RETEVIS

RB20
Network Two Way Radio
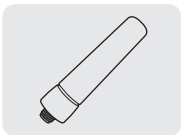USER'S MANUAL

CONTENTS

Open the box and check the device

Please remove the radio carefully from the box. We suggest you check the accessories thoroughly according to our list before discarding the packaging. If any part is missing or damaged when you receive it, please contact us.
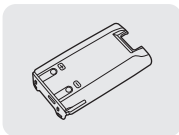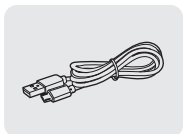
Supplied Accessories

Radio body	Antenna	battery

USB Cable	Belt clip and Screw

Preparation work
Warning:
● Do not over charge the battery.
  If the battery charge is not completed in normal time, please stop charging. The battery may flame, smoke or crack due to an abnormal charging process.

● Do not put the battery in a microwave or high pressure container.
  The battery may flame, smoke or crack.

● Do not expose a broken battery to a flame.
  If the battery is broken or has an abnormal odour, please remove the battery from the radio and keep it away from any flammable environments. The battery fluid is extremely flammable.

● Do not use abnormal batteries
  If the battery is abnormal in odour, colour, shape or in any other form, please remove it from the charger or radio and do not use.

● Please only use charger and adaptor
  The charger and adaptor has been designed to be used exclusively with the Radio.
  It ensures safety and reliability when charging the battery.

Installing And Uninstalling Of the Accessories

Installing the Lithium battery
Charge before use.
To reduce electrical emission in the battery, please remove the battery from the radio when not in use and store the battery in a cool dry place. When storing the battery for long periods of time:
Remove battery from the radio. If possible, fully charge the battery before storage.
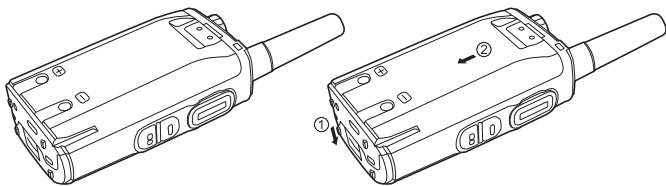
Attributes of Lithium battery

After repeated charging process, the battery capacity will decrease.

The battery degenerates gradually even without being used.

More time is required if charging the battery in cool conditions.

Charging and storage of the battery in relatively warm conditions will jeopardize its service life.

Please do not store the radio inside a vehicle or near heating equipment.

If the duration of the battery shortens significantly, please replace the battery immediately to prevent any fluid leaks.

Charging the Lithium battery

After the AC adaptor is connected and the battery is placed in the charger, the indicator will show red which means the battery is charging. The green light will indicate the battery is fully charged.

The light will turn off if the temperature is too high or low, the battery is damaged, the charger is damaged or the connection is poor.

Installing antenna

Hold the radio and antenna, turn the antenna clockwise until it is tightened.

Installing belt clip

If required, screw the belt clip onto the back of the radios using the two screw holes shown on the image below.
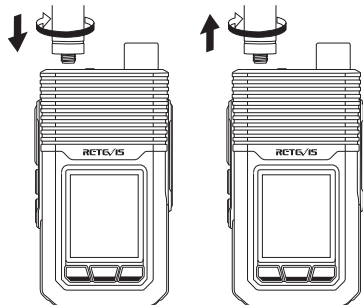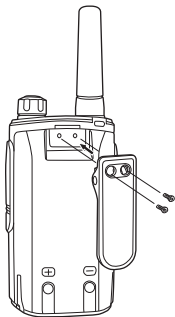
Installing SIM card

Please insert effective SIM card before use, make sure the SIM card can be effective in 4G/3G radio.

Long press volume button to switch off the radio. Remove the battery by pulling down the latch, then pushing the battery backwards along the guides.

Lift SIM socket cover, place SIM card in the socket in the correct position.

Replace the battery.
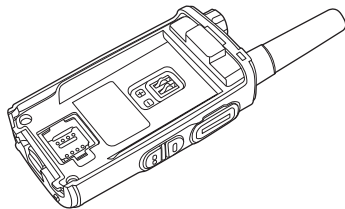
Installing headset

Open the cover on the side of the radio to show the headset sockets. Your headset will work immediately after being plugged in.
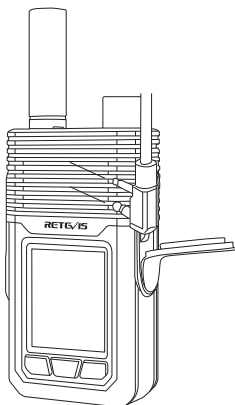
Getting to know the radio

Antenna

Indicator light
Red for emission, Green for
reception, flashing Green for
no signal

Speaker

Power ON/OFF switch,
Volume UP/DOWN

MIC

RETEVIS

1.77 inch diaplsy

Menu keypad

Left Keypad

Right Keypad

PTT Push to talk
press the button then
speak to the mic

Side key one
long press for Group
Select

Side key two
short press for Member
Select, long press to
active SOS function

Belt Clip

MIC/SP
MIC/SP Sock, plug in
speaker/ Microphone

Battery

Introduction
Volume selector/ON/OFF switch Long press volume button to switch ON/OFF the radio.
Clockwise for volume UP, counter clockwise for volume DOWN.

