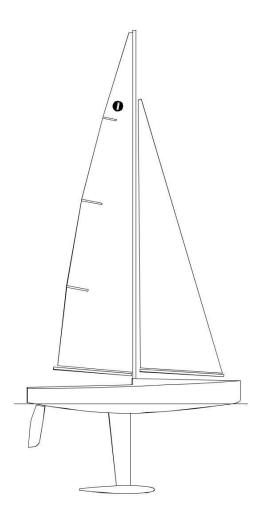


# INTERNATIONAL ONE METRE



# CLASS RULES 2022



The One Metre class was developed by the IMYRU Permanent Committee and was adopted as an international class in 1988

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#### Introduction

This introduction provides an informal background only and the International One Metre(IOM) Class Rules proper begin on the next page.

#### Certification and alterations

IOM Class hulls, hull appendages, rigs and sails are certified by certification control.

IOM Class hulls, hull appendages, rigs and sails may, after initial certification control only be altered to the extent permitted in Section C of the class rules.

#### Responsibility

Owners and competitors should be aware that compliance with rules in Section C is NOT checked as part of the initial **certification control** process.

It is the responsibility of the owner and any other person in charge to ensure that a **boat** is maintained to comply with her **class rules** and that her **certificate** remains valid (RRS 78.1).

#### Deviations outside of tolerances

When the technical committee for an event decides that a **boat** does not comply with the **class rules** it shall protest the **boat** (RRS 60.4).

When the protest committee finds that deviations in excess of tolerances specified in the **class rules** are not caused by normal wear and tear and/or do improve the performance of the **boat**, it shall penalise her.

If the protest committee decides that a **class rule** has been breached deliberately or knowingly by an owner or competitor they may call a hearing under rule 69.

#### Class rules

Rules regulating the use of equipment during a race are contained in Section C of these **class rules**, Part I of the ERS and in the Racing Rules of Sailing.

The class rules for the International One Metre Class are closed class rules in which anything not specifically permitted by the class rules is prohibited. Individual rules may require, limit, or permit as necessary.

# Section A - General

#### A.1 LANGUAGE

- A.1.1 The official language of the class is English and in case of dispute over translation the English text shall prevail.
- A.1.2 The word "shall" is mandatory and the word "may" is permissive.
- A.1.3 Except where used in headings, when a term is printed in "bold" the definition in the ERS applies and when a term is printed in "*italics*" the definition in the RRS applies.

#### A.1.4 DEFINITIONS

<u>Spar</u> The main structural part(s) of the **rig** to, or from, which **sails** are attached and/or supported.

#### A.2 ABBREVIATIONS

A.2.1 WS World Sailing

IRSA International Radio Sailing Association

MNA WS Member National Authority

DNM IRSA Member

IOM ICA International One Metre International Class Association

NCA National Class Association ERS Equipment Rules of Sailing RRS Racing Rules of Sailing

#### A.3 AUTHORITIES AND RESPONSIBILITIES

- A.3.1 The international authority of the class is the IRSA which shall cooperate with the ICA in all matters concerning these **class rules**.
- A.3.2 No legal responsibility with respect to these **class rules**, or accuracy of **certification**, rests with:

WS

the IRSA

the MNA

the DNM

the IOM ICA

any NCA

the certification authority

an official measurer

No claim arising from these **class rules may** be entertained.

A.3.3 Notwithstanding anything contained herein, the **certification authority** has the authority to withdraw a **certificate** and shall do so on the request of the IOM ICA.

#### A.4 ADMINISTRATION OF THE CLASS

- A.4.1 IRSA has delegated its administrative functions of the class to DNMs. The DNM may delegate part or all of its functions, as stated in these **class rules**, to an NCA.
- A.4.2 In countries where there is no DNM, or the DNM does not wish to administer the class, its administrative functions as stated in these **class rules** shall be carried out by the IOM ICA which may delegate the administration to an NCA.

#### A.5 SAILING INSTRUCTIONS

- A.5.1 These **class rules** shall not be varied by sailing instructions except as provided by A.5.2.
- A.5.2 At World or Continental Championships, the sailing instructions may vary these **class rules** only with the agreement of the IOM ICA.

#### A.6 CLASS RULES AMENDMENTS

A.6.1 Amendments to these **class rules** shall be proposed by the IOM ICA and are required to be approved by the IRSA.

#### A.7 CLASS RULES INTERPRETATIONS

#### A.7.1 GENERAL

Interpretation of **class rules** shall be made in accordance with the IRSA Regulations.

#### A.7.2 AT AN EVENT

Any interpretation of **class rules** required at an event may be made by an international jury constituted in accordance with the RRS. Such interpretation shall only be valid during the event and the organising authority shall, as soon as practical after the event, inform the IRSA, the DNM and the IOM ICA.

#### A.8 HULL REGISTRATION NUMBER

- A.8.1 Registration numbers shall be issued by the **certification authority**.
- A.8.2 Registration numbers shall be issued in consecutive order starting at "1".
- A.8.3 Each **hull** shall have the **certification authority's** national letters and sequentially issued unique registration number. Under no circumstances may a registration number be used on a **hull** other than the **hull** on which it was first used.

#### A.9 CERTIFICATION

- A.9.1 For the **certification** of a **hull** all items required by the **certification control** form(s) to be **certified** shall be **certified** by an **official measurer** and the details entered onto the form(s).
- A.9.2 The **certification control** form(s), and **certification** fee if required, shall be sent to the **certification authority** in the country where the **hull** is to be registered within 4 weeks after completion of **certification control**.
- A.9.3 Upon receipt of a satisfactorily completed form(s) and **certification** fee if required within the 4-week time limit, the **certification authority** may issue a**certificate**.

