Uncle Al's Racing Rules in Pictures

Rules are quoted, then illustrated and explained as seems necessary.

Part 2C - At Marks and Obstructions

for easy access without scrolling, the Rules listed below are bookmarked:

18 Mark-Room
18.1 When Rule 18 Applies
18.2 Giving Mark-Room
18.3 Tacking when approaching a Mark
18.4 Gybing
18.5 Exoneration
19 Room to Pass an Obstruction
20 Room to Tack at an Obstruction

Section C - At Marks and Obstructions

Section C rules do not apply at a starting mark surrounded by navigable water or at its anchor line from the time boats are approaching them to start until they have passed them. When rule 20 applies, rules 18 and 19 do not.



I had to dig deep (1998 Wind Bag Regatta) to find a time when we had what the above preamble refers to indirectly: a starting mark **not** "surrounded by navigable water". Here, the RC are sitting on the mark at the starboard end of the line - the shore!! This is the only kind of starting mark at which rule 18 **does** apply. At 99.9% of start marks, rule 18 **does not apply**, hence the greeting: "You're barging!!" when someone tries to squeeze in at the windward end. Allowing buoy room at a start would create chaos!!!

Note though, that last little bit of 18.1(a) which explains that **mark-room** is only turned off when boats are approaching the line to actually start, i.e. you **can** call for "room" at a start mark with a couple of minutes to go in the countdown (unless you sail in a class where it's common practice to "sit" in your spot on a 100-boat line that early).

Lastly, I am happy to report that in 55 years of racing, I have yet to encounter the situation envisaged by the sentence: "When rule 20 applies, rules 18 and 19 do not." So, I will leave it to someone else to cover that eventuality.

DEFINITION: MARK-ROOM

Mark-Room Room for a boat to sail to the *mark*, and then *room* to sail her *proper course* while at the *mark*. However, *mark-room* does not include *room* to tack unless the boat is *overlapped* to *windward* and on the inside of the boat required to give *mark-room*.





(above) Imagine that Geoff Edwards (W9483) and Fred Black (W7379) are about to round mark #4 to starboard. Fred is the inside boat (i.e. he is overlapped on the inside). Assuming he is entitled to mark-room, such room will include only enough room to sail to the mark. As give-way boat (windward), Fred is not entitled to sail his proper course which might well be to approach the mark wide and leave it close (a so-called tactical rounding). Once at the mark, Fred will be entitled to sail proper course as he rounds, and if he is still overlapped with Geoff, mark-room will give him the right to tack at this mark. But as soon as Fred is no longer "at the mark", his mark-room protection from the leeward right-of-way boat ends, and he must as of that moment again keep clear.

(left) This photo again shows how mark-room entitles a boat to tack as part of the rounding manoeuvre. Note that Tanya Wharton (W6) is inside boat and the mark-room that Uncle Al (just to leeward of Tanya) gives her will have to include room to tack (i.e. to swing her stern wide - so to speak - as she tacks). Ironically, if Tanya were clear ahead here, she would not be immune to the requirements of rule 13 (Tacking). See also rule 18.2(c).

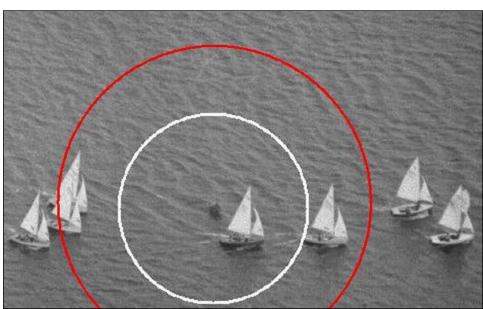


A reach-to-reach tack around a mark (fortunately) happens once per year at best - and it didn't happen here (left), either. But it was the closest picture I had, so I added a mark (just above the lovely Lise Jonasen in W4123) to which Søren Jonasen (W4123) and Uncle Al with super-crew, Anders Pjetursson, in Whistle (W9355) will have to sail next. Of course this will require a tack followed by a close reach on starboard tack. The mark-room definition (above) indicates that Søren, the inside boat, is entitled to room to tack here. But again - if Søren were clear ahead, he would ironically not be entitled to tack as part of his mark-room.

18.1 When Rule 18 Applies

Rule 18 applies between boats when they are required to leave a *mark* on the same side and at least one of them is in the zone. However, it does not apply

- (a) between boats on opposite tacks on a beat to windward,
- (b) between boats on opposite tacks when the proper course at the mark for one but not both of them is to tack,
- (c) between a boat approaching a mark and one leaving it, or
- (d) if the mark is a continuing obstruction, in which case rule 19 applies.



