft (11.3m) radius
Max Bluetooth Range**	49 ~ 65ft (15 ~ 20m)
Photocell	N/A
Operating Temperature	-30° C to 70°C
Storage Temperature	-40° C to 80°C
Relative Humidity	90-95% non-condensing at 30°C
Color	White
Warranty	5 years

Dimensions

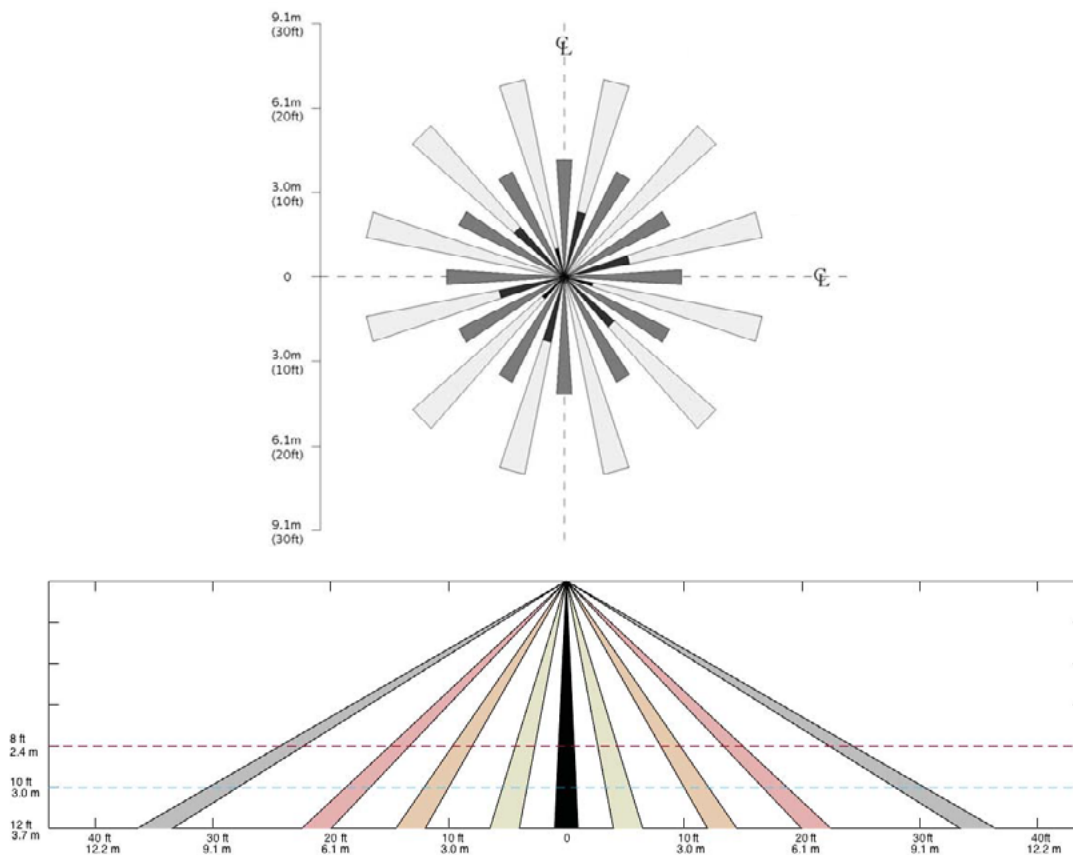


Note:

\*The absolute range of the sensor is subject to variation because of different types of clothing, backgrounds, and ambient temperature. Therefore, ensure that the lens is properly oriented along routes with expected traffic and conduct testing along those routes.

