

# PROSENSORS

## **Proensors<sup>®</sup> BIOT User Reference Manual and Installation Guide**

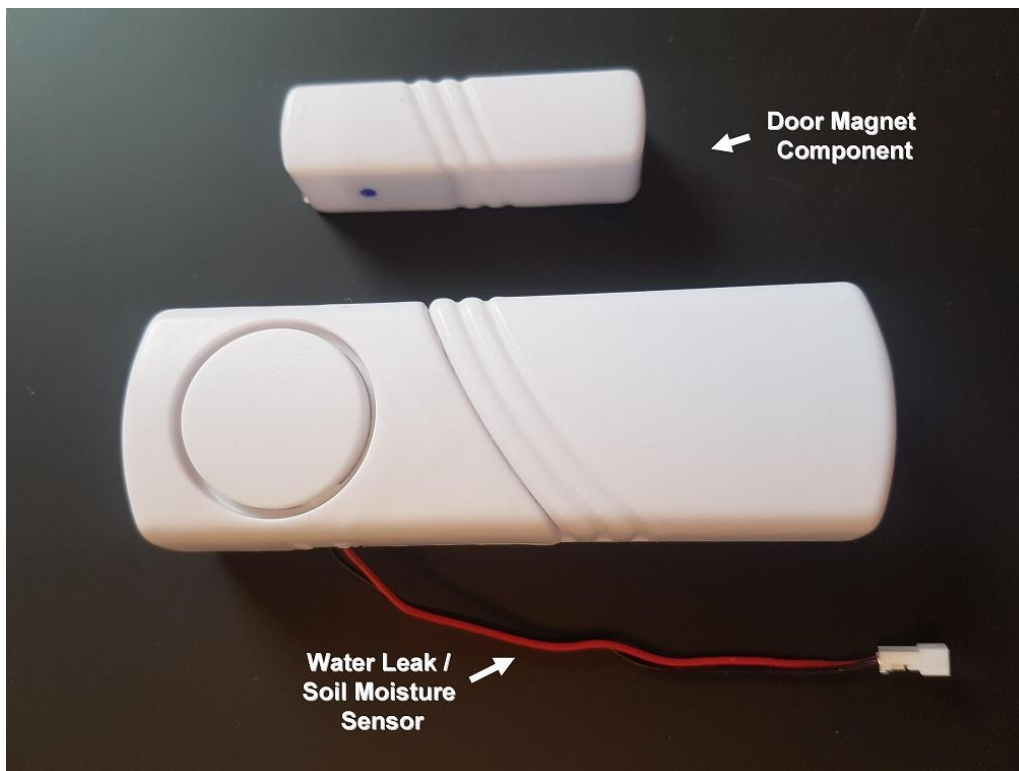
**Version 1**

**BIOT**

# PROSENSORS

## Table of Contents

BIOT Overview of Capabilities .....	3
Security .....	3
Installation, Setup and Configuration without the APP.....	4
Main Configuration Page.....	5
Advanced Setup Page.....	8
Transitioning to Operational Mode from Configuration Mode.....	10
Sensors.....	11
Temperature Sensor .....	11
Water Leak / Soil Moisture Sensor .....	11
Door Sensor .....	12
Device Battery Level Sensor .....	13
AGM Voltage Sensor .....	13
Packet Structure of Outgoing BIOT Packets.....	14
Packet Structure of Incoming PacketPeek Server Packets.....	14
Regulatory.....	15
Warranty Information.....	17
Legal Liability Disclaimer.....	17
Contact Prosenors.....	18



BIOT, Door-Magnet Component, and Water Leak Sensor

**BIOT**

# PROSENSORS

## BIOT Overview of Capabilities

The BIOT is a fully functional Wi-Fi client that, once installed, communicates directly to the internet via your Wi-Fi router without the need for a special gateway. The information communicated by the BIOT is typically sent to a type of server called a PacketPeek server, though it can technically also run in simple mode as a directed POST packet device. The advantage of a PacketPeek server, apart from visual displays of your sensor data over time with a user-friendly configurable dashboard, is the two-way communication to the BIOT that allows you to change the update rate settings and other parameters that are normally hard-coded during the one-time configuration and installation.

The BIOT can be used for a variety of purposes since it contains a door-opening and closing hall-effect magnet sensor, a resistive divider water leak / soil moisture sensor, a voltage sensor, and a common temperature sensor. The BIOT's speaker is configured to beep for various conditions, and can be programmed from the PacketPeek server to play very simple melodies at micro-power consumption.

