

MINUTES of a meeting of the ORC Special Regulations Committee held on Thursday 11th November 1999 at the Hilton Hotel, Sydney

Present: Alan Green Chairman GBR
Bruce Eissner USA
Jean Sans cooption FRA
Tony Mooney AUS
Giovanni Iannucci ITA
Patrick Lindqvist FIN
Don Martin (representing Wink Vogel) CAN

Apologies: Alfredo Messeder POR, Loick Peyron FRA, Wink Vogel CAN

Observers: Eric Wells RSA
Peter Scholfield GBR
David Cox RSA
Max Rivero-Kelly ARG
Bjorn Loken NOR
Colin Wilson AUS
Jim McElrea NZL
Paddy Boyd IRL
Minoru Tomita JPN
Shigeru Yajima JPN
Gunther O Ahlers GER
Edward Walter NED
Jim Boucaut AUS
Dan Nowlan USA
Hakan Lindqvist SWE
Pete Reichelsdorfer USA
Greg Halls AUS
John Warren GBR
Janet Groseonor GBR
Mike Urwin GBR
Abraham Rosemberg BRA
Wolfgang Paul GER

1 Terms of Reference

The Chairman read the Terms of Reference from the ORC Yearbook: *"The committee shall be responsible for the maintenance, revision and amendment of the Special Regulations Governing Offshore Racing. It shall monitor developments in offshore racing to ensure the maintenance of standards of safety and seaworthiness."*

2 Previous Minutes

Minutes of the meeting held on 5th November at Palma de Mallorca, were signed as a correct record.

3 Video

The committee watched 10 minutes of TV video coverage of the Hobart 98 rescues. The video showed the vulnerability to capsizing of yachts which were pushed broadside by very large seas: once in this attitude, if the wave was breaking or began to break as the yacht was riding the crest, the yacht was most likely to be rolled. Helicopter winch recoveries were shown as well as several fixed-wing operations. An extract from this video would be considered as one element in the training syllabus to be developed (see below).

Harnesses

Submission for a **7-year replacement date** not accepted. The condition of a harness (in common with other equipment) relates more directly to its conditions of use or abuse than to age, although that is also a factor. Agreed to expand Fundamental Regulation 1.02 (a) to highlight the importance of checking the condition of equipment: eg harness stitching, in which contrasting thread colour made checking easier.

The US Safety at Sea Foundation report was gratefully received by the committee. The report referred to a **coloured flag embedded in the stitching of a safety line** (or tether) in industrial applications. The flag indicates when the line has been overloaded and must be replaced. Agreed to adopt this device for harness safety lines purchased in 1/2001 or later.

Submission for **storage of harnesses in a watertight container** not accepted. The committee believed that deterioration would accelerate unless the harness was put away after being first washed in fresh water and then thoroughly dried. Good storage would comprise hanging in a dry locker with plenty of free air circulation. Agreed to draw attention to this as advice.

Operation of **harness clips**: agreed the ideal is a non-capsizing hook at the deck end and a hook which can be released under load at the harness end. The committee was not aware of a hook which could meet both criteria. If this is so we were looking at a line which must not be used "the wrong way round". One solution would be for the harness end clip to be of a material of a smaller diameter than the deck end clip. Only the harness end clip would be able to fit through a hole in a plate on the harness buckle. Every hook should be operable with one hand. No regulation changes at this stage but see note on coronial enquiry, below.

Submissions for **extra safety lines**: agreed to add to 5.02 a requirement for at least 30% of the members of a crew which are required to have safety harnesses, to each have (instead of or in addition to the already specified safety line), a single safety line with a snaphook at each end and another midway, or alternatively two safety lines of which one is to be a full length line (not more than 2m long) with a hook at each end, and the other is to be not more than 1m long and also with a hook at each end. Some crews will use short extra safety lines by clipping them for the duration of a race to a strongpoint in the vicinity of a workstation.

Attention will be drawn in 5.02 (harnesses) to 4.03 (c) (jackstays) which requires that a **crew member shall be able to "...remain clipped on while moving laterally across the yacht..."**. This rule appears not to have been noticed by some skippers and crews.

