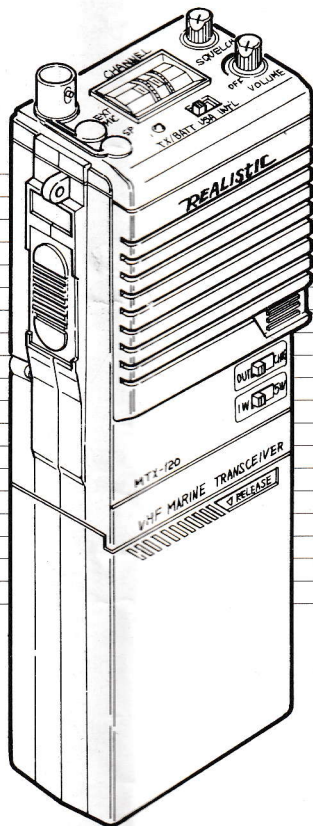


# OWNER'S MANUAL

# MTX-120 VHF MARINE TRANSCEIVER

Please read before using this equipment.



Cat. No. 19-1050

**REALISTIC®**

# FEATURES

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Your Realistic® MTX-120 is one of the most technologically advanced VHF Marine radios available today. It lets you send and receive on any of the USA or international marine channels with instant access to emergency Channel 16. You can also receive all NOAA and international weather channels. The MTX-120 features phase-locked loop frequency synthesis for precise tuning and long-term stability. This radio has been accepted and certified by the FCC for marine use. Other features include:

**Thumbwheel Channel Selection** — allows quick, positive channel selection.

**Dual-Output Power Settings** — lets you select the 1-watt power setting for normal communication or the 5-watt setting for emergency or long distance communication.

**Rechargeable Batteries** — reduces operation cost because the batteries can be reused many times. Extra battery packs are also available by special order.

**Instant Access to Channel 16** — lets you immediately switch to the marine emergency channel (16), even in the dark!

**Built-In Electret Microphone** — gives you exceptional transmission clarity.

## FCC REGULATIONS

You must be familiar with Part 80 of FCC regulations before operating your MTX-120. The operation instructions in this manual conform to Part 80 but do not cover all items in Part 80.

The supplied FCC Form 506 is all you need to license your radio for use on a pleasure craft in domestic waters. Form 506A, which is part of Form 506, provides temporary operation authority while you are waiting for your license. For other licenses and/or information contact:

FCC  
P.O. Box 1040  
Gettysburg, PA 17325

**Caution:** Radio Shack® does not warrant this unit to be waterproofed. When using this unit in a marine environment, care must be taken to prevent spray or water from entering the unit.

