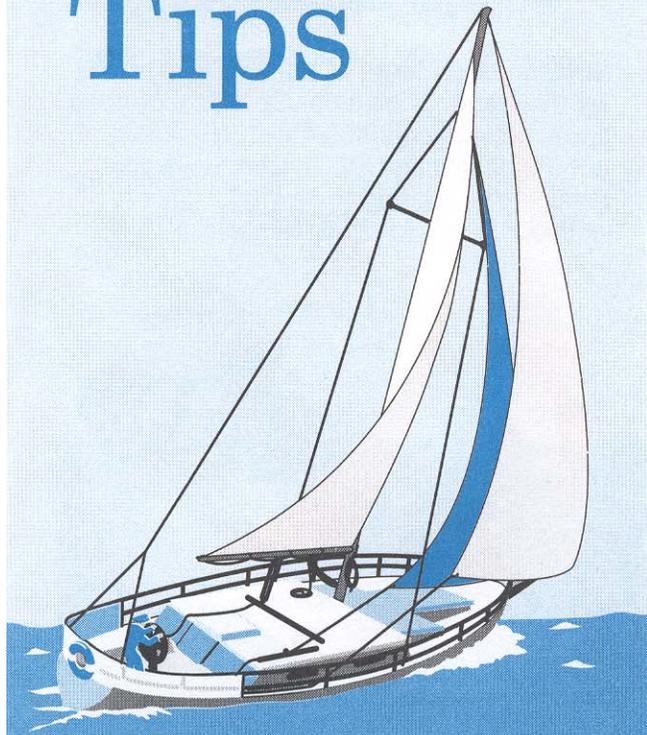


Safe Boating Weather Tips



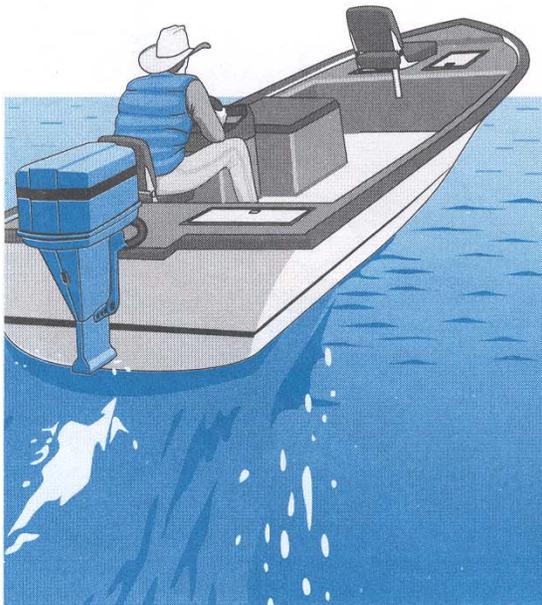
*...because you know
the weather*

You know the weather...

It can be both friend and foe. Calm winds and seas make for enjoyable power boating, waterskiing, and fishing. A fresh breeze and a light chop provide an invigorating sailing or wind surfing experience. But the sudden emergence of dark clouds, shifting and gusty winds, torrential downpours and lightning can turn a day's pleasure into a nightmare of distress. Here are some tips on how to keep your pleasure and safety to a maximum.

Plan for boating fun...

Several days ahead of time start listening for the National Weather Service extended 5-day outlooks on NOAA Weather Radio, AM/FM radio, and TV. The outlooks give general information to help you decide whether or not to continue making plans.



Before setting out...

Pay close attention to the TV weathercast and listen to detailed marine weather forecasts on NOAA Weather Radio. Take note of small boat cautionary statements, Small Craft Advisories, or Gale or Storm Warnings in the forecasts. The Advisories and Warnings (see definitions) alert mariners to higher winds and waves either occurring now or forecast to occur up to 24 hours from now. Advisories and Warnings for conditions expected later give mariners time to take action to protect life and property.



After setting out...

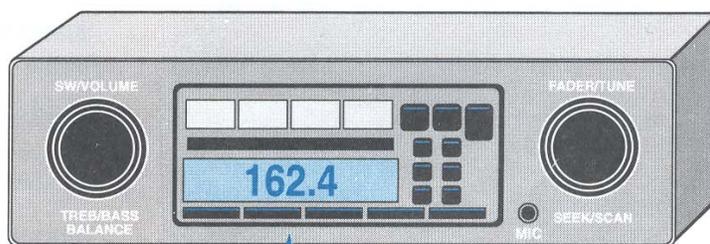
Don't touch that dial! Stay tuned to NOAA Weather Radio. You know the weather — it changes! The change often occurs out of your sight and may be headed your way. Updated warnings and forecasts are aired immediately on NOAA Weather Radio, alerting you to changes that may require action on your part. But you can help yourself...It's up to YOU!

While on the water, stay alert...