Agreed that when harnesses are required (categories 0 1 2 3) so also will **jackstays** be required (in effect adds cat 3 to the jackstay categories).

Agreed to RORC submission 3 to add an introduction to 5.01 and 5.02: "Before starting every individual shall, in a race in which the equipment is required, have personally **fitted and adjusted** the safety harness and lifejacket which he or she will wear during that race." This will be included in the training syllabus (see below).

A **thorough revision of harness requirements** will be made when the Australian coronial (coroner's court) Hobart 98 enquiry is completed and the findings published – expected sometime between April and June in 2000.

5

Liferafts

Secure **stowage adjacent to the companionway below deck** is currently allowed for a raft packed in a valise weighing not more than 40kg provided it can be got to the lifelines within 15 seconds. This rule dates back some 20 years to a time when rafts stowed on deck even in purpose-built containers, would get damp or wet inside no matter how carefully packed: the dampness would react chemically with copper traces in the raft material which under the influence of diurnal changes in temperature and pressure would be partly destroyed sometimes in only a few weeks.

However modern materials are much more robust and packing methods better. The Hobart report underlined how difficult it was to get below-deck rafts into service quickly and without damage. The committee agreed to RORC submission 7 to call for **purpose-built stowage opening into or adjacent to the cockpit or main deck to apply to yachts first launched on or after 6/2001**. Yachts already built will be encouraged to stow rafts similarly if it is practical to do so.

Several particular lessons on liferaft construction came from the Hobart enquiry, including:-

- total exterior of raft should be high-visibility orange
- resistance to shock-load of drogue lines and painters to be improved
- diameter of drogue lines and painters to be increased (to facilitate handling)
- diameter of drogues to be increased
- efficiency of ballast pockets to be improved (regard to be paid to volume, aperture size and size of lead weights which open the ballast pockets on deployment)
- repair kits must operate effectively in wet conditions
- emergency supplies bag to be better arranged against loss
- canopy flap fastenings to be improved
- rain-collecting device should not flood raft in heavy weather
- better grab lines inside the raft
- plastic windows in canopy (item added by chairman on 18-11-99)

The ISO 9650 (liferafts) working party is now in its 11th year of deliberation and has not published a standard. The committee agreed that **a working party will be set up to review and enhance the ORC standard for yachtsmen's liferafts published as Appendix A to Special Regulations**. The working party will initially comprise the Chairman (GBR), Mr Greg Halls (AUS) and a representative from the US Sailing Foundation which is currently also working on liferafts (Bruce Eissner will advise the contact and in addition, advise on the acquisition of a copy of a 1,000-page report produced by the US coastguard). The working party will assimilate the findings of the coronial enquiry when these are available in mid-2000 and also recommendations included in earlier Hobart reports (eg 1976). The working party will consult SOLAS specifications as well as the draft ISO 9650 standard in order to arrive at the best possible conclusion. **The revised ORC standard will be published as soon as possible after receipt of the coronial enquiry findings.**

A proposal to include liferafts in category 3 was not supported. MNAs or organisers who so wish can prescribe them as an addition (see footnotes to item 14 in the minutes of 5th November 1998).

6 Jon Buoy brand dan buoys and man overboard equipment

AYF had proposed that these be excluded until modifications had been completed to the mounting brackets. Modifications had now been made to the satisfaction of AYF who therefore withdrew their submission: **no action**.

Discussion followed about the best place to locate MoB equipment. If it was aft of the helmsman (in a conventional modern layout) it could be difficult and dangerous for a crewman to get past the helmsman in order to release MoB gear. The helmsman himself (within whose easy reach the equipment is required by Special Regulations to be) may be totally committed to the helm and unable to launch the gear. However SRs cover a very wide range of boat type and a rule against equipment aft of the helm would not work well for example in a centre-cockpit cruiser-racer: **no action**.

