

Operating Procedures - Distress, Urgency and Safety

If you have an emergency, plan to use your VHF set as well as your marine single sideband to call out for help. If you are within 100 miles of the shore, first try your VHF on the international distress channel, Channel 16. If you are far out to sea and do not receive immediate response on VHF Channel 16, your next step is to switch to long-range single sideband.

First try 2187.5 kHz, the international distress call for marine single sideband. If after three attempts you do not receive an immediate reply to your distress call, then switch to any frequency where you hear strong signals. The marine operator is always a good one. Use any frequency on your marine sideband that will get a response from another station.

Here are the procedures for placing or acknowledging a distress call on your marine single side band, as well as for your VHF marine transceiver. These are the approved procedures as outlined by the Radio Technical Commission for Maritime Services in cooperation with the Federal Communications Commission.

◆ *Spoken Emergency Signals*

There are three spoken emergency signals:

(1) Distress Signal: MAYDAY

Distress signal MAYDAY is used to indicate that a mobile station is threatened by grave and immediate danger and requests immediate assistance. MAYDAY has priority over all other communications.

(2) Urgency Signal: PAN-PAN (Properly pronounced PAHN-PAHN)

Used when the safety of the vessel or person is in jeopardy.

"Man overboard" messages are sent with the Urgency signal. PAN-PAN has priority over all other communications with the exception of distress traffic.

(3) Safety Signal: SECURITY (Pronounced SAY-CURITAY)

Used for messages concerning the safety of navigation or giving important meteorological warnings.

Any message headed by one of the emergency signals (MAYDAY, PAN-PAN, or SECURITY), must be given precedence over routine communications. This means listen. Don't transmit. Be prepared to help if you can. The decision of which of these emergency signals to use is the responsibility of the person in charge of the vessel.

◆ *Radiotelephone Alarm Signal* [notes indicate this rule changes in 1999 -- 2187.5]

This signal consists of two audio frequency tones transmitted alternately. This signal is similar in sound to a two-tone siren used by some ambulances. When generated by automatic means, it shall be sent as continuously as practicable over a period of not less than 30 seconds nor more than one minute. The purpose of the signal is to attract the attention of the person on watch or to actuate automatic alarm devices. The radiotelephone alarm signal shall be used only with the distress signal except in the situation discussed in the section dealing with the Urgency Call and Message Procedures.

◆ *Distress Call and Message*

SENDING: Distress Call and Message

First send the Radiotelephone Alarm Signal, if available.

- (1) Distress signal MAYDAY (spoken three times)
- (2) The words THIS IS (spoken once)
- (3) Name of vessel in distress (spoken three times) and call sign (spoken once)

The Distress Message immediately follows the Distress Call and consists of:

- (4) Distress signal MAYDAY (spoken once)
- (5) Name of vessel (spoken once)
- (6) Position of vessel in distress by latitude and longitude or bearing (true or magnetic, state which) and distance to a well-known landmark such as a navigational aid or small island, or in any terms which will assist a responding station in locating the vessel in distress. Include any information on vessel movement such as course, speed, and destination.
- (7) Nature of distress (sinking, fire, etc.)
- (8) Kind of assistance desired
- (9) Any other information which might facilitate rescue, such as: length or tonnage of vessel, number of persons on board, and number needing medical attention, color of hull, decks, cabin, masts, etc. (10) The word OVER

EXAMPLE: Distress Call and Message

(Send Radiotelephone Alarm Signal, if available, for at least 30 seconds but not more than one minute)

"MAYDAY-MAYDAY-MAYDAY
THIS IS-BLUE DUCK-BLUE DUCK-BLUE DUCK-WA 1234
MAYDAY-BLUE DUCK
DUNGENESS LIGHT BEARS 185 DEGREES
MAGNETIC-DISTANCE 2 MILES
STRUCK SUBMERGED OBJECT
NEED PUMPS-MEDICAL ASSISTANCE AND TOW
THREE ADULTS-TWO CHILDREN ABOARD
ONE PERSON COMPOUND FRACTURE OF ARM
ESTIMATE CAN REMAIN AFLOAT TWO HOURS
BLUE DUCK IS THIRTY-TWO FOOT CABIN CRUISER
BLUE HULL-WHITE DECK HOUSE
OVER"

NOTE: Repeat at intervals until answer is received. If no answer is received on the Distress frequency, repeat using any other available channel on which attention might be attracted.

◆ ***Acknowledgment of Distress Message***

If you hear a Distress Message from a vessel and it is not answered, then YOU must answer. If you are reasonably sure that the distressed vessel is not in your vicinity, you should wait a short time for others to acknowledge. In any event, you must log all pertinent details of the Distress Call and Message.

