Walkie Talkie

M-900 User Guide

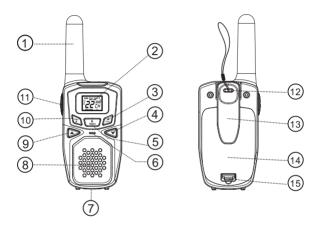








Read this operating instruction carefully before using your two way radio, including the part on Product Safety and Important Notice.



- 1. Antenna
- 2. Backlit LCD Display
- 3. NOAA/Scan Button
- 4. Down Button
- 5. Menu/Power Button
- 6. Microphone
- 7. External Speaker/ Microphone/Charge Jack
- 8. Speaker
- 9. Up Button
- 10.Call/Lock Button
- 11. PTT(Pull to talk) Button

- 12. Wrist Strap Connection
- 13. Belt Clip
- 14. Battery Compartment
- 15. Battery Door Latch

Features

22 Channels

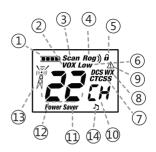
• 10 Channel NOAA All Hazards Radio

- Weather Alert
- 121 Privacy Codes (38 CTCSS codes/83 DCS codes)
- Hands-Free Operation (VOX)
- Scan Channels,privacy codes
- · Backlit LCD Display
- Call Alert

Ten selectable tones

- Button Lock
- Speaker/Microphone/ Jack/Charge Jack
- Roger Beep Selectable On/Off
- Battery/Power Saver
- Keystroke Tones
- · Battery Level Indicator
- · Low Battery Audible Alert
- Auto Squelch
- · Belt Clip

Backlit LCD Display



- 1. Battery Level Indicator
- 2. VOX Icon
- 3. Scan Icon
- 4. Roger Beep Icon
- 5. Lock Icon
- 6 Low Power Icon
- 7. DCS/CTCSS Icons
- 8 Weather Icon
- Weather Icon
 Weather Alert Icon
- 10. DCS/CTCSS Privacy
 Code Numbers
- 11 Power Saver Icon
- 12. Channel Numbers
- 13. Receive/Transmit Icon
- 14. Key Tone Icon



Maximum range may vary and is based on unobstructed line-of-sight communication under ideal conditions.

Product Features

Channel	Frequency(MHz)	Channel	Frequency(MHz)
1	462.5625	12	467.6625
2	462.5875	13	467.6875
3	462.6125	14	467.7125
4	462.6375	15	462.5500
5	462.6625	16	462.5750
6	462.6875	17	462.6000
7	462.7125	18	462.6250
8	467.5625	19	462.6500
9	467.5875	20	462.6750
10	467.6125	21	462.7000
11	467.6375	22	462.7250

Installing Batteries

To install or replace batteries:

- 1. Remove the belt clip by pulling the tab and sliding it up.
- 2. Pull the battery door lock tab up to release the battery cover. Insert 3 "AA" batteries.
- 3.Put the battery cover back into place. Snap the lock tab and belt clip back into place.



- 1.Do not mix old and new batteries
- 2.Do not mix alkaline, standard (carbon-zinc) or rechargeable (nickel-cadmium) batteries.





Quick Start

- 1. Press and hold the Menu/Power button to turn on your radio.
- Press the Menu, Press the Up or Down button to select a channel.



Both radios must be tuned to the same channel/privacy code to communicate.

- 3. Press and hold the PTT button while speaking into the microphone.
- 4. When finished talking, release the PTT button and listen for a response.

Turning on Your Radio



Press and hold the Menu/Power button until you hear a series of audible tones indicating the radio is on. Your radio is now in Standby mode, ready to receive transmissions. The radio is always in Standby mode except when the PTT, Call or Menu/Power buttons are pressed.

Battery Low



When battery power is low, the final bar in the Battery Low icon will blink and an audible tone will sound twice before the radio shuts off. Your batteries should be replaced or recharged, if using rechargeable batteries.



The radio will display flashing battery icon while charging.

 $\underline{\textbf{For charging radios}} \ (\textbf{Adpater/Batteries:Just for batteries and adpater packaging option})$

1.To charge a single radio, simply insert the connector directly into the charge jack located on the bottom of the radio. The radio will display flashing battery icon while charging. Recommends your radio be turned off while being charged.

Auto Battery Save

If there are no transmissions within 3 seconds, the radio will automatically switch to Battery Save mode and the Power Saver icon will displayed. This will not affect the radio's ability to receive incoming transmissions.

Communicating with Another Person



- 1. Press and hold the PTT button.
- 2. With the microphone about two inches (2.5-5 cm) from your mouth, speak in a normal voice.
- 3. Release the PTT button when you are finished talking and listen for a response.

You cannot receive incoming calls while pressing the PTT button

Both radios must be tuned to the same channel/privacy code to communicate.