Push To Talk (PTT) button
When the device is standing by (Green light will flashing slowly), press PTT button to initiate a call (red light will go
on) During the call, the green light will go on to show successful reception. If not in reception, hold PTT to apply for
turn to talk (red light will go on) Release the PTT to end call and go back to standing by.
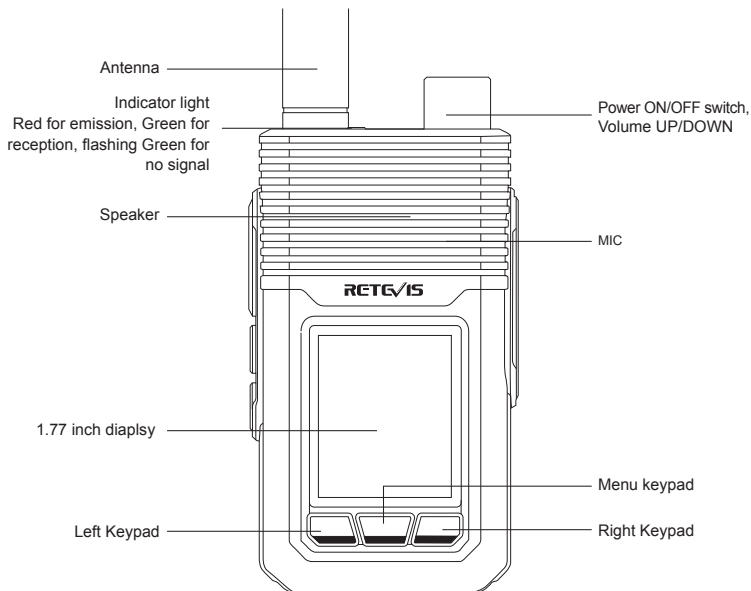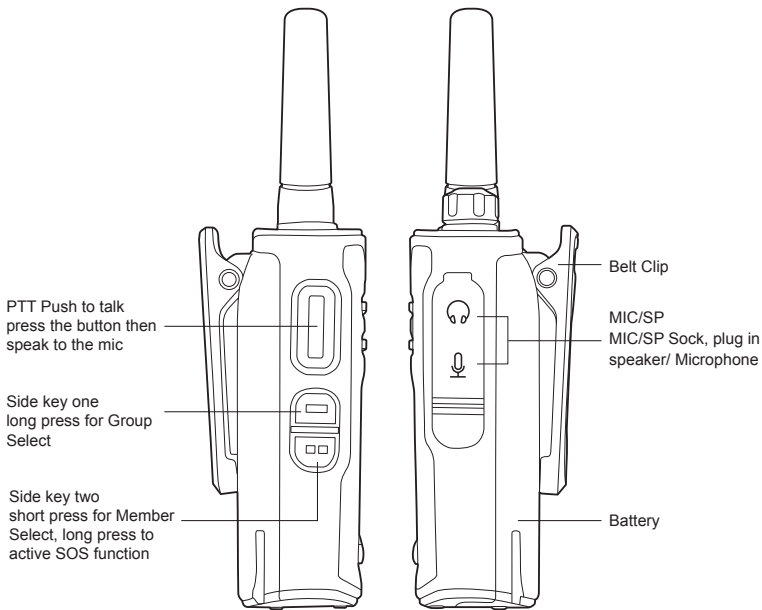
Indicator light status
The green light goes on after the device is switched on. The green light flashes fast to indicate network
searching. In standby mode, the green light flashes every five seconds. The green light remains on for reception,
and the red light remains on for transmission.

Basic use
●Switch ON
Long press volume button to switch ON the radio, there will then be a voice prompt. After the radio is successfully
switched on, the green light goes on first then flashes to indicate network searching. After the network is
connected, there will be a voice prompt.

●Switch OFF
Long press volume button to switch OFF the radio, the light will turn off.
Note: Do not frequently switch between ON and OFF, it may affect the switch function.

●Volume adjustment
Revolve clockwise for volume UP and counter clockwise for volume DOWN.

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●Headset

Plug in headset, press the PTT button on headset (if there is one) to initiate a call, release the button to end the call.

●Group/Member selection

Enter Menu and choose Group select/Member select, click right keypad to choose group/member you want to connect with, press Menu keypad to confirm and radio will come with a voice prompt.

