User's Manual

MDP-7000 Series DMR/Analog Radio

MDP-7124 (VHF)

MDP-7424 (UHF)

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Maxon America, Inc.

Table of Contents

Thank You for Purchasing the MDP-7000 Series Radio!

1. Before operating the radio, please read the user manual carefully.

2. Functions and specifications are subject to be changed without notice for improvement of the radio performance.

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MDP-7000 Series Features

Maxon's MDP-7000 Series of two-way portable radios utilize the latest DMR digital technology (Text, Voice Record, Contacts, Encryption) with a large color display and essential Analog features (DTMF, 2Tone) in a waterproof IP-67 body and full keypad. Great for farms, construction, irrigation, forestry, & security.

- 1024 Channel Capacity combined across up to 64 Zones (1 zone = Max 1024 Channels)
- DMR Tier 2, Analog, and Mixed Mode Operation
- 5/1-Watt RF Power Settings *(Programmable)*
- 1 Watt Audio Output
- 2600 mAh Battery (DC+7.4V Li-ion)
- Multiple Scan Modes
- 2.0" TFT LCD (176 x 220) Color Display
- Flashlight LCD
- Alpha-Numeric Full Keypad
- Text Messaging w/ Inbox & Outbox *(Up to 40 pre-defined messages editable by CPS Program for One-Touch Send, or draft your own using the keypad)*
- DTMF & 2 Tone Encode & Decode
- CTCSS, DCS
- Voice Recording and Playback *(Up to 63 recordings)*
- Spanish Language Support *(Menus)*
- Lone Worker Mode
- VOX (Voice Operated Transmit)
- Remote Stun / Revive / Monitor functions
- Encryption *(AES-CTR 256 (Standard), DMRA-AES 256 (SW Option))*
- Busy Channel Lock (BCL) / Busy Channel Lock Override (BCLO) / Time-Out Timer (TOT)
- Programmable Side Buttons
- 240 Person Contact List & Quick Call
- Emergency Button
- Etiquette (Vibration) Function Standard
- IP67 (Waterproof)
- UDC (H8 Style) Multi-pin Locking Accessory Connector
- CPS Programming SW available for Narrow / Wideband Channel Programming, Channel Editing, Power Control, Button Programming, Feature/Function Programming.
- SFR (Single Frequency Repeater) (SW Option)
- Transmit Interrupt (SW Option)
- Man-Down Safety Feature (Factory Option)
- GPS (Factory Option)

Specifications

MDP-7000 Series Radio Specifications

General

Frequency Range	VHF: 136~174 MHz
	UHF: 406 ~470 MHz
Frequency Stability	±1.5ppm (-30 to +60℃)
Programmable Channels	64 Zones / 1,024 Channels
Channel Spacing	12.5KHz (DMR), 12.5KHz/25KHz (Analog)
Digital Vocoder	AMBE++ Voice Compression Algorithm
Dimensions	103mm(H) x 52mm(W) x 32mm(D)
Weight	275g
Power Source	DC +7.4V Li-ion 2,600mAH Battery
Current Drain (maximum)	Receive mode, rated audio out – 420mA (Audio Max)
	Transmit mode – 1,200mA
	Standby mode – 100mA

Receiver

Sensitivity	0.22uV 12 dB SINAD
Squelch Sensitivity	0.20uV 10dB SINAD
Selectivity	60dB @12.5KHz
Spurious and Harmonic Rejection	-36 dBm (< 1GHz) -30 dBm (> 1GHz)
FM Hum and Noise	40dB (12.5KHz)
Audio Output Power	1 Watt across a 16-ohm load
Audio Distortion	Less than 3% at rated output
Audio Response	+1, -3 dB from 6dB per octave de-emphasis Characteristic from 300 ~ 3000Hz
Input Impedance	50 ohms

Transmitter

RF Power Output	5/1 Watt
Adjacent Channel Power	60 dB @12.5 kHz
Spurious and Harmonic	-36 dBm (< 1GHz) -30 dBm (> 1GHz)
FM Hum and Noise	40dB (12.5KHz)
Audio Distortion	3% maximum with 1KHz modulation
Audio Frequency Response	+1, -3dB from 6dB per octave pre-emphasis Characteristic from 300 ~ 3000Hz
Output Impedance	50ohms

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3. In-Box Contents *(Subject to Change at Buyer's Request)*

