## I. Overview

Thank you for choosing this intelligent wireless alarm system, please read the user manual carefully before installation and operation.

The alarm system support most of the wireless detectors, it is easy use and install, It could make onsite alarm and dial the user phone number through telephone line when the alarm is activated. It is the ideal choice for family, villas, shopping malls, and office for anti-theft purpose.

## 1. The basic function of alarm system

- The main panel supports most of wireless detectors, PIR, magnetic gap detector, infrared balusters, smoking and gas sensors, panic buttons etc.
- 2) The main panel supports up to 99 wireless alarm zones, wireless detectors are easy to register and use.
- The main panel could preset 2 center alarm phone numbers and 6 alarm phone numbers.
- 4) Full keyboard operation.
- 5) Main panel supports wireless siren, keep sounding when alarming, the wireless siren would also send the confirmation sound when the system is armed or disarmed.
- 6) Users could set the system status(Arm, Disarm etc.) through the remote telephone by dialing the main panel's number.
- 7) The main panel has high priority to make the alarm phone call, if the phone is used(not alarming)when the alarm is activated.
- 8) The main panel could record voice information, this voice would be played to alarm phone automatically when the alarm phone call is connected.
- 9) Onsite voice monitor through telephone form long distance.

- 10) Main panel supports wired/wireless siren, user could connect the wired/wireless siren to the main panel.
- 11) For security reason one password is used for remote access.
- 12) The main panel could make alarm when it keeps detecting the specified frequency interference for more than 5 seconds.
- 13) The main panel has anti-decode function, user could set disenable the wireless remote controller, then all controllers(include those possibly decoded) could not set the panel.

## 2. The main technical parameters:

- 1) Working power supply: DC 9-12V
- 2) Back-up battery: 7.2V (1.2V x6) Ni-MH rechargeable battery
  - A. Static Current: Is < 5mA
  - B. Alarm current: Ia<280mA
- 3) Wireless working frequency: Receive 315MHz
  Transmission(for wireless siren): 433.92 MHz
- 4) Wireless encoding: ASK
- 5) Wireless receiving sensitivity: -98dBm @ 12dB SINAD
- 6) The number of wireless zone: 99
- 7) The number of alarm phone number: 8 groups .
- 8) Wired/wireless alarm siren volume: ≥ 110dBspl
- 9) Operating temperature:  $-15 \,^{\circ}\text{C} \, \sim \, +55 \,^{\circ}\text{C}$ 
  - R.H. ≤ 90%

## 3. The basic kits of alarm system

- 1) Main panel (include battery) 1 set
- 2) Wireless door detector 2 sets
- 3) Wireless remote controller 2 pcs
- 4) Wireless siren 1 pc
- 5) User manual 1 set

## II The installation of the alarm system

1. The structure of alarm main panel.

#### 2. Installation of wireless detector

1) Installation of Magnetic Door and Window detectors.

The principle of magnetic door detector is sense distance, when the gap of magnet and magnetron is increased to a certain distance, the magnetism decreases accordingly and the switch in the magnetron turns on and result from alarming .It can detect the opening of doors and windows. Magnet part is easy to install on the doors or windows, the other part then fixed on the door frames by adhesive tape.

#### 2) Installation of P.I.R.

P.I.R. could detect body in the certain range .Detection distance is from 5 to 15 meters (adjustable), Horizontal detection angle is 110 degrees, and vertical detection angle is 60 degrees. Adjusting the direction and distance to the suitable position and then fixing the detector on the wall or the furniture. Please be noted: the position and direction of the detector would affect the detection performance, please contact the suppliers if meet any difficulties when make the installation.

3) The usage of wireless remote controllers.

The remote controller has four buttons: Away Arm Button, Home Arm button, Disarm Button, Panic Button, Pressing the arm button (away arm and home arm), the main panel will get into arm status instantly; when press the panic button, the main panel will alarm no matter what kind of status the main panel is in, Pressing disarm button would set the main panel in disarm status and abort the current alarm operation.

# III The setting and usage of main panel

## 1. The basic setting of main panel

It is necessary to make the related setting for user before using the system, The System setting procedure and format:

If the operation is correct, the host would give one "Di..." beep to confirm, otherwise give "Di..Di" two beep to prompt the user.