The shot from the 1986 Wayfarer Worlds on Lake Couchiching (*left*) is the only aerial photo I have on which I can demonstrate the re-defined zone which has been enlarged from the old "two-length zone" (white circle above) to three lengths (red circle) as follows:

Zone The area around a *mark* within a distance of three hull lengths of the boat nearer to it. A boat is in the *zone* when any part of her hull is in the *zone*.

Rule 18 no longer begins to apply when boats are "about to pass or round" a mark which could have been outside of the zone and which tended to be a judgment call. In the new rules, the point at which rule 18 begins to apply is made quite clear: rule 18

turns on at the moment when "at least one of [the boats] is in the zone". And note that for a boat to be in the zone, part of her hull must be in it - not her bowsprit, sails, etc. The three boats on the left in the photo above are thus subject to rule 18.



(left) Y-Flyer 2546 and W3571 (Bob Kennedy) may well converge as they near the mark which I have inserted and which they had to leave to starboard. Until one boat enters the zone and thus turns on rule 18, the starboard Y-Flyer may call his rights on the three port-tack boats. If W3571 has an overlap on Y2546 when rule 18 turns on, 3571 will be entitled to mark-room but as give-way boat, he will be entitled only to mark-room, i.e. room to make a seamanlike (not tactical!!) approach to the mark followed by a proper-course rounding once he is at the mark.

And even if rule 18 definitely applies, don't forget that if a windward boat rounds with an inside overlap on leeward, the latter remains the right-of-way boat (leeward). Below, Flying Scot 4921 is entitled only to mark-room (the space needed to make a safe, seamanlike rounding), and **not** the space needed for a tactical (wide and close) rounding. Above, FS4921 has taken far too much room and is fouling FS3387 to leeward of him.



"required to leave" "on the same side" refers to the possibility that boats from different race courses may meet at a mark which they pass on the same side but in opposite directions - one buoys to port, the other buoys to starboard. Then rule 18 does not apply and it's back to basics, e.g. rule 10 and 11.



This picture illustrates rule 18.1(a): namely that rule 18 does not apply between boats on opposite tacks on a beat to windward. Here, Hubert Dauch (W3636) - as the portack boat - is bound to keep clear of both Nick (blue hull) and Gale (red hull) both of whom are on starboard.

Quick, now! Is Judd Lather *(red spinnaker)* protected by rule 18 at a finish mark???

Yes, he is. Bob Frick (the Wayfarer to leeward of Judd) has to give him room. The only mark at which rule 18 (almost) never applies, is at a start mark. Of course, if the last leg is a beat, then rule 18 still won't apply between boats on opposite tacks at a finish mark.



18.2 Giving Mark-Room

- (a) When boats are *overlapped* the outside boat shall give the inside boat *mark-room*, unless rule 18.2(b) applies.
- (b) If boats are *overlapped* when the first of them reaches the *zone*, the outside boat at that moment shall thereafter give the inside boat *mark-room*. If a boat is *clear ahead* when she reaches the *zone*, the boat *clear astern* at that moment shall thereafter give her *mark-room*.
- (c) When a boat is required to give *mark-room* by rule 18.2(b), she shall continue to do so even if later an *overlap* is broken or a new *overlap* begins. However, if either boat passes head to wind or if the boat entitled to *mark-room* leaves the *zone*, rule 18.2(b) ceases to apply.
- (d) If there is reasonable doubt that a boat obtained or broke an *overlap* in time, it shall be presumed that she did not.
- (e) If a boat obtained an inside *overlap* from *clear astern* and, from the time the *overlap* began, the outside boat has been unable to give *mark-room*, she is not required to give it.

Here, Peter (W286) is the outside boat and has to give room to the inside boat (the Laser). Not only that, the inside boat has right of way (leeward) so that Peter must "also keep clear" - in so many words, the right-ofway inside boat can take as much room as he likes! Once past the mark, the leeward boat can sail any course he likes, also (always assuming that rule 18.4 does not come into play!)





