

# Automatic door microwave sensor

**PD-DS1015 24.125GHz**



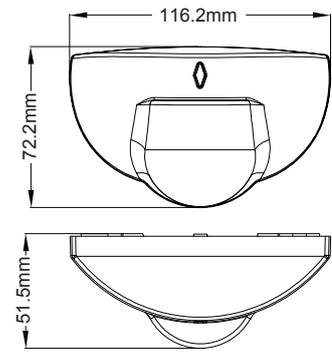
Black



Silver



Golden yellow



<b>Packing list in</b>	$\phi 6$ Plastic expansion	3x30 Screw	<b>Instruction</b>	<b>Cable</b>	
<b>Quantity</b>	<b>2X</b>	<b>2X</b>	<b>1X</b>	<b>1X</b>	

## Summary

The sensor is designed by FFT arithmetic program, and has a high accuracy in distance detection and ability of anti- interference. Using the original Omron relay which has an ultra small measurement and low power consumption. It has a small internal resistance to make it insensitive to temperature. The reliability is much higher than the common photoelectric-output ones. It's suitable for different kinds of auto-door-controller also can be applied as a human detector for alarm systems.. Besides, the sensing function can be customized. The sensor has the best cost performance during such kind of products.

## Specifications

Power source: AC: 10-24 AC/50Hz  
DC: 12-35 DC

Standby current: <13mA

Working current: 25mA

Output Capacity: 35V , 0.5A

Output Duration: 500ms

HF system: 24.125GHz CW radar, ISM band

Cover color: Black/Silver/Golden yellow

Installation sit: Wall installation

Mounting height: 2.0m to 3.5m

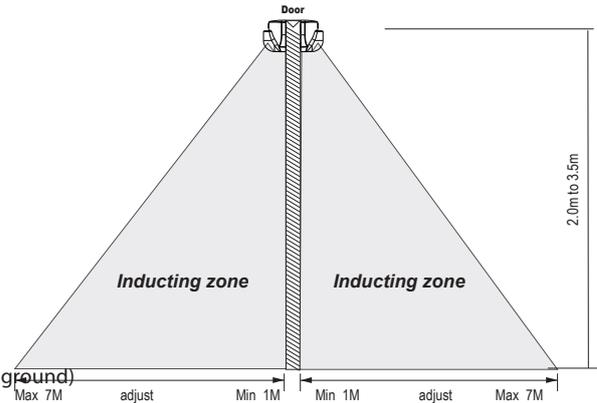
Detection angle: 90°(wall installation)it can be made according to customers'demand

Detection range: 1m (max sensibility, probe perpendicular to the ground)  
7m (max sensibility, probe forward)

Power consumption: Approx. 1W

Working temperature: -20°C~50°C

Working humidity: <93%RH



**It can be made according to customers'demand**

Fig.1

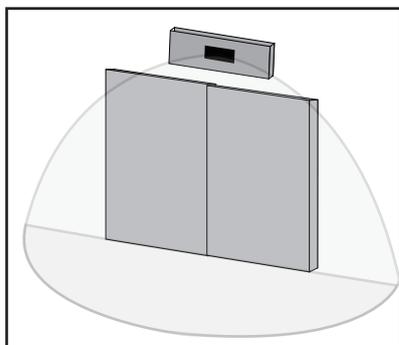


Fig.2

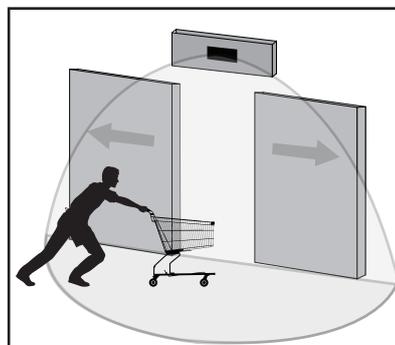
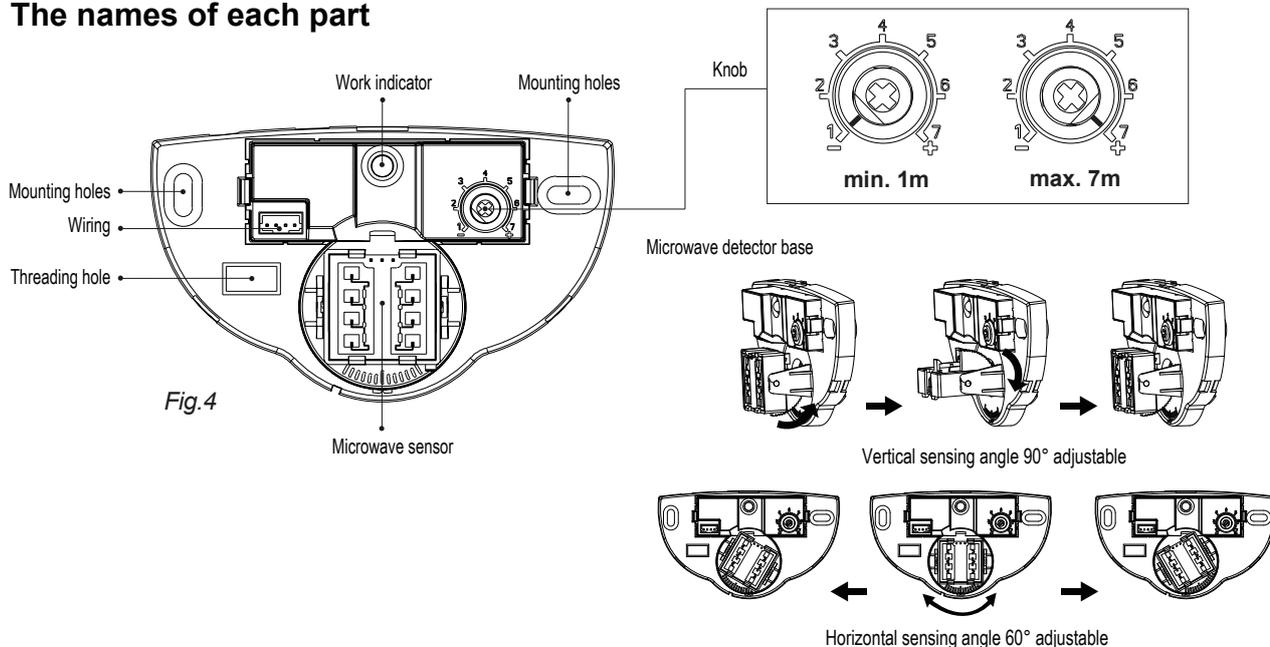