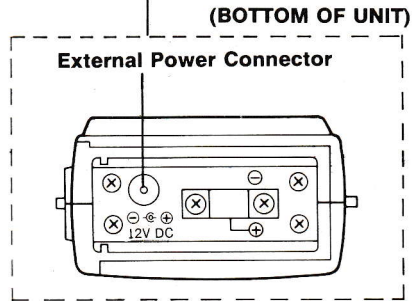
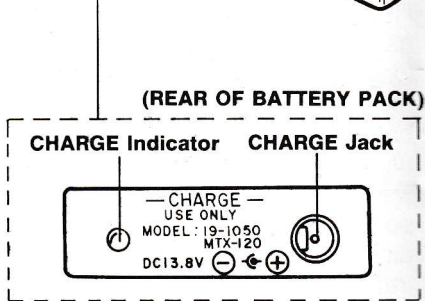
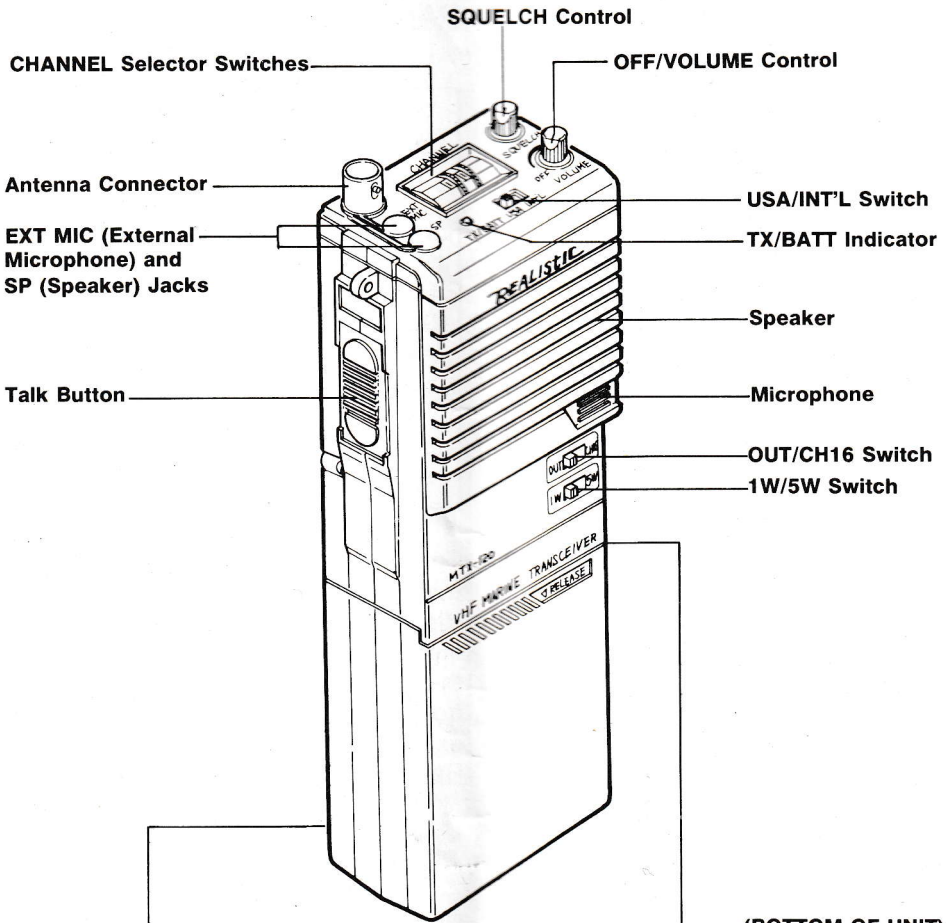
For your own protection, we urge you to record the serial number of this unit in the space provided. You will find the serial number on the rear panel of the unit.

Serial Number \_\_\_\_\_

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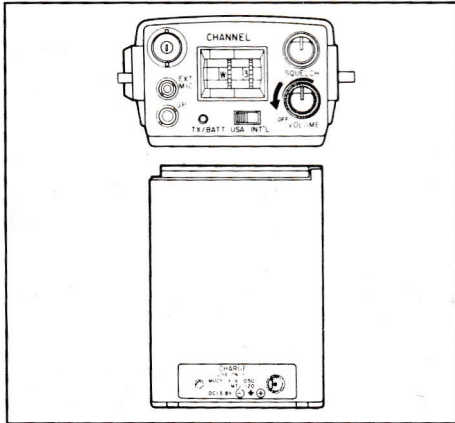
# CONTROL LOCATIONS



# PREPARATION

## CHARGING THE BATTERY PACK

The MTX-120 operates on a built-in rechargeable battery pack. As supplied, the battery pack is fully discharged. You need to fully charge it before using the radio. Use only the supplied charger.

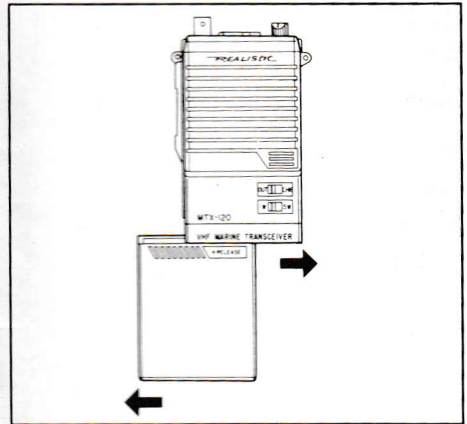


1. Set the OFF/VOLUME switch to OFF.
2. Connect the charger's plug to the CHARGE jack on the rear of the battery pack.
3. Plug the charger into a standard AC outlet. The charge indicator lights.

It takes about 10 hours to charge a battery pack that is fully discharged. Do not use your transceiver while the battery pack is charging.

When the battery needs recharging, the TX/BATT indicator does not light when you press the talk button. Follow the above procedure to recharge the battery pack.

## REMOVING THE BATTERY PACK



To remove the battery pack, hold the upper portion of the transceiver and slide the battery pack in the direction of the RELEASE arrow. You can charge the battery pack while it is detached from the transceiver. You can order extra battery packs from your local Radio Shack store.