MDP-7000 Radio   Battery   2 Slot Charger   Adapter

VHF or UHF Antenna   Belt Clip   User Manual

Figure 3-1) MDP-7000 Series Main Package Contents

MA-7260: 2600mAH Li-ion Battery Pack

MA-0700: Dual Slot Charger

MA-0712: 6-Unit Dual Slot Multi-Unit Charger

TSA-041: 136~174MHz SMA Antenna

TSA-044: 440~470MHz SMA Antenna
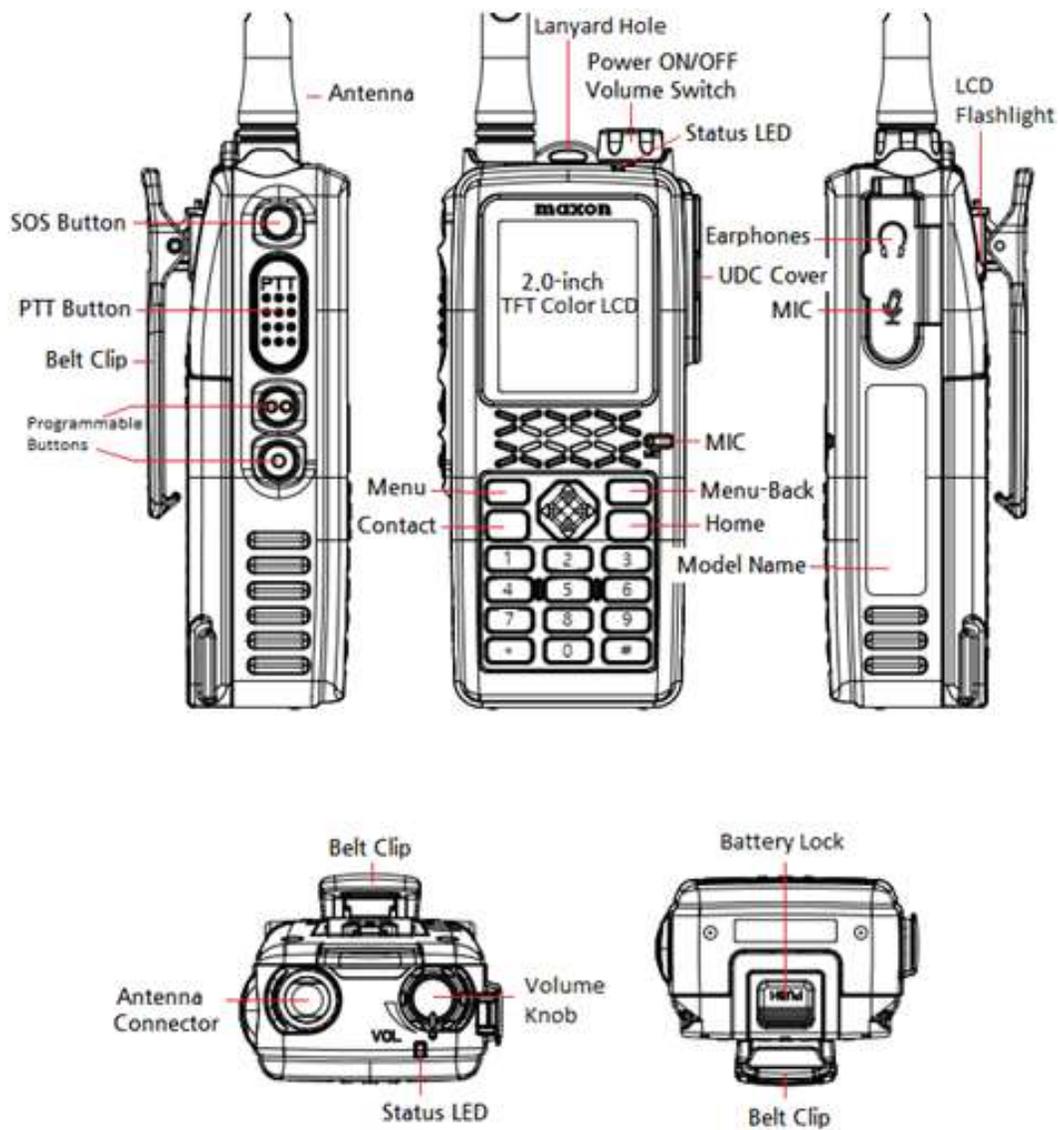
MA-70BC: Maxon Belt Clip

4. Buttons & LCD Icons
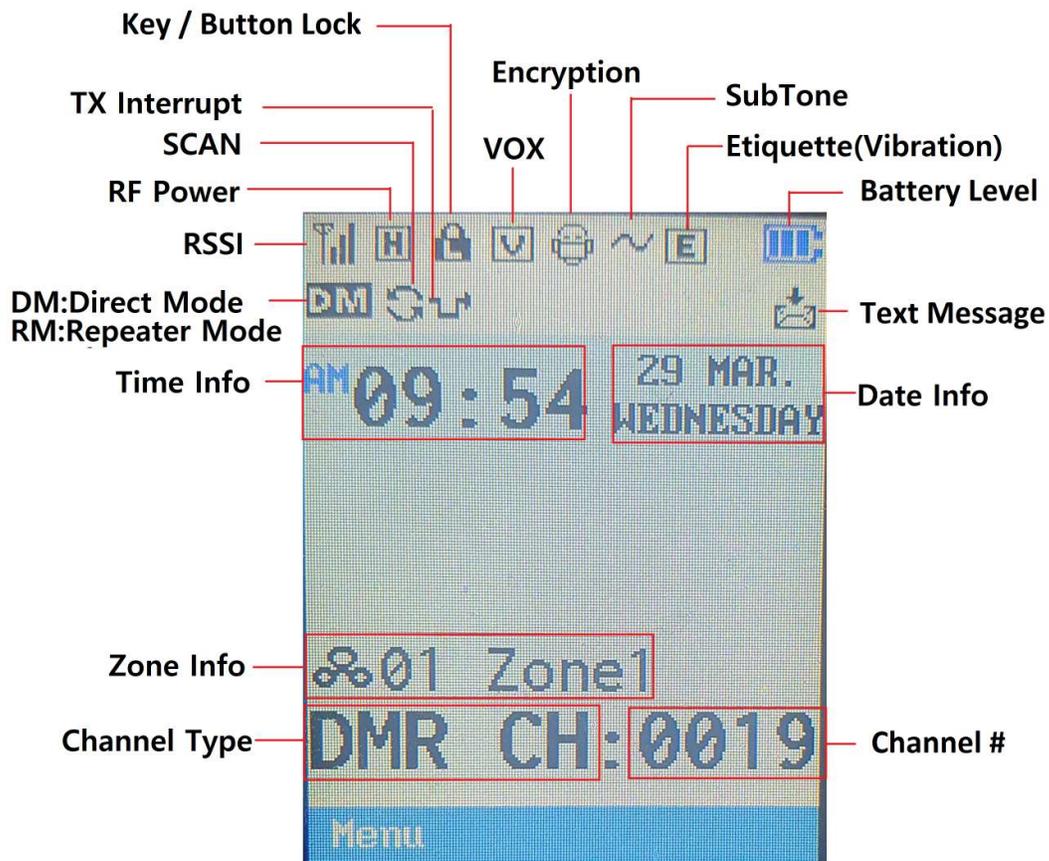

Figure 4-1) MDP-7000 Series buttons and knobs

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Figure 4-2) MDP-7000 LCD Icons

Button	Operation Description
Power ON/OFF Volume Switch	Turning the volume knob clockwise will power on the radio. You will feel a click and there will be chime and logo indicating power-up. To turn the radio off, turn the knob counter-clockwise until you feel a click and see the radio power OFF. You can also control the Volume level with the knob. Volume increases when you turn the knob clockwise and decreases when you turn it counter-clockwise.
SOS/Emergency Button (Digital Channels)	Feature needs to be first be enabled by the CPS program. When the orange SOS button is pressed in an emergency situation, a warning alarm occurs on the radio and also alerts other radios on the same channel. This button can also be reprogrammed for other different features with the CPS Program.
PTT Button	The radio transmits voice when you press and hold down the PTT button as you speak. PTT button must be released (not pressed down) to receive any transmissions. Please speak 5-7cm away from the MIC to transmit a clear voice.
Programmable Buttons (2)	The side buttons can be programmed via CPS software to allow quick access to several features. Change Zone, Adjust TX Power Level, Access Quick Call, Turn on Encryption, Vibrate Mode, VOX, and several other programmable features.

