

**PHILIPS**

Sensors

EasyAir

office sensor advanced  
grouping SNS200



## Datasheet

# EasyAir

## Office sensor advanced grouping SNS200

The Philips EasyAir office sensor is the ideal solution for per-luminaire control of new light luminaires. It combines occupancy sensing, daylight harvesting and task tuning in a single, compact package for easy OEM luminaire assembly. EasyAir operates with the established Xitanium SR driver standard to make a simple two-wire connection between sensor and driver, thus eliminating the need for multiple components and auxiliary devices. The result is a cost effective and easy-to-design-in solution ideal for energy-savings. An intuitive app makes configuration and commissioning during and after installation fast and easy using Philips field apps.

### Features

- Occupancy sensing, daylight harvesting and task tuning in one device
- Compact size, 2-wire connection
- Operates with Philips Xitanium SR drivers and qualified wireless switches
- Preset with most common sensor parameters
- Configuration of sensor parameters– if desired – using NFC or IR via intuitive Android-based Philips field apps
- Simple grouping of luminaires to a wireless switch with Philips field apps

### Benefits

- Combines functionality to reduce need for multiple components
- Fits into existing and new-design luminaires
- Quick task tuning in the field to optimize light and power levels
- Enables auto-off/manual-on application
- Cost-effective solution for energy-savings
- 5-year limited system warranty with Philips Xitanium LED drivers
- Configuration and commissioning from the floor

### Applications

- Conference rooms
- Individual offices
- Open offices
- Classrooms
- Storage and break areas
- Restrooms
- Lobbies
- Stairways

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## Ordering Information

Commercial product name	EOC	12NC	Carton Quantity
EasyAir office sensor advanced grouping SNS200	8718696 698945 00	929 000 766 813	50 pcs

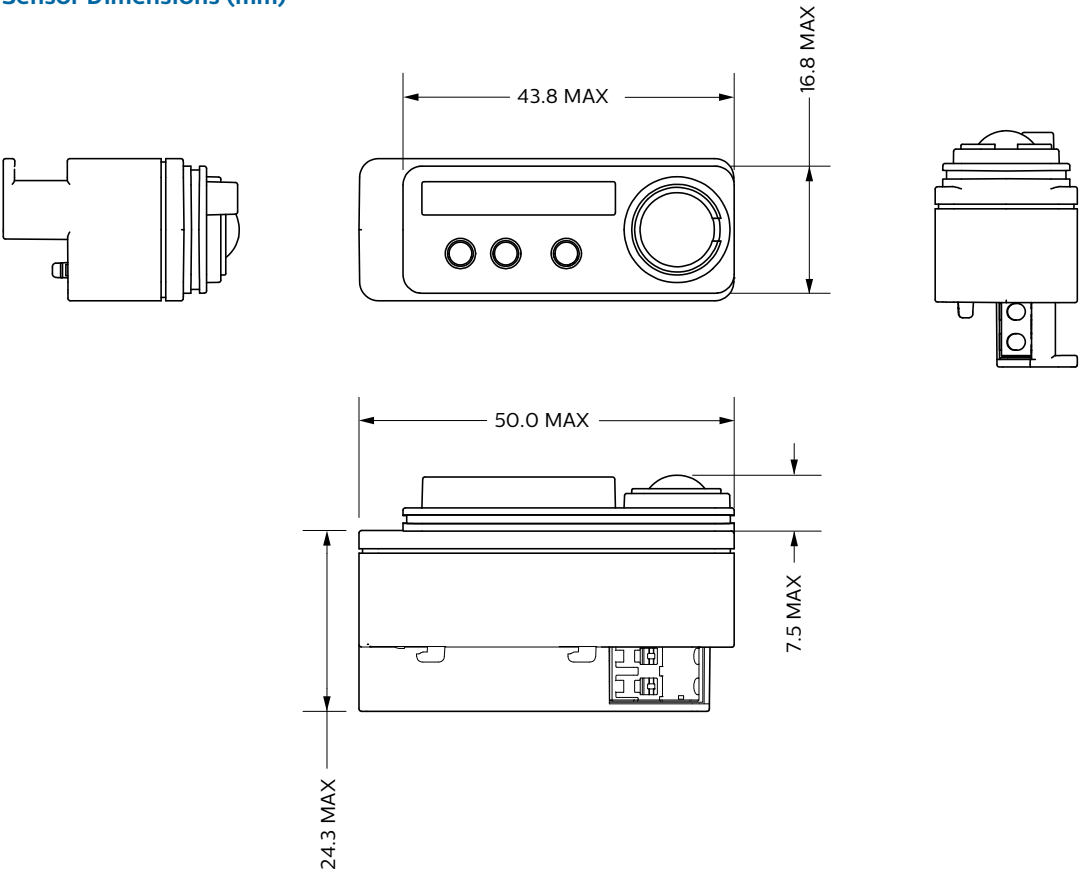
## Product Data

All specifications are typical and at 25 °C Tcase unless otherwise specified.