Two good AAA batteries will allow the unit to operate in the field for up to five years under ideal conditions. Estimated battery life before the need to replace depends on the frequency of door opening/closing events and/or flood detection events coupled with the baseline periodicity of the normal inter-packet delay timing:

Usage	Battery Replacement
Flood detection in a dry space with no floods and 24-hour regular update	5 years
Door open close detection with opening and closing about ten times a day and 2-hour regular update	2 years
30-minute regular update for temperature sensing	9 months

The BIOT normally communicates with an internet site that has installed a "PacketPeek" server, however the user may opt to simply direct their packets toward a website that accepts POST packets of the type identified later in this document without the two-way intelligence function of PacketPeek.

## Security

The configuration of the BIOT is done over a password-protected WPA link between the user's phone/laptop and the BIOT itself. After configuration, sensor data is physically secure to the extent that the user's WiFi service is protected by password. Beyond this, the contents of the POST packets are not encrypted as they use basic HTTP, but the BIOT does not contain any microphones or cameras, so the nature of the data itself poses a very low privacy risk.

The logo for BIOT is rendered in a large, bold, blue font with a red outline and a slight 3D effect. The letters are slightly slanted and have a playful, rounded appearance.

# PROSENSORS

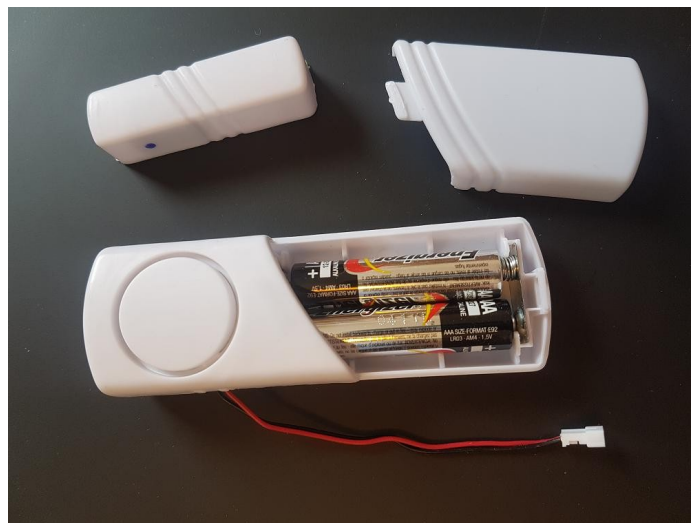
## Installation, Setup and Configuration without the APP

The BIOT communicates with the internet via a Wi-Fi connection. Because most Wi-Fi access points are secured with a password, it is necessary to tell the BIOT the name of your internet-connected Wi-Fi access point (its SSID) and the associated password, which can be done through a configuration procedure. Either with or without the APP, a common laptop or handheld device with Wi-Fi capability is required to configure the BIOT.

The BIOT requires two AAA batteries which, when first plugged in, automatically put the BIOT into configuration mode (TIP – If you want to bypass configuration mode when plugging batteries into the BIOT, place the door-magnet component directly next to the BIOT in the position that simulates a closed door status.) Once the batteries have been plugged in, the unit should beep four fast beeps, followed by a few seconds, then another two beeps, followed by a few more seconds, and another beep. After these three beep events, the BIOT enters configuration mode, where it acts like an Access Point itself, but without internet connectivity. At this point, the you should use either a laptop or handheld device and search for any Wi-Fi access points named “PROSENSORS AP xxx...” Connect to this access point, using the ten-digit password printed on the sticker on the back-side of the BIOT to gain access. There is no internet access associated with the BIOT in configuration mode, so make sure to force your laptop or handheld to stay connected to the Wi-Fi SSID “PROSENSORS AP xxx...” The unique MAC address of the BIOT is what follows the letters ‘AP’ in the SSID, but is unimportant for the setup.

Once the “PROSENSORS AP xxx...” has been selected as the temporary Wi-Fi access point for your laptop or handheld, the next step is to open an internet browser and to type **192.168.4.2** into the URL bar (the same place you would type [www.google.com](http://www.google.com) for example.) This should bring up a legal disclaimer page, which, if you accept the terms by checking the appropriate radio button, leads to the main configuration page.