Following is the basic settings of the main panel, please be noted: those setting operation are all under the setting "CF" disarm state.

#### >Set alarm phone number

Format: [#] + [1](1-6) + [12345678] (Tel number) + [#]

Description: Input 1-6 to set 1-6 group alarm phone number. But the sixth group phone number is only emergency use.

>Delete alarm phone number

Format: [#] + [1] (1-6) + [0] + [#]

Description: Input 1-6 to delete 1-6 group alarm phone number.

>Set 1-2 group alarm center phone number

Format: [#] + [7] (7-8) + [11223344] (center number) + [#]

Description: Input 7-8 to set 1-2 group alarm center phone number.

>Delete alarm center phone number.

Format: [#] + [7](7-8) + [0] + [#]

Description: Input 7-8 to delete 1-2 group alarm center phone number.

>set or change the operation password.

Format: [\*] + [7] + [5858] (new password) + [5858] (new password) + [ \* ]

Description: set new password to 5858

>set the main panel user ID

Format: [\*] + [0] + [012345] (user ID, 000000-999999) + [\*]

Description: set user ID to 012345 when use the alarm center.

>Set ring times before answering the remote calling .

Format: [\*] + [6] + [9] (0-9) + [\*]

Description: Set ring times before answering the remote phone call, from 0 to 9 ("0" not answer)

>Enable/Disable anti-interference function of main panel

Format: [\*] + [9] + [1] (1/0) + [\*]

Description: Input 1 to enable anti-interference function, 0 disable (default).

Explanation of anti-interference: If main panel keep detecting one signal for more than 8 seconds, It would regard the signal as interference, and activate the alarm.

>Enable/Disable anti-decode function of main panel.

Format: [\*] + [3] + [1] (1/0) + [\*]

Description: Input 1 to start the main panel anti-decode function, 0 disable (default).

Explanation of Anti-decoding: When the function enable, main panel would ignore the signal from remote controller and emergency buttons.

>Enable/Disable absent line alarm function of main panel.

Format: [\*] + [5] + [1] (1/0) + [\*]

Description: Input 1 to enable absent phone line alarm function, 0 disable(default).

Explanation of phone line disconnection alarm: When the Phone line is cut or destroyed, main pane would beep 10 seconds.

>Set the delay time of arm when press arm key in main panel.

Format: [\*] + [4] + [0] (0-99) + [\*]

Description: Input 0-99 to set delay time to 0-9 seconds (default 0 second)

>set the delay time of activated alarming of main panel

Format: [#] + [7] + [0] (0-99) + [#]

Description: Input 0-99 to set delay time to 0-99 seconds (default 0 second).

>adjust the siren sounding time when the alarm is triggered

Format: [#] + [9] + [0] (0-30) + [#]

Description: Input 0-30 to set siren sounding when alarming (default 5

minutes, if no one disarm it).

>Enable/Disable wireless siren function of main panel.

Format: [\*] + [07] + [1] (1/0) + [\*]

Description: Input 1 to start the main panel wireless siren function, 1 enable (default).

Explanation of wireless siren: When the function enable, wireless siren would activate the alarm signal from main panel and siren sound immediately.

#### 2. Registration between main panel and wireless detectors

All wireless detectors (have the same frequency with the main panel) could be registered to the main panel under the registration state as the following procedure, still registration operation must be under system setting state.

#### 1) Wireless remote controller's registration

Format: [\*] + [0] + [\*]

Description: Pressing keys above in the main panel, then press any buttons of the remote control to make it transmit signal, once the main panel receive and save it, and make one "Di.." beeps to confirm this valid registration. After completing the registration process.

Note: All wireless remote controllers would not occupy the defense zone.

Delete all registered remote controller

Format: [\*] + [02] + [\*]

Description: User could also delete all the registered remote controller according the following procedure, the operation must be under the disarm state.

## 2) Wireless detector's registration

Format: [\*] + [8] + [1] (defense zone-Code :1-98) + [\*]
Description: Pressing keys above in the main panel, then trig the detectors to transmit the signal, once the main panel receive and save

it, and make one "Di.." beeps to confirm this valid registration. User could press any key to quit the registration state.

