PLANET
Networking & Communication

User's Manual

Z-Wave Wall-mount PIR Motion Sensor

► **HZS-100E / HZS-100A**

Copyright

Federal Communication Commission Interference Statement

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of 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 in accordance with 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 can be determined 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:

1. Reorient or relocate the receiving antenna.
2. Increase the separation between the equipment and receiver.
3. Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
4. Consult the dealer or an experienced radio technician for help.

FCC Caution

To assure continued compliance, use only shielded interface cables when connecting to computer or peripheral devices. Any changes or modifications not expressly approved by the party responsible for compliance could void the user’s authority to operate the equipment.

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.

Federal Communication Commission (FCC) Radiation Exposure Statement

This equipment complies with FCC radiation exposure set forth for an uncontrolled environment. In order to avoid the possibility of exceeding the FCC radio frequency exposure limits, human proximity to the antenna shall not be less than 20 cm (8 inches) during normal operation.

Safety

This equipment is designed with the utmost care for the safety of those who install and use it. However, special attention must be paid to the dangers of electric shock and static electricity when working with electrical equipment. All guidelines of this and of the computer manufacture must therefore be allowed at all times to ensure the safe use of the equipment.

CE Mark Warning

This is a Class B product. In a domestic environment, this product may cause radio interference, in which case the user may be required to take adequate measures.

WEEE Regulation

To avoid the potential effects on the environment and human health as a result of the presence of hazardous substances in electrical and electronic equipment, end users of electrical and electronic equipment should understand the meaning of the crossed-out wheeled bin symbol. Do not dispose of WEEE as unsorted municipal waste and have to collect such WEEE separately.

Revision

User's Manual of PLANET Z-Wave Wall-mount PIR Motion Sensor
Model: HZS-100
Rev: 1.00 (October, 2015)
Part No. EM-HZS-100 Series_v1.0.doc

Table of Contents

Chapter 1. Product Introduction

1.1 Package Contents

The package should contain the following:

- PIR Sensor x 1
- Quick Installation Guide x 1
- CR123A Lithium Battery x 1
- Accessory Bag x 1

Note	If any of the above items are missing, please contact your seller immediately.

1.2 Overview

Home Automation and Smart Home Control

The HZS (Z-Wave Sensing Device) series of PLANET Home Automation product family, based on Z-Wave technology, provides the advanced security system that protects your home and family 24/7. Easy operation and flexible configuration are the attractive features of our system; the simple one-touch button lets you program your regular settings according to your preference and operation mode. Worked with PLANET HAC-1000 Z-Wave Home Automation Control Gateway, you get the all-round and reliable home security services that we offer. Our full range of product lines ensure that you get all the devices you need for your home security system.

Motion and Temperature Detection

PLANET HZS-100 is a Z-Wave wall-mount PIR motion sensor that monitors movement and sends Z-Wave signal when movement is detected. With its built-in temperature sensor feature, the HZS-100 will send the signal out when temperature inside the building changes..

Getting Started is as Easy as 1-2-3

1. Via the Cloud Home App (including Home Automation Controller Pad and Control Gateway): Press **Inclusion/Exclusion** to include/exclude Z-Wave device.
2. On the Z-Wave device: Press the **Pair** button to establish a connection with the control gateway**.**
3. Users can enjoy and manage Z-Wave network right away.

Real-time Alarm

Alerts like use of electricity, home alarms and more can be brought to your notice without delays by way of cloud hosting. From now on, you can maintain your home security no matter where you are.

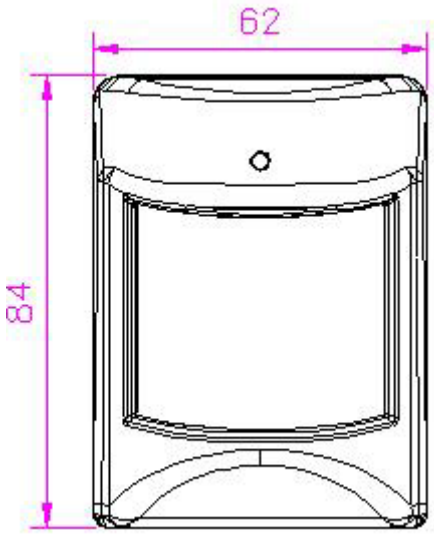
1.3 Specifications

Product	HZS-100A	HZS-100E
Hardware and Network		
Z-Wave Frequency	America: 908.42MHz	Europe: 868.42MHz
Installation Height	About 2 meters	
PIR Detecting Distance	3~10 meters	
PIR Detecting Angle	120 degrees coverage	
Operating Range	Up to 30 meters in open space	
Installation	Plug connection for indoor use	
General		
Power Requirements	CR123A 3V	
Operating Temperature	-15 ~ 40 degrees C	
Operating Humidity	0 ~ 90% (non-condensing)	
Weight	75g	
Dimensions (W x D x H)	84 x 62 x 50 mm	
Emission	CE, FCC	

Chapter 2. Hardware Interface

Model	HZS-100E/HZS-100A
Dimensions (W x D x H)	84 x 62 x 50 mm
Weight	75g (gross weight)

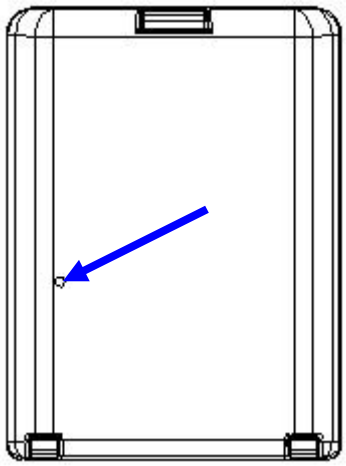
➢ **Front Panel**



Interface	Description
PIR Sensor	PIR sensor is used to sense motion or detect whether a human has moved in or out of the sensor range.
LED	When movement is detected, the red LED will flash once.

➢ **Rear**

Program switch

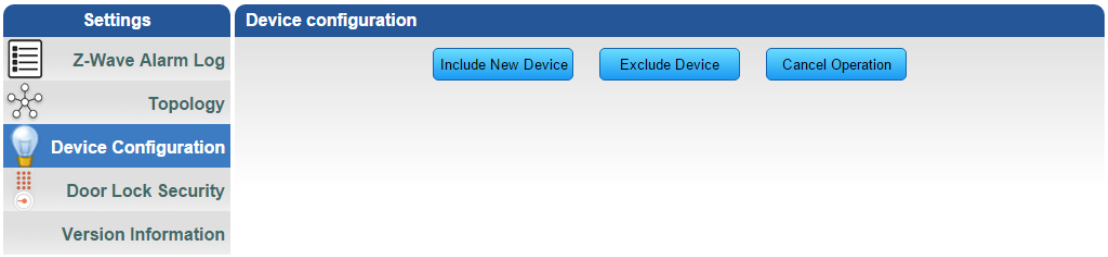


Interface	Description
Program switch	Press to include or exclude a Z-Wave network.

