

Multi50 Class Rules

2011 - 2014

Approved on 30/03/2011

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1 MANAGEMENT OF CLASS RULES

The **Multi50 Class** Executive Committee is responsible for the drafting and the application of the Multi50 Class Rules.

1.1 General

1.1.1 Duration

The Class Rules are set for a 4 year period (Each 4 year period begins from the 1st of January following the "Route du Rhum" race).

This does not apply to appendices.

1.1.2 Interpretation

Where there is difficulty in interpreting an article in the Class Rules, the Executive Committee shall, on the advice of the Rules Committee and the Class Measurer, set the interpretation of the rule in question as an appendix with immediate effect. It cannot be appealed.

1.1.3 Modification

During the four year period, the Class Rules cannot be modified at an Annual General Assembly, except in the following circumstances:

- Compliance with any new regulations.
- Proposals put forward by the Rules Committee where new materials or technology exist, and which could not have been foreseen at the time of the drafting of the current rules.

If a loophole in the Rules comes to light, the Executive Committee could decide to modify the Class Rules as a matter of urgency.

1.1.4 Dispensation

Special dispensation to the Rules may be granted by the Executive Committee in the following circumstances:

- Where a characteristic of a boat pre-dates the drafting of the rule.
- · Adaptation of second-hand material which does not enhance performance

Each dispensation is granted for a particular boat and for a particular rule.

Dispensation will be revoked where there is modification of or a change to the equipment in question

The list of dispensations (and the context) is described in the appendices.

1.1.5 Language

The original French text is the official version.

1.2 Measurement Certificate

To compete in a Multi50 event, a boat must hold a valid measurement certificate for the year in question.

1.3 Measurement costs

Measurement costs and measurers' travel expenses are borne by the owner and/or skipper.

The Multi50 Class issues invoices for measurement services (see appendices).

2 CLASS RULES

2.1 Eligibility

Multihulls with accommodation, whose maximum length overall (LOA) is between 14.63m (48 feet) and 15.24m (50').

A platform must be symmetrical about its longitudinal axis.

2.2 Propulsion, trimming, accommodation

When racing, boats shall compete using only the wind, as per ISAF¹ Rules, and particularly Rule 42.

The engine(s) required in chapter §2.9 must not be used for propulsion while racing, except in an emergency and for safety.

For single-handed races, engines shall be sealed. In order to cover differing types of propulsion, the propeller will be sealed in forward gear.

2.2.1 Sail and rig trim

Systems for trimming the rig and sails must be manual only. Only mechanical means may be used. All electrical and/or electronic and/or hydraulic systems are forbidden.

This rule does not apply to automatic sail release systems.

2.2.2 Steering trim

Automatic pilots using electronic, electrical, mechanical, hydraulic systems etc... are permitted. The automatic pilot must act simultaneously upon all steering appendages as would the helmsman.

2.2.3 Accommodation

All multihulls must have the minimum accommodation required by the relevant OSR for the category of race.

2.3 Measurement trim

Measurement conditions ashore and afloat are defined in the appendix entitled MEASUREMENT AND MEASUREMENT TRIM.

The skipper and/or owner is/are responsible for ensuring that their boat is in measurement trim.

2.4 Dimensions

2.4.1 Geometry of the platform

The platform is composed of the hulls, crossbeams, reinforcements, cases.

The geometry of the platform (length, beam, height, etc.) excluding appendages must not be modified during a race and/or a season (ie between the first race and the end of the last race in the Multi50 race calendar) and must be the same as that recorded on the measurement certificate.

¹ ISAF: International Sailing Association

Any modifications to the geometry of the platform envisaged during a race season must be validated by the Executive Committee at the request of the Technical Committee, prior to being commenced. If the modification is permitted, a new measurement certificate will be issued.

2.4.2 Surface area of the platform

The surface area of the platform is delimited by: vertical projections of the outermost parts of the platform (Any component glued or laminated to the hull is included in the hull).

