

# NEXTECH



0.5W UHF Transceiver

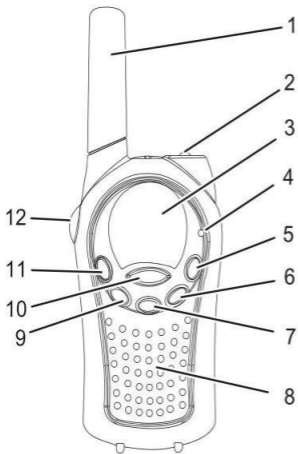
User Manual






Use of the citizen band radio service is licensed in Australia by ACMA Radio Communications (Citizen Band Radio Stations) Class License and in New Zealand by MED General User Radio License for Citizens Band Radio. Operation is subject to conditions contained in those licenses.

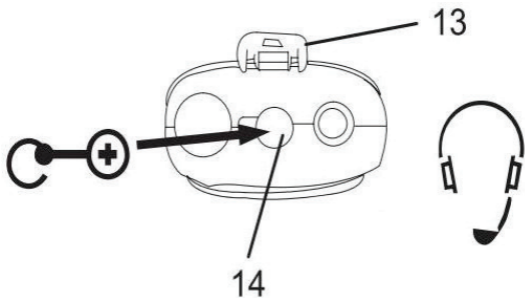
This lightweight hand-held transceiver is suitable for all manner of recreational and professional activities such as building sites, IT-cablers, electricians, inter-car road trip communication or keeping in touch with the kids while they play. Open field transmission range is up to 6km, with typical city range up to 1km. It runs off 3 x AAA batteries, and has features you usually only find in more expensive models, including VOX hands free, monitor, call tones, roger beep, backlit display, headset connection, and CTCSS sub-channels. There is also an LED torch built into the top in case you're stuck in the dark. Thanks to the auto-battery saving feature, the batteries won't go flat in case you forget to turn it off.

### **Specific Recommendations:**

- To avoid the risk of burns, do not use the device if the aerial is damaged in any way.
- Do not use the device in a potentially explosive setting (e.g. Around pumps, on the lower deck of a boat or around a fuel-storage installation or chemical products) If traveling in a car or by bike, stop before using the device.
- Switch off the device if on an airplane or in a hospital,
- Never use the device in close proximity to a radio to avoid interference.
- Remove the batteries if the device is not going to be used for an extended period of time. Never mix used with new batteries.
- Position the transmitter and antenna at least 5cm from your face. Direct the antenna upwards and speak normally.
- Clean the device with a damp cloth. Avoid the use of cleaning agents and solvents.
- Do not modify the device in any way. In the event of damage occurring, ensure that the device is checked by a qualified professional. The device cannot be used to contact the emergency services.



-  15
-  16
-  17
- SCAN** 18
-  19
-  20
- 8** 21
- 88** 22
- VOX** 23



## **Key Functions:**

1. Antenna
2. Lamp
3. LCD
4. Microphone
5. Lamp Button
6. Down Button
7. Call Button
8. Speaker
9. Up Button
10. Menu Button
11. Power ON/OFF Button
12. PTT (Push to Talk) Button
13. Belt Clip
14. Charger/Headset Jack
15. Receiving Icon
16. Transmitting
17. Volume Icon
18. Scan Icon
19. Lock Icon
20. Battery Level Indicator
21. Channel Number
22. CTCSS Number
23. Vox Selection

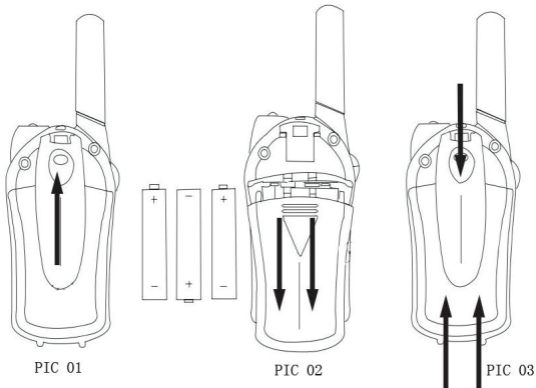
## **Before Using the Device:**

Removing the belt clip:

Before insert batteries into the device, first pull the belt clip latch away from the device (See PIC01).

## **Installing the Batteries:**

1. Slide down the battery compartment cover (See PIC02).
2. Insert 3 x AAA Alkaline (Not included)
3. Position the batteries according to the polarity making on the battery compartment.
4. After placing batteries into correct positions, replace the battery cover (See PIC03).



PIC 01

PIC 02

PIC 03

## Using the Device:

### 1. Turning the Device ON/OFF

Switch on the Device: Press and hold the Power Button for 3 seconds then you will hear a beep sound.

Switch off the device: press and hold the Power Button for 3 seconds then you will hear a beep sound.

### 2. Adjusting the Volume

To increase the volume, press the ▲ Up Button; press the ▼ Down Button to decrease the volume.