#### A.10 VALIDITY OF CERTIFICATE

- A.10.1 A valid **certificate** is issued using the IRSA approved certification documentation in accordance with the procedures in A.9 and A.12. Certificates from other documentation or sources are invalid.
- A.10.2 A **certificate** becomes invalid upon:
  - (a) a change of ownership,
  - (b) withdrawal by the **certification authority**.

#### A.11 COMPLIANCE WITH CLASS RULES

- A.11.1 A **boat** ceases to comply with the **class rules** upon:
  - (a) use of equipment that does not comply, or causes the **boat** not to comply, with limitations in the **class rules**,
  - (b) use of equipment that does not comply, or that causes the **boat** not to comply, with limitations recorded on the **certificate**,
  - (c) alteration or repair of equipment required by the **certification control** form(s) to be **certified**, except where permitted by the **class rules**,
  - (d) a change of class rules that causes equipment in use to cease to comply, except where the equipment may comply with the class rules in force at the time of its initial certification.
- A.11.2 A **boat** that has ceased to comply with the **class rules** may be brought into compliance:
  - (a) when limitations affecting the equipment are in the class rules or on the certificate by an official measurer carrying out certification control of affected equipment,
  - (b) and otherwise by replacing equipment that does not comply with the class rules or certificate with equipment that does comply.

#### A.12 RE-CERTIFICATION

- A.12.1 A **hull** may be issued with a new **certificate**, showing dates of re**certification** and initial **certification** as applicable:
  - (a) when a certificate becomes invalid upon change of ownership by application of the new owner to the certification authority in the country where the hull is to be registered. The application shall include the old certificate and re-certification fee if required. In the case of an imported hull the certification authority shall request the certification control form(s) from the previous certification authority and a new hull registration number shall be issued,
  - (b) when a **certificate** has been withdrawn, or when the **certificate** and **certification control** form(s) cannot be located

by application of the procedure in A.9.

#### A.13 RETENTION OF CERTIFICATION DOCUMENTATION

- A.13.1 The **certification authority** shall:
  - (a) retain the original documentation upon which the current **certificate** is based.
  - (b) upon request, transfer this documentation to the new **certification authority** if the **hull** is exported.

# Section B – Boat Eligibility

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

#### **B.1 CLASS RULES AND CERTIFICATION**

- B.1.1 The **boat** shall:
  - (a) be in compliance with the class rules.
  - (b) have valid certificate.
  - (c) have valid **certification marks** as required.

#### **B.2 CLASS ASSOCIATION STICKER**

B.2.1 A valid class association sticker, if required by the NCA or the IOMICA, shall be affixed to the **hull** in a conspicuous position.

# PART II - REQUIREMENTS AND LIMITATIONS

The competitor and the **boat** shall comply with the rules in Part II when *racing*. Measurement to check compliance with rules of Section C is not part of **certification control**.

The rules in Part II are **closed class rules. Certification** shall be carried out in accordance with the ERS except where varied in this Part.

# Section C - Conditions for Racing

#### C.1 GENERAL

#### C.1.1 RULES

The following ERS rules shall not apply:

- (a) B.1.2 Mast Lower Limit Mark
- (b) B.2 Headsail Booms
- (c) H.5.4 Extended as necessary.

#### C.2 COMPETITOR

#### C.2.1 LIMITATIONS

- (a) One competitor only shall control the **boat**.
- (b) The competitor shall not be substituted during an event.

#### C.3 ADVERTISING

#### C.3.1 LIMITATIONS

The **boat** shall display only such advertising as permitted by the WS Advertising Code.

#### C.4 BOAT

#### C.4.1 DIMENSIONS

With the **boat** floating in fresh water:

	minimum	maximum
Draft	370 mm	420 mm
Hull depth		60 mm
Hull length		1000 mm

#### C.4.2 WEIGHT

minimum maximum

#### C.4.3 CORRECTOR WEIGHT(S)

**Corrector weight(s)** to achieve compliance with C.4.2, if used, shall be fixed in/on the **hull** and not be altered or moved during an event.

#### C.4.4 WATER

Water shall not be used to trim the **boat** and it may be removed at any time.

#### C.5 HULL

#### C.5.1 LIMITATIONS

- (a) The **hull** shall not be substituted during an event.
- (b) Except for fittings the geometry of the **hull** shell and deck shall not be changed during an event.

#### C.5.2 IDENTIFICATION

The **hull** registration number shall be displayed on the external surface of the **hull** shell or deck clearly and legibly with a minimum height of 20 mm.

#### C.5.3 MAINTENANCE

Routine maintenance to the **hull** such as removing and adding fittings and remote control equipment, replacing **hull** patches, painting, polishing, smoothing etc., is permitted without undergoing new **certification control** provided the compliance with D.2 is not affected.

#### C.5.4 REMOTE CONTROL

#### **EQUIPMENTUSE**

- (a) The **rudder** control unit shall control the **rudder** only.
- (b) The sheet control unit shall control the mainsail sheet and headsail sheet only.
- (c) Following systems are prohibited:
  - (1) Non-mechanical systems for automated control of the rig,
  - (2) Non-mechanical systems for automated control of the **sails**,
  - (3) Automated steering,
  - (4) Automated navigation.
- (d) On board camera(s) and/or the use of images from any source while racing is prohibited.
- (e) Except for the establishment and maintenance of a radio control link, control unit positioning information, signal strength and battery status information, radio transmission from the **boat** while *racing* is prohibited.
- (f) During an event remote control and related equipment if temporarily removed and or replaced shall be:
  - (1) refitted in the same position.
  - (2) replaced by equipment of similar weight.