- Trimaran: the lines joining the bows of the floats to the main hull, the lines joining the stern of floats to the main hull.
- Catamaran: the line joining the bows of the hulls, the line joining the sterns of the hulls.

2.4.3 Measured length

General remarks: the measured length must be between 14.63m and 15.24m (48' and 50').

The measured length is the length overall as defined below.

Length overall is measured between the forward most and aft most point of the boat projected vertically on the water, or a plane parallel to the water, boat in measurement trim. The reference document for all measurements is the ISO 8666 norm, supplemented by the "ISAF MEASUREMENT" document which defines methods of measurement (available on the ISAF website).

It is measured between the following points:

- At the bow: the fore most point of the hull(s) or float(s), including, bulwarks, sheerlines, fittings whether above or below deck level. This point shall be referred to as "bow" from here on
- At the stern: the aftermost point of the hull or floats, including, bulwarks, protection, aft sheerline, permanently installed hardware, whether above or below deck level. This point shall be referred to as "stern" from here on.

2.4.4 Beam

General remarks: The maximum permitted beam is 15.24m (50 feet)

2.4.5 Air draft

General remarks: the maximum air draft is 23.77m (78 feet).

The air draft is the vertical measure between the highest point of the mast and the flotation plane of the boat in measurement trim.

The highest point of the mast(s) will be measured to include all rigid and structural parts of the mast, including all halyard sheaves but not including accessories such as lights, antennas, wand, wind vane etc...

It shall not be possible to hoist sails above the maximum permitted air draft

2.4.6 **Draft**

General remarks: the maximum draft is 3.50m

The maximum draft is the vertical measurement between the lowest point of the appendages in their downmost position and the flotation plane of the boat in measurement trim.

2.5 Minimum weight of the platform

2.5.1 Method and weighing configuration

Configuration for weighing of the platform means: all hulls assembled in pre-sailing configuration with: engine and related equipment (oil, 20 litres diesel maximum, gearbox, sail drive, propeller, gear levers), winches, tanks and ballast tanks and hulls empty, bowsprit with related equipment, interior fittings, control panel and wiring, daggerboards and control systems, rudders and related systems), permanently installed safety equipment, bilge pump, padeyes, U-bolts, pulpits, stanchions, lifelines, nets, clutches, galley...

Not included in the platform are: mast and rigging (shrouds, runners, forestays and furlers, halyards, etc.), sails, boom and relevant systems (lazy jacks, outhaul, reef lines, halyard locks, boom extensions, etc.), all additional equipment such as blocks, running rigging (sheets- barber haulers ...)

Corrector weights prior to the weighing session are strictly forbidden.

A boat which does not comply with this weight limit may either:

- Strengthen the platform after validation by the Technical Committee for "work to be done to increase the weight by structural reinforcement". The platform must then be reweighed (the new weighing session will be invoiced).
- Seal corrector weights in the platform by placing them between the two accessible forward most and aft most points of the boat (these corrector weights must be visible)

2.5.2 Trimaran

The minimum weight of the platform of a trimaran in measurement trim (see appendix relating to measurement and measurement configuration) shall be 3 000kg minimum.

2.5.3 Catamaran

At 01/02/2011, the association cannot establish a minimum weight for the platform of a catamaran. This value may be determined at a later date if necessary, and will be lower than that of a trimaran.

2.6 Appendages

Definition:

Submersible component which is not part of the main structure whose aim is to provide horizontal lift to aid the performance of the boat.

Degree of allowance:

Movement about one axis only per appendage, movement and deformation related to lift cannot be checked.

2.6.1 Steering system

The definition of "steering system" is the system, controlled by the helmsman, whose principal aim is to steer the boat on the sea.

If the steering system comprises several appendages, these must move together, and there shall not be more than one single rotating appendage (steering system) per hull.

The transmission of power induced by the helmsman on the helm to the moving appendages of the steering system must be mechanical only, and excludes electrical and/or electronic and/or hydraulic means.

2.6.2 Daggerboards

The daggerboard(s) are not considered as part of the steering system and cannot therefore be controlled by the automatic pilot system defined in 2.2.2.