Menu Instruction

When insert SIM and set the correct setting on the Platform:

turn on the radio, it will login in the platform automatically, with the voice: welcome to use 4G IP radio, if the account is added in the platform successfully, the radio will have the Voice with the Group and User's name.

Select the Group call

There are 2 methods to start the group call:

1. Long press side key one to enter group select on homepage.
2. Press Menu key to enter the menu-group select, use ▬ or ▬ to choose the desired group.

Select the single call

There are 2 method to start the single call:

1. Short press side key two, to enter the member menu, if there are members online, you can choose the desired one, please add members into your current group first if the group member list is empty.
2. Using the Menu key to enter the menu and press right keypad button to enter the member list, confirm to choose the desired member, if there is member online.Press the PTT key to start the single call, press back key to exit.

Select the friend

1. Add friend: login management paltform and edit account to add paltform friend.
2. Choose friend, enter Menu-Friend Select and then choose the friend you want to select. Press PTT to start single call and back to exit.

GPS

Checking GPS information: enter the menu, use ▬ ▬ key to GPS menu, confirm to check the latitude, longitude and satellite.

Note: GPS only working outside, if it is succeed open, the GPS icon will be white.

Setting

PTT Sound

OFF: When press PTT or release PTT, it will not have PTT sound

ON: when press PTT or release PTT, it will have PTT sound

OFF 2: Backlight: to choose 15s 20s 30s on

About: Version detail

Network: Auto: Suggested to choose this one.

         4G mode

         3G mode: if the 4G signal is not stable, please change to 3G.

         2G mode: For the B5 test only.

Version: POC version: Updated

       MCU version: updated

Factory: PASSWORD: checking with your local dealer

Simple troubleshooting

If your radio shows and of the following problems, please check the instructions below and if the problem still persists then contact us.

Poor reception: Possible reasons are signal in your current location is weak or the line is busy. If this happens, please move somewhere with improved signal or wait a while before attempting again.

Echo or noise: A possible reason is that the quality of the network provider is flawed. Please restart the radio, this will let it automatically search for an available network with better quality.

Less battery duration: Possible reasons are using and charging the battery in high temperature conditions or searching for a network constantly in a weak network area. If you are in an area with a weak signal, please temporarily switch OFF the radio.

Unable to connect to a network: Possible reasons are that the SIM card is not effective, poor signal or being out of the network service area. Please try either replacing the SIM card or move to a position that is more open, i.e. if you are in a building, move nearer the window.

User's Manual

Software Instruction
Platform Instruction
Smart PTT dispatch Management Platform

Software Instruction
IP address
American: 47.254.88.91 / Singapore: 47.74.211.230
1. Create account in programming software
(1) Press the side key 1 then turn on the radio, you will find the screen:

COM write chip

NAME:4027EE8
HOST:114.141.132.4
STATE:

(2) Choose the port:

Account writing types	
⦿ programming cable account writing	
○ on-the-air account writing	
MEID	server IP 114 .141 .132 . 4

Account writing management

dealer password	******	4. read the account from the radio, if the radio is blank account or need to
account ID	FIFA	change , please set it and write to radio. Note: Different country use different IP.
password	123456	Take American as example
IP address	47 . 254 . 88 . 91	

☐ New password setting

☑ Private call ☐ GPS on/off ☐ Off line beep

progress

| Help | Read | Write |

Communication port Language setup
port COM3 ▾ language English ▾
1. choose the correct com port

☐ Dealer password setup
old password
new password
Read   Write

☐ GPS on/off setup
⦿ GPS Off   ○ GPS On
Read   Write

☑ APN setup 2. set the APN, Take China net as example, please set as your provider
name CTNET   Read
account ID card
password card   Write
3. read the APN first,
☐ Change power-on screen then write
Select power-on screen file

password   Change

Port is off already!

(3) After finished set up, press write. Then you can see the radio name in the radio's screen.

Platform Instruction

4G LTE smart PTT management platform

Click: Platform website. Using the account and password to enter in, you will find the interface as below:

I: For second level admin, which can not add the device, can only creat the third admin or deal with the order issue.

II: for third level admin

61	Off Line	4GTest	2019FIFA	111111	30	1	2019	2018-07-17	2019-07-17		Show	Edit	Modify
60	Off Line	Betsy3	4GTest	111111	30	1	2019	2018-07-17	2019-07-17		Show	Edit	Modify
58	On line	Betsy 2	2018FIFA	123456	30	1	2019	2018-07-13	2019-07-13		Show	Edit	Modify
50	On line	Betsy	FIFA	123456	30	1	2019	2018-07-12	2019-07-12		Show	Edit	Modify
34	Off Line	456	0012491	111111	30	1	A01	2018-07-05	2019-07-05		Show	Edit	Modify
33	Off Line	123	0003383	111111	30	1	A01	2018-07-05	2019-07-05		Show	Edit	Modify

