





Mini size Easy to operate Slim fashion

Easy to carry

BAOFENG



**USER'S MANUAL** 

Fujian Baofeng Electronic Co.,Ltd. www.baofengradio.com

# Fujian Baofeng Electronic Co.,Ltd.

**BAOFENG** 

Copyright © 2016 by Fujian Baofeng Electronics Co., limited

All rights reserved. No part of this publication may be reproduced, distributed, or transmitted in any form or by any means, including photocopying, recording, or other electronic or mechanical methods, without the prior written permission of the publisher. For permission requests, write to the publisher.

THANK YOU FOR YOUR PURCHASE OF OUR MINI VEHICLE TWO-WAY
TRANSCEIVER.
THIS TRANSCEIVER IS DEVELOPED BY BAOFENG FOR THE INTEREST

OF THE CAR CLUB AND
THE HAM. COMPLETE SET MUST INCLUDE THE BASE AND THE
EXTENSION.IT WILL DELIVER TO YOU SECURE INSTANT RELIABLE
COMMUNICATION.

PLEASE READ THIS MANUAL CAREFULLY BEFORE USE.

# Table of contents

FUNCTIONS AND FEATURES Getting started	01
Getting started	02
	02
Unpacking and Inspecting	<u>0</u> 3
What's in the Box	03
ASSETTIBLY Battery.	04
Charging and battery maintenance	05
Charging Battery maintenance	05
Belt clip	06
Earpiece	06
Getting to know your radio	08
The main display	09
Status LED	10
Getting to know your radio  The main display  Status LED  SOS button	10
Keypad Zone	10 10 10
Keypad Zone	10 10 10 10
Keypad Zone Menu Up and down key FM (Broadcast FM and Alarm)	10 10 10 10 11 11
Keypad Zone	10 10 10 10 11 11 11 12
Keypad Zone	10 10 10 11 11 11 12 12
Keypad Zone	10 10 10 10 11 11 11 12 12 12 12
Keypad Zone Menu Up and down key FM (Broadcast FM and Alarm) MONI/VOL Lamp/scan Combination key functions Resets the radio to factory defaults  Basic Use	10 10 11 11 12 12 12 12 13
Keypad Zone	10 10 10 10 11 11 12 12 12 13 13

Adjusting the volume ······	13
Adjusting the volume	14
Making a call	14
Working the menu system	15
Basic uše	15
Scanning	16
Scanning modes	16
Time operation	17
Carrier operation	17
Search operation	17
Countdown timer	17
Selective calling	18
	19
1750Hz Tone-burst	19
Repeaters	19
Programming	20
Computer programming	21
Appendix.A	22
Troubleshooting	22
Amandia	22
Appendix.B.	23
Menu definitions	- 23
Appendix,C	26
	20
	26
Transmitter ·····	27
Receiver	28
110001101	
CTCSS Table (50)	29
DCS Table (210)	30
DCS Table (210)	90

# FUNCTIONS AND FEATURES

- Broadcast FM radio receiver(65-108MHz)
- Alarm and built-in LED flashlight
- Max 22 channels
- •Time count down (0.5hr/1hr/.../8hrs)
- Voice prompt
- VOX(voice activated transmission)
- •50 CTCSS tone/104 DCS code/nonstandard tone available
- Tail tone elimination
- Battery saving
- Width/Narrow band selection
- SOS call notice.

# Getting started

#### BEFORE PROCEEDING INSURE:

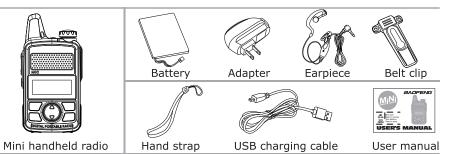
- Qualified technicians shall service this equipment only. Do not modify the radio for any reason.
- •Use only BAOFENG supplied or approved accessories.
- •Turn off your radio prior to entering any area with explosive and flammable materials. Do NOT USE your transceiver at a gas/fuel station
- Do not expose the radio to direct sunlight over a long time, nor place it close to a heating source.
- •To avoid electromagnetic interference or compatibility conflicts, turn off your radio in any area where posted notices instruct you to do so.
- Do not transmit for long periods of time, as it may overheat the transceiver.
- Keep the unit away from dusty, damp and wet environments.