(NOTE: Once the batteries are plugged in, you have about five minutes to access the entry webpage of the BIOT in configuration mode. After the first two and a half minutes you will hear bursts of three low-tone warning beeps until the BIOT finally quits and leaves configuration mode.)



# BIOT

# PROSENSORS

## Main Configuration Page

From the main configuration page you will be presented with a number of drop-down or text boxes which must be filled out correctly. If you wish to enter advanced settings (not recommended for first-time installers), do so first before filling in the boxes on the main configuration page, otherwise the entered info on the main page will be lost and need to be re-entered.

### PROSENSORS IOT DEVICE

**Choose your WiFi Access Point (37 found):**

L=Locked U=Unlocked  
Lowest 0...8 Highest Signal Strength

L1 NETGEAR13

**OR manually type your SSID here:**

**Enter your Access Point's WiFi password:**

**Device Nickname:**

**Your Email address:**

**URL:**

**TCP Port:**

**4-Digit Pin:**

**SENSOR READINGS:**

**This device battery level:**  
**2789 millivolts.**

**Temperature:**  
**2990 deciKelvin.**

**Water sensor:**  
**3843 units. (0=Wet, 4095=Dry)**

**AGM voltage:**  
**61810 millivolts.**

192.168.4.2/ToU.php?tu=1

# BIOT



# PROSENSORS

## **Choose Your Wi-Fi Access Point:**

You are given the choice of either selecting from a drop-down list or filling in an input box that asks you to “manually type your SSID here”. If you type in anything in the manually typed box, it will override your choice from the drop-down menu. When you first connected batteries to the BIOT, it did a scan of the surrounding Wi-Fi access points in the local vicinity which appear in the drop-down list. The first character for each entry in the list is either an ‘L’ or a ‘U’ indicating either locked (by WEP, WPA, WPA2, etc) or unlocked. The number following the ‘L’ or ‘U’ indicates the signal strength, 0 being very low and 8 being very high. The SSID name follows after the signal strength. The SSID name may be a maximum of 32 characters in length but typically is much less.

## **Enter Your Access Point’s Wi-Fi Password:**

Once the SSID is either selected from the drop-down list or manually entered, the next box that must be filled is the associated Wi-Fi access point’s password. The password corresponds to your normal Wi-Fi access point and is something you would have saved somewhere when you originally set up your Wi-Fi router in your home or office. The Wi-Fi password may be a maximum of 32 characters in length but is typically less.

## **Device Nickname:**

The Device Nickname is an informal name that you can give your BIOT to distinguish it from other BIOTs you may have installed. The Device Nickname may be up to 38 characters in length.

## **Your Email Address:**

Your Email Address is the email address at which you receive email, and it will distinguish you from among other users when your information is sent to the PacketPeek server. It is the unique identifier of you as the operator of your BIOT. Your Email Address may be up to 48 characters in length.

## **URL:**

The URL contains both a domain name and file path such as “packetpeek.com/dev.php” where “PacketPeek.com” is the domain name and “/dev.php” is the file path. The URL here is the website toward which your BIOT’s packets will be directed. The default URL is “PacketPeek.com/dev.php” which processes your packets on the PacketPeek server and returns information to the BIOT. The complete URL may be up to 52 characters long including forward slashes. The URL must NOT contain the “http://” descriptor or port extension, both of which are automatically affixed by the software by an internal process.

## **TCP Port:**

The TCP Port is the numbered port over which the internet protocol (in this case TCP) communicates which can be from 1 to 65536. Port 80 is the default port aligning with common HTTP which most websites use. Port 80 is the default port for the PacketPeek server. The TCP port may be up to 5 characters long and is an integer between 1 and 65536



# PROSENSORS

## **4 Digit Pin:**

The 4 Digit Pin is an alpha-numeric sequence that you give any particular BIOT which helps for security reasons on the PacketPeek server end. It must be 4 digits, either numerals or capital or lower-case letters

## **APPLY & START DEVICE**

By clicking the Apply & Start Device button, the forms you have filled in on the main configuration page are saved into memory and the BIOT goes from configuration mode to Operational mode. (see Transitioning to Operational Mode from Configuration Mode)

## **ADVANCED SETUP**

By clicking the Advanced Setup button, the data you have entered on the main configuration page is lost, and you enter the Advanced Setup mode (see Advanced Setup Page)