#### C.6 HULL APPENDAGES

#### C.6.1 MAINTENANCE

The **hull appendages** may be altered after **certification control**, without undergoing new **certification control**, provided compliance with E.3 is not affected.

#### C.6.2 LIMITATIONS

Except when a **hull appendage** has been lost or damaged beyond repair, only one **keel** and one **rudder** shall be used during an event. Replacement may be made only with the approval of the race committee. Unless the **hull appendage** has been lost, the race committee shall remove or cancel any **event limitation mark** attached to the **hull appendage** that has been replaced.

#### C.6.3 USE

- (a) The **keel** shall not move or rotate relative to the **hull**, except by flexing.
- (b) The **hull appendages** shall not project outboard of the **hull**.
- (c) If removed:
  - (1) The **keel** shall be refitted in the same attitude and position in the **hull**.
  - (2) Parts of the **keel** shall be refitted in the same attitude and position relative to the **keel**.
  - (3) The **rudder** shall be refitted in the same attitude and position relative to the **hull**.

#### C.6.4 WEIGHTS

	minimum	maximum
<b>Keel</b> , excluding fasteners to <b>hull</b>	2200 g .	2500 g
Rudder, including stock		75 g

#### C.7 RIG

#### C.7.1 LIMITATIONS

Except when an item has been lost or damaged beyond repair, one **mast**, one **mainsail boom** and one **headsail boom**, for each of the three **rigs**, may be used during an event. Replacement may be made only with the approval of the race committee. Unless the <u>spar</u> is lost, the race committee shall remove or cancel any **event limitation mark** attached to the <u>spar</u> that has been replaced.

#### C.7.2 USE

The **rig** shall not project beyond the fore and aft ends of the **hull**.

#### C.7.3 CORRECTOR WEIGHTS

- (a) Corrector weights of any material may be positioned in and/or on a mast <u>spar</u> below the lower point. Corrector weights of density greater than 8000 kg/m<sup>3</sup> may be positioned in and/or on a mast <u>spar</u> above the lower point.
- (b) Such weights may be removed or added at any time subject to C.4.1 and C.4.2.

#### C.7.4 MAST

(a) DIMENSIONS

	minimum	maximum
Lower point to deck limit mark as defined in D.1.5	60 mm	100 mm
Within these limits, the variation in height of		. =
lower point for each rig		± 5 mm

(b) USE

The spar stepping position and wind indicator position are optional.

#### C.7.5 STANDING RIGGING

USE

The **headsail boom** swivel shall be attached to the **hull** approximately on the **hull** centre plane. The alignment of the swivel between the **hull** and the **headsail boom** shall be controlled only by the **rigging** tension.

#### C.7.6 RUNNING RIGGING

USE

- (a) The **mainsail sheet** and the **headsail sheet** may be worked by a **sheet** control line attached to the **sheet** control unit.
- (b) The upper end of any **headsail boom** topping lift shall be attached to the **headsail halyard** and/or **stay**, or their **mast** <u>spar</u> fitting(s).
- (c) A **headsail boom** topping lift restraint line(s) attached to, or passing around, the topping lift may be attached to and/or passed around any or all of the following: topping lift; **headsail**; **headsail halyard**; **headsail stay**; **headsail boom**.
- (d) A **mainsail tack** control line may be passed around or through the **mast** spar, and/or the **mainsail boom** spar.

#### C.8 SAILS

#### C.8.1 MAINTENANCE

Routine maintenance such as replacement of battens and patching over damaged areas is permitted without undergoing new **certification control**.

#### C.8.2 LIMITATIONS

Except when a **sail** has been lost or damaged beyond repair, no more than one **mainsail** and one **headsail**, for each **rig**, shall be used during an event. Replacement may be made only with the approval of the race committee. Unless the **sail** is lost, the race committee shall remove or cancel any **event limitation mark** attached to the **sail** that has been replaced.

#### C.8.3 USE

- (a) GENERAL
  - (1) A sail of one rig shall not be used with another rig.
  - (2) A **sail** may not be used alone, except where the other **sail** of that **rig** has been lost or damaged during the race.

#### (b) MAINSAIL

- (1) The tack point shall not be set more than 25 mm forward of the forwardend of the boom <u>spar</u> and the clew point shall not be set more than 25 mm aft of the aft end of the boom <u>spar</u> (excluding its fittings).
- (2) Any **luff** bolt rope or **luff** slides shall be set in a **mast** <u>spar</u> track.
- (3) **Luff tabling** may envelop a **mast** spar jackstay.

#### (c) HEADSAIL

- (1) A line taken through the **tack point** and the **head point** shall cut the forward face of the **mast** <u>spar</u> lower than the lower edge of the **headsail stay limit mark** at the fore side of the <u>spar</u> when the **boom** is on the centre plane of the **hull**.
- (2) The **tack point** shall not be set more than 25 mm forward of the forward end of the **boom** <u>spar</u> and the **clew point** shall not be set more than 25 mm aft of the aft end of the **boom** <u>spar</u>.
- (3) Luff tabling may envelop the headsail stay.
- (4) Any **luff** slides shall be set on the **headsail stay**.

#### C.8.4 IDENTIFICATION

(a) Sail Identification shall comply with IRSA Supplementary Class Rules.

