

SUB-COMMITTEE ON STABILITY AND  
LOAD LINES AND ON FISHING VESSELS  
SAFETY  
55th session  
Agenda item 9

SLF 55/9  
9 November 2012  
Original: ENGLISH

**DEVELOPMENT OF PROVISIONS TO ENSURE THE INTEGRITY AND UNIFORM  
IMPLEMENTATION OF THE 1969 TM CONVENTION**

**Report of the correspondence group**

**Submitted by the United States**

**SUMMARY**

*Executive summary:* This document provides the results of the work of the Correspondence Group on the Development of Provisions to Ensure the Integrity and Uniform Implementation of the 1969 TM Convention, established at SLF 54

*Strategic direction:* 2

*High-level action:* 2.1.1

*Planned output:* 2.1.1.2

*Action to be taken:* Paragraph 8

*Related documents:* SLF 54/9, SLF 54/9/1, SLF 54/9/2, SLF 54/9/3, SLF 54/9/4, SLF 54/9/5, SLF 54/17, SLF 54/INF.11; MSC 89/9/5, MSC 89/9/8; resolutions A.494(XII), A.540(13), A.531(13), A.758(18), A.791(19); MSC.234(82) and TM.5/Circ.5

**Introduction**

1 At its fifty-fourth session, the Sub-Committee agreed to establish a correspondence group, under the coordination of the United States and with terms of reference as described in paragraph 9.8 of document SLF 54/17.

2 Participants in the group included delegations from Member States (Argentina, Australia, Bahamas, Brazil, Canada, China, Finland, France, Germany, India, Islamic Republic of Iran, Italy, Japan, Marshall Islands, Mexico, Panama, Republic of Korea, Russian Federation, Spain, Sweden, United Kingdom and United States); a representative from a United Nations specialized agency (ILO); and observers from the non-governmental organizations (BIMCO, IACS, ICS, IFSMA, INTERTANKO and ITF).

3 This report describes the work done by the correspondence group as required under its terms of reference (see paragraph 1).

## Method of work

4 The group developed an action plan issued on 12 February 2012. The plan provided for three rounds of participant input and associated deadlines. A description of the work conducted during each round follows:

- .1 **Round 1 – Identifying issues and solutions (13 February to 21 May 2012):** This round focused on identifying issues that could affect the integrity or uniform implementation of the measurement system of the existing TM Convention, taking into consideration the impact of the Convention on ship design and safety, including crew accommodations, and developing solutions that would address these issues in general terms. Participants reviewed the rules and requirements of the TM Convention and associated interpretations (e.g., TM.5/Circ.5), identified and categorized issues not previously identified in the other documents listed in the group's terms of reference, and proposed solutions to address all identified issues. The group then assessed and commented on the issues and proposed solutions using a Round 1 Questionnaire developed with the group's input.
- .2 **Round 2 – Developing and evaluating implementing text (21 May to 30 August 2012):** This round focused on developing and evaluating specific text for proposed amendments to the TM Convention and/or revisions to associated IMO interpretations recommended by the group, taking into consideration the information exchanged during the Round 1 work. Participants recommended text for such amendments and revisions, including proposed text for new interpretative documents offered by the group. The group then evaluated the recommended text using a Round 2 Questionnaire, developed with the group's input. This Questionnaire also provided the opportunity to assess the relative importance of the issues, and offer other input for recommendations to the Sub-Committee in the context of the group's terms of reference, including whether the discussions in plenary would be required in order to satisfactorily resolve the issue.
- .3 **Round 3 – Developing report to SLF 55 (30 August to 26 October 2012)** During this round, the group developed and finalized the report to the Sub-Committee, along with information document SLF 55/INF.2, discussed in paragraph 6 below. This was accomplished through the circulation of preliminary and final draft documents, with comment periods of approximately three weeks for each.

## Correspondence group website

5 To facilitate the exchange of information, the group used the website created by the correspondence group on tonnage established at SLF 52 ([www.uscg.mil/imo/slf/tonnagecg](http://www.uscg.mil/imo/slf/tonnagecg)), expanding the website to include relevant documents from the International Conference on Tonnage Measurement of Ships, 1969, and other historical information.

## Results obtained by the group

6 A discussion of the results obtained by the group during the Round 1 and Round 2 work is included in the sub-paragraphs that follow. Additionally, the group developed document SLF 55/INF.2, containing information collected during the course of the group's Round 1 and Round 2 work which the group considered to be relevant to the completion of this planned output.

**6.1 Results for Round 1 – Identifying issues and solutions:** 16 participants representing 13 Member States and 3 non-governmental organizations provided input in Round 1. The group identified 23 new issues during this round, in addition to the 36 issues identified through documents SLF 54/9, SLF 54/9/1, SLF 54/9/2, SLF 54/9/3, SLF 54/9/4, SLF 54/9/5, SLF 54/INF.11, MSC 89/9/5 and MSC 89/9/8. The 59 total issues were categorized along the lines of the scheme used in document SLF 54/9/1, as supplemented by additional categories where appropriate, with the individual issues assigned unique identifiers using a number/lettering scheme (e.g., issue 1.a refers to the first issue in category 1, *Length definition*). 14 participants offered a total of 218 proposed solutions to these issues. Annex 1 to document SLF 55/INF.2 describes in more detail the results of this work, including a brief description of each issue, along with summaries of the various proposals and associated Round 1 Questionnaire responses. As reflected in the results summary table included as annex 2 to document SLF/INF.2, there was relatively little agreement on the majority of the proposed solutions, with proposals for only 11 of the issues receiving reasonably broad support.

**6.2 Results for Round 2 – Developing and evaluating implementing text:** 18 participants representing 14 Member States and four non-governmental organizations provided input in Round 2. Participants offered a total of 16 proposed amendments to the TM Convention and 167 proposed revisions to the draft Unified interpretations document for consideration by the group. In addition, participants offered two draft Assembly resolutions, one to replace resolutions A.758(18) and A.791(19), and the other addressing a reduced gross tonnage parameter for crew and trainee accommodation spaces without including specifics on how to account for such spaces. Annex 1 to this document summarizes the principal results from the Round 2 Questionnaires. Annexes 3, 4 and 5 to document SLF 55/INF.2 provide more details on the Round 2 work, including a copy of the draft Assembly resolution on reduced gross tonnage for crew and trainee accommodation spaces, for which specific definitions, requirement and calculational methods required further development.