Chapter 3. Z-Wave Device Setting

3.1 Configuring Z-Wave Device via HAC-1000

Please refer to the following steps to add Z-Wave device via HAC-1000 web.



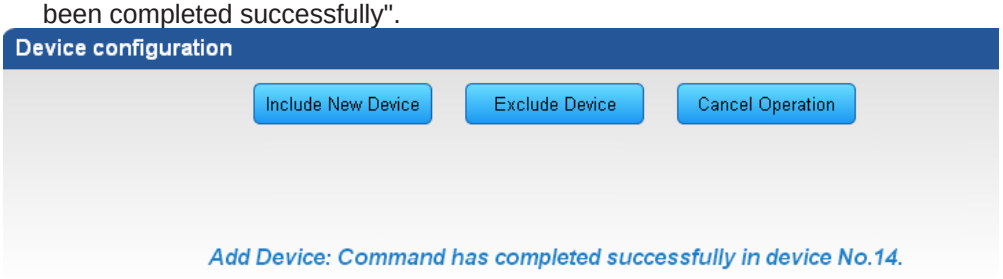
Step 1. Include a Z-Wave device via web.

a) Go to "Z-Wave" and click "Device Configuration".

b) Click" Include New Device" and the screen will appear with "Add Device: Waiting for a user action."

c) Use a paper clip or pin to press the program button on the back of the sensor for **1 time** to connect.

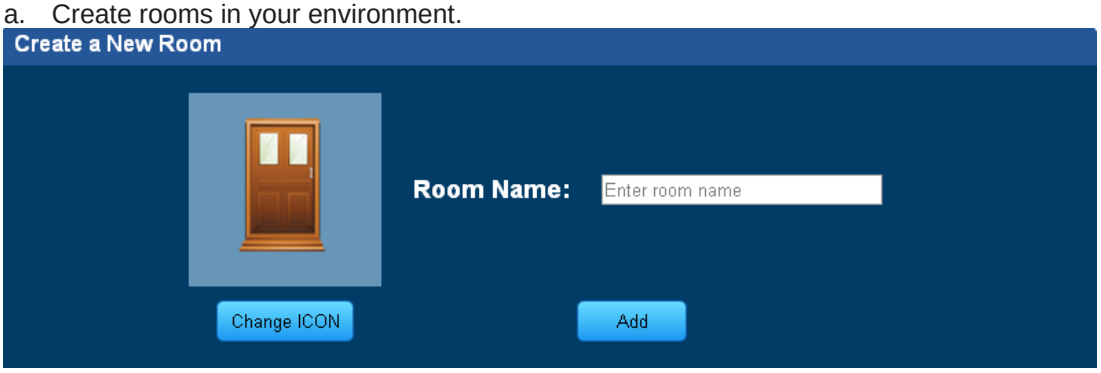
d) If your device has successfully been added, it will show "Add Device: Command has been completed successfully".



Note	If the device didn't add successfully, please place the device next to the gateway and try again.

Step 2. Set up the location and room for Z-Wave device via HAC-1000 web.

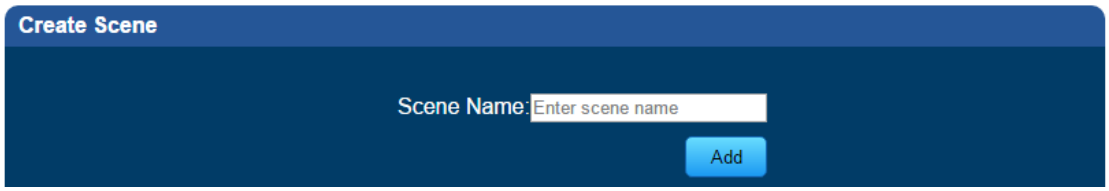
a. Create rooms in your environment.



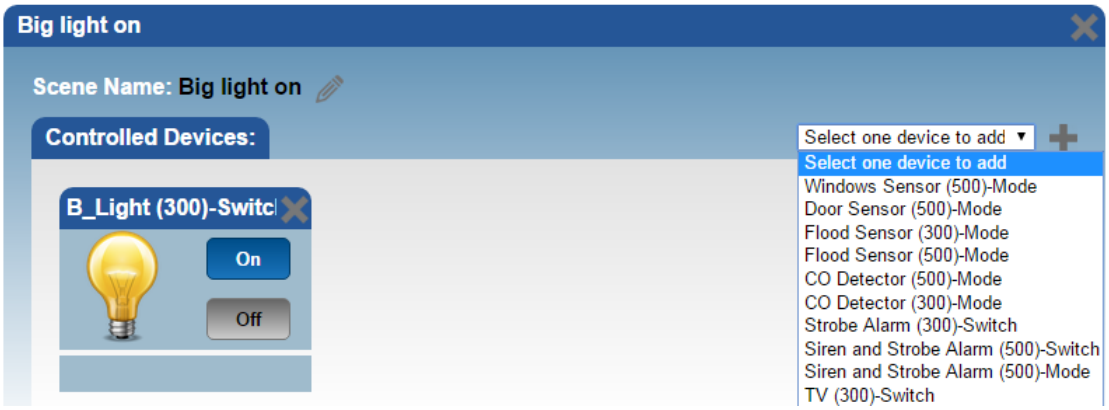
b. Edit device.

Step 3. Create a scene via web.

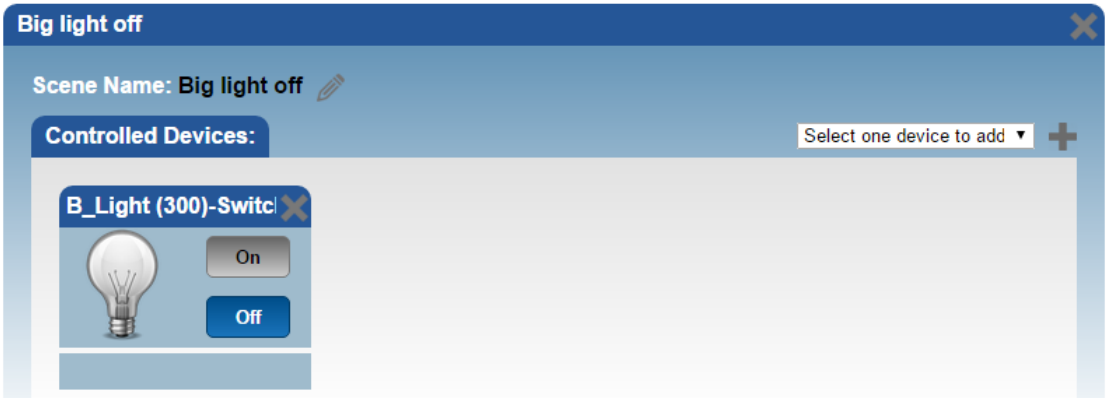
a. Click “Create Scene” and name new scene.