7 Storm sail size

A submission was received proposing the study of storm sail sizes. Prior to the present meeting a review had been carried out by a sub-committee of the RORC technical committee. The review group was chaired by Simon Rogers, a designer, had members who were sailmakers and also had Andy Claughton, an independent consultant, of the Wolfson Unit Southampton. The group had concluded that due to the wide variety of characteristics of boats it would not be practical to produce a single formula answer. Olin Stephens had proposed that the best guide would be found by relating sail size to stability. However the group's conclusion was to leave the present regulation as it was.

There is already a caveat in SR 4.24 and this will be strengthened to urge owners to consult their designers and sailmakers. The chairman pointed out that storm canvas was expected to cope with a range of heavy winds and apparent precision in deciding a single set of dimensions would be misplaced.

8 Construction standards of decks, coachroofs, hatches and windows.

In the 98 Hobart race five yachts rolled by extreme waves sustained considerable damage to their decks. The same had happened in the 79 Fastnet. As a result of a report tabled earlier in the week Council had accepted an offer from David Lyons to carry out an investigation. The committee would like to receive an interim report by mid-2000 even if the main findings will not be ready until after that time.

9 Training

The committee agreed to RORC submission 1 to include a new section 6 "training guidance" with a minimum list of topics. At least 30% crew including the skipper in a category 0 or 1 race shall have undertaken training including both theory and practical sessions. All crew will be strongly recommended to do likewise. A new Appendix containing a detailed syllabus will be developed by a working party of which the initial members will be Bruce Eissner, Giovanni Iannucci, an AYF representative and an RORC or UK representative. The new Appendix is to be completed by mid-2000. Items to be covered are expected to include:-

- care and maintenance of safety equipment
- cpr and first aid
- liferafts
- storm sails
- fire precautions and fire fighting
- damage control and repair

- heavy weather - crew routines, boat handling, drogues
- man overboard prevention and recovery
- giving assistance to other craft
- SAR systems
- using communications equipment (VHF, satcomms, etc.)
- weather forecasting

10 **Stowage Chart**

Will be required in categories 0-1-2-3-4. See RORC submission 2.

11 **Weather forecast list**

Not agreed to add a requirement for a weather forecast list (RORC submission 4). However weather will be included in the topics and syllabus for compulsory training (see 9 above). Particular attention will be drawn to meteorological standard practice in which peaks (strong gusts of wind, and significantly larger waves amongst an average of smaller waves) are not given specific mention.

12 **Stability Index**

(RORC submission 6). The Chairman said draft ISO 12217-2 had many good features but unfortunately allowed a boat with as little as 105 degrees AVS to obtain a category "A" status (roughly equivalent to ORC category 1). Draft ISO 12217-2 is already being used to achieve compliance with the European Community Recreational Craft Directive (RCD) with which new craft must comply before being offered for sale within the EC. Agreed to strongly recommend Council to resolve that every national authority represented will write to ISO to protest. (The SR committee will provide a standard template letter).

13 **406 EPIRB**

RORC submission 9 agreed. 121.5 and 243 MHz EPIRBs will be removed from SR 4.18 (except that the 406 and type "E" EPIRBs shall be required to also contain a 121.5 MHz unit for local homing). SR 4.18 as amended will apply also to category 2 events from 1/2001.

Note –during the chairman's visit to the SAR authorities in Canberra this week he learned that some Australian aircraft used in SAR (eg the C-130 Hercules) do not carry maritime VHF and have no prospect of doing so. However on-scene voice communications are vital and AusSAR strongly recommends marine craft operating in its area to carry a dedicated, single-channel, waterproof self-contained hand-held aviation VHF which operates on 123.1 MHz AM. Such a set is made by a firm called "SALCOM" and sells for around \$200 Australian. An advisory note explaining this will be added to SR 4.18 after a check on comms equipment used by other SAR authorities.

14 **Foghorns**

RORC submission 10 was withdrawn. A Japanese submission to IMO prescribes sound signals reasonably achievable by small craft which could not except with great difficulty have produced the signals designed for ships and required by COLREGS.