### 3. Low Battery Indication

The device can detect low battery level. When battery voltage is low, the battery icon will flash and a beep will be heard to indicate that the batteries need to be replaced.

#### **4. Receiving/Transmitting Communications:**

The device is in "Reception" mode when it is turned ON and not transmitting. When a signal is received on the current channel, the LCD will display receiving icon.

When you press the PTT (push to talk) button, the device switches to "Transmission" mode.

Hold the device in a vertical position with the Mic (microphone) 3-5cm away from your mouth. While holding the PTT button, speak into the microphone in a normal tone of voice. Release the PTT button when you have finished transmitting. For others to receive your transmission, they must be on the same channel with you.

#### **Note:**

1. The maximum talking range is up to 6Km, this will depend on your surroundings and environment. It can be affected by obstructions such as hills or buildings.
2. Don't try to use two devices which are less than 1.5m (5 feet) apart. Otherwise, you may experience interference.

#### **5. Changing Channels:**

Press the MENU button once, the channel number will Flash on the display.

Press the up ▲ /down ▼ button to change the channel. Press the PTT button to confirm and return to stand-by mode.

#### **Note:**

If no button is pressed within 15 seconds during setting, the device will return to stand-by mode.

## **6. CTCSS (Continues Tone Coded Squelch System):**

Press the MENU button twice, the current CTCSS code will flash on the display. Press the up ▲ /down ▼ button to change the 38 available codes. Press the PTT button to confirm and return to stand-by mode. This license free radio operates on the 476MHZ frequency band; the device has 80 available radio channels. If there are any device users near you, there is a chance that some of the users are operating on the same radio channel. To prevent you receiving signals from other users, sub-channels have been integrated. When using CTCSS, a low frequency tone (between 67-250Hz) will be transmitted along with the voice signal. There are 38 available tones to choose form. You are free to choose one of the 38 available sub-channels. Due to filtering, these sub-channels will generally not be audible so they will not disturb the communication.

## **7. VOX (Hands free function):**

Press the MENU button three times, the current VOX setting will flash on the display and the VOX icon will display, Press UP ▲ button to set the VOX sensitivity level between 1 and 3 level (level 3 is the high sensitive level). Press down ▼ button until "OF" appears on the display to turn VOX OFF. Press the PTT button to confirm and return to stand-by mode. In VOX mode, the radio will transmit a signal when it is activated by your voice or other sound around you. VOX Operation is not recommended if you plan to use your device in a noisy or windy environment.

### **Note:**

VOX mode will be over ridden when you press the PTT button.



## **8. Scanning for an active radio channel:**

Press and hold the UP ▲ button for 2 seconds: The "SCAN" function indicator will appear on the display and the channel will scan continuously. Once an active channel is found, the scanning will stop and you can listen to the transmission. When the transmission has stopped on that channel, the scan function will resume automatically.

### **Note:**

If you press the PTT button while listening to a found channel, the device will go back to stand-by mode on the found channel.

## **9. Monitor:**

Press and hold the DOWN ▼ button about 3 seconds to activate monitor. Release the DOWN ▼ button to return to standby mode.

## **10. Setting the Call tones:**

The device has 10 call tones. Press the MENU button 4 times, "CA" is displayed and on the current call tone. Press the UP ▲ /Down ▼ button to change to another call tone. Press the PTT button to confirm and return to stand-by mode.

### **11. Sending a call tone:**

Press the call button one time quickly, the call tone will be transmitted on the set channel.

### **12. Roger Beep On/Off:**

After the PTT button is released, the device will send out a roger beep to confirm that you have stopped talking. Press the MENU button 6 times, "RO" will be displayed. Press the UP ▲ /Down ▼ button to set the roger beep ON/OFF. Press The PTT button to confirm your selection and return to the stand-by mode.

### **13. Backlit Display:**

Press any button except for the MENU button to activate the back light of the LCD display. The back light will light on approx. 5 seconds.

### **14. Headset Connection:**

The device can be used with an authorised headset. The connector is located on the top of the device. Insert the earpiece plug into the connector (2.5mm jack). There is a small "PTT" button on the earpiece that has the same function as the PTT button on the device. When you use the PTT button from the earpiece, you must also use the microphone from the earpiece to talk.

### **Note:**

Do not connect an un-authorized headset, this may damage your device.

## **15. Battery Saving Function**

When the device has not been used for 6 seconds, economy mode is automatically activated. This does not affect the reception or transmission of the radio. Standby mode is automatically re-activated as soon as a signal is detected.

## **16. Built-in Flash Light**

Your device has a built-in flash light that can be used for sending light signals or for other lighting needs.

## **17. Lock & Unlock the Device**

Press and hold the MENU button for 3 seconds to lock the device. The button lock icon is displayed on the LCD screen. Press and hold MENU button for 3 seconds to unlock the device.

