

Model: FS101

FS10x PIR Motion Sensor



Benefits

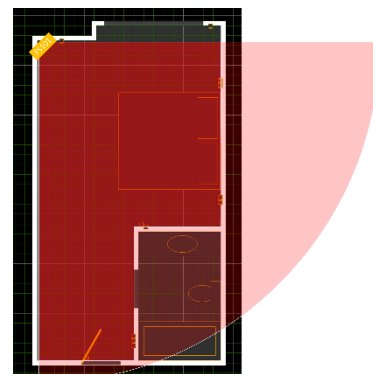
- ▲ Motion sensing as part of room occupancy detection solution
- ▲ Wireless communication to room automation equipment
- ▲ Simple to use – simple to maintain
- ▲ True IPv6 IoT connectivity to all devices
- ▲ Low cost
- ▲ Ten-year warranty
- ▲ Powered by CR2477 lithium coin cell battery lasting 5 years
- ▲ Designed for end-of-life product recoverability

Models

- ▲ Motion sensor
- ▲ Motion sensor with temperature and humidity sensor
- ▲ Black and white housing colors

The FS10x PIR (passive infrared) motion sensor from AuVerte is part of a modern room automation solution and is a key element to determine the occupancy status of an enclosed space. Tracking the passive heat given off by building occupants and using encrypted wireless communication provides for a high degree of data privacy. Battery powered and utilizing wireless RF communication, this sensor is simple to install and to maintain.

In a large or complex room layout, multiple FS10x motion sensors can be linked together. All FS10x motion sensors store 90 minutes of motion history for advanced data analytics and auto-configuration algorithms.



C5xx Ondur Thermostat



GK101 Optical Door/Window Sensor



GK104 Aux. Temperature/Humidity Sensor



Specifications

Sensors

Motion Sensor	PIR (Passive Infrared)
Motion Sampling	Latching and sampled once per 1000 milli seconds
Low-battery sensor	Measures and reports battery voltage to support applications that signal low-battery conditions.
Temperature sensor (FS102 model)	10 °C to 35 °C, accuracy +/- 1 °C
Humidity sensor (FS102 model)	0%RH to 100%RH non-condensing, accuracy +/- 2%

Radio

Standard	IEEE 802.15.4
Frequency band	ISM 2.4 GHz
Interference immunity	DSSS (Direct sequence spread spectrum)
Data rate	250 kbps
Antenna	Build-in
Indoor range	Up to 50 m (150 ft)
Transmit power	+3 dBm
Receiver sensitivity	-95 dBm
Channels	16 (11 to 26, default 25)
Protocol	AuVerte mesh IPv6 over 802.15.4 with forward error correction (FEC-ECC) via proxy

Software

Encryption	AES128
Routing	UDP over AuVerte Rf mesh and through an IPv6 proxy device
Cyber security	Packet authentication, configurable encryption keys with no backdoors
Motion history	90 minutes

Device

Power	CR2477 3V/1000mAh coin-cell (not included) Approved battery vendors: <ul style="list-style-type: none"> • Panasonic • Mitsubishi • Murata
Battery life	5 years
Mounting	Surface mount, double-sided adhesive tape. Corner mount double-sided adhesive tape or screwed.

Environmental and Physical Specification

Dimensions	48.8mm x 28.5mm x 19mm
Weight	0.025 kg, 0.85oz (incl. battery) 0.014 kg, 0.49oz (without battery)
Operating temperature	10 °C to 40 °C (50 °F to 104 °F)
Storage temperature	-20 °C to 70 °C (-4 °F to 158 °F)
Operating humidity	10 % to 95 %RH, non-condensing
Storage humidity	5 % to 90 %RH, non-condensing
Electromagnetic emissions	FCC Part 15 Class A EN 62311 (EMR) ETSI EN 300 328 (2.5GHz ISM Band) ETSI EN 301489 (EMC)
Safety approvals	EN 60950
Environmental	RoHS
Cleaning	Mild cleaning liquid, soft towel
Recycling	7.5g ABS 6,5g electronics, 10.5g battery

Ordering Information

Part numbers	003004.FS101 (motion only) 003004.FS102 (motion, temperature and humidity sensor)
Package content	6 FS101 (or FS102) motion detectors, 6 corner mounting holders.
Color Options	■ White ■ Black
Options	None



FCC STATEMENT :

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

- (1) This device may not cause harmful interference, and
- (2) This device must accept any interference received, including interference that may cause undesired operation.

Warning: Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

RF warning statement:

The device has been evaluated to meet general RF exposure requirement. The device can be used in portable exposure condition without restriction.