Menu / Select Button	Used to enter the main menu and also to select menu options. (Digital Menu Shown) Contact — Messages — Call Logs — Record — Scan — Zone — Setting — Radio Info
Contact Button (Digital Only)	Press the Contact button to enter the Contact List programmed into the radio & to choose contact methods such as Private Call, Group Call and All Call.
Menu-Back Button	Used to cancel/back out of a menu or return to the previous menu screen.
Home Button	Home button is used to return to the initial screen.

5. Accessory & Battery Installation and Removal

5.1 Antenna Installation and Removal

Turn the antenna clockwise to put on and tighten the antenna. Turn counterclockwise to loosen and take off the antenna as shown in Figure 5-1.
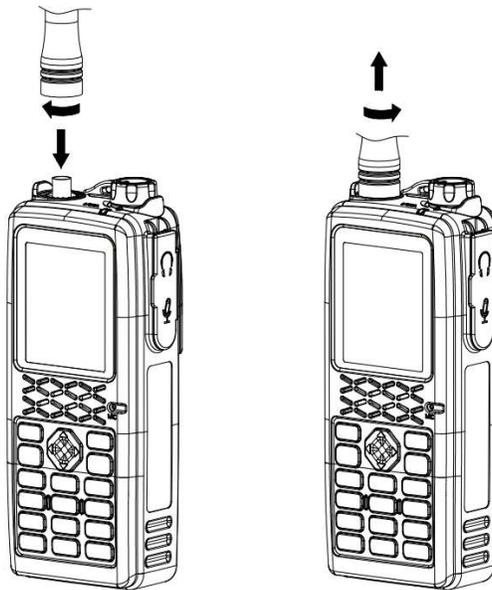

Figure 5-1) Antenna Installation and Removal

⚠ Caution	1. Do not over tighten the antenna as it may cause damage to the radio. 2. NEVER HOLD by the antenna when carrying the transceiver. 3. Transmitting without an antenna may damage the transceiver.

5.2 Battery Installation and Removal

As shown the figure 5-2) below, to remove the battery, press the locking latch in the direction of arrow 1 and pull up the battery latch in the direction of arrow 2 to pull it away from the radio.

To attach the battery, align the battery pack with the groove of the body (arrow 3) and push the locking latch down to the direction of arrow 4. The battery latch will click shut when locked.
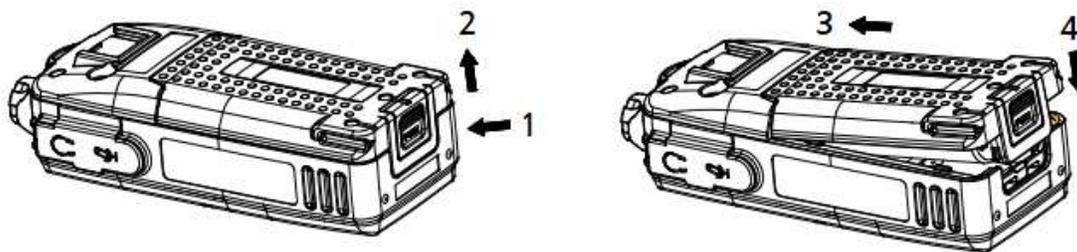

Figure 5-2) Battery Removal and Installation

5.3 Belt Clip Installation and Removal

As shown the figure 5-3) below, Belt clip attaches to the back of the radio above the battery. To attach the belt clip, align the belt clip to the grooves on the back of the radio and push it down to the direction of arrow 1. Clip will click when locked. To remove the belt clip, push the belt clip locking tab in the direction of arrow 2 and pull the belt clip up to the direction of arrow 3 at the same time.
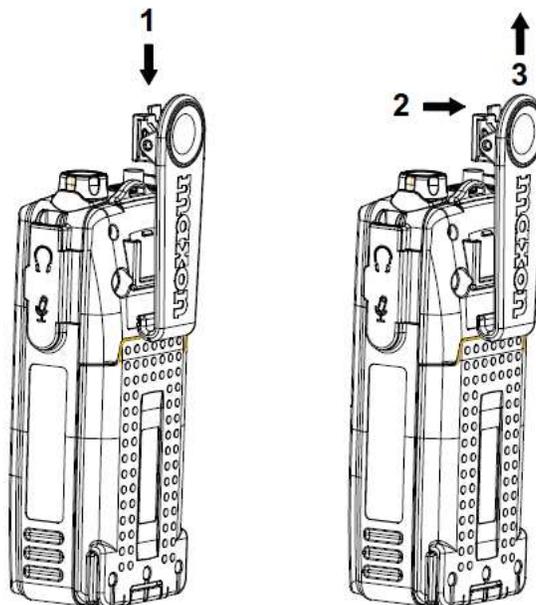

Figure 5-3) Belt Clip Installation and Removal

5.4 External Accessory Connector Jack

To connect external accessories like shown in Figure 5-4, open the accessory jack cover using the thumb tab on its side. Hook the accessory into the locking tab and push the accessory down and towards the radio into alignment with the jack as in arrow 1. Then seal the connection by turning the locking screw in a clockwise direction like arrow 2.

