



INTRODUCTION

The intention of the Cape 31 One-Design Class rules is to ensure that boats are as close to identical as reasonably possible in construction, hull shape, weight, weight distribution, equipment, rigging and sail plan.

Therefore, coring, drilling out, rebuilding, replacement of material, grinding or relocating standard equipment, fairing interior or exterior parts of hull, hull appendages or rig that improves moments of inertia, or changes the standard shapes or contours shall be prohibited.

The Cape 31 One-Design hulls, hull appendages and rigs are measurement and manufacturing controlled.

The Cape 31 One-Design hulls and hull appendages shall only be manufactured by the licenced boat manufacturer appointed by the Cape 31 One-Design Licence Holder.

Cape 31 One-Design rigs shall only be manufactured by the licensed spar manufacturer appointed by the Cape 31 One-Design Licence Holder.

Cape 31 UK One-Design sails may be manufactured by any sailmaker.

All equipment is required to comply with the Cape 31 One-Design Building Specifications.

Cape 31 One-Design hulls, hull appendages and rigs may, after having left the manufacturer, only be altered to the extent permitted in Section C of the Class Rules.

Owners and crews should be aware that compliance with rules in Section C is NOT checked as part of the certification process. Rules regulating the use of equipment during a race are contained in Section C of these class rules, in Equipment Rules of Sailing Part I and in the Racing Rules of Sailing. This introduction only provides an informal background and the Cape 31 One-Design Class Rules proper begin on the next page.

The class permits in-house certification for hulls, hull appendages, masts and sails. However, they may also be checked through random independent inspection by official measurers.

When equipment and/or components are not allowed because they are not specifically permitted by the class rules, then this restriction pertains not only to the use but also the presence of this equipment/component on board. THESE RULES ARE CLOSED CLASS RULES. IF THE RULES DO NOT SPECIFICALLY SAY THAT YOU "MAY" THEN YOU "SHALL NOT." COMPONENTS, AND THEIR USE, ARE DEFINED BY THEIR DESCRIPTION.

RULES

PART I – ADMINISTRATION

Section A – General

The Cape 31 One-Design Class has been created as a strict one-design class where the true test when racing is between sailors and not boats. The fundamental objective of the class rules is to ensure that this concept is maintained, while preserving the Cape 31's ease of handling, reasonable cost of ownership, safety and suitability as a true all-round racing boat.

1. ABBREVIATIONS

- 1.1. Class – Cape 31 One-Design Class
- 1.2. Association – Cape 31 One-Design Class Association
- 1.3. Rule – A rule in the Cape 31 One-Design Class Rules
- 1.4. ERS - Equipment Rules of Sailing
- 1.5. RRS - Racing Rules of Sailing
- 1.6. OSR - Offshore Special Regulations
- 1.7. LH – Cape 31 Licence Holder
- 1.8. LBM - Licensed Boat Manufacturer, appointed by the License Holder
- 1.9. LSM – Licensed Spar Manufacturer, appointed by the License Holder

2. AUTHORITIES

- 2.1. The LBM and LH have the authority to withdraw a boat's Builder Certificate if the boat has been materially altered and therefore its right to compete in any Class event until the Builder Certificate has been reinstated.
- 2.2. Blank
- 2.3. The Class Measurer has the authority to withdraw certification of any sails that fail to meet the specifications in these Rules.
- 2.4. Neither the Class Measurer, an official measurer, or an equipment inspector are under any legal responsibility in respect of these Rules or the accuracy of measurement. No claim arising from them shall be entertained.

3. ADMINISTRATION OF THE CLASS

- 3.1. The UK Class is administered by Cape 31 UK, namely David Bartholomew, David Swete and Suzy Peters.

4. RULES INTERPRETATION

- 4.1. Interpretation of ERS shall be made in accordance with World Sailing Regulations.
- 4.2. Interpretation of the Rules shall be made by the Class Technical Committee in consultation with the LBM or LSM when appropriate.