#### 3) Defense zone trigger mode:

Format: [#] + [8] + [1] (defense zone-Code :1-98) + [1] (defense zone-trigger mode 0-8) + [#]

#### 0. Invalid mode

#### 1. Instant mode

Once the defense zone with instant mode is triggered, main panel would activate the alarm immediately when main panel is in the arm state (include arm home and arm away).

#### 2. Arm at home mode

Once the defense zone with arm at home mode is triggered, main panel would activate the alarm immediately only when it is in arm home state.

## 3. Emergency mode

Once the defense zone with emergency mode is triggered, main panel would activate the alarm immediately whatever state it is.

## 4. Multi-detect mode(complex intrusion detect)

If user program 2 or more zone number/detectors in Multi-detect mode, when the alarm system is in <a href="Arm at Home mode">Arm Away mode</a>, the alarm system will be alarming when those detectors with Multi-detect mode is triggered within 30 seconds. That means system will not alarm if only one defense zone (with Multi-detect mode) is triggered within 30 second. It will avoid any false alarming (Suitable for any position which may be easier to be triggered by special environment).

Note: To enable this function, user must program at least two or more defense zone number/detectors. And must be programmed individually.

For example: If you would program zone #5 and zone #18 to Multi-detect mode. That means the system will be alarming when this 2 zones of detectors (#5 & #18) is triggered within 30 seconds. On the Main Panel press # 8 5 4 # ("5" means zone #5), and press # 8 1 8 4 # ("18" means zone #18) is OK.

## 5. delay time of activated alarming mode

Once the defense zone with delay time mode of activated is triggered, main panel would not activate the alarm immediately. Main panel would activate until it setting delay time of alarm is finished.

## 6. Delete registered detector

User could also delete one registered wireless detector according the following procedure, the operation can be delete appointed the defense zone.

## 7. Repeat trigger mode

Once the defense zone with repeat trigger mode is triggered, main panel would not activate the alarm immediately. Until it is triggered again at this time within 5~30 seconds, main panel would activate the alarm

#### 8. Mute call mode

Once the defense zone with mute call mode is triggered, main panel would activate the alarm immediately to call user. But siren is not active.

## 4) The setting rule for wireless defense zone

3 trigger modes are available for wireless detectors, detectors must be set the trigger mode in registration state as following.

P.I.R.: at home mode (trigger mode 2 or 4)
Smoking detector: emergency mode (trigger mode 3)
Gas detector: emergency mode (trigger mode 3)
Glass broken detector: emergency mode (trigger mode 3)

Door detectors: instant mode (trigger mode 1)
Other detectors: instant mode (trigger mode 1)

Other detectors. Instant mode (trigger mode 1)

Note: Main panel with emergency key has already be set in defense zone 99, detectors with other mode could be set in 1 to 98 defense zone.

#### 5) Delete all registered detectors:

Format: [#] + [8] + [99] + [6] + [#]

Description: User could also delete all the registered wireless detectors according the following procedure, the operation must be under the disarm state.

## 3. Recording and playing of voice message

#### 1) Record voice message

The operation must be done in the disarm state with the following procedure.

Description: When the main panel make one "Di" beep, it start to record, user could stop recording by pressing "Rec" key again, or main panel stop automatically after 10 seconds.

Main panel could record 10 seconds voice message. When the alarm phone call is answered, this voice message would be played.

## 2) Demonstrate the recorded voice message

Format: [\*] + [9] + [\*]

Description: Then hook off the paralleled telephone, hear the recorded voice message.

## 4. Alarm history.

Format: [history](history key) + [0] (0-99) + [history](history key)

Description: Input 0-99 to inquire alarm system of defence zone recording (0 is one of late).

## Delete all alarm history

Format: [history] (history key) + [000] + [history] (history key)

Description: User could also delete all the registered alarm history, the operation must be under the disarm state.

# IV The basic usage guide for the system

User must make the necessary setup and parameters configuration before using the main panel. Following description is the basic guide for user to operate the alarm system normally and efficiently, the detail operations is referred to the corresponding part above.

## 1. Basic setting for main panel

- 1) Set alarm phone numbers and alarm center phone numbers.
- 2) Set ring times before answering the remote calling.
- 3) Set the user ID and enable or disable status reporting to alarm center.

## 2. Connect the wired equipment correctly

- 1) Connect the power supply, backup battery correctly for main panel.
- 2) Connect the phone line into "LINE IN" socket and telephone to "Phone" socket.
- 3) Connect the external siren to the "siren" socket.