To remove the external accessory, unscrew the accessory's locking screw counter-clockwise like arrow 3 and then pull it up and away off of the hook and radio like arrow 4. Accessory cover will snap shut when aligned and pressed closed.
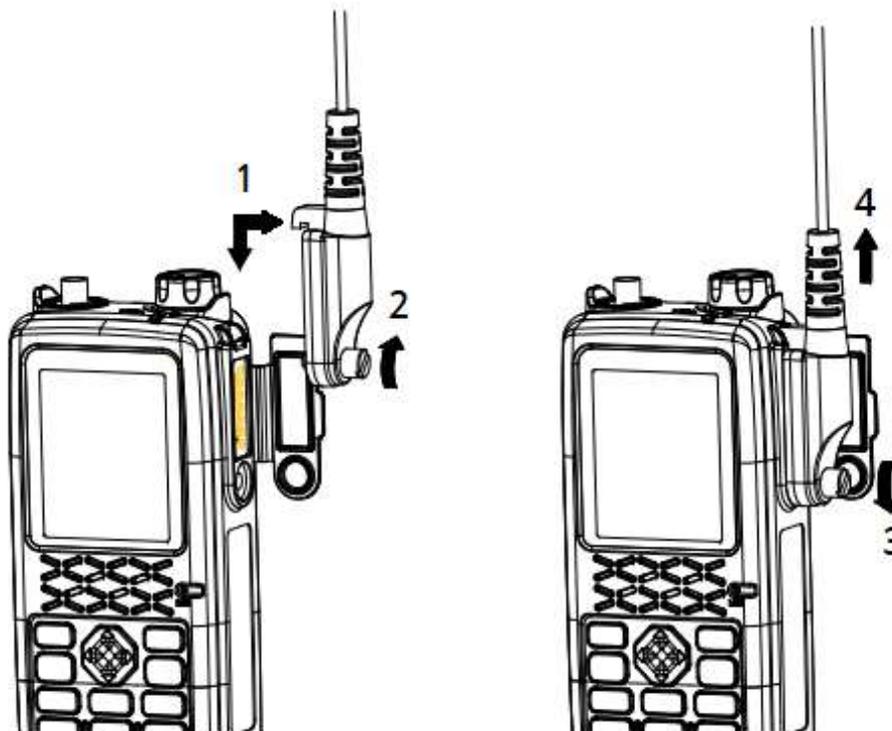
Figure 5-4) External Accessory Installation and Removal

6. Battery & Charging Information

6.1 When to charge your battery

The MDP-7000 series uses a large-capacity 2600mAh Li-ion battery *(MA-7260)*. Low battery voltage may reduce communication coverage and cause operation issues with the radio.

Please charge the battery:
1) When you think the performance of the radio has degraded.
2) When the battery icon turns from blue to red and displays only 1 bar.
3) When you hear 3 consecutive sets of tones emitted from the speaker.
4) When the "Operation" flag displays "Low Battery".
5) When the battery icon blinks red.

6.2 How to Charge

1) Plug the adaptor of MA-0700 charger into an AC 110V power outlet.

2) Turn radio off and insert the radio into the charger like Figure 6-2 below.

3) Charge an extra 30 minutes once light turns green for a full charge.

Status	LED indication
Charging	Red LED lights
Complete charging	Green LED lights
Error Detected (Battery)	Red LED blinks
Keep Charging	Green LED lights
Battery in standby	Amber LED lights

Figure 6-2) MDP-7000 radio and extra battery in charger MA-0700

7. Radio Functionality

1) MENU Functions

To enter the Menu mode, press the "Menu/Select" button. There are 8 main menus in Menu mode when on a Digital or Mixed (Digital & Analog) Channel (**Digital or Mixed Mode**) and 4 to 5 (depending on the channel setup) when on an Analog Channel (**Analog Mode**). Menus can be added or removed via the radio's CPS PC programmer to help you organize the radio. Navigate up or down in this menu and select the feature/function you wish to go into with the "Menu/Select" button.
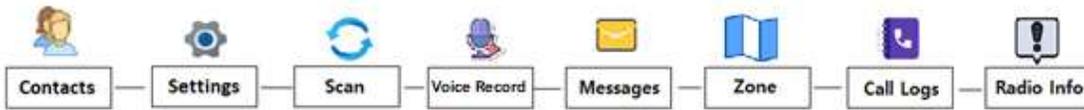
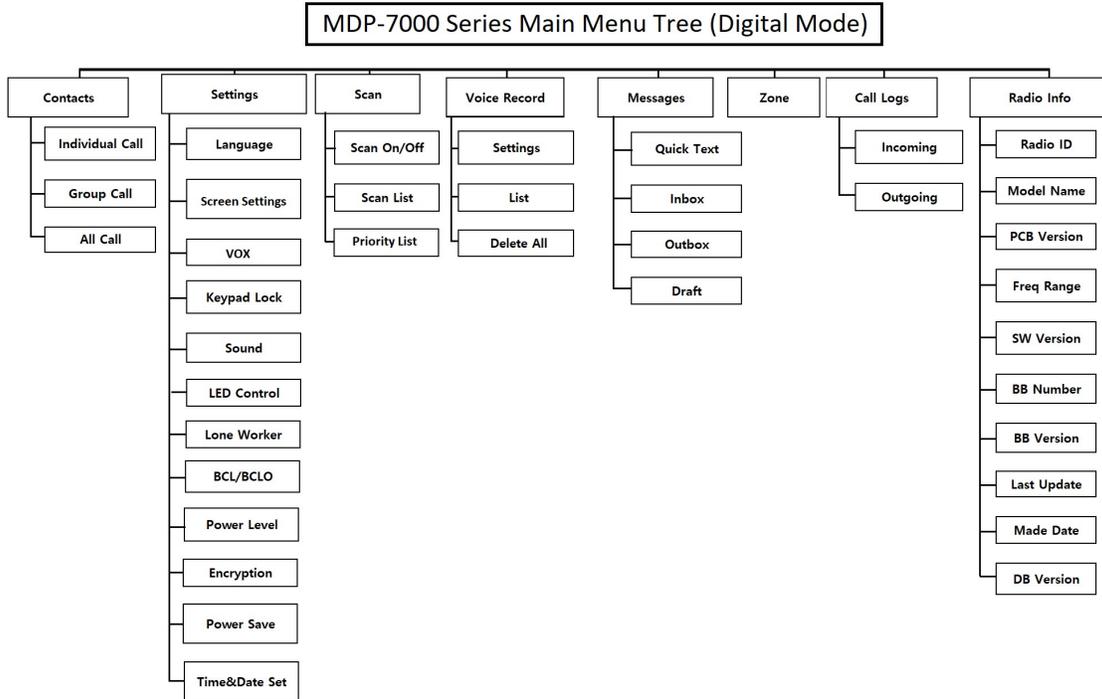Figure 7-1) MDP-7000 Series Main Menu on Digital & Mixed Channels

