



# OFFSHORE SPECIAL REGULATIONS



## Extracts for Category 4 Monohulls

including  
Sail Canada and LOOR  
prescriptions

# 2020

Version 01.00 – January 8, 2020

## **Lake Ontario Offshore Racing** **Special Regulations Certificate**

- Please note that this document outlines safety requirements applicable to Lake Ontario Offshore Racing events based on World Sailing Offshore Special Regulations and includes Sail Canada and Lake Ontario Offshore Racing prescriptions.
- The owner and the person in charge maintain the complete and unlimited responsibility to have the boat comply with all of the requirements set out in the Lake Ontario Offshore Special Regulations at the start of the race.
- This document only addresses items over and above government requirements; we encourage owners to arrange for a separate courtesy inspection by their local safe boating authority to ensure minimum government requirements are met.
- A completed and signed copy of this card should be given to the race committee prior to the skippers meeting.

<b>Yacht Name</b>	
<b>Sail Number</b>	
<b>Yacht Club</b>	
<b>Number of Crew</b>	

**IMPORTANT** A sailboat may be inspected at any time during the period from the Mandatory Participants' Meeting until three hours after her finish. The Race Committee may, at the finish of the race, direct a sailboat to proceed directly to a designated location at Port Credit Yacht Club. A boat which fails to follow such directions or which subsequently fails the inspection may be protested by the Race Committee.

"I hereby declare that I am the owner or person in charge and that I have read and understood Special Regulations and in particular 1.02.1, 1.02.2, and 1.02.3 (Responsibility of Person in Charge)"

**Signed** \_\_\_\_\_

**Printed Name** \_\_\_\_\_

**Date** \_\_\_\_\_



# World Sailing Offshore Special Regulations

Extract for Race **Category 4 Monohulls**

**JANUARY 2020 - DECEMBER 2021**

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**Version 01.00 - 8 January 2020**

**With Sail Canada Prescriptions**



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- display a copyright acknowledgement with the reprint (similar to © ORC Ltd. 2002, amendments 2003-2020 © World Sailing Limited)
- make any amendments by deleting contrary provisions and indicating that changes have been made
- supply a copy of the reprint to Sail Canada who will, in turn provide a copy to each of World Sailing and ORC Ltd

**Official interpretations shall take precedence over these Special Regulations and will be indexed, numbered, dated and displayed on the World Sailing web site [www.sailing.org/specialregs](http://www.sailing.org/specialregs)**

**This document is a transcription of the World Sailing Offshore Special Regulations. Sail Canada prescriptions shall take precedence; otherwise if there is a conflict between the two versions, the World Sailing version will govern.**

## Language & Abbreviations Used

Mo - Monohull

Mu - Multihull

" \*\* " means the item applies to all types of boat in all Categories except 5 for which see Appendix B or 6 for which see Appendix C.

**RED TYPE indicates a significant change in 2020**

*ITALIC TYPE indicates a term defined in Offshore Special Regulation 1.03.1*

**BOLD BLUE TYPE indicates a Sail Canada Prescription**

**PURPLE BOLD TYPE indicates a LOOR Prescription**

**After publication and release by LOOR on the LOOR Event's Registration Race Document Website, this document is subject to amendment by LOOR, with the revised version released on the LOOR Event's Registration Race Document Website**

*Guidance notes and recommendations have been removed from the Regulations and are available on [www.sailing.org/documents/offshorespecialregs/index.php](http://www.sailing.org/documents/offshorespecialregs/index.php)*

The use of the masculine gender shall be taken to mean either gender

## Administration

*The Offshore Special Regulation are administered by the World Sailing Special Regulation Sub-Committee whose terms of reference are as follows: ([www.sailing.org/regulations](http://www.sailing.org/regulations))*

*World Sailing Regulation 6.9.8.3 - The Special Regulations Sub-Committee shall:*

- be responsible for the maintenance, revision and changes to the World Sailing Offshore Special Regulations governing offshore racing, under licence from ORC Ltd. Such changes shall be biennial with revised editions published in January of each even year, except that matters of an urgent nature affecting safety may be dealt with by changes to the Regulations on a shorter time scale;*
- monitor developments in offshore racing relative to the standards of safety and seaworthiness.*