Name/Account [Search]

Total 7 records, PageNo 1/Total 1 pages

1. Add the admin, and set the Terminal Number

1.1 for third level admin, add the group first, as below

can add the previous device directly
if not add, just save the group

2. Add the device
   Note: Only third level admin can add the device, please kindly contact your upper admin for the Account. There are two method to add the device: add one by one and add in bulk. Add the device one by one:

Name	*Chinese allowed, while it must less than 8 character.
Account	The ID which show in the back of radio no more than 12 digits, For Bulk add, please modify the Account number.
Account number	default is 1, do not need change Not exceed 200!
First number	1 default is one , do not need change
Password	111111 if need change, please use the software
GPS Cycle	30 every 30 second to updated GPS information to platform
Level	1 Lowest level is 1, higher level, can have transmit priority
Validtime	2019-07-11 15:46:56 *Valid time is 1 year, if renew, please contact authorizer.
Remark	

User functions — Remote kill and call prohibition do not choose, every function will cost the data, please choose the function according to your requirment

Default group — choose the group and it will show in the left. click the group again, the default group will show the group ID

2.1 Add the device in bulk

add the device in bulk

ID	Statue	Username	Account	Password	GPS	Level	Default group	Created time	Valid time	Remark	Users Functions	Edit member list	Operations
32	OfLine	LTE	0014018	111111	30	1	TYT01	2018-07-05	2019-07-05		Show	Edit	Modify
31	OfLine	rick01	rick01	123456	30	1	TYT01	2018-07-04	2019-07-04		Show	Edit	Modify

Total 2 records,PageNo 1/Total 1 pages

3. Add the order

When the account number is not enough:

If the account quantity not enough support your radios quantity. You can add order then ask your upper level administrator to assign the account.Click "Order management", then click "Add order"

4. Main group and Sub - group

4.1 Nested groups definitions

Every group can be merged into a new group; it can also be merged into a new group separately; or be combined with other subgroups. However, new groups that are combined by sub-groups cannot be merged. The new group that merged by subgroups has all members of the subgroup.

Return the surplus account

When the quantity for account has exceed the radios, you can return the accounts to the upper level administrator.

click "Return the surplus account", then input the quantity you want to return

5. Renew the account

When your account want to expand the valid time, you need renew the validity period by this order.

you can search for the renewal device account or user name

Click "Renew the account

to select the device account to renew

After that, click "Save", and you will find this order in the "Order list"When the order type is "Return the surplus account, the previous administrator will approve this order automatic, so that the "order states" will shows "Admin approved" , this order is deal with.

When the order type is " Add account or renew the account" , you need wait the previous administrator to

Order No	Order type	Previous admin	Operation objects	Order states	Create time	Operations
5	Add account	Shane	Shane01	Waiting allocation admin to approve.	2018-07-13	Order-detail
4	Return the surplusaccount	Shane	Shane01	Admin approved.	2018-07-13	Order-detail

1.6 File data
You can change the password in this interface.

Notice: when you want to delete the device in the device list, you need, you need to ask the first-level administrator to delete.

Smart PTT dispatch Management Platform
Note: If the Dispatch management platform has registered, The radio will off-line, The same to the radio on and dispatch management off. we suggested that the Dispatch management account is different with PTT platform.

1. In the software, turn on the GPS function

1.1 The dispatcher should selects the function for "Check Location" in the platform, so that the dispatcher can get the other radios GPS information.

Users Functions ☐ Check all	☑Contact list ☑Check location ☑Record ☑Monitor ☐Remote kill ☑Group call ☐Call prohibition
	☑Single call ☑Group switch ☑Location ☑Voice record ☑To get the group member ☑The last group
	☑The terminals in private call cannot be called again by third party *All elected functions will consume the data, please open the functions needed.

1.2 The radio should selects the function for "Location" in the platform, and the radio should be outdoors to get the location. Also the programming software should be open the GPS

Users Functions ☐ Check all	☑Contact list ☑Check location ☑Record ☑Monitor ☐Remote kill ☑Group call ☐Call prohibition
	☑Single call ☑Group switch ☑Location ☑Voice record ☑To get the group member ☑The last group
	☑The terminals in private call cannot be called again by third party *All elected functions will consume the data, please open the functions needed.
Current group ID	11 *This project is added by clicking on the items in the selected group.

