

alula™ RE659 360 Motion Sensor Connect+™ Encrypted



360 PIR Motion Sensor alarms when motion is sensed. It is a commercial battery-powered ceiling mount sensor with a 360 degree detection range.



Features

- 360° detection range with 62 distinct detection zones
- Range up to 40 feet in diameter
- Selectable pulse count 2 or 4
- Designed for commercial applications
- 5 year warranty

Enroll by entering the serial number into the security panel. Alternatively, the sensor can be enrolled by placing the panel into enrollment mode, and then pulling the battery tab or tampering the device.

Install by screwing two #8 screws into the ceiling, leaving 1/4 inch of thread exposed. Next, slide the back plate over the screws and rotate the back plate. Screw the third #8 screw through the wall tamper into the ceiling, ensuring that the wall tamper screw is attached to something solid. Tighten all screws until snug. Then, insert the square nut into the square slit of the cover and start threading the #4 screw into the side of the cover. Close the cover and conduct a walk test. After testing, take the unit out of walk test mode and close the cover again. Finally, finish threading the #4 screw until it is snug.

Mounting Tips

- Avoid direct sunlight
- Avoid facing directly to AC or heating vents
- Avoid vapor or high humidity
- Avoid curtains, screens, etc. from blocking detection
- Do **not** install outdoors

Use the panel's installation guide to verify proper system setup.

Sensor Functions

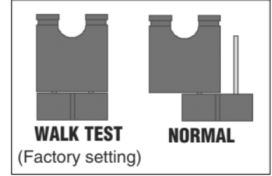
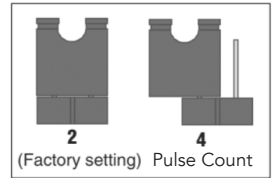
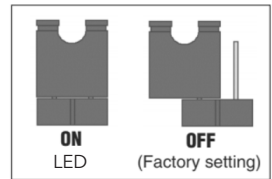
Alarm LED can be switched either "ON" or "OFF".

Pulse Count can be switched to either "2" or "4" pulse mode depending on the environmental conditions of the installation.

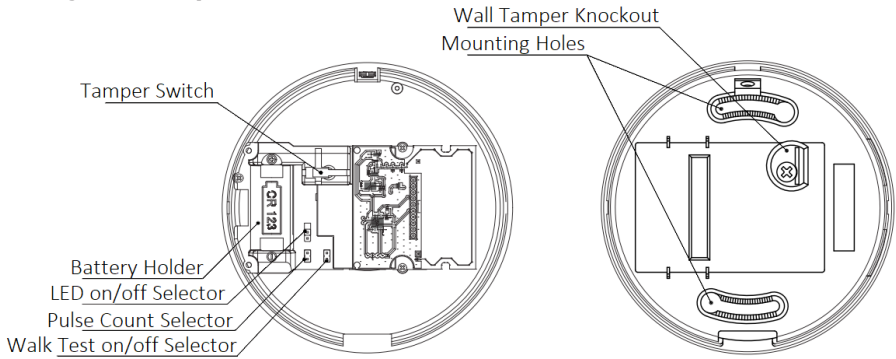
Pulse Count

- Select "2" for normal applications.
- Select "4" for use in areas where there may be movement by small animals or other objects, such as fax machines or curtains.

Walk Test Jumper puts sensor in *Walk Test Mode* when connected or *Normal Mode* when not connected. The LED will light up and an alarm will be sent whenever motion is detected if the unit is in Walk Test Mode. In Normal Mode, the unit will only send an alarm every 2 minutes, and the LED will only light up if the "LED ON" jumper is connected.

