HDL-MSPIR.2C

Multi-function Presence Sensor

Datasheet

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Figure 1. Multi-function Presence Sensor

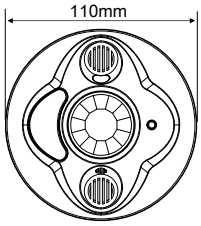


Figure 2. Dimensions - Front View

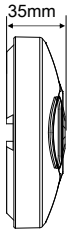


Figure 3. Dimensions - Side View

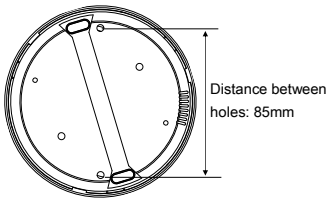


Figure 4. Dimensions - Back View

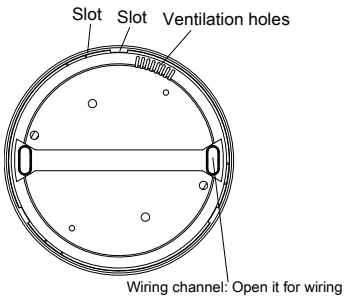


Figure 5. Components - Back View

Overview

Multi-function Presence Sensor (See Figure 1) is a 24V low-voltage multi-function presence sensor, which is with dry contact signal output. Including PIR motion sensor, ultrasonic sensor and LUX sensor, the presence sensor can be used for automatic control, and can be set by the customer to delay control devices.

Functions

- 3 input conditions in total: PIR motion, ultrasonic, LUX.
- 1-channel of 5A relay output can be used to control lights.
- Built-in PID for constant illumination control. The setting value can be changed according to the needs of environmental setting.
- The delay shutdown time can be set according to customer needs. This function is used to turn off the lights when the sensor does not detect movement after a specified time.

Important Notes

- Installation location - Away from AC outlets and heat source for indoor use.
- Operation temperature - Below 50°C for using PIR function.
- Target detection - PIR for moving objects with heat radiation (human, animals, etc.), ultrasonic for all moving objects.
- Bus connection - Series connection (hand-in-hand recommended).

Product Information

Dimensions - See Figure 2 - 4

Components - See Figure 5

Detection range - See Figure 6

Installation - See Figure 7 - 10

Step 1. Rotate and open the sensor.

Step 2. Fix the sensor base on the ceiling with screws.

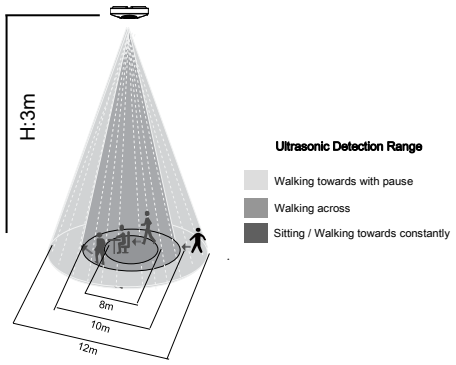
Step 3. Put the cover on the sensor.

Safety Precautions

- The installation and testing for the product must be carried out by HDL Automation Co., ltd. or its appointed service agencies. The electric construction shall comply with local laws and safety regulations.
- HDL will not be responsible for any consequence caused by the inexpert or faulty installation and wiring methods, which are not in accordance with the instructions contained in this operating instruction.
- Please do not privately disassemble or replace any parts of the product. Otherwise, it may cause mechanical fault, electric shock, fire or personal injuries.
- Please contact our after-sales departments or our designated service agencies for your maintenance service. Product failures caused by private disassembly are not subject to this warranty.

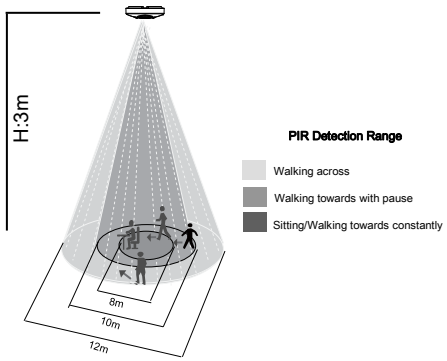
Package Contents

HDL-MSPIR.2C*1 / Screw*2 / Datasheet*1



Ultrasonic Detection Range (At 25℃)

Mounting height	Sitting / Walking towards constantly	Walking across	Walking towards with pause
3m	8m	10m	12m



PIR Detection Range (At 25℃)

Mounting height	Sitting / Walking towards constantly	Walking towards with pause	Walking across
3m	8m	10m	12m

Figure 6. Detection Range

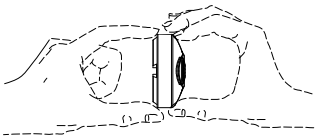


Figure 7

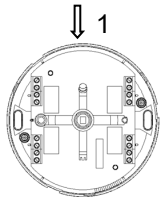


Figure 8

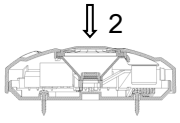


Figure 9

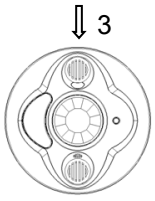


Figure 10

Figure 7 - 10. Installation

Technical support

E-mail: hdltickets@hdlautomation.com

Website: https://www.hdlautomation.com

Technical Data

Basic Parameters

Working voltage	18~30V DC
Working current	90mA/24V DC
Illumination detection range	0-35000Lux
PIR detection range in diameter	12m (installation height: 3m)
Ultrasonic detection in diameter	12m (installation height: 3m)
Communication	Dry contact

External Environment

Working temperature	-5°C~45°C
Working relative humidity	≤90%
Storage temperature	-20℃~60℃
Storage relative humidity	≤93%

Specifications

Dimensions	Φ110mm×35mm
Net weight	207g
Housing material	Lens, ABS
Installation	Ceiling mount (See Figure 7 - 10)
Protection rating (Compliant with EN 60529)	IP20

Name and Content of Hazardous Substances in Products

Components	Hazardous substances					
	Lead (Pb)	Mercury (Hg)	Cadmium (Cd)	Chromium VI (Cr (VI))	Poly-brominated biphenyls (PBB)	Poly-brominated diphenyl ethers (PBDE)
Plastic	o	o	o	o	o	o
Hardware	o	o	o	o	-	-
Screw	o	o	o	×	-	-
Solder	×	o	o	o	-	-
PCB	×	o	o	o	o	o
IC	o	o	o	o	×	×

The symbol “-” indicates that the hazardous substance is not contained.

The symbol "o" indicates that the content of the hazardous substances in all the homogeneous materials of the component is below the limit requirement specified in the Standard IEC62321-2015.

The symbol “×” indicates that the content of the hazardous substance in at least one of the homogeneous materials of the part exceeds the limit requirement specified in the Standard IEC62321-2015.