

BAYweb Occupancy Sensor

Eagle Eye MS16A

Introduction

The following instructions cover the configuration of the ActiveEye (MS16A) Motion Sensor. The ActiveEye can be used indoors and outdoors.

Setup

When batteries are installed in the ActiveEye, you need to wait 30 seconds before it will see any motion.

After a transmission, you need to wait 10 seconds before the ActiveEye will see you.

The default House/Unit code is A1.

The default for motion detection is at all times (day and night).

The default time out after no motion is detected is Analog; i.e., the setting on the dial (under the rubber plug on the top of the ActiveEye).

The default for dawn/dusk detection is disabled.

Setting The House Code

- 1. Press and hold the HOUSE/ON button (located in the battery compartment).
- 2. The red LED flashes.
- 3. A few seconds later, the ActiveEye will report its current House code setting. 1 blink for A, 2 for B, 3 for C all the way to 16 for P.
- 4. When the ActiveEye starts to report its current setting, release the button.
- 5. If you do not wish to change the current setting, take no further action at this point. A few seconds later, the ActiveEye will timeout. The ActiveEye will indicate this to you by displaying a sustained blink (slightly longer than the report blinks).
- 6. Once the ActiveEye has finished reporting its current setting, press the button the number of times equal to the House code you wish to set (Once for A, twice for B, thrice for C, etc.) and hold the button down on the last press. Determine the code you wish to use before starting the programming procedure because the ActiveEye will only wait a few seconds after it has finished reporting its current setting for you to begin entering the new code.
- 7. A few seconds later, the red LED will blink the new setting.
- 8. If the programming fails, the red LED will display a sustained blink (slightly longer than the report blinks). This can occur if you wait too long to start your programming, you press the button more than 16 times, or you press the UNIT/OFF button. If the programming procedure fails, you must start the procedure over.

Setting The Unit Code

- 1. Press and hold the UNIT/OFF button (located in the battery compartment).
- The red LED flashes.
- 3. A few seconds later, the ActiveEye will report its current Unit code setting. The total number of blinks equals the unit number.
- When the ActiveEye starts to report its current setting, release the button.
- 5. If you do not wish to change the current setting, take no further action at this point. A few seconds later, the ActiveEye will timeout. The ActiveEye will indicate this to you by displaying a sustained blink (slightly longer than the report blinks).
- 6. Once the ActiveEye has finished reporting its current setting, press the button the number of times equal to the Unit code you wish to set and hold the button down on the last press. Determine the code you wish to use before starting the programming procedure because the ActiveEye will only wait a few seconds after it has finished reporting its current setting for you to begin entering the new code.
- 7. A few seconds later, the red LED will blink the new setting.
- 8. If the programming fails, the red LED will display a sustained blink (slightly longer than the report blinks). This can occur if you wait too long to start your programming, you press the button more than 16 times, or you press the HOUSE/ON button. If the programming procedure fails, you must start the procedure over.

Setting The Dawn/Dusk And Motion Detection Mode

This section configures the ActiveEye to send the ON command at dusk (no light) and the OFF command at dawn (any light) for the unit code one higher than the current House/Code setting (i.e., ActiveEye set to A1 will control A2 when dawn/dusk is detected). When battery power is initially applied to the ActiveEye, this feature is disabled. This section also configures the ActiveEye to detect motion at all times or only at night. The default setting is to detect motion at all times.

- 1. Press the UNIT/OFF button once.
- 2. The red LED flashes.
- 3. Press and hold the HOUSE/ON button.
- 4. The green LED (located behind the sensor window) turns on.
- 5. A few seconds later, the ActiveEye reports its current setting. Release the button.

The number of blinks reported by the ActiveEye represent the following:

Blinks	Dawn/Dusk	Motion Detection
1	Disabled	Day & Night
2	Disabled	Night Only
3	Enabled	Day & Night
4	Enabled	Night Only

- 6. If you do not wish to change the current setting, take no further action at this point. A few seconds later, the ActiveEye will timeout. The ActiveEye will indicate this to you by displaying a sustained blink (slightly longer than the report blinks).
- 7. To change the current setting, first select the Dawn/Dusk and Motion Detection settings you wish to use from the chart above and remember the blink value listed to the left of them (i.e. for dawn/dusk detection enabled and detect motion only at night there are 4 blinks). Determine the setting you wish to use before starting the programming procedure because the ActiveEye will only wait a few seconds after it has finished reporting its current setting for you to begin entering the new setting.
- 8. Press the HOUSE/ON button the number of times equal to the blink value in the chart above. **Hold the button down on the last press** (i.e. for a setting of dawn/dusk detection enabled and detect motion only at night, press the HOUSE/ON button 4 times and hold on the last press).
- 9. A few seconds later, the red LED will blink the new setting.
- 10. If the programming fails, the red LED will display a sustained blink (slightly longer than the report blinks). This can occur if you wait too long to start your programming, you press the button more than 2 times, or you press the UNIT/OFF button. If the programming procedure fails, you must start the procedure over.

Setting The No Motion Delay

When no motion is detected, the default amount of time that will pass before the OFF command is transmitted is Analog; i.e., the setting on the dial (under the rubber plug on the top of the ActiveEye). The dial adjusts the delay range from 1 minute to 60 minutes. The following procedure allows you to alter this setting.

- 1. Press the HOUSE/ON button once.
- 2. The red LED flashes.
- 3. Press and hold the UNIT/OFF button.
- 4. The green LED (located behind the sensor window) turns on.
- 5. A few seconds later, the ActiveEye reports its current setting. Release the button.

The total number of blinks represent the following delay times:

Blinks	Minutes
1	1 – 60 Dial Setting
2	2
3	4
4	8
5	16
6	32
7	64
8	128
9	256

Note: When the setting is 2 blinks or higher, the dial on top of the ActiveEye is disabled.

- 6. If you do not wish to change the current setting, take no further action at this point. A few seconds later, the ActiveEye will timeout. The ActiveEye will indicate this to you by displaying a sustained blink (slightly longer than the report blinks).
- 7. To change the current setting, first select the delay time you wish to use from the chart above and remember the blink value listed to the left of it (i.e. for 64 minutes there are 7 blinks). Determine the time you wish to use before starting the programming procedure because the ActiveEye will only wait a few seconds after it has finished reporting its current setting for you to begin entering the new setting.
- 8. Press the UNIT/OFF button the number of times equal to the blink value in the chart above. **Hold the button down on the last press** (i.e. for a setting of 64 minutes, press the UNIT/OFF button 7 times and hold on the last press).
- 9. A few seconds later, the red LED will blink the new setting.
- 10. If the programming fails, the red LED will display a sustained blink (slightly longer than the report blinks). This can occur if you wait too long to start your programming, you press the button more than 2 times, or you press the HOUSE/ON button. If the programming procedure fails, you must start the procedure over.

Behind The Scenes

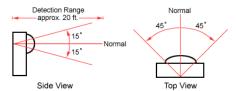
Motion Detection

The ActiveEye "sees motion" using passive infrared (PIR) detection. Passive infrared detection refers to the detection of a change in heat in an area or emitted by an object (i.e. body heat). The ActiveEye is triggered when the level of heat detected changes from the ambient temperature to a higher or lower temperature.



Sensor Detection vs. Motion Direction

For best detection results, mount the ActiveEye so the person entering the area will cut across the ActiveEye's field of view. Do not mount the ActiveEye near hot or cold sources (i.e. heat vents, air conditioners, direct or reflected sunlight) as this may cause false triggering of the ActiveEye.



Sensor's fields of view and detection range

Dawn/Dusk Detection

When the ActiveEye detects no light (dusk), it will transmit the ON command for the unit number **one higher than its current setting**. When it detects light (dawn), it will transmit the OFF command for the unit number **one higher than its current setting**. For example, if an ActiveEye is set to A1, it will transmit A2 ON or OFF when dawn or dusk is detected. If the ActiveEye is set to unit 16, its dawn/dusk code will be 1.

The lamp that will be controlled by this feature should not be located near the ActiveEye. If the lamp is too close, the light generated will cause the ActiveEye to "think" it is now dawn; therefore, it will send the OFF command. The light turns off and the light level in the room drops. The ActiveEye will then "think" it is dusk and send the ON command. The cycle repeats.