



Digital wireless interphone



| | | | | | | |
|----|----|----|----|----|----|----|
| AT | BE | CY | HZ | DK | EE | FI |
| FR | DE | EL | HU | IE | IT | LK |
| LT | LU | MT | NL | PL | PT | SV |
| SI | ES | SE | UK | BG | RO | HR |

IMPORTANT ITEMS

- Please read the instructions carefully before using. Please keep this manual.
- The direct mode, transfer mode, a cluster mode of operation, please consult your dealer.
- ⚠ Precautions for battery use:
- Please do not disassemble or reft batteries.
 - There is a protective circuit inside the battery, disassembly or modification of the battery will lead to damage to the protection circuit, the battery will heat, smoke, rupture or fire.
 - Do not short-circuit the battery.
 - Do not use any metal to connect the battery "+" pole and "-" pole, do not use metal object container to store and store battery. If the battery is short circuited, it will produce too large current, the battery will heat, smoke, break or fire.
 - Please do not place the battery near the fire, stove or other heater. Please don't burn or heat the battery. Batteries can produce heat, fireworks, breaks, or fires.
 - Do not expose the battery to rain, snow, sea water or any other liquid.
 - Do not charge or use wet batteries. If the battery gets wet, it must be dried before use.
- ⚠ Precautions for charger:
- Please do not plug the vent of the charger, otherwise it may cause internal parts damage and cause electric shock or fire.
 - Please don't let the charger close to the radiator or heat source; please don't pad the paper under the charger.
 - Please do not put the charger in a closed container and on the bed, sofa or carpet.
 - Please do not use the charger in the bathtub, the pool, the swimming pool or the wet basement.
 - Please do not place the metal sheet in a holder, otherwise the conductive material may damage the machine.
 - Please don't press the power supply to bend or twist the pins.
 - Please do not allow the charger to have stains, dust, water traces or food.
 - Please do not put the charger in high temperature or exposure to the sun.

Notice of using device :

- Walkie talkie and battery do not charge when wet.
- Please do not place the interphone on the unstable surface.
- Before installing options, be sure to turn off the walkie talkie power supply.
- Please don't press the PTT key when you don't want to talk.
- In the launch, the walkie talkie is not too close to or contact with the exposed parts of the body (especially the face and eyes), please keep the antenna more than 2.5 centimeters away from the body.
- When launching, the distance between the mouth and the microphone is 5 to 10 centimeters, which makes the sound clearer and reduces the electromagnetic radiation.
- Headset headset connected to intercom, please reduce the volume of interphone.
- Please do not damage the walkie talkie and the label on the back of the battery, otherwise it will reduce the waterproof performance of the walkie talkie.
- Do not disassemble the walkie talkie without permission, which may cause walkie talkie failure, and will reduce the waterproof performance of walkie talkie.
- Do not place the radio at places where the ambient temperature is below -30 or above +60 centigrade or in direct sunlight.

Please do not use this device on the following occasions:

- Near explosive sites.
- On the plane.
- Near the gas station.

Equipment assembly

Technical indicators

| General specification | | Launch | |
|-----------------------|--------------|------------------------------|---------------------------------|
| frequency range (MHz) | 400-470MHz | frequency range (MHz) | 400-470MHz |
| Working Voltage | 6.2V~8.4V | Frequency stability | ± 1.0ppm |
| working voltage | DC 7.4V | Emission power | Low: 1.0W, High: 5 W |
| Channel interval | 12.5kHz | Emission current | Low: <1.00A, High: <1.70A |
| working temperature | -30°C~+50 °C | FM noise | -40dB @ 12.5kHz |
| Max Antenna Gain | 2.15dBi | Emission and stray radiation | -36dBm @ <1GHz, -30dBm @ >1GHz |
| | | Adjacent channel power | -40dB @ 12.5kHz |
| | | FM modulation mode | 12.5kHz (data only); 7K60F1D |
| | | 4FSK digital modulation mode | 12.5kHz (data + voice); 7K60F1E |
| | | Modulation limitation | ≤2.5kHz @ 12.5kHz |
| | | Idle time slot power | ≤-57dB |
| | | Audio response | +1dB ~ -3dB |
| | | Rated audio distortion | ≤3% |
| | | Digital protocol | TDMA TS 102 361-1, -2, -3 |
| | | Digital speech codec | AMBE + 2** |