They can only be oriented or trimmed by "manual power" and this trim can only be up and down. Transmission of power provided by the boat cannot be used to move appendages.

Systems which can alter the shape of one or some appendages are forbidden.

Sufficient movement for the system to work is permitted, but must not be enough to rotate the daggerboard.

2.6.3 Number permitted

The number of appendages, including the steering system, is limited to 4.

2.6.4 Lift

General remarks: appendages must not provide vertical lift (beyond the Archimedes principle and lift relating to the heel of the boat)

For the requirements of these rules, a lifting plane is all or part of an appendage which could create vertical lift at zero heel, with the exception of the following:

- Rudder blade whose maximum angle along the longitudinal axis is less than 10°, at zero heel and with the steering centred.

Any protrusion of less than 10 mm on a section of the appendage, measured at its attachment point, and extending less than 50mm from the profile (fences).

Any appendage shape which could provide lift (beyond the Archimedes principle) by acting as a foil is strictly forbidden, as well as any angulation of daggerboards.

Plates which create a lifting surface on rudders and daggerboards are forbidden.

2.7 **Rig**

General remarks: The mast must be fixed in relation to the platform. Any equipment whose purpose is to cant the mast longitudinally or laterally while sailing is forbidden.

2.7.1 Mast chord

The maximum chord of the mast(s) (including track) shall not exceed 460mm.

Any protrusion on the mast which covers more than 500 mm of the profile shall be considered as being a part of the profile. The number of protrusions of this type shall not run counter to the spirit of this rule.

2.7.2 Fixed forestay

2.7.2.1 **Definition**

It shall be:

The forward most forestay shall be from the highest hounds and terminate at a chainplate aft of the bow (or in the case of catamarans, at a chainplate situated aft of an imaginary line joining the bows).

- Permanently fixed to the mast at the hounds
- Permanently attached to its chainplate

This "forward-most fixed forestay" is defined as the "fixed forestay" in the Class Rules.

This fixed forestay cannot be adjusted when sailing.

This fixed forestay is the solent stay. It cannot be the trinquette stay.

2.7.2.2 Height

The maximum height of the hounds (the intersection between the extension of the centreline of the fixed forestay with the fore side of the mast on the centreline or its natural extension) above the waterline, boat in measurement trim, must not be greater than 20.91 m.

(88% of the maximum air draft of 23.77 m).

2.7.3 Fixed cap shrouds

The cap shrouds shall be fixed. Removing and/or trimming them while racing is forbidden.

2.7.4 Non-removable inner shrouds

Where there are inner shrouds, these must be fixed to the mast. Removal of these while racing is forbidden.

The maximum permitted length of adjustment is 120mm.

A maximum length end-stop must be in place.

2.7.5 Inner forestays

Forestays below and aft of the forward forestay may be removable. They may be removed and/or adjusted while racing.

2.7.6 Bowsprits and spinnaker poles

Bowsprits and spinnaker poles are forbidden.

2.7.6.1 Rule applicable to Catamarans.

Bowsprits are permitted. These may be used to extend the tack of a loose-luffed sail forward of the bow, and on the centreline, on condition that this distance does not exceed 15% of LOA forward of the point defined as the "bow" (2.286m).

2.8 Sails

General remarks: sails trimmed in normal configuration shall not exceed the forward and aft vertical limits of the platform.

This does not apply to the tack of a sail flown from a bowsprit when the latter is permitted.

They shall not exceed the maximum permitted air draft.

2.8.1 Labels

All sails shall carry the "MULTI50 Sail measurement" label which can be obtained from the Multi 50 Class office

For sails built prior to 01/01/2009: this label is free

For sails built after 01/01/2009: the labels cost €100

Labels shall be sewn on close to the mainsail tack and close to the clew of headsails, on the starboard side.

Each label must be signed by the Measurer prior to the first time the sail in question is used for racing.

2.8.2 Systems for keeping sails aloft when hoisted

Halyard locks for all sails are forbidden.

Forestay locks are permitted for inner forestays.