<b>Physical Information</b>	
Overall Dimensions	50 mm x 19.0 mm x 31.5 mm
Housing (Luminaire Hole)	44 mm x 17 mm (l x w)
Net Weight per Piece	17 gr
Volume required Inside Luminaire (LxWxH)	50 mm x 19 mm x 24 mm
Color	White and Grey
Connectors	(2) Lite-Trap connectors
Input wire cross-section (solid conductor wire)	0.25 - 0.75 mm <sup>2</sup>
	18 - 24 AWG
Input wire cross-section (stranded wire)	0.3 - 0.5 mm <sup>2</sup>
	20 - 22 AWG
<b>Electrical Information</b>	
Input Voltage	Powered by SR driver low-voltage interface
Current Consumption	13 mA
Nominal Power Consumption	200 mW
Standby Power	< 1 W on luminaire level, including driver standby power
<b>Occupancy Sensing</b>	
Type	Passive infrared (PIR)
Enable/Disable	Default enabled
Occupancy Mode	Auto-on/off, Manual-on/off, Manual-on/auto-off; Red LED indicates "on"
Occupancy Sharing	Enabled/disabled
Elsewhere Occupancy Level	Background level, task level
Hold Time	0.5 - 60 minutes
Viewing Angle	X = 72°, Y = 86° ( See detection pattern)
Background Light Level	0-100%
Prolong Time	0 minutes - infinity
Grace Fading	0-25 sec
Response Time/Fading to Switch On/Off	0.7 sec
<b>Daylight Sensing</b>	
Enable/Disable	Default enabled
Auto-calibration	Upon power-up
Viewing Angle	40° (half value sensitivity); 2% cut-off point at 75°
<b>Task Tuning</b>	
Full Light Setting	0-100%
<b>Environment &amp; Approbation</b>	
Operating Ambient Temperature Range	0 °C to 55 °C
Operating Humidity	0 - 95% non condensing
Storage Temperature	-25 °C to 85 °C
Storage Humidity	0-95% non condensing
Max Case Temperature (Tcase)	55 °C
Agency Approbations	CE, ENEC, RTTE, EMC
Warranty	5 years warranty for released Philips system combination (sensor and compatible driver). 3 years warranty for sensor only.
Digital Interface	Xitanium SR
<b>Other</b>	
Status Indicators	Red, Yellow. Yellow LED on: Vacancy & Sensor is functional; Red LED on: Motion is detected
Energy reporting	Calculated from last "power on": % On, Energy Consumed (Whr), System on time (hrs), Avg power consumed (w-hr), Lamp on time (hrs)
No. Drivers per Sensor	4 max
Max Distance Switch-to-First-Luminaire	10 m line-of-sight
Max Distance Luminaire-to-Luminaire	12 m line-of-sight
No. Switches per Group	10 max
Field Configuration	via NFC or IR, parameters set via Philips field apps

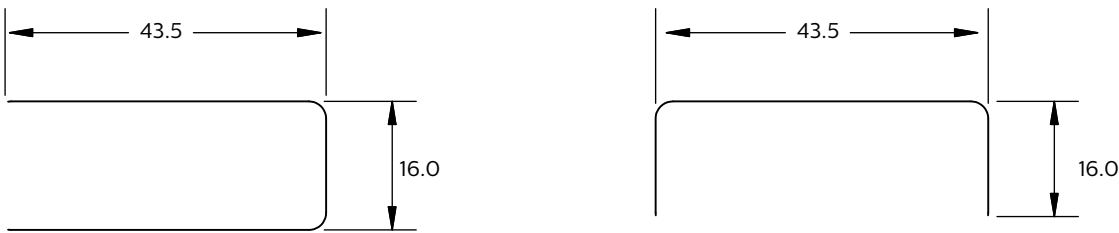
EasyAir office sensor

Sensor Dimensions (mm)

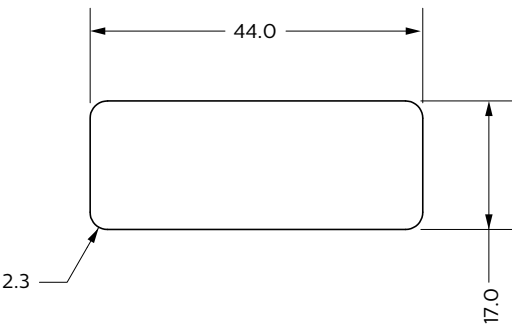


Mounting Dimensions (mm)