## **Sensor Readings:**

At the bottom of the main configuration page is a list of various sensor readings. These sensor values are internally updated each time the page is refreshed, and are displayed on a subsequent page refresh. This is a useful diagnostic tool to see that the sensors are basically working before the device is installed, at which point the sensor readings are updated regularly and sent to the PacketPeek server. The temperature sensor will show a warmer reading than normal during configuration since the heat of the electronics in this mode raises the temperature of the circuit board, however after about five minutes in normal operation the temperature observed is close to normal, being the ambient temperature around the BIOT. (see Sensors)

The logo for BIOT, featuring the letters 'B', 'I', 'O', and 'T' in a bold, blue, sans-serif font with a red outline. The letters are slightly tilted and arranged in a staggered pattern.

# PROSENSORS

## Advanced Setup Page

**Advanced Setup:**

**Inter-packet delay timing:**

1 Hours and 30 Minutes

Beeps  
 Silent

Audio Intro  
 Skip

**Water alarm recurrence on detect:**

10 Minutes

Submit and Continue <>

Abandon Changes and Return to Main Page

192.168.4.2/Cfg\_Adv.php

The Advanced Setup page offers additional settings for the BIOT

### Inter-packet delay timing:

Inter-packet-delay-timing is the normal non-event driven update periodicity of packets sent to the PacketPeek server. This rate does not impact the immediacy of packets sent as a result of water leakage / flood detection or door opening or closing events, both of which override the inter-packet delay timing. The default setting of 1 hour and 30 minutes means that the device will wake up every 1 hour and 30 minutes for a few seconds, take sensor readings, send a packet to the PacketPeek server, then automatically fall back into standby mode. The minimum delay timing is 1 minute and the maximum is 59 hours and 59 minutes, or two and a half days. At an interval of two and a half days, and without any events, the BIOT can last on two AAA batteries for up to five years. At an hour and a half, the BIOT lasts about a year on the same pair of AAA alkaline batteries.

In cases where you absolutely need to know that the BIOT is working and hasn't failed in the field, it is recommended that you set the Inter-packet delay timing to a rapid update such as 2 minutes (which typically will result in about 4 minutes between packets since there is a residual 2 minute process time before the countdown begins). Having such a rapid update rate will shorten the life of the batteries, however the PacketPeek server will receive a packet every 4 minute if everything is working properly, and can be configured to notify you if packets are missed, which indicates a problem in the system.

# BIOT



# PROSENSORS

## **Beeps / Silent:**

You can choose either totally silent operation or operation that includes various beeps as indicators, along with simple 'songs' that can be played in standby mode at very low battery draw. Silent mode can be set from the PacketPeek server as well.

## **Audio Intro / Skip:**

On your very first installation of the BIOT, and whenever you change the batteries, a greeting audio introductory message plays through the speaker, but you have the option to skip this.

## **Water alarm recurrence on detect:**

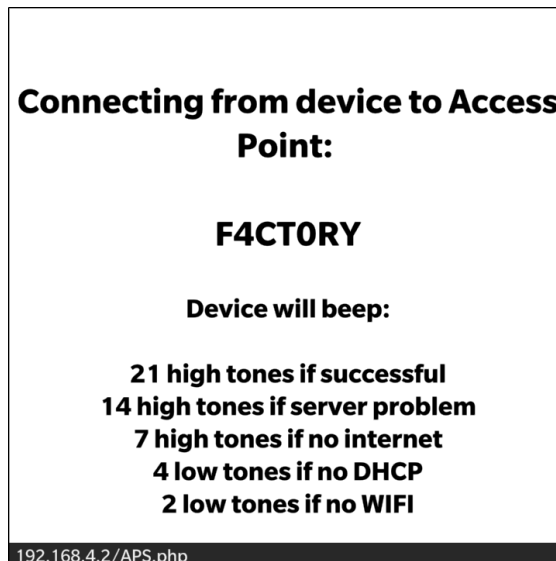
The alarm associated with a flood (water leakage) event will immediately send a packet to the server, and will wait the length of time selected here before it resends this alarm. If floods are expected to be very rare but very urgent, this setting should be set to 0 minutes. If floods are somewhat common, to save battery power, set this setting to 59 minutes. The default setting is 10 minutes, and the selection is between 0 minutes and 59 minutes for this setting.

