



# Movement sensor user manual

Oct 2020  
Version 002D

## Table of content

1.	Introduction .....	3
2.	Compatibility .....	3
3.	Presentation.....	4
4.	Device configuration .....	4
5.	API .....	4

# 1. Introduction

The goal of this document is to explain how to use the **PIR-STD** movement sensor with a device supporting a Jack35 GPIO.

## 2. Compatibility

### **Device:**

- SMA300
- SMT210
- DMB400

### **Device firmware version :**

- Gekkota OS V4.11.10 (or above)

### **Device GPIO configuration :**

- Configuration-by-script V1.11.21 (or above)

## 3. Presentation

The **PIR-STD** movement sensor is an infrared sensor.

The sensor output needs to be connected on a device input having a pull-up resistor like the Jack35 GPIO of the SMA300, the SMT210 and the DMB400.

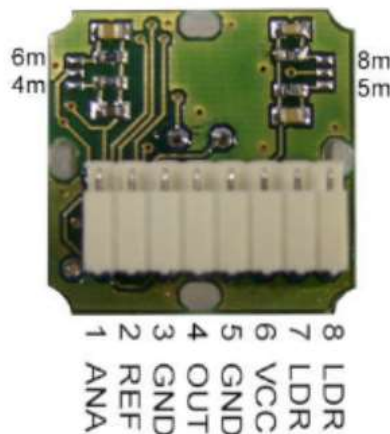
When one movement is detected, the sensor output level goes to the 0 V level for 100 ms then returns to the 3.3 V level.

When several consecutive movements are detected, the sensor output oscillate with either the 0 V level, or the 3.3 V level

When there is no movement, the sensor output returns to the 3.3 V level.

The default sensor sensivity is **12m** (max. sensivity). The sensor sensivity can be decreased to by adding a jumper

- **8m**
- **6m**
- **5m**
- **4m**



## 4. Device configuration

Helped with the documentation **Configuration by script user guide**, configure the GPIO Jack35 of the device as input with a debouncing filter of 100 ms.

## 5. API

In case you had to make some App development, this is the GPIO API to control the GPIO:

<https://github.com/gekkota-os/SDK-G4/tree/master/API/system.gpio>