Receive

| | |
|------------------------------|---|
| frequency range (MHz) | 400-470MHz |
| Frequency stability | ± 1.0ppm |
| Simulation sensitivity | -120dBm (12 dB SINAD) |
| Digital sensitivity | -118dBm (BER 5%) |
| intermodulation | TI4603C, 55dB ETSI, 55dB |
| Adjacent channel selectivity | TI4603C, >60dB @ 12.5kHz ETSI: >60dB @ 12.5kHz |
| Receive stray radiation | -47dBm @ <1GHz -47dBm @ >1GHz |
| block | ≥84dB |
| Rated audio power | 1W |
| Audio response | +1dB ~ -3dB |
| Rated audio distortion | ≤3% |

Panel introduction

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Equipment accessories

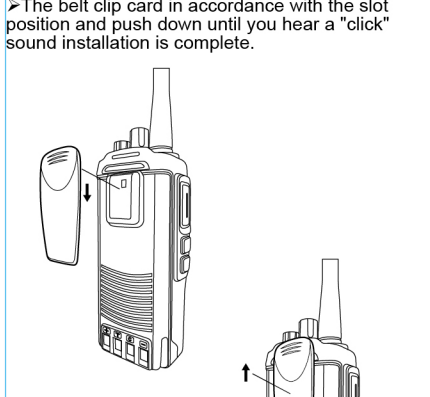
| SERIAL NUMBER | PROJECT | NUMBER |
|---------------|--------------|--------|
| 1 | Host | 1 |
| 2 | Battery | 1 |
| 3 | Antenna | 1 |
| 4 | Charger | 1 |
| 5 | Belt clamp | 1 |
| 6 | Instructions | 1 |

Clean

- Please regularly use clean dry lint free or brush to wipe the dust on the surface of the product and the charging pole.
- The key, control knob and cabinet of this product are very dirty. Clean with neutral detergent and non-woven fabric. Don't use chemical agents such as detergent, alcohol, spray or petroleum preparation to avoid damage to the surface and shell. After cleaning, make sure that the product is completely dry, otherwise don't use it.

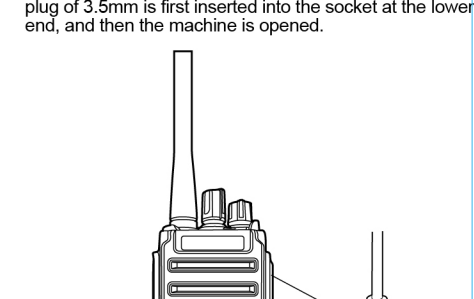
Installation and disassembly of belt clip

The belt clip card in accordance with the slot position and push down until you hear a "click" sound installation is complete.



Side plug installation

As follows, the right side cover is buckled from the upper end to reveal the headphone jack.
When the headset is used, the headset two pins are inserted directly into the earphone hole.
When using the write frequency line, the write frequency plug of 3.5mm is first inserted into the socket at the lower end, and then the machine is opened.



The elastic clips of the belt clip are lifted outwards and pushed upwards, so that the belt clip can be dismounted.