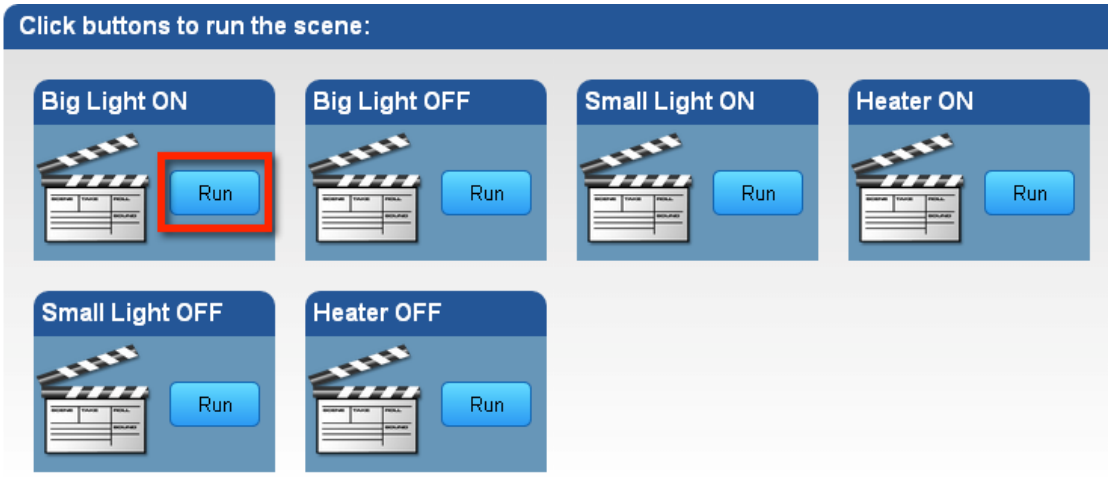
b. Select a device from this scene.



c. Select ON or OFF from this scene.

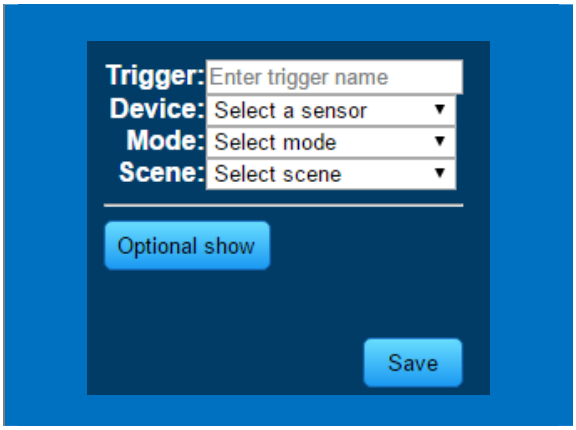


d. You can click “RUN” to run this scene.

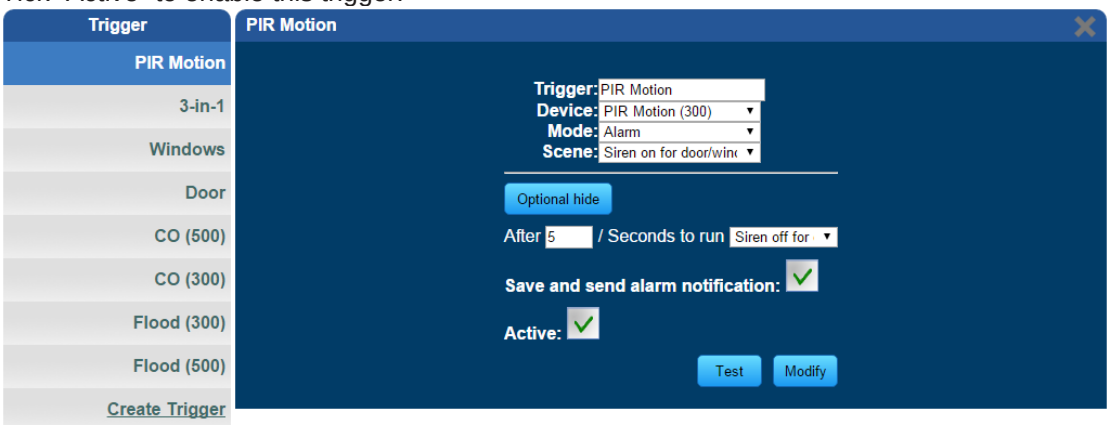


Step 4. Create trigger via web.

a. Click “Create a Trigger” and name new trigger.
b. Select a Z-Wave device for this trigger.
c. Select when it triggers, it will alarm or bypass.
d. Select when it triggers, it will run which scene.

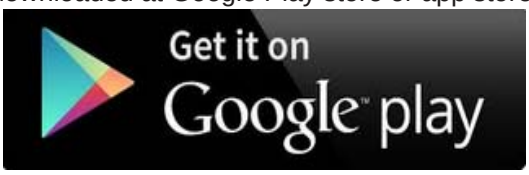


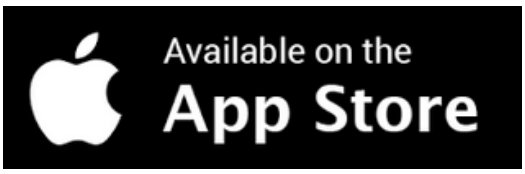
After entering the time selected for the scene to trigger, tick “Save and send alarm notification”. Tick “Active” to enable this trigger.



3.2 Configuring Z-Wave via Smart Phone

The HAC-1100 can be used on iOS and Android operating system. **Cloud Home** can be downloaded at Google Play store or app store.

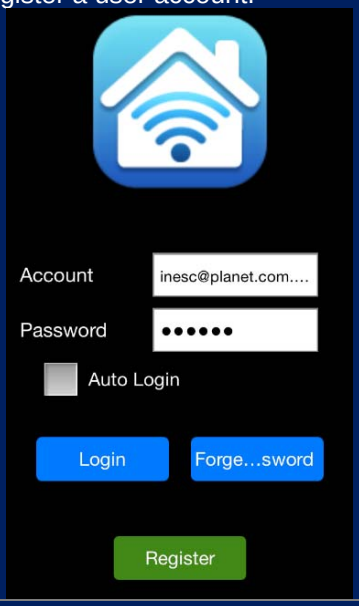




Please refer to the following steps to install **Cloud Home** app and add Z-Wave device via smart phone.

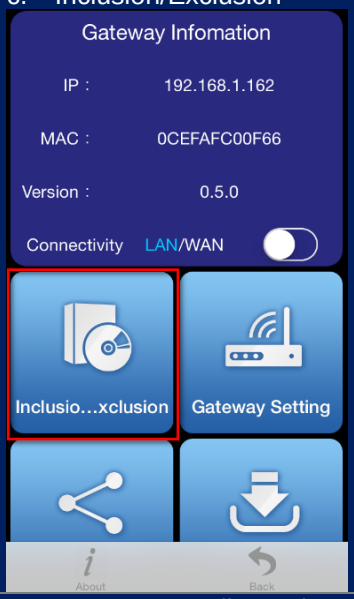
Step 1. Include a Z-Wave device via smart phone (Android/iOS).

a. Register a user account.