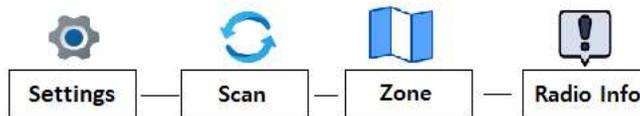Figure 7-2) MDP-7000 Menu Tree in Digital Mode

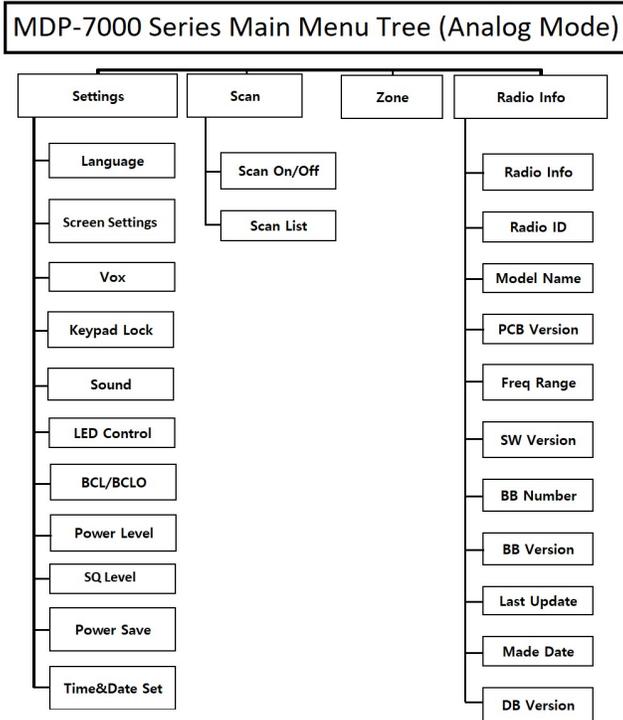Figure 7-3) MDP-7000 Series Main Menu in Analog Mode

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MDP-7000 Series Main Menu Tree (Analog Mode)

Settings	Scan	Zone	Radio Info
Language	Scan On/Off		Radio Info
Screen Settings	Scan List		Radio ID
Vox			Model Name
Keypad Lock			PCB Version
Sound			Freq Range
LED Control			SW Version
BCL/BCLO			BB Number
Power Level			BB Version
SQ Level			Last Update
Power Save			Made Date
Time&Date Set			DB Version

Figure 7-4) MDP-7000 Menu Tree in Analog Mode

☞ Note) Radio will revert from within the menu back to standby mode if no activity in 25 seconds.

Backlight timer restarts in standby mode.

2) Contact List (Digital Mode, DTMF, or 2 Tone Channels Only)

In Digital Mode, the Contact List provides a list of Individuals, Groups, or "All Calls" of which you can make a private "Direct Call". Radio IDs are set by the radio's CPS programming software where you can create up to 240 contacts. Programming SW is also used to edit and delete contacts. When using DTMF or 2 Tone Channels in Analog, your radio's contact list will be modified for those features. This is explained at the back of the manual.

To initiate a call in Digital Mode, select Contacts from the Main Menu to see the list of contacts *(or press the green "Contacts" button underneath the Menu button for direct access)*. The applicable icon (*below*) will be shown indicating the type of call. Press the ▲▼ keys to move to the desired contact and then press the PTT button to initiate the call *(Press and hold to transmit)*. The radio will revert to the original contact/channel after 30 seconds of inactivity. Pressing "Select" will provide different functions that are available for that type of contact.

ICONs:

- 👤: Individual Contact List

  • **Stun Radio, Revive Radio, Check Radio, & Monitor Radio** *functionality is in this menu. "Stun" will disable the desired radio's ability to Tx. "Revive" will restore the functionality. "Check Radio" checks to see if the target radio in your contact*

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list is receiving. "Monitor Radio" turns on the mic of the target radio to listen to the surrounding sound.

- 👥: Group Contact List *(Group Call; Press PTT to make Group Call to highlighted contact)*
- 👥: All Contact List *(terminals with the same channel and color code are available)*

3) Messages (Digital Mode Only)

The MDP-7000 has the ability to send and receive SMS text messages with another DMR radio. Use the CPS programmer to edit the Text Message you wish to send. To view or create messages, go into your Main Menu and use the ▲▼ keys to highlight Messages and press select. The Messages menu provides three additional menu functions: Quick Text, Inbox, Outbox, and Draft.

Quick Text – The ability to send from a list of up to 40 preset messages and up to 40 characters per message. The preset messages are set by the CPS programmer.

Inbox - Stores up to 10 received text messages. When you have 10 received messages, the oldest message is cleared and the newest incoming message is kept. When a new message arrives, the contents will be displayed on the LCD screen. When you choose messages stored in the list, you can view those sent messages and the caller ID that initiated the message call.

Outbox - stores up to 10 outgoing text messages; when the outgoing messages exceed 10, the oldest message is cleared and the newest sent message is kept. When you choose messages stored in the list, you can view the sent messages and the caller ID to whom they were sent.

