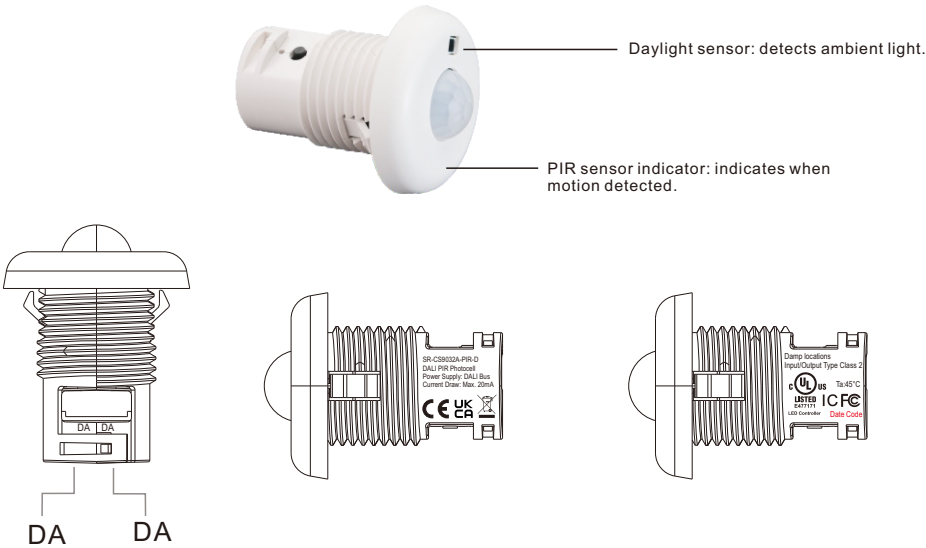


Casambi Wireless Fixture Mounted PIR Sensor + Light Sensor + DALI Dimming



Important: Read All Instructions Prior to Installation

Function introduction



Product Description

The fixture-Integrated sensor combines presence sensing, daylight harvesting, DALI dimming and Casambi radio technology into a small package that fits into various luminaires. When used with DALI LED drivers, it enables any lighting manufacturer to deliver wirelessly-controllable and sensor-equipped fixtures with minimal engineering effort. The sensor-equipped luminaires just need to be connected to mains power. The result is increased occupant comfort and significant energy savings that meet the most demanding building energy codes.

Casambi Technology Explained

The Casambi technology provides a mesh network where all the intelligence of the system is replicated in every node and, in such a way, creates a system with no single point of failure. In this kind of fully distributed architecture, any unit can go offline and catch up from others when they return back online.

Wireless Features

- Control a large number of fixtures from any point
- Simple to use UI
- Wide range of functionality – Grouping Luminaires, different lighting situations for different occasions, colour temperature, daylight sensor, occupancy sensor and much more.

Product Data

Physical Information

Dimensions / Weight	See Dimensions / 12.3g (without locknut) / 21.3g (with locknut)
Mounting (Luminaire Hole)	25mm

Material / Color	ABS / White
Connectors / Wire Gauge	2 pin connectors / 24-18 AWG (0.2-0.75 mm2)
Strip Length	0.28-0.35 in. / 7-9 mm

Electrical Information

Power Supply	DALI Bus
Current Consumption	< 20mA
Dimming Control	DALI
DALI Control Mode	Broadcast
Status Indicators	Red (motion detection)

Wireless Communication

Transceiver Frequency	2.4GHz ISM band
Radio Range	164 feet (50m) in open field
Radio Certification	FCC/IC, CE

Lighting Control

Features	DALI broadcast, Individual/group addressing, Scene control Autonomous sensor-based control, Scheduler control
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Sensing

Occupancy Sensing Type	PIR sensor
Lux Detection Range	0-1000 Lux
Mounting Height	Recommended height: 8ft (2.5m)
Detection Angle	130°
Detection Range	Up to 5 meters @ 2.5m installation height

Environment

Operating Temperature Range	32°F to 104°F / 0°C to 40°C (indoor use only)
Operating Humidity	0-95% (non condensing)
Safety Certification	cULus Listed, CE

Key Features

- PIR motion detection
- Daylight harvesting
- Works with DALI-2 D4i drivers or non-D4i drivers, broadcast control
- Autonomous sensor-based control
- Fixture mount installation
- Can be use for indoor applications

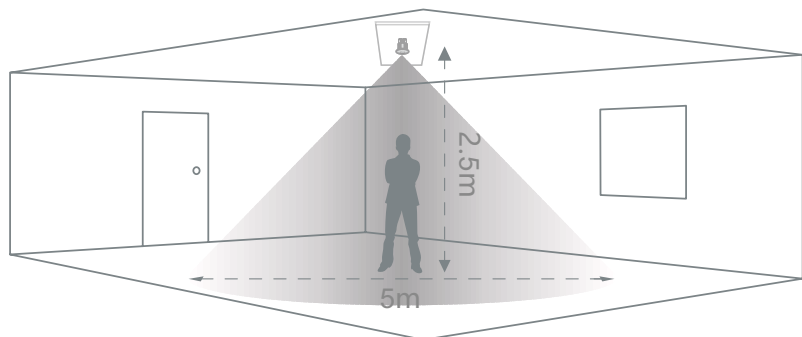
Applications

- Open offices
- Individual offices
- Conference rooms
- Classrooms
- Retail stores
- Hospitals
- Lobbies