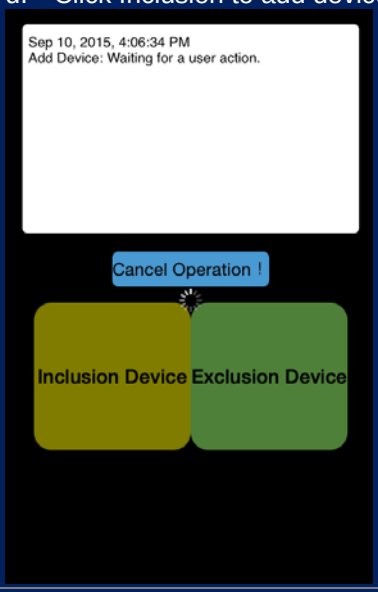


b. Setting

c. Inclusion/Exclusion



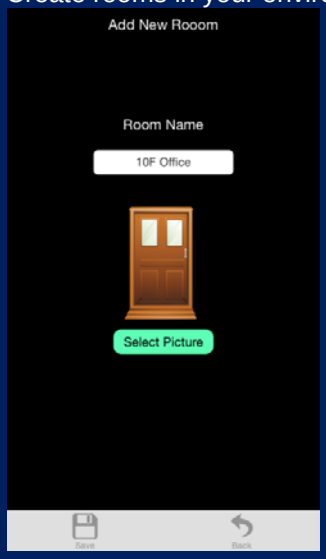
d. Click Inclusion to add device.



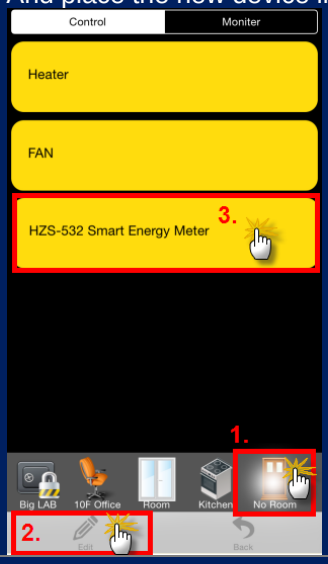
e. Use a paper clip or pin to press the program button on the back of the sensor for 1 time to connect.

Step 2. Set up the location and room for Z-Wave device.

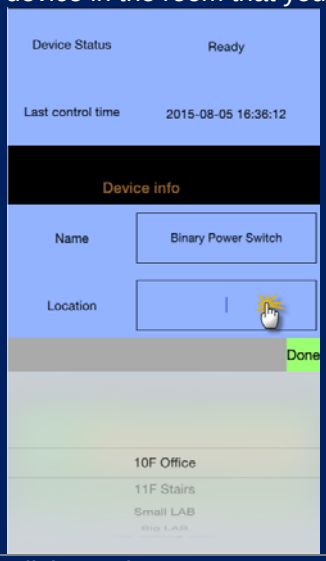
a. Create rooms in your environment.



b. Click “No Room” to show the device. And place the new device in a room.

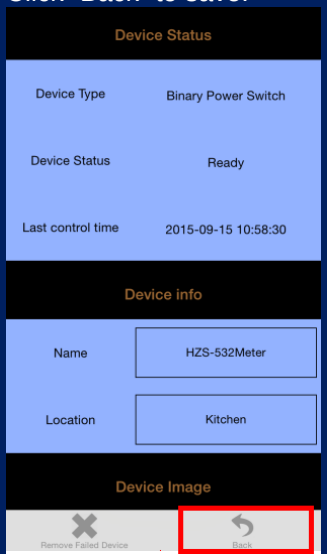


c. Select “Name” to name this device and select “Location” to place this device in the room that you created.

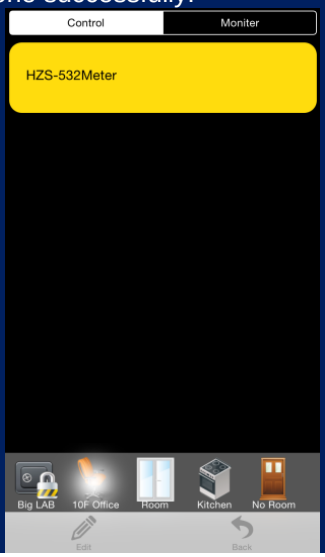


d. Select Picture for your Z-Wave device.

e. Click “Back” to save.



f. Done successfully.

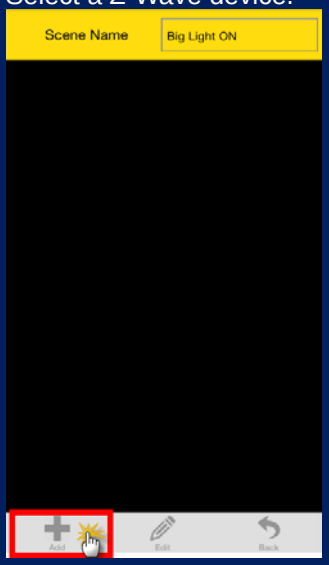


Step 3. Create a scene via smart phone.

a. Click “Add” and name a new scene.

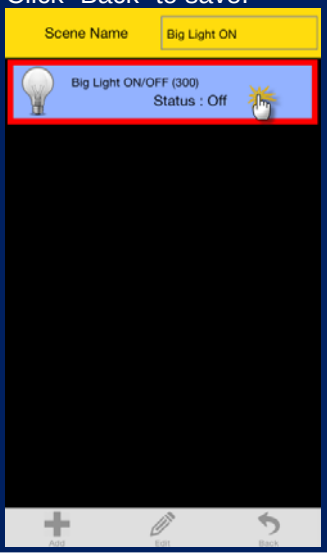
b. Click “Add” to add a Z-Wave device.

c. Select a Z-Wave device.

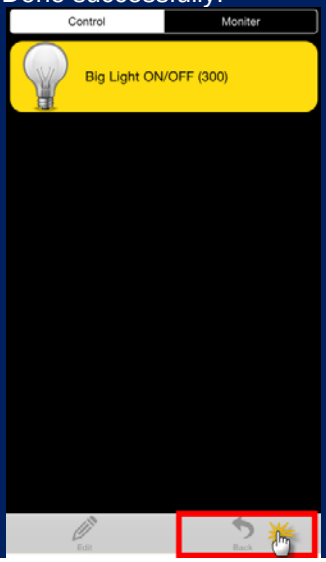


d. Click ON or OFF for the device you select.

e. Click “Back” to save.