Systems for blocking halyards (clutches, winches) are permitted but must be less than 2m above the deck.

2.8.3 Definition of sails

2.8.3.1 Mainsail

Sail hoisted on the aft side of the mast $% \left(1\right) =\left(1\right) \left(1\right$

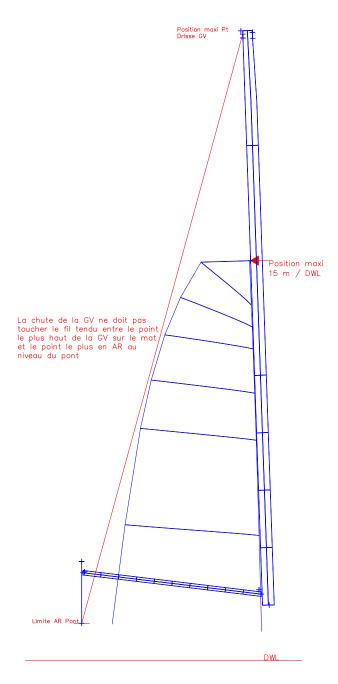
Limits

The length, measured at the head, perpendicular to the mast, shall not exceed: 2 m.

When the mainsail is hoisted in the following conditions:

Head 15 m above the waterline (a measurement band shall be affixed to the mast), the mainsail leech (with battens) must be able to pass from one side to the other without touching a rope stretched between the first main halyard sheave at the exit of the mast and the aftermost point of the deck (see drawing).

This point must not be situated at more than 1.5 metres (to be checked on all existing boats) above the waterline, vertically from the aftermost point of length overall.



2.8.3.2 Solent

Sail flown on fixed forestay.

2.8.3.3 *Trinquette*

Headsail whose area is limited to 45 m2 (Area = luff*LP/2).

The trinquette may be reefable.

2.8.3.4 Storm jib

Headsail whose area shall not exceed 22 m2 (Area = luff*LP/2) The luff length shall be less than 12 m. A minimum of 1 m² fluorescent colour is mandatory.

The storm jib may be reefable.

2.8.3.5 Lightweight headsail

This sail is defined by its position, is removable and its luff is forward and above the forward forestay. Depending on the shape and area, this sail may be defined by the following terms: Gennaker, spinnaker, code 0, code 5, drifter, etc....

2.8.4 Number of sails permitted

2.8.4.1 Minimum and maximum number on board

For each event, boats must carry a full set of sails on board.

A set of sails includes the following:

1 mainsail, 1 solent, 1 trinquette, one storm jib, 2 lightweight headsails and a trysail if the mast does not rotate.

2.8.4.2 Rule applying to boats whose beam is less than 14m:

The set of sails may include an additional lightweight headsail.

This sail is not mandatory.

2.8.4.3 Maximum number over a 2 year period

The number of new sails permitted over a 2 year period is limited to:

- One complete set (storm jib, trinquette, solent, mainsail and two lightweight headsails)
- Two additional sails

This limit also applies to boats whose beam is less than 14 m.

Definition of the duration

The duration of sail use periods are based on calendar years (from the 1st of January until the 31st of December).

A set of sails in use in year N can only be replaced in year N+2

An additional sail whose use starts in year N+1 can only be replaced in year N+3.

Use of calendar years to prevent being caught out by the start dates of major events (for example, if the start date of a transatlantic race in 2011 is the 1st of November and in 2013 is the first of October, a boat could be caught out), there is also a period for fine-tuning a set of sails which can take place during inshore events. This prevents issues surrounding the date of manufacture and the date of the sticker.

A boat which has used its sails for the first time in 2011 cannot use other sails until 2013.

If this same boat has used the two additional sails in 2012, it will have to wait until 2014 to be able to use a further additional two sails.

Special circumstances

Where there are special circumstances (total loss / theft / capsize...), the skipper must submit his/her request in writing to the Multi50 Executive Committee, which will deliver an official response.