## **18. Technical Specifications**

Frequency:	476MHz
Output Power:	0.5W
Channels:	80
CTCSS Sub-Channels:	38
Talking Range:	6km (In the Open)
Call Tones:	10
Batteries:	Requires 3 x AAA (Not Included)
Weight:	60g (Excluding Batteries)
Dimensions:	130(L) x 48(W) x 36(D)mm

<b>Channel</b>	<b>Frequency</b>	<b>Use</b>
Channel 1	476.4250	Duplex - Repeater Output
Channel 2	476.4500	Duplex - Repeater Output
Channel 3	476.4750	Duplex - Repeater Output
Channel 4	476.5000	Duplex - Repeater Output
Channel 5	476.5250	Duplex - Repeater Output (Emergency use only)
Channel 6	476.5500	Duplex - Repeater Output
Channel 7	476.5750	Duplex - Repeater Output
Channel 8	476.6000	Duplex - Repeater Output
Channel 9	476.6250	Simplex
Channel 10	476.6500	Simplex 4WD Drivers - Convoy, Clubs & National Parks
Channel 11	476.6750	Simplex Call Channel
Channel 12	476.7000	Simplex
Channel 13	476.7250	Simplex
Channel 14	476.7500	Simplex
Channel 15	476.7750	Simplex
Channel 16	476.8000	Simplex
Channel 17	476.8250	Simplex
Channel 18	476.8500	Simplex Caravan & Campers Convoy Channel
Channel 19	476.8750	Simplex
Channel 20	476.9000	Simplex
Channel 21	476.9250	Simplex
Channel 22	476.9500	Data Only (No Voice - No Packet)
Channel 23	476.9750	Data Only (No Voice - No Packet)
Channel 24	477.0000	Simplex
Channel 25	477.0250	Simplex
Channel 26	477.0500	Simplex
Channel 27	477.0750	Simplex
Channel 28	477.1000	Simplex
Channel 29	477.1250	Simplex Pacific Hwy (NSW) & Bruce Hwy (Qld) Road Channel
Channel 30	477.1500	Simplex UHF CB Broadcasts
Channel 31	477.1750	Repeater Input
Channel 32	477.2000	Repeater Input
Channel 33	477.2250	Repeater Input
Channel 34	477.2500	Repeater Input

Channel 35	477.2750	Repeater Input (Emergency Use Only)
Channel 36	477.3000	Repeater Input
Channel 37	477.3250	Repeater Input
Channel 38	477.3500	Repeater Input
Channel 39	477.3750	Simplex
Channel 40	477.4000	Simplex Highway Channel
Channel 41	476.4375	Duplex - Repeater Output
Channel 42	476.4625	Duplex - Repeater Output
Channel 43	476.4875	Duplex - Repeater Output
Channel 44	476.5125	Duplex - Repeater Output
Channel 45	476.5375	Duplex - Repeater Output
Channel 46	476.5625	Duplex - Repeater Output
Channel 47	476.5875	Duplex - Repeater Output
Channel 48	476.6125	Duplex - Repeater Output
Channel 49	476.6375	Simplex
Channel 50	476.6625	Simplex
Channel 51	476.6875	Simplex
Channel 52	476.7125	Simplex
Channel 53	476.7375	Simplex
Channel 54	476.7625	Simplex
Channel 55	476.7875	Simplex
Channel 56	476.8125	Simplex
Channel 57	476.8375	Simplex
Channel 58	476.8625	Simplex
Channel 59	476.8875	Simplex
Channel 60	476.9125	Simplex
Channel 61		Reserved for Future Expansion
Channel 62		Reserved for Future Expansion
Channel 63		Reserved for Future Expansion
Channel 64	477.0125	Simplex
Channel 65	477.0375	Simplex
Channel 66	477.0625	Simplex
Channel 67	477.0875	Simplex
Channel 68	477.1125	Simplex
Channel 69	477.1375	Simplex
Channel 70	477.1625	Simplex

Channel 71	477.1875	Repeater Input
Channel 72	477.2125	Repeater Input
Channel 73	477.2375	Repeater Input
Channel 74	477.2625	Repeater Input
Channel 75	477.2875	Repeater Input
Channel 76	477.3125	Repeater Input
Channel 77	477.3375	Repeater Input
Channel 78	477.3625	Repeater Input
Channel 79	477.3875	Simplex
Channel 80	477.4125	Simplex



## **UHF CB radio - What you need to know**

A few things to note about channel allocation. Channels 5 & 35 are reserved for emergency only, and misuse of these channels carries hefty fines or jail time. Besides these, the truckies use channel 40, 18 is the caravan and campers channel. Channels 1-8 and 31-38 are for repeater use, the latest standard states that 41 – 48 and 71 -78 may also become available for repeater operation to supplement the other repeater channels. Presently speech telephony is inhibited on channels 22 and 23 (i.e. data only). Channels 61, 62, and 63 are currently not activated on all UHF units until approved by the ACMA at some time in the future.