To Select a Channel



With the radio on, select any of the 22 channels by pressing Menu and the Up or Down button. Both radios must be tuned to the same channel to communicate.



Listening for a Response



Release the PTT button to receive incoming transmissions. Your radio is always in Standby mode while the PTT or Call buttons are not pressed.

To Adjust Volume



Press the Up or Down button at the standby mode. A double beep sound is used to indicate the minimum and maximum volume levels (1 through 8).



Call Button



Press and release the Call button.

The other person will hear a two second call tone. This tone is used only to establish voice

communications. See page 8 on how to select between ten call tone settings.

Lock Function



The Lock function locks the Up, Down, Scan and Menu/Power buttons to prevent accidental operation. To turn the lock on or off:

– Press and hold the Call/Lock button for two seconds.



A double beep sound is used to confirm your lock on or off request. When in Lock mode, the Lock icon will be displayed.

Scrolling Through the Menu Function

By scrolling through the MENU function, you will be able to select or turn on preferred features of your radio. When scrolling through the Menu function, your radio features will be displayed in the same predetermined order:



Set channels
Set CTCSS Privacy Codes
Set DCS Privacy Codes
Set Vox On/Off
Set Vox Sensitivity
Set Call Tones 1-10
Set Roger Beep On/Off
Set Key Tones On/Off

Privacy Codes

Your radio incorporates two advanced coded squelch systems that can help to reduce interference from other users on any given channel. CTCSS (Continuous Tone Coded Squelch System) provides 38 privacy codes and DCS (Digitally Coded Squelch) provides 83 privacy codes. This provides a total of 121 Privacy Codes. Either system can be used on all channels, but both systems cannot be used on the same channel at the same time.

To successfully communicate using a privacy code, both the sending and receiving radios must be tuned to the same channel and to the same privacy code system (CTCSS or DCS) and privacy code number. Each channel will remember the last privacy code system and number you select.

The privacy code 00 is not a privacy code, but allows all signals to be heard on a channel that is set to 00 on both the CTCSS and DCS systems.

Set CTCSS Privacy Codes



To select a CTCSS privacy code:

 After selecting a channel, press the Menu/Power button until the CTCSS icon appears and the small numbers next to the channel number flash on the display.



- 2. Press using the Up or Down button to select a privacy code. You can hold the Up or Down button for fast advance
- 3. When your desired CTCSS privacy code is displayed, choose one of the following: a. Press the Menu/Power button to enter the new setting and proceed to other functions.
- b. Press PTT button to enter the new setting and return to Standby mode.

Set DCS Privacy Codes



To select a DCS privacy code:

- 1. After selecting a channel, press the Menu/Power button until the DCS icon appears and the small numbers flash on the display (01 through 83).
- 2. Press using the Up or Down button to select a DCS privacy code. You can hold the Up or Down button for fast advance.
- When DCS privacy code is displayed, choose one of the following:
- of the following:
 a Press the Menu/Power button to enter the new
- a. Press the Menu/Power button to enter the new setting and proceed to other functions.
- b. Press PTT button to enter the new setting and return to Standby mode.



Voice Activated Transmit (VOX)

In VOX mode, your radio can be used "hands-free," automatically transmitting when you speak. You can set the VOX sensitivity level to fit the volume of your voice and avoid transmissions triggered by background noise.



To turn VOX mode on/off:

1. Press the Menu/Power button until the VOX icon on the display. 2. Press the Up or Down button to turn VOX On.

The current "ON" setting is displayed.

Press the Up or Down button to turn VOX Off.

The current "OF" setting is displayed. Choose one of the following:



a Press the Menu/Power button to enter the new setting and proceed to other functions.

b. Press PTT button to enter the new setting and return to Standby mode.



The current VOX sensitivity level is displayed with letters " vox " and a Number 1 through 3, with Number 3 being the most sensitive level

and Number 1 being the least sensitive level. 2. Press the Up or Down button to change the setting.

3. Choose one of the following: a. Press the Menu/Power button to enter the new setting and proceed to other functions.

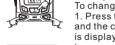
b. Press PTT button to enter the new setting and return to Standby mode.

Ten Call Tone Settings



You can choose between ten different Call Tone Settings to transmit a call alert.

To change a call tone setting:



1. Press the Menu/Power button until the letter "C" and the current call tone number (01 through 10) is displayed. The current call tone will sound for two seconds.

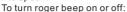


- 2. Press the Up or Down button to hear the other call tone settings.
- 3. Choose one of the following:
- a. Press the Menu/Power button to enter the new setting and proceed to other functions.
- b. Press PTT button to enter the new setting and return to Standby mode.

Roger Beep Confirmation Tone

Your listener will hear an audible tone when you release the PTT button. This alerts the other party that you are finished talking and it is OK for them to speak.