2.9 Engine

Boats shall be equipped with a mechanical inboard diesel engine, permanently installed, non turbo with a minimum power output of 19.87Kw (27 HP) measured in accordance with ISO 8665

This engine shall propel the boat via: a two blade folding propeller whose diameter shall be at least 400 mm. This propeller and drive system (propeller shaft, Sail drive, etc.) must be permanently installed.

The step down between engine and the propeller must be appropriate for the diameter of the propeller

All means of propulsion other than a propeller outside the hull are forbidden.

The average position of the propeller when fully open shall be situated at a distance from the bow of between 30 and 80% of the length overall.

The installation of the engine and related equipment must comply with the technical prescriptions defined in part 2 of the Class Rules.

The distance between the underside of the hull and the propeller must be at least 10% of the propeller diameter (boats built prior to 2011 are not affected by this distance).

When a catamaran has an engine in each hull:

The same prescriptions apply, with:

- An identical overall minimum power output of 19.87Kw (27 HP)
- A minimum propeller diameter of 360 mm

2.10 Ballast tanks

Only hulls with accommodation may be ballasted.

Even when a trimaran's floats are equipped with access hatches, these cannot be considered as hulls with accommodation.

The filling of any compartment or tank, other than diesel and drinking water tanks allowed for in the OSR and/or Notice of Race/ Sailing Instructions, and not declared as ballast tanks are forbidden. Any bags stowed on the platform or other containers which could hold sea water must have drainage holes in them.

The skipper must provide the measurer with a diagram of the ballast system.

For trimarans:

The use of ballast is only permitted if the centre of gravity is clearly on the centreline of the boat at zero heel.

For catamarans:

The use of ballast is only permitted if the centre of gravity is clearly on the centreline of the float, boat at zero heel. Both hulls shall be equipped with identical ballast tanks.

2.11 Limitations on changing masts and appendages

Boats are not permitted to change masts or appendages during a season.

Special circumstances

In exceptional cases, the skipper must submit his/her request in writing to the Multi50 Executive Committee, which will deliver an official response.

3 BUILD RULES AND USE OF MATERIALS

The spirit of the build rules for Multi50s is to establish the best compromise between build cost and performance.

For the build of the platform, the build methods must be accessible to all.

The use of expensive materials, particularly carbon fibre, is fully limited and restricted to high load areas in order to keep to the spirit of the rules.

The Technical Committee reserves the right to inform the Executive Committee where a proposed technical solution would run counter to the spirit of this compromise.

3.1 Monitoring of design, build and modifications

To allow for the monitoring of a new build, the owner and/or skipper of the new boat shall submit a declaration of build of a MULTI50 (see appendices).

The checking of prescriptions (permitted and forbidden elements) defined in article 3 of the Class Rules shall be done as follows:

Inspection of drawings prior to build or modification of a boat which has never been measured.

Inspections during the build or modification of a boat which has never been measured.

Inspection of drawings prior to the start of modifications to a previously-measured boat.

Inspection during modifications to a previously-measured boat.

Spot inspections by the Measurer.

In order to limit inspection costs, the main method shall be inspections of drawings. This implies that the designer must provide the Technical Committee with files relating to the boat, and these must be as complete as possible.

The designer shall provide these documents as PDF files, or 3D, 2D or line drawings (Solidworks or equivalent, DWG or equivalent). List of documents in the appendix entitled MEASUREMENT AND MEASUREMENT TRIM.

The Technical Committee has a duty of confidence, underscored by a contract signed with the designer and Multi50.

After inspection of the drawings provided by the designer, the Technical Committee shall deliver its verdict as to the compliance of the boat with article 3 of the Class Rules.

3.2 General remarks about the limitations on materials

The spirit of the Multi50 build rules is to establish the best compromise between build cost and performance.

The use of expensive materials, particularly carbon fibre, is fully limited and restricted to high load areas in order to keep to the spirit of the rules.

The technical committee reserves the right to reject a proposed technical solution which would run counter to the spirit of this compromise.