# Section D - Hull

#### D.1 GENERAL

#### D.1.1 RULES

The **hull** shall either comply with the **class rules** in force at the time of its initial **certification control** or comply with the current **class rules**.

#### D.1.2 CERTIFICATION

See rule A.9.

#### D.1.3 BUILDERS

- (a) No building licence is required for **hulls** built in accordance with D.2.1.
- (b) A building licence may be granted to commercial builders who wish to use mass production methods to lower the cost of hulls, but which do not comply with D.2.1. Such licence shall be based on a building specification approved by the ICA and the IRSA and a contract between the IRSA and the builder.

#### D.1.4 IDENTIFICATION

- (a) The **hull** registration number shall be marked in an easily visible location on a non-removable part of the **hull** excluding fittings and **corrector weights** by any of the following means: painting on, engraving in, bonding in, moulding in.
- (b) A builder's mark may be applied.

#### D.1.5 DECK LIMIT MARK

The deck **limit mark** shall be displayed on the centre plane of the **hull** near to the **mast** position. It shall be a minimum of 5 mm in diameter.

#### D.2 HULL

#### D.2.1 MATERIALS

Construction materials of the **hull**, excluding fittings and remote control equipment but including any supports and containers for such items, are unrestricted subject to the following:

- (1) With the exception of elastomer, materials shall not be: expanded, foamed, honeycombed.
- (2) Fibre reinforcement materials with a higher modulus of elasticity than glass fibre are prohibited.

#### D.2.2 CONSTRUCTION

Construction is unrestricted subject for the following:

- (a) The hull shall be a monohull.
- (b) Except for trunking for the **keel** and **rudder**, the **hull** shall not have:
  - (1) Voids in the waterplane and/or the underwater profile,
  - (2) Hollows in the plan view that exceed 3 mm,

- (3) Hollows in the underwater profile that exceed 3 mm,
- (4) Transverse hollows in the undersurface of the **hull** that exceed 3 mm when tested parallel to the **waterplane** as in figure I.2.
- (c) The forward 10 mm of the hull shall be made of elastomer.
- (d) The rudder shall be attached to the hull aft of where the keel is attached.

#### D.2.3 CONSTRUCTION TECHNIQUES

Construction techniques for forming a **hull** are unrestricted subject to compliance with D.1.3 (b) and D.2.1.

#### D.2.4 FITTINGS

Fittings are unrestricted except that:

- (a) Fittings that may contribute to the stiffness and/or strength and/or watertight integrity of the **hull** shall be of materials permitted by D.2.1.
- (b) Ball and/or roller bearings may only be used for: **sheet** control line blocks, **mainsail boom sheet** blocks and **headsail boom sheet** blocks.
- (c) Fittings shall not project outboard of the hull shell or deck.

#### D.2.5 REMOTE CONTROL EQUIPMENT

- (a) The following are permitted:
  - (1) One or more receivers.
  - (2) One rudder control unit.
  - (3) One **sheet** control unit.
  - (4) Battery cells assembled in one or more packs.
  - (5) Electric cables, connectors and switches.
  - (6) One device to indicate the battery voltage. In addition, items listed under (1) to (5) may have their own built-in battery voltage indication.
  - (7) A device to control downstream voltage delivered to permitted radio control equipment as defined by items listed under (1) to (6) of this rule.
- (b) The rudder control unit and the sheet control unit may contain ball and/or roller bearings.
- (c) Remote control equipment may be fastened using hook and loop fasteners and/or materials in compliance with D.2.1.

# Section E – Hull Appendages

#### E.1 PARTS

#### E.1.1 MANDATORY

- (a) **Keel**, which may comprise a **fin** and a **bulb**.
- (b) Rudder

#### E.2 GENERAL

#### E.2.1 RULES

Hull appendages shall comply with the current class rules.

#### E.2.2 BUILDERS

No licence is required.

#### E.3 KEEL AND RUDDER

#### E.3.1 MATERIALS

Materials shall not be of density higher than lead (11340 kg/m<sup>3</sup>).

#### E.3.2 CONSTRUCTION

Construction is unrestricted subject to the following:

- (a) The keel and rudder shall be removable from the hull.
- (b) The **keel** and **rudder** shall not
  - (1) be connected,
  - (2) be articulated,
  - (3) have openings through which water could flow when in use.

#### E.3.3 CONSTRUCTION TECHNIQUES

Construction techniques for forming **hull appendages** are unrestricted.

#### E.4 KEEL

#### E.4.1 DIMENSIONS

	minimum	maximum
The largest transverse dimension except for the		
lowest 60 mm		20 mm

# Section F - Rig

#### F.1 PARTS

#### F.1.1 MANDATORY

- (a) Mast.
- (b) Mainsail boom.
- (c) Headsail boom.
- (d) Standing rigging.
- (e) Running rigging.
- (f) Fittings.

#### F.2 GENERAL

#### F.2.1 RULES

Rigs shall comply with the current class rules.

#### F.2.2 MANUFACTURERS

No licence is required.

#### F.2.3 LIMITATIONS

The function of items shall be limited to what is normally provided by items of their type.

#### F.2.4 CONSTRUCTION

- (a) Fittings and/or control lines may be combined provided their function is not extended beyond what is permitted.
- (b) The position of parts, and the length and tension of **rigging**, may be adjustable unless otherwise restricted.
- (c) Ball and/or roller bearings may be used for: kicking strap fitting; gooseneck; mainsail boom sheet blocks; headsail boom sheet blocks: headsail boom swivel.
- (d) Where the **mast** kicking strap fitting and/or gooseneck:
  - (1) are exposed,
  - (2) are not of circular cross section, and
  - (3) rotate,

they shall not exceed 20 mm in any cross section perpendicular to the axis of rotation.