The logo for BIOT, consisting of the letters 'B', 'I', 'O', and 'T' in a stylized, blue, blocky font with a red outline. The letters are arranged in a slightly curved, upward-sloping line from left to right.

# PROSENSORS

## Transitioning to Operational Mode from Configuration Mode

Hitting the button “Apply and Start Device” from the Main Configuration page sends the BIOT into Operational Mode. Whether the device makes contact or not depends on a number of factors. A page will be displayed that explains the types of beeping to listen for that indicates either success or failure in establishing a connection with the PacketPeek server:



The most basic link that must work is the BIOT to Wi-Fi access point connection. If your Wi-Fi password fails, or the radio link is too far away or suffers too much radio interference to communicate with your Wi-Fi access point, then the BIOT will beep only two low tones. If the password succeeds but the Wi-Fi access point does not assign the BIOT an IP address based on its DHCP function, then the BIOT will beep four low tones.

If the Wi-Fi link works and the BIOT is assigned an IP address, then it will attempt to make contact with the internet. Seven high tone beeps means that your Wi-Fi access point is not connected to the internet (possibly because there is no DNS domain name server). 14 high tones means you are connected to the internet however something unusual happened with the PacketPeek server. 21 high tones means you have successfully made contact through the internet to the PacketPeek server.

**BIOT**

# PROSENSORS

## Sensors

### Temperature Sensor

The temperature sensor is a standard thermistor capable of reading between -40c and +80c (-40F to +176F), which is the operating range of the device itself, aside from the limits of the batteries.

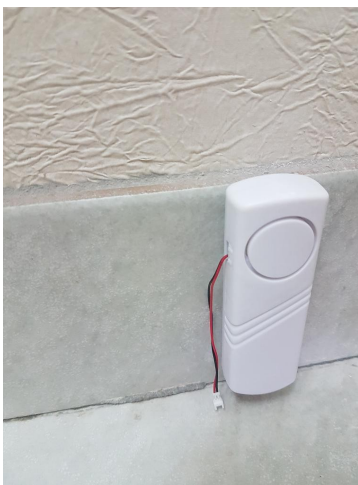
When the device is first turned on and configured, a temperature indication (in deciKelvin, which is tenths of a Kelvin, ie 2730 deciKelvin = 0 Celcius) will be displayed at the bottom of the main configuration page along with other sensor levels. The Kelvin reading will be higher than air temperature during setup because heat from the temporarily active microprocessors will cause about a 5 Kelvin / 5 Celcius increase above ambient temperature, but only during the setup process. In normal operation, since the device consumes only about 12 microamps as it sleeps, when it wakes up to take a temperature reading the thermistor sensor will be cooled to the ambient temperature of the surroundings and thus accurate for uploading to the server.

The PacketPeek Server automatically converts the deciKelvin reading to either Celcius or Fahrenheit

### Water Leak / Soil Moisture Sensor

The mechanism for sensing water leaks / soil moisture is a simple resistor-divider tethered to the device Vcc by a 1 Mohm resistor and to ground via the resistance between the probe terminals. Since fresh water is a good conductor, and salt water is an excellent conductor, any type of water between the probe terminals will close the conductivity loop and lower the measured voltage in the device. The driest possible reading is a little less than 4095, and the wettest possible reading is 0. During the configuration of the device, this reading is displayed at the bottom of the main configuration page, however to see the most recent reading, the probes must be placed in the medium to be measured, and the page must be refreshed twice (once to acquire the new reading, and again to print the reading to the page).

The PacketPeek Server automatically converts the moisture reading of between 0 and 4095 to percentage moisture which is inversely proportional to the reading at the device.



The water leak sensor is a tiny plastic white piece located at the end of the two-wire cable emerging from the BIOT. It is recommended to place the water leak sensor physically below the BIOT so that in case of flooding, the BIOT's circuitry will be a few inches above the water itself, including the radio antenna located behind the speaker. Since the BIOT only operates on 3 volts from alkaline batteries, there is no electric shock hazard as a result of proximity to water.