3.3 <u>List of permitted materials (not exhaustive)</u>

5000 and 6000 series aluminium alloy and equivalent alloys whose mass is not less than 2.65kg/dm3. Steel, Bronze.

Epoxy resins, Polyester, Vinylester

Fibreglass, polyester, Aramid whose elastic modulus is not greater than 240 Gpa.

PVC and SAN closed-cell foam. Fely and Soric-type materials

Wood in all its forms, plywood

Thermoplastic

Urea formaldehyde glue, polyurethane, epoxy matrix

3.4 <u>List of prohibited materials (except for table of exceptions)</u>

Titanium and all its alloy forms.

Carbon fibre, aramid, S glass, PBO.

Honeycomb-type structure, no matter what the material.

3.5 **Build methods**

For composite work, the following methods are permitted

Wet lay-up

Infusion

Pre-preg while conforming to the restrictions under "exceptions"

Pressure applied does not exceed 0.98 Atmospheres at any time during the build process.

For other materials

No particular limitations.

3.6 Exceptions to the limitations of materials

Preamble:

The weight penalties applied to boats in 2009 and 2010 for boats built in 2009-2010 still apply.

Area	Build method	Materials
Hulls	Where pre-preg materials are used, a maximum of one cure per component	Carbon whose modulus is less than 240GPa is permitted in the following circumstances only:
	The pressure shall not exceed one atmosphere	Listed high load areas : 4 longitudinal UD
	The cure temperature shall not exceed 105°	reinforcements per hull, maximum width: 200 mm +- 10%
Crossbeams The crossbeam is defined by its structural envelope of the extended by bulkheads corresponding to the sections of the hull along its vertical extension	Where pre-preg materials are used, a maximum of one cure per component The pressure shall not exceed one atmosphere The cure temperature shall not exceed 105°	Carbon whose modulus is less than 240GPa is permitted. Also permitted for all separate components and/or join situated at less than 150mm from the crossbeam and its bulkheads.
Mast	Sandwich forbidden, No build method limits	Carbon whose modulus is less than 400GPa is permitted.
Boom, spinnaker pole	Sandwich forbidden, No build method limits The cure temperature shall not exceed 105°	Carbon whose modulus is less than 240GPa is permitted.
Appendages	No build method limits The cure temperature shall not exceed 105°	Carbon whose modulus is less than 240GPa is permitted.
Battens	No build method limits	
Standing and running rigging	No build method limits	Aramid, Vectran and Spectra permitted

Hardware and removable items	No limitations on use	Titanium and carbon are only permitted when they are part of a complex piece which is available off the shelf (in a publicly available catalogue) and that the equivalent part in a permitted material does not exist.
		Carbon is permitted in backing plates for hardware installation. Their surface area must not be greater than 80% of the item in question and the thickness must not be greater than 3mm
Assorted non-structural equipment (helm, rudder bars, ladders, antenna supports, etc)	Carbon is permitted when it is us standard parts, available to anyo The total mass of carbon used in on the boat.	ne in a catalogue.

3.7 High load areas

Area	Geometric limits for maximum extension of carbon reinforcements
Mast base	500mm radius sphere centred at the base of the mast
Daggerboard case	 For each daggerboard case load-bearing area (a maximum of two bearings per daggerboard or extremity of the case) 500mm radius sphere centred on the intersection of the leading or trailing edge and the load-bearing part of the case Longitudinal cylinder with a radius of R=500mm linking the two spheres for the leading and trailing edges.
Rudder	R=250mm radius sphere centred on the rotation axis of each bearing
Chainplates: This relates to standing rigging only (solent forestay, trinquette, ORC, shrouds, lower shrouds, runners)	R=250mm radius sphere centred on the outside of the hull and the axis of load of the chainplate

3.8 Other limitations

3.8.1 Nets

Nets between the hulls must be a minimum of 5 mm polypropylene for a 50mm mesh. High modulus polyethylene (dyneema /spectra) is not permitted.

3.8.2 Batteries

The service and start batteries shall be exclusively lead batteries.