**6.3 Documents for Sub-Committee consideration:** Based on the Round 2 Questionnaire results, the group further developed the following documents, and is offering them for consideration by the Sub-Committee:

- .1 **revised/updated unified interpretations:** Annex 2 to this document, which is a draft unified interpretations document to replace circular TM.5/Circ.5, and whose format was endorsed by the Sub-Committee at its last session (SLF 54/17, paragraph 9.6). This document identifies revisions considered by the group to be necessary to address the issues identified by the group in the context of its terms of reference; and
- .2 **draft Assembly resolution:** Annex 3 to this document, which is a draft Assembly resolution that could replace resolutions A.758(18) and A.791(19).

**6.4 Other areas for improvements:** During the course of its work, the group identified a number of areas of possible improvements to the TM Convention and associated interpretations, which the group did not pursue for further development, or for which the group was otherwise unable to obtain sufficient consensus to further pursue. These include proposals and comments addressing treatment of semi-open spaces in open-top containerhips, inclusion of deck cargo volume in tonnage, and exclusion of crew accommodation spaces from tonnage. Details on these areas may be found in annex 1 to this document and/or annexes 1 and 2 to document SLF 55/INF.2, as applicable (e.g., under issues 3.a, 3.c, 11.d and 13.a).

**6.5 Need for plenary discussions:** As reflected in annex 1, there was only one issue that received a consensus rating of "Needed" in reference to the need for plenary discussions to satisfactorily resolve the issue; specifically, issue 3.a, "Requirement for a deck above to bound enclosed spaces". However, for this issue, only six respondents characterized the need for plenary discussions in this manner, with six respondents expressing a preference for "Neither Agree/Disagree" and one respondent expressing a preference for "Disagree". This level of support for plenary discussions was considered insufficient for the group to recommend that such discussions take place, in line with the conditional approach identified in annex 2 that a minimum of seven respondents with the same response, in effect, constitute a group majority when assessing any single issue.

## Conclusions

7 As a result of its work, and based primarily on the Round 2 Questionnaire responses, the group concluded the following, within the context of its terms of reference. Refer to annex 1 for more detailed information in support of these conclusions.

**7.1 Identifying areas for improving the TM Convention:** Of the areas for improvement for which the group pursued development in Round 2, the group generally agreed that there were no identified issues for which amendments to the TM Convention were necessary, although there was agreement that amendments could be helpful on an optional basis to address two of the 59 identified issues: issue 3.j (enclosed spaces vs. excluded spaces) and issue 3.o (width of end openings). Accordingly, the group concluded that its work to identify areas for improving the TM Convention was complete, and that these two areas of identified improvements should be addressed only if the TM Convention is to be amended for other reasons.

**7.2 Amending the TM Convention:** As indicated in table 1 below, there was some support within the group for amending the TM Convention to ensure its integrity and uniform implementation, and to improve ship design or safety, including crew accommodation. However, in view of the limited nature of this support, and the lack of any specific identified issue for which the group agreed that amendments were necessary, the group concluded, with some dissent, that no amendments to the TM Convention should be made at this time.

<b>TM Convention amendments are needed:</b>	<b>Agree</b>	<b>Neither Agree/Disagree</b>	<b>Disagree</b>	<b>No Opinion</b>
To ensure integrity of the TM Convention	6 (5)	6 (6)	2 (1)	4 (2)
To ensure uniform implementation of the TM Convention	6 (4)	7 (7)	2 (1)	3 (2)
To improve design/safety/crew accommodation	4 (2)	9 (9)	2 (1)	3 (2)

\* numbers shown in parentheses reflect Member States only

**7.3 Issuing revised interpretations:** As indicated in table 2 below, the group generally agreed that revisions to current interpretations of the TM Convention of circular TM.5/Circ.5 and resolutions A.758(18) and A.791(19) are needed to help ensure its integrity and uniform implementation, and to improve ship design or safety, including crew accommodation. Accordingly, the group concluded that the draft Unified Interpretations document to replace

TM.5/Circ.5 and the draft Assembly resolution to replace resolutions A.758(18) and A.791(19) (annex 2 and annex 3, respectively) should be further developed.

<b>Revised interpretations are needed:</b>	Agree	Neither Agree/Disagree	Disagree	No Opinion
To ensure integrity of the TM Convention	13 (11)	0 (0)	1 (1)	4 (2)
To ensure uniform implementation of the TM Convention	13 (11)	0 (0)	1 (1)	4 (2)
To improve design/safety/crew accommodation	10 (8)	3 (3)	1 (1)	4 (2)

\* numbers shown in parentheses reflect Member States only

### **Action requested of the Sub-Committee:**

8 The Sub-Committee is invited to consider the information presented in this document, and to take actions as appropriate, and in particular to:

- .1 endorse the correspondence group's conclusion that no further work is necessary to identify areas for improving the existing measurement system of the TM Convention under this planned output (paragraph 7.1);
- .2 endorse the correspondence group's conclusion that no amendments to the TM Convention are necessary or appropriate under this planned output at this time (paragraph 7.2); and
- .3 endorse the correspondence group's conclusion that the draft documents provided in annexes 2 and 3 should be further developed, with the following recommended approach for completing this work (paragraph 7.3):
  - .1 establish a working group at SLF 55 to progress this work, consistent with the plan of action supported by the Sub-Committee at SLF 54 (SLF 54/17, paragraph 9.6); and
  - .2 develop terms of reference for the working group that provides for the group's finalization of the draft documents, taking into account discussions in plenary and the work completed by the correspondence group.