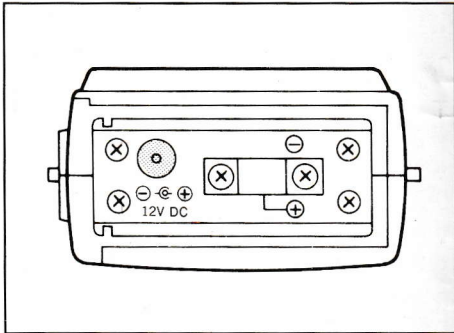
## CARING FOR RECHARGEABLE BATTERIES

Rechargeable lead-acid batteries, such as your car battery, work better and last longer if you keep them fully charged all the time. However, nickel-cadmium batteries, such as the battery pack used in this unit, react in the opposite way. They last longer and deliver more power if you occasionally let them fully discharge. To do this, simply use the transceiver until the TX/BATT indicator does not light when you press the talk button. Then, fully charge the battery pack. If you do not let nickel-cadmium batteries occasionally discharge, they

*forget* how much power they can deliver. For example, they might deliver only 10 to 20 percent of their actual capacity.

## USING AN EXTERNAL POWER SOURCE

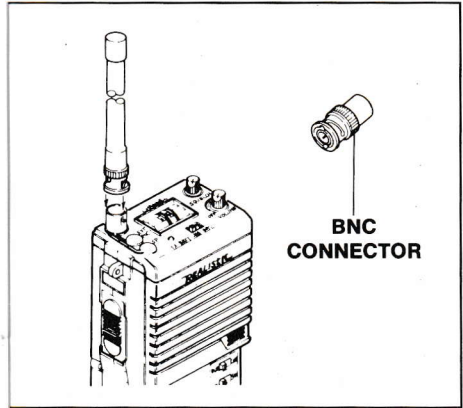
You can operate your MTX-120 from the battery in your boat, if the boat has a 12-volt, negative-ground electrical system. Use only a Radio Shack Cat. No. 270-1528 power cable with the MTX-120.



1. Remove the battery pack.
2. Select the adapter's blue tip and set the tip to positive (+).
3. Attach the power tip to the DC jack on the bottom of the MTX-120.
4. Plug the other end of the power cable into the boat cigarette lighter socket.

**Note:** We recommend you use the battery pack to power the radio. Use external power only for emergency communication when the battery pack is discharged.

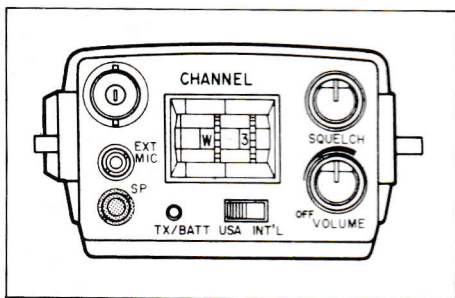
## CONNECTING THE ANTENNA



To connect the supplied flexible antenna to the MTX-120's antenna terminal, slip the slot in the antenna's connector over the protrusion on the antenna terminal. Then, rotate the antenna connector's collar until the antenna locks into place.

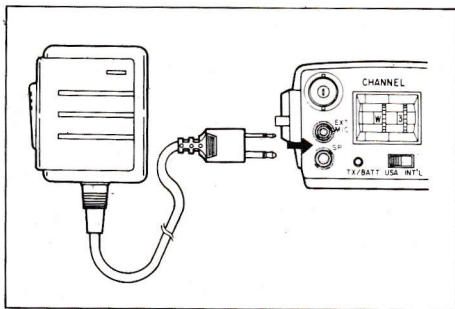
## CONNECTING AN EXTERNAL SPEAKER

In a noisy area, a properly positioned extension speaker can make it easier to hear the radio. We suggest our 8-ohm extension speaker (Cat. No. 21-549). Plug the speaker cable's 1/8" mini plug into the MTX-120's SP jack. This automatically disconnects the built-in speaker.



You can also use the SP jack for the connection of an earphone (such as our Cat. No. 33-175) or mono headphones (Cat. No. 20-210).

## CONNECTING AN EXTERNAL MICROPHONE

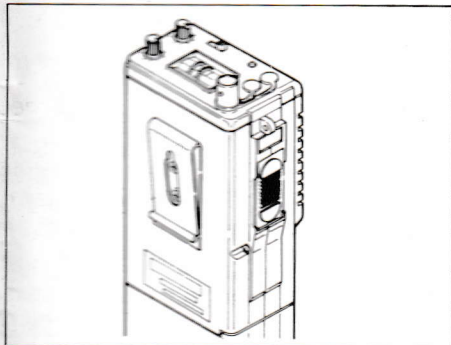


You can connect an optional external microphone (available by special order from Radio Shack) to the MTX-120.