1.3 Set the IP address and GOOGLE/Baidu Map, and login in.

4G radio account writing tools (Version : 1.0.0.20)

Account writing types
  ● programming cable account writing
  ○ on-the-air account writing

MEID [   ]   server IP 114 .141 .132 . 4

Account writing management

dealer password ******

account ID   FIFA

password   123456

IP address   47 . 254 . 88 . 91

☐New password setting [   ]

☑Private call   ☑GPS on/off   ☐Off line beep

progress [   ]

Help   Read   Write

Port is off al

User's name is same as the software

user's name FIFA

password ●●●●●●

4G Tytpilot
Smart PTT Dispatch Management Platform

☑ save password   ☐ auto login

Login   Cancel

Setup

suggested Resolution 1920 X 1080

Read   Write

IP address 47 . 254 . 88 . 91
      Set the IP same as the software
Map Type: ☐ Google map outside China
      ☑ Google map in China
      ☐ Baidu map

Language: ☑ English
      ☐ Chinese

Modify   Cancel

2. Menu in the Dispatch management platform
2.1Group list
Group list is in the left of the Dispatch platform, which can show the group available and the member, click the group can show all the member and statue. Right click, can start the Private call/Get location/Get track.

Note: The "P" means that the radio is in this group. When the radio is in the group same as dispatcher, it can receive a group call from dispatcher and transmit a group call to dispatcher.
Notice: the dispatcher will login the default group, if you want to login other group, you need modify the default group.

ID	Statue	Username	Account	Password	GPS	Level	Default group	Created time	Valid time	Remark	Users Functions	Edit member list	Operations
57	On line				30	1		2018-07-13	2019-07-13		Show	Edit	Modify

2.2 Temporary Group call
This is in the right side of the Menu, which can show the all users which the dispatcher choose, can start the temporary call.
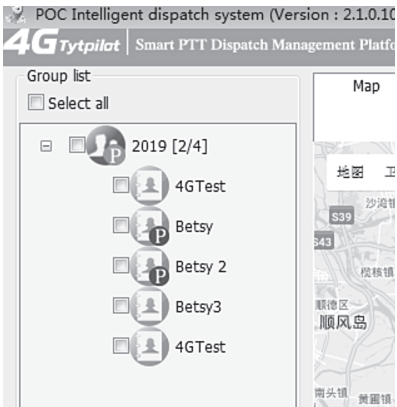
2.3 Group call
To start the group call In the group call, choose the
desired group and click twice to enter the group.

Long press the to start the group call
After you choose the private call, Press "PttDown" and
you can transmit the radio, and release
the "PttDown" to wait for replying. The radio can press
"PTT" to reply.
Notice: the continuous transmission maximum time is
50S, when you over 50S, it will exits transmit
automatic.

To start the Temporary call
In the Group list, choose the desired member, right
click the member, choose the Private call.

Click to cancel temporary group call If it is no one
start talking within 10s, The temporary will exit
automatically.
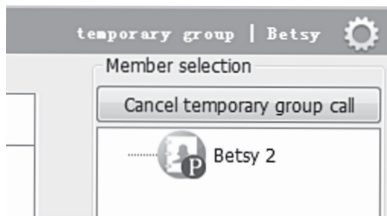
2.4 To start the private call
Private call, when the dispatcher choose this function, it can transmit anyone in private call.
Operation:
click one radio you want to speak to, then right click, you can find three options: Private call/Get location/Get
track

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2.5 Location in the MAP

Function	Instruction
•—• ┊ ┊ •—•	🖑 ◯ ◼ Terminal Box selected, use the Rectangular Box or round box to choose the desired area
▷	Track replay
⊙	Terminal Location
+	Map Zoom-in
-	Map Zoom-out

Note: The GPS function only wo rk outside, in the common case, it will open within 1 minutes, he weather will affected.
If the GPS is succeed get the location, the GPS icon will be black, if not it will be red Icon.

2.6 Get track:
you can check the radio's activity trajectory within a period of time.
Operation:
1) Click one radio you want to speak to, then right click, you can find three options: Private call/Get location/Get track
2) After you choose the get location, you can see the radio's trajectory on the map. You can also click the ▷ to get track
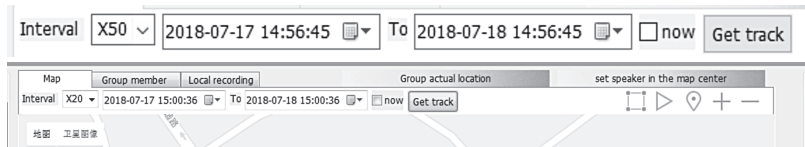
3. Interval: 5/10/20/50S
It means the radio will uploads the GPS information in the chosen time.