\*\*\*



ANNEX 1

ROUND 2 RESULTS SUMMARY

Category and Issue	Positions of Respondents on Need for Interpretations / Amendments to Resolve Issue <sup>1</sup>						
	Important to Maintain Integrity	Important to Uniformly Implement	Important for Ship Design / Safety	Within the Terms of Reference	Will Require Discussions in SLF Plenary	Revising Interpretations	Amending the 1969 TM Convention
<b>1. Length Definition</b>							
1.a Treatment of Unusual Hull Configurations	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
1.b Determining Least Moulded Depth (LMD)	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
1.c Trainable Rudders and Rudderless Ships	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Helpful/optional
<b>2. Novel Craft</b>							
2.a. Applying Novel Craft Provisions	Agree	Agree	Agree	Agree	Neither A/D	Needed	Don't change
<b>3. Enclosed Spaces</b>							
3.a Requirement for a Deck Above to Bound Enclosed Space	Agree	Agree	Neither A/D	Agree	Agree	Needed	Don't change
3.b Treatment of Temporary Deck Equipment	Agree	Agree	Agree	Agree	Agree	Needed	Don't change
3.c Treatment of Deck Cargo Bounded by Enclosing Structure	Agree	Agree	Neither A/D	Agree	Agree	Needed	Don't change
3.d Treatment of Spaces Underneath Overhangs	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
3.e Treatment of Topside Spaces of Complex Shape	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
3.f Treatment of Hull Spaces of Complex Shape	Agree	Agree	Neither A/D	Agree	Disagree	Helpful/optional	Don't change
3.g Evaluating Accessibility of Mast, Kingposts and Supports	Agree	Agree	Neither A/D	Agree	Agree	Needed	Don't change
3.h Vertical Truss Structures	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
3.i Movable Door Assembly Within a Covered Space	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
3.j Enclosed Space Versus Excluded Space	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Helpful/optional
3.k Mobile Cranes	Agree	Agree	Disagree	Agree	Neither A/D	Needed	Don't change
3.l Independent Ventilators and Air Trunks	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
3.m Spaces Fitted to Outer Structure Boundary	Neither A/D	Agree	Agree	Agree	Neither A/D	Needed	Don't change
3.n Devices for Safety, Fire Protection and Pollution Prevention	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
3.o Width of End Openings	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Helpful/optional
3.p Machinery as Enclosed Space	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
3.q Machinery Support Structures	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
<b>4. Definition of Deck, Cover and Partition</b>							
4.a Definition of Awning	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
4.b Treatment of Exterior Spaces Bounded by Awnings	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
4.c Treatment of Interior Spaces Bounded by Awning-Like Materials	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
4.d Fitting of Grates Over Side/End Openings	Agree	Agree	Agree	Agree	Neither A/D	Needed	Don't change
4.e Fitting of Grates Over Deck Openings	Agree	Agree	Agree	Agree	Disagree	Needed	Don't change
<b>5. Excluded Spaces</b>							
5.a Shelves or Other Means for Securing Cargo or Stores	Agree	Agree	Agree	Agree	Neither A/D	Needed	Don't change
5.b Impact of End Opening Obstructions	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
5.c Excluding Space Opposite an End Opening as a Recess	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
5.d Characteristics of End and Side Openings	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
5.e Deck Structure Height Requirements for Side Openings	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
5.f Restrictions on Excluding Space Below Uncovered Openings	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
5.g Structures Along the Line of an Opening	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
5.h Adjoining Deck Beams on End Openings	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
5.i Rails and Fashion Plating for Side Openings	Agree	Agree	Agree	Agree	Neither A/D	Needed	Don't change
5.j Height of Side Opening Railings	Agree	Agree	Neither A/D	Agree	Disagree	Don't change	Don't change
<b>6. Spaces Open to the Sea</b>							
6.a Treatment of Spaces Inside the Hull as Open to the Sea	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
6.b Treatment of Spaces Outside the Hull as Open to the Sea	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
6.c Treatment of Moon Pools	Agree	Agree	Agree	Agree	Disagree	Helpful/optional	Needed
6.d Large Volumes of Spaces Open to the Sea	Agree	Agree	Agree	Agree	Neither A/D	Needed	Don't change
<b>7. Re-Certification for Changes Affecting Tonnage</b>							
7.a Remeasurement Following Alterations	Agree	Agree	Neither A/D	Agree	Agree	Needed	Don't change
7.b Remeasurement Following Net Tonnage Change	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
7.c Alterations to Tonnage Following Remeasurement by Another Body	Neither A/D	Neither A/D	Neither A/D	Agree	Neither A/D	Don't change	Don't change
<b>8. National Tonnage</b>							
8.a Criterion for Use of "Existing" Tonnage	Agree	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
8.b Use of Tonnage Under Interim Schemes	Agree	Agree	Agree	Agree	Agree	Needed	Don't change
8.c Loss of Tonnage Grandfathering Under Interim Schemes	Agree	Agree	Agree	Agree	Agree	Needed	Don't change
<b>9. International Tonnage Certificate (1969)</b>							
9.a Listing of Spaces on the Certificate	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
9.b Specifying Lengths of Spaces on the Certificate	Neither A/D	Agree	Neither A/D	Agree	Disagree	Needed	Don't change
9.c Listing Excluded Spaces on the Certificate	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
9.d Keel Laid or Alteration Date on the Certificate	Neither A/D	Neither A/D	Neither A/D	Agree	Neither A/D	Helpful/optional	Don't change
9.e Tonnage Certificate Attachments	Neither A/D	Neither A/D	Neither A/D	Agree	Neither A/D	Helpful/optional	Don't change
9.f Transmitting Copies of Calculations and Certificates Upon Flag Change	Agree	Agree	Disagree	Agree	Disagree	Needed	Don't change
<b>10. Applying Interpretations</b>							
10.a Acceptance and Retroactive Application of Interpretations	Agree	Agree	Neither A/D	Agree	Neither A/D	Needed	Don't change
<b>11. Impact on Working and Living Conditions</b>							
11.a Extending Reduced Gross Tonnage to Crew Spaces	Disagree	Disagree	Agree	Agree	Agree	Don't change	Don't change
11.b Calculating a Reduced Gross Tonnage Parameter for Crew Spaces	Neither A/D	Disagree	Agree	Agree	Agree	Don't change	Don't change
11.c Use of Multiple Reduced Gross Tonnage Parameters	Disagree	Disagree	Agree	Agree	Neither A/D	Needed	Don't change
11.d Treatment of Crew Accommodation Spaces	Agree	Disagree	Disagree	Agree	Agree	Don't change	Don't change
<b>12. Certificate Exemptions</b>							
12.a Single Voyage Exemption	Neither A/D	Neither A/D	Neither A/D	Neither A/D	Neither A/D	Don't change	Don't change
<b>13. Cargo Spaces (Addendum)</b>							
13.a Including Cargo Spaces in Tonnage	Agree	Disagree	Disagree	Disagree	Disagree	Don't change	Don't change
	With Consensus		With Limited Consensus		Without Consensus		

1. Consensus categorization methodology per "Ranking Ordinal Scales Using the Consensus Measure", Issues in Information Systems, Volume V1, No. 2, 2005. The positions displayed reflect those receiving the most support, with "Agree" or "Needed" assumed to be the preferred response in all cases. The color coding scheme is based on the following Consensus Measures (Cns) values: Green (Cns >= 0.47); Yellow (0.3 <= Cns < 0.47); Red (Cns < 0.3).