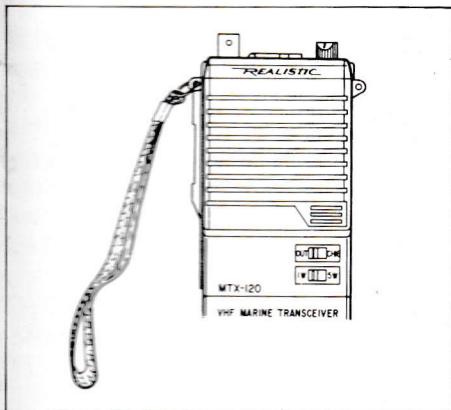
Connect the microphone's submini plug to the EXT MIC jack and its mini plug to the SP jack. Connecting the external microphone disconnects the built-in microphone and speaker and disables the talk button on the radio. Use the talk button on the external microphone to send, the speaker on the external microphone to receive. See "Operation Hints."

## ATTACHING THE BELT CLIP

Use the two screws provided to attach the belt clip to the back of the unit.



## ATTACHING THE HAND STRAP



## CALLING PROCEDURES

---

When making a call using a marine radio, you must use the following calling procedures. If you are already familiar with marine radio calling procedures, proceed to "Operation Hints."

- Channel 16 is the universal calling and safety channel. Your radio goes to this channel automatically when you set the OUT/CH16 switch to CH16. Set the radio to Channel 16 unless a call is in progress on a different channel.
- Listen to Channel 16 for at least two minutes before making a call to be sure the channel is not already in use.
- Make sure that either the supplied flexible antenna or a suitable external antenna is connected before attempting to transmit. Pressing the talk button when no antenna is connected can damage the radio.
- Press the talk button to transmit; the TX/BATT indicator should light. Release the button to listen. If the TX/BATT indicator does not light when you press the button, you need to recharge the battery pack.
- When you are ready for the other party to talk during a call, end your transmission by saying "over."
- When you are ready to end communication, say "*Name of your boat, your call sign, out.*"
- When in a marina or harbor, try first to make calls using the 1-watt power

setting. If you do not receive a response, switch to the 5-watt setting.

- If you do not receive a response to a call after 30 seconds, wait at least two minutes before trying again. If you receive no response after the second try, wait at least fifteen minutes before trying again.
- After making contact on Channel 16, switch to a different channel to continue the call. Channel 16 must be left open for other calls. See "Channel Assignments."

## CALLING ANOTHER BOAT

1. Turn on the radio and select Channel 16. (Set the OUT/CH16 switch to CH16.)
2. Hold the radio so that the microphone almost touches your lips, and press the talk button.
3. Say, "*Name of boat you are calling, this is name of your boat, your call sign.*"
4. Release the talk button and listen for a response.
5. After establishing communication, switch to a ship-to-ship channel. Set the OUT/CH16 switch to OUT, and select a channel using the CHANNEL switches. See "Channel Assignment."
6. When the call is complete, switch back to Channel 16.

## MAKING A SHIP-TO-SHORE CALL

1. Turn on the radio and select the channel used by the shore station. You must set the OUT/CH16 switch to OUT.
2. Hold the radio so that the microphone almost touches your lips, and press the talk button.
3. Say, "*Name of shore station, this is name of your boat, your call sign.*"
4. Release the talk button and listen.
5. When the shore station answers, say "This is *name of your boat, your call sign, your billing number* placing a call to *city, telephone number.*" If you do not have a billing number, tell the operator how you want the call billed.
6. At the end of the call say, "*Name of your boat, your call sign, out.*"
7. Set the OUT/CH16 switch to CH16.

## MAKING AN EMERGENCY CALL

Emergency calls are made on Channel 16 because it is monitored by most marine radio owners. In many areas, the Coast Guard monitors Channel 16 twenty-four hours a day.

There are three levels of emergency calls:

- Mayday is for the most severe situations — when there is grave and imminent danger to people and/or a vessel. Mayday has priority over all other calls.

