

Sailor's guide to racing on Lake Garda.

Lake Garda is world-renowned for its historically reliable Katabatic winds. In the summer the wind usually follows a predictable pattern – global warming permitting! The mountainous and rocky Trentino region creates the katabatic wind conditions Lake Garda is world famous for. During the night, the temperature on the mountains to the north drops, creating the 'Peler', a cool northerly wind that blows down from the mountains to the warmer Po valley to the south, beginning in the early hours and normally disappearing by 10.00 am. Occasionally when a regatta is behind schedule, racing is held early in the morning in the last of the Peler, followed by a lunchtime siesta through the mid morning calm – so be prepared for an early morning start if this occurs! If the Peler fails to blow at night, it is normally an indication of changing weather. In this case, rain, thunderstorms, flat calms, and storms are all possible.

On a classic Lake Garda racing day, the decline of the Peler indicates that the new 'Ora' breeze is about to arrive. This is the warm southerly wind, emanating from the valleys at the bottom of the lake, rushing up to the rapidly heating mountains to the north. (Effectively like a sea breeze). The Ora increases dramatically in strength as it funnels between the cliffs which narrow toward the top of the lake, producing the conditions many sailors travel from all around the world to enjoy. The breeze tends to be steady rather than gusty, with strength typically 18 knots but can be up to 25 or more!

Riva del Garda is situated at the north end of the lake, where the depth in the centre is over 300 metres. Courses are therefore necessarily laid either side of the lake, causing the shore effect to be the overriding strategic consideration in normal conditions.



Racing from Riva in the Ora wind.

Generally, the closer to the cliffs you go, the stronger the wind. Sailing towards the cliffs on port tack and the effect is dramatic. Boats to leeward but closer inshore appear to be on a conveyor belt - visibly gaining each second, while in turn you are gaining on the boats offshore. Though there are shifts to be had, hitting the cliffs, and staying there, is a good option.

This can make choosing where to start tricky on a port biased start line, as starting on port at the committee boat end gets you into the cliffs sooner. By the time the port end starters are able to tack across toward the right, those at the starboard end can have an unassailable lead. This all depends on exactly where the line is and the wind on the day, so don't take it as gospel, but the it highlights the points to look out for. The local race officials will be well aware of this and will do all they can to angle the line and position it to avoid the full benefits of such cliff affects, so get out on the water early and sail the first leg to check it out for yourself!

The venue has a few other tricks, depending on where the course is laid. There is even more wind near the several headlands along the lakeside, with a favourable wind bend around each one. Conversely, there is less wind in the bays. So there is still more to be gained from hitting a headland layline whenever you tack into the cliffs. The lake is at it's narrowest at Riva and for big fleets with a long start line there can sometimes be an option of getting into a shore from either end of the line.



Assuming a strong port biased line, with the headland some distance up the beat, a common starting strategy needs a good leeward gap mid-line, and a well-timed start on starboard tack. Frequently, the boats to the right slow by stuffing each other, trying to persuade the windward boat to tack. Drive the boat fast and free, and the first shift should give you the ability to tack across these boats. If the boats to windward tack first, it is imperative to tack with them and get the bow down fast, to turn the line advantage into distance toward the cliff, before the escalator takes effect.

If the biggest headland is past the starboard layline to the windward mark, it may pay to over stand, sail into the extra pressure off the headland, and use the starboard lift out of the bend to close reach to the mark with extra speed. However, it is also possible that there may be so much breeze right in by the cliffs that there is no boat speed benefit if you are overpowered. In this case, since the major advantage inshore is through wind velocity rather than direction, there is no gain from going all the way in to the cliffs. In these conditions, sailing with extra twist out of the tack gives you more time and makes the boat easier to lay off onto the new tack.

Downwind



Strategy on the offwind legs is again wind speed led. On a windward/leeward leg, an early gybe to the cliffs is the most likely winning strategy. With luck the beating boats are well clear and are reaching in from above the starboard layline! As the cliffs are approached on port gybe the apparent wind comes further and further forward as wind strength increases, until it's almost possible to lay the leeward mark.

Some days, especially later in the afternoon, there are concentrated gusts

coming down the middle of the lake, which are irrelevant to the beat but can be utilised down the run. These gusts can be big enough to create sufficient apparent wind to take you straight down the lake to the leeward gate whilst other boats are sitting in 5 knots less.

The strategy on reaching legs becomes really interesting in these conditions. Main factors are gybe mark position, reach angle, and absolute wind speed. Sailing the course is the only way to figure this out. Generally, even on the reach, choosing a course taking you toward stronger breeze on one side of the lake will pay, compared with a rhumb line course. It can pay to gybe on the reach, or delay the gybe at the wing mark, to achieve this.

Racing in the Peler.



The advice for racing in the Peler is basically the same as the Ora - but in reverse. The biggest factor with sailing in the Peler is that it involves getting up early in the morning! There is still more wind at the cliff, and the bends around the headlands and reduced velocity in the bays are still present. Starting on starboard will take you toward the favoured left hand side of the beat. However, traditional wind shifts are more pronounced, and more relevant. Therefore a conservative 'playing the fleet' approach produces more consistent winners. Remember that at some stage, the Peler will drop to nothing and the Ora can quickly come in from the North, building within a few minutes to a substantial breeze.

Have fun!

Fun is the primary reason for racing on lake Garda, with its truly awesome

scenery. At first sight from the shore, the lake at Riva doesn't look that big – until you get out into the middle of the lake and suddenly appreciate the massive size of it and the huge height of the cliffs.

Some points worth remembering:

Rig set up:

1) For a given wind strength, the water is generally flatter than we experience at a sea venue. It's therefore tempting to close the leach down a bit to give more power and height. However a common tactical lakes theme is that it's more important to be able to move forward than to gain height, for this reason try a more open, 'reachy' set up.

2) Between leaving the beach and start time the wind strength can frequently increase 5 knots or more. Know your rig settings and be ready to adjust at the warning signal and make sure you are wearing enough clothes. Deep water lakes can still be chilly in summer.

3) Due to depth constraints, the finish line is often far longer than at home. Be aware of the bias, and use it to gain a place on the line.

4) Never give up! Strange things can happen on lakes. If 'down the pan', sail a considered race, watch the fleet, and react to signs of a change in the wind.

5) Expect windsurfers to be buzzing across the middle of the race course whenever the breeze is up! They generally keep out the way but don't seem to worry about cutting across the fleet.



We look forward to seeing you at Riva 2022!