\*\*\*



## ANNEX 2

### DRAFT UNIFIED INTERPRETATIONS OF THE 1969 TONNAGE CONVENTION

#### Articles

**Art. 2**            **Definitions**

**Art. 2(8)**        **Length**

A.2(8)-1 When establishing the length of a rudderless flat top barge, the length should be calculated at 96% of the total length of a waterline at 85% of the least moulded depth measured from the top of the keel. *[Develop revisions/interpretations to address issue 1.c.]*

~~A.2(8)-2 Column-stabilized units such as semi-submersible drilling units should be considered novel types of craft. Because the length under article 2(8) or the moulded breadth under Regulation 2(3) for such units is misleading, it would be appropriate for such units to use the overall length and breadth to the outside plating between fixed structures. The citation of the length (article 2(8)) and breadth (Regulation 2(3)) in the respective boxes of the International Tonnage Certificate (1969) should be deleted and a notation in the REMARKS column should be made to identify the ship as, inter alia, a "semi-submersible drilling unit", etc. *The 96% overall length should be used for column-stabilized units, floating docks and pontoons. [Proposal 1.a.1].*~~

~~A.2(8)-X~~*[Develop interpretations to address issues 1.b and 1.c.]*

**Art. 3**            **Application**

*Art. 3(2)(b)        **Ships which undergo alterations** [Develop interpretations to address issue 8.a.]*

**Art. 3(2)(d)**    **Tonnage applicability to "existing" ships**

A.3(2)(d)-1        The term "alterations or modifications which affect its tonnage" in resolution A.758(18) means increase or decrease of more than 1% in either existing gross tonnage or gross tonnage calculated in accordance with the 1969 Tonnage Convention. *[Develop revisions/interpretations to address issue 8.a.]*

**Art. 9**            **Form of certificate**

**Art. 9(2)**        **Model in Annex II**

A.9(2)-1 The "Date" shown on the front of the International Tonnage Certificate (1969) refers to the year when the keel was laid or the ship was at a similar stage of construction (article 2(6)) or the ship underwent alterations or modifications as defined in article 3(2)(b) but when the year of construction or alteration or modification is 1982 or 1994, the month and day should also be described.

A.9(2)-2 Information inserted in the "location" columns on the reverse of the International Tonnage Certificate (1969) should not be detailed.

A.9(2)-3 The phrase "Date and place of original measurement" should refer to the issue of the original International Tonnage Certificate (1969) and should have no reference to measurement under pre-existing national systems.

A.9(2)-4 The phrase "Date and place of last previous remeasurement" should refer to the date and place of issue of the last International Tonnage Certificate (1969).

*A.9(2)-X [Develop interpretations to address issue 9.b.]*

**Art. 10 Cancellation of certificate**

**Art. 10(2) Cancellation upon flag transfer**

A.10(2)-1 Ships holding an International Tonnage Certificate (1969), which do not comply with agreed interpretations of the provisions of the Convention, should be remeasured. The new characteristics should be determined and applied without delay.

**Art. 12 Inspection**

A.12-1 A copy of the tonnage calculations may be provided together with the International Tonnage Certificate (1969) to the ship's master. Although not a requirement, nothing in the Convention would prevent Administrations from providing these calculations to ships flying their flag.

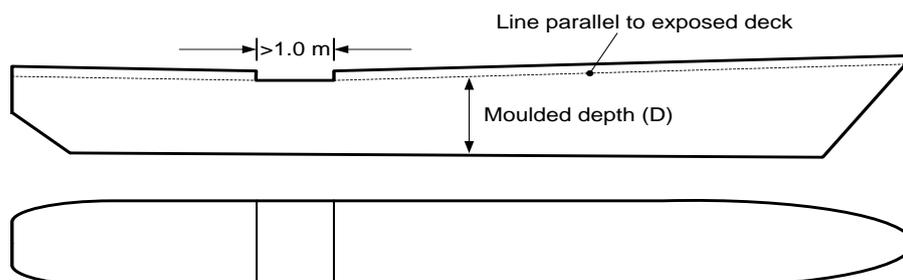
**Regulations**

**Reg. 1(3) Novel craft [Develop interpretations to address issue 2.a.]**

**Reg. 2 Definition of terms used in the Annexes**

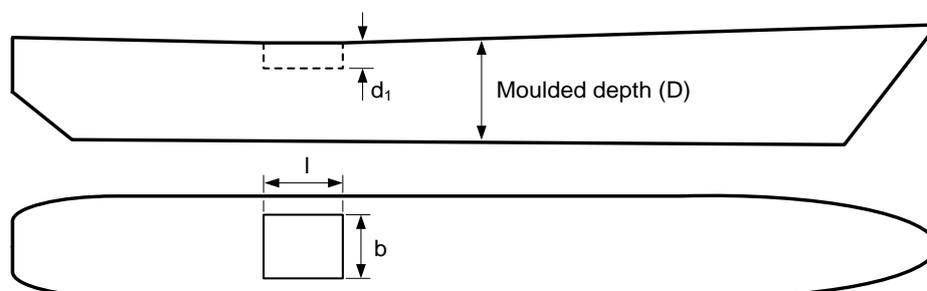
**Reg. 2(1) Upper deck**

R.2(1)-1 A discontinuity in the upper deck which extends over the full breadth of the ship and is in excess of 1 m in length should be treated as a step as defined in regulation 2(1).