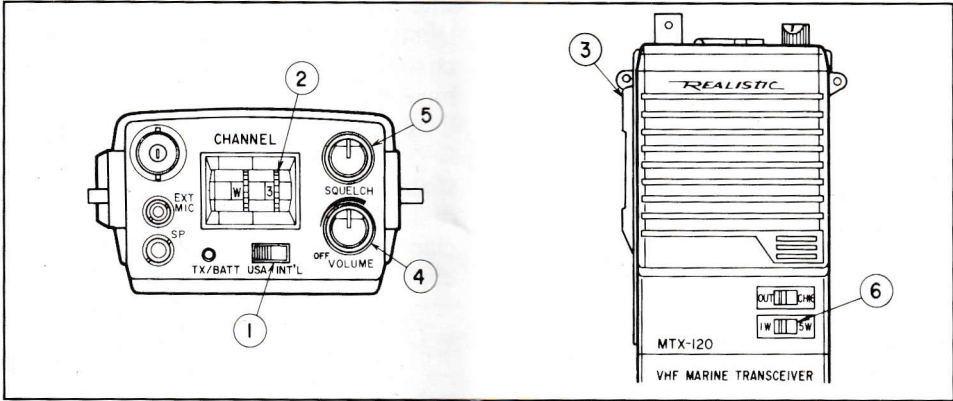
- Pan-Pan is the second level of emergency, when people or vessels are in jeopardy.
- Security is used for messages about the safety of navigation or important weather warnings.

To make an emergency call:

1. Turn on the radio, and set the OUT/CH16 switch to CH16.
2. Set the output power to 5 watts.
3. Hold the radio so that the microphone almost touches your lips, and press the talk button.
4. Say, "Mayday, Mayday! This is *name of your boat, your call sign, name of your boat, your call sign, name of your boat, your call sign.*"
5. Then, give the following information:
  - Your location, including any navigational aids or landmarks.
  - The nature of your emergency.
  - The number of people on the boat and the condition of any injured.
  - The estimated seaworthiness of your boat.
  - A brief description of your boat — length, type, color, and so on.
6. To end the message, say "I will be listening on Channel 16. This is *name of your boat, your call sign, over.*"
7. Release the talk button and listen.
8. Someone should answer. If not, repeat the call beginning with Step 3.

# OPERATION HINTS

## When using the MTX-120:



1. Be sure that the USA/INT'L switch is set to the appropriate position. USA and international channels share the same channel numbers, but use different frequencies. See "Channel Assignment."
2. Use the CHANNEL thumbwheels to select the desired channel. The left wheel selects the first digit of the channel number; the right wheel selects second digit. To listen to a NOAA weather channel, set the left wheel to W and select 1-9 on right wheel.
3. Press and hold the talk button to transmit, and release it to listen.
4. Adjust the VOLUME control for the desired listening level.
5. Adjust the SQUELCH control clockwise until the background noise just disappears. This is the proper squelch setting. If the setting is too high, you won't receive weaker signals. If it is too low, you'll hear background noise all the time. If you are purposely trying to receive a very weak or distant station, set the SQUELCH control fully counter-clockwise.

6. Set the 1W/5W switch to 1W for normal communication. Set it to 5W for emergency or long distance communication.

- To increase the communication range:
- Orient the antenna vertically.
  - Move the unit away from shielding caused by nearby structures.
  - Raise the unit as high as possible over the surrounding terrain.
  - Try an external antenna.

### Cautions:

- Receiving excessively strong signals might cause damage to the receiver. Do not use the unit close to a base station antenna or less than twenty inches from another unit.
- Transmission without an antenna connected might cause damage to the transmitter.
- If the MTX-120 is accidentally subjected to spray or splash, immediately wipe it with a soft cloth. If the unit is contaminated with salt water, wipe it with a soft cloth moistened with fresh water. Then, dry the radio.

## MAINTENANCE

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Your MTX-120 is an example of superior design and craftsmanship. The following suggestions will help you care for the unit so that you can enjoy it for years.

Use and store the product only in normal temperature environments. High temperatures can shorten the life of electronic devices, damage batteries, and distort or melt plastic parts.

Handle the product gently and carefully. Dropping it can damage circuit boards and cases and can cause the product to work improperly.

Keep the product away from dust and dirt, which can cause premature wear of parts.

Wipe the product with a dampened cloth occasionally to keep it looking new. Do not use harsh chemicals, cleaning solvents, or strong detergents to clean the product.

Modifying or tampering with the product's internal components can cause a malfunction and might invalidate the product's warranty. If your product is not performing as it should, take it to your local Radio Shack store. Our personnel can assist you and arrange for service if needed.

## IF YOU HAVE PROBLEMS

If your radio does not operate properly, check the following items first. If you still have a problem, bring the radio to your local Radio Shack for assistance.

**Note:** Repair and/or adjustment of this radio must be performed by a technician with an FCC general-class commercial license.