**For any queries regarding Sail Canada prescriptions please email: [offshore@sailing.ca](mailto:offshore@sailing.ca)**

**For any queries about these LOOR Safety Requirements, please email: [safety@loor.ca](mailto:safety@loor.ca)**

# Offshore Special Regulations 2020-2021 Extract for Monohulls Category 4

## SECTION 1 - FUNDAMENTAL AND DEFINITIONS

### 1.01 Purpose and Use

- 1.01.1 The purpose of the Offshore Special Regulations (*OSR*) is to establish uniform minimum equipment, accommodation and training standards for *monohull* and *multihull* (excluding *proa*) boats racing offshore.
- 1.01.2 The *OSR* do not replace, but rather supplement, the requirements of governmental authority, Classification Society certification, the Racing Rules of Sailing (*RRS*), Equipment Rules of Sailing (*ERS*), class rules and Rating Systems.
- 1.01.3 Use of the *OSR* does not guarantee total safety of the boat and her crew. Particular attention is drawn to the description of *OSRs* for inshore racing which includes that adequate shelter and or effective rescue is available all along the course. This is not included in more onerous *OSR* categories.

### 1.02 Responsibility of Person in Charge

- 1.02.1 **Under *RRS* 4 the responsibility for a boat's decision to participate in a race or continue racing is hers alone. The safety of a boat and her crew is the sole and inescapable responsibility of the Person in Charge who shall do his best to ensure that the boat is fully found, thoroughly seaworthy and manned by an experienced and appropriately trained crew who are physically fit to face bad weather. The person in charge shall also assign a person to take over his responsibilities in the event of his incapacitation.**
- 1.02.2 Neither the establishment of the *OSR*, nor their use by Organizing Authorities, nor the inspection of a boat under the *OSR* in any way limits or reduces the complete and unlimited responsibility of the Person in Charge.
- 1.02.3 By participating in a race conducted under the *OSR*, the person in charge, each competitor and boat owner agrees to reasonably cooperate with the organizing authority and World Sailing in the development of an independent incident report as specified in 2.02.

### 1.03 Definitions, Abbreviations, Word Usage

- 1.03.1 Definitions of Terms used in this document

TABLE 1

Abbreviation	Description
#	Pound force (lbf)
ABS	American Bureau of Shipping
Age Date	Month/year of <i>first launch</i>
AIS	Automatic Identification Systems
CEN	Comité Européen de Normalisation
Coaming	The part of the cockpit, including the transverse after limit, over which water would run when the boat is floating level and the cockpit is filled to overflowing
COLREGS	International Regulations for Preventing Collisions at Sea
Contained Cockpit	A cockpit where the combined area open aft to the sea is less than 50% maximum cockpit depth x maximum cockpit width
CPR	Cardio-Pulmonary Resuscitation
Crewmember	Every person on board
DSC	Digital Selective Calling
EN	European Norm
EPIRB	Emergency Position-Indicating Radio Beacon
ERS	<i>World Sailing</i> - Equipment Rules of Sailing
FA Station	The transverse station at which the upper corner of the transom meets the sheerline
First Launch	Month & year of first launch of the individual boat
Foul-Weather	Clothing designed to keep the wearer dry and which may consist of one piece or

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Suit	several
GMDSS	Global Maritime Distress & Safety System
GNSS	Global Navigation Satellite System
GPS	Global Positioning System
Hatch	The term hatch includes the entire hatch assembly including the lid or cover as part of that assembly
HMPE	High Modulus Polyethylene (Dyneema®/Spectra® or equivalent)
<b>IBRD</b>	<b>International Beacon Registration Database</b>
IMO	International Maritime Organisation
IMSO	The International Mobile Satellite Organisation, the independent, intergovernmental organisation that oversees <i>Inmarsat's</i> performance of its Public Service Obligations for the <i>GMDSS</i> and reports on these to <i>IMO</i>
INMARSAT	Inmarsat Global Limited is the private company that provides <i>GMDSS</i> satellite distress and safety communications, plus general communications via voice, fax and data
ISAF	International Sailing Federation (now World Sailing)
ISO	International Standard Organization or International Organization for Standardization
ITU	International Telecommunications Union
Jackstay	A <i>securely fastened</i> webbing or rope which permits a <i>crewmember</i> to move from one part of the boat to another without having to unclip a safety harness <i>tether</i> .
L <sub>H</sub>	Hull Length as defined by the <i>ERS</i>
Lifeline	Rope or wire line rigged as guardrail / guardline around the deck
LSA	<i>IMO</i> International Life-Saving Appliance Code
LWL	(Length of) loaded <i>waterline</i>
Monohull	A boat with one hull
Moveable Ballast	Material carried for the sole purpose of increasing weight and/or influencing stability and/or trim and which may be moved transversely but not varied in weight while a boat is racing
Multihull	A boat with more than one hull
Open Cockpit	A cockpit that is not a <i>contained cockpit</i>
ORC	Offshore Racing Congress (formerly Offshore Racing Council)
OSR	Offshore Special Regulation(s)
Permanently Installed	The item is effectively built-in by e.g. bolting, welding, glassing etc. and may not be removed for or during racing
PLB	Personal Locator Beacon
Primary Launch	Month & Year of <i>first launch</i> of the first boat of the production series or <i>first launch</i> of a non-series boat
Proa	Asymmetric Catamaran
Rode	Rope, chain, or a combination of both, which is used to connect an anchor to the boat.
RRS	<del>ISAF</del> <b>WS</b> Racing Rules of Sailing
Safety Line	A tether used to connect a safety harness to a strong point
SAR	Search and Rescue
SART	Search and Rescue Transponder