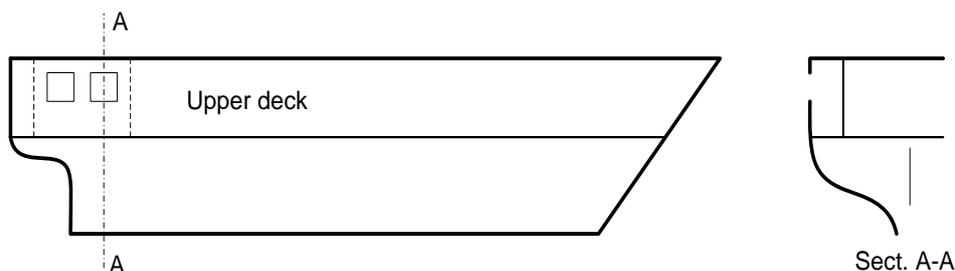


R.2(1)-2 Steps situated outside the "length" (article 2(8)) should not be considered.

R.2(1)-3 A discontinuity in the upper deck which does not extend to the side of the ship should be treated as a recess under the upper deck level.



R.2(1)-4 In a ship having openings in the side of the ship below the uppermost deck, which are not closed but limited inboard by weathertight bulkheads and decks, the deck below such openings should be considered the upper deck.



R.2(1)-5 The Administration may decide on the term "watertight" as a special definition for tonnage purposes is not needed.

**Reg. 2(3) Breadth**

R.2(3)-1 The term "amidships" should be considered as the midpoint of the length as defined in article 2(8) where the forward terminal of that length coincides with the fore side of the stem.

**Reg. 2(4) Enclosed spaces**

R.2(4)-1 In regulation 2(4) there is no contradiction between the definition of enclosed spaces as being "bounded by the ship's hull, by fixed or portable partitions ..." and "... nor the absence of a partition or bulkhead, shall preclude a space from being included in the enclosed space". *[Develop revisions/interpretations to address issue 3.a.]*

R.2(4)-2 Space located within the boundaries of "permanent or movable awnings" should be subject to treatment under regulation 2(5). *[Develop revisions/ interpretations to address issue 4.a and 4.b. See also related Interpretation R-2(4)-X below on the identified need to address issue 4.e.]*

R.2(4)-3 Tanks, permanently located on the upper deck, provided with removable pipe connections to the cargo system or the vent (de-airing) lines of the ship, should be included in  $V_c$ . *[Develop revisions/interpretations to address issue 3.b.]*

R.2(4)-4 The volume of weathertight steel pontoon covers on hatchway coamings should be included in the calculations of the total volume ( $V$ ) of the ship. If such covers are open on the underside, their volume should also be included in  $V_c$ .

R.2(4)-5 Multipurpose ships which have the facility to trade with cargo hatches open or closed should always be measured with the hatch covers considered to be closed.

R.2(4)-6 Masts, kingposts, cranes, crane and container support structures, which are completely inaccessible and above the upper deck, separated on all their sides from other enclosed spaces should not be included in the total volume of all enclosed spaces. Air trunks having a cross-sectional area not exceeding  $1 \text{ m}^2$  may also be excluded under the before-mentioned conditions. All mobile cranes should be exempted. *[Develop revisions/interpretations to address issue 3.g and 3.m. See also related Interpretation R-2(4)-X below on the identified need to address issue 3.k.]*

*R.2(4)-X If enclosed spaces comply with the conditions for exclusion specified in regulation 2(5), then they shall be excluded from the total volume of all enclosed spaces ( $V$ ). Such spaces shall be treated as an "enclosed but excluded spaces" to differentiate from "enclosed and included spaces" (those "enclosed spaces" which do not comply with the conditions for exclusion specified in regulation 2(5)). [Proposal 3.j.1. See also related proposed Interpretation R.2(5)(X) below.]*

*R.2(4)-X Open spaces directly below a bridge wing structure should not be treated as enclosed spaces. [Proposal 3.d.3]*

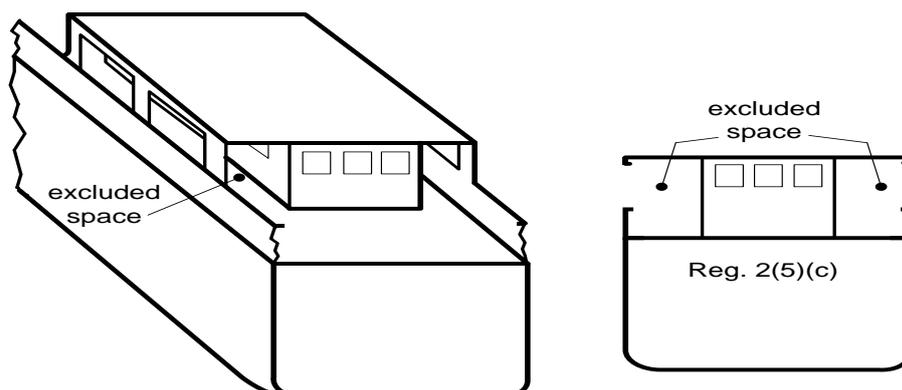
*R.2(4)-X [Develop interpretations to address issue 4.e. See also related Interpretation R.2(4)-2 above on the identified need to address issues 4.a and 4.b.]*

*R.2(4)-X [Develop interpretations to address issue 3.k and 3.p.]*

## **Reg. 2(5)**

### **Excluded spaces**

R.2(5)-1 The space between the side longitudinal bulkhead of a deckhouse and the bulwark below a deck extending from side to side supported by stanchions or vertical plates connected to the bulwarks, should be treated as an excluded space in accordance with regulation 2(5)(b) and (c).



R.2(5)-2 In the case of a ro-ro ship, for example, where the space at the end of an erection is fitted with means for securing cargo, the space should be included in V in accordance with the first condition of regulation 2(5).