4. The activity trajectory records will be saved one month, and every time you can track the activity trajectory within 24 hours, for example, when the start time is 2018-7-18 14: 56: 45, the end time should be within 2018-07-18 14: 56: 46 to 2018-07-19 14: 56: 44

Interval X50 ∨ 2018-07-17 14:56:45 ▦▾ To 2018-07-18 14:56:45 ▦▾ ☐ now Get track

| Map | Group member | Local recording | Group actual location | set speaker in the map center |
Interval X20 ▾ 2018-07-17 15:00:36 ▦▾ To 2018-07-18 15:00:36 ▦▾ ☐now Get track   ⊓⊔ ▷ ⊙ + —
地图 卫星图像

System Specification	
Operating System	Linux
Language	English
Antenna	All networks external antenna, GPS antenna built-in
Display size	1.77Inch SPI color screen, resolution: 128*160
CPU	Quectel
Battery capacity	4000mAh
Rx Sensibility:	-106dbm
Max Tx Power	23dBm-25dBm@all up bits
Working Temperature	-20---+60°C
Storage Temperature	-20---+60°C
Audio output power	2W@10% distortion

European version		
LTE FDD B1	TX:1920-1980MHz	RX:2110-2170MHz
LTE FDD B3	TX:1710-1785MHz	RX:1805-1880MHz
LTE FDD B7	TX:2500-2570MHz	RX:2620-2690MHz
LTE FDD B8	TX:880-915MHz	RX:925-960MHz
LTE FDD B20	TX:832-862MHz	RX:791-821MHz
LTE FDD B28	TX:703-748MHz	RX:758-803MHz
LTE TDD B38	TX:2570-2620MHz	RX:2570-2620MHz
LTE TDD B40	TX:2300-2400MHz	RX:2300-2400MHz
LTE TDD B41	TX:2555-2655MHz	RX:2555-26555MHz
WCDMA B1	TX:1920-1980MHz	RX:2110-2170MHz
WCDMA 88	TX:880-915MHz	RX:925-960MHz
GSM	900MHz	1800MHz

American version		
LTE TDD B2	TX:1850-1910MHz	RX:1930-1990MHz
LTE TDD B4	TX:1710-1755MHz	RX:2110-2155MHz
LTE TDD B5	TX:824-849MHz	RX:869-894MHz
LTE TDD B12	TX:699-7160MHz	RX:729-746MHz
LTE TDD B13	TX:777-787MHz	RX:746-756MHz
LTE TDD B14	TX:788-798MHz	RX:758-768MHz
LTE TDD B66	TX:1710-1780MHz	RX:2100-2200MHz
LTE TDD B71	TX:663-698MHz	RX:617-652MHz
WCDMA 82	TX:1850-1910MHz	RX:1930-1990MHz
WCDMA B4	TX:1710-1755MHz	RX:2110-2155MHz
WCDMA 85	TX:824-849MHz	RX:869-894MHz

RF ENERGY EXPOSURE AND PRODUCT SAFETY GUIDE FOR PORTABLE TWO-WAY RADIOS

Before using this radio, read this guide which contains important operating instructions for safe usage and RF energy awareness and control for compliance with applicable standards and regulations

This two-way radio uses electromagnetic energy in the radio frequency (RF) spectrum to provide communications between two or more users over a distance. RF energy, which when used improperly, can cause biological damage. All Retevis two-way radios are designed, manufactured, and tested to ensure they meet government-established RF exposure levels. In addition, manufacturers also recommend specific operating instructions to users of two-way radios. These instructions are important because they inform users about RF energy exposure and provide simple procedures on how to control it.
Please refer to the following websites for more information on what RF energy exposure is and how to control your exposure to assure compliance with established RF exposure limits:http://www.who.int/en/

Local Government Regulations
When two-way radios are used as a consequence of employment, the Local Government Regulations requires users to be fully aware of and able to control their exposure to meet occupational requirements. Exposure awareness can be facilitated by the use of a product label directing users to specific user awareness information. Your Retevis two-way radio has a RF Exposure Product Label. Also, your Retevis user manual, or separate safety booklet includes information and operating instructions required to control your RF exposure and to satisfy compliance requirements.

Radio License
Governments keep the radios in classification, business two-way radios operate on radio frequencies that are regulated by the local radio management departments (FCC, ISED, OFCOM, ANFR, BFTK, Bundesnetzagentur...).- To transmit on these frequencies, you are required to have a license issued by them. The detailed classification and the use of your two radios, please contact the local government radio management departments.
Use of this radio outside the country where it was intended to be distributed is subject to government regulations and may be prohibited.

Unauthorized modification and adjustment
Changes or modifications not expressly approved by the party responsible for compliance may void the user's authority granted by the local government radio management departments to operate this radio and should not be made. To comply with the corresponding requirements, transmitter adjustments should be made only by or under the supervision of a person certified as technically qualified to perform transmitter maintenance and repairs in the private land mobile and fixed services as certified by an organization representative of the user of those services. Replacement of any transmitter component (crystal, semiconductor, etc.) not authorized by the local government radio management departments equipment authorization for this radio could violate the rules.

FCC Requirements:

This device complies with part 15 of the FCC Rules. Operation is subject to the condition that this device does not cause harmful interference. (Licensed radios are applicable);

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (Other devices are applicable)

(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:

•(If applicable)This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at his own expense.