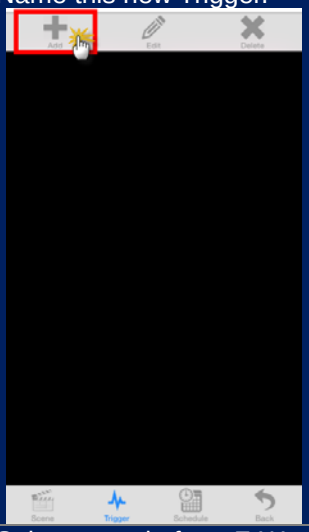
f. Done successfully.



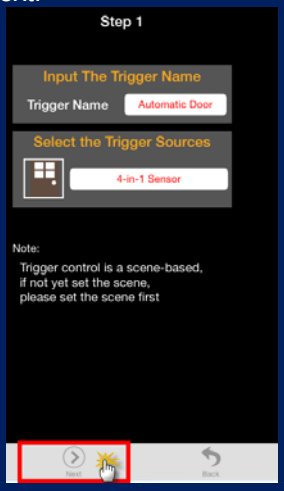
Step 4. Create Trigger via smart phone.

a. Click “Add”.

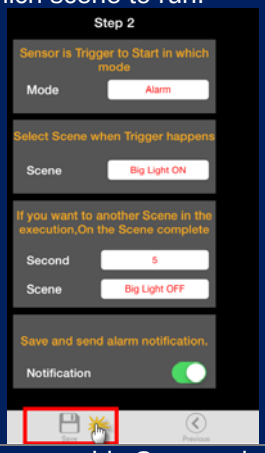
b. Name this new Trigger.



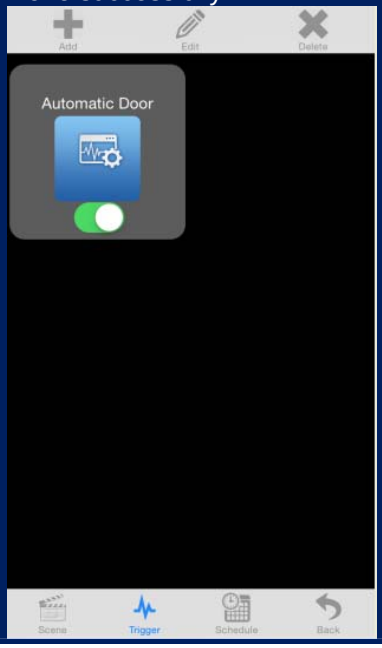
c. Select the Z-Wave device and click next.



d. Select a mode for a Z-Wave device.
e. Select a scene.
f. Select the time for the trigger and which scene to run.



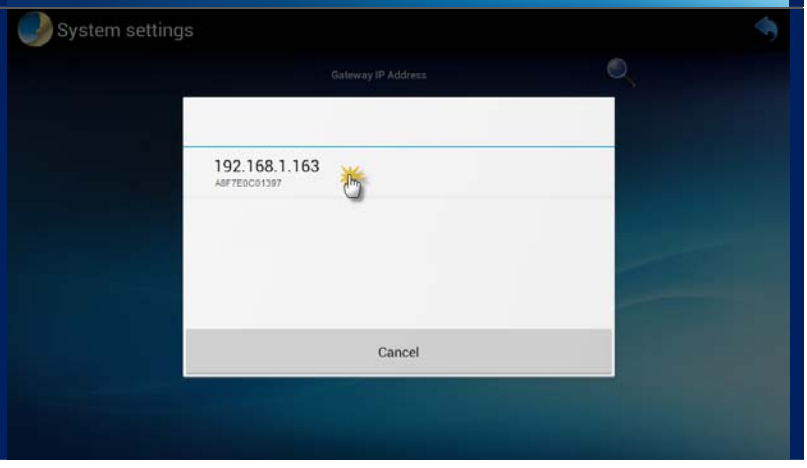
g. Done successfully.



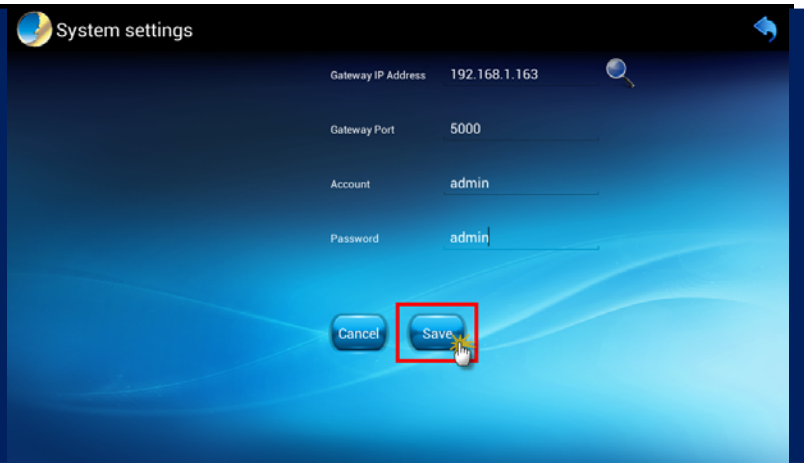
h. If you enable Save and send alarm notification, when it triggers, it will have a log. You can check this in Notification History.

3.3 Configuring Z-Wave via HTS-1000P

Step 1. Fill out the IP of control gateway to connect with gateway.

Click the "Gateway" button.	
Click the magnifying glass to search the IP of gateway.	
Control pad found an IP of gateway. Click the IP to join.	

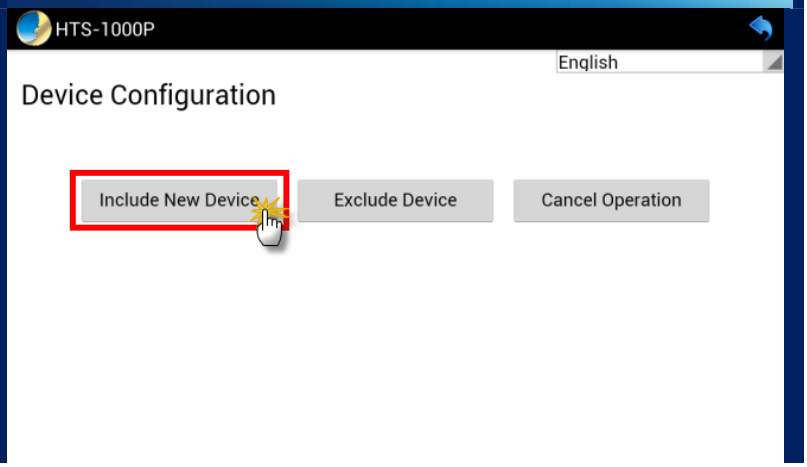
The default gateway port is 5000, and user name and password are both **admin**.



