

INSTALLATION INSTRUCTIONS

Models

IQ220	40' x 40'
IQ220C	12 m x 12 m
IQ260	60' x 50'
IQ260C	18 m x 15 m

SYSTEM DESCRIPTION

The IQ220 and IQ260 are equipped with two dual-element pyros. The pyros are mounted side by side, and use the same optical system to create a dense pattern of overlapping zones. When an intruder enters any zone, infrared energy is focused onto a dual element pyro, which in turn generates a positive or negative signal. The output of each pyro is constantly fed into an AND-gate.

For an alarm condition to occur, both pyros must detect motion at or about the same time. This requirement virtually eliminates the false alarms caused by 'popcorn' noise, changes in ambient temperature, and other random environmental disturbances — all without sacrificing catch performance.

The IQ220 and IQ260 are compact, attractive, easy to install and maintain. The units can be mounted almost anywhere **indoors**: on walls or in corners. A built-in adjustment slide makes it possible to adjust the range without relocating the sensor. In addition, the IQ220C and IQ260C are equipped with a form C alarm relay.

FEATURES

- Two dual PIR detectors
- Dense detection pattern with look-down zones
- NEW wide angle, barrier, and pet-alley lenses included
- Low 30 mA current draw at 12 VDC
- 10 - 14 VDC operation
- Energized form A alarm relay - Models IQ220 and IQ260
- Energized form C alarm relay - Models IQ220C and IQ260C
- Improved RFI and white light immunity
- Single-edge PIR triggering
- Only QUAD with automatic temperature compensation
- Mounting flexibility: walls, corners, or using optional swivel bracket
- NEW built-in range adjustment slide
- Electronic circuit protection
- Remote alarm LED enable

APPLICATIONS

IQ200 series sensors are ideal for residential and commercial applications.

MOUNTING LOCATION

IQ200 series sensors are designed for use **indoors**. Make sure the sensor has a clear line of sight to the protected area. Passive infrared radiation cannot penetrate solid objects. If the sensor is blocked, it will not alarm.

If possible, aim the sensor toward the interior of the room, away from windows and heating/cooling sources. To obtain the desired range, set the printed circuit board (PCB) at the proper position, as explained in the RANGE ADJUSTMENT section.

MOUNTING PROCEDURE

To remove the sensor's front cover, use a small screwdriver to push down on the latch at the top of the unit, while separating the housing parts.

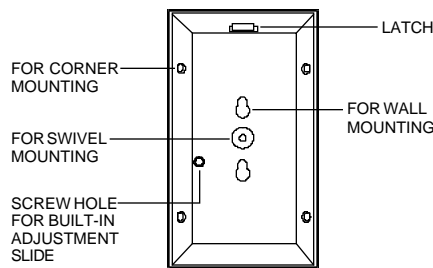


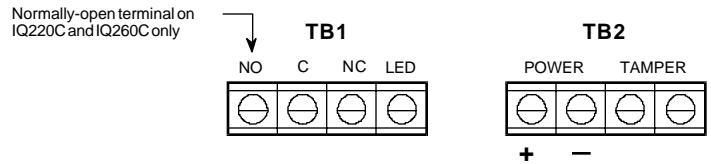
Figure 1 IQ220/IQ260 Rear Housing

To remove the PCB, remove the screw in the adjustment slide. Mount the rear housing at the desired location. See Figure 3.

WIRING

Terminals TB1 and TB2 are located near the top edge of the PCB. TB1 is for the alarm relay and alarm LED enable. TB2 is for the power and tamper. Wire the sensor as shown in Figure 2.

Figure 2 Wiring the IQ220/IQ260



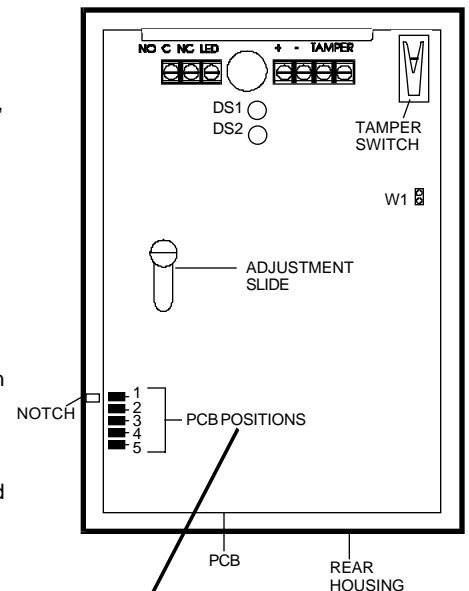
RANGE ADJUSTMENT

The IQ220 and IQ260 are equipped with a special adjustment slide. The slide allows you to make range adjustments without relocating the sensor.