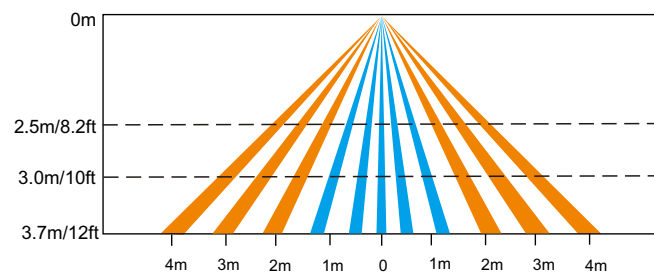
Benefits

- Cost-effective solution for energy savings
- Energy code compliance
- Robust mesh network

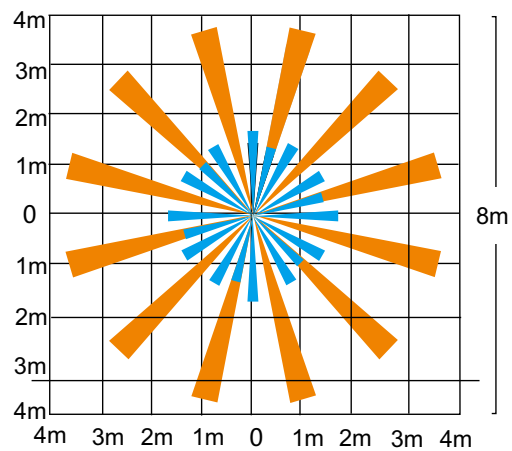
Detection Pattern



Coverage Side View



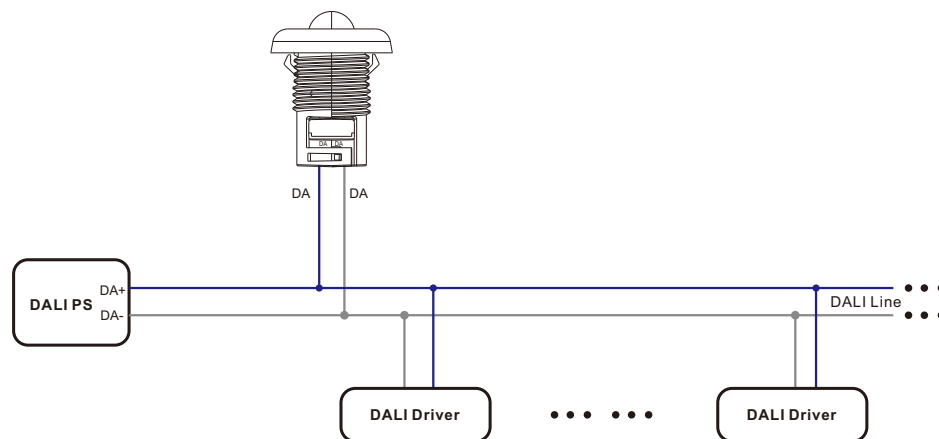
Coverage Top View



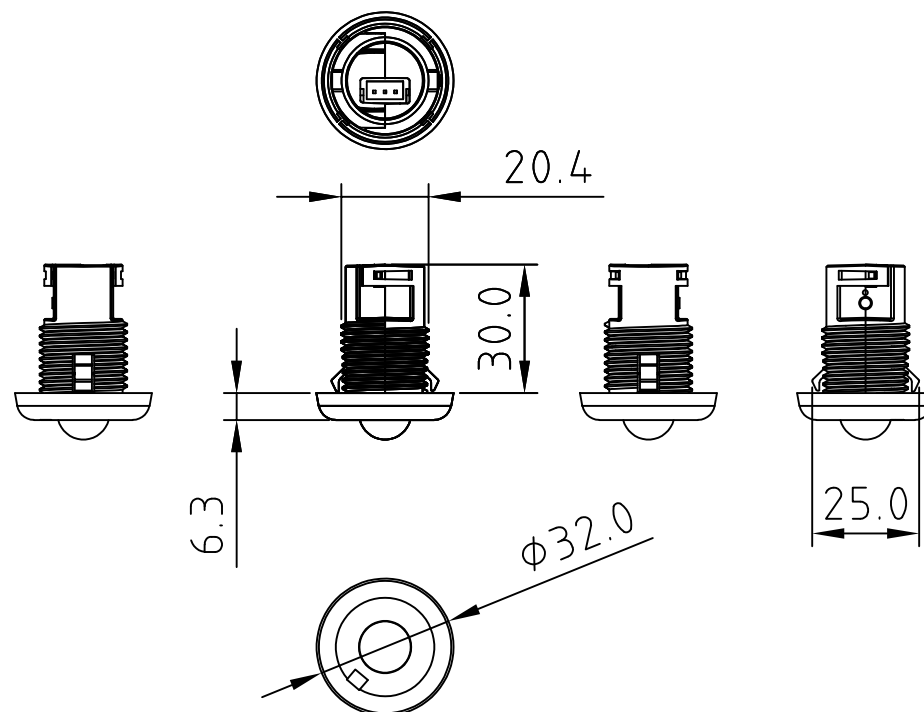
The detection area for movement sensor can be roughly divided into two parts:

- Slow movement (person moving $< 1.0'/s$ or $0.3m/s$)
- Quick movement (person moving $> 1.3'/s$ or $0.4m/s$)

Wiring Diagram



Product Dimension



Operation

Select Profile:

Factory default profile of this device is DALI DIM Broadcast, you can select a profile through the operation of “Change profile”.

Power on the device, make sure the device is unpaired, open Casambi app, navigate to “Nearby devices”, the device will be displayed, double click the device, then choose “Change profile” from the pop up menus, then select a profile as shown in following figures.