Equipment accessories

| SERIAL NUMBER | PROJECT | NUMBER |
|---------------|--------------|--------|
| 1 | Host | 1 |
| 2 | Battery | 1 |
| 3 | Antenna | 1 |
| 4 | Charger | 1 |
| 5 | Belt clamp | 1 |
| 6 | Instructions | 1 |

Clean

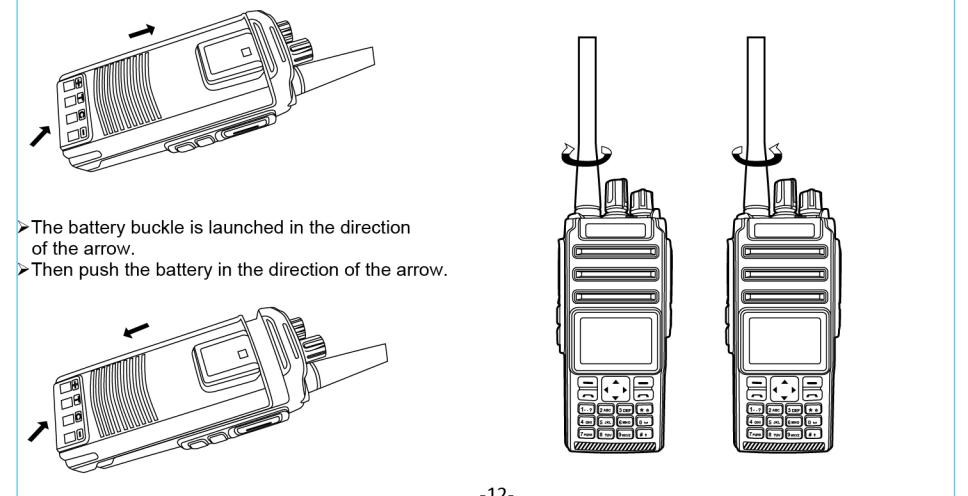
- Please regularly use clean dry lint free or brush to wipe the dust on the surface of the product and the charging pole.
- The key, control knob and cabinet of this product are very dirty. Clean with neutral detergent and non-woven fabric. Don't use chemical agents such as detergent, alcohol, spray or petroleum preparation to avoid damage to the surface and shell. After cleaning, make sure that the product is completely dry, otherwise don't use it.

Display function

| Serial number | Icon name | Icon description | Icon representation |
|---------------|-------------------|---|--------------------------|
| 1 | Signal intensity | Signal intensity. The more the number of signals, the stronger the signal. | [Signal strength icon] |
| 2 | Emission power | high power low power | [Power icon] |
| 3 | Keyboard lock | Keyboard locking instructions | [Keyboard lock icon] |
| 4 | Alarm state | Device failure or unwritten or unwritten frequency | [Alarm icon] |
| 5 | Pattern | Regular pattern indication Relay mode indication | [Pattern icon] |
| 6 | Electricity | Energy intensity. The more the number of electricity grids, the stronger the electricity. | [Electricity icon] |
| 7 | Channel name | Indicate the name of the current channel | [Channel name icon] |
| 8 | Channel frequency | Indicate the frequency of the current channel | [Channel frequency icon] |

Antenna installation and disassembly

Clockwise will lighten to the size of antenna antenna.
The counter clockwise screw out the antenna.



Menu description

The main menu is divided into 5 submenus: the local information, the short message, the area, the interphone set the local information.

- Communication: including the contact list and manual dialing.
- The contact list: users can be used in the contacts, contacts can be a person can also as a group, need to add a contact by radio programming software. When used, select a contact and press the "PTT button" to call the user.
- A new contact: you can add new contact information.
- The manual dialing users can be the number of the person again after the completion of the input input, press the "PTT" button to call the user.
- Short message include new short message, state short message, shortcut text, inbox, and hair box.
- The new Short Message: the user can manually enter the Short Message content, and then select the user to send.
- The state new users can be pre stored in the state Short Message send walkie talkie to the user.
- At last text the user can send Short Message stored walkie talkie to users.
- The inbox: Short Message received.
- The "Dialing" Short Message send.
- Area: different regions correspond to different channel configurations, and the configurations in the region are stored in the device through the user configuration software.
- Interphone setup: it is divided into arbitrary call, language setting, power selection, backlight setting, hint tone setting, keyboard lock.