- Check NOAA Weather Radio broadcasts for latest warnings and forecasts.
- Watch for signs of approaching storms:
 - dark, threatening clouds which may foretell a squall or thunderstorm.
 - a steady increase in wind or sea.
 - lightning flashes.
- An increase in wind opposite in direction to a strong tidal current may lead to steep waves capable of broaching a boat.
- Heavy static on your AM radio may be an indication of nearby thunderstorm activity.
- If a thunderstorm is approaching, head for shore if possible. Get out of your boat and away from the water. Find shelter immediately.
- If a thunderstorm catches you while afloat, remember that gusty winds and lightning pose a threat to safety.
 - put on your personal flotation device and prepare for rough seas.
 - stay below deck if possible.
 - keep away from metal objects that are not grounded to the boat's protection system.
 - don't touch more than one grounded object at the same time (or you may become a shortcut for electrical surges passing through the protection system).

Radio Tips

If you have a VHF transceiver with built-in NOAA Weather Radio channels, **use them**. If your VHF radio is not equipped with weather channels, you may want to buy a VHF weather radio — they're readily available. Keep in mind, however, broadcast reception varies with the location of you and the transmitter, the quality of the radio, and any obstructions. A broad, average range is 20 to 40 miles. If you venture beyond that range, you should



consider buying a good quality HF single sideband transceiver to add to your VHF. It may be more expensive, but it is worth it to be able to get the information that may save your life and property.

**A Gale Warning
is in effect
for...**

Definitions

Small Craft Advisory: Observed or forecast winds of 18 to 33 knots – Small Craft Advisories may also be issued for hazardous sea conditions or lower wind speeds that may affect small craft operations. Issued up to 12 hours ahead of conditions. (There is no legal definition of the term “small craft”.)

Gale Warning: * Observed or forecast winds of 34 to 47 knots.

Storm Warning: * Observed or forecast winds of 48 knots or greater.

Tropical Storm Warnings: * Observed or forecast winds of 34 to 63 knots associated with a tropical storm.

Hurricane Warning: * Observed or forecast winds of 64 knots or higher associated with a hurricane.

Special Marine Warning: Observed or forecast winds of 34 knots or more associated with a squall or thunderstorm and expected to last for 2 hours or less.

*Issued up to 24 hours ahead of conditions.

Contact the National Weather Service

office nearest you for the following brochures:

- A Mariner's Guide to Marine Weather Services
- NOAA Weather Radio

You Need This...

National Weather Service publishes Marine Weather Service Charts for the following segments of the U.S. coastline.

MSC-1	Eastport, ME to Montauk Point, NY
MSC-2	Montauk Point, NY to Manasquan, NJ
MSC-3	Manasquan, NJ to Cape Hatteras, NC
MSC-4	Cape Hatteras, NC to Savannah, GA
MSC-5	Savannah, GA to Apalachicola, FL
MSC-6	Apalachicola, FL to Morgan City, LA
MSC-7	Morgan City, LA to Brownsville, TX
MSC-8	Mexican Border to Pt. Conception, CA
MSC-9	Pt. Conception to Pt. St. George, CA
MSC-10	Pt. St. George, CA to Canadian Border
MSC-11	Great Lakes
MSC-12	Great Lakes
MSC-13	Hawaii Waters
MSC-14	Puerto Rico and Virgin Islands
MSC-15	Alaska Waters
MSC-16	Guam and the Northern Mariana Islands

These placemat-size charts contain information about warning and forecast products and list all NWR, US Coast Guard, and private marine radio stations broadcasting weather for the area covered by the chart.

To order one for your area, send \$1.25 (check or money order) to: National Ocean Service, Distribution Branch, N/CG33, Riverdale, MD 20737

Recommended information:

Selected Worldwide Marine Weather Broadcasts

Lists stations, schedules, frequencies, etc., for all major marine weather broadcasts in voice and print modes in the English language. For ordering information, contact U.S. Government Printing Office, Washington, D.C. 20402, (202) 783-3238.

*Weather Information Broadcasts**

<u>Source</u>	<u>Frequencies</u>
NOAA Weather Radio (continuous broadcasts)	162.400 MHz 162.475 MHz 162.550 MHz
Coast Guard Marine Information Stations	Selected frequencies within the MF/HF marine bands: 2-20 MHz
Coast Guard NAVTEX	518 kHz
Coast Guard VHF (Channel 22A)	157.1 MHz
National Institute of Standards and Technology Time and Frequency Stations WWV and WWVH	2.5 MHz 5 MHz 10 MHz 15 MHz 20 MHz

Commercial AM and FM Radio Stations

*See Marine Weather Service Charts listed under "You Need This..." and other publications for specific locations, schedules, and frequencies.

U.S. Department of Commerce
National Oceanic and Atmospheric Administration
National Weather Service



NOAA PA 94058