Fig.3

1. Adopt the high-reliability 24.125GHz Ku band microwave radar sensor module.
2. Work in various environments  
(Hot, humid, noisy and windy. Without intervene of other moving objects, such like moving car or animals)
3. Small and practical design, widely used for different kinds of sensing door.
4. Adopt the World Health Organization advanced sensing technology, harmless to the health.
5. Sensing distance and angle can be adjusted to meet requirements of different scenes.

## The names of each part



## Detection range setting

To turn fully anti-clockwise is the minimum distance (approx. 1m), fully clockwise is the maximum (approx. 7m). If person's stature, figure and moving speed change, the detection will also change, that is, the higher speed will lead to the shorter detection distance. This detection distance is the distance that adjust when detector face the front. When install the sensor, adjusting the sensing angle and distance according to the practical scene. Just ensure the enough sensing distance to open the door. Don't set longer sensing distance in case the wrong triggering to the door from the pass-by people or car.

Notice: when using this product, please adjust the sensitivity (detection range) to an appropriate value but the maximum to avoid the abnormal reaction caused by the easy detection of the wrong motion by the blowing leaves & curtains, small animals or the interference of power grid & electrical equipment. All the above mentioned will lead to the error reaction. When the product does not work normally, please try to lower the sensitivity appropriately, and then test it. Human movement will cause the sensor induction, so when you under the function testing, please leave the induction region and don't make movement to prevent the sensor continuous work.

## Procedure of installation

Step1 Remove the cover before you install the product.(as Fig5.)

Step2 Mark the hole position with a pencil after determining where you want to install the product.

Note: If it is a wooden wall, there is no need to use plastic expansion screw, just fasten the screw with the screwdriver.

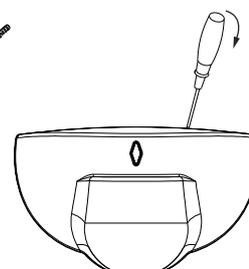
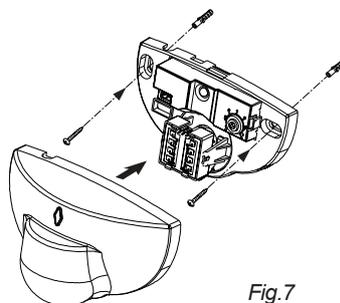
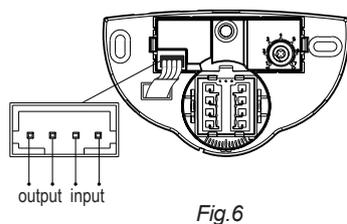
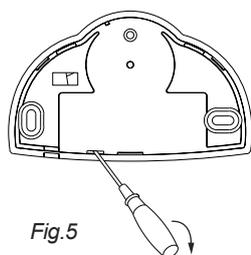
Step3 Drill holes on the walls where there is pencil mark with an electric drill and get the plastic expansion inside the hole.

Step4 Connect the cable to the product through the cable entry openings.(as Fig6.)

Step5 Using the screws install the base on the selected position and adjust the knob.(as Fig7.)

Step6 Fasten the cover to the base which has been installed on the wall.(as Fig7.)

➤ Open to adjust the sensor after installation: Insert the screwdriver into the joint between the cover and the base and pry the cover. (Fig.8)



## ⚠ Warning!

### The following situations will lead to error reaction.

1. Being installed on the rocking object will lead to error reaction.
2. The shaking curtain blown by wind will lead to error reaction. Please select the suitable place to install.
3. Being installed where the traffic is busy will lead to error reaction.
4. The sparks produced by some equipment nearby will lead to error reaction.