•(If applicable)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.

CE Requirements:

•(Simple EU declaration of conformity) Shenzhen Retevis Technology Co., Ltd. declares that the radio equipment type is in compliance with the essential requirements and other relevant provisions of RED Directive 2014/53/EU and the ROHS Directive 2011/65/EU and the WEEE Directive 2012/19/EU; the full text of the EU declaration of conformity is available at the following internet address: www.retevis.com.

•Restriction Information

This product can be used in EU countries and regions, including: Belgium (BE), Bulgaria (BG), Czech Republic (CZ), Denmark (DK), Germany (DE), Estonia (EE), Ireland (IE), Greece (EL), Spain (ES), France (FR), Croatia (HR), Italy (IT), Cyprus (CY), Latvia (LV), Lithuania (LT), Luxembourg (LU), Hungary (HU), Malta (MT), Netherlands (NL), Austria (AT), Poland (PL), Portugal (PT), Romania (RO), Slovenia (SI), Slovakia (SK), Finland (FI), Sweden (SE) and United Kingdom (UK).

For the warning information of the frequency restriction, please refer to the package or manual section.

•Disposal

The crossed-out wheeled-bin symbol on your product, literature, or packaging reminds you that in the European Union, all electrical and electronic products, batteries, and accumulators

(rechargeable batteries) must be taken to designated collection locations at the end of their working life. Do not dispose of these products as unsorted municipal waste. Dispose of them according to the laws in your area.

IC Requirements:

Licence-exempt radio apparatus

This device contains licence-exempt transmitter(s)/receiver(s) that comply with Innovation, Science and Economic Development Canada's licence-exempt RSS(s). Operation is subject to the following two conditions:

(1) This device may not cause interference.

(2) This device must accept any interference, including interference that may cause undesired operation of the device.

Le présent appareil est conforme aux CNR d'Industrie Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes :

(1) l'appareil ne doit pas produire de brouillage;

(2) l'utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

RF Exposure Information(if applicable)

•DO NOT operate the radio without a proper antenna attached, as this may damage the radio and may also cause you to exceed RF exposure limits. A proper antenna is the antenna supplied with this radio by the manufacturer or an antenna specifically authorized by the manufacturer for use with this radio, and the antenna gain shall not exceed the specified gain by the manufacturer declared.

•DO NOT transmit for more than 50% of total radio use time, more than 50% of the time can cause RF exposure compliance requirements to be exceeded.

•During transmissions, your radio generates RF energy that can possibly cause interference with other devices or systems. To avoid such interference, turn off the radio in areas where signs are posted to do so.

•DO NOT operate the transmitter in areas that are sensitive to electromagnetic radiation such as hospitals, aircraft, and blasting sites.

•Portable Device, this transmitter may operate with the antenna(s) documented in this filing in Push-to-Talk and body-worn configurations. RF exposure compliance is limited to the specific belt-clip and accessory configurations as documented in this filing and the separation distance between user and the device or its antenna shall be at least 2.5 cm.

•Mobile Device, during operation, the separation distance between user and the antenna subjects to actual regulations, this separation distance will ensure that there is sufficient distance from a properly installed externally-mounted antenna to satisfy the RF exposure requirements.

•Occupational/Controlled Radio, this radio is designed for and classified as "Occupational/Controlled Use Only", meaning it must be used only during the course of employment by individuals aware of the hazards, and the ways to minimize such hazards; NOT intended for use in a General population/uncontrolled environment.

•General population/uncontrolled Radio, this radio is designed for and classified as "General population/uncontrolled Use".

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:

•User awareness instructions should accompany the device when transferred to other users.

•Do not use this device if the operational requirements described herein are not met.

Operating Instructions (if applicable):

•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 (listen), release the PTT button. Transmitting 50% of the time, or less, is important because the radio generates measurable RF energy exposure only when transmitting in terms of measuring for standards compliance.

•Transmit only when people outside the vehicle are at least the recommended minimum lateral distance away from a properly installed according to installation instructions, externally mounted antenna.

•When operating in front of the face, worn on the body, always place the radio in a Retevis approved clip, holder, holster, case, or body harness for this product. Using approved body-worn accessories is important because the use of Non-Retevis approved accessories may result in exposure levels, which exceed the IEEE/ICNIRP RF exposure limits.

Hand-held Mode(if applicable)

• Hold the radio in a vertical position with the microphone (and other parts of the radio including the antenna) at least 2.5 cm (one inch) away from the nose or lips. The antenna should be kept away from the eyes. Keeping the radio at a proper distance is important as RF exposure decreases with increasing distance from the antenna.

Phone Mode(if applicable)

•When placing or receiving a phone call, hold your radio product as you would a wireless telephone. Speak directly into the microphone.