3.8.3 Materials permitted for sails

The following structural fibres are permitted:

- aramid, and high modulus aramid
- high modulus polyethylene
- polyester

Carbon is not permitted.

4 APPENDICES

4.1 Measurement and measurment trim

4.1.1 Measurement trim

Boats which have already been measured under measurement systems other than that of the MULTI 50 Class must be re-measured.

A new boat may only be measured if the owner or skipper has submitted a build declaration at the beginning of the build.

The measurer may be accompanied by a member of the Rules Committee and/or Class member of staff.

4.1.2 List of documents required

The owner or skipper must submit the following upon request for measurement:

- Request for measurement (in the appendices)
- The complete sail plan (dxf or dwg format)
- The overall drawing of the platform (dxf or dwg format)
- A diagram of the ballast system if the boat is equipped with ballast tanks
- Where applicable for older boats, a request for grandfathering (in the appendices)
- A written declaration regarding conformity to paragraph 13 on the subject of materials (in the appendices)

4.1.3 Measurement conditions

The skipper and/or owner or a nominated representative must be present for the measurement session.

Any handling of the boat and/or its equipment must be done by skipper and/or owner or their representative, or a company or person mandated by them.

4.1.3.1 Measurement ashore

The boat must be presented to the measurer in one of the following 2 configurations (1 or 2)

1. Boat ashore without mast:

- laterally horizontal
- longitudinally close to the float plane.

Mast on trestles.

Measurements are taken with the aid of linear measurement tools (tape measures, 20 m metal tape measure) and an optical level.

2. Boat ashore, mast stepped, not necessarily aligned as above

(The boat can be without mast, in which case the mast will be measured ashore on trestles)

– there must be a clear distance of at least 15m perpendicular to the boat (on one side), as well as at the bow and stern.

Measurements are taken with the aid of linear measurement tools and with photogrammetric recordings and and analysis.

During measurement ashore, the following operations are carried out:

- measurement markings on the hull
- readings and/or calculations of air draft (in relation to the reference for measurements ashore)
- determining the bow and stern
- determining LOA and maximum beam
- determining draft (in relation to the reference for measurements ashore)
- on the mast, recording of the forward-most forestay fitting.
- verification of mast chord

4.1.3.2 Measurement afloat

The boat must be presented on calm water (less than 3 cm chop) and less than 10 knots of wind.

The following equipment shall be in place for measurement:

- Mainsail on, furled on the boom (without boom cover)
- Solent, trinquette and storm jib on furlers or furled on the deck (without covers)
- Other sails disembarked
- No personal effects on board
- No food, water, kettle, saucepan etc....
- Spares and removable equipment (blocks, tools etc...)
- 20 litres of diesel maximum
- Daggerboard(s) raised
- Generator disembarked
- Batteries lashed in place
- Sheets in place
- Runners reasonably taken on where applicable
- Mast aligned on the centreline of the boat (where the mast rotates)

During measurement afloat, the following are operations are carried out:

- freeboard at the measurement marks,
- mast rake
- verification of the mainsail leech curve
- Verification of the bowsprit (older boats) and spinnaker pole
- Inspection of OSR category 1 equipment

At the end of the measurement and inspection sessions, the final calculations are done. The final measurement report is then drafted and sent to the owner and the **MULTI50** Class.

The skipper shall provide the following for measurement ashore:

- A stable means of accessing the platform
- Nets, trampolines etc. must be in place

The skipper shall provide the following for measurement afloat:

- a stable RIB (small semi-inflatable or equivalent) with one person aboard.