SENDING: Acknowledgment of Receipt of Distress Message

Acknowledgment of receipt of a Distress Message usually includes the following:

- (1) Name of vessel sending the Distress Message
(spoken three times)
- (2) The words THIS IS (spoken once)
- (3) Name of your vessel (spoken three times)
- (4) The words RECEIVED MAYDAY (spoken once)
- (5) The word OVER (spoken once)

EXAMPLE: Acknowledgment Message

"BLUE DUCK-BLUE DUCK-BLUE DUCK-WA 1234
THIS IS-WHITE WHALE-WHITE WHALE-WHITE
WHALE-WZ4321
RECEIVED MAYDAY
OVER"

◆ ***Offer of Assistance***

After you acknowledge receipt of the distress message, allow a short interval of time for other stations to acknowledge receipt, if any are in a position to assist. When you are sure of not interfering with other

distress-related communications, contact the vessel in distress and advise them what assistance you can render. Make every effort to notify the Coast Guard. The offer-of-assistance message shall be sent only with the permission of the person in charge of your vessel.

SENDING: Offer-of-Assistance Message

The Offer-of-Assistance Message usually includes the following:

- (1) Name of the distressed vessel (spoken once)
- (2) The words THIS IS (spoken once)
- (3) Name of the calling vessel (spoken once)
- (4) The word OVER (spoken once)
- (5) (On hearing an acknowledgment, ending with the word OVER from the distressed vessel, continue with your offer of assistance message.)
- (6) Name of calling vessel and radio call sign (spoken once)
- (7) The word OVER (spoken once)

EXAMPLE: Offer-of-Assistance

To be sent after a short interval of time, but long enough to be sure that further transmissions will not cause harmful interference and long enough to work out relative position and time to reach the distressed vessel:

"BLUE DUCK-THIS IS-WHITE WHALE-OVER
(on hearing the word OVER from BLUE DUCK, continue)
I AM PROCEEDING TOWARD YOU PROM TEN MILES
WESTWARD EXPECT TO ARRIVE IN ONE HOUR
COAST GUARD HAS BEEN NOTIFIED INCLUDING
YOUR NEED FOR DOCTOR
I HAVE ONE INCH PORTABLE PUMP
PLEASE ADVISE IF MY ASSISTANCE IS NOT NEEDED
WHITE WHALE-WZ4321-OVER"

◆ *Urgency Call and Message Procedures*

The Urgency Call begins with the emergency signal, consisting of three repetitions of the group of words PAN-PAN (pronounced PAHN-PAHN). The Urgency Call and Message is transmitted on VHF Channel 16 (or 2182 kHz, in the same way as the Distress Call and Distress Message). The Urgency signal PAN-PAN indicates that the calling person has a message concerning the safety of the vessel, or a person in jeopardy. The Urgency signal is authorized for situations like the following:

- Transmission of an urgent storm warning by an authorized shore station.
- Loss of person overboard but only when the assistance of other vessels is required.
- No steering or power in shipping lane.

SENDING: Urgency Call and Message

The Urgency Call and Message usually include the following:

- (1) The Urgency signal PAN-PAN PAN-PAN PAN-PAN
- (2) Addressee-ALL STATIONS (or a particular station)
- (3) The words THIS IS (spoken once)
- (4) Name of calling vessel (spoken three times) and call sign (spoken once)
- (5) The Urgency Message (state the urgent problem)
- (6) Position of vessel and any other information that will assist responding vessels. Include description of your vessel, etc.
- (7) The words THIS IS (spoken once)
- (8) Name of calling vessel and radio call sign (spoken once)
- (9) The word OVER

EXAMPLE: Urgency Call and Message

(Not involving possible use of radiotelephone alarm)

"PAN-PAN PAN-PAN PAN-PAN-ALL-STATIONS
(or a particular station)
THIS IS-BLUE DUCK-BLUE DUCK-BLUE DUCK
HAVE LOST MY RUDDER
AM DRIFTING TOWARD SHORE AND REQUIRE TOW
SEVEN PERSONS ON BOARD
BLUE DUCK IS THIRTY-TWO FOOT CABIN
CRUISER - BLUE HULL
WHITE DECK HOUSE
THIS IS-BLUE DUCK-WA 1234
OVER"

◆ *Safety Call and Message Procedures*

The Safety Call, headed with the word SECURITY (SAY-CURITAY, spoken three times), is transmitted on the Distress and Calling frequency (VHF Channel 16 or 2182 kHz), together with a request to shift to a working frequency where the Safety Message will be given. The Safety Message may be given on any available working frequency.