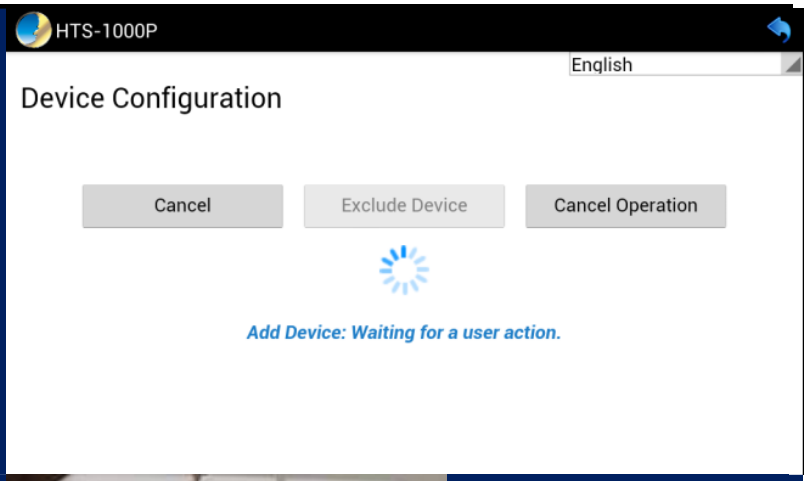
Step 2. Include a Z-Wave device via HTS-1000P.

Click the "Z-Wave devices" button to add Z-Wave devices to gateway.

Click the "Include New Device" button to add Z-Wave device.

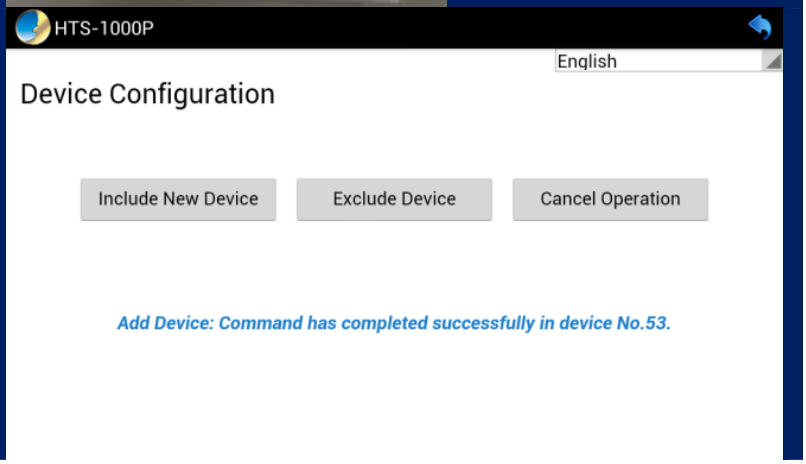


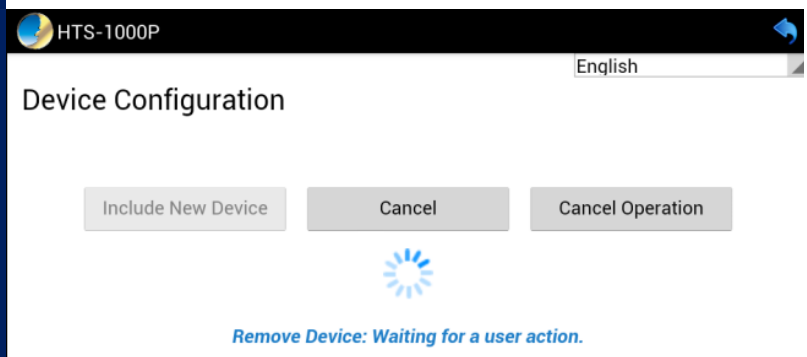
When you see the message “Waiting for user action”, you can press the match button on Z-Wave devices.



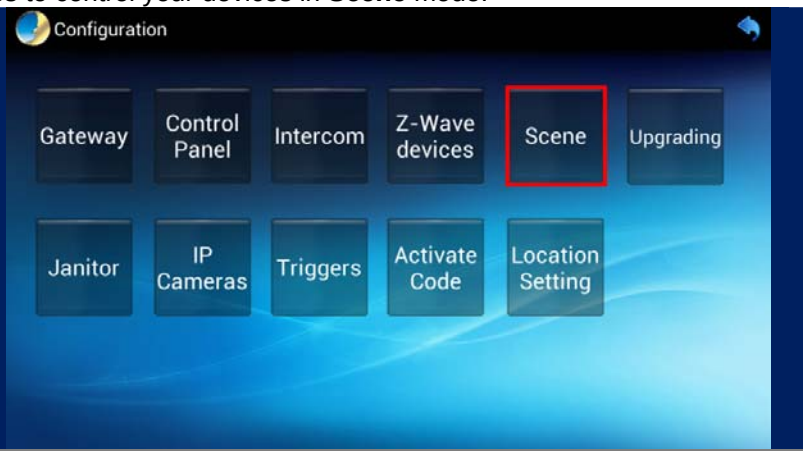
Use a paper clip or pin to press the program button on the back of the sensor for **1 time** to connect.

If a device is added successfully, it will show the message: Command has completed successfully in device No. XX.

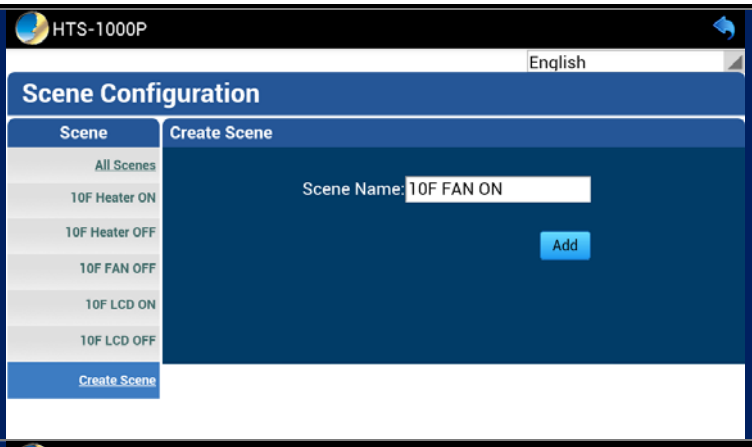


Click the “Exclude Device” button to exclude Z-Wave device.	
When you see the message “Waiting for user action”, you can press the match button on Z-Wave devices to exclude device.	

Step 3. After including Z-Wave devices in gateway, you can create different scenes with this function. You can set scenes to control your devices in **Scene** mode.

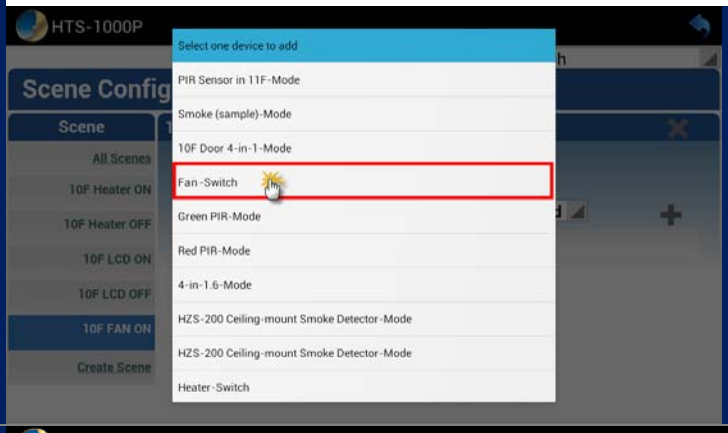
Click the “Scene” button.	