Message Draft - A new text message can be created (drafted) using the keypad. You can input up to 40 characters for your message which can then be sent to a group or individual in your Contact List. The radio WILL NOT SAVE YOUR MESSAGE IF YOU EXIT THE MENU.

To obtain access, select the Messages section from the menu, press the menu/enter button to enter into Messages and use the ▲▼ keys to highlight one of the four choices:

a) Quick Text

Select Quick Text from the message menu by pressing the menu/enter button to view the registered message(s) using the ▲▼ keys, select the message you want to send, and press the menu/enter button to see the contents of the message. Press the menu/enter button again to view your list of contacts & groups, and using the ▲▼ keys, select the contact or group for the message to be sent. Press the menu/enter button and the message will be sent to the contact or group(s). An acknowledgement will be shown on the display of either "Sent Success" or "Sent Fail". If the message is failed, check to make sure that the user receiving the message has their unit powered on. ***Group messages will not show "Sent Failed"***

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b) Inbox

Text messages are shown initially on the screen. If you are in another mode or miss the message, the message icon will be displayed indicating a new message(s) has arrived. Select inbox from the message menu by pressing the menu/enter button to view the registered message(s). Using the ▲▼ keys, select the message you want to view, and press the menu/enter button to see the contents of the messages. Messages that have yet to be viewed will be indicated with a downward arrow inside the envelope; after a message is viewed the arrow will no longer be shown.

If you want to delete messages from the Inbox, select #2 Delete All from within the Inbox menu by pressing the menu/enter button, the question to Delete All will appear with the word "Yes?" Press the menu/enter button to delete all messages. If you choose not to delete the messages, press the return button to exit.

c) Outbox

Select Outbox from the message menu by pressing the menu/enter button to view the outgoing message(s). Using the ▲▼ keys, select the message you want to view. At this point, you can resend the message. Press the menu/enter button to view the contents of the message. Using the ▲▼ keys, select the message you want to send, and press the menu/enter button to see the contents of the message. Press the menu/enter button again to view the list of contacts, and using the ▲▼ keys, select the contact for the message to be sent. Press the menu/enter button and the message will be sent to the contact(s). An acknowledgement will be shown on the display of either "Sent Success" or "Sent Fail". If the message is failed, check to make sure that the user receiving the message has their unit powered on. *Group messages will not show "Sent Failed"*

To delete messages from the outbox, select #2 Delete All from within the Outbox menu by pressing the menu/enter button, the question to Delete All will appear with the word "Yes?" Press the menu/enter button to delete all messages. If you choose not to delete the messages, press the return button to exit out.

☞ Note - When sending and receiving text messages, turn off the power saving mode.

d) Message Draft

Letters, numbers, and special symbols can be inputted with one or several presses of each relevant key on the keypad. Use the # key to switch around between the Alpha, ALPHA CAPTIAL, and Numeric Keypad Input Menu; a graphic in the top right corner will tell you what keypad input mode you are in. The radio does not save un-sent messages.

4) Call Logs (Digital Mode Only)

The function allows the viewing of incoming and outgoing calls from individuals only. The call log

contents are managed in the same manner as in the inbox/outbox of the messages section.

5) Call Recording (Digital Mode Only)

This function is used to record the content of outgoing and incoming calls in digital mode only. There are 3 choices; Settings, Lists, and Delete All. Up to 63 conversations/recordings can be stored with each recording limited to 150 seconds. When the recordings exceed 63, the oldest message is cleared and the newest incoming message is registered,

Settings - Allows the user to turn the recording capability on or off.

Lists – Use Lists to view your recorded messages or play back each message. To play back a message, use the ▲▼ key to highlight the desired recorded message and press the menu/enter button to play it.

Delete all – This function provides the capability to delete stored recordings. To delete recordings, select Delete All from within the Voice Recording menu by pressing the menu/enter button, the question to delete all will appear with the word "Yes" Press the menu/enter button to delete all messages. If you choose not to delete the messages, press the return button to exit.

6) Scan

The ability to scan digital and analog channels is available. This function provides the ability to turn scan on/off and review the scan list as programmed into the radio via the CPS programmer. Contact your Authorized Dealer for further information.

7) Nuisance Delete

This feature allows the user to skip a channel that is not required while the radio is scanning. Therefore, when the radio is scanning the available channels, it will jump over the channels that the user has selected to be skipped. This feature is useful in instances when there are channels that may be used for other groups and they do not need to be monitored, or if there is a channel that has frequent activity that you do not want to hear. This feature is also called; Nuisance Channel Delete.

A programmable button can be selected in the software for Nuisance Delete. The function works for both analog and digital channels.

Note the following conditions:

a. You can't nuisance delete the scan start channel.

b. You can nuisance delete the priority channel. TX is then initiated on the scan start channel.

c. Turning scan off then back on restores the nuisance deleted channels.

d. When the radio is turned off then back on, nuisance deleted channels are restored.

e. Changing channels restores the nuisance deleted channels.

7) Zone

The radio supports up to 64 zones with a maximum of 1024 channels per zone. To select the desired zone, press the ▲▼ keys then press the menu/enter button to accept the zone.

A zone is a group of channels that allows the user to manage radio channels easily. If the user added several zones, the user could switch zones through Menu → Zone or a programmable function key.

8) Settings

This function allows the user to change to the Language, Screen Setting, Voice Operated Transmit (VOX), Sound, LED control, Lone Worker (digital only), Busy Channel Lockout, Power Level, Squelch Level (analog only), Encryption (digital only), Power Save and Time/Date Set.

(1) Language

This function is to select the language (English or Spanish) for the menus.

(2) Screen Setting

This customizable function allows the user to change how the channel is displayed on the radio. There are 4 screen selections. Examples of each are shown below.

	Screen 1	Screen 2	Screen 3	Screen 4
Digital	DMR CH:0001	CHAN: 0001 D	DMRDigiCh1	D0001 DMRDigiCh1
Analog	ANALOG: 0001	CHAN: 0001 A	Analog Ch 1	A0001 Analog Ch 1

Withing this setting there are 3 additional settings where you can change the background color, the backlight time and the brightness of the display.