## 3. The recording of voice message.

10 seconds of voice message could be recorded, It would played automatically when the alarming call is answered.

# 4. Make the registration between main panel and all wireless detectors.

Please refer to chapter 2 for detail.

## 5. Set arm state (arm away and arm at home)

#### Method 1:

Through the keypad of main panel

- A. Away arm: Press "Away" key for three seconds, main panel enters arm status immediately.
- B. Arm at home: Press the "HOME" key for three seconds, main panel enters arm at home status immediately.

#### Method 2:

Through the arm button of wireless remote controller

- A. Away arm: Press the arm button, main panel would enter arm state immediately.
- B. Arm at home: Press the arm at home button, main panel would enter arm at home state immediately.

#### Method 3:

Through remote telephone

Make phone call to the number of main panel, input the correct password after answered, then press number "4", main panel enters arm away immediately.

#### 6. Activate the alarm

#### Method 1

The trigger from any registered detectors would activate the alarm when the main panel is in the arm away status.

#### Method 2

The trigger from detectors registered at home would activate the alarm when the main panel is in the arm at home status.

#### Method 3

The emergent signal from any registered remote controller or emergent button through pressing panic button would activate the alarm whatever status the main panel is.

#### Method 4

The emergent key pressing from the main panel would activate the alarm whatever status the main panel is.

#### 7. Telephone alarm operation

#### 1) Connect the phone line to the main panel

When alarm is activate, the main panel would dial the alarm phone number in turn, if the phone call is answered, main panel play recorded voice message firstly, and stop the local siren sounding at the same time. Also users could make the following setting by pressing the related keys of the answered phone.

Press "1" key, make on-site voice monitor

Press "2" key, siren sound immediately

Press "3" key, siren stop sounding

Press "4" key, make arm away immediately in the main panel

Press "5" key, disarm immediately in the main panel

Press "6" key, Play recorded message

Press "#" key, main panel hang up and end the alarm process (release the alarm), main panel would still remain the current arm state.

Note: When the alarm phone call is answered, if there is no valid key pressing, main panel would hang up after 20 seconds, and make the next alarm phone calling automatically.

## 2) Disarm by the remote controllers.

Pressing the disarm key of the remote controller would terminate the current alarming and change into disarm status.

#### 3) Disarm overtime automatically

If there is still no effective answer, release or disarm operation when alarming, the main panel would make the alarm calling for 3 times each number in turn, and then stop alarm, still remains the current arm state.

## 8. Set function through remote telephone.

User could dial the number of main panel, after answered, input the correct password, after one beep, user could make the following function configuration by pressing the keys:

Press "1" key, make on-site voice monitor

Press "2" key, siren sound immediately

Press "3" key, siren stop sounding

Press "4" key, make arm away immediately in the main panel

Press "5" key, disarm immediately in the main panel

Press "6" key, Play recorded message

Press "#" key, main panel hang up and end the alarm process(release the alarm),

Note: When the alarm phone call is answered, if there is no valid key pressing, main panel would hang up after 20 seconds.

Main panel would give one "Di.." beeps when make one valid setting, otherwise give two "Di..Di.." beeps.

# Appendix: the usage of wireless siren

## 1. Registration between main panel and wireless siren

First user would activate the main panel (pressing emergency key of main panel or panic button of remote controller) to send wireless alarm signal.

Plug the power supply to the wireless siren, It would give "Di" sound which indicate the siren is working, then unplug the power supply and plug again

immediately, the siren would not give any sounds (if the siren give another sound again at this time, that represents user have to restart the registration process), then unplug the power supply and hen plug in for another time, It would give another two "Di ..Di" sounds to confirm that the wireless siren is in registration state. And it would detect the signal from the main panel and save the code into its memory, the registration process is completed.

#### 2. The usage of wireless siren

Power on the wireless siren again after the registration, when main panel make the alarm, the wireless siren would also make the alarm as long as the siren in the valid distance range, Also It would give two "Di ..Di" sounds when the main panel is set arm or disarm status to make the confirmation to the user.

#### FCC ID: D6PHFD-20AT99L

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.

Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

NOTE: This equipment has been tested and found to comply with the limits 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 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:

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