Mounting in U-shaped slot in sheet metal (max thickness 1 mm), tolerance +0.2 mm/-0.0 mm



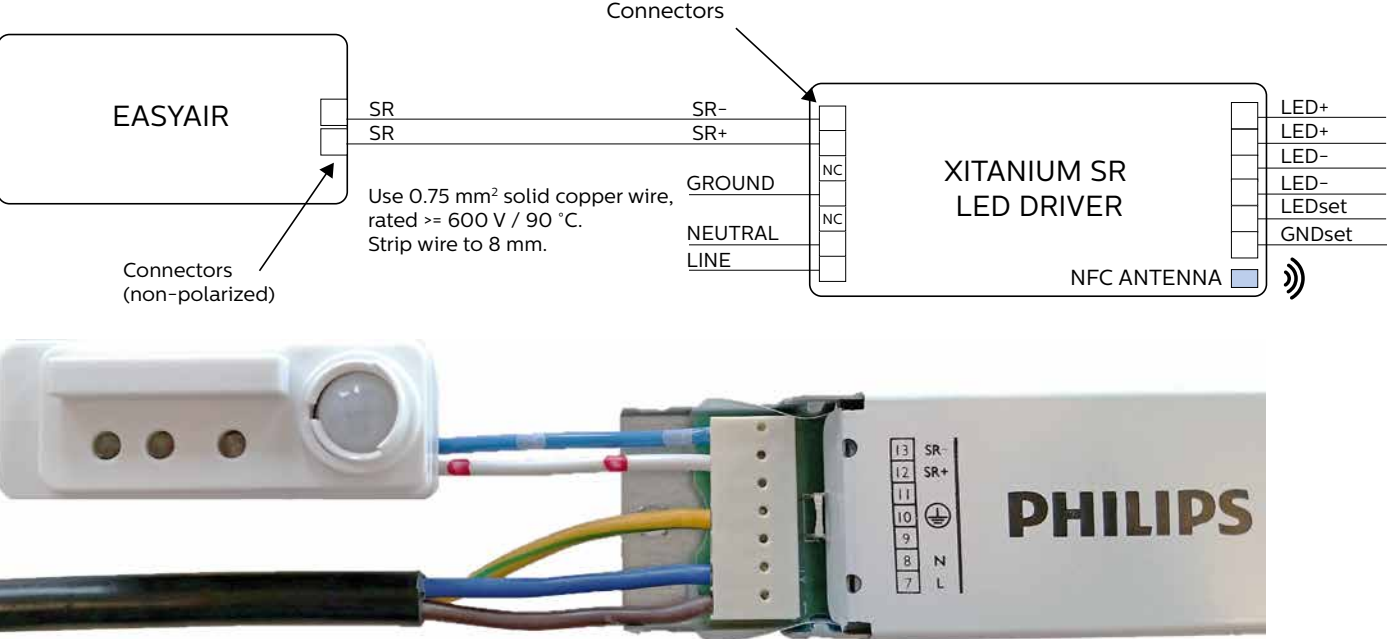
Mounting in cut-out in sheet metal (thickness 0.7 mm to 1.2 mm), tolerance +/-0.2 mm



Accessories	12NC
EasyAir Bracket SMB-50 white	929001540206
EasyAir Bracket SMB-50 grey	929001540306