(3) VOX

VOX function allows the user to transmit a hand's free voice-activated call through the radio. The radio detects your voice and automatically transmits without using the PTT button. The VOX feature's "Sensitivity Level" is adjustable by the radio's programming software. ("Sensitivity Level" is how loud you need your voice to be to activate the auto PTT. 1 is least sensitive, 5 is most sensitive).

(4) Sound

There are 8 sound adjustments available on the radio. These are: Volume, Call Tone, Message Tone, Key Tone, Channel Switch Tone, Startup Tone, Mic Input and Fixed Volume. Some of these setting have additional adjustments within them.

(5) LED Control

This enables or disables the LED located on top of the radio. It will illuminate red for transmit, amber for the hang time of a call, and green when a call is received.

(6) Lone Worker (Digital Mode Only)

When turned on, the "Lone Worker" feature will automatically send out an emergency call to the rest of your fleet through your radio when there is no user activity within the time set in the menu. To activate, select Lone Worker in the menu and then press the up arrow to increase the time. Pressing the down arrow will decrement it back to "Off".

(7) BCL/BCLO

This function prevents the user from transmitting when the channel is busy.

Digital Mode

BCL On: If the current channel is busy, the transmission is prohibited.

Analog Mode

BCL On & BCLO Off: If the current channel is busy, transmitting is prohibited.

BCL On & BCLO On: Transmit is allowed when it matches the received CTCSS or DCS.

(8) Power Level

This function sets the power transmitting level at high or low. The setting of low power improves battery life, but diminishes talk range.

(9) Encryption (Digital Mode Only)

This feature is used to decrypt/encrypt the incoming and outgoing voice. Voice Encryption can only be performed on a digital channel. It can be setup on a per channel basis or enabled by a button press. There can be up to 40 encryption codes programmed into a radio.

Key Length can be 128, 192 or 256. It is created automatically when the key length is selected. There are 2 types of encryption methods; Proprietary and an optional AES256.

(10) Power Saving Mode

This function allows the radio to enter a power saving mode to extend battery usage time. It functions by enable/disable the receiver when in standby mode thus conserving battery power.

Off, there is no battery saving in standby mode.

1:1, 50% on and 50% off

1:2, 33% on and 67% off

1:4, 25% on and 75% off

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(11) Time & Date Set

The built-in RTC Chip allows you to set the time of day & the date, and can be set for either 12-hour or 24-hour format. **FYI: the keypad will not let you enter certain numbers of the date** if the actual calendar day does not exist for the year. The main battery for your radio charges an internal cell-type battery inside the radio that keeps the time & date. **The radio must be on to re-charge its cell battery**.

Note: if the radio is off for a long period of time, the internal cell battery will drain and the time and date will reset back to zero, and you will need to reprogram your time and date. Cell battery drain is approximately 2 days.

Radio Information

This informs all the information of the device such as Radio ID, Model Name, PCB Version, Frequency Range, SW Version, BB Number, BB Version, Last Update, Made Date, and DB Version.

9) Special Digital Features

SFR Single Frequency Repeater (SFR)

Your radio's Single Frequency Repeater feature is a store and forward repeater function for your portable radio that is used to extend the communications range of other portable radios using that channel. It stores milliseconds of audio information that is received and then transmits that information via an open DMR slot out on the repeater channel to the other users.

Almost all the set-up for the Single Frequency Repeater feature is done through your dealer's CPS program. The radio acting as the repeater will need to be programmed to work with the radios using its repeater channel.

The SFR feature synchronizes the slot timing so radios on slot 1 can talk to radios on slot 2 with all radios set to the same frequency for RX and TX. The slot can be set to either 1 or 2. This does not matter when SFR is used. If it receives on Slot 1 it transmits out on Slot 2. The opposite is true too.

The MDP-7000 must have the SFR option added to the radio. The programmer will need to check the SFR box and make sure TDMA Direct Mode is turned off.

You will need to have the portables that are talking through the repeater on SDI Level 1 or 2. One group of radios are on Slot 1 while the other group is on Slot 2. Note: Using TDMA Direct Mode is dictating the slot timing so radios on different slots won't talk together without the repeater. It's probably best to have a duplicate channel programmed in the portables with TDMA Direct Mode Disabled. This allows radios on either slot to talk to each other.
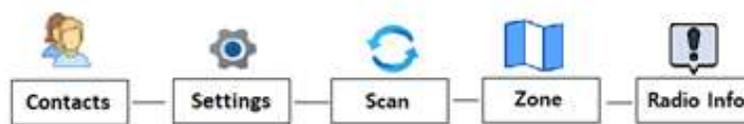
During operation there will be about a 1 second delay between the portables through the repeater.

Note: If there is no delay the radios are talking in simplex mode and not going through the repeater. Please double-check your programming.
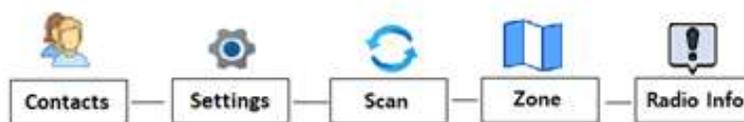
10) Special Analog Features

DTMF Dialing: Your radio must be programmed by a Maxon dealer to have DTMF and 2Tone functionality enabled. Once programmed and enabled, there are several ways to send DTMF from the radio. These are described below.

1. From the DTMF analog channel, press the desired digits on the keypad. As they are entered, they will appear in a popup window. The delete button can be pressed to back up one character or multiple characters. Letters "A", "B", "C", and "D" are also available. From the number 2 button, quick presses allow you to dial "2", "A", "B", and "C". From the number 3 button, "3" and "D" are available. To send the DTMF string, press the PTT button. The string can be sent multiple times by repeatedly pressing the PTT button. To clear the screen, press the red button on the front of the radio.
2. To make a live call, press and hold PTT then dial the characters. In this mode, Letters "A", "B", "C", and "D" are not available to dial.
3. Preprogrammed numbers can be assigned by the dealer. There can be up to 255 contacts along with up to 16 characters per contact. To access these, press the Menu button and go into Contacts *(see Menu tree below)*. Inside the contact list there are 2 options available. The predefined list and a manual dial mode. DTMF Dial is basically the same as described above. The List contains preprogrammed characters along with the alias. Use the up/down arrow keys to select the desired contact. Once selected press PTT to send the characters.