- Check the battery pack condition.
- If you are using an external antenna, check the antenna cable and its connection at both ends.
- Check the connections of external microphone and external speaker.
- Check the settings of the VOLUME control, SQUELCH control, 1W/5W switch, OUT/CH16 switch, and the CHANNEL switch.

# CHANNEL ASSIGNMENTS

Each of the 90 two-way communication channels is assigned to a specific type of transmission. Misuse of a channel is a violation of FCC regulations.

You can listen to any channel, but with the Ship Radio Station License that you receive by filling out FCC Form 506,

you can only transmit on Channel 16 and channels marked in the list below as "Non Com'l" or "Public Corresp."

Also be sure to observe the ship-to-ship and ship-to-shore assignments of the channels.

## USA VHF FM MARINE CHANNELS

CHANNEL DESIGN	FREQUENCY (MHz)		TYPE TRAFFIC	SHIP TO SHIP	SHIP TO SHORE	PERMANENT SCAN LIST
	SHIP	SHORE				
WX1	—	162.550	NOAA Weather	RX Only	RX Only	Weather
WX2	—	162.400	NOAA Weather	RX Only	RX Only	Weather
WX3	—	162.475	NOAA Weather	RX Only	RX Only	Weather
WX4	—	162.425	NOAA Weather	RX Only	RX Only	Weather
WX5	—	162.450	NOAA Weather	RX Only	RX Only	Weather
WX6	—	162.500	NOAA Weather	RX Only	RX Only	Weather
WX7	—	162.525	NOAA Weather	RX Only	RX Only	Weather
WX8	—	161.650	Can. Weather	RX Only	RX Only	Weather
WX9	—	161.775	Can. Weather	RX Only	RX Only	Weather
01	156.050	156.050	VTS	Yes	Yes	
02	156.100	156.100	Port Ops	Yes	Yes	
03	156.150	156.150	Port Ops	Yes	Yes	
04	156.200	156.200	Port Ops	Yes	Yes	
05	156.250	156.250	VTS	Yes	Yes	
06	156.300	156.300	Safety	Yes	No	
07	156.350	156.350	Com'l	Yes	Yes	Coast Guard
08	156.400	156.400	Com'l	Yes	No	
09	156.450	156.450	Com'l & Non Com'l	Yes	Yes	Fish
10	156.500	156.500	Com'l	Yes	Yes	
11	156.550	156.550	Com'l	Yes	Yes	
12	156.600	156.600	Port Ops	Yes	Yes	
13	156.650	156.650	Navigational	Yes	Yes	
14	156.700	156.700	Port Ops	Yes	Yes	
15	—	156.750	Environmental	RX Only	RX Only	Environmental
16	156.800	156.800	Safety Calling	Yes	Yes	
17	156.850	156.850	State Control	Yes	Yes	
18	156.900	156.900	Com'l	Yes	Yes	
19	156.950	156.950	Com'l	Yes	Yes	
20	157.000	161.600	Port Ops	Yes	Yes	
21	157.050	157.050	Coast Guard	Yes	Yes	Coast Guard
22	157.100	157.100	Coast Guard	Yes	Yes	Coast Guard
23	157.150	157.150	Coast Guard	Yes	Yes	Coast Guard
24	157.200	161.800	Public Corresp.	No	Yes	Busy Tel.
25	157.250	161.850	Public Corresp.	No	Yes	Busy Tel.
26	157.300	161.900	Public Corresp.	No	Yes	Busy Tel.
27	157.350	161.950	Public Corresp.	No	Yes	Busy Tel.
28	157.400	162.000	Public Corresp.	No	Yes	Busy Tel.
60	156.025	156.025				
61	156.075	156.075				
62	156.125	156.125				
63	156.175	156.175				
64	156.225	156.225				
65	156.275	156.275	Port Ops	Yes	Yes	
66	156.325	156.325	Port Ops	Yes	Yes	
67	156.375	156.375	Com'l	Yes	No	
68	156.425	156.425	Non Com'l	Yes	Yes	Fish
69	156.475	156.475	Non Com'l	Yes	No	Fish
70	156.525	156.525	Non Com'l	Yes	Yes	Fish
71	156.575	156.575	Non Com'l	Yes	Yes	Fish
72	156.625	156.625	Non Com'l	Yes	No	Fish
73	156.675	156.675	Port Ops	Yes	Yes	
74	156.725	156.725	Port Ops	Yes	Yes	
77	156.875	156.875	Port Ops	Yes	No	
78	156.925	156.925	Non Com'l	Yes	Yes	Fish
79	156.975	156.975	Com'l	Yes	Yes	
80	157.025	157.025	Com'l	Yes	Yes	
81	157.075	157.075	Coast Guard	Yes	Yes	
82	157.125	157.125	US Gov Only	Yes	Yes	Coast Guard
83	157.175	157.175	Coast Guard	Yes	Yes	
84	157.225	161.825	Public Corresp.	No	Yes	Busy Tel.
85	157.275	161.875	Public Corresp.	No	Yes	Busy Tel.
86	157.325	161.925	Public Corresp.	No	Yes	Busy Tel.
87	157.375	161.975	Public Corresp.	No	Yes	Busy Tel.
88	157.425	157.425	Com'l	Yes	No	