Click “Create Scene” and name the new scene.

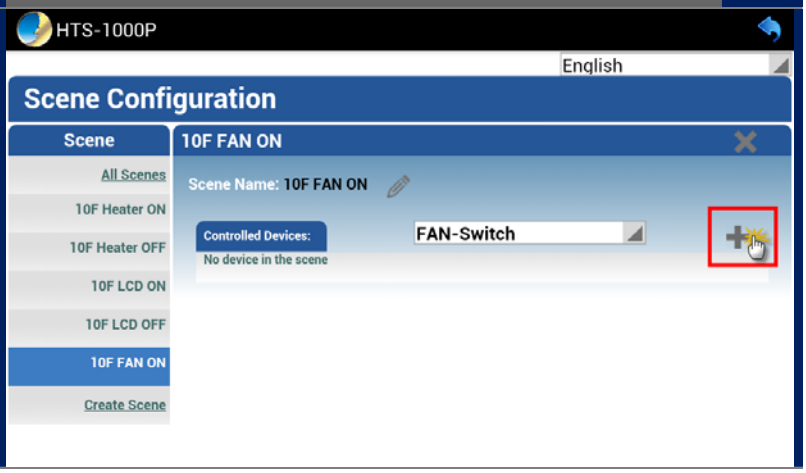


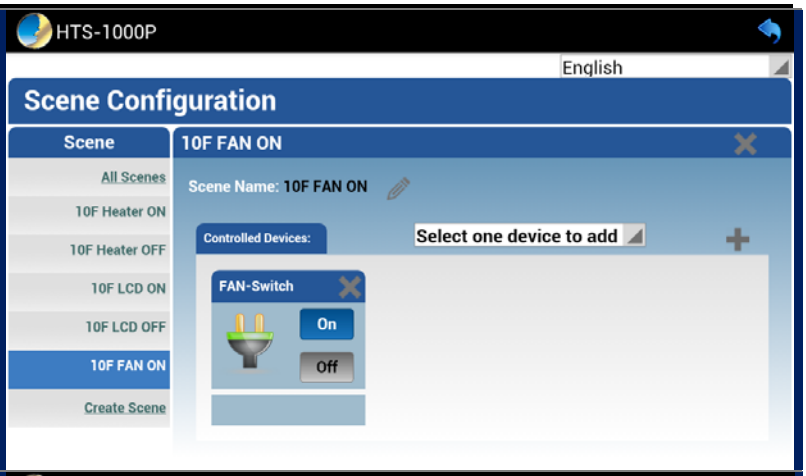
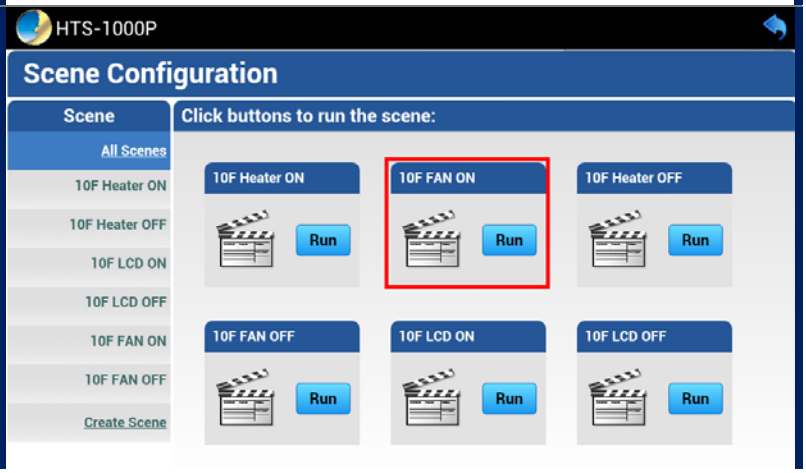
Select one device to add to the device list.

Select one device.

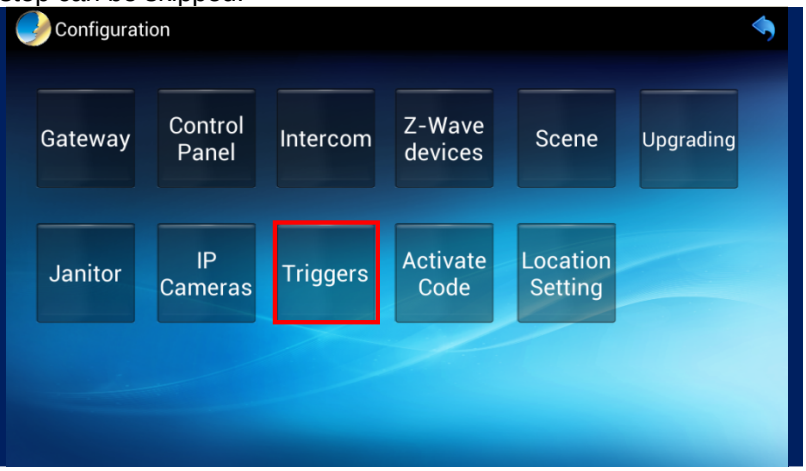


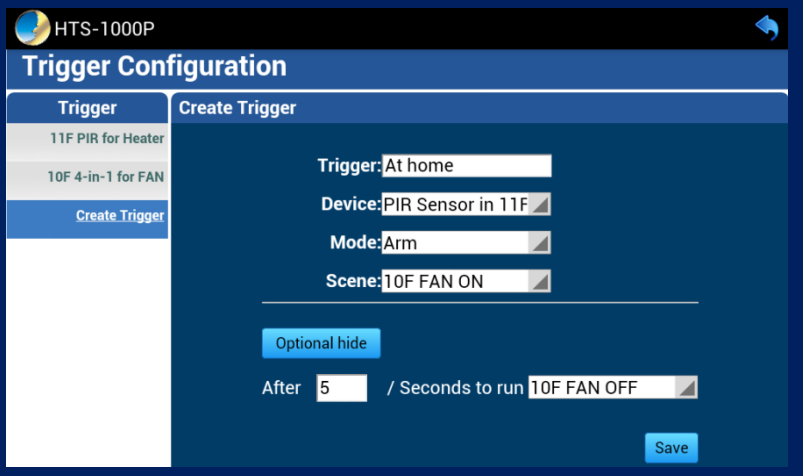
Click the “Plus” button to add device.