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Securely Fastened	Held strongly in place by a method (e.g. rope lashings, wing-nuts) which will safely retain the fastened object in severe conditions including a 180° capsize and allows for the item to be removed and replaced during racing
SOLAS	Safety of Life at Sea Convention
SSS	The Safety and Stability Screening numeral
Static Ballast	Material carried for the sole purpose of increasing weight and/or to influencing stability and/or trim and which is not moved or varied in weight while a boat is racing
Static Safety Line	A safety line (usually shorter than a <i>safety line</i> carried with a harness) kept clipped on at a work-station
STIX	ISO 12217-2 Stability Index
<b>STWC</b>	<b>Standards of Training - Certification of Watchkeeping</b>
Variable Ballast	Water carried for the sole purpose of influencing stability and/or trim and which may be varied in weight and/or moved while a boat is racing
Waterline	The water surface when the boat is floating in measurement trim
World Sailing	<del>World Sailing</del> , formerly the International Sailing Federation or <i>ISAF</i>
<b>WS</b>	<b>World Sailing, formerly the International Sailing Federation or ISAF</b>

1.03.2 The words "shall" and "must" are mandatory, "should" and "may" are permissive.

1.03.3 The word "yacht" shall be taken as fully interchangeable with the word "boat"

## SECTION 2 - APPLICATION & GENERAL REQUIREMENTS

### 2.01 Categories of Events

Organizing Authorities shall select from one of the following categories and may modify the *OSR* to suit local conditions

#### 2.01.5 Category 4

Short races, close to shore in relatively warm or protected waters normally held in daylight

### 2.02 Incident Reporting

The Organizing Authority of a race will establish whether any incidents occurred, which if reported would be likely to be relevant to evolving the Offshore Special Regulations, the plan review process, or in increasing safety. The Organizing Authority will follow any guidelines issued by World Sailing concerning incident reporting.

### 2.03 Inspection

A boat may be inspected at any time. If she fails to comply with the *OSR* her entry may be rejected or she will be subject to protest

### 2.04 General Requirements

2.04.1 All equipment required by *OSR* shall:

- a) function properly
- b) be regularly checked, cleaned and serviced
- c) ~~if it has an expiry date, it will not have exceeded its expiry date whilst racing~~
- d) when not in use be stowed in conditions in which deterioration is minimised
- e) be readily accessible
- f) be of a type, size and capacity suitable and adequate for the intended use and size of the boat.

2.04.2 Heavy items shall be *permanently installed* or *securely fastened*

## SECTION 3 - STRUCTURAL FEATURES, STABILITY, FIXED EQUIPMENT

A boat shall be/have:

### 3.01 Strength of Build and Rig

3.01.1 Properly rigged, fully seaworthy and shall meet the *OSR*

3.01.2 Equipped with shrouds and at least one forestay that shall remain connected to the mast and the boat while racing

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### 3.02 Watertight Integrity of a Boat

Essentially watertight and all openings shall be capable of being immediately secured. Centreboard, daggerboard trunks and the like shall not open into the interior of a hull except via a watertight maintenance *hatch* with the opening entirely above the *waterline*