## Fujian Baofeng Electronic Co.,Ltd.

# Unpacking and Inspecting

- Please check the packaging of your radio for any signs of damage.
- Carefully open the box, and confirm your received the items listed below.
- If you find the radio or the included accessories are damaged or lost, immediately contact your dealer.

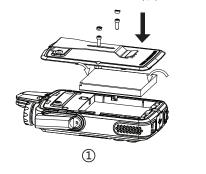
## What's in the Box

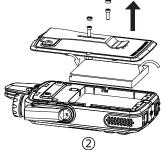


# Assembly

## Battery

Open the battery cover with the screwdriver, then join the electric lead in to the socket of battery, you will hear the voice 'welcome', and report the channel number. Align the electric lead into the slot and place the battery smoothly and screw the cover. If you want to remove the battery, please do as the above steps.





# Charging and battery maintenance

## Charging

Battery should be fully charged before initial use. Optimum battery efficiency will be achieved after the three full battery charge and discharge cycles.

When the battery level indicator reads  $\ \ \ \ \$ , the battery is depleted. At this point the radio will start beeping periodically, that means you should charge your radio.

- 1. Connect the charging USB cable with the AC adapter and the socket of the radio.
- 2. Plug the AC connector of the power adapter into a main AC wall outlet.
- 3. When the battery level indicator reads \_\_\_\_, the charge is starting.
- 4. When the battery level indicator reads ..., the charge finishes. Pull out the USB charging cable.



Radio should be turned off during charge cycle.

### **Battery maintenance**

The battery for your radio is not fully charged from the factory, so please let it charge for at least three to five hours before you start using your radio.



Use only batteries approved by the original manufacturer.

Never attempt to disassemble the battery pack.

Do not expose the battery to fire or intense heat.

Dispose of batteries in accordance with the local recycling regulations.

# Belt clip

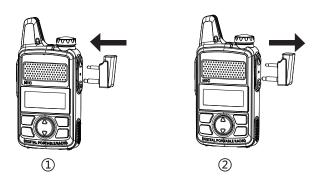
At the back of the radio there are two parallel screws mounted, remove these and thread them through the holes on the belt clip as you screw them back into the radio body.



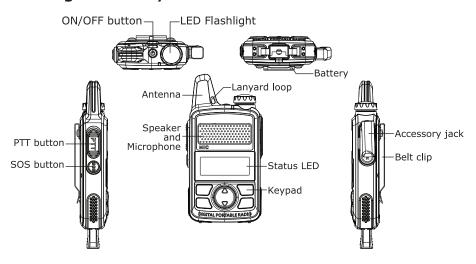


# Earpiece

Open the cover of the earpiece jack, align the connector and push fully in.

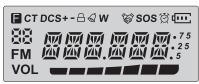


# Getting to know your radio



# The main display

The transceiver is fitted with a seven character segment code alphanumeric LCD, with auxiliary icons for miscellaneous features.



Icon	Description	Icon	Description
	Menu 9. Repeater function setting	Ø	Time countdown setting
88	Memory channel	W	Wideband enabled
СТ	CTCSS enabled	А	Keypad locked enabled
DCS	DCS enabled	<b>(</b> )	Battery level indicator
FM	Broadcast FM	<b>\$67</b>	The extension synchronizes the base
sos	Emergency call, pressing SOS button		Volume indicator

#### Status LED

The status LED has a very simple and traditional design. When you receive a signal it turns green, when you transmit it turns red, and it's off in standby.

### SOS button

20 group channels only could be entered via software. And also you could have an extra one for group call or emergency call. While you press this button, all others will receive your call.