# INTERNATIONAL VHF FM MARINE CHANNELS

CHANNEL DESIGN	FREQUENCY (MHz)		TYPE TRAFFIC	SHIP TO SHIP	SHIP TO SHORE	PERMANENT SCAN LIST
	SHIP	SHORE				
WX1	—	162.550	NOAA Weather	RX Only	RX Only	Weather
WX2	—	162.400	NOAA Weather	RX Only	RX Only	Weather
WX3	—	162.475	NOAA Weather	RX Only	RX Only	Weather
WX4	—	162.425	NOAA Weather	RX Only	RX Only	Weather
WX5	—	162.450	NOAA Weather	RX Only	RX Only	Weather
WX6	—	162.500	NOAA Weather	RX Only	RX Only	Weather
WX7	—	162.525	NOAA Weather	RX Only	RX Only	Weather
WX8	—	161.650	Can. Weather	RX Only	RX Only	Weather
WX9	—	161.775	Can. Weather	RX Only	RX Only	Weather
01	156.050	160.650	VTS	Yes	Yes	
02	156.100	160.700	Port Ops	Yes	Yes	
03	156.150	160.750	Port Ops	Yes	Yes	
04	156.200	160.800	Port Ops	Yes	Yes	
05	156.250	160.850	VTS	Yes	Yes	
06	156.300	156.300	Safety	Yes	No	
07	156.350	160.950	Com'I	Yes	Yes	
08	156.400	156.400	Com'I	Yes	No	
09	156.450	156.450	Com'I & Non Com'I	Yes	Yes	Fish
10	156.500	156.500	Com'I	Yes	Yes	
11	156.550	156.550	Com'I	Yes	Yes	
12	156.600	156.600	Port Ops	Yes	Yes	
13	156.650	156.650	Navigational	Yes	Yes	
14	156.700	156.700	Port Ops	Yes	Yes	
15	156.750	156.750	Environmental	Yes	Yes	Environmental
16	156.800	156.800	Safety Calling	Yes	Yes	
17	156.850	156.850	State Control	Yes	Yes	
18	156.900	161.500	Com'I	Yes	Yes	
19	156.950	161.550	Com'I	Yes	Yes	
20	157.000	161.600	Port Ops	Yes	Yes	
21	157.050	161.650	Coast Guard	Yes	Yes	
22	157.100	161.700	Coast Guard	Yes	Yes	
23	157.150	161.750	Coast Guard	Yes	Yes	
24	157.200	161.800	Public Corresp.	No	Yes	Busy Tel.
25	157.250	161.850	Public Corresp.	No	Yes	Busy Tel.
26	157.300	161.900	Public Corresp.	No	Yes	Busy Tel.
27	157.350	161.950	Public Corresp.	No	Yes	Busy Tel.
28	157.400	162.000	Public Corresp.	No	Yes	Busy Tel.
60	156.025	160.625				
61	156.075	160.675				
62	156.125	160.725				
63	156.175	160.775				
64	156.225	160.825				
65	156.275	160.875	Port Ops	Yes	Yes	
66	156.325	160.925	Port Ops	Yes	Yes	
67	156.375	156.375	Com'I	Yes	No	
68	156.425	156.425	Non Com'I	Yes	Yes	Fish
69	156.475	156.475	Non Com'I	Yes	Yes	Fish
70	156.525	156.525	Non Com'I	Yes	No	Fish
71	156.575	156.575	Non Com'I	Yes	Yes	Fish
72	156.625	156.625	Non Com'I	Yes	No	Fish
73	156.675	156.675	Port Ops	Yes	Yes	
74	156.725	156.725	Port Ops	Yes	Yes	
77	156.875	156.875	Port Ops	Yes	No	
78	156.925	161.525	Non Com'I	Yes	Yes	
79	156.975	161.575	Com'I	Yes	Yes	
80	157.025	161.625	Com'I	Yes	Yes	
81	157.075	161.675	Coast Guard	Yes	Yes	
82	157.125	161.725	US Gov Only	Yes	Yes	Coast Guard
83	157.175	161.775	Coast Guard	Yes	Yes	
84	157.225	161.825	Public Corresp.	No	Yes	Coast Guard
85	157.275	161.875	Public Corresp.	No	Yes	Busy Tel.
86	157.325	161.925	Public Corresp.	No	Yes	Busy Tel.
87	157.375	161.975	Public Corresp.	No	Yes	Busy Tel.
88	157.425	162.025	Com'I	Yes	No	Busy Tel.