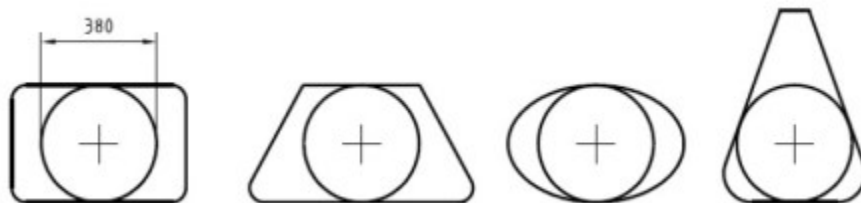
### 3.04 Stability - Monohulls

### 3.06 Exits - Monohulls

3.06.1 At least two exits if 8.5 m (28')  $L_H$  and greater and with a *primary launch* after 1994. One exit shall be located forward of the foremost mast except where structural features prevent its installation

3.06.2 The following minimum clear *hatch* openings if *first launch* after 2013:

- a circular *hatch* with diameter 450 mm (18"); or
- any other shape with minimum dimension of 380 mm (15") and minimum area of 0.18 m<sup>2</sup> (1.9 ft<sup>2</sup>) (see figure 1)



**Figure 1 - Measurements of Minimum Clear Opening**

### 3.08 Hatches & Companionways

3.08.1 *Hatch* covers forward of the maximum beam station shall not open toward the interior of the boat, except *hatches* in the side of a coachroof or ports having an area of less than 0.071 m<sup>2</sup> (110 in<sup>2</sup>)

3.08.2 *Hatches* not conforming with 3.08.1 shall be clearly labelled and used in accordance with the following instruction "NOT TO BE OPENED AT SEA"

3.08.3 A *hatch*, including a *hatch* over a locker shall be:

- permanently attached and capable of being firmly shut immediately and remaining firmly shut in a 180° capsize
- above the water when the boat is heeled 90°

A boat may have a maximum of two *hatches* on each side of centerline that do not conform to the requirement in b), provided that the opening of each is less than 0.071 m<sup>2</sup> (110 in<sup>2</sup>)

3.08.4 Companionway *hatches*:

- fitted with a strong securing arrangement which shall be operable from the exterior and interior even when the boat is inverted
- blocking devices:
  - capable of being retained in position with the *hatch* open or shut
  - secured to the boat (e.g. by lanyard) for the duration of the race
  - permit exit in the event of inversion

3.08.5 if a *monohull* with *Open Cockpit(s)*:

- a companionway sill that does not extend below the local sheerline; or
- a companionway in full compliance with *ISO 11812* category A

3.08.6 if a *monohull* with *Contained Cockpit(s)* where the companionway extends below the local sheerline, panels capable of blocking the companionway up to the level of the local sheerline whilst giving access to the interior.

### 3.09 Cockpits

3.09.1 Cockpits that self-drain quickly by gravity at all angles of heel and are permanently incorporated as an integral part of the boat

3.09.2 A cockpit sole at least 2% *LWL* above the *waterline* (or in *IMS* boats with *first launch* before 2003, at least 2% *L* above the *waterline*)

3.09.3 A bow, lateral, central or stern well is a cockpit for the purposes of *OSR* 3.09

### 3.09.7 Cockpit Volume

The maximum combined volume below lowest *coamings* of all *contained cockpits* shall be:

- primary launch* before April 1992: 9% (*LWL* x maximum beam x freeboard abreast the cockpit)

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- b) *primary launch* after March 1992 as above for the appropriate category except that "lowest coamings" shall not include any aft of the *FA station* and no extension of a cockpit aft of the working deck shall be included in calculation of cockpit volume

### 3.09.8 Cockpit Drains

Cockpit drain cross section area of unobstructed openings (after allowance for screens if fitted) shall be at least that of:

- a) 2 x 25 mm (1") diameter or equivalent for a boat less than 8.5 m (28')  $L_H$
- b) 4 x 20 mm (3/4") diameter or equivalent for a boat 8.5 m (28')  $L_H$  or greater

### 3.10 Sea Cocks or Valves

*Permanently installed* sea cocks or valves on all through-hull openings below the *waterline* except for integral deck scuppers and instrument through-hulls

### 3.11 Sheet Winches

Sheet winches mounted in such a way that an operator is not required to be substantially below deck

