

F18 class rules update

A submission from: XXXX, XXX and French classes

Context

The deckswEEPing sails (DS) are now part of the offer. A too relaxed measurement introduction is pushing designers to enlarge at maximum the sweeping part of the sail to enhance the performance which jeopardizes the boat handling and reduce significantly the visibility.

The DS gain in performance looks to be confirmed event after event which could affect durably the F18 population whit a potential separation between week end and Top gun sailors if nothing is found to simplify the equation:

Performance versus seamanship.

A better boat control in strong wind will not compensate a poor boat handling even in light wind.

Purpose or Objective

The objective is to set clear limitations to guaranty a safety corridor to manoeuver and improve crew visibility when using DS sails.

To deal whit this submission under A.7.2 ammement if approved to act immediately to minimize the grandfathering period where extreme sails designs will get an advantage.

Proposal

The proposal defines:

- a sweeping max length,
- a minimum clew point height
- An extended window area.

Current rule:

Nil

Proposed wording change

To add in the current rules G.3.5 Main sails dimension after Tabling:

DS sail extra limitations

- First foot segment B9 from tack point to clew point : maximum 950 mm
- H8 at B9 end of segment : max 430 mm
- C measurement from top head end to clew point : maximum 7800 mm
- Window area : minimum 2 m² including all the triangle bellow H

Reasons

It was predictable that designers seeking to improve performance had to look at the luff length efficiency, year after year the boom attachment on the mast was approaching the mast foot. Last winter we have been smart enough to keep the mast area in the sail calculation to anticipate the day when the tack point will reach the end of the mast extrusion.

Actually whit a standard sail shape the crew is having a space of approximately 1 m² under the boom to manoeuver, space looking like a corridor on the side.

Whit a DS sail bounded by the proposal we set back the safety corridor in the right orientation. The space lost close

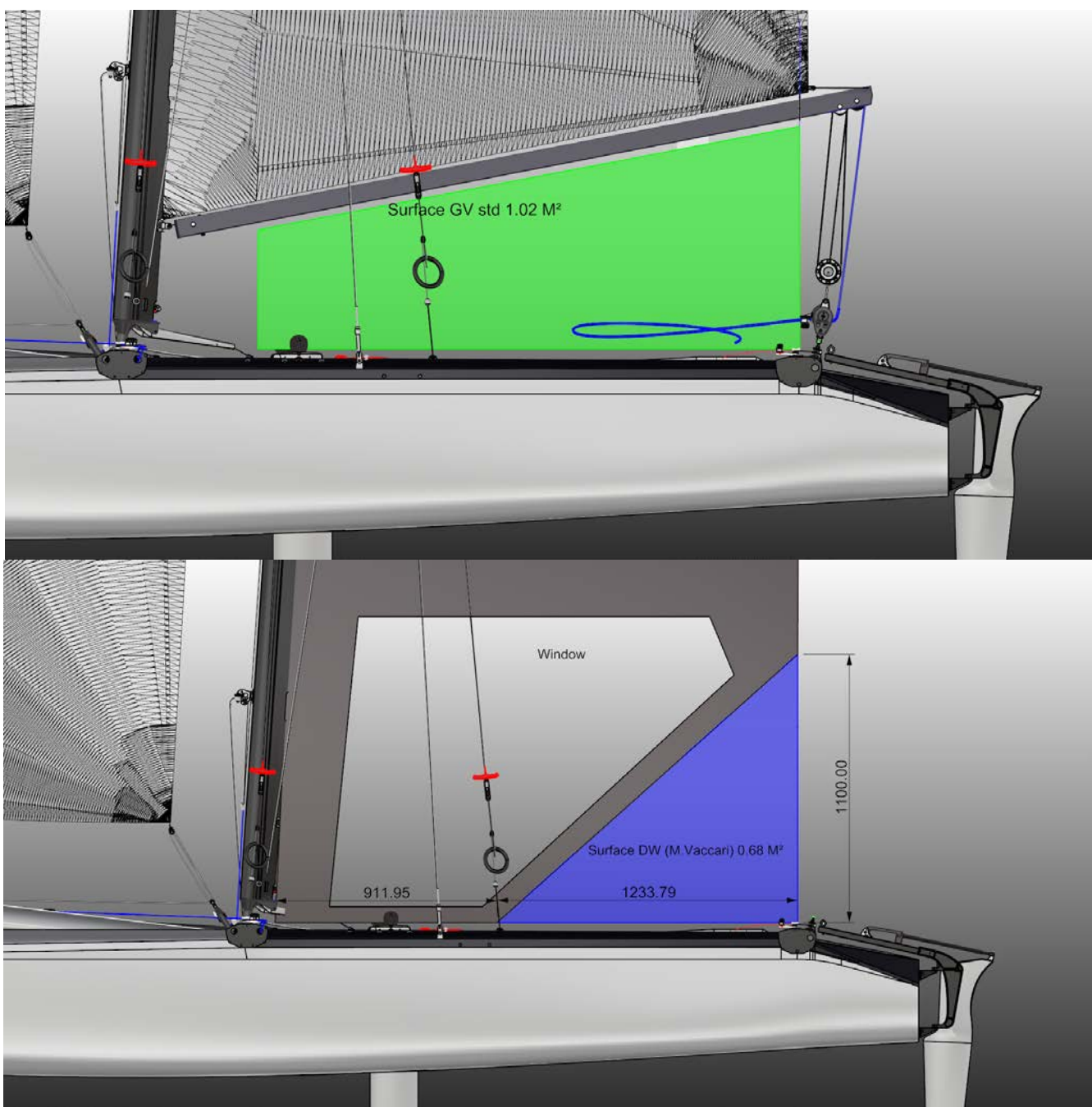
to the mast in the horizontal plan is replaced by a vertical space in the rear part of the tramp securing a corridor of about 0,7 m² allowing the crew to manoeuvre in a descent way.