5. SAIL NUMBERS

- 5.1. Blank

6. BUILDER CERTIFICATE (EXCLUDES SPARS, RIGGING AND SAILS)

- 6.1. The Builder Certificate shall record the following information:
 - a) Blank
 - b) Hull identification number
 - c) Builder details
 - d) Date of issue of initial Builder Certificate
 - e) Blank
- 6.2. The Builder Certificate becomes invalid if the hull, deck, foils or builder-supplied fixed fittings are altered in any way, including through damage, in breach of the Rules, except to the extent that it is permitted in these Class Rules
- 6.3. The Builder Certificate shall be reinstated once the Class Measurer confirms to the LBM that the boat has been restored to conformity with the Rules. Details of the relevant remedial work shall be recorded on the Certificate.

7. MAST CERTIFICATE

- 7.1. Blank

8. RETENTION OF DOCUMENTATION

- 8.1. The Owner(s) shall retain the valid Builder Certificate, copies of which will be required on registration for all Class races or Class Regattas.
- 8.2. A copy of each Cape 31's current valid Builder Certificate shall be retained by the LBM and LSM respectively, and it will be each owner's responsibility to ensure that copies of their boat's documents are lodged with the Class Secretary.

Section B – Boat Eligibility & Equipment Inspection

For a boat to be eligible for Class racing, it shall comply with the rules in this section.

9. CLASS RULES AND CERTIFICATION

- 9.1. The boat shall:
 - a) Be in compliance with the class rules.
 - b) Have a valid Builder Certificate.
 - c) Blank

10. EQUIPMENT INSPECTION

- 10.1. In the case of a dispute at a Class event alleging non-compliance with the Rules where specific measurements are not stated, the Event Equipment Inspector shall adopt the following procedure:

- a) A sample measurement of the disputed item shall be obtained by taking the identical measurement from a randomly selected control group of five boats or items of equipment.
 - b) The measurement of the disputed boat or items of its equipment, taken using the same technique as above, shall be compared to the sample.
- 10.2. If any of the measurements obtained from the disputed boat or item of equipment lie outside the corresponding range of measurements found in the control group, the matter together with the details of the measurement methods and any other relevant information shall be referred to the race committee.

PART II – REQUIREMENTS AND LIMITATIONS

The crew and the boat shall comply with the rules in Part II when racing in Class events. In case of conflict Section C shall prevail. The rules in Part II are closed class rules.

Section C – Conditions for Racing

11. RULES

- 11.1. The ERS Part I – Use of Equipment shall apply.

12. ADVERTISING

- 12.1. Blank

13. CREW

13.1. LIMITATIONS ON THE CREW

- a) The crew shall consist of 4 or more persons.
- b) The weight of all crew members on board while racing, weighed in light street clothes, shall not be greater than 595 kilograms. This rule will be in place for the Cape 31 UK fleet during IRC Events where the Cape 31's are joining in with other classes and also Cape 31 UK Class regattas. The owner driver will be given a nominal weight of 85kgs while all other crew members will need to declare their weights.
- c) Substitution of crew members, or a change in the number of crew members, will not be allowed during a regatta without prior written approval of Cape 31 Class UK.
- d) No boat shall have more than three World Sailing Group 3 sailors aboard while racing.
- e) Sailors without a current and valid World Sailing classification shall be considered Group 3 sailors.

13.2. LIMITATIONS ON THE DRIVER

- a) Cape 31 UK drivers shall be owner drivers. In the case of an owner not being able to make an event, a replacement helmsman shall be approved by Cape 31 UK.

14. SAFETY EQUIPMENT

- 14.1. All equipment shall be functional for its intended use.
- 14.2. Boats shall carry an anchor and chain with a combined weight which shall not be less than 8 kgs.
- 14.3. Lifelines shall conform to the World Sailing Ocean Sailing Regulations Category 4.
- 14.4. The port and starboard lifelines shall be of wire, manufacturer optional, and shall not deflect more than 60mm from a straight line between two points of support when a mass of 5kgs is attached at the point of maximum deflection
- 14.5. The rear gate lines across the transom shall be closed while racing and shall not deflect more than 75mm when a mass of 5kgs is attached at the point of maximum deflection.
- 14.6. Boats to comply fully with OSR Cat 4

