

**Voice and Beep function in the MD9600/RT90**

Turn the MD9600/RT90 on.

If you have uploaded the voice prompts then they will automatically be enabled in level 1 and so you only need to change the menu item if you want to use a different level. The first level that is the default Level 1, voices all the menus but only the channel and talk group etc. when you hit the P2 button. The second level is like the first but if you are voicing a talk group and change something else while it is speaking it will automatically begin voicing the new information, this is called follow on and the third level voices everything all the time without you hitting the P2 button.

If you want to change the voice prompt level then you do this by pressing Enter button on the front panel or the A/B button on the microphone keypad followed by the up or down arrow key until you reach the Options menu and select it by hitting Enter or A/B button again. Then cursor up or down till you reach the sound options menu and select it by hitting the Enter or A/B button. Then cursor up or down to Prompt voice mode. If level 1 is selected it will announce voice mode if level 2 or 3 is selected it will announce voice mode level 2 or 3. Use the rotary knob or microphone keypad b or c buttons to select the mode you want and then hit the Enter or the A/B button to select it.

You can of course change your selection later if you want to at any time. In the following description I will be using Voice Prompts Level 1 (the Default)

**Using the Voice Prompts**

When you turn on the radio you should be in your Home Zone as you only created one zone in the code-plug, so you don't have to worry about selecting a zone.

Whenever you change the channel using the rotary knob or the up and down buttons on the microphone keypad you can voice the channel name by hitting P2. If you are not changing the channel but just want to know what channel the radio is on then just hit P2 again. If it tells you the talk group because that was the last thing you changed and you want to know

the channel then rotate the knob clockwise 1 notch (up 1 channel) followed by rotating the knob 1 notch anticlockwise (down 1 channel) to put you back on the original channel and hit P2 or do a long press of p2 to hear all the zone, channel and talk group information.

As you will have guessed from the last paragraph a similar system is used for Talk-groups. If you hit up arrow on the front panel or C on the microphone keypad you will go up one entry in the talk-group list and if you hit the down arrow or B on the microphone keypad you will go down 1 entry in the talk-group list. Hitting P2 will announce the talk-group.

Pressing the Enter button on the front panel or A/B on the microphone keypad will announce menu and whichever menu you are currently on. Hit the up arrow button or down arrow button on the front panel or the up or down button on the microphone keypad and each new menu item will be announced each time you hit the button. To hear items in this menu hit the Enter front panel button or the A/B button the microphone keypad and you are taken to the second level and can use the up and down arrow buttons to go through the items and the rotary knob or the B and C buttons on the microphone keypad to change them or if they are numeric values use the microphone keypad to enter a value, in any case use the Enter button on the front panel or the A/B button the microphone keypad to confirm the selection or the ESC button on the front panel or the A button the microphone keypad to Cancel and exit without saving.

The MD9600/RT90 has two modes of operation, channel mode and VFO mode. Normally you are in channel mode but if you want to switch to VFO mode then hit the ESC button on the front panel or the A button on the microphone keypad and if you press P2 in VFO mode it will announce the receive and transmit frequencies stored in VFO A. If they are the same then just the frequency will be announced and just once if they are different (repeater) then both will be announced with the words receive and transmit in front of them. To change the receive frequency just type a new frequency on the keypad after you enter the last digit the frequency will be read back to you. So if you want to enter 434.1 then enter 434 then the MD9600/RT90 will say point and then continue the frequency entry with 10000. If the original receive and transmit frequencies were different then OpenMD9600

will assume you are using a repeater and will also alter the transmit frequency with the same frequency split. If you want to alter just the transmit frequency then while in VFO mode just hold D on the microphone keypad for a couple of seconds and then rotate the microphone 1 notch counter clockwise or hit arrow down on the microphone keypad. Now you can enter a frequency just as for receive and you have changed the transmit frequency.

### **Using the Beep function**

Pressing the up arrow key will take you up through the channels you configured for this zone and pressing the down arrow key will take you down through the list of channels. Each time you press a key it will beep and when you reach the first channel in the list it will beep with a higher tone to tell you that you are on the first channel. You can then press the up arrow key a number of times to reach the channel (repeater or hot-spot) that you want to use.