### 3.12 Mast Step

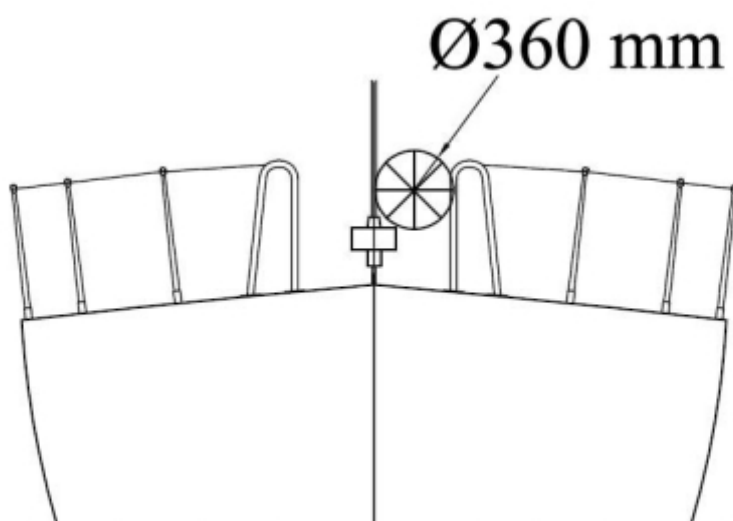
The heel of a keel stepped mast *securely fastened* to the mast step or adjoining structure

### 3.14 Pulpits, Stanchions, Lifelines

3.14.1 The perimeter of the deck surrounded by system of *lifelines* and pulpits as follows:

- a) Continuous *lifelines* fixed only at (or near) the bow and stern. However a gate on each side of a boat is permitted. Except at its end fittings and at gates, the movement of a *lifeline* in a fore-and-aft direction shall not be constrained. Temporary sleeving in 3.14.3 c) shall not modify tension in the *lifelines*.
- b) Minimum heights of *lifelines* and pulpit rails above the working deck and vertical openings:
  - i upper: 600 mm (24")
  - ii intermediate: 230 mm (9")
  - iii vertical opening: no greater than 380 mm (15") except that on a boat with a *Primary Launch* before 1993 where it shall be no greater than 560 mm (22")
  - iv a boat less than 8.5 m (28')  $L_H$  may use a single *lifeline* system with a height between 450 mm (18") and 560 mm (22")
- c) *Lifelines* permanently supported at intervals of not more than 2.2 m (7'-2 1/2") and shall not pass outboard of supporting stanchions
- d) Pulpit and stanchion bases *permanently installed* with pulpits and stanchions mechanically retained in their bases
- e) The outside of pulpit and stanchion base tubes no further inboard from the edge of the working deck than 5% of maximum beam or 150 mm (6"), whichever is greater, nor further outboard than the edge of the working deck
- f) Stanchions straight and vertical except that:
  - i within the first 50 mm (2") from the deck, stanchions shall not be displaced horizontally from the point at which they emerge from the deck or stanchion base by more than 10 mm (3/8")
  - ii stanchions may be angled to not more than 10° from vertical at any point above 50 mm (2") from the deck
- g) A bow pulpit may be open provided the opening between the pulpit and any part of the boat does not exceed 360 mm (14")





**Figure 2 - Diagram Showing Pulpit Opening**

- h) *Lifelines* may terminate at or pass through adequately braced stanchions set inside and overlapping the bow pulpit
- i) When a deflecting force of 4 kg (8.8 #) is applied to a *lifeline* at the mid-point of the longest span between supports that are aft of the mast, the deflection shall not exceed:
  - i 50 mm (2") for an upper or single *lifeline*
  - ii 120 mm (4 ¾") for an intermediate *lifeline*

### 3.14.6 Lifeline Specifications

- a) *Lifelines* of either:
  - i stranded stainless steel wire or
  - ii *HMPE*
- b) The minimum diameter as specified in table 8 below
- c) Stainless steel *lifelines* shall be uncoated and used without close-fitting sleeving; however, temporary sleeving may be fitted provided it is regularly removed for inspection. **Vinyl coated lifelines are permitted in LOOR events. Skippers are required to remove the coating to either side of any apparent rust and verify the integrity of the lifelines; this is particularly important for older yachts with original lifelines or yachts that have been exposed to salt water in the past.**
- d) A lanyard of synthetic rope may be used to secure *lifelines* provided the gap it closes does not exceed 100 mm (4"). This lanyard shall be replaced annually
- e) All components of the *lifeline* enclosure system shall have a breaking strength no less than the *lifeline*
- f) When *HMPE* is used, it shall be protected from chafe and spliced in accordance with the manufacturer's recommended procedures