15. OPTIONAL EQUIPMENT, REPLACEMENT AND MODIFICATION

- 15.1. The following may be fitted or carried:
 - a) Electronic or mechanical timing devices.
 - b) Tactical and navigational instruments and charts.
 - c) Below-decks spinnaker bags, rollers, guides and retrieval gear of optional design.
 - d) A jib hobble system.
 - e) Cleats for gennaker sheets.
 - f) A batten not to exceed 150mm added to the end of the bowsprit as a preventer for the gennaker sheet.
 - g) Sheet-tail bags and winch-handle holders fitted to the sides of the cockpit.
 - h) Footrests supplied by the LBM and fixed to the cockpit floor. Location is optional.
 - i) Non-slip material on deck or bowsprit to promote safe movement.
 - j) Protective plates attached to the deck under the gennaker turning blocks.
 - k) An anti-chafe protective sleeve over the boom vang system.
 - l) Padding on the lower lifelines.
 - m) Tubing on the upper lifelines forward of the shrouds to protect the spinnaker.
 - n) Lashing, tape and other anti-chafe gear on the hull, rig or sails.
 - o) Mooring lines, fenders, spare lines, spare equipment, tools, sail bags, storage bags and other personal items that provide no sailing performance advantage.
 - p) Portable toilet.
 - q) Reelers for Gennaker Sheets.
- 15.2. The following items may be replaced provided that the replacement part is of similar size, weight, location, power ratio and performs the same function:
Blocks, cleats, mainsheet swivel base, shackles, pins, turnbuckles.

- 15.3. The following modification is permitted: Holes may be made, and local reinforcement applied, in the hull for the fitting of electronic navigation systems.
- 15.4. The following are prohibited:
- a) Moving deck hardware from the factory installed position, and
 - b) Making holes, bushed or unbushed, in the deck for the purpose of leading controls or tails below deck, however UK Cape 31's may have Bushes installed for purpose of sheet reelers
- 15.5. The following may be replaced:
- a) Forward spinnaker sheet blocks to Harken 75 Ratchet or Ratchamatic.

16. CLASS WEIGHT

- 16.1. Blank

17. MAINTENANCE

17.1. HULL AND APPENDAGES

- a) Shapes and profiles may not be altered. No fairing is permitted.
- b) The hull, foils, sail drive and bowsprit may be lightly abraded to allow for the application of paint. The abrasion shall be the minimum needed to ensure adhesion of the paint.
- c) If a rigid "sanding block" is used, it may not be longer or wider than 300mm.
- d) Old anti-fouling may be removed using a commercially available anti-fouling remover.
- e) The final finish may be of any commercially available paint.
- f) Scratches and minimally damaged areas of the hull and appendages may be repaired by the owner or at the owner's direction.
- g) UK boats shall not be faired however antifoul is not mandatory and bottoms can be finished in a suitable product approved by Cape 31 UK.
- h) Any more serious damage shall be repaired by, or under the direction of, the LBM. Details of such repairs shall be recorded on the boat's Builder Certificate.
- i) Keel and rudder templates, approved by the Association, may be used by the Class Measurer to check foil shape conformity.

17.2. SPARS AND STANDING RIGGING

- a) Any significant damage to the mast, spreaders or boom shall be repaired by, or under the direction of, the LSM. Details of repairs to the mast shall be recorded on the boat's Mast Certificate.
- b) Standing rigging may be replaced by the owner provided that the replacement rigging is of the same specification as the original.

Section D – Rig

18. GENERAL

- 18.1. The spars and their fittings shall comply with the class rules in force at the time of manufacture except those rules in Section C where the current rules shall apply.

19. MAST

19.1. DIMENSIONS

- a) Top of boom to the bottom of band at the mast head (P) shall be 12500mm.

19.2. USE

- a) The mast as supplied and assembled shall be stepped in accordance with the rigging instructions.
- b) The mast butt shall not be adjusted while racing.
- c) The mast partners shall be firmly secured.
- d) The spreader bars may not be modified in any way.
- e) Use of tape, paint and padding on the spreaders, for chafe protection or marking is allowed.

20. BOOM

20.1. DIMENSIONS

- a) The back of the mast to front of boom band (E) shall be 4500mm.

20.2. USE

- a) The intersection of the aft edge of the mast spar and the top of the boom spar, each extended as necessary, shall not be below the upper edge of the mast lower limit mark when the boom spar is at 90° to the mast spar.