Selecting a talk-group works in the same way using the left and right arrow keys allowing you to find the first talk-group and then click the right arrow key until you reach the talk-group you want to use. Pressing the PTT for half a second or so will now select that talk-group in your hot-spot or on the repeater and you can begin using it but be careful that someone is not already on using the repeater. Remember a repeater will automatically deselect the talk-group if you don't use it for 10 to 15 minutes or so, a hot-spot will stay connected to that group until you select another as it's your own personal repeater.

If you hit the star/asterisk on the microphone or P4 on the front panel it will toggle between Time Slot 1 and Time Slot 2 with a high beep for TS1 and a low beep for TS2. If you are in Voice Level 3 then the time slot will be voiced or if you are in voice Level 1 then you can voice it by hitting P2.

If you hold the D button on the microphone keypad for a short time to latch SK2 and then hit star/asterisk then the MD9600/RT90 will toggle between DMR and Narrow band FM. With a high tone for DMR and a low tone for NBFM. Again if you are in Voice Level 3 then NBFM will be announced. DMR is not announced as the Talk group is announced and so you know

you are in DMR mode and if you are in voice level 1 then you can hit the P2 button to announce FM or the DMR Talk Group.

And now some other functions available on the MD9600/RT90

If you hold the D button on the microphone keypad depressed for a short time and then hit the down arrow key on the front panel or the C button on the microphone keypad then you can reduce the power from maximum to a minimum of 100 milliwatts in a number of steps each change will produce a low beep and when you reach the lowest power setting there is a high beep. 100 milliwatts the lowest setting is ideal for use with a hot-spot. Holding the D button on the microphone keypad depressed for a short time and then hitting up arrow key on the front panel or the B button on the microphone keypad increases the power in steps from 100mW, to 250mW, 500mW, 750mW, 1 Watt, 5 Watts, 10 Watts, 25 Watts and the highest power 40 Watts.

OpenMD9600 has many more functions, too many to cover here but here are a few :-

Unless you set up filters your MD9600/RT90 is always listening in Promiscuous mode that means if you are listening to a repeater you will hear everything that repeater is transmitting on the selected time slot whatever talk-group it is on. This means for example if you have your MD9600/RT90 on TG91 and the repeater is working at the moment on TG2350 then you will hear anyone on the repeater but if you transmit you will transmit on TG91 and they won't hear you and you will switch the repeater to TG91. So if you hear someone and want to work them, if you hit the P1 button (first button to the right of the round orange button the front panel) while someone is talking it will put your MD9600/RT90 on their talk group and then when you transmit they will hear you. If you are using a hot-spot normally it will only be monitoring one talk group, though it is possible to configure a hot spot to monitor more than one. If you change the talk group on your MD9600/RT90 remember to transmit for around half a second to your hot spot to move it to the same talk group.

If you want to use a talk group which is not in your code plug then you just need to hit the hash button, enter the talk group number on the keypad and

then hit the Enter button A/B on the microphone keypad and your MD9600/RT90 is on that talk group.

If you want to go to a reflector rather than a talk group which you may want to do if you use the DMR+ or Phoenix networks then you enter it the same way as for a talk group but enter a reflector number between 4000 and 5000.

If you want to make a private call then press the hash key twice and enter the dmr id of the person you want to speak too and then press the Enter button on the front panel or the A/B button on the microphone keypad. Now you can talk to that person if they are on the network. To return to normal talk group mode just rotate the rotary knob or press the up or down arrow key on the microphone keypad to select a talk group.

If you would like to loan your MD9600/RT90 to a friend. If you type hash 3 times and then press the D key for a short time and then hit the hash key again you get the dmr id on the screen and can enter a new dmr id from the keypad. If you confirm with the Enter button or the A/B button the microphone keypad then it will only remain in operation until you power off the radio and then it will revert back to the original DMR id. If you want to store the new id permanently then confirm by holding the D button for a short time and then press the Enter button or the A/B button on the microphone keypad.