Powering on

Turn on the machine clockwise rotation (turn on / volume knob), display the screen is light, appear the boot interface, at the same time, the loudspeaker has a boot prompt, and the intercom is working. The opening interface is like the following figure.

Turn off: turn on / volume knob counter clockwise and turn off the machine.

Channel selection

There are two ways of frequency switching:
Channel knob switch: clockwise rotation [channel knob], switch to the next channel; counter clockwise rotation [channel knob], cut back to the one channel.

Manually enter the channel number: press the [call key], enter the manual input channel number interface, enter the channel number to be switched with the numeric keypad, confirm by the confirmation key. If there is an input error, it can be deleted by the [left key].

Volume adjusting

Volume adjustment: the output volume increases clockwise (turn on / volume knob), output volume decreases against clockwise rotation (turn on / volume knob).

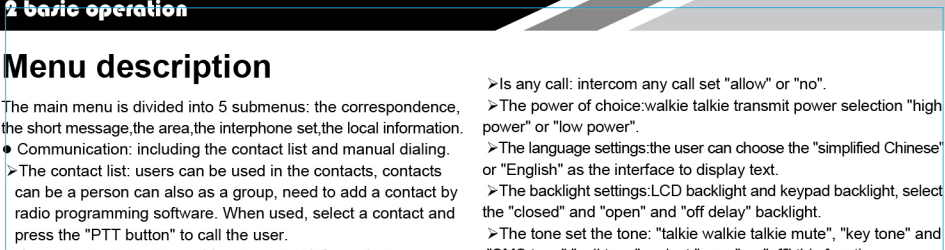
Receive and launch

1 receive
Rotation (turn on / volume knob) open the machine and adjust the selection to receive the channel after receiving the signal, receive the indicator light to light green light, adjust the volume to receive.

2 Launch

Adjust the choice to receive the channel to hold PTT, the launch indicator light red light, the microphone 5-10 centimeters can be spoken. Release PTT, device return mode.

The scan list:

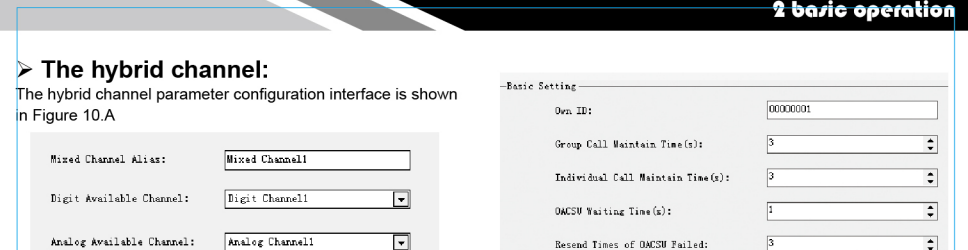


The "scan list" is set up in the scan mode for the channel to be scanned. The "scan list" sets up the channels that have been added into the scan, and the scanning order is adjusted "up" and "down".

Working mode

The handheld platform supports regular patterns and cluster patterns. The work mode needs to be configured through the upper computer.
Conventional mode: In this mode, the mode of work is digital communication and analog communication. Digital communication support the functions of a call, a group call, a short message, a short message; and so on. Analog communication: the regular function of the analog interphone, and can communicate with other analog interphones.
Cluster mode: In this mode, the interphone is registered into the system. The functions of the group call, the call, the cross area call, the dispatch call and so on are realized.