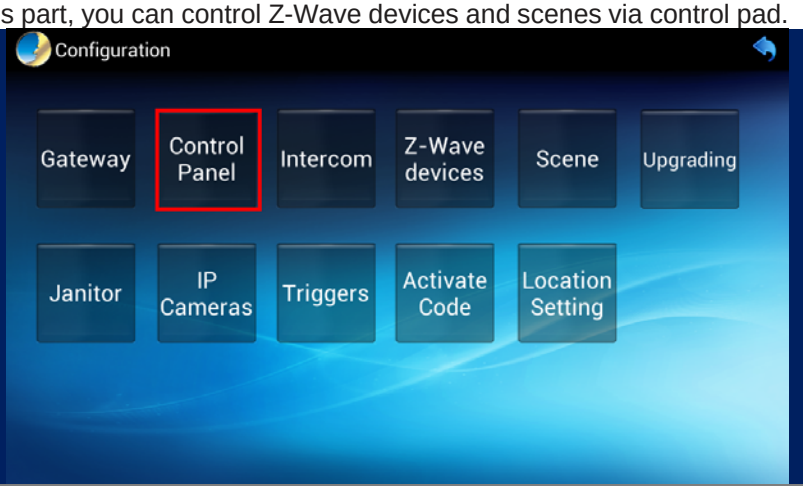
Select the status of device (ON or OFF).	
Click “All Scenes” to check the scene.	

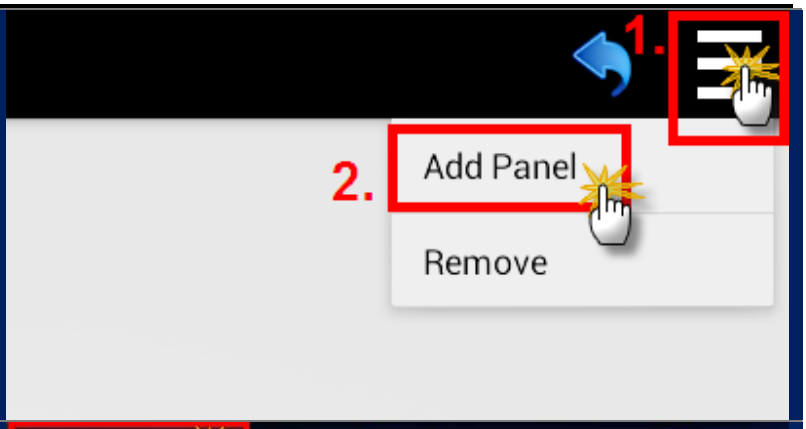
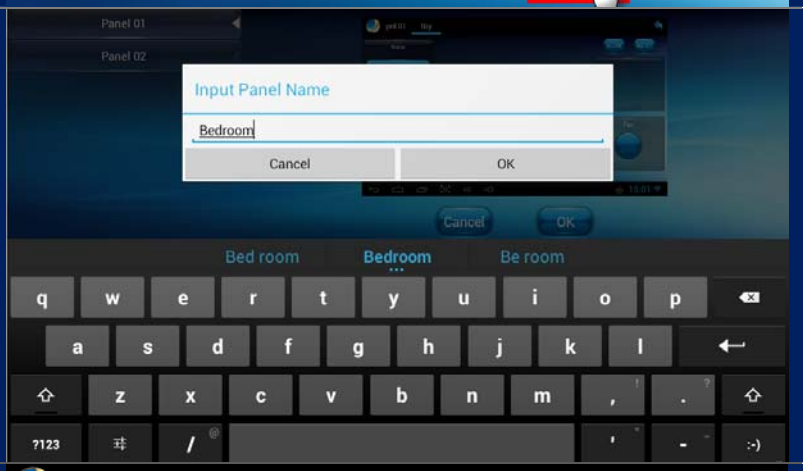
Step 4. In Trigger mode, the trigger time is set. An alarm notification is sent via sensor. If a sensor is not installed, this step can be skipped.

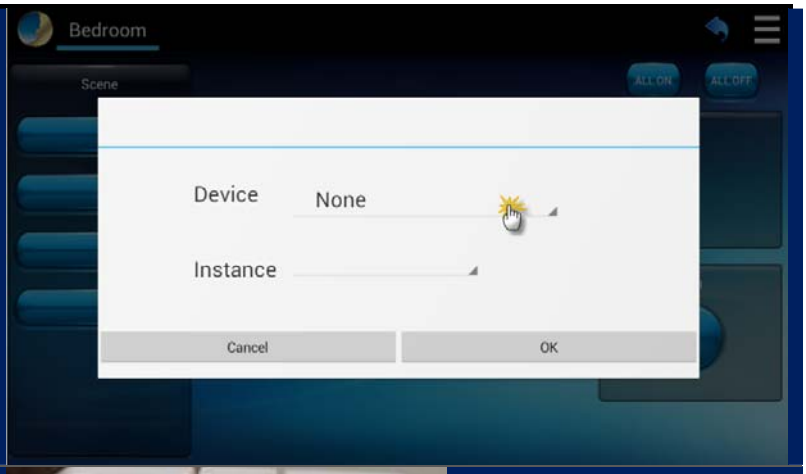
Click the “Trigger” button.	

Click “Create Trigger”. Trigger: Name this trigger. **Device:** Select a Z-Wave device. **Mode:** Select “Arm” to enable alarm. **Scene:** When it triggers, the fan will turn on. **Optional:** After triggering for 5 seconds, the fan will turn off by itself.	
Switch to “AWAY” to enable monitor mode.	
When one of Z-Wave devices is triggered, control pad will alarm.	

Step 5. After configuring this part, you can control Z-Wave devices and scenes via control pad.

Click the “Control Panel” button.	

Click the three-line button on the upper right corner and click “Add Panel”.	
There are two types of panel that you can choose from.	
Name the panel.	
Click and hold for two seconds to select the device or scene.	

Click on the Device field.	
Use a paper clip or pin to press the program button on the back of the sensor for 1 time to connect.	
Go back to the main page and click the “Control” button.	

You can control scenes and devices here.

Appendix A: Troubleshooting & Frequently Asked Questions

Features	
This difference between Z-Wave and ZigBee	● The frequency is different between Z-Wave and ZigBee. ZigBee is 2.4GHz and Z-Wave is about 900MHz. ● The outdoor distance is different. ZigBee is 10~75 meters and Z-Wave is about 30 meters.
Z-Wave Device Installation	
How to reset the HZS-100 Series	Use a paper clip or pin to press the program button for 10 times within 10 seconds. Only use this procedure when the primary controller is lost or inoperable.
Repeater Function	Only HZS-530 Series can extend the frequency range of Z-Wave. HZS-530 Series can act as a signal repeater to enhance the Z-Wave wireless communication range. For example, the HAC-1000 (Control gateway) is installed on the second floor to control over the HZS-300 (4-in-1 Sensor) on the first floor, but the Z-Wave frequency is weak. Thus, HZS-530 Series can be installed in between the second floor and the first floor to solve the problem.