United States Coast Guard stations routinely use the Safety Call SECURITY to alert boating operators that they are preparing to broadcast a message concerning safety of navigation. The call also precedes an important meteorological warning. The Safety Message itself is usually broadcast on Coast Guard Channel 22A (157.1 MHz) and 2670 kHz. Although recreational boating operators may use the Safety Signal and Message, in many cases they would get better results and perhaps suffer less criticism by giving the information to the Coast Guard without making a formal Safety Call. The Coast Guard usually has better broadcast coverage from its shore stations and will rebroadcast the information if it is appropriate.

SENDING: The Safety Call and Message

The Safety Call usually includes the following: (On VHF Channel 16 or 2182 kHz.)

- (1) The Safety Signal SECURITY (spoken three times)
- (2) Addressee-ALL STATIONS (or a particular station)
- (3) The words THIS IS (spoken once)
- (4) Name of vessel calling and radio call sign
- (5) Announcement of the working channel (frequency) where the Safety Message will be given
- (6) Radio Call Sign
- (7) The word OUT

The Safety Message usually includes the following: (Select working channel (frequency) announced in step 5 above)

- (1) The Safety Signal SECURITY (spoken three times)
- (2) The words ALL STATIONS (spoken once)
- (3) The words THIS IS (spoken once)
- (4) Give the Safety Message
- (5) Repeat the Radio Call Sign
- (6) The word OUT

EXAMPLES: Safety Call and Message

(On VHF Channel 16)

"SECURITY-SECURITY-SECURITY-ALL STATIONS
THIS IS-BLUE DUCK-WA 1234
LISTEN CHANNEL 68
WA 1234-OUT"

(On VHF Channel 68)

"SECURITY-SECURITY-Security-ALL STATIONS
THIS IS-BLUE DUCK-WA 1234
A LOG APPROXIMATELY TWENTY FEET LONG
TWO FEET IN DIAMETER ADRIFT OFF HAINS
POINT
POTOMAC RIVER
WA 1234-OUT"

◆ *Coast Guard Channels*

The government frequency 2182 kHz and 2670 kHz are widely used by recreational boating operators for communicating with U.S. Coast Guard shore stations and ship stations, and with USCG Auxiliary vessels when these vessels are operating under orders. When using these channels, you must first establish communications on the appropriate calling frequency, 2182 kHz on the following long range Coast Guard channels:

COAST GUARD CHANNELS			
Your Transmit	Your Receive	I.T.U. Channels	Remarks
2182 kHz	2182 kHz	None	International distress & calling frequency to all Coast Guard & Rescue agencies worldwide.
2670 kHz	2670 kHz	None	U.S. Coast Guard working channel.
4134 kHz	4426 kHz	424	500-mile Coast Guard working channel.
6200 kHz	6501 kHz	601	Gulf Coast Guard working channel.
8240 kHz	8764 kHz	816	Medium-range Coast Gaurd working channel.
12242 kHz	13089 kHz	1205	Long-range 24-hour Coast Guard working channel.
16432 kHz	17314 kHz	1625	Day/evening long-range Coast Gaurd working channel.

TIP!

Consult your ICOM SSB frequency chart to see where these channels are in your set's memory.

◆ Operating Procedures - Regular Communications

It's very important that you monitor a frequency at least one minute prior to transmitting over it. This insures that you won't "cover up" any communications that may be going on that you might not hear clearly at first. Always wait until a frequency is clear before transmitting.

The following procedures for operating your marine SSB are approved by the Radio Technical Commission for Maritime Services in cooperation with the Federal Communications Commission:

Safety Frequencies

The following table describes the distress and safety frequencies between 4000-27,500 kHz for ship and coast stations, public and private, operating voice radiotelephony (HF-SSB).

SAFETY FREQUENCIES	
FREQUENCY	CHANNEL DESIGNATOR
4125.0	"4 Safety"
6125.0	"6 Safety"
8291.0	"8 Safety"
12290.0	"12 Safety"
16420.0	"16 Safety"

Operating Procedures (other than Distress, Urgency and Safety)

◆ *Maintain a Watch*

Whenever your marine VHF or SSB radio is turned on, keep the receiver tuned to the appropriate distress and calling frequency, 156.8 (VHF Channel 16) or 2182 kHz. This listening watch must be maintained at all times the station is in operation and you are not actually communicating. The Coast Guard maintains a silent period on 2182 kHz for three minutes immediately after the hour and for three minutes immediately after the half hour. During these silent periods only messages or transmissions concerning distress or urgency are made.

Since this watch is required for safety and to facilitate communications by providing a common calling channel, it is not permissible for one vessel in a fleet of vessels traveling together to maintain this watch while the other vessels guard another channel, such as a common intership channel. You may maintain a watch on a working channel, however, and may establish communications directly on that channel provided you simultaneously maintain your watch on the distress and calling channel.