21. STANDING RIGGING

21.1. USE

- a) The shrouds may not be adjusted while racing.
- b) The shrouds and forestay must remain attached at all times while afloat on race days.
- c) Standing rigging shall not have any tension gauges.
- d) C is amended, in that a forestay load cell may be used

22. RUNNING RIGGING

22.1. A boat shall not use purchases other than the following purchases:

- a) Main Halyard 2:1
- b) Jib Halyard 2:1
- c) Running Backstays not to exceed 3:1
- d) Mainsheet coarse tune purchase of 2:1
- e) Mainsheet fine tune not to exceed 16:1.
- f) Traveller purchase not to exceed 4:1.
- g) Boom vang purchase not to exceed 16:1.
- h) Headsail sheet purchase of either 1:1 or 2:1.

- i) Headsail lead purchase not to exceed 8:1
 - j) Outhaul purchase not to exceed 4:1 inside the boom, but the tail may be led through the mainsail clew and dead-ended to the end of the boom to achieve 8:1.
 - k) The gennaker sheets shall be led through the standard block locations.
 - l) Main Cunningham purchase not to exceed 8:1.
 - m) Spinnaker retriever reverse purchase not to exceed 1:3.
- 22.2. DIMENSIONS
- a) The core diameters of running rigging shall not be less than what was supplied by the builder. The material of running rigging shall be unrestricted. Yachts shall not change the diameter of any running rigging during a regatta of six or less consecutive days.
- 22.3. Running rigging shall not have tension gauges.

Section E – Sails

23. PARTS

23.1. Cape 31 UK Sail Wardrobe for IRC and UK Class Events:

- 1 Squaretop Mainsail – onboard at all times and the same main for an entire regatta.
- 2 Jibs (max sizing below, no minimum sizing) can choose maximum of 2 jibs (excluding OSR Heavy weather jib) at start of regatta, however must use the same jibs for an entire regatta. Can choose to sail with 0,1 or 2 jibs for a regatta.
- 1 OSR Heavy Weather Jib (max sizing below) must be onboard at all times.
- 3 Gennakers of maximum IRC area of 116.04 must be onboard at all times. There is no limit on cloth or design of gennakers.

Cape 31 UK Sails will have max areas that will make sure their IRC Rating will be between 1.135 & 1.137. There is no limitation on materials or sailmakers. The intention is that a Cape 31 will rate 1.137 when sails are new and a minimum of 1.135 once they are remeasured. Sails are to be IHC measured. If results are extracted from IRC events only the elapsed times will count toward UK class scoring ie. boats will be level rated. Conceivably a Cape 31 could not only win the Cape 31 Class of an IRC event, she could also win the overall IRC class. When boats are UK Class Racing only their elapsed times will be counted.

24. GENERAL

24.1. RULES

- a) Sails shall comply with the class rules in force at time of certification and be measured under IHC (IRC) measurement guidelines by the sailmaker.
- b) When racing under **IRC** or **Class**, A **Mainsail**, OSR **Heavy weather Jib** and **3 Gennakers must** be carried onboard from when the boat leaves the dock on day 1 of racing, until the end of the regatta. A boat **must** have the same sails on for the duration of the event (Class or IRC). For clarification, aside from her Heavy weather Jib a boat can choose to race with 0,1 or 2 other jibs for a regatta, however they must have the same jibs onboard that they start off with on day 1.

24.2. SAILMAKER

- a) No license is required.
- b) Cape 31 UK Sails can be supplied by any Sail loft.

24.3. MODIFICATIONS, MAINTENANCE AND REPAIR

- a) If any sail is damaged and requires substantial repair, the sail will require re-certification which may require a new IHC measurement.

25. MAINSAIL

25.1. DIMENSIONS (given in millimetres and max size)

- a) Mainsail may not extend past bands P and E on the rig.
- b) P:12.54m E:4.50m – no limit on cloth weight

Mainsail	Maximum	
HW	1120	Head Width
MUW	1520	
MTW	2120	
MHW	3060	
MGL	3810	Main Girth Lower

26. HEADSAILS

- a) The jib luff shall have hanks of any material.

26.2. DIMENSIONS: (given in millimetres)

- a) 2X Jibs max sizes (Maximum IRC area= 24.67m²) no limit on cloth weight.

	Maximum	
HLU	12480	Luff Length
HLP	3730	
HUW	630	
HTW	1120	
HHW	2000	
1/4	2870	¼ girth

- b) 1X Heavy Weather OSR Max Jib

	Maximum
HLU	11530
HLP	3650
HUW	580
HTW	1040
HHW	1890
1/4	2730

27. GENNAKERS

- a) 3 Gennakers **must** be carried on board at all times while racing. There is no cloth weight limit or minimum size for these sails.
- b) A gennaker retrieval line may be attached to the sail.