**Do NOT attach any power source other than the recommended 2 AAA alkaline batteries**

# BIOT

# PROSENSORS

## Door Sensor

The door sensor is a magnetic hall-effect sensor, and the small ancillary white plastic component that ships with the BIOT contains a magnet. Inside the BIOT, the hall-effect magnetic sensor is located to the right of the center of the circular speaker at the edge of the BIOT, when holding the unit upright, having the battery chamber below the speaker. Both the BIOT and the magnet component are fitted with adhesive tape on their backsides so that they can be permanently installed on a doorway. The three lines on the BIOT should line up with the three lines on the magnet component when the door is in the closed position. There is a small black dot on the side of the magnet component to indicate the side that must be aligned to the speaker on the BIOT. When the door is opened, the BIOT will be pulled away from the magnet component. In normal operation, this will cause a packet to be sent to the server. When the door is closed and the magnet connection is re-established, a packet is likewise sent to indicate a change in the status of the door sensor to 'closed'. The door sensor does not discriminate whether someone is entering or exiting; it only knows the state of the door, either open or closed.



### **BIOT and Door-magnet component separated, then properly aligned for closed door**

The door sensor status is not shown on the main configuration page during the BIOT setup. This function can be tested later when the PacketPeek account is configured. Moving the magnet to its resting location next to the BIOT, meaning door closed, then waiting about five seconds and pulling it away will cause a few door events which should be readily apparent from the PacketPeek dashboard. Though transparent to the user, there are four distinct door status “codes” during non-flooding operation:

#### **Door Status Code**

d  
e  
p  
q

#### **Indication**

The Door was recently closed shut as an event, causing this packet  
The Door is closed as a normal update packet  
The Door was recently opened, triggering an event (this packet)  
The Door is open as a normal packet update (or the magnet is not in use)

Door Status codes ‘r’ and ‘s’ occur when there is a detected flood / water leakage event.

# BIOT



# PROSENSORS

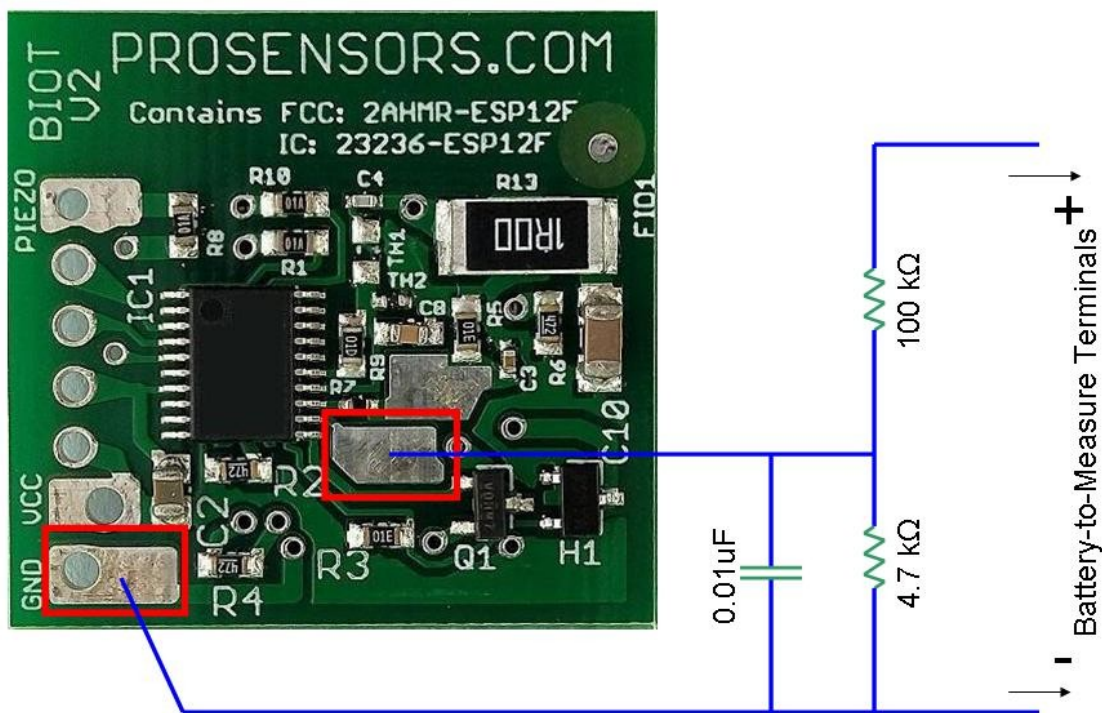
## Device Battery Level Sensor

The BIOT monitors its own AAA batteries for voltage every time it sends a packet. The BIOT can perform down to as low as 2.5 volts, or 2500 millivolts, before the batteries must be replaced. The PacketPeek server can be configured to send you automated warnings before the batteries die, as well as warning if a BIOT's batteries are suspected to have died while in service. The nominal battery voltage of two AAA batteries in series is 3 volts (3000 millivolts).