Record the times you maintain this watch in your Radio Log.

◆ *Choose the Correct Channel or Frequency*

Ship-to-Ship Channels

Each of the marine frequencies and channels is authorized for a specific type of communication. It is required that you choose the correct channel for the type of communication you are making. For example, certain channels are set aside exclusively for intership use. See the following chart.

SHIP FREQUENCIES (SIMPLEX) (USB)

MINIMUM RANGE	INFORMAL CHNL CODE	FREQUENCY kKz	BEST TIME
50 miles	Ship 2-A	2065.0	Night
50 miles	Ship 2-B	2079.0	Night
50 miles	Ship 2-C	2096.5	Night
50 miles	Ship 3-A	3023	Night
150 miles	Ship 4-A	4146	Night
150 miles	Ship 4-B	4149	Night
150 miles	Ship 4-C	4417	Night
170 miles	Ship 5-S	5680	Day/Night
200 miles	Ship 6-A	6224	Day/Night
200 miles	Ship 6-B	6227	Day/Night
200 miles	Ship 6-C	6230	Day/Night
200 miles	Ship 6-D	6516	Day/Night
400 miles	Ship 8-A	8294	Day
400 miles	Ship 8-B	8297	Day
1000 miles	Ship 12-A	12353	Day
1000 miles	Ship 12-B	12356	Day
1000 miles	Ship 12-C	12359	Day
5000 miles	Ship 16-A	16528	Day
5000 miles	Ship 16-B	16531	Day
5000 miles	Ship 16-C	16534	Day
5000 miles	Ship 18-A	18840	Day
5000 miles	Ship 18-B	18843	Day
10,000 miles	Ship 22-A	22159	Day
10,000 miles	Ship 22-B	22162	Day
10,000 miles	Ship 22-C	22165	Day
10,000 miles	Ship 22-D	22168	Day
10,000 miles	Ship 22-E	22171	Day
10,000 miles	Ship 25-A	25115	Day
10,000 miles	Ship 25-B	25118	Day

◆ *Calling Another Ship*

Turn your radiotelephone on and listen on the appropriate distress and calling frequency, 2182 kHz, to make sure it is not being used. If it is clear, put your transmitter on the air. This is usually done by depressing the "push to talk" button on the microphone. (To hear a reply, you must release this button.)

Speak directly into the microphone in a normal tone of voice. Speak clearly and distinctly. Call the vessel with which you wish to communicate by using its name; then identify your vessel with its name and FCC assigned call sign. Do not add unnecessary words and phrases as "COME IN BOB" or "DO YOU READ ME." Limit the use of phonetics to poor transmission conditions.

This preliminary call must not exceed 30 seconds. If contact is not made, wait at least two minutes before repeating the call. After this time interval, make the call in the same manner. This procedure may be repeated no more than three times. If contact is not made during this period, you must wait at least 15 minutes before making your next attempt.

Once contact is established on 2182 kHz, you must switch to an appropriate working frequency for further communication. You may only use VHF Channel 16 and 2182 kHz for calling, and in emergency situations.

Since switching to a working frequency is required to carry out the actual communications, it is often helpful to monitor the working frequency you wish to use, briefly, before initiating the call on 2182 kHz. This will help prevent you from interrupting other users of the channel.

All communications should be kept as brief as possible and at the end of the communication, each vessel is required to give its call sign, after which, both vessels switch back to the distress and calling channel in order to reestablish the watch.

Two examples of acceptable forms for establishing communication with another vessel follow:

EXAMPLE 1	
VESSEL	VOICE TRANSMISSION
BLUE DUCK (on 2182 kHz)	"MARYJANE-THIS IS-BLUE DUCK-WA 1234"
MARY JANE (on 2182 kHz)	"BLUE DUCK-THIS IS-MARY JANE- WA 5678-REPLY 8A" (or some toher proper working channel.)
BLUE DUCK (on 2182 kHz)	"8A" ie "ROGER" (If unable to replay on the channel selected, an appropriate alternate should be selected.)
BLUE DUCK (on working channel 8A)	"BLUE DUCK"
MARY JANE (on working channel 8A)	"MARY JANE"
BLUE DUCK (on working channel 8A)	(Continue with message and terminate communications within three minutes. At the end of the communications, each vessel gives its call sign.)

EXAMPLE 2	
VESSEL	VOICE TRANSMISSION
BLUE DUCK (on 2182 kHz)	"MARYJANE-BLUE DUCK-WA 1234-REPLY"
MARY JANE (on 4A)	"MARY JANE-WA 5678"
BLUE DUCK (on 4A)	"BLUE DUCK" (Continues message and terminate communicaitons as indicated in example 1)

A short form most useful when both parties
are familiar with it