The hybrid channel:



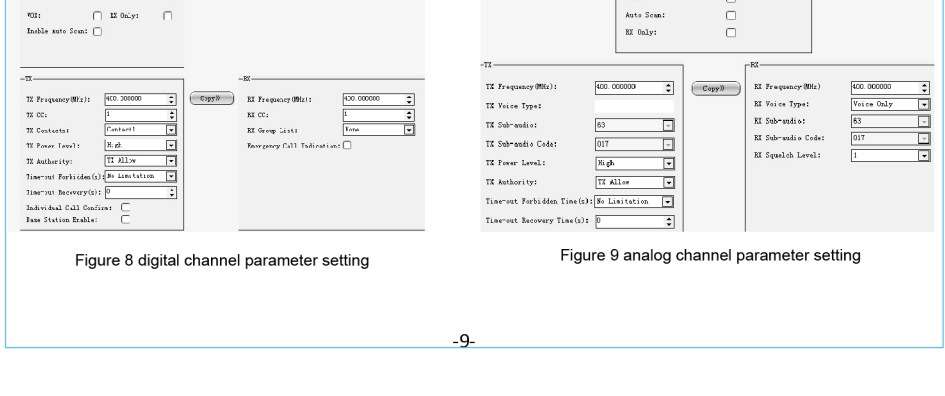
There are two sets of "basic parameters" and "contacts" under the digital service project.

Digital services:

There are two ways of frequency switching:
Channel knob switch: clockwise rotation [channel knob], switch to the next channel; counter clockwise rotation [channel knob], cut back to the one channel.

Analog channel:

Click the "analog channel" tab to enter. Click the right key in the blank and add the "add" option to add a new analog channel. Also, clicking on the corresponding analog channel can enter the parameter setting of the analog channel, as in Figure 9.



The main functions of the conventional pattern

1 launch
To select the desired channel and ID
> To press the "PTT" button, the light emission (red), into the microphone. Unlock the "PTT button" reception.

Note:
If the channel is in use, press the "PTT" button will send channel intercom busy, please wait for the side channel after launch.

> To be on the receiving side the best sound quality, keep the 5-10 cm distance between mouth and microphone.

Group call (number)
Open the address book, select the pre-set number, press the PTT button to launch the group call.

Single call (number)
Open the address book, select the pre-set number of single call, press the PTT button to launch a single call. When a single call is received, the call number is displayed on the main interface of the interphone.

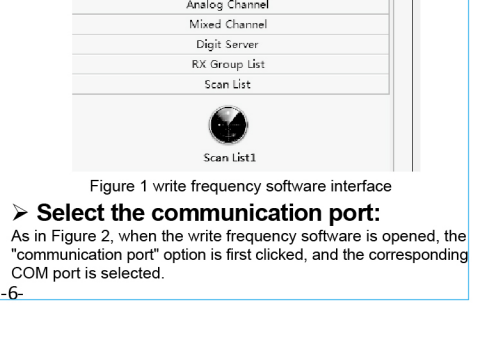
Send short messages (numbers)
Open the main menu, in the short message menu, select the new short message, the user can edit the content of the short message. When the editor is finished, select the contact and send it out.

Receive short messages (numbers)
When the interphone receives short messages, a portion of the message is received on the standby menu, and you can read the short message in the inbox.

Parameter configuration

The parameters of the interphone need to be configured by the "write frequency software" of the host computer. Before entering the write frequency software, the write frequency (via USB) is connected to the computer, and the other end is inserted into the interphone headset socket.

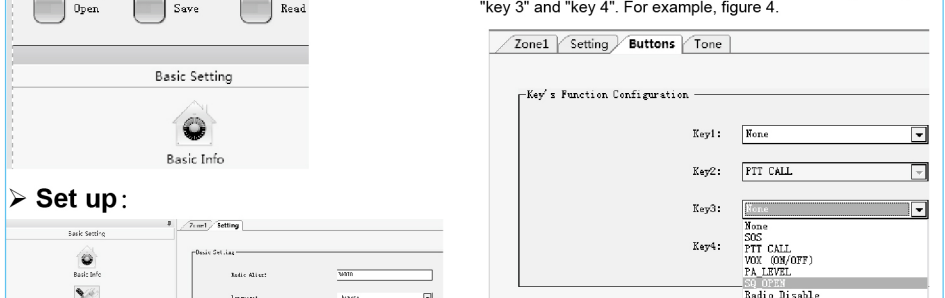
Write frequency interface:



Select the communication port:
As in Figure 2, when the write frequency software is opened, the "communication port" option is first clicked, and the corresponding COM port is selected.