4.2 MULTI50 START OF BUILD DECLARATION



E-mail :
starting the build of a MULTI50 in compliance with the MULTI50 Class Rules 2011-
h the boat must be registered:
mber: Country in which boat registered:
boat will be built in compliance with the MULTI50 Class Rules.
nember of the MULTI50 Class.
ne measurer unlimited access to the build facility throughout the entire boat build. I location where the boat will be built:
n date:
date:

To be sent by e-mail to the Class at: <u>multi50@class-multi50.org</u>

4.3 REQUEST FOR MEASUREMENT

Signature and/or company stamp:



SURNAME of SKIPPE	R :	First name :	
NAME of BOAT :			
Launch date :			
Sail n° requested	:		
Flag	:		
Designer	:		
Builder :			
Location where mea	asurement will take place :		(ashore)
Telephone number	for contact etc. :		
Name of skipper's re	epresentative :		
Telephone number	:		
Signed at :	date :	_	
Skipper's signature			

To be sent by e-mail to the Class at: multi50@class-multi50.org

4.4 Request for grandfather clauses



I undersigned :			
SURNAME of S	KIPPER :	 First name:	
NAME of BOAT	:		
Launch date	:		
	g in an ocean race:		
Sail n°	:		
Flag	:		
Designer	:		
Builder	:		
	ndfather clauses for tl		
	date		

To be sent by e-mail to the Class at: multi50@class-multi50.org

Skipper's signature

4.5 <u>Declaration of refit*</u>



l undersigned:	
SURNAME of SKIPPER :	First name :
NAME of BOAT :	
Date of haul out :	
Date of re-launch (anticipated) :	
Sail n° :	
Designer :	
Address where refit taking place :	
Declare that the MULTI50 is going into refit for (li	ist the work planned on the boat):
Signed at : date :	
Skipper's signature	

First name : _____

*This document will enable the measurer to anticipate which items will need measuring following the refit.

4.6 <u>DECLARATION OF NEW SAILS</u>



NAME of BOAT :	Sail n°:	
Sail loft :		
Type of sail	Biennial set of sails	Additional sail
Mainsail		
Solent		
Trinquette		
Heavy air jib		
Light headsail		
Light headsail		
Tick the relevant boxes		
Signed at :	date :	Skipper's signature

The "MULTI50 Sail Measurement" labels will be sent to the sail loft to be sewn on sails.

This request to be accompanied by payment for the above.

SURNAME of SKIPPER : _____

To be sent by e-mail to the Class at: <u>multi50@class-multi50.org</u>

4.7 <u>Declaration of compliance of materials and build methods.</u>



I undersigned			
SURNAME of SKIPPER :			First name :
NAME of BOAT	「:		
Launch date	:		
Sail n°	:	<u></u>	
Certify that:			
The build of m 2011-2014 Cla		th chapter 3 "Bu	uild rules and use of materials" in the Multi50
Signed at	dat	e :	
The skipper			co-signed by: The builder
			Name and company stamp:

To be sent by e-mail to the Class at: <u>multi50@class-multi50.org</u>

4.8 Measurement costs

Measurement costs shall be paid by the owner prior to measurement.

4.9 <u>Dispensations and penalties</u>

4.9.1 Air draft:

Grandfather rule applicable to all boats

Any boat built, launched and having competed in and finishes a transatlantic race prior to the 1st of January 2006. For these boats: the maximum air draft is 24.384 m (80 feet). The maximum height of the hounds is 88% of permitted air draft, which equates to 21.457 m.

A skipper may only make use of this grandfather rule if the original mast has been neither physically, dimensionally nor geometrically modified

Boats to which this applies: to be listed

4.9.2 Mast chord:

Any boat built, launched and having competed in and finishes a transatlantic race prior to the 1st of January 2006.

The chord of the profile may be increased by 15% which equates to 529 mm.

A skipper may only make use of this grandfather rule if the original mast has been neither physically, dimensionally nor geometrically modified.

Boats to which this applies: list

4.9.3 Bowsprit and spinnaker poles:

Trimarans built, launched and having competed in and finished a transatlantic race prior to the 1st of January 2006 and equipped with a bowsprit before this date, may have a fixed bowsprit which serves to extend the tack of a loose-luffed sail forward of the bow, and on the centreline, on condition that the distance does not exceed 15% LOA forward of the point referred to as "the bow" (or 2.286m).

List

4.9.4 Mainsail halyard lock:

Dispensation is granted to "Prince de Bretagne" which already had this system before the rule change. Dispensation will be revoked if the mast is changed.