- 15 **Sextant, Radio Direction-Finder**
SRs 4.11 and 3.24 (f). **These items will be withdrawn from SRs.** (The sextant served about 250 years –10 times longer than IOR ...).
- 16 **Proposed new category 5 – sportsboats**
A working party will report on whether (and if so, how) sportsboats might be catered for by SRs. Australia already uses a similar category on a national basis. Bruce Eissner (USA) wished for the draft list of equipment (circulated with RORC submission 14) to be reviewed. Eric Wells (RSA) said an ORC-backed category 5 would be useful in South Africa. (Working party members to be identified).
- 17 **Lifeline tension**
Some installations quickly exceed guideline maximum deflection of 50mm. However the committee did not agree to increase guideline deflection as they considered this would encourage owners to have even more bendy stanchions etc than at present. The committee did not wish to introduce a stiffness criterion for stanchions. There will be **no change** but the situation will be monitored.
- 18 **Outboard engines**
SR 3.23 (a) to (e) will be re-written to make it more clear. The committee decided on the principles that:
- an inboard engine is mandatory in cats 0 1 and 2
 - an engine (either inboard or outboard) is mandatory in cat 3
 - an engine is not required in cat 4.
- The chairman said RORC will prescribe an inboard engine in its cat 3 races.
- 19 **Sail numbers**
SR 4.01 will be re-written in order to properly call up the provisions of RRS Appendix H. The chairman will consult with Tony Mooney on the details.
- 20 **Anchors and cable**
A proposed addition “anchors shall be provided with a suitable combination of chain and rope ready for immediate use” was agreed. The possible inclusion of a classification-society table of displacement/anchor weight/chain cable specification was considered but not agreed. Owners must continue to exercise their judgement and comply with SR 2.03 (a).
- 21 **Rotating Wing Mast as substitute for Trysail**
Agreed subject to the chairman circulating in the draft revised regulations an acceptable definition. Use of a twisting wing mast as substitute for trysail was not discussed.
- 22 **Drogues**
Drogues (SR 4.25) offer significant aid in the reduction of the risk of capsize in heavy breaking seas. Agreed to include a descriptive appendix, offered by the RORC.

- 23 **Lifejacket equipment**
The committee reviewed the recommended equipment:
- crotch straps (thigh straps to be specified as an alternative)
 - splashguard
 - light
- These items will continue to appear as recommendations.
- 24 **Marginal indices**
Will be shown as "Mo 0 1 2, Mu 0 1 2 3, etc. The word "all" will not be used.
- 25 **Web site**
Agreed, subject to Council approval that SRs will be posted on the ORC web site both in complete form (virtual copy of the booklet) and also in modular form so that a user could select eg *category 3 monohulls* and have a text dump or html file with just the relevant parts extracted and provided in a single package. Separate checklists will also be supplied within each module. The committee was aware that internet access did not on the face of it promise to enhance booklet sales. Nonetheless, the committee proposes:
- (a) we should prioritise giving the best possible service to sailors,
 - (b) that web site advertising should be sought, and
 - (c) that a "form-fill" area be displayed prominently on the site through which the booklet could be ordered with a credit card.
- (note – Michael Devonshire has ordered 500 booklets for distribution to IMO delegates).*
- 26 **Development of international standard procedures and disaster contingency plans for shore organisations – brief from Council**
A working party will be established to comprise members from AUS, USA, GBR and ITA. Members will be either members of the SR committee (Alan Green, Giovanni Ianucci) or nominees of members. The WP may co-opt and consult as they see fit. There will be an interim report in mid-2000 and a final report in November 2000.
- 27 **Examination of legal liability and duties of organisers – brief from Council**
A working party should be established on the same lines as in 26 above. Members will be predominantly lawyers who are also offshore sailors. Members of the SR committee from GBR, USA and AUS offered to nominate as also did observers from GER, RSA and BRA. Proposed that nominees should be tasked after discussion between the SR chairman and the Executive Committee.
- 28 **Publication**
The chairman said target booklet publication date was 1/2000 with web site publication of the main text at the same time. Presentation of modules on the web site may take a few weeks longer but if possible will be completed at the same time. A disk will be available with the main text in Word 97 by mid-December. A disk with the main text in Quark Express will be available in 1/2000.

The meeting closed at 1515.