

new feature

# Cheating Death

*This "how-to" piece on bearing away in a skiff is the first in a series of excellent articles we've gotten from our newest SA expert, an internationally renowned coach that we'll call "Sherpa Tenzing."*



Picture the scene; it's blowing 18 knots with wind over tide in Hayling Bay. A daunting prospect in most classes, but, it's enough to send shivers the back of a Skiff Sailors back. The reason becomes all too apparent as you reach the end of the first beat and the mind focuses on the inevitable grave yard that is the windward mark! It's the Everest for a club 49'er sailor and a moment of uncertainty for any sailor in high performance classes. So what is it about the top turn that makes it so hard? This article looks to expose the myths of the windy bear-away and give you some hints to help stay away from the Mine.

## The Skill Components

As with any skill, it is far easier to tackle the bear away in bite size chunks. Let's consider the manoeuvre in 4 Zone: the Entry, the Death Zone, the Recovery and the Exit.

## The Entry

Two things need to happen before you can attempt a bear-away in breeze: Sail setup and boat balance. Both are critical but even more essential is maintaining boat speed. Enter with speed and the apparent wind will ensure that the main doesn't load up and the turn will seem so much easier.

The coaching points here are to adjust control lines fast and accurately and shift crew weight aft without killing speed! For this reason I train teams to practice the gear changes so they're fast and precise. When to move weight aft will depend on your approach angle into the mark. If you're over stood you can get into the foot straps early and Two-Sail in. If you are on a close hauled course, however, you'll drag the transom if you move too early. I'd suggest you practice different approach angles and use your speed at the mark for feedback.

Get the boat balanced so the rudder is ready to steer. Any leeward heel will mean that the rudder will have to overwork to counter the weather helm. Leeward heel will also mean that the rudder generates lift which is the last thing you want at the entrance to the mine! In really big breeze you may want to set up with some windward heel or even Luff to initiate the windward heel. This will momentarily release any power in the rig and is great tick for getting you through the really nasty turns.

For Port approaches, I'd recommend setting the control lines before the tack so that you can come out ready to go straight into the turn. In Twin Wire boats the jib needs to be brought out in

the tack so it's ready to ease straight away. I firmly believe that there's a window before the foils bite that allows you to go straight into the turn. The safe option, however, is always to build speed and go for the turn when helm and crew are ready!

### **Death Zone**

There is point in the turn, at about 60 degrees off the wind, where the rig loads are at their highest. It's essential that you get the bow through this sector as quickly as possible before it starts to 'sniff'. To do this you need to dump the main quickly and in boats like the 14 or the 49'er that means prepping the slack in the mainsheet so you can effectively throw it out in the turn. It's less easy if the helms on the mainsheet so my advice is don't be content to let it slip through your hands. Get some slack in the elastic take up before turn and then dump it before the loads hit the mainsheet.

### **Recovery**

If you have eased enough main the turn will be quite severe! That means that you need to bring the main back on again before you capsize to windward. As a rule of thumb in a Skiff class I'd bring back on two handfuls before sending the crew in for the Kite. This recovery zone also gives you the chance to check the waves in front and avoid the boats that didn't make it through the turn. The boat's really sailable in this low reach and pretty fast so you might even roll a few slow hoisters.

Once through, send the crew in and sail one of two courses:

High Hoist – Required in waves or when you have to hold high for tactical reasons. This will require the crew to hoist from the wing (or to windward of the centre line) with the helm remaining out on the wire. This extra weight will enable you to sail a higher angle but beware, the kite will load up mid hoist and will be harder to hoist.

Low Hoist – The fastest hoist is to sail as deep as possible until the kite hits the top of the mast. This keeps the Kite behind the main and ensures the halyard loads are kept low. It also gains you distance to leeward and improves VMG.

In big breeze the helm can stay in the foot loop while the crew is hoisting and then luff as the crew hits the wire. In flat water or in less breeze the helm may step forward and inboard to help with the hoist.

### **Exit**

In breeze, the exit is all about getting the boat settled and travelling at optimum speed. Having got through the difficult part of the manoeuvre, stay alert and keep looking ahead at the next wave. Bring the crew out on the wire slowly and beware of any wind shadows from boats to windward. Get the main trim set so the boat feels balanced and ease the kite to a curl. Then take a breath, look around and let her rip!

### **Training Drills**

One of my favourite drills for windy bear away training is the 'Zigzag'. It could not be simpler but it teaches one very valuable skill. After the power zone it's essential to bring the main back on and settle the boat. Once back in helm and crew can both stay on the wire and wait for the right moment to commit to the hoist without losing speed or sending the bow down the mine.

- Sail upwind on a close hauled course with control lines set in the correct up wind position.
- Change Trim, boat balance and sail controls ready for the turn. Pull slack in the Main ready for the dump.
  - Bear away sharply through the power zone dumping as much Main as possible.
- Pull the main back on to keep the helm and crew on the wire and reach in this safe zone.
- Head up back onto a close hauled course, changing trim, balance and sail controls.

### **Trouble Shooting**

Nose Dive Mid-Turn - Weight too far forward.

Capsize to leeward Mid Turn – Not through power zone so ease more Mainsail, the Jib may be holding the main in so ease more jib too. You could also be that you are entering the turn too slow to look a maximising speed into the mark.

Rudder Stalls on entry – Not enough Mainsail out and rudder isn't ready to start the turn so recheck boat balance.

Capsize to windward after the Turn. Bring main back on once through Power Zone to stop rotation. Too much board up so the boat is slipping out from underneath you.

### **Measuring Improvement**

Nick Rogers and Joe Glanfield measure their mark roundings by the inches they feel the gain or lose. They rate each component in their part of the rounding and then agree on a score once the boat has settled. For Nick this might include the amount of rudder used in the turn, the speed of the boat on entry and exit and the speed of the hoist. For Joe it might be the speed he gets the pole on and the time it takes to set the kite. These are all subjective measures but the true objective score is the relative gains or losses on other boats

Either way, the process of scoring the quality of execution fits with the constant-debrief process I discussed in a previous article. It helps tailor the turn to the conditions and form a mental log ready for the de brief.

### **Final Thoughts**

Try to remove the emotion from past experiences with the mine and be logical. Practice makes perfect so spend a windy day just doing Bearaways to build your confidence. When mistakes happen (and they will) try to learn from them and identify the point at which the error occurred. It's going to happen in one of the zones so identify which one, give it some thought, adapt and try again!

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