TABLE 8 - Minimum Diameters

$L_H$	Wire	<i>HMPE</i> rope (Single braid)	<i>HMPE</i> Core (Braid on braid)
under 8.5 m (28')	3 mm (1/8")	4 mm (5/32")	4 mm (5/32")
8.5 m - 13 m	4 mm (5/32")	5 mm (3/16")	5 mm (3/16")
over 13 m (42'-8")	5 mm (3/16")	5 mm (3/16")	5 mm (3/16")

### 3.18 Toilet

- 3.18.2 ~~Permanently installed toilet or fitted bucket.~~ **Black water discharge is not permitted on Lake Ontario**

### 3.19 Bunks

*Permanently installed bunks*

### 3.22 Hand Holds

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Adequate hand holds fitted below deck

### 3.23 Bilge Pumps and Buckets

- 3.23.1 a) two strong buckets, each with a lanyard and of at least 9 l (2.4 US Gal) capacity
- b) one manual bilge pump
- 3.23.2 All required *permanently installed* bilge pumps shall be operable with all cockpit seats, *hatches* and companionways shut and with *permanently installed* discharge pipe(s) of sufficient capacity
- 3.23.3 Bilge pumps shall not be connected to cockpit drains and shall not discharge into a ~~Closed~~ **Contained** Cockpit
- 3.23.4 Bilge pumps shall be readily accessible for maintenance and for clearing out debris
- 3.23.5 All removable bilge pump handles retained by a lanyard

### 3.24 Compass

*Permanently installed* marine magnetic steering compass, independent of any power supply, correctly adjusted with deviation card

### 3.25 Halyards

A minimum of two halyards, each capable of hoisting a sail, on each mast

### 3.27 Navigation Lights

- 3.27.1 that conform to the International Regulations for Preventing Collisions at Sea (Part C and Technical Annex I) and shall be exhibited as required by those regulations.
- 3.27.2 mounted above sheerline and so that they will not be masked by sails or the heeling of the boat ~~having light intensity meeting COLREGS. When incandescent bulbs are used the minimum power rating shall be:~~
  - a) ~~For  $L_{\text{w}}$  less than 12 m (39' 4"), 10 W~~
  - b) ~~For  $L_{\text{w}}$  12 m (39' 4") and greater, 25 W~~
- 3.27.4 spare bulbs (not required for LED)

### 3.28 Engines, Generators, Fuel

#### 3.28.1 Propulsion Engines

- a) engines and associated systems installed in accordance with their manufacturers' guidelines and suitable for the size and intended use of the boat
- d) an inboard engine shall have a *permanently installed* exhaust, cooling system, fuel supply, fuel tank(s) and shall have adequate heavy weather protection
- e) ~~an inboard electrical engine, when fitted, shall be provided with a permanently installed power supply, adequate heavy weather protection and have an engine control system.~~

#### 3.28.2 Generator

If an optional generator separate from the propulsion engine is carried, it shall be installed in accordance with the manufacturer's guidelines

#### 3.28.4 Battery Systems

- b) ~~batteries installed after 2011 shall be of the sealed type from which liquid electrolyte cannot escape~~
- c) ~~At the start a boat with an electric engine shall carry sufficient capacity to meet electrical requirements for the duration of the race and to motor at the above minimum speed for at least 5 hours~~

### 3.29 Communications Equipment, GPS, Radar, AIS

- 3.29.05 a hand-held marine VHF transceiver, watertight or with a waterproof cover. When not in use to be stowed in a grab bag or emergency container (see *OSR* 4.21)
- 3.29.06 a second radio receiver, which may be the handheld VHF in 3.29.5 above, capable of receiving weather bulletins

## SECTION 4 - PORTABLE EQUIPMENT

A boat shall have:

### 4.01 Sail Letters & Numbers

- 4.01.1 Identification on sails which complies with *RRS* 77 and *RRS* Appendix G

