How to configure lighting control for a small-office setting

Before using the cheat sheet, please make sure you have the basic Casambi App knowledge for creating a network, pairing devices, creating groups and enabling control hierarchy. For more information, please refer to the tutorial videos on: *https://casambi.com/training/*

Scenario

Small-office with one lux/presence sensor

- An office with 2 luminaires (L1 and L2) and one presence/lux sensor (S1) positioned over the desk. When occupied, lights automatically switch on and try to maintain the illumination on the desk at 500 lux.

Key Programming Overview

1 Scene

- **Office** - Daylight scene (**Closed loop** daylight with target lux level set to 500 lux).

1 Sensor

- **Presence mode:** It activates the **Office** scene while movement is detected.

- **Daylight:** It measures the lux level and adjusts the lights to maintain the target lux level set.

STEP 1: SCENE	Casambi App ⟶ **Scene**

Closed loop: Sensors are affected by light from the luminaires in the scene.

The **Minimum dim level** (%) setting in the **Closed loop** parameters applies to the closed loop scene selected. e.g., Minimum dim level set as 10% and the closed loop scene is 50%, then the minimum dimmed level for the closed loop scene will be restricted to 5%.
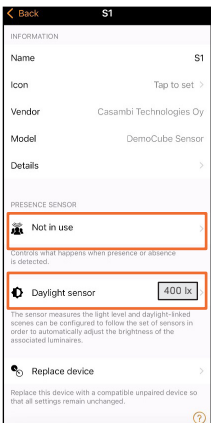
Change rate defines how often luminaires adjust dimming to match the daylight scene target.

Sensors actively adjust the luminaires in the active scene to try to reach and maintain the desired level via a feedback loop.

An **Activation level** graph can be configured to define the initial dim level of luminaires in the scene, depending on the actual lux readings from the sensor.

Information in this document is subject to change.
For more information www.casambi.com/support

CASAMBI

STEP 2: SENSOR

Casambi App $\longrightarrow$ More $\longrightarrow$ **Sensor**

① ②

①

The sensor will trigger the **Office** scene when presence is detected. After 5 minutes passed without detecting presence (Linger time), the scene will be faded out. In this case, the fade off action will take 5 seconds (Fade time).

②

Sensitivity and **Tolerance** adjustment to ensure lights do not react too fast to rapid changes of external illumination.

Configuring a closed loop scene to achieve 500lx on a surface:

1. Place a lux meter on the surface below the sensor
2. Dim the lighting to achieve the desired lux on the surface (500lx measured by the lux meter positioned on the desk)
3. In the Casambi app, read the lux value being measured by the sensor (this is likely to be different from the 500lux target, for example, 400lx)
4. Use the sensor lux value (400lx) as the target lux value (Desired iluminance) in the Closed loop daylight scene.

Set up the daylight scene when no "external light" is affecting the lux in the room (e.g. at night). So, <u>ONLY</u> the 2 luminaires provide the illumination.

STEP 3: PERFORMANCE
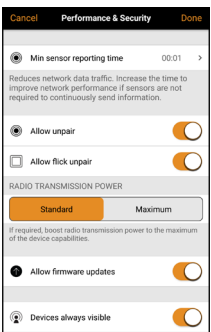
Casambi App $\longrightarrow$ More $\longrightarrow$ Network Setup $\longrightarrow$ **Performance & Security**

Min sensor reporting time defines how often lux sensors report values to the network. Choosing a higher interval reduces network traffic, especially in networks with many sensors.

2

Casambi Cheat Sheet: V2.0 EN

Information in this document is subject to change.
For more information www.casambi.com/support

CASAMBI

How to configure lighting control for a small-office setting

Before using the cheat sheet, please make sure you have the basic Casambi App knowledge for creating a network, pairing devices, creating groups and enabling control hierarchy. For more information, please refer to the tutorial videos on: *https://casambi.com/training/*

Scenario

Small-office with a switch and outdoor lux sensor

- An office with 2 luminaires (L1 and L2), one lux sensor (S1) positioned outside the building, and one EnOcean switch.

- Lights are switched on/off from the switch.

- While On, the lights automatically dim up or down as it gets brighter or darker outside.

Key Programming Overview

1 Scene

- **Office** - Daylight scene: (**Open loop** daylight with appropriate response graph defined).