To adjust the range:

- Refer to the range chart below for your model.
- At the top of the chart, find the sensor mounting height.
- On the left side of the chart, find the sensor mounting position.
- The gray square where the PCB position and the mounting height intersect is the pattern distance.
- Loosen the screw in the adjustment slide, slide the PCB until the proper position is lined up with the notch on the rear housing, then tighten the screw.
- Walk-test the sensor.

Figure 3 Adjusting the Range



IQ220 Range Chart

PCB POS.	MOUNTING HEIGHT			
	8'	9'	10'	12'
1	40	40	40	N/A
2	35	37	40	40
3	25	27	30	35
4	15	17	20	25
5	10	13	15	20

NOTE: Both charts were compiled using the factory installed wide angle lens.

IQ260 Range Chart

PCB POS.	MOUNTING HEIGHT			
	8'	9'	10'	12'
1	60	60	60	60
2	45	47	50	55
3	30	33	35	40
4	20	23	25	30
5	10	13	15	20

NOTE: These range charts are not applicable when using the pet-alley lens. See note 1 under Changing the Fresnel Lens (on the back page) for correct pet-alley mounting height and PCB position.

CHANGING THE FRESNEL LENS

Two additional Fresnel lenses are provided with this unit. The pet-alley lens blocks lower zones to exclude small pets from the field of view. The barrier lens blocks outer zones for narrow applications (like aisles and hallways).

To install either lens, remove the sensor's front cover.

Next remove the the lens retainer by depressing the retainer brackets on either side of the lens retainer.

Take out the existing lens, and put the new lens in with the SMOOTH side facing outward. The slots at the top and bottom of the lens should be positioned to match the small and large tabs on the front cover. (See Figure 4.)

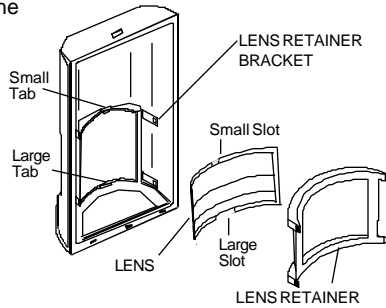


Figure 4 Changing the Fresnel Lens

Snap the lens retainer back into place, then reassemble the housing.

- NOTE:**
1. When the pet-alley lens is used, install a look-down mask (provided) over the inside of the look-down window, adjust the PCB to position #1, and mount the sensor at a height of 4'.
 2. When the barrier lens is used, the IQ220 or IQ260 range chart on the front page can be used as a reference.

REMOTE ALARM LEDS ENABLE

Alarm LEDs DS1 and DS2 are located near the top center of the PCB. (Refer to Figure 3.)

- When a jumper is placed in position W1, the alarm LEDs will be enabled, but the LED terminal on TB1 will be inoperable.
- When the jumper is removed from position W1, the alarm LEDs will be disabled, but can be REMOTELY enabled by connecting the LED terminal on TB1 to a remote common ground.

WALK-TEST

Before walk-testing the sensor, enable the alarm LEDs (if disabled). Apply power to the unit, and let it warm up for at least three minutes. Begin walk-testing when the alarm LEDs have gone out.

Walk across the protected area at the ranges to be covered. One to two normal steps across the pattern should make the alarm LEDs light. When there is no motion in the protected area, the alarm LEDs should be off.

SPECIFICATIONS

Alarm relay:

Form A (NC)
100 mA, 30 VDC
Form C (optional)
500 mA, 30 VDC

Power requirements:

10 - 14 VDC
30 mA, 12 VDC

Tamper switch:

(NC)
25 mA, 30 VDC

Range:

IQ220 40' x 40' (12 m x 12 m)
IQ220C 40' x 40' (12 m x 12 m)
IQ260 60' x 50' (18 m x 15 m)
IQ260C 60' x 50' (18 m x 15 m)

White light immunity:

up to 60,000 candlepower at 10' (3 m)

RFI immunity:

more than 100 watts at 5' (1.5 m) from all mobile bands 10 - 1000 MHz

PIR fields of view:

Standard Lens
22 long range
6 intermediate
3 lower
6 down

Sensitivity:

1-2 steps within field of view

Automatic temperature compensation:

range does not decrease as room temperature nears body temperature

Operating temperature:

32° to 120°F (0° to 49°C)

Dimensions:

5" high x 2-7/8" wide x 2-5/16" deep
(13 cm x 7 cm x 6 cm)

Weight:

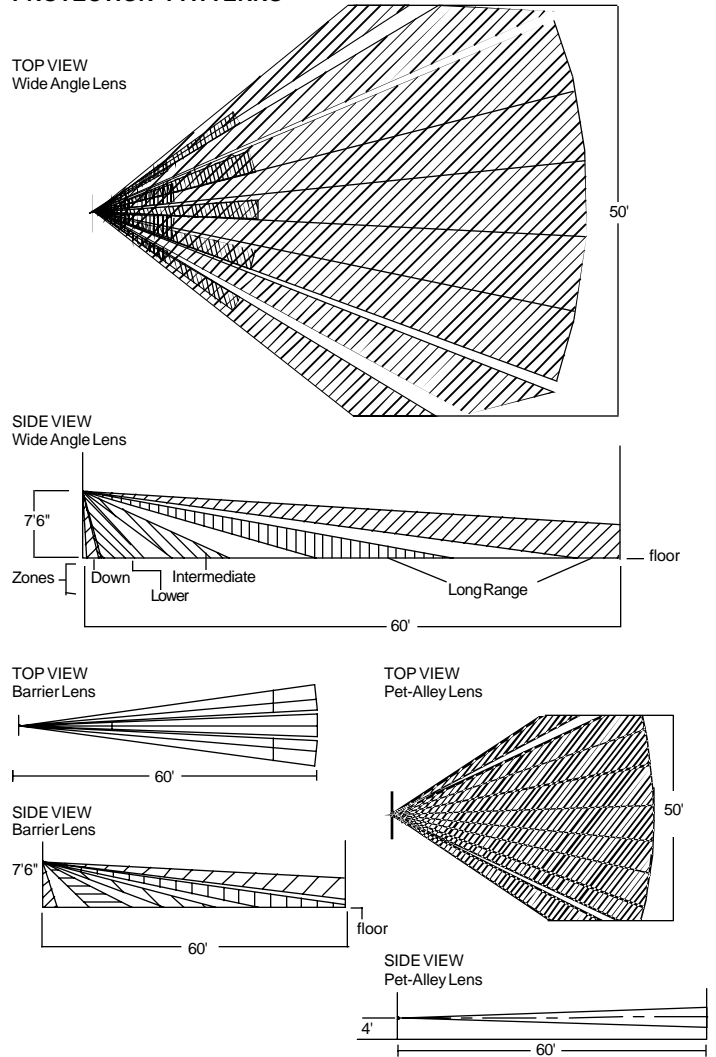
8 oz (226.4 g)

Approvals:

UL listed

IQ260/IQ260C PROTECTION PATTERNS

Use as reference for IQ220/IQ220C



LIMITED WARRANTY

Seller warrants its products to be in accordance with its own plans and specifications and to be free from defects in materials and workmanship under normal use and service for **18 months** from the date stamp control on the product; or for products not having an IntelliSense Systems date stamp, for **12 months** from the date of original purchase, unless the installation instructions or catalogue sets forth a shorter period, in which case the shorter period shall apply.

Seller's obligation shall be limited to repairing or replacing, at its option, free of charge for materials or labor, any part which is proved not in compliance with Seller's specifications or proves defective in materials or workmanship under normal use and service. This warranty is void if the product is altered or improperly repaired or serviced by anyone other than IntelliSense factory service: 2171 Watterson Trail, Louisville, KY, 40299.

THERE ARE NO WARRANTIES, EXPRESS OR IMPLIED, OF MERCHANTABILITY, OR FITNESS FOR A PARTICULAR PURPOSE OR OTHERWISE, WHICH EXTEND BEYOND THE DESCRIPTION ON THE FACE HEREOF. In no case shall Seller be liable to anyone for any consequential or incidental damages for breach of this or any other warranty, express or implied, or upon any other basis of liability whatsoever, even if the loss or damage is caused by Seller's own negligence or fault.

Seller does not represent that its product may not be compromised or circumvented; that the product will prevent any personal injury or property loss by burglary, robbery, fire, or otherwise; or that the product will in all cases provide adequate warning or protection. Buyer understands that a properly installed and maintained alarm system may only reduce the risk of burglary, robbery, or fire without warning, but it is not insurance or guarantee that such will not occur or that there will be no personal injury or property loss as a result. CONSEQUENTLY, SELLER SHALL HAVE NO LIABILITY FOR ANY PERSONAL INJURY, PROPERTY DAMAGE, OR OTHER LOSS BASED ON A CLAIM THAT THE PRODUCT FAILED TO GIVE WARNING. However, if Seller be held liable, whether directly or indirectly, for any loss or damage arising under this Limited Warranty or otherwise, regardless of cause or origin, Seller's maximum liability shall not in any case exceed the purchase price of the product, which shall be fixed as liquidated damages and not as a penalty, and shall be the complete and exclusive remedy against Seller.

This warranty replaces all previous warranties and is the only warranty made by IntelliSense on this product. No increase or alteration, written or verbal, of the obligation of this warranty is authorized.