The USA and international marine channels share the same channel numbers. They do not, however, always use the same frequencies. Also, many of the international channels use different

frequencies for transmitting and receiving on a particular channel. Be sure that you set the USA/INT'L switch to the appropriate position.

## **ADDITIONAL FCC REGULATIONS**

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The Marine Radiotelephone Service is under the jurisdiction of the Federal Communications Commission (FCC). Any adjustments or alterations which would alter the performance of the transceivers original FCC type acceptance or would change the frequency determining method are strictly prohibited.

Replacement or substitution of crystals, transistors, IC's, regulator diodes or any other part of a unique nature, with parts other than those recommended by us, may cause violation of the technical regulations of the FCC rules or violation of type acceptance requirements of the rules.

Before operating the radiotelephone, you must obtain your license. It is illegal to transmit without the appropriate license which can be obtained by submitting a completed FCC Form 506 (included) to the FCC. Furthermore, you are required to understand Part 80 of the FCC Rules and Regulations prior to the operation of your radiotelephone. It is the user's responsibility to see that this unit is operating at all times in accordance with the FCC Rules and Regulations.

# SPECIFICATIONS

## GENERAL

Frequency of Operation:	(TX):	156.025 MHz to 157.425 MHz
	(RX):	156.025 MHz to 162.550 MHz
Channel:	(TX):	55
	(RX):	90 (9WX)
Channel Display:		Digital Switch
Frequency Tolerance and Stability:	(TX):	$\pm 0.001\%$
	(RX):	$\pm 0.001\%$
Speaker:		16 ohm/0.4W
Nominal Dimension:		8-9/32" x 2-17/32 x 1-3/8" (HWD)
		(210 x 64 x 35mm)
Weight:	Total:	1.3 lbs. (570g)
	Body:	0.9 lb. (300g)
	Battery:	0.4 lb. (270g)
Power Source:		11V DC, (Battery 700mAH)

## TRANSMITTER

Carrier Power:		5W/1W
Audio Response:		Meets FCC Spec (+1 to -3 dB)
Maximum Deviation:		$\pm 4.7$ kHz
Modulation Distortion:		5%
Hum & Noise:		40 dB
Spurious & Harmonic Emission:		70 dB
Battery Drain:	High:	1.0A
	Low:	0.5A

## RECEIVER

Sensitivity:	12 dB SINAD:	0.35 $\mu$ V
	20 dB SN:	0.5 $\mu$ V
Squelch Sensitivity:	Threshold:	0.18 $\mu$ V
	Tight:	1.0 $\mu$ V
Audio Response:		Meets FCC Spec (+2 to -8 dB)
Audio Output Power at 10% THD:		0.5W
S/N Ratio:	Squelched:	50 dB
Adjacent Channel Selectivity:		50 dB
Intermodulation Spurious Response:		50 dB
Spurious Response Level:		60 dB
Battery Drain: MAX.	Power:	200mA
	No Signal:	40mA

# NOTES

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### **RADIO SHACK LIMITED WARRANTY**

This product is warranted against defects for 1 year from date of purchase from Radio Shack company-owned stores and authorized Radio Shack franchisees and dealers. Within this period, we will repair it without charge for parts and labor. Simply bring your **Radio Shack sales slip** as proof of purchase date to any Radio Shack store. Warranty does not cover transportation costs. Nor does it cover a product subjected to misuse or accidental damage.

**EXCEPT AS PROVIDED HEREIN, RADIO SHACK MAKES NO WARRANTIES, EXPRESS OR IMPLIED, INCLUDING WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.** Some states do not permit limitation or exclusion of implied warranties; therefore, the aforesaid limitation(s) or exclusion(s) may not apply to the purchaser.

This warranty gives you specific legal rights and you may also have other rights which vary from state to state.

*We Service What We Sell*

**RADIO SHACK**  
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**Fort Worth, Texas 76102**