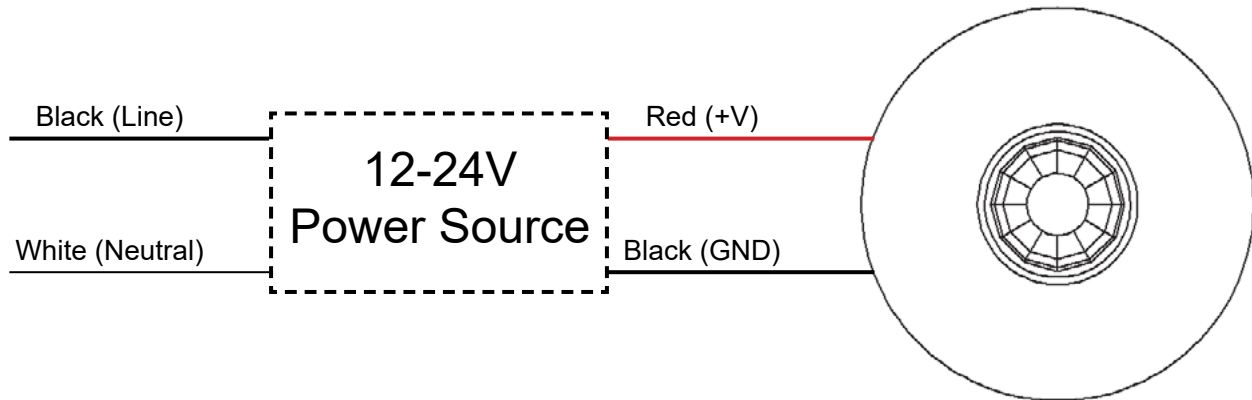
\*\*Bluetooth Range is highly dependent on the integration of fixtures, surrounding environment and conditions. It is recommended to conduct testing for range accuracy.

Detection Area

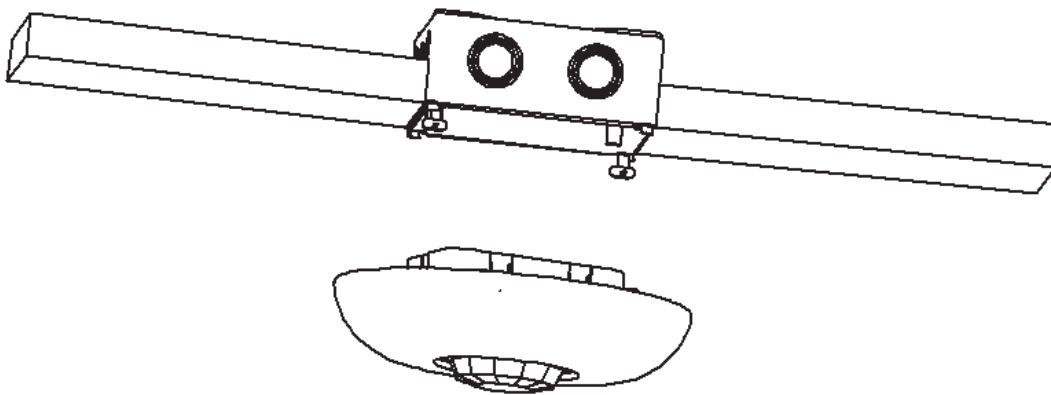


Specifications and Dimensions subject to change without notice.