Contacts — Settings — Scan — Zone — Radio Info

2 Tone Encode Dialing: Your radio must be programmed by a Maxon dealer to have 2Tone functionality enabled. Once programmed and enabled, you can send preprogrammed tones from the radio using the process described below.

1. Turn your radio to the 2 Tone analog channel that has been programmed into the radio.
2. Preprogrammed tones are entered & assigned as contacts through your dealer's CPS program. There can be up to 255 contacts along with up to 16 characters per contact. To access these, press the Menu button and go into Contacts. Your list of preprogrammed tones will be listed as a contact with an alias. Use the up/down arrow keys to highlight the desired contact. Press PTT to send the tones.

Contacts — Settings — Scan — Zone — Radio Info

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7. Precautions

8.1 Precautions for safe operation of this equipment

⚠️ **WARNING**	Do not remove the antenna from the radio while in use. Do not transform, damage, modify, or make any changes to the antenna. The strong electronic waves emitted from the radio can have an effect on the performance of the radio if the antenna is modified and can cause the radio to have defects not covered under warranty.
⚠️ Caution	Do not use unapproved manufacturer's accessories (such as rechargeable battery, after-market audio accessories, battery adaptors). Unknown or unauthorized accessories may damage the radio and invalidate the warranty.
⚠️ **WARNING**	Do not disassemble or reorganize the radio. The disassembly or reorganization of your radio is punishable by law and can cause damage to the radio that will not be covered by the warranty.
⚠️ **WARNING**	Do not use other frequency except for the permitted frequency in order not to be punished by the Radio Waves Act.
⚠️ Caution	• Do not give an excessive shock to the radio. • Do not place the radio where the direct sunlight and/or the high temperature occurs. • If the radio is placed for a long time in a car in summer, the hot temperature in the car may damage the battery and risk explosion. • Do not damage the battery with sharp objects and/or an excessive shock.

8.2 Do not use the radio where prohibited

The radio emits a strong electronic wave, which may have an effect on the operation of other equipment and also can be affected by those other devices.

⚠️ **WARNING**	Please turn off the radio before boarding on an airplane. If using your radio while in an airplane, please follow the rules & instructions from the flight attendants.
⚠️ **WARNING**	If in an area with medical equipment, please use your radio only after discussion with the related doctor or the medical equipment manufacturer.
⚠️ Caution	It is not recommended to use your radio where computers or other electric/electronic devices are being used due to the risk of interference of strong electronic waves from the radio.

9. Safety Notes & FCC

Please make sure to read the followings above for safe and effective use of the radio.

⚠️ **WARNING**	● Please keep the Radio away at least 1 inch from the body. ● Do not touch antenna if it is damaged. Risk of skin burn can occur if the outside surface of antenna gets stripped out. ● Please be careful when putting the battery in a pocket or a bag. If you contact a conductive metal to a battery terminal, there is a risk of heat and fire. ● Please don't listen to the radio at a high-volume level when using earphones. Loud volume may have a lasting bad effect on your hearing. ● It is recommended to adjust the volume step by step to the level you want after you set the radio volume of the radio at a low level. ● Please don't remove or replace or charge or discharge the battery in a hazard area where sparks could cause an electrical fire. Turn off the radio in areas where there is a strong electromagnetic force.

FCC RF EXPOSURE COMPLIANCE REQUIREMENTS FOR OCCUPATIONAL USE ONLY

The Federal Communications Commission (FCC), with its action in General Docket 93-62, November 7, 1997, has adopted a safety standard for human exposure to Radio Frequency (RF) electromagnetic energy emitted by FCC regulated equipment. Proper operation of this radio will result in user exposure far below the Occupational Safety and Health Act (OSHA) and Federal Communications Commission limits.

• DO NOT transmit for more than 50% of total radio use time (50% duty cycle). Transmitting more than 50% of the time can cause FCC RF exposure compliance requirements to be exceeded.

• This radio is NOT approved for use by the general population in an uncontrolled environment. This radio is restricted to occupational use, work related operations only where radio operator must have the knowledge to control the user's exposure conditions for satisfying the higher exposure limit allowed for occupational use.

• When transmitting, hold the radio in a vertical position with its microphone 1 inches (2.5 cm) away from your mouth.

• The radio is transmitting when the red LED on the front of the radio is illuminated. You can cause the radio to transmit by pressing the PTT bar on the radio.

• These are required operating configurations for meeting FCC RF exposure compliance. Failure to observe these restrictions means violation.

This device complies with part 15 of 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.

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Warranty Card

Thank you for purchasing MDP-7000 Series.

1. This product has passed strict quality control and testing procedures

2. Warranty is three years from original date of purchase from an Authorized Maxon dealer.
   • Failure of the product under normal operating conditions during the warranty period
     may be repaired by Maxon America free of charge.

3. For the following cases, service fees will be charged.
   • When repair occurs after the warranty period has passed.
   • When the product is damaged due to user's mishandling, abuse or improper operation.
   • When the product is damaged due to user's modification, attempted repair or otherwise
     access to sealed/non-user serviceable items.
   • When the product is damaged due to fire, pollution, earthquakes and any other natural
     or unnatural conditions, accidents, etc.

4. Personal information for radio:

Model No.		MDP-6000
Serial No.		
Purchase date		
Purchaser	Name	
	Address	

※ Please contact Maxon below for Return Merchandise Authorization (RMA) number before you
   send your radio back for service. Shipping to Maxon will be the responsibility of the user.

Maxon America

11535 West 83rd Terrace, Lenexa KS 66214

Tel: 800-456-2071

Fax: 913-859-9550

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