RUNNING AGROUND

Running aground is a common experience to anyone who sails. Whether in San Francisco Harbor, the Chesapeake Bay, or some beautiful English river, you'll find the bottom if you go out often enough. In most cases, given a few simple precautions, and assuming protected waters, little or no damage will result (except to the skipper's pride if his *faux pas* is observed).

Tidal State

When you're sailing where the risks of running aground are high, it's a good idea to write into the log the state of tide during the next 24 hours. If caught on a slack tide or the beginning of ebb, you must work with all speed to avoid being stuck for the next tidal cycle. When the tide's rising, you can usually set an anchor and let the moon do the work for you. If your day's run will take you across a shallow spot, be sure to get there before high water. If you run aground, there's still more water coming in to float you free.

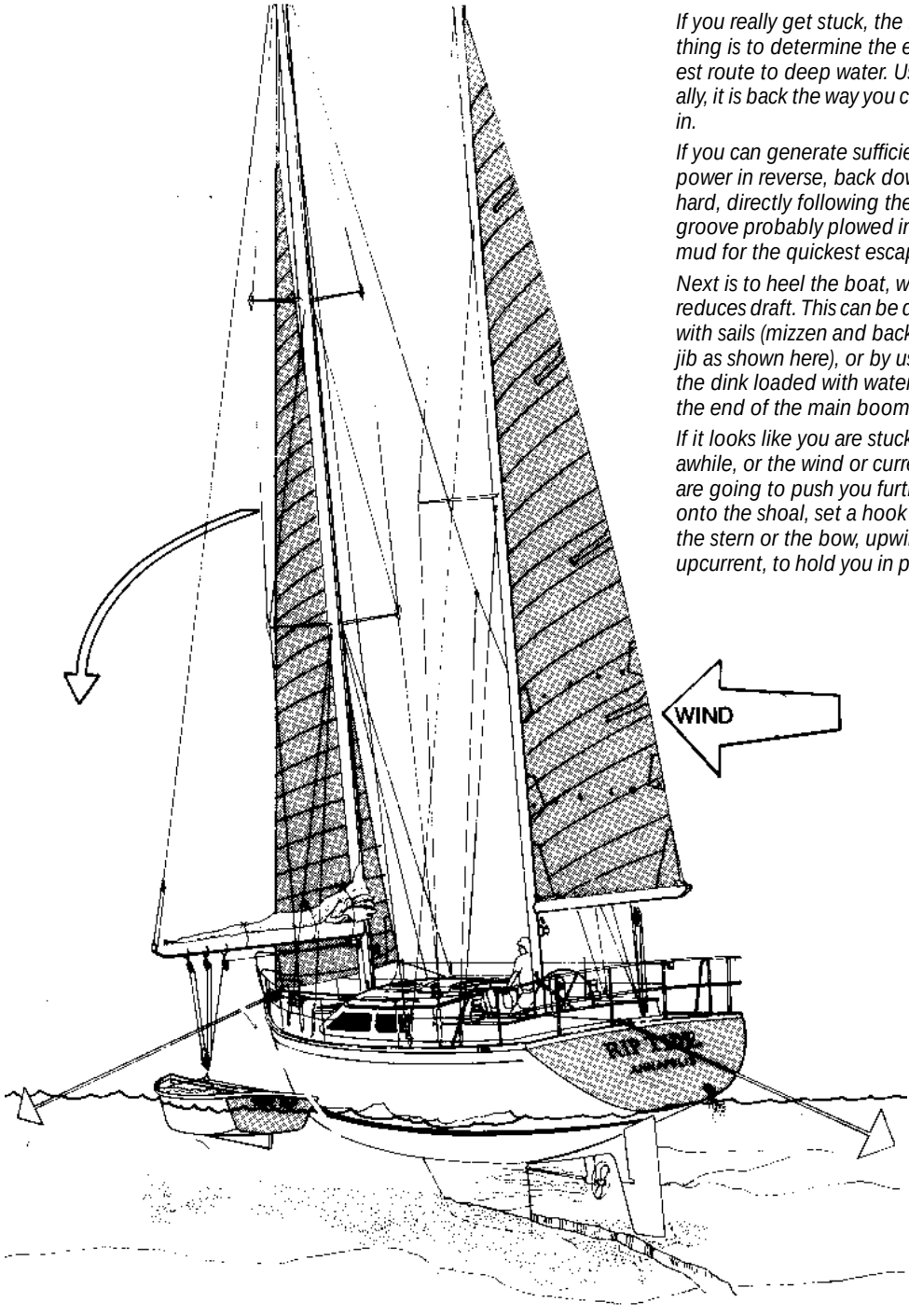
Also remember to consider the monthly tidal cycle. If you get caught at high water springs, you may sit a month or more waiting for the next extreme high tide to float free. The local yachtsmen at the Matavia Bay Yacht Club in northern New Zealand were upset one year when a visiting yacht went aground on the "grid" (telephone poles driven into the mud to support the hull when the tide runs out) at high water springs, and couldn't get off for an entire month!

Current, wind, the possibility of a change in the weather—all have to be considered. The design of the vessel will also have much to do with attempts to float or pull her off. Older designs with low freeboard and heavier displacement have to be carefully sealed to avoid flooding on an incoming tide if lying on their sides. More modern boats, with lower displacement/length ratios, have enough buoyancy in their topsides to float them quickly with a rising tide.

The small freighter, above, blown ashore during a tropical hurricane on the island of Dominica in the West Indies, would have been much better off putting to sea.