### 4.03 Soft Wood Plugs

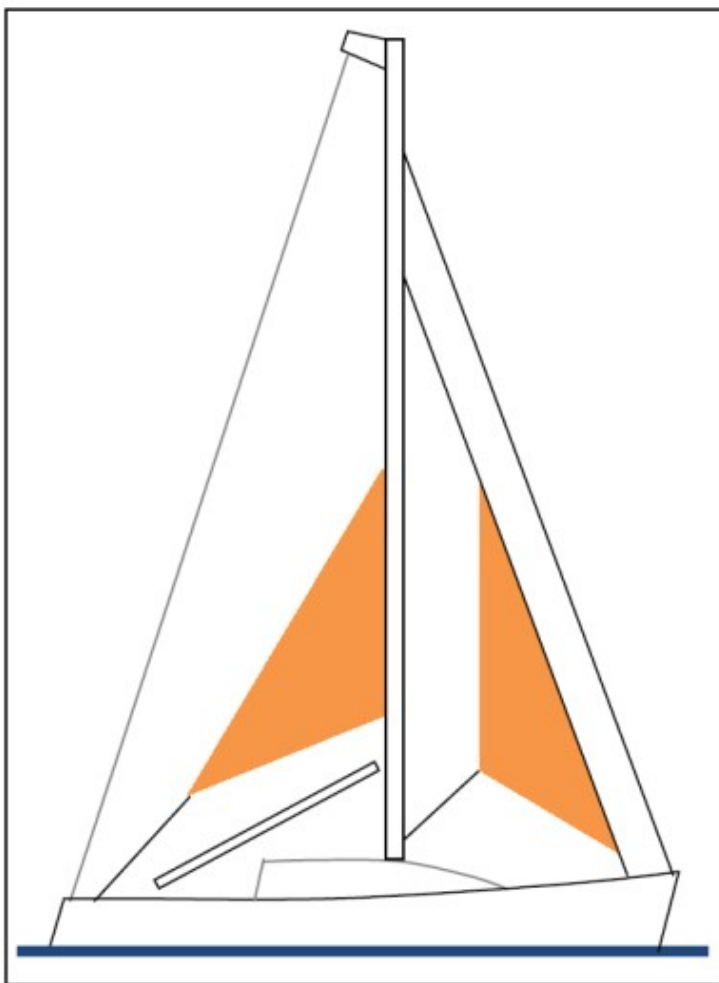
A tapered soft wood plug stowed adjacent to every through-hull opening

### 4.05 Fire Fighting Equipment

- 4.05.1 A fire blanket adjacent to every cooking device with an open flame
- 4.05.2 2 fire extinguishers in different parts of the boat

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- 4.06 Anchors**  
1 un-modified anchor that meets the anchor manufacturer's recommendation based on the boat's dimensions with suitable combination of chain and rope, ready for immediate assembly, and ready for deployment within 5 minutes.
- 4.07 Flashlights and Searchlights**  
Watertight lights with spare batteries and bulbs as follows:
- 4.08 First Aid Manual and First Aid Kit**  
A First Aid Manual and First Aid Kit. The contents and storage of the First Aid Kit shall reflect the likely conditions and duration of the passage, and the number of crew
- 4.09 Foghorn**  
A foghorn
- 4.10 Radar Reflector**  
4.10.1 A passive radar reflector with:  
a) octahedral circular plates of minimum diameter 30 cm (12"), or  
b) octahedral rectangular plates of minimum diagonal dimension 40 cm (16"), or  
c) a non-octahedral reflector with a documented Root Mean Square minimum Radar Cross Section (RCS) area of 2 m<sup>2</sup> (22 ft<sup>2</sup>) from 0-360° of azimuth and ±20° of heel
- 4.11 Navigation Equipment**  
Navigational charts (not solely electronic), light list and chart plotting equipment
- 4.12 Safety Equipment Location Chart**  
A safety equipment location diagram in durable waterproof material, clearly displayed in the main accommodation, marked with the location of principal items of safety equipment
- 4.13 Depth, Speed and Distance Instruments**  
4.13.2 A depth sounder
- 4.16 Tools and Spare Parts**  
4.16.1 Tools and spare parts, suitable for the duration and nature of the passage  
4.16.2 An effective means to quickly disconnect or sever the standing rigging from the boat
- 4.17 Boat's name**  
The boat's name on miscellaneous buoyant equipment, such as lifejackets, cushions, lifebuoys, recover slings, grab bags etc.
- 4.18 Retro-reflective material**  
Marine grade retro-reflective material on lifebuoys, recovery slings, liferafts and lifejackets
- 4.21 Grab Bags**  
f) If a grab bag is provided it shall have inherent flotation, at least 0.1 m<sup>2</sup> (1 ft<sup>2</sup>) area of fluorescent orange colour on the outside, shall be marked with the name of the boat, and shall have a lanyard and clip
- 4.22 Crew Overboard Identification and Recovery**  
4.22.3 a lifebuoy with a self-igniting light, a whistle and a drogue, within reach of the helmsman and ready for ~~instant~~ immediate use  
4.22.6 Each inflatable lifebuoy and any automatic device shall be tested and serviced at intervals in accordance with its manufacturer's instructions  
4.22.7 A heaving line, no less than 6 mm (1/4") diameter, 15 - 25 m (50 - 75') long, readily accessible to cockpit
- 4.23 Pyrotechnic and Light Signals**  
Pyrotechnic signals conforming to *SOLAS LSA* Code Chapter III Visual Signals and not older than the stamped expiry date (if any) or if no expiry date stamped, not older than 4 years as follows:  
4.23.2 2 orange smoke *LSA* III 3.3
- 4.25 Cockpit Knife**  
A strong, sharp knife, sheathed, securely restrained and readily accessible from the deck or a cockpit
- 4.26 Storm & Heavy Weather Sails**  
4.26.1 **Design**  
**Figure 3**