- 1. Press the Menu/Power button until the Roger Beep icon is displayed. The current on or off setting flashes.
- 2. Press the Up or Down button to select roger beep on or off.



- a. Press the Menu/Power button to enter the new setting and proceed to other functions.
- b. Press PTT button to enter the new setting and return to Standby mode.



Key Tone On/Off

When Key Tone is On, an audible tone will sound each time a button is pressed.



To turn key tone on or off:

- 1. Current key tone status On/Off will flash.
- 2. Press the $\dot{\text{U}}\text{p}$ or Down button to select key tone on or off.
- 3. Choose one of the following:
- a. Press the Menu/Power button to enter the new setting and proceed to other functions.
- b. Press PTT button to enter the new setting and return to Standby mode.



Channel Scan

Your radio can automatically scan channels.

To scan channels:

- 1. Press and release the Scan button until the Scan icon and the channel numbers appear on the display.
- 2. Press and hold the Scan button to begin scanning channels.
 The radio ignores specific privacy codes while scanning channels.
 The Scan icon will continue to be displayed when scan is on. Your radio will continue to scan all channels and stop if an incoming transmission is detected. Your radio will remain on that channel for 10 seconds

During scanning (while receiving an incoming transmission), you can choose from the following:

- a. Press and hold the PTT button to communicate on that channel. Your radio will remain on that channel and return to Standby mode.
- b. Press the Channel Up or Channel Down button to resume scanning channels.
- c. Press and hold the Scan button to return to Standby.





Privacy Code Scan

Your radio can automatically scan the Privacy Codes (either CTCSS 01 through 38 or DCS 01 through 83) within one channel. Only one set of privacy codes (CTCSS or DCS) can be scanned at a time.

To scan privacy codes:

- 1. While in Standby mode, press and release the Scan button twice (CTCSS) or three times (DCS) until the CTCSS or DCS icon and numbers are flashing.
- 2. Press and hold the Scan button to begin scanning privacy codes within the selected channel.

The Scan icon will continue to be displayed when privacy code scan is on. Your radio will continue to scan privacy codes and stop as an incoming transmission is detected. Your radio will remain on that channel/privacy code for 10 seconds.

During scanning (while receiving an incoming transmission), you can choose from the following:

a. Press and hold the PTT button to communicate on that channel/ privacy code. Your radio will remain on that channel/privacy code and return to Standby mode.

b. Press the Up or Down button to resume scanning privacy codes. If you do not press any button within 10 seconds, your radio will automatically resume scanning privacy codes.







NOAA* All Hazards Radio Channels •

You can use your radio to listen to NOAA All Hazards Radio channels transmitting in your area.

To listen to All Hazards Radio channels:

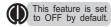
- Press and hold the NOAA(WX) button until the All Hazards Radio icon and the currently selected All Hazards Radio channel are displayed.
- ${\it 2. Use the Up or Down button to change All Hazards Radio channels.}\\$
- The All Hazards Radio icon will continue to be displayed when All Hazards Radio is on.
- 4. To exit All Hazards Radio, press and hold the NOAA button until $^{\prime\prime}$ WX" is displayed.
- *National Oceanographic and Atmospheric Administration Hazards Radio Icon





Weather (WX) Alert Mode •

Turning On the Weather Alert function will allow your radio to automatically receive NOAA Hazard Alert radio signals and warnings from designated NOAA broadcast stations. If the radio is turned ON, it will alert to Weather and other emergency alerts broadcast by NOAA.





Make sure the strongest Weather channel is selected for your area using the channel selection in the previous menu.

To turn Weather Alert On or Off:

- 1. Press the Menu/Power button until the Weather Alert icon flashes on the display in the NOAA mode. The current On or Off setting is displayed.
- 2. Press the Up and Down button to turn Weather Alert On or Off.
- 3. Press and hold the Menu/Power button again to save the new setting and exit the Weather Alert Mode and return to Standby mode.

This radio is rain resistant to JIS4 standards.

Transmit and Receive Procedure

Your two-way radio contains a transmitter and a receiver. To control your exposure and ensure compliance with the general population/uncontrolled environment exposure limits, always adhere to the following procedure:

•Transmit no more than 50% of the time. To receive calls, release the PTT button. To transmit (talk), press the Push to Talk (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 standards compliance).

•Always hold the radio approximately 5cm in front of your mouth with the antenna pointing away from your head.

FCC Statement

This equipment has been tested and found to comply with the limits for 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 to 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.

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

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

RF Exposure Warning

This equipment must be installed and operated in accordance with provided instructions and must not be co-located or operating in conjunction with any other antenna or transmitter. End-users and installers must be provide with antenna installation instructions and transmitter operating conditions for satisfying RF exposure compliance. The SAR limit adopted by US is 1.6 W/kg averaged over 1 grams of tissue. The highest SAR value for this device type when properly worn on the body is 1.118 W/kg.