#### F.2.5 CONSTRUCTION TECHNIQUES

Construction techniques for forming **rigs** are unrestricted.

#### F.2.6 CERTIFICATION CONTROL

#### Measurement between:

- (a) **Lower point** and **upper point** shall be taken between points identified by intersections of relevant **limit marks** ends and aft centerline of **mast**.
- (b) Headsail stay limit mark and upper point shall be taken between points identified by intersections of relevant limit marks ends and fore centerline of mast spar.

#### F.3 MAST

#### F.3.1 MATERIALS

- (a) The <u>spar</u> shall be aluminium alloy of 2024, 5754, 6005, 6060, 6061, 6063, 6082 or 7075 grade, including all subgrades denoted by suffix letter and all temper variants, or wood.
- (b) Other permitted materials in the <u>spar</u> are: adhesive; paint; powder coat; varnish; wax. An aluminium alloy spar may be anodised.
- (c) Material of fittings is unrestricted.

#### F.3.2 CONSTRUCTION

- (a) A **mast** stub arrangement is permitted and, if used, its main structural part shall be taken to be part of the **mast** spar.
- (b) Between the **lower point** and the **upper point**, the <u>spar</u> section shall be:
  - (1) of circular outer shape,
  - (2) constant

within the variations permitted by F.3.4 except for the following permitted items:

an internal sail track,

local cutaways for the insertion of a luff rope or slides, openings for fittings and/or **rigging**, internal and/or external <u>spar</u> joiners.

- (c) Mast spar curvature is unrestricted.
- (d) Limit marks may be applied by the following means:
  - (1) paint,
  - (2) self adhesive tape,
  - (3) fittings.

#### F.3.3 FITTINGS

- (a) MANDATORY
  - (1) Mainsail halyard(s) fitting(s) or opening(s).
  - (2) **Shroud** fitting(s) and/or opening(s).
  - (3) Gooseneck.
  - (4) Kicking strap fitting.
- (b) OPTIONAL
  - (1) Wind indicator and/or its fitting.
  - (2) Backstay crane and its fitting.
  - (3) **Headsail stay** fitting and/or opening.
  - (4) Headsail halyard fitting and/or opening.
  - (5) Pair of **spreaders** and their fittings(s) and/or opening(s).
  - (6) **Mast** <u>spar</u> rings and/or loops to attach **mainsail luff** to the <u>spar</u>.
  - (7) Mast spar jackstay fittings.
  - (8) Mainsail tack fitting(s).
  - (9) Mast strut and its fitting.
  - (10) Checkstay fittings(s).
  - (11) Deck fitting which may function as a **mast** ram.
  - (12) Heel fitting with or without mast jack.
  - (13) Corrector weights.
  - (14) Headsail sheet fairlead.

#### (c) CONSTRUCTION

- (1) A **mainsail halyard** fitting may include one part that rotates with the **sail** about an axis located inside or outside the <u>spar</u> section.
- (2) The **mainsail boom** <u>spar</u> and the kicking strap pivot points shall be aft of the **mast** <u>spar</u> in the regions adjacent to these points.
- (3) Permitted fittings shall be attached to the **mast** spar.

#### F.3.4 DIMENSIONS

minimum maximum

Lower point to upper point  mast A  mast B  mast C	1180 mm
Lower edge of <b>headsail stay limit mark</b> at fore sideof <u>spar</u> to <b>upper point</b>	
mast A	220 mm
mast B	
mast C	120 mm
Height of checkstay rigging point above heel po	<b>bint</b> 100 mm
<u>Spar</u>	
<ul> <li>between lower point and upper point ignoring features permitted by F.3.2(b):</li> </ul>	
<ul> <li>diameter</li> <li>difference between largest and smallest diar</li> <li>for an aluminium spar, the difference between largest and smallest value along the spar of any wall thickness</li> </ul>	
dimension	0.1 mm
Length of spar joiners	100 mm
Total length of local cutaways between lower poi	nt
and upper point	100 mm
Limit mark width	3 mm10 mm

#### F.4 BOOMS

#### F.4.1 MATERIALS

- (a) <u>Spars</u> shall be aluminium alloy of 2024, 5754, 6005,6060, 6061, 6063, 6082, 7075, 7068 or 7178 grade, including all subgrades denoted by suffix letter and all temper variants, or wood.
- (b) Other permitted materials in the <u>spar</u> are: adhesive, varnish, paint, wax, powder coat. An aluminium alloy <u>spar</u> may be anodised.
- (c) Material of fittings is unrestricted.

#### F.4.2 CONSTRUCTION

The <u>spar</u> section shall be constant within the variations permitted by F.4.5 except for

- (a) the last 10 mm at each end,
- (b) openings for fittings and **rigging**.

#### F.4.3 MAINSAIL BOOM FITTINGS

- (a) MANDATORY
  - (1) Mainsail clew fitting(s).
  - (2) Mainsail boom sheet fitting(s).
  - (3) Kicking strap fitting.
- (b) OPTIONAL
  - (1) Mainsail tack fitting(s).
  - (2) Gooseneck fitting.
  - (3) Opening(s) for mainsail boom sheet fitting.