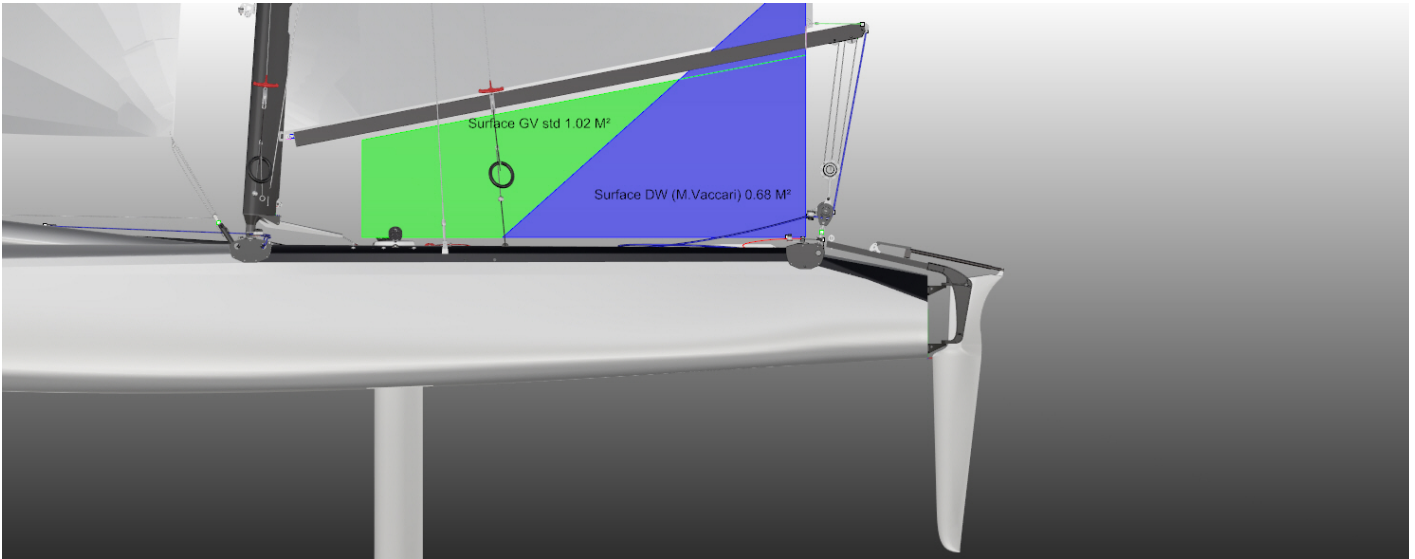
Space for maneuvering may vary slightly from one boat model to another, the limitations proposed are only dealing with easy to control sails limitations to preserve buyer freedom choice.

Visibility is also a shared concern. Salt, humidity, scratched material and luff reinforcement close to the mast may clearly create a potentially dangerous dead visibility zones under kit rides.

The 2 meters window area including all the lower part of the sail will reduce as much as possible this critical zone. It would be interesting to look at Windsurfing sails construction techniques who are in some way DS sail to maximize the window in the sensitive lower part of the sail.

To illustrate the work done we are joining some sketches and one first video that we will try to improve as soon we will get new shapes to test :
<https://vimeo.com/238185495>





Conclusion

By adopting the 3 limitations described above we will achieve 3 main goals :

- To Preserve as much as possible the access of the class to the week end club sailors which represent the majority of our associate members,
- To regain control on an too relaxed development,
- To confirm the high maneuverability reputation of the f18 platforms.