27.1. DIMENSIONS:

- a) Maximum Area for Gennakers: **IRC Area: 116.04m², STL: 5920**. If there is a 'spot check' sails need to be able to comply with the maximum area.

BUILDER SPECIFICATIONS

BS 1 Interior dimensions

		<i>Tolerance</i>
Description	<i>mm</i>	<i>mm</i>
Forward blkhead to Aft Mast collar opening	25	2
Companion way blkhead (aft) to Forward edge of front engine mount	95	2
Fuel tank size (Length)	480	2
Fuel tank size (Width)	220	2
Center Structural rib (Aft edge) to Centerline of Mast foot bolts (Aft)	440	2
Center Structural rib (Aft edge) to Centerline of Mast foot bolts (Forward)	620	2

BS 2 Exterior dimensions

		<i>Tolerance</i>
Description	<i>mm</i>	<i>mm</i>
Forehatch opening (diameter)	660	10
Forehatch track	1360	10
Forehatch slider (length)	735	10
Forehatch slider (width)	650	10
Mast collar/Deck opening (length)	300	10
Stansion to stansion (3rd from stern)	3070	10
Companion way (Length)	600	10
Companion way (Width)	670	10
Pulpit gap (bottom)	195	5
Pulpit gap (middle)	265	5
Pulpit gap (top)	460	10
Toe rail front to Pulpit base	265	10
Forestay pin to front edge of forward pulpit base line	90	5
Total tiller arm reach	1230	10
Helm/Trimmer footstep (Length)	1250	10
Traveller track length (End cap - End cap outer edge)	1510	10
Jib track length (End cap - End cap outer edge)	490	10
Jib track to Hull edge	375	5
Transom to Aft edge of rudder box	1210	10
Chainplates position (Front edge going forward to forestay pin)	4275	30
Chainplates position (Aft edge going aft to corner of transom)	5020	30

BS 3 Appendage dimensions

Description	Tolerance	
	<i>mm</i>	<i>mm</i>
Bottom of sprit to Center Bobstay hole	650	5
Saildrive blades folded (Length)	300	5
Saildrive total (length)	520	5
Hull to bottom of sail drive	350	5
Aft keel well to Front edge Sail drive	900	10
Front length on Keelfin (Stock)	65	2
Aft length on Keelfin (Stock)	180	10
Bottom of hull to deepest point of bulb (Perpendicular)	2240	10
Bottom of hull to tip of rudder blade (Perpendicular)	1695	5
Bowsprit forward of bow (Length)	2025	10