## AGM Voltage Sensor

AGM (absorptive glass mat) battery voltage sensor was designed to monitor batteries with higher voltages such as those used in solar energy installations or even standard vehicle batteries. This sensor can reasonably detect higher voltages than 3v and is a special feature that ships with some specialized versions of the BIOT. Normally, this value should be ignored since it is not connected.

Although implementing the DIY modification described below would **void the warranty**, the internal circuit board can be "tapped" at a particular point to enable the special voltage sensor:



Do-it-yourself hardware modification to sense voltages on the AGM input. Note that the resistor connecting the positive pad to the piezo pad (if present) would have to be removed. This does not impact the beeps – just the audio intro. A capacitor and two resistors (4.7K and 100K) would have to be connected as shown above so that the voltage is divided down to less than the 3v BIOT voltage.

# BIOT

# PROSENSORS

## Packet Structure of Outgoing BIOT Packets

Though hidden to anyone using the PacketPeek server, the BIOT packet is a standard POST type of packet running HTML 1.0 over TCP port 80. It is meant for HTTP and not HTTPS, so the information sent is exposed to the possibility of deep packet inspection, and thus there are only non-invasive sensors on the device (there are no microphones or video cameras on the BIOT, and there are no functions that control other devices or hardware).

The POST packet itself is a classically structured packet as used in the early days of the internet. The following fields are contained in every POST packet sent by the BIOT:

<b>id</b>	This is the MAC address, given in the form FF:FF:FF:FF:FF:FF as six hexadecimals
<b>temp</b>	The temperature in decikelvin, 4 digits, divide by 10 to get Kelvin
<b>hum</b>	The water sensor level, between 0 (wet) and 4095 (dry)
<b>bat_lev</b>	The AAA batteries' voltage in millivolts, divide by 1000 to get volts
<b>exti</b>	Number of milliseconds the device was awake when sending the last packet (the latency)
<b>hr</b>	Inter-packet delay timing hours
<b>mn</b>	Inter-packet delay timing minutes
<b>alert_min</b>	Water alarm recurrence on detect minutes
<b>door</b>	The door status code
<b>agm</b>	The AGM voltage sensor in millivolts, divide by 1000 to get volts (not implemented)
<b>email</b>	The user email
<b>pin</b>	The four digit alpha-numeric pin
<b>nick</b>	The device nickname
<b>v</b>	BIOT device version
<b>q</b>	Placeholder

An example of a POST packet's data portion is as follows. There are no containing quotation marks around fields of data:

```
id=C0:F4:F1:87:4B:2C&temp=2980&hum=3800&bat_lev=2850&exti=11480&hr=1&mn=30&alert_min=10&door=q&agm=24000&email=sales@prosenors.com&pin=9999&nick=My Prosenors BIOT&v=4&q=0
```

## Packet Structure of Incoming PacketPeek Server Packets

The PacketPeek server replies to the BIOT with a proprietary packet structure that can modify many of the parameters of operation on the fly. For more information, see documentation on the PacketPeek server or contact PacketPeek





# PROSENSORS

## Regulatory

### FCC Statement

This device contains integrated-antenna module FCC ID: 2AHMR-ESP12F

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 undesired operation.

This product has been tested and complies with the specifications for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used according to the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which is found by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna
- Increase the separation between the equipment or devices
- Connect the equipment to an outlet other than the receiver's
- Consult a dealer or an experienced radio/TV technician for assistance

FCC Caution: Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment.

### FCC Radiation Exposure Statement

This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment. End users must follow the specific operating instructions for satisfying RF exposure compliance. To maintain compliance with FCC RF exposure compliance requirements, please follow operation instruction as documented in this manual. This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter. This equipment should be installed and operated with minimum distance 20cm between the radiator and your body.

The availability of some specific channels and/or operational frequency bands is country dependent and is firmware programmed at the factory to match the intended destination. The firmware setting is not accessible by the end user.



# PROSENSORS

## Industry Canada Statement

This equipment contains integrated-antenna module IC ID: 23236-ESP12F

This Class B digital apparatus complies with Canadian ICES-003 and RSS210. 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.