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Wiring Diagram



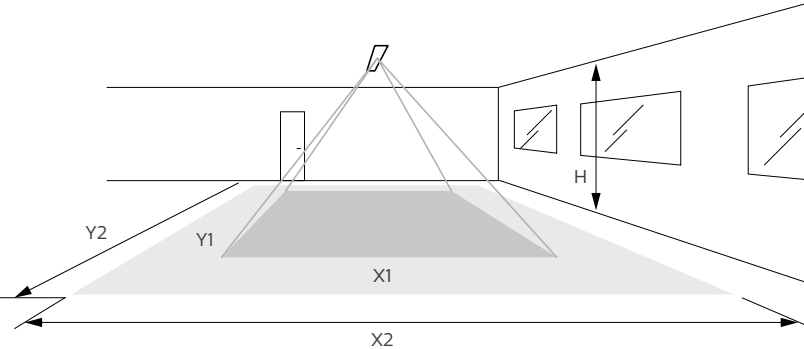
EasyAir office sensor

Occupancy Sensing

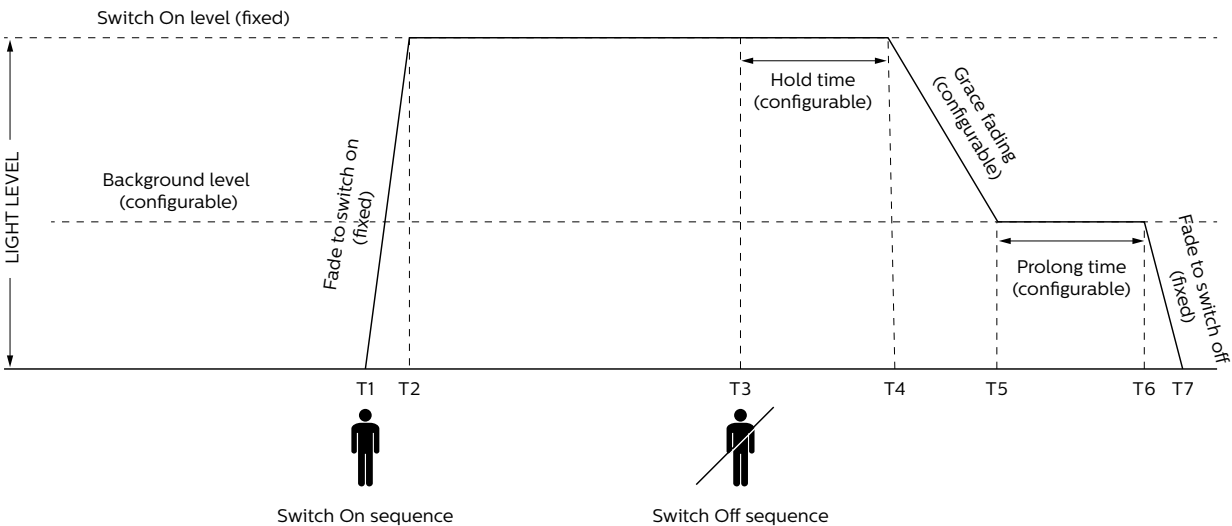
The detection area for the movement sensor can be roughly divided into two parts:

- Minor movement (person moving  $\leq 0.9$  m/s).
- Major movement (person moving  $\geq 0.9$  m/s)..

Height	Minor Movement		Major Movement	
	Y1	X1	Y2	X2
h				
2.4 m	2.9 m	2.7 m	4.5 m	2.9 m
3 m	3.6 m	3.4 m	5.4 m	3.6 m



Note: Longer dimension of detection area (Y1, Y2) is parallel to longer dimension of EasyAir.



## EasyAir office sensor

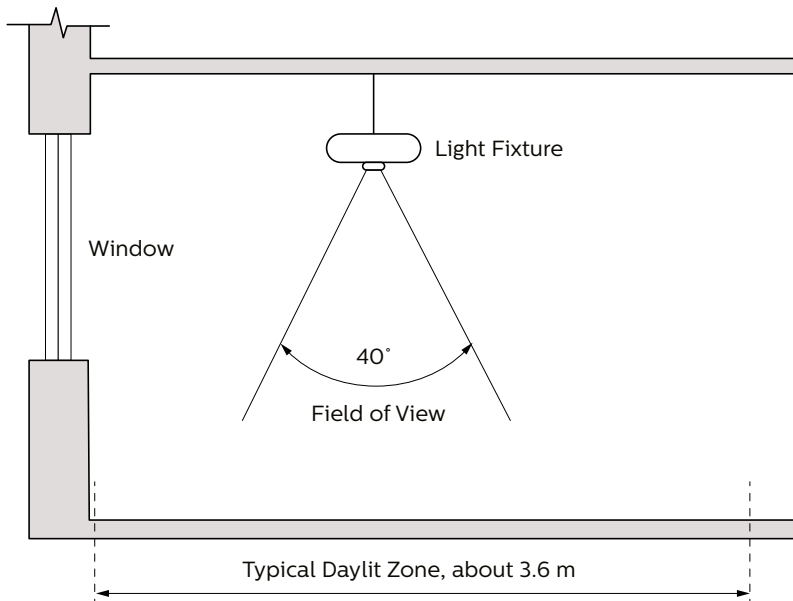
### Daylight Sensor

The light sensor measures the total amount of light in a circular field of  $\approx 80\%$  of the PIR detection area. The following aspects should be observed during installation:

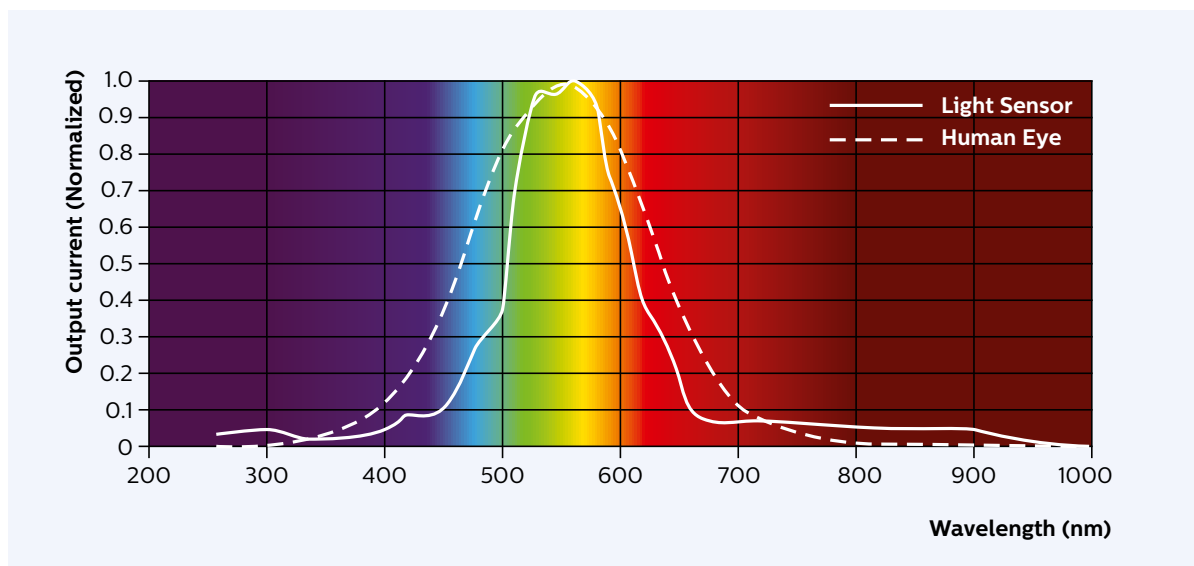
- Minimum distance from the window  $\geq 0.6$  m.
- Prevent light reflections from outside entering the sensor (for example sunlight reflection on a car bonnet) as this will lead to incorrect light regulation.

As a guideline the formula  $0.72 \times H$  can be used to calculate the minimum distance between the window and sensor whereby H is the height from the bottom of the window to the ceiling.

### Photosensor Spatial Response

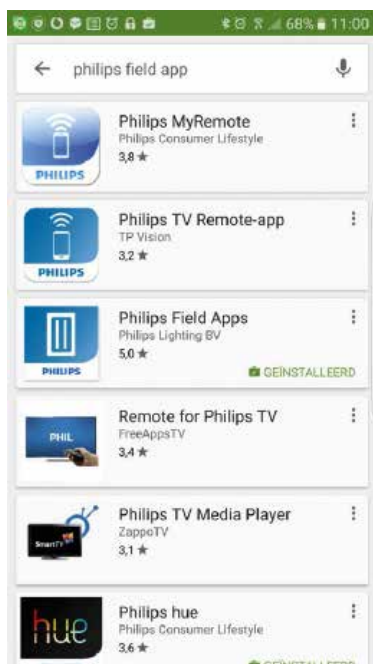


### Photosensor Spectral Response



## EasyAir office sensor

### EasyAir Configuration App



EasyAir parameters can be configured via Philips field apps. Two versions are available:

1. EasyAir NFC – This app allows configuring EasyAir parameters only, when you can physically access the sensor with a smartphone.
2. EasyAir IR – This app allows configuring EasyAir parameters plus enables grouping to a wireless switch, which can be done with the IR feature of applicable phones from floor level.

You must first register for the app to receive a username and password, then download Philips field apps from the Google Play Store. Refer to <http://www.lighting.philips.co.uk/oem-emea/products/easy-to-integrate-wireless-sensors.html> for details including applicable Android phones and user manuals.

### Default Factory Settings

Occupancy Detection	Auto-on, Enabled
Daylight Based Control	Auto-on, Enabled
LED Indicator	Enabled
Occupancy Mode	Auto-on/off
Occupancy Sharing	Enabled
Elsewhere Occupancy Level	Background level
Field Task Tuning	100%
Background Light Level	20%
Hold Time	15 minutes
Prolong Time	15 minutes
Grace Fading	10 seconds
Fade to Switch On	0.7 seconds
Fade to Switch Off	0.7 seconds

### Disclaimer

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