*R.2(5)(X) In applying this regulation:*

- .1 spaces excluded from the total volume of all enclosed spaces (V) are those spaces which are treated as enclosed ones under regulation 2(4) but also comply with the conditions for exclusion under regulation 2(5);*
- .2 the volume of those enclosed spaces referred to in regulation 2(5)(a) to (e) shall be excluded from the total volume of all enclosed spaces (V), unless at least one of the following three conditions takes place:*
  - the space is fitted with any means for securing cargo or stores;*
  - the openings are fitted with any means of closure;*
  - the construction provides any possibility of such openings being closed. [Proposal 3.j.1]*

*R.2(5)-X In Appendix 1 to the Convention, labeling in the figures shall be interpreted as follows:*

- .1 "O = excluded space" refers to an enclosed space or part of an enclosed space which corresponds to one of the situations described in regulation 2(5)(a) to (e) and which satisfies the conditions for exclusion from the total volume of all enclosed spaces (V) specified in this regulation;*
- .2 "C = enclosed space" refers to an enclosed space or part of an enclosed space which does not correspond to any of the situations described in regulation 2(5)(a) to (e) and consequently can never be excluded from the total volume of all enclosed spaces (V);*
- .3 "I = space to be considered as an enclosed space" refers to an enclosed space or part of an enclosed space which corresponds to one of the situations described in regulation 2(5)(a) to (e) but does not satisfy the conditions for exclusion from the total volume of all enclosed spaces (V) specified in this regulation. [Proposal 3.j.1. See also related proposed Interpretation R.2(4)(X) above.]*

*R.2(5)-X When applying the provisions of regulation 2(5), the phrase "breadth of the deck" means the breadth of the structure at the line of the opening of the space, regardless of whether or not the structure extends from side to side. [Proposal 3.o.2]*

*R.2(5)-X Side grates over openings should not be considered as means of closure when applying this regulation. [Proposal 4.d.2]*

*R.2(5)-X In applying regulation 2(5)(b) and (c), vertical railings and stanchions necessary for support are not considered to close or reduce the size of a side opening. [Proposal 5.i.2]*

*R.2(5)-X [Develop interpretations to address issues 5.a and 5.d.]*

**Reg. 2(5)(a)**      **Space opposite an end opening** *[Develop interpretations to address issue 5.b.]*

**Reg. 2(5)(c)**      **Space opposite a side opening**

*R.2(5)(c)-X The height of the opening should be evaluated by the height between the continuous/complete decks in each tier. [Proposal 5.e.2]*

**Reg. 2(5)(d)**      **Space immediately below an uncovered opening**

*R.2(5)(d)-X The term "immediately below" means extending from the deck in which the opening occurs to the lower boundary of the opening being considered. Openings which penetrate the upper deck (as defined in regulation 2(1)) are only excluded to the line of the upper deck. (figure to be developed) [Proposal 5.f.5]*

**Reg. 2(6)**      **Passenger**

R.2(6)-1  $N_1$  and  $N_2$  should be obtained from the Administration's maritime safety authority.

**Reg. 2(7)**      **Cargo spaces**

R.2(7)-1 The volumes of the segregated ballast tanks should not be included in  $V_c$  provided they are not to be used for cargo.

R.2(7)-2 The volumes of clean ballast tanks in oil tankers should be included in  $V_c$  when the ship is fitted with a crude oil washing system which would permit dual purpose cargo/clean ballast tank use of these tanks.

R.2(7)-3 The volumes of dedicated clean ballast tanks should not be included in  $V_c$  provided that:

- .1 the tanks are not used for cargo;
- .2 the ship carries a single IOPP Certificate which indicates it is operating with dedicated clean ballast tanks in accordance with regulation 13A, Annex I, MARPOL 73/78;
- .3 the following notation is inserted in the REMARKS column on the International Tonnage Certificate (1969): "This ship carries an IOPP Certificate in conformity with regulation 13A, Annex I, MARPOL 73/78. The following tanks are dedicated solely to the carriage of clean ballast water: \_\_\_\_\_."

R.2(7)-4 The volumes of slop tanks for cargo residues should be included in  $V_c$ .

R.2(7)-5 In fishing vessels, the volumes of fish processing spaces for fishmeal, liver oil and canning, tanks for re-cooling fish, wet fish bunkers, stores for salt, spices, oil and tare should be included in  $V_c$ . Fishing gear stores should not be included in  $V_c$ .

R.2(7)-6 The volume of refrigerating machinery used for refrigerating cargoes and situated within the boundaries of the cargo spaces should be included in  $V_c$ .

R.2(7)-7 The volumes of mail rooms, baggage compartments separate from passenger accommodation, and bonded stores for passengers should be included in  $V_c$ . The volume of provision rooms for crew or passengers and bonded stores for crew should not be included in  $V_c$ .

R.2(7)-8 On combination carriers, where the owners request to have the dual purpose oil/ballast tanks converted to ballast tanks and excluded from  $V_c$ , the ballast tanks should be required to be permanently disconnected from the oil cargo system and not used for the carriage of cargo. The ship should then be remeasured in accordance with regulation 5(3). Any ballast tanks not to be included in  $V_c$  should be solely allocated to ballast, connected to an independent ballast system, and not used to carry cargo.

R.2(7)-9 When determining the volumes of cargo spaces, no account should be taken of insulation, sparring or ceiling which is fitted within the boundaries of the space concerned. For ships which have permanent independent cargo tanks constructed within the ship, e.g. gas tankers, the volume to be included in  $V_c$  should be calculated to the structural boundary of such tanks, irrespective of insulation which may be fitted on the inside or outside of the tank boundary.

R.2(7)-10 The volumes of dual purpose spaces such as those used for both ballast and cargo should be included in  $V_c$ .

R.2(7)-11 Spaces allocated to passenger automobiles should be included in  $V_c$ .

### **Reg. 3**

#### **Gross tonnage**

R.3-1 The  $K_1$  coefficient used in the gross tonnage calculation may be derived from either the table in appendix 2 of the Convention or from the formula in regulation 3 at the discretion of the Administration.

R.3-2 The final tonnage figure determined in accordance with regulation 3 and stated in the tonnage certificate should be given in rounded down figures without decimals.

**Reg. 4 Net tonnage**

R.4-1 The  $K_2$  coefficient used in the net tonnage calculation may be derived from either the table in appendix 2 of the Convention or from the formula in regulation 4 at the discretion of the Administration.

R.4-2 The final tonnage figure determined in accordance with regulation 4 and stated in the tonnage certificate should be given in rounded down figures without decimals.