Wiring Diagram

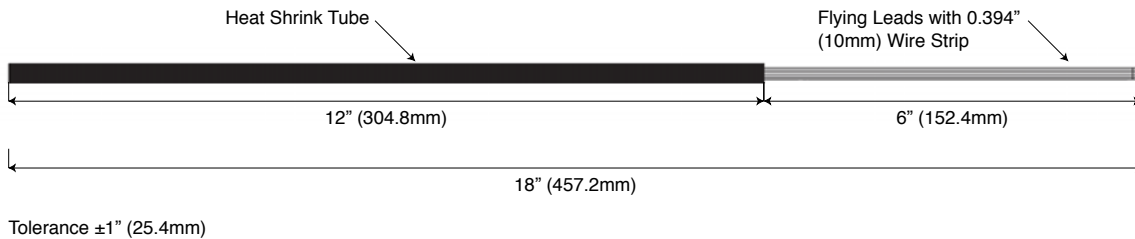


Installation



Lead Info

Leads: Minimum 22AWG





## AleoBlue Wireless Bluetooth Controls

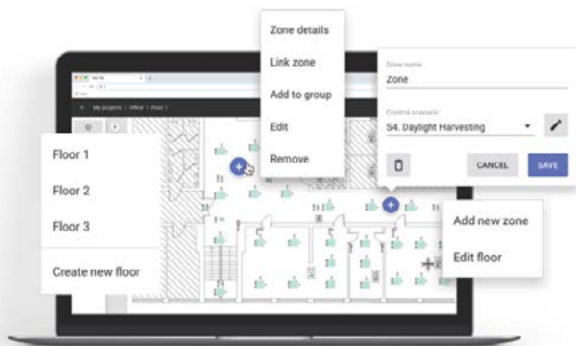


The AleoBlue is a complete solution for managing connected lighting systems using a Bluetooth Mesh lighting network. This enables seamless implementation of simple to complex lighting control scenarios without specialized training or lighting control engineering expertise.

DLC NLC Qualified.

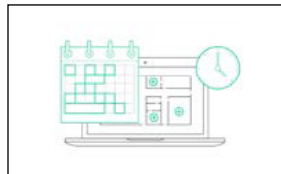
### Features and Benefits

- Lighting Zones / Grouping
- Manual control of individual lights
- On Power up Behavior
- Zone Linking
- Vacancy Sensing
- Per fixture Daylight Control
- Per zone Daylight Control



- Optimized Energy Consumption
- Less Hassle with On-Site Adjustments
- More Savings
- Increased Safety
- More Flexibility

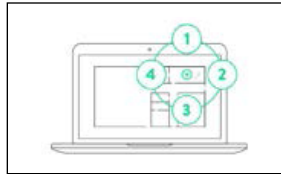
#### Scheduling



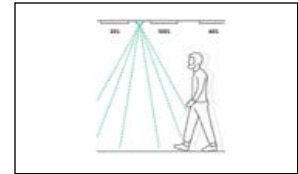
#### High and Low End Trim



#### Scenes



#### Occupancy Sensing



- Intuitive and user-friendly web and iOS apps
- No specialized training or lighting control expertise required
- Optimized for commercial spaces of any size
- No additional wiring or central control box
- Customizable lighting control parameters
- Future proof with Software Updates
- Multiple Zone Configurable
- Built-In Scenarios + Customization

### Bluetooth Mesh Technology Advantages



The fastest low-power communication



Scalability to thousands of devices



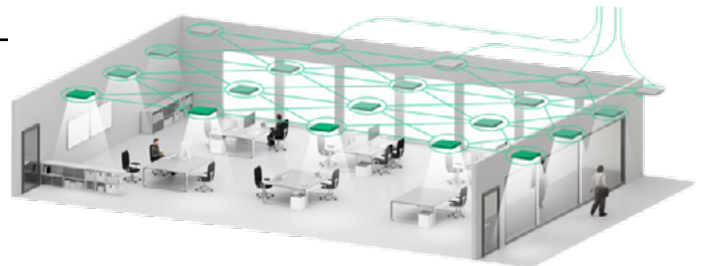
The most advanced encryption standards as well as the cutting-edge device authentication

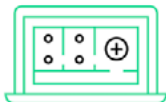


No single point of failure (no central device)



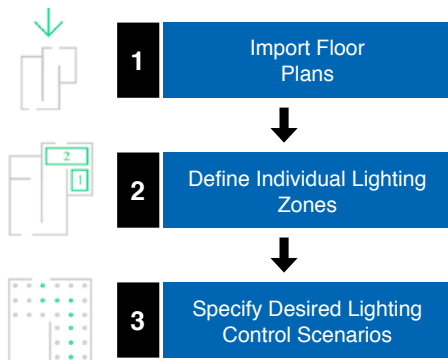
Compatibility with a widely available devices (smart phones & tablets – both with Bluetooth 4.0 and Bluetooth 5)





