# **FA206DS PIR Sensor**

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- ► Reliable communication through 900 MHz spread spectrum technology with frequency hopping
- ► False alarm reduction through 56 bit communication protocol and advanced signal processing
- ▶ 3 minute sleep time
- ▶ Replaceable battery
- ▶ Pointable mirror

The FA206DS PIR Sensor has an integrated transmitter and advanced digital signal processing to recognize human signature size and movement, reducing false alarms. The three-minute sleep time after alarm detection maximizes battery life in high- traffic applications. Mirrored optics provide superior signal-to-noise ratio and better capture. Pointable mirror inside tamper-protected case helps ensure the PIR is not misdirected or aimed improperly without detection.

## **Functions**

## **Communication Reliability**

Using a bandwidth of at least 10 MHz in the 900 MHz range with a frequency hopping technique that sends redundant messages across that bandwidth reduces interference and provides a greater range for more reliable communication. The shorter wavelength at 900 MHz allows signals to pass through narrow openings in both commercial and residential environments. The higher transmission power allowed by the Federal Communications Commission (FCC) for 900 MHz spread spectrum systems results in a longer open-field range than traditional 300 MHz products.

#### **False Alarm Reduction**

The 56 bit communication protocol eliminates lost or incorrectly decoded signals due to radio interference.

# **Motion Analyzer II Processing**

Motion Analyzer II uses multiple thresholds and timing windows to analyze timing, amplitude, duration, and polarity of signals to make an alarm decision. It tolerates extreme levels of heat and light caused by heaters and air conditioners, hot and cold drafts, sunlight, lightning, and moving headlights.

#### **Test Features**

External visible High Output Alarm LED. Internal Noise Voltage Test Pins provide precise pattern location and background disturbance evaluation using a standard analog meter.

## **Insect and Draft Immunity**

The sealed optical chamber provides immunity to drafts and insects.

# **Three Sensitivity Settings**

Standard Sensitivity

Recommended setting for maximum false alarm immunity. Tolerates environmental extremes on this setting. Not recommended for long range or barrier coverage patterns.

• Intermediate Sensitivity

Recommended setting for any location where an intruder is expected to cover only a small portion of the protected area. Tolerates normal environments on this setting.

#### · High Sensitivity

Fast response to intruder signals. For use in quiet environments where fluctuations in heat or light are not anticipated.

## Certifications and approvals

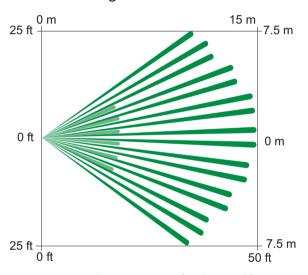
Complies with: FCC Part 15

## Installation/configuration notes

# **Compatibility Information**

Receivers FA400, FA404R, FA416R, and FA422

# **Standard Coverage**



## Top View Broad: 15 m x 15 m (50 ft x 50 ft)



Side View Broad: 15 m x 15 m (50 ft x 50 ft)

# **Optional Coverage**



# Top View Long Range (OMLR77): 36 m x 3 m (120 ft x 10 ft)



Side View Long Range (OMLR77): 36 m x 3 m

## (120 ft x 10 ft)

## **Technical specifications**

## **Environmental**

Relative Humidity:	Up to 95% non-condensing
Temperature (Operating):	0°C to +60°C (+32°F to +140°F)

## Mechanical

Color:	Gray
Dimensions:	14 cm x 6.9 cm x 5.6 cm (5.75 in. x 3.75 in. x 2.50 in.)
Sleep Time:	180 seconds
Frequency:	902 MHz to 928 MHz
Modulation:	Spread spectrum through frequency hopping
Range (Open Field):	1.6 km (1 mile)

#### **Electrical**

Average Life:	2 years
Power:	3 V
Type:	Duracell® DL123A, Panasonic® CR123A

#### **Trademarks**

 $\label{eq:company} \mbox{Duracell}{}^{\circledcirc}\mbox{ is a trademark owned or used by The Gillette Company or its affiliates.}$ 

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# **Ordering information**

# **FA206DS PIR Sensor**

Integrated transmitter and advanced digital signal processing for recognizing human signature size and movement

Order number FA206DS

#### Accessories

# **B328 Gimbal-mount Bracket**

Mounts on a single-gang box and allows rotation of a detector. Wires are hidden inside.

Order number B328

## Swiveling B335-3 low-profile mount

Swiveling, low-profile, plastic mount for wall mounting. The vertical swivel range is  $\pm 10^{\circ}$  to  $-20^{\circ}$ , while the horizontal swivel range is  $\pm 25^{\circ}$ . Available in triple packs.

Order number B335-3

## **B338 Universal Ceiling-mount Bracket**

Swiveling plastic mount for ceiling mounting. The vertical swivel range is +7° to -16°, while the horizontal swivel range is ±45°.

Order number B338

## **OMB77-3 Barrier Mirror**

Provides barrier coverage with a 25 m x 5 m (80 ft x 16 ft) pattern. Shipped in packages of three. Order number OMB77-3

# **OMLR77-3 Long-range Mirror**

Provides long-range coverage with a 40 m x 3 m (120 ft x 10 ft) pattern. Shipped in packages of three. Order number OMLR77-3

## TC6000 Test Cord

Test cord for connecting a compatible detector's test pins to a voltmeter. It is 4.6 m (15 ft) long. Order number TC6000

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