**Reg. 6 Calculation of volumes**

R.6-1 Enclosed spaces above the upper deck, appendages and spaces open to the sea not exceeding  $1 \text{ m}^3$  should not be measured.

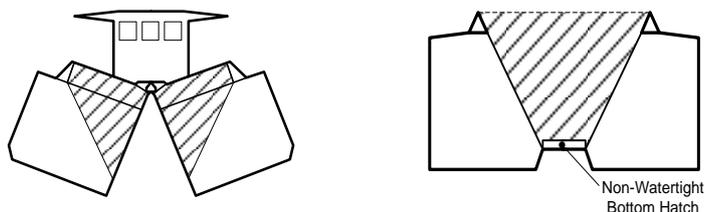
**Reg. 6(2) Appendages**

R.6(2)-1 Bulbs, fairwaters, propeller shaft bossings or other structures should be treated as appendages.

**Reg. 6(3) Spaces open to the sea**

R.6(3)-1 Hawse pipes, sea-valve recesses, thruster tunnels, stern chutes in fishing vessels, dredging wells in dredgers and other similar spaces fitted in the ship's hull should be dealt with as spaces open to the sea.

R.6(3)-2 Volumes within the hulls of ships, such as split-hull barges and dredgers, should be retained in  $V$  and  $V_c$  notwithstanding that the space within the hull is temporarily opened to the sea when discharging cargo.



*R.6(3)-X Spaces open to the sea should not be excluded from the total volume of all enclosed spaces ( $V$ ) if they are used for cargo and/or buoyancy purposes. [Proposal 6.d.2]*

*R.6(3)-X [Develop interpretations to address issue 6.a.]*

**Reg. 7 Measurement and calculation**

R.7-1 When a tonnage certificate and a copy of the calculations of the tonnages are transmitted to another Government in accordance with article 8(2) or 10(3) of the Convention, they should be accompanied by a form as shown in the annex, showing the main particulars of the tonnage calculations for easy reference. When listing underdeck volumes, the volumes may be combined (e.g. underdeck/extended forecastle, etc.) on the form.

**Reg. 7(2) Calculation methods and accuracy**

R.7(2)-1 Administrations should decide on the degree of accuracy required for the tonnage calculations.

**Novel craft interpretations (regulation 1(3))**

**NvICr. 1 Livestock carriers**

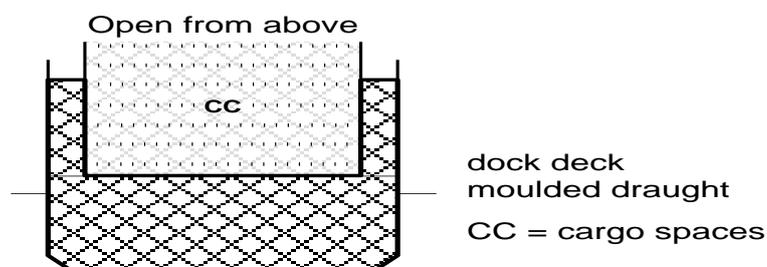
N.1-1 Livestock carriers are most often converted ships. Above the existing upper deck, one or more decks are constructed. Between these decks, the livestock corrals and their associated spaces are arranged, separated by, for example, railings, fences or gangways. The corrals are open to the air.

N.1-2 Stanchions, fences and railings to keep livestock in the corrals are "other means for securing cargo" according to regulation 2(5).

N.1-3 In applying the provisions of the 1969 Tonnage Convention, livestock structures should be included in the gross tonnage.

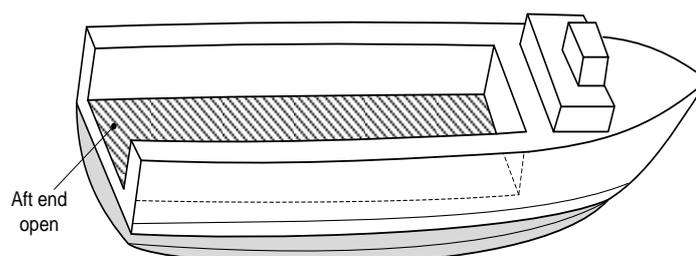
**NvICr. 2 Dockships**

N.2-1 A dockship may include in its main structural characteristics the absence of hatch covers above the cargo space but may have a dock deck above the moulded draught together with side erections.

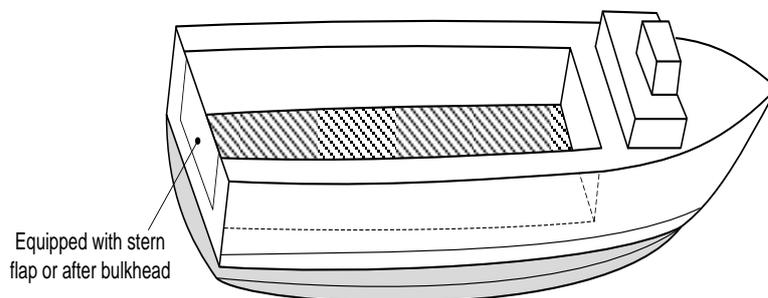


N.2-2 The dockships considered are described as:

- .1 a dockship open-ended at the stern,



- .2 a dockship fitted with a stern door or a grill stern door (see figure 8 in appendix 1).



N.2-3 The space above the dock deck, bounded on at least three sides by erections and intended for the carriage of cargo should be included.

N.2-4 In this context, an erection is defined as being an enclosed space bounded by bulkheads and a deck above.

**NvICr. 3 Open-top containerships**

N.3-1 Refer to resolution MSC.234(82) for recommendations concerning tonnage measurement of open-top containerships.