#### F.4.4 HEADSAIL BOOM FITTINGS

- (a) MANDATORY
  - (1) Headsail tack and clew fittings.
  - (2) **Headsail boom sheet** fitting(s).
  - (3) Swivel and/or its fitting(s).
- (b) OPTIONAL
  - (1) **Headsail stay** fitting(s) or opening(s).
  - (2) Topping lift fitting(s) or opening(s).
  - (3) Counterweight and its attachment.
  - (4) Opening(s) for headsail boom sheet fitting.

#### F.4.5 DIMENSIONS

minimum maximum Spar, ignoring

features permitted by F.4.2, between points 10 mm from each end:

- the boom spar shall be capable of passing through a 20 mm ring gauge

#### F.5 STANDING RIGGING

#### F.5.1 MATERIALS

Except for terminations and the **headsail boom** swivel, the **standing rigging** shall be of steel and/or polymer.

#### F.5.2 PARTS

- (a) MANDATORY
  - (1) Pair of **shrouds**.
  - (2) **Headsail boom** swivel.
- (b) OPTIONAL
  - (1) Pair of **checkstays** if a **mast** strut is not fitted.
  - (2) A headsail stay less than 1 mm in diameter.
  - (3) A mast spar jackstay less than 1 mm in diameter.

#### F.5.3 FITTINGS

#### **OPTIONAL**

- (a) Terminations.
- (b) Length and tension adjustments.

#### F.6 RUNNING RIGGING

#### F.6.1 MATERIALS

Materials of **running rigging** are unrestricted.

#### F.6.2 PARTS

- (a) MANDATORY
  - (1) Mainsail boom sheet.
  - (2) Mainsail boom kicking strap.
  - (3) Headsail halyard, if headsail stay is not fitted.
  - (4) Headsail boom sheet.
  - (5) Backstay.
- (b) OPTIONAL
  - (1) Mainsail halyard(s).
  - (2) Mainsail clew trim line.
  - (3) Mainsail tack trim line
  - (4) Headsail halyard(s).
  - (5) Headsail clew trim line.
  - (6) Headsail tack trim line.
  - (7) **Headsail boom** topping lift.
  - (8) **Headsail boom** topping lift restraint line(s).
  - (9) A **sheet** control line.

#### F.6.3 FITTINGS

#### **OPTIONAL**

- (a) Terminations.
- (b) Length and tension adjustments.
- (c) Mainsail boom sheet blocks, headsail boom sheet blocks.
- (d) A wind indicator attached to the **backstay**.

# Section G - Sails

#### G.1 PARTS

#### G.1.1 MANDATORY

- (a) Mainsail.
- (b) **Headsail**.

#### G.2 GENERAL

#### G.2.1 RULES

**Sails** shall comply with the **class rules** in force at the time of their initial **certification control**.

#### G.2.2 CERTIFICATION

- (a) Except where sails are certified as in (b) the official measurer shall certify sails in the tack and shall date each with the date of certification control.
- (b) An MNA may appoint one or more persons at a sailmaker to certify sails produced by that manufacturer. A special licence shall be awarded for that purpose.

#### G.2.3 SAILMAKERS

Except as in G.2.2 (b) no licence is required.

#### G.2.4 DEFINITIONS

**Batten Point** 

The batten point is defined as the intersection of the **leech** and

- (a) the extended centreline of the batten or
- (b) a line of minimum length 20 mm marked on the **leech** if there is no batten.

#### G.2.5 CERTIFICATION CONTROL

- (a) During **certification control**:
  - (1) Measurements shall be taken when **sails** are placed on a flat surface,
  - (2) battens need not be removed,
  - (3) **mainsail** with the **luff** not set in a **mast** <u>spar</u> track may be attached to spars,
  - (4) a **headsail stay** and **mast** spar jackstay need not be removed.
  - (5) tell tales shall be ignored.
- (b) Where a **mainsail** has a **luff** bolt rope the **luff** shall be taken as the aft edge of the luff rope.
- (c) Luff slides shall be ignored when measuring sail dimensions provided that their total length, measured along the luff, does not exceed 15% of the luff length.
- (d) If there is local curvature and/or irregularity in the **sail edge** leading into a corner point, the **sail edges** shall be extended by straight lines as in ERS G.4.
- (e) Where there is a hollow in **sail leech** or **luff** and measurement point(s) fall in the hollow:
  - (1) On the mainsail:
    - (i) between the **aft head point** and nearest batten point,
    - (ii) between adjacent batten points,
    - (iii) between the **clew point** and adjacent batten point,
    - (iv) anywhere in the luff,

- (2) On the **headsail**:
  - (i) anywhere in the luff
- (3) at an attachment

the **sail** shall be flattened out in the area of the **sail edge**, the **sail edge** hollow shall be bridged by a straight line and the shortest distance from the measurement point to the straight line shall be measured. The distance shall be added to the measurement being taken as shown in I.4.

#### G.3 MAINSAIL

#### G.3.1 CONSTRUCTION

- (a) MANDATORY
  - (1) The construction shall be: soft sail, single ply sail.
  - (2) The **body of the sail** shall consist of the same **ply** throughout.
  - (3) The **sail** shall have three battens at the leech or lines marked on the **leech** as defined in G.2.4(b) if there are no battens.
  - (4) Except within the leech stiffening zones, see I.3, the **leech** shall not extended aft of straight lines between:
    - (i) the **aft head point** and the nearest batten point,
    - (ii) adjacent batten points,
    - (iii) the **clew point** and the nearest batten point.

where the batten points are to be taken as defined in G.2.4.

- (5) The **foot** shall not extend below a straight line between **tack point** and **clew point**.
- (6) A class insignia on each side.