# **Keypad Zone**



## Menu [ MENU ]

The menu key, used to enter the menu and confirm menu options, also lock the keypad. Press and hold MENU to lock out all the keys except for three buttons (ON/OFF, SOS,PTT).

# Up and down key [ (1) ]

The arrow keys are used to navigate through the menu as well as select channels, and volume up and down.

## FM (Broadcast FM and Alarm) [ 🕞 ]

Press FM momentarily to start the broadcast FM receiver. Another momentary press turns the broadcast FM receiver off. If a signal is received on the active channel while you are listening to the broadcast FM, the receiver will open squelch to that frequency (as if scanning) and remain there until the signal goes away. It will then switch back to broadcast FM.

Press and hold FM to activate the alarm function. Press FM (a short press) again to turn it off.



The broadcast FM band could be set via software. To search the radio station quickly, press the MENU key.

# MONI/VOL [ / 👾 ]

Press it momentarily, the volume indicator will appear, then press arrow keys to volume up or down.

Press and hold MONI/VOL to monitor the signal. This will open up the squelch so you can listen to the unfiltered signal.

# Lamp/scan [ 📆 ]

Press it momentarily to turn on the LED flashlight. Another momentary press will flash the LED. Another momentary press turns the flashlight off. Press and hold it to enable the scanner. Another momentary press to exit the scanning.

# Combination key functions

### High and low output power switching

Press and hold the ON/OFF+LAMP about two seconds to switch on the radio, you can select the high or low output power. If the voice prompt is enabled, the voice will announce "one" or "five".

### Resets the radio to factory defaults

Press and hold the ON/OFF+MONI/VOL to switch on the radio, all settings are reset to factory defaults. Factory default setting as: 400.025MHz, no CTCSS/DCS, low output power, battery save, volume level 5, width band, SQL 5, key tone ON, other settings off.

# Basic Use

### Power and volume

## Turning the unit on

To turn the unit on, simply press the On/Off button until you hear a "click". If your radio powers on correctly there should be an audible beep after about second and the display will show a message or flash the LCD depending on settings for about second. Then it will display a channel. If the voice prompt is enabled, the voice will announce "welcome to use".

### Turning the unit off

Press and hold the ON/OFF button, turn the unit off.

#### Adjusting the volume

Press the MONI/VOL momentarily, the volume indicator will appear, then press the UP key to turn the volume up; press the down key to turn the volume down. Press MONI/VOL to confirm the volume level you set.

## Making a call

Press and hold the PTT button on the side of the radio body to transmit. While transmitting speak approximately 3-5cm from the microphone. When you release the PTT, your radio will go back to receive mode.

# Working the menu system

For a complete reference on available menu items and parameters, see Appendix, Menu definitions.

#### Basic use

Using the menu with arrow keys

- 1. Press the MENU key to enter the menu.
- 2. Using the arrow key to navigate between menu items.
- 3. Once you find the desired menu items, press menu again to select that menu item.
- 4. Use the arrow keys to select the desired parameter.
- 5. When you have selected the parameter you want to set for a given menu item;
  - **a.**To confirm your selection, press menu and it will save your setting and bring you back to the main menu.
  - **b.**To cancel your changes, press SOS or PTT button and it will reset the menu item and bring you out of the menu entirely.
- 6. To exit out of the menu at any time, press SOS or PTT button.

### Scanning

The radio features a built in scanner for the bands. It will scan your channels. To enable the scanner, press and hold LAMP key for about two seconds. Press LAMP key momentarily to stop the scanning mode.

#### Scanning modes

The scanner is configurable to one of three ways of operation: Time, carrier or search, each of which is explained in further details in their respective section below. Setting scanner mode

- 1. Press menu key to enter the menu.
- 2. Using arrow keys to navigate between the menu items until you come to the scanner mode.
- 3. Press Menu key to select.
- 4. Using arrow keys to select the scanning mode.
- 5. Press Menu key to save and confirm.
- 6. Press SOS or PTT button to exit the menu.