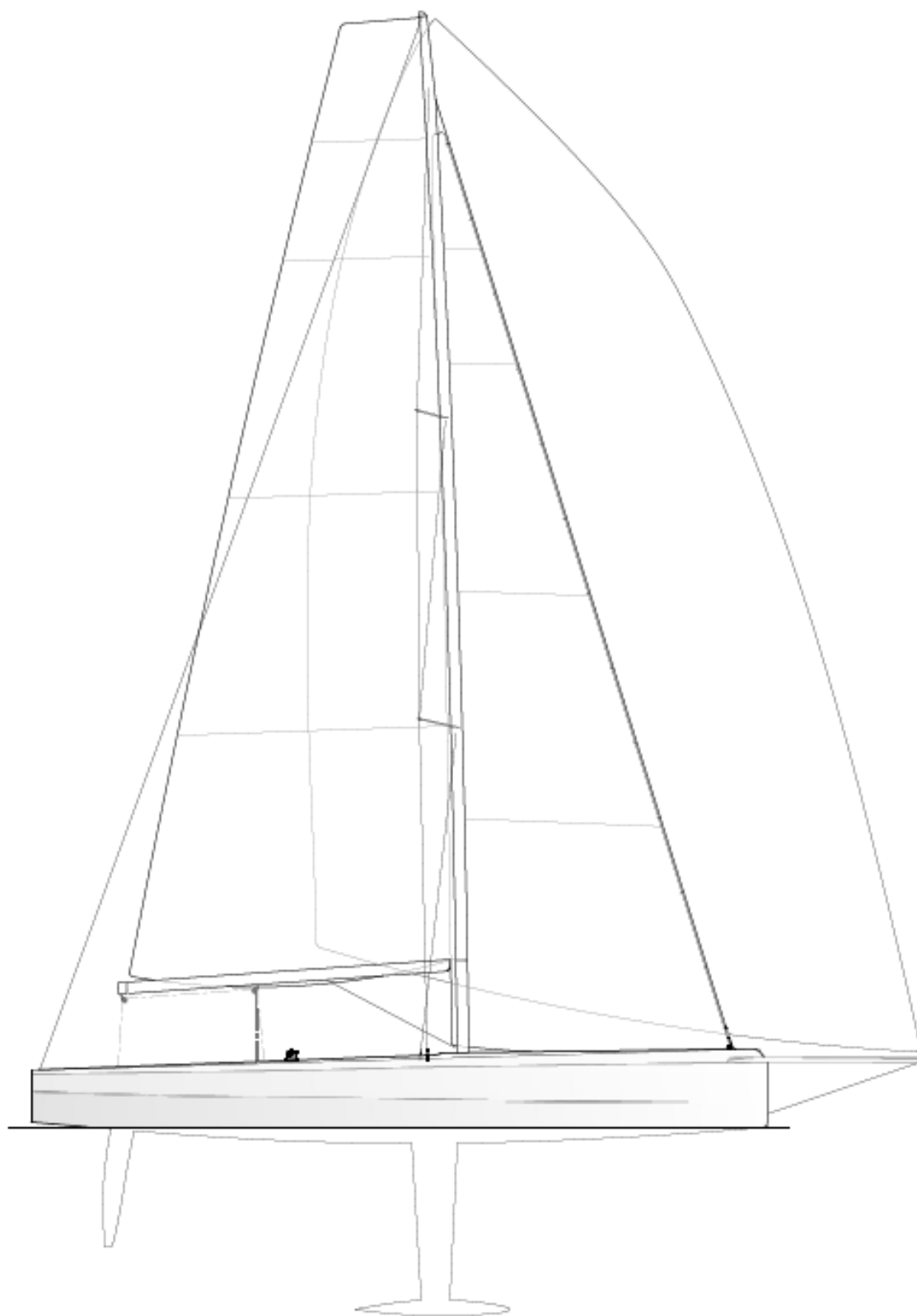
BS 4 Keel Weight

The weight of the keel, including the carbon keel fin, keel bulb, fin-to-bulb attachment pins, bulb fairing, primer and paint, and two M20 keel locking bolts shall be between 715 and 720 kgs.

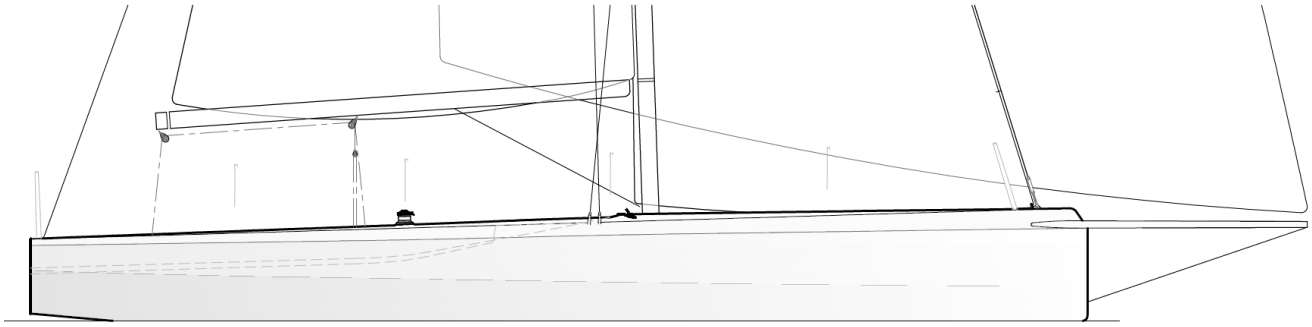
BS 5 Engine, drive leg and propeller

The engine, drive leg and Gori propeller shall be the standard Yanmar engine (raw water-cooled model) coupled to a saildrive; or equivalent equipment as supplied by the LBM. Approved engine is model number Yanmar 2YM15.

AP2 SAIL PLAN



AP3 RIGGING PLAN



AP4 DECK HARDWARE ARRANGEMENT