#### (b) OPTIONAL

- (1) **Tabling**, which at the **luff** may form a pocket for a **mast** <u>spar</u> jackstay.
- (2) One or two cringles and/or openings at the **head**.
- (3) One cringle and/or openings at each of the **clew** and **tack**.
- (4) **Luff** openings for **mast** <u>spar</u> rings and/or loops for **mast** <u>spar</u> jackstay fittings.
- (5) Luff bolt rope.
- (6) **Luff** track slides.
- (7) **Luff** fittings for **mast** spar rings and/or loops.
- (8) **Luff** fittings for **mast** spar jackstay.
- (9) **Primary reinforcement** specified at G.3.3.
- (10) **Secondary reinforcement** specified at G.3.3.

- (11) **Primary reinforcement** and/or **stiffening** within the leech stiffening zones defined by the template as shown in I.3.
- (12) Tell tales.
- (13) Not more than three **sail** shape indicator stripes, applied using paint or ink.
- (14) Sailmaker labels.

#### G.3.2 CONSTRUCTION TECHNIQUES

- (a) Following construction techniques may be used:
  - (1) Panelled sails with two, three or four parts joined by seams which shall not deviate more than 10 mm from a straight line between luff and leech. Except for stitching, seam width shall include the joining techniques used at seams.
  - (2) One panel **sails** with or without three dimensional shape added by heat and/or force.
- (b) The following are allowed where parts are joined or added as permitted in G.3.1 and G.3.2: welding; gluing; bonding with self-adhesive tapes/materials, stitching.

# G.3.3 DIMENSIONS

DIMENSIONS	minimum maximum
Leech length:	minimum maximum
mainsail A	1610 mm 1620 mm
mainsail B	
mainsail C	
	910 mm920 mm
Foot length:	050
mainsail A	350 mm360 mm
mainsail B	340 mm350 mm
mainsail C	310 mm320 mm
Quarter width:	
mainsail A	305 mm315 mm
mainsail B	295 mm305 mm
mainsail C	265 mm275 mm
Half width:	
mainsail A	235 mm245 mm
mainsail B	225 mm235 mm
mainsail C	205 mm215 mm
Three-quarter width:	
mainsail A	135 mm145 mm
mainsail B	130 mm140 mm
mainsail C	115 mm125 mm
Top width	
Primary reinforcement:	
from nearest sail corner measurement point .	125 mm
Secondary reinforcement:	
from nearest sail corner measurement point .	125 mm
for flutter patches	
at <b>luff</b> fittings, <b>luff</b> slides and/or <b>luff</b> openings.	
Tabling width	
Seam width	
Seam to nearest sail corner measurement point	
•	130 11111
Batten length: middle and lower	100 mm
upper	
Batten width	
Batten point, as defined in G.2.4, to nearest <b>leech</b>	
Largest cringle dimension	-
With the exception of <b>luff</b> slides, largest <b>luff</b> fitting	10111111
dimension	10 mm
Sail shape indicator stripe width	

#### G.4 HEADSAIL

#### G.4.1 CONSTRUCTION

- (a) MANDATORY
  - (1) The construction shall be: soft sail, single ply sail.
  - (2) The **body of the sail** shall consist of the same **ply** throughout.
  - (3) Except within the leech stiffening zones, see I.3, the **leech** shall not extend aft of a straight line between the **aft head point** and the **clew point**.
  - (4) The **foot** shall not extend below a straight line between **tack point** and **clew point**.
- (b) OPTIONAL
  - (1) **Tabling**, which at the **luff** may form a pocket for a **headsail stay**.
  - (2) One or two cringles and/or openings at the **head**.
  - (3) One cringle and/or openings at each of the **clew** and **tack**.
  - (4) Headsail stay slides and/or loops.
  - (5) **Primary reinforcement** specified at G.4.3.
  - (6) **Secondary reinforcement** specified at G.4.3.
  - (7) Not more than two battens at the **leech**.
  - (8) **Primary reinforcement** and/or **stiffening** within the leech stiffening zones defined by the template as shown in I.3.
  - (9) Tell tales.
  - (10) Not more than two **sail** shape indicator stripes, applied using paint or ink.
  - (11) Sailmaker labels.

#### G.4.2 CONSTRUCTION TECHNIQUES

- (a) Following construction techniques may be used:
  - (1) Panelled **sails** with two or three parts joined by **seams** which shall not deviate more than 10 mm from straight line between **luff** and **leech**. Except for stitching, **seam width** shall include the joining techniques used at **seams**.
  - (2) One-panelled **sails** with or without three dimensional shape added by heat and/or force.
- (b) The following are allowed where parts are joined or added as permitted in G.4.1 and G.4.2: welding; gluing; bonding with self-adhesive tapes/materials, stitching.

