

FCC ID: M5ZWOWPIR

Installation and Operation Instructions for the Point Six Wireless Sensor.

Point Six, Inc.

Wireless Sensor Model WOWPIR

Installation and Operation Instructions

The WOWPIR wireless Personal iButton Reader transmits a digital value representing either the unique serial number of a touched iButton and a 16 bit field representing the ID of the PIR to a 418 MHz receiver. The WOWPIR is enclosed in a high impact ABS enclosure for direct surface mounting in the environment to be measured. WOWPIR is battery operated

Application: Touch the iButton reader port to the iButton to be read. The red LED will flash to indicate a successful read and transmission of data.

Battery: A 3.0 Volt lithium battery powers the WOWPIR wireless iButton reader. The battery will last for more than 5 years in the idle state (as shipped from the manufacturer). The WOWPIR will transmit data approximately 200,000 times before the battery must be replaced. The WOWPIR is (other than the battery) covered with a water resistant rubber coating to protect the electronics from the environment and condensation. The user can replace the battery. The WOWPIR may be placed in a quiescent state (battery life greater than 5 years) by covering the reader port with a nonconductive material such as tape.

FCC ID: M5ZWOWPIR
MADE IN USA

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 UNDESERED OPERATION

Wireless PIR Data Format

The Point Six, Inc. 418 MHz wireless sensors require a compatible receiver with the ability to receive, error check and provide RS232 and RS422/485 interface. This document describes the data format provided by the **HA8-wow** 418 MHz. Receiver.

The transmit packet from a receiver is approximately 15 milliseconds in duration and consists of 13 bytes of data:

- 1-byte ID/Mode field
- 8-byte serial number of touched iButton
- 2-byte serial number of the PIR
- 2-byte CRC-16 error check

The HA8-wow receiver processes this packet. The receiver performs a CRC-16 error check on the packet. If the data is not accurate it is discarded. When a packet is received that is error free it is converted to a 29-character packet and transmitted out the serial port at 19,200 Baud. The data is transmitted serially in ASCII Hex format and terminated with a CR character. This format requires two bytes for each byte of data; 14 data bytes x 2=28 plus the CR is 29 characters. See the HA8-wow specification for details.

The resulting binary data format of the packet is:

- | | |
|-----------------|--|
| 1-byte ID field | this field will contain a byte whose LSBit indicates the service state of the transmitter, 0=normal, 1=service mode. |
| 8-byte serial# | this field contains the serial number of the touched iButton. |
| 2-byte data | this field contains the 16-bit serial number of the PIR. |
| 2-byte CRC-16 | this is the originally received data packet CRC as described above. |
| 1-byte checksum | the checksum is a mod 256 sum of all the ASCII character values in the response but does not include the CR |

Example:

C90C188C040000001B483BA4BCA5B<CR>

This field is the mode indicator, the LS-bit which indicates the service state of the transmitter, C9=normal.

FCC ID: M5ZWOWPIR

C90C188C040000001B483BA4BCA5B <CR>

This field is the unique serial number of the iButton touched..

C90C188C040000001B483BA4BCA5B <CR>

This field is the 16-bit serial number of the PIR.

C90C188C040000001B483BA4BCA5B <CR>

This field is the CRC-16 error check as was originally received and checked. This CRC is over the first 11 bytes of the packet starting with the mode flags and ending with inclusion of the temperature data.

C90C188C040000001B483BA4BCA5B <CR>

This field is the mod 256 sum of all the ASCII character values in the response but does not include the <CR>.

C90C188C040000001B483BA4BCA5B <CR>

This is the CR terminator, 0Dhex.

FCC ID: M5ZWOWPIR

FCC Radio Frequency Interference Statement

Wireless Sensor

FCC ID: M5ZWOWPIR

NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15, Subpart B, of the FCC Rules. This equipment generates, uses, and can radiate radio frequency energy. If not installed and used in accordance with the instructions, it may cause interference to radio communications.

The limits are designed to provide reasonable protection against such interference in a residential situation. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try and correct the interference by one or more of the following measures:

- *Reorient or relocate the receiving antenna of the affected radio or television.*
- *Increase the separation between the equipment and the affected receiver.*
- *Connect the equipment and the affected receiver to power outlets on separate circuits.*
- *Consult the dealer or an experienced radio/TV technician for help.*

MODIFICATIONS

Changes or modifications not expressly approved by **Point Six Inc.** could void the user's authority to operate the equipment.