1 Sensor

- **Daylight:** It measures the lux level and adjusts the dimmed level of the scene while it is active.
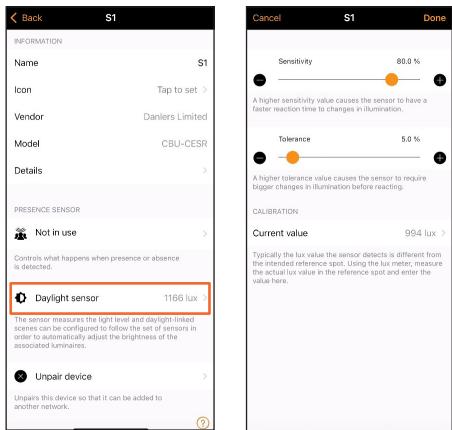
1 Switch

- The switch triggers on/off the **Office** scene.

STEP 1: SCENE   Casambi App ⟶ **Scene**

Open loop: Sensors should not be affected by any light from the luminaires in the network.

Define the **Response Graph** so that it doesn't get too dark in the room when there is insufficient natural light.

---

3 Casambi Cheat Sheet: V2.0 EN

Information in this document is subject to change.
For more information www.casambi.com/support

CASAMBI

Casambi Cheat Sheet

STEP 2: SENSOR

Casambi App ⟶ More ⟶ **Sensor**

Sensitivity: How big the change in lux must be before any sensor reaction.

**Tolerance**: How much over-/under-shoot of the actual target value is permitted before a change occurs.

Sensitivity and **Tolerance** adjustment to ensure lights do not react too fast to rapid changes of external illumination.

STEP 3: PERFORMANCE
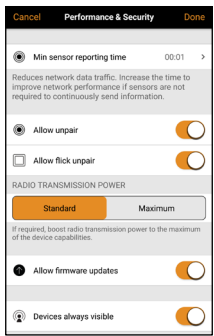
Casambi App ⟶ More ⟶ Network Setup ⟶ **Performance & Security**

Min sensor reporting time defines how often lux sensors report values to the network. Choosing a higher interval reduces network traffic, especially in networks with many sensors.

STEP 4: SWITCH

More ⟶ **Switch**
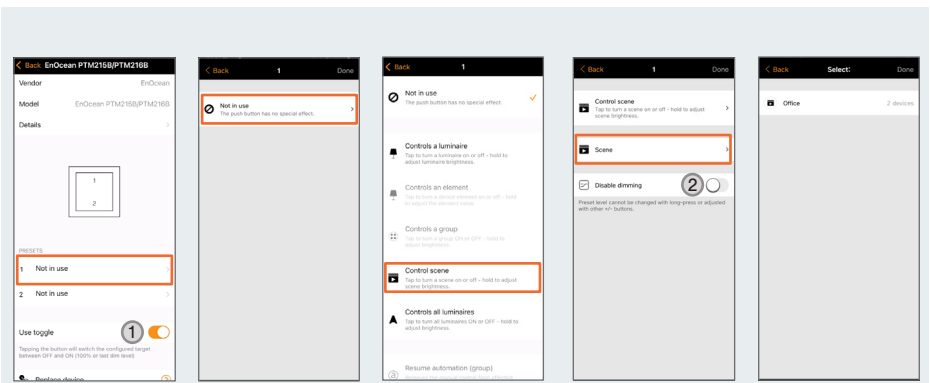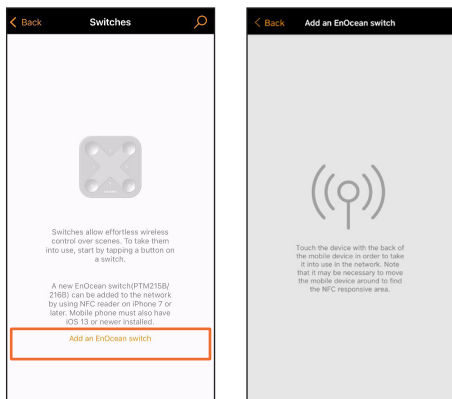
① **Use toggle:** If enabled, one push of a switch will activate the set function (e.g. Select a scene). A second push will deactivate it. Disabling this function means that pushing a switch will only activate the selected function.

② **Disable dimming:** Disabling dimming prevents a long button push from adjusting the preset scene dimmed level.

Information in this document is subject to change.
For more information www.casambi.com/support

CASAMBI