### Planning

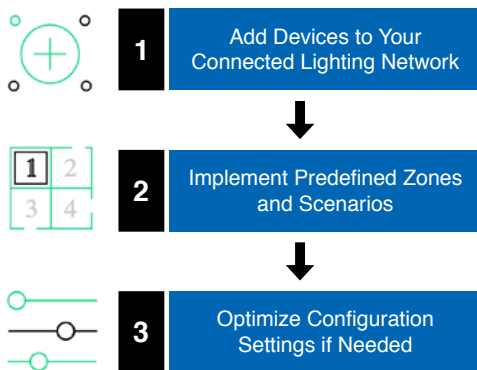
Remote preparation of a retrofit project with the use of our web app. Uploading floor plans, defining individual lighting zones and choosing lighting control scenarios.



### Implementation

Adding lighting devices to the Bluetooth mesh network on-site with the use of an iOS app.

Customization and calibration of lighting control parameters during and after the commissioning process. Defining scenes for specific working activities.



### Provisioning / Configurations

The Bluetooth mesh Node is in the Unprovisioned Mode until it is provisioned by a "Provisioner", which typically is a smart phone with a Bluetooth mesh compatible app.

### Ordering Information



**Wireless, DC Powered, Ceiling-Mount Occ. Sensor**  
Model: CM-DC-OS/BT

Specifications and Dimensions subject to change without notice.

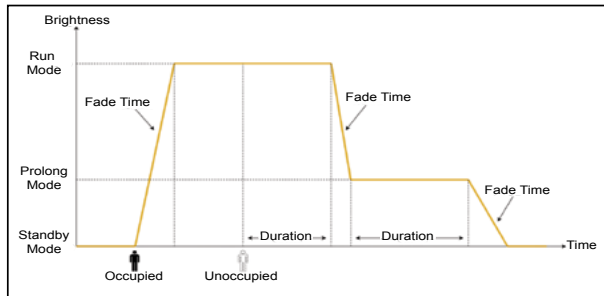
**Lighting Control Scenarios**

Multiple lighting control scenarios are available once the Bluetooth mesh Node is provisioned. At each scenario, duration, fade time and target brightness can be configured at any time with the iOS app.

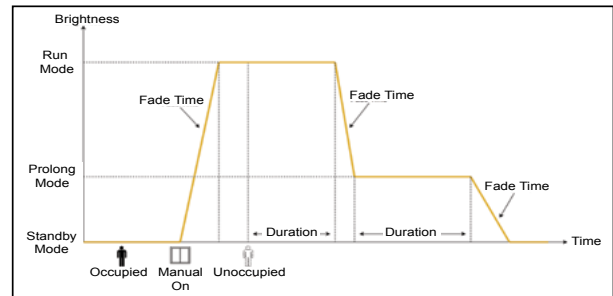


Mode / Scenario	Wireless Switch	Occupancy Sensor	Ambient Light Sensor
Unprovisioned Mode	-	-	-
Switch	On / Off / Scenes	-	-
Occupancy	On / Off / Scenes	Auto On / Off	-
Vacancy	On / Off / Scenes	Auto Off	-
Occupancy with Daylight Harvesting	On / Off / Scenes	Auto On / Off	Enabled
Vacancy with Daylight Harvesting	On / Off / Scenes	Auto Off	Enabled

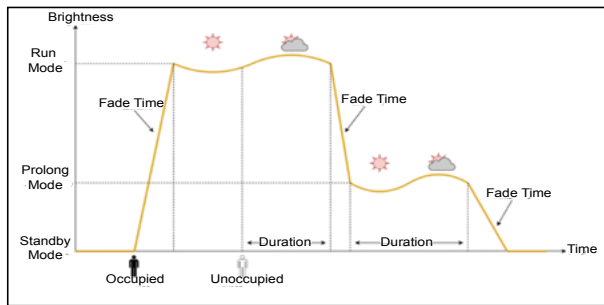
**Occupancy Scenario**



**Vacancy Scenario**



**Occupancy Scenario - with Daylight Harvesting**



**Occupancy Scenario with Manual Override**