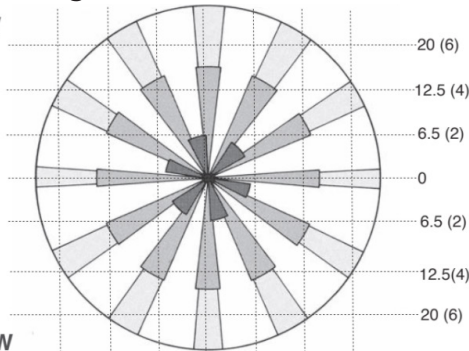


Mounting and Jumper Locations

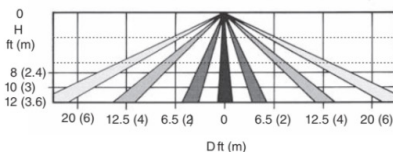


Detection Range

TOP VIEW



SIDE VIEW



MAX. Detection AREA

Installation Height ft (m)	8 (2.4)	10 (3)	12 (3.6)
Detection Area (Diameter) ft (m)	25 (8)	32 (10)	40 (12)

Troubleshooting

<i>Problem</i>	<i>Probable Cause</i>	<i>Remedy</i>
Alarm is not activated although someone is walking in detection area	Detection area is improper, battery is dead, Walk Test switch is OFF and 2 minute delay is active	Conduct a walk test, change the battery
Alarm is activated with nobody in the area	Moving object within detection area, temperature of object within area is changing rapidly	Remove the object from the detection area, remove the heat sources from the detection area or relocate the detector
LED does not light up at the time of the walk test	Walk test switch is OFF, battery is dead	Turn the walk test switch ON, change the battery
LED does not light up in normal operation	LED switch is OFF, battery is dead	Turn LED switch ON, change battery

Pro Tips

Save battery life by taking unit out of walk test mode after completing walk test. There is no 2 minute delay when in walk test mode. Leaving in walk test mode will severely decrease battery life.

Light changes will cause the sensor to trip. Ensure that the detector is not placed near windows.

Sudden temperature changes will cause the sensor to trip. Ensure the motion detector is not placed near heating and cooling vents.

High humidity environments can cause condensation of the detection lens. Ensure the motion detector is not installed in these kinds of environments.

Protective film should be removed from the lens after installation.

Sensor Specifications: The table below displays the functional frequencies of each compatible sensor.

Specifications

Physical	
Housing Dimensions	4.72 x 1.57 inches (40 x 120 mm)
Weight with Battery	4.2oz (120g)
Mounting Fasteners	(3) #8 screws, (1) square nut, (1) #4 screw (All provided)
Environmental	
Operating Temperature	32°F to 120°F (0°C to 49°C)
Maximum Humidity	85% non-condensing relative humidity
Sensor Specifications	
Frequencies	433.92 MHz
Replacement Battery	One Panasonic CR123A Lithium Battery
Nominal Battery Life	3 years (assuming 720 trips/day), 7 years (assuming 240 trips/day)
Battery Voltage	3.0 VDC (Nominal), 2.7 VDC (Low)
Current Draw	21 mA (Maximum), 4.7 uA (Standby), 30 mA (Max in walk test)
Detection Range	Up to 40 Feet (12 m)
Detectable Speed	1 to 5 feet per second (0.3 to 1.5 meters per second)
Transmitted Indications	Motion, Tamper (Cover/Wall), Low Battery, Supervision
Certification	
RE659	UL639, ULC-S306-03, ETL, FCC, IC

Specifications subject to change without notice

WARRANTY

Alula will replace all non-portable products that are defective in their first five (5) years, and all portable products that are defective in their first two (2) years.

IC NOTICE

This device complies with Industry Canada license-exempt RSS standard(s). Operation is subject to the following two conditions:

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

Le présent appareil est conforme aux cnr d'Industrie Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes:

- (1) L'appareil ne doit pas produire de brouillage, et
- (2) L'utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

IC: 8310A-RE359

FCC NOTICE

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.
- (2) This device must accept any interference that may be received, including interference that may cause undesired operation.

Changes or modifications not expressly approved by Alula could void the user's authority to operate this equipment.

FCC ID: U5X-RE359

TRADEMARKS

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