- a) The material of the body of a storm sail purchased after 2013 shall have a highly-visible colour (e.g. dayglo pink, orange or yellow)
- b) Aromatic polyamides, carbon and similar fibres shall not be used in a trysail or storm jib but *HMPE* and similar materials are permitted
- c) Sheeting positions on deck for each storm and heavy-weather sail
- d) Sheeting positions for the trysail independent of the boom

4.26.2 **Sail Areas**

The maximum area of storm sails shall be lesser of the areas below or as specified by the boat designer or sailmaker

- a) *A heavy-weather jib (or heavy-weather sail in a boat with no forestay) with:*
  - i *area of 13.5% height of the foretriangle (IG) squared*
  - ii *readily available means, independent of a luff groove, to attach to the stay*
- c) For sails made after 2011: The storm and heavy weather jib areas calculated as:  $(0.255 \times \text{luff length} \times (\text{luff perpendicular} + 2 \times \text{half width}))$

4.26.3 **Sail Inventory**

- a) iii either mainsail reefing to reduce the luff by 12.5% or a heavy-weather jib as defined in 4.26.2 a) (or heavy-weather sail in a boat with no forestay)

**SECTION 5 - PERSONAL EQUIPMENT**

Each crew member shall have:

**5.01 Lifejacket**

5.01.1 A lifejacket shall:

Each crew member shall have personal flotation device which shall:

- a) i if manufactured before 2012 comply with *ISO 12402 - 3* (Level 150) or equivalent,

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including *EN 396* or *UL 1180* and:

**Sail Canada prescribes that the words "if manufactured before 2012" above are deleted and that 5.01.1 a) ii, below, is deleted in its entirety.**

- if inflatable have a gas inflation system
- have crotch/thigh straps (ride up prevention system (RUPS))
- ii if manufactured after 2011 comply with *ISO 12402-3* (Level 150) and be fitted with a whistle, lifting loop, reflective material, automatic/manual gas inflation system and:
  - crotch/thigh straps (ride up prevention system (RUPS))

**LOOR strongly recommends that lifejackets meet 5.01.1 a) ii above but prescribes that vest or suspender-type lifejackets in accordance with *UL 1180* are acceptable for 5.01.1 a) ii. Crotch strap(s) / thigh straps that are functionally equivalent to *ISO 12401* will be accepted.**

**Sail Canada note - *ISO 12402* is not currently approved by Transport Canada**

c) be clearly marked with the boat's or wearer's name

**f) if inflatable, regularly checked for air retention**

Unless otherwise specified by a boat's applicable class rules or by sailing instructions, personal flotation devices shall have at least 150 N (34 #) buoyancy, arranged to securely suspend an unconscious man face upwards at approximately 45° to the water surface.

5.01.4 The person in charge shall personally check each lifejacket at least once annually.

### SECTION 6 - TRAINING

#### 6.04 Routine Training On-Board

At least annually the crews shall practice the drills for:

6.04.1 Crew-Overboard Recovery

6.04.2 Abandonment of vessel

#### 6.05 Medical Training

6.05.3 At least one member of the crew shall be familiar with First Aid procedures, hypothermia, drowning, cardio-pulmonary resuscitation and relevant communications systems

### APPENDICES TO THE OFFSHORE SPECIAL REGULATIONS

**Appendix A - Moveable and Variable Ballast**

**Appendix B - For Inshore Racing**

**Appendix C - For Inshore Dinghy Racing**

**Appendix D - A guide to ISO and other Standards**

**Appendix E - World Sailing Code for the organisation of Oceanic Races**

**Appendix F - Standard Inspection Card**

**Appendix G - Model Training Course**

**Appendix H - Model First Aid Training Course**

**Appendix J - Hypothermia**

**Appendix K - Drogues and sea anchors**