Salvage would not be difficult, except it is costly and in this case, the owners simply gave up on the ship. It does sort of ruin the view of the folks ashore, though!

Often the easiest way to get free is by winching yourself off with a kedge anchor. If the tide is dropping, this must be done quickly, before the boat is really stuck. Having the dink ready to launch quickly, and a kedge pre-rigged with rode, makes the chances of a successful kedging operation much higher.

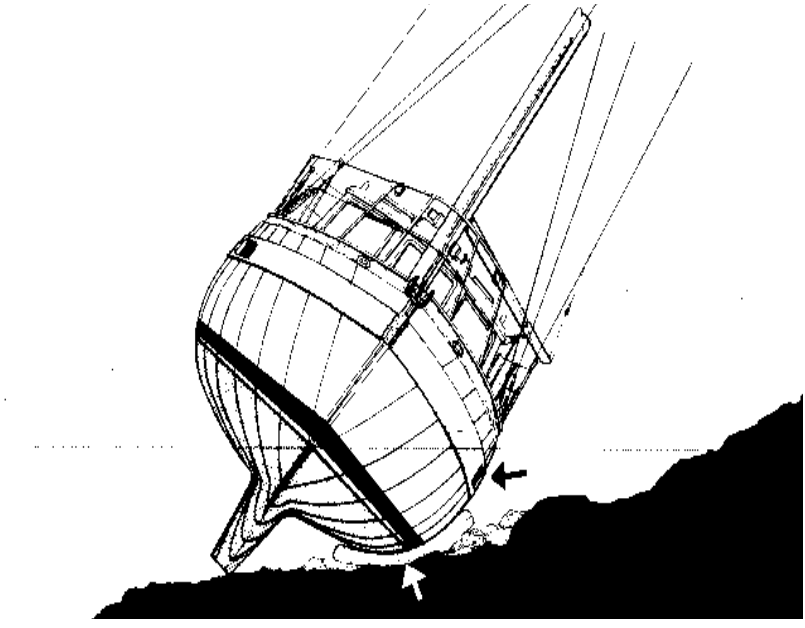


If you really get stuck, the first thing is to determine the easiest route to deep water. Usually, it is back the way you came in.

If you can generate sufficient power in reverse, back down hard, directly following the groove probably plowed in the mud for the quickest escape.

Next is to heel the boat, which reduces draft. This can be done with sails (mizzen and backed jib as shown here), or by using the dink loaded with water on the end of the main boom.

If it looks like you are stuck for awhile, or the wind or current are going to push you further onto the shoal, set a hook off the stern or the bow, upwind/upcurrent, to hold you in place.



If the boat begins to heel over on a rocky bottom, often using a cockpit cushion or bunk mattress can spread the load and reduce cosmetic damage to the hull.

When the Water Level Drops

If stuck for the duration of the tidal cycle, and you expect the water to go out far enough to lay the vessel down, take a pole or oar and sound around the vessel for underwater rocks or obstructions. If there are rocks about, cockpit cushions and fenders can be used to protect the hull.

Boats with wide keels will tend to stand erect, but the risk is that something will cause them to topple. Our feeling is that unless there is some means of support available, it's better to induce the boat to lay over on one side or the other as the tide falls.

Breaking Free

There are several standard steps to take in all simple grounding situations. The first is to set an anchor uptide (that is, in the direction the water will be returning from) and/or upwind. Then, if a powerboat is about, you might ask the skipper to make a few high-speed circles around you. The attendant wake may be enough to bump you free. If you have a good-size prop with powerful reverse thrust, you may be able to excavate the sand/or mud from beneath the keel with prop wash. Swinging the rudder back and forth can help when using the engine in this manner. Keep an eye on engine temperature, and give a periodic look to the saltwater strainer; odds are it will be picking up mud and debris in the intake. If the shaft seal and rubber impeller on the saltwater pump are a concern, it may be better to wait for the tide to float you off.

Kedging will often provide that extra *oomph* required to break you free. Hauling your vessel down by the masthead and its rode with a kedge hook attached to a halyard will lessen her draft and can be effective with smaller boats.

Running aground in protected waters:

- ❑ Try to back off first.
- ❑ If this doesn't work, get an anchor set upwind or uptide, to maintain position.
- ❑ Heel the boat using crew weight or a dinghy full of water on the end of the boom.
- ❑ Get a power boat to run around making a wake to bounce the boat free.
- ❑ Take an anchor to the mast head to heel the boat over.
- ❑ Sit back, relax and enjoy a good book while you wait for the tide to float you free.

van der Wal/Stock Newport

On smaller boats (above) it is often possible to free the keel by getting a couple of crewmembers out onto the boom—an easier operation usually than rigging the dink and filling it with water.

Another approach, along with heaving the masthead down with an anchor, is to push the boat around with a dinghy (or series of dinghies). The operation below is taking place in the Bahamas, an area with lots of thin water!

Zydler/Stock Newport

Greiser/Stock Newport

We started out talking about how important it was to quickly deploy a kedge anchor if the wind, tide, or waves are pushing you towards shore. If that's the case, as the tide comes in the boat will simply bump its way higher and higher onto the land, as opposed to floating free.

The other issue is making sure that the keel does not become trapped in the mud of rocks, preventing the boat from rising with the incoming tide. If this occurs, or the cockpit lockers begin to flood, what was a minor grounding can quickly develop into a major disaster as shown below.

McGowan/Stock Newport