Key:

The function key SK2 of the interphone can be configured by "key 3" and "key 4". For example, figure 4.

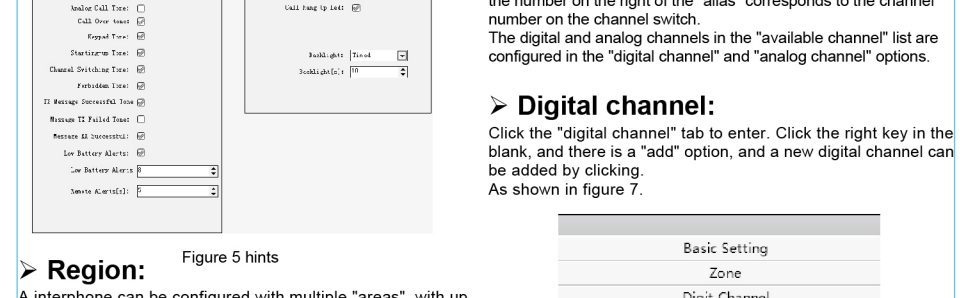


Hint tone:

Under the "hint" item, some hints of the interphone can be set, such as the known indicator light, the low electric alarm and so on. For example, figure 5.

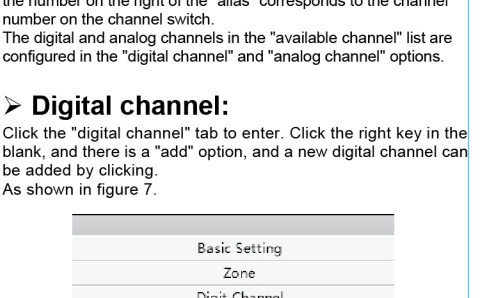
Region:

An interphone can be configured with multiple "areas", with up to 16 channels in each area. For example, Figure 6.



Digital channel:

Click the "digital channel" tab to enter. Click the right key in the blank, and there is a "add" option, and a new digital channel can be added by clicking.



FCC STATEMENT

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.

NOTE 1: 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.

NOTE 2: Any changes or modifications to this unit not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

RF Exposure Compliance and Control Guidelines and Operating Instructions

To control your exposure and ensure compliance with the occupational/controlled environment exposure limits always adhere to the following procedures.

Guidelines:

- Do not remove the RF Exposure Label from the device.
- User awareness instructions should accompany device when transferred to other users.
- Do not use this device if the operational requirements described herein are not met.

Operating Instructions:

- Transmit no more than the rated duty factor of 50% of the time. To transmit (talk), push the Push-To-Talk (PTT) button. To receive calls, release the PTT button. Transmitting 50 % of the time, or less, is important because this radio generates measurable RF energy exposure only when transmitting (in terms of measuring for standards compliance).
- Hold the radio in a vertical position in front of face with the microphone (and the other parts of the radio, including the antenna) at least one inch (2.5 cm) away from the nose. Keeping the radio at the proper distance is important because RF exposures decrease with distance from the antenna. Antenna should be kept away from eyes.
- When worn on the body, always place the radio in a REDELL's approved clip, holder, holster, case, or body harness for this product. Using approved body-worn accessories is important because the use of REDELL's or other manufacturer's non-approved accessories may result in exposure levels, which exceed the FCC's occupational/controlled environment RF exposure limits.
- Use only manufacturer's name approved supplied or replacement antennas, batteries, and accessories. Use of non-manufacturer-name approved antennas, batteries, and accessories may exceed the FCC RF exposure guidelines.
- For a list of REDELL's approved accessories (see the user manual), or (The manufacturer should include the appropriate bracketed item(s) in the manual.)
- For a list of RDELL's approved accessories (see the user manual)