\* \* \*

ANNEX

FORM GIVING PARTICULARS OF UNIFORM TONNAGE CALCULATION

GROSS TONNAGE

Item No.	Name of Space	Location	Length	Moulded volume
	Underdeck Poop Bridge Forecastle Deckhouses Hatches, etc.			
		Total volume		

NET TONNAGE

	No. 1 hold No. 2 hold, etc. No. 1 tween decks, etc. No. 2 tween decks, etc. Hatches, etc.			
		Total volume		

NOTE: Annex 2 was developed based on the Round 2 Questionnaire responses, as summarized in annex 1. Text in italics represents proposed revisions to the interpretations of circular TM.5/Circ.5 for further development or evaluation. Green font indicates the specific proposed revisions that were preferred by seven or more respondents, with seven being the average number of respondents who expressed a preference for the specific revisions to the interpretations or resolutions being evaluated for all 59 issues. Red font identifies those issues for which such agreement was not obtained. Annex 2 addresses only those issues listed in annex 1 for which revised Unified Interpretations/Resolutions are identified as "Needed With Consensus" and where six or more Round 2 Questionnaire respondents expressed the view that revised interpretations or resolutions were needed, constituting a majority of the average total number of respondents who expressed an opinion on this subject. Referenced issues and proposals may be found in annex 3 to document SLF 55/INF.2.

\*\*\*



## **ANNEX 3**

### **DRAFT ASSEMBLY RESOLUTION**

#### **USE OF NATIONAL TONNAGE IN APPLYING INTERNATIONAL CONVENTIONS**

THE ASSEMBLY,

RECALLING Article 15(j) of the Convention on the International Maritime Organization concerning the functions of the Assembly in relation to regulations and guidelines concerning maritime safety and the prevention and control of marine pollution from ships,

RECALLING ALSO that the International Convention on Tonnage Measurement of Ships, 1969 (1969 Tonnage Convention), introduced a new measurement system, and that the tonnages measured under this system could be different from those measured under national tonnage rules,

RECALLING FURTHER that recommendation 2 of the International Conference on Tonnage Measurement of Ships, 1969, recommended the acceptance of the tonnages measured under this new system as the parameters referred to where those terms are used in conventions, laws, and regulations, while recognizing that transition to this new system should cause the least possible impact on the economics of merchant shipping and port operations,

NOTING that article 3(2)(d) of the 1969 Tonnage Convention provides for certain ships to retain their national tonnages for the purpose of applying relevant requirements under other existing international conventions, if they do not undergo alterations or modifications which the Administration deems to be a substantial variation in their existing gross tonnage,

NOTING ALSO that the Interim Schemes for Tonnage Measurement of resolutions A.494(XII), A.540(13) and A.541(13) effectively extended this use of national tonnages to certain other ships, for the purpose of applying relevant requirements, respectively, of the International Convention for the Safety of Life at Sea (SOLAS), 1974, as amended, the International Convention on Training, Certification and Watchkeeping for Seafarers (STCW), 1978, and the International Convention for the Prevention of Pollution from Ships, 1973, as modified by the Protocol of 1978 relating thereto (MARPOL 73/78),

NOTING FURTHER that resolutions A.758(18) and A.791(19) were adopted to address identification of national tonnages on International Tonnage Certificates (1969) and other pertinent certificates, including Ship Safety Certificates and International Oil Pollution Prevention Certificates,

BEING AWARE that amendments to the SOLAS, STCW and MARPOL 73/78 Conventions made subsequent to the adoption of resolutions A.494(XII), A.540(13) and A.541(13) have led to misunderstandings over the use of national tonnage when applying newly established tonnage-based requirements for ships measured in accordance with provisions of the 1969 Tonnage Convention and Interim Schemes for Tonnage Measurement, highlighting the need for updated recommendations on this matter,

BEARING IN MIND the decisions of the Maritime Safety Committee to apply newly established tonnage-based requirements of the International Ship and Port Facility and Security (ISPS) and International Safety Management (ISM) Codes using a ship's tonnage as measured under the rules 1969 Tonnage Convention,

RECOGNIZING the necessity of uniform implementation of the 1969 Tonnage Convention with regard to national tonnages,

HAVING CONSIDERED the recommendations made by the Maritime Safety Committee, [at its ninety-second session (... to ... June 2013)], and the Marine Environment Protection Committee, [at its sixty-fifth session (... to ... May 2013)],

1. ADOPTS the Recommendation on the use of national tonnage in applying international conventions, set out in the Annex to the present resolution;
2. AGREES that Governments which are Contracting Governments to the 1969 Tonnage Convention should use this Recommendation when applying the provisions of the 1969 Tonnage Convention and Interim Schemes for Tonnage Measurement;
3. REVOKES resolutions A.758(18) and A.791(19).

## RECOMMENDATION ON USE OF NATIONAL TONNAGE IN APPLYING INTERNATIONAL CONVENTIONS

1 In order to ensure consistency when using national tonnage to apply relevant requirements under international conventions, in accordance with article 3(2)(d) of the 1969 Tonnage Convention (TM69) and Interim Schemes for Tonnage Measurement, as set forth in the *Revised Interim Scheme for tonnage measurement for certain ships* (resolution A.494(XII) for SOLAS), and *Interim Scheme for tonnage measurement for certain ships for the purposes of the International Convention for the Prevention of Pollution from Ships, 1973, as modified by the Protocol of 1978 relating thereto* (resolution A.541(13)), Administrations are recommended to accept the following.

### National tonnage vs. convention tonnage

2 National tonnage refers to the tonnage measurement of a ship under the Administration's national tonnage rules that predated the adoption of the measurement rules of system of the 1969 Tonnage Convention. National gross tonnage is often expressed in terms of gross register tons (GRT). In contrast, the unitless gross tonnage measurement under the rules of the 1969 Tonnage Convention is expressed in terms of gross tonnage (GT).

### Eligibility to use national tonnage

3 The 1969 Tonnage Convention and the Interim Schemes for Tonnage Measurement provide for the use of national tonnage in applying relevant requirements under international conventions to certain ships with keel laid dates on or before 18 July 1994, at the ship owner's option<sup>1</sup>. Further, a ship which undergoes an alteration or modification which the Administration deems to be a substantial variation in its "existing" tonnage as described in article 3(2)(b) of the 1969 Tonnage Convention is treated as if the date on which the alterations or modifications commenced was the keel laid date for this purpose. The following table lists the basis for use of national tonnages as a function of a ship's keel laid/substantial alteration date and its national gross tonnage.

<b>Basis for Using National Tonnage to Apply International Conventions*</b>			
<b>Ship's Keel Laid Date / Substantial Alteration Date</b>	<b>Ship's National Gross Tonnage</b>		
	<b>GRT &lt; 400</b>	<b>400 ≤ GRT &lt; 1600