In essence, 18.2(b) freezes the action and the rights as the first of a group of overlapped boats reaches the zone. If at that precise moment you had rights to mark-room (i.e. you were overlapped inside the other boat), you keep those rights through the rounding even if you then lose the overlap inside the zone. If the other boat pulls ahead, he must still give you room. The photo above illustrates another common possibility: Christian Bovet (W5128) was overlapped inside Paul Knowlson (W9116) at the moment one or the other of them first reached the zone. Here, Christian may well go wide of the mark as he gybes, tempting Paul to try to cut inside of Christian. An admirable move - if it works. But 18.2(b) underscores the fact that a boat trying to cut in

has no rights to mark-room in such a situation: if Christian starts wide here, but then cuts the mark close with Paul wedged in there, the latter is out of luck! Penalty turns time!! It is important to note however, that from the moment Christian gybes to port, his rights to a tactical rouding expire because he is now the give-way boat to both W9116 (leeward) and W4898 (starboard). From this point on, he is thus only entitled to mark-room (seamanlike course to the mark plus a proper-course rounding once he is at the mark) with regards to W4898 and W9116 even though he reached the zone clear ahead of Stephan Nandrup-Bus (W4898).

Moreover, if you leave the zone again before rounding, e.g. by going too wide, etc., you have pushed the nautical equivalent of the reset button: your situation must be re-evaluated because any rights you may have had, have - alas - not been saved!!



18.2(c) is another case of freezing the action - in this case with one boat clear ahead of another as she reaches the zone. Above, John Friis (with Mary in the lime green PFD!) was clear astern of all the other boats seen in the photo when they reached the zone. According to 18.2(c) and regardless of the mess that may soon develop at the mark (off John's port bow), John must

- 1. keep clear of any boat of which he remains clear astern (i.e. no running into transoms of boats that suddenly get stuck!)
- 2. give mark-room to any boat on which he gets an outside over-lap
- 3. not expect to be given mark-room if he gets an inside overlap on any of these boats

Note however that the boat which is clear ahead (e.g. Hans Gottschling, W938, in the photo on the right) is not entitled to tack as part of its rounding procedure - see the last sentence of 18.2(c): "However, if either boat passes head to wind ... rule 18.2(b) ceases to apply." - which means that rule 13 does apply (see ISAF Case 81) and if Hans tacks here, he may well foul Peter

So of the state of

Rahn (W286) in the process. The mark-room definition further underscores this as follows: "mark-room does not include room to tack unless the boat is overlapped to windward and on the inside of the boat required to give mark-room".

Rule 18.2(d) points out that it is up to a boat that claims there was a last-second change in status - overlap gained or broken - to prove that fact. In the picture below, Geoff Edwards (W9483) ended up getting an overlap inside W7379 (Fred Black) near the gybe mark. If the question of "mark-room" came to a protest, Geoff would need to convince the committee that he had indeed established the overlap in time. If there was reasonable doubt, see 18.2(d) above.



Also included in 18.2 - in part (e) - is the fact that you are not entitled to mark-room if the outside boat is unable to give room from the moment you establish your inside overlap from astern - even before reaching the zone. I still recall a race from the heydays of the June Bug Regatta at Fanshawe in the mid-80's: The wind died right near mark 4 (about 50 metres from the shore) as we ghosted towards it on a late Saturday afternoon run. By the time we got near the mark, there were already 50+ boats of all shapes and sizes wedged in between the mark and the shore - and also on the wrong side of the mark. This was presumably an example of where we could have gotten an inside overlap well before the zone but where the outside boat had no hope of actually giving us the mark-room, and so we weren't entitled.

18.3 Tacking when approaching a Mark

If two boats were approaching a *mark* on opposite *tacks* and one of them changes *tack*, and as a result is subject to rule 13 in the *zone* when the other is *fetching* the *mark*, rule 18.2 does not thereafter apply. The boat that changed *tack*

- (a) shall not cause the other boat to sail above close-hauled to avoid her or prevent the other boat from passing the *mark* on the required side, and
- (b) shall give *mark-room* if the other boat becomes *overlapped* inside her.



Here, Nick is about to complete a tack inside the zone in front of Gale (left) who is laying the mark. Thus, rule 18.3 applies. This means Nick will not have the protections of rule 18.2 such as being entitled to room and freedom from the restrictions of rule 16 (the right to change course as he sees fit to round the mark). In addition, W864 (Nick)

(a) shall not cause [Gale] to sail above close-hauled to avoid [Nick] or prevent the other boat (Gale) from passing the mark, and

(b) shall give room if the other boat (Gale) becomes overlapped inside her, in which case rule 15 does not apply.

Basically,

(a) above leaves Nick at the mercy of Gale who can (successfully) protest Nick if Gale feels he had to sail above close-hauled because of Nick's boat being in the way, and

(b) above means that Gale can shove his nose in to leeward of Nick unhampered by the restrictions of rule 15 such that Nick probably has no hope in hell of keeping clear.

As you can probably tell, our rules makers are trying to discourage us from tacking in traffic near the windward mark. And they have done a good job!! I myself make it a strategic priority to try to avoid tacking in(to) the two-length zone unless there are no other boats near me.