#### G.4.3 DIMENSIONS

DIMENSIONS	minimum maximum
Luff length:	minimum maximum
headsail A	1320 mm 1330 mm
headsail B	
headsail C	
Leech length:	7 30 11111 7 40 111111
headsail A	12/15 mm 1255 mm
headsail B	
headsail C	655 mm665 mm
Foot length:	055 11111005 111111
headsail A	375 mm385 mm
headsail B	340 mm350 mm
headsail C	290 mm300 mm
Half width:	290 111111 300 111111
	185 mm195 mm
headsail A	
headsail B	
headsail C	
Top width	20 mm
Primary reinforcement:	405
from nearest sail corner measurement point	125 mm
Secondary reinforcement	40=
from nearest sail corner measurement point	
for flutter patches	
at <b>headsail stay</b> slides and/or loops	
Tabling width	
Seam width	
Seam to nearest sail corner measurement point	
Batten length	
Batten width	
Clew point to lower batten point as defined in G.2.	
headsail A	100 100
	400 mm430 mm
headsail B	285 mm315 mm
headsail C	285 mm315 mm 205 mm235 mm
	285 mm315 mm 205 mm235 mm
headsail C  Clew point to upper batten point as defined in G.2. headsail A	285 mm315 mm 205 mm235 mm
headsail C Clew point to upper batten point as defined in G.2. headsail A headsail B	285 mm315 mm 205 mm235 mm 4: 820 mm850 mm 590 mm620 mm
headsail C  Clew point to upper batten point as defined in G.2. headsail A	285 mm315 mm 205 mm235 mm 4: 820 mm850 mm 590 mm620 mm
headsail C Clew point to upper batten point as defined in G.2. headsail A headsail B	285 mm315 mm 205 mm235 mm 4: 820 mm850 mm 590 mm620 mm 425 mm455 mm

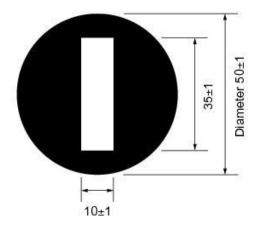
# Section H - Measurement

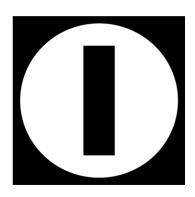
#### **H.1 MEASUREMENTS**

- H.1.1 Maximum and minimum values of limitations in the **class rules** shall be taken as absolute limiting values.
- H.1.2 Weight measurements shall be measured using equipment with a resolution of 1 gram or less.
- H.1.3 Linear measurements shall be taken in millimetres to the same resolution as the relevant class rule.
- H.1.4 Measurements shall be rounded up to the nearest relevant decimal point before comparison with a maximum limiting value.
- H.1.5 Measurements shall be rounded down to the nearest relevant decimal point before comparison with a minimum limiting value.

# Section I - Illustrations

#### I.1 CLASS INSIGNIA





a) Class logo shall be black colored. White logo maybe used for contrast.

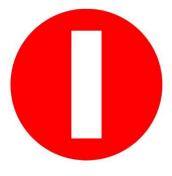
#### I.1.1 HONOR AWARD SKIPPERS INSIGNIA

Respecting the valued traditions of the International One Metre Class, all Honour Award skippers are requested to display their highest award on their **mainsail**.

Gold Yellow for World Champions Champions



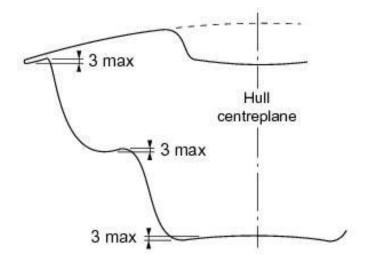
**Red** for Continental



# I.2 TRANSVERSE HULL HOLLOWS

Rule D.2.2(b)(3)

The **hull** shall not have transverse hollows in the undersurface of the **hull** that exceed 3 mm when tested parallel to the **waterplane**.

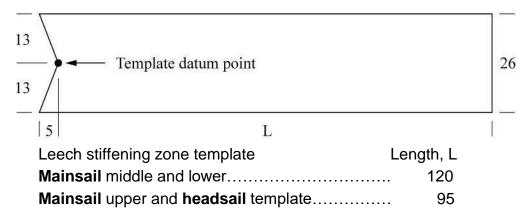


#### I.3 LEECH STIFFENING ZONE

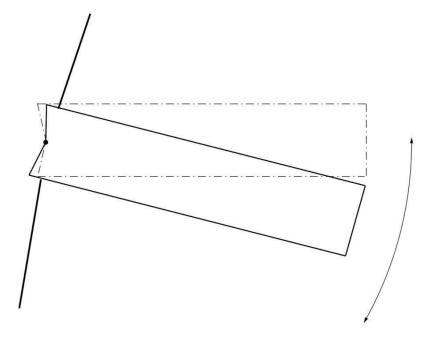
#### I.3.1 DEFINITION

A leech stiffening zone is a region of a **sail** defined by a leech stiffening zone template as described in I.3.2 and positioned as described in I.3.3.

#### I.3.2 TEMPLATE AND TEMPLATE DATUM POINT



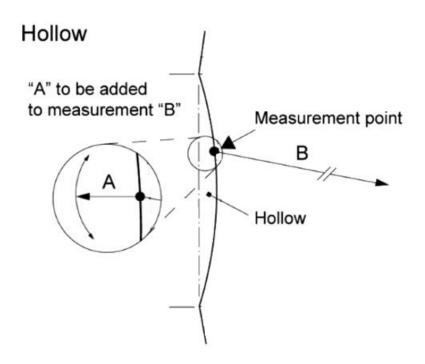
#### I.3.3 TEMPLATE POSITIONING



It shall be possible to place the template in a single position so that

- (1) its datum point is over the relevant batten point,
- (2) its long edges cut the leech and
- (3) it covers any **primary reinforcement** and/or **stiffening**.

# I.4 HOLLOWS IN SAIL LEECH OR LUFF



Effective: 1 March 2022

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2011,

30 March 2012, 1 March 2013, 1 March 2015, 1 March 2016, 1 May 2017, 1

May

2018, 1 March 2021

 $\hbox{@}$  2022, International One Metre International Class Association (IOM ICA)