Electromagnetic Interference/Compatibility

NOTE: Nearly every electronic device is susceptible to electromagnetic interference (EMI) if inadequately shielded, designed, or otherwise configured for electromagnetic compatibility.

Avoid Choking Hazard

Small Parts. Not for children under 3 years.

Turn off your radio power in the following

•Turn off your radio before removing (installing) a battery or accessory or when
•Turn off your radio when you are in a potentially hazardous environments: Near electrical blasting caps, in a blasting area, in explosive atmospheres (inflammable gas, dust particles, metallic powders, grain powders, etc.).
•Turn off your radio while taking on fuel or while parked at gasoline service stations.To avoid electromagnetic interference and/or compatibility conflicts
•Turn off your radio in any facility where posted notices instruct you to do so, hospitals or health care facilities (Pacemakers, Hearing Aids and Other Medical Devices) may be using equipment that is sensitive to external RF energy.
•Turn off your radio when on board an aircraft. Any use of a radio must be in accordance with applicable regulations per airline crew instructions.

Protect your hearing:

• Use the lowest volume necessary to do your job.
• Turn up the volume only if you are in noisy surroundings.
• Turn down the volume before adding headset or earpiece.
• Limit the amount of time you use headsets or earpieces at high volume.
• When using the radio without a headset or earpiece, do not place the radio's speaker directly against your ear
• Use careful with the earphone maybe possible excessive sound pressure from earphones and headphones can cause hearing loss
Note: Exposure to loud noises from any source for extended periods of time may temporarily or permanently affect your hearing. The louder the radio's volume, the less time is required before
•your hearing could be affected. Hearing damage from loud noise is sometimes undetectable at first and can have a cumulative effect.

Avoid Burns

Antennas
•Do not use any portable radio that has a damaged antenna. If a damaged antenna comes into contact with the skin when the radio is in use, a minor burn can result.
Batteries (If appropriate)
•When the conductive material such as jewelry, keys or chains touch exposed terminals of the batteries, may complete an electrical circuit (short circuit the battery) and become hot to cause bodily injury such as burns. Exercise care in handling any battery, particularly when placing it inside a pocket, purse or other container with metal objects
Long transmission
•When the transceiver is used for long transmissions,
the radiator and chassis will become hot. charging battery.

Safety Operation

Forbid
•Do not use charger outdoors or in moist environments, use only in dry locations/conditions.
•Do not disassemble the charger, that may result in risk of electrical shock or fire.
•Do not operate the charger if it has been

broken or damaged in any way.

•Do not place a portable radio in the area over

an air bag or in the air bag deployment area. The radio may be propelled with great force and cause serious injury to occupants of the vehicle when the air bag inflates.

To reduce risk

•Pull by the plug rather than the cord when disconnecting the charger.

•Unplug the charger from the AC outlet before attempting any maintenance or cleaning.

•Contact Retevis for assistance regarding repairs and service.

•The adapter shall be installed near the equipment and shall be easily accessible

Approved Accessories

⚠ **WARNING**

•This radio meets the RF exposure guidelines when used with the Retevis accessories supplied or designated for the product. Use of other accessories may not ensure compliance with the RF exposure guidelines and may violate regulations.

•For a list of Retevis-approved accessories for your radio model, visit the following website: http://www.Retevis.com

For downloading further resources: Brochures, Software/Firmware, Manual etc, Pls contact your direct reseller first OR go to website retevis.com and check "support" in the each product link to download it.

RETEVIS

Guarantee

Model Number: —————— Serial Number: ——————

Purchasing Date: ———————————————————

Dealer: ———————————— Telephone: ——————

User's: ———————————— Telephone: ——————

Country:———————————— Address: ——————

Post Code:———————————— Email: ————————

Remarks:

1.This guarantee card should be kept by the user, no replacement if lost.

2.Most new products carry a two-year manufacturer's warranty from the date of purchase. Further details, pls read http://www.retevis.com/after-sale/

3.The user can get warranty and after-sales service as below:

● Contact the seller where you buy.

● Products Repaired by Our Local Repair Center

4.For warranty service, you will need to provide a receipt proof of purchase from the actual seller for verification

Exclusions from Warranty Coverage:

1.To any product damaged by accident.

2.In the event of misuse or abuse of the product or as a result of unauthorized alterations or repairs.

3.If the serial number has been altered, defaced, or removed.
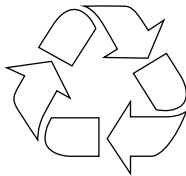
CE FC RoHS

Shenzhen Retevis Technology Co.,Ltd.

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E-mail: kam@retevis.com
Facebook: facebook.com/retevis

MADE IN CHINA

说明书要求

尺寸：120*160mm

印刷：
1、黑白印刷
3、内页黑白印刷

装订：钉装

纸张材质：
1、普通印刷纸

Sh

本页无需印刷