This situation actually ended up in a protest. While Paul Laderoute (W7380) rounded relaxed and in the lead, second place was a close battle among Heider Funck (W6), Uncle Al (W3854) and Peter Rahn (upwind of Al). Worried about completing his tack inside the zone and too close to Peter, Uncle Al is bearing away behind Peter instead of going for a lee-bow. Al then tacked as soon as he could do so without hitting Peter. Heider held on until he had to bear away behind Peter as well - about one boatlength from the mark. W6 then tacked into the half a boatlength or so between Peter and Al. This tack likely broke rule 13 (tacking too close) but Heider definitely infringed 18.3 because Al had to luff up beyond close-hauled and still collided with W6. Penalty turns were duly done by Heider.

18.4 Gybing

When an inside *overlapped* right-of-way boat must gybe at a *mark* or *obstruction* to sail her *proper course*, until she gybes she shall sail no farther from the *mark* or *obstruction* than needed to sail that course. Rule 18.4 does not apply at a gate *mark*.



Here, Geoff Edwards (W9483) is "an inside overlapped right-of-way boat". Since the next leg is a port-tack reach, he "must gybe" to sail his proper course. Because that is the case, Geoff must make a proper course rounding, i.e. he is not allowed to deliberately take Fred Black (W7379) far past the mark instead of sailing his proper course. In so many words, Geoff must gybe where he would gybe if Fred were not near by.

It should be noted however, that if the next leg were a very broad reach or a run, then 18.4 would not apply since it addresses only boats who "must" gybe to sail their proper course.

18.5 Exoneration

When a boat is taking *mark-room* to which she is entitled, she shall be exonerated (a) if, as a result of the other boat failing to give her *mark-room*, she breaks a rule of Section A, or (b) if, by rounding the *mark* on her *proper course*, she breaks a rule of Section A or rule 15 or 16.



This photo illustrates a situation where rule 18.5 might come into play. Under normal circumstances, rule 16.1 might well prevent Uncle Al (leeward boat in W3854) from changing course towards Hans Gottschling (windward in W938) because the two boats are so close together that a course change by Al may not leave Hans enough room to keep clear. But here rule 18 applies so that, as per 18.5, rule 16 does not apply to Al who is free to alter course as he feels is necessary to round the mark. Hans must be prepared for this and make sure he is able to keep clear despite any (reasonable!) course change (such as luffing above close-hauled to "shoot the mark") that Al may feel is required.

19 Room to Pass an Obstruction

19.1 When Rule 19 Applies

Rule 19 applies between boats at an *obstruction* except when it is also a *mark* the boats are required to leave on the same side. However, at a continuing *obstruction*, rule 19 always applies and rule 18 does not.

19.2 Giving Room at an Obstruction

- (a) A right-of-way boat may choose to pass an obstruction on either side.
- (b) When boats are *overlapped*, the outside boat shall give the inside boat *room* between her and the *obstruction*, unless she has been unable to do so from the time the *overlap* began.
- (c) While boats are passing a continuing *obstruction*, if a boat that was *clear astern* and required to *keep clear* becomes *overlapped* between the other boat and the *obstruction* and, at the moment the *overlap* begins, there is not *room* for her to pass between them, she is not entitled to *room* under rule 19.2(b). While the boats remain *overlapped*, she shall *keep clear* and rules 10 and 11 do not apply.



At left, Søren Jensen (W10212) and Sten Madsen (W9067) are overlapped on a starboard-tack run. Both have to keep clear of the close-hauled starboard boat off Sten's bow which - as leeward boat has right of way over both Søren and Sten, and will rank as an obstruction to Sten. Though Søren has right of way over Sten under rule 11, rule 19 requires that Søren give Sten room - not mark-room - to pass the obstruction, i.e. the right-of-way boat (Søren, leeward) must move out of the way (only) to the extent that the giveway boat (Sten, windward) will be able to pass the obstruction without fear of collision. As soon as the obstruction that caused rule 19 to "kick in" has been passed, everything reverts back to the other rules of Part 2. Note that If Søren had so desired and had acted early enough, he could have chosen to sail high and pass in front of the leeward (beating) boat, as provided under rule 19.2(a).

The obvious continuing obstruction that springs to my mind is a shore along which the boats are sailing - such as the east side of Fanshawe Lake at right. Let's pretend that here Kevin Biskaborn (yellow Laser) came up from clear astern in trying to pass his brother, Brad (blue Laser). Under rule 19.2(c), Kevin was entitled to room only if at the moment he established his overlap between Brad and the continuing obstruction (the shore) there was room for him to pass between them.





R.I.P. A right-of-way boat sailing along beside you used to rank as a continuing obstruction, so that line-sitters like the Wayfarers above were protected from interlopers coming from astern under what is now rule 19.2(c). But the revised obstruction definition now rules that out: "A vessel under way, including a boat racing, is never a continuing obstruction". This may well affect our start line strategies since a boat coming up from astern can now shove his nose in to leeward of your transom even if there is not room for his boat to fit between you and a boat to leeward of you. The way new rules read, the windward boat must take evasive action the moment leeward establishes an overlap. At that point, the only feasible evasive action may well be for you to speed up and cross the line early. Oh joy!!! Stay tuned!!

20 Room to Tack at an Obstruction

20.1 Hailing and Responding

When approaching an *obstruction*, a boat sailing close-hauled or above may hail for *room* to tack and avoid another boat on the same *tack*. After a boat hails,

- (a) she shall give the hailed boat time to respond;
- (b) the hailed boat shall respond either by tacking as soon as possible, or by immediately replying 'You tack' and then giving the hailing boat *room* to tack and avoid her; and
- (c) when the hailed boat responds, the hailing boat shall tack as soon as possible.

20.2 Exoneration

When a boat is taking *room* to which she is entitled under rule 20.1(b), she shall be exonerated if she breaks a rule of Section A or rule 15 or 16.

20.3 When Not to Hail

A boat shall not hail unless safety requires her to make a substantial course change to avoid the *obstruction*. Also, she shall not hail if the *obstruction* is a *mark* that the hailed boat is *fetching*.



Here, Roger (W7700) is just completing a tack to starboard and will now be sailing along just to windward and astern of Brian (W9235). If Brian is worried about hitting an obstruction (the shore), but is likely to foul Roger by tacking, rule 20.1 lets Brian ask Roger for "room to tack".

Brian must do this on the early side because

- 1. Roger has to have time to get set to tack
- 2. Roger may not respond because he did not hear the first hail, in which case a second, **louder** hail will be required from Brian (see ISAF Case 54)

In the photo above, the following sequence of events might typically occur:

- 1. Brian (9235) hails "Room to tack!"
- 2. Roger (7700) does not respond in any way for a few seconds
- 3. Brian bellows out: "Room to tack!!!!!"
- 4. Roger hears **this** hail and under rule 20 **must** now immediately do one of two things: Usually the windward boat will tack but there is a second option, illustrated nicely by the photo above: If the windward boat does not want to tack and feels he can bear away to avoid the other boat while the latter is tacking, then he may hail: "**You** tack!"
- 5. As soon as Roger responds in one of those two ways, Brian must immediately tack. If Roger hailed "**You** tack", the onus will be on Roger to keep clear of Brian.

Note that rule 20 applies only where the boat asking for "room to tack" cannot tack and then keep clear of the other boat, i.e. if Brian (9235 above) can tack and then bear away to keep clear of the starboard boat (7700), Brian must do so without invoking rule 20.





In the photo on the left, 1305 (starboard) is an obstruction to 1131 who is on port tack. Therefore 1131 would have had the right to hail the boat to windward of her for "room to tack", had he done so well before the moment captured here. Having not hailed, 1131 is now blissfully sailing into a situation where he is sure to foul the starboard boat (1305) since he's left it too late to bear away, or he will foul the boat to windward of him by doing a crash tack (see photo on immediate left) to avoid 1305.

There are usually two possibilities for the leeward boat who can hail for room to tack, or pass astern of Starboard.

If Leeward opts to call for "room to tack", then Windward cannot claim room to pass astern of Starboard, since the Section C preamble states: "When rule 20 applies, rules 18 and 19 do not." Note however, that unless Leeward has to make "a substantial course change" (rule 20.3) to pass astern of Starboard, rule 20 (Room to Tack) is not available to him.

If, on the other hand, Leeward chooses to pass behind Starboard, rule 20 is not being applied. Therefore Leeward must - under rule 19 - allow Windward (AY171 in this case) room to pass astern of Starboard, also.



This picture tells the story of why rule 20 cannot be allowed to apply at a starting mark, even if that mark (the RC boat in this case) is large enough to qualify as an obstruction. Imagine the absolute chaos that would be created if Peter Rahn (286) for instance, got wedged in towards the RC boat and could now request room to tack!!! Which is why the Section C preamble states: "Section C rules do not apply at a starting mark surrounded by navigable water or at its anchor line from the time boats are approaching them to start until they have passed them."