Industry Canada Radiation Exposure Statement:

This equipment complies with IC radiation exposure limits set forth for an uncontrolled environment. End users must follow the specific operating instructions for satisfying RF exposure compliance. To maintain compliance with IC RF exposure compliance requirements, please follow operation instruction as documented in this manual.

This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.

## Avis d'Industrie Canada

Cet équipement contient un module d'antenne intégré IC ID: 23236-ESP12F

Cet appareil numérique de la classe B est conforme aux normes NMB-003 et RSS210 du Canada. L'utilisation de ce dispositif est autorisée seulement aux conditions suivantes :

1. il ne doit pas produire de brouillage et
2. il doit accepter tout brouillage radioélectrique reçu, même si ce brouillage est susceptible de compromettre le fonctionnement du dispositif.

Avis d'Industrie Canada concernant l'exposition aux radiofréquences :

Ce matériel est conforme aux limites d'exposition aux radiofréquences établies par Industrie Canada pour un environnement non contrôlé. L'opérateur doit suivre les instructions d'utilisation décrites dans le présent manuel afin de maintenir la conformité de l'installation. L'émetteur ne doit pas être placé près d'une autre antenne ou d'un autre émetteur, ou fonctionner avec une autre antenne ou un autre émetteur.

## Wireless Disclaimer

The maximum performance for wireless is derived from IEEE Standard 802.11 specifications. Actual performance can vary, including lower wireless network capacity, data throughput rate, range and coverage. Performance depends on many factors, conditions and variables, including distance from the access point, volume of network traffic, building materials and construction, operating system used, mix of wireless products used, interference and other adverse conditions.



# PROSENSORS

## Warranty Information

Prosenors Inc. warrants the BIOT (hereinafter referred to as the “Product”) against defects in materials and workmanship for a period ninety (90) days from the date of original purchase (“Warranty Period”) when the Product is purchased directly or through an authorized reseller, on the condition that the device has not been opened to reveal the internal circuit. If a defect arises and a valid claim is received by Prosenors within the Warranty Period, at its option, Prosenors will repair the Product or exchange the Product with a functionally equivalent new product. Prosenors warrants repaired Products and replacement products provided hereunder against defects in materials and workmanship from the date of the repair or replacement for ninety (45) days or, if longer, for the remainder of the Warranty Period. If the Product is exchanged, the replacement product becomes your property and the Product becomes Prosenors property. When a refund is given, the Product becomes Prosenors property. Prosenors takes no responsibility for the cost or administration of shipping beyond the original sale.

## Legal Liability Disclaimer

### Jurisdiction

These Terms are to be governed and construed by the substantive law of the Province of Ontario, Canada.

### Limitation of Liability

TO THE EXTENT NOT PROHIBITED BY APPLICABLE LAW, IN NO EVENT WILL PROSENSORS INC., ITS SUBSIDIARIES OR AFFILIATES OR THEIR RESPECTIVE LICENSORS (IF ANY), BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, CONSEQUENTIAL, PUNATIVE, OR EXEMPLARY DAMAGES, INCLUDING BUT NOT LIMITED TO, DAMAGES FROM LOST PROFITS, LOST DATA OR BUSINESS INTERRUPTION ARISING OUT OF THE USE, INABILITY TO USE, OR THE RESULTS OF USE OF THIS DEVICE, ANY WEB SITES LINKED TO THIS DEVICE, OR THE SOFTWARE, MATERIALS OR SERVICES CONTAINED AT ANY OR ALL SUCH SITES, WHETHER BASED ON WARRANTY, CONTRACT, TORT OR ANY OTHER LEGAL THEORY AND WHETHER OR NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

**Prosenors Inc. hereby warns the user that the BIOT is a best-effort device, and should not be relied upon as a replacement for a professional home security system, water leakage warning system, or commercial refrigeration temperature monitoring system. Further, the sensor data shared over the network to the PacketPeek server or otherwise is not encrypted, and, though very unlikely, could be subject to eavesdropping of very determined internet hacking agents with access to core network routers.**



# PROSENSORS

## Contact Proensors

Proensors is based in Ottawa, Ontario, Canada and can be reached by email at [sales@proensors.com](mailto:sales@proensors.com) or by phone at +1-613-400-9632

The Proensors website is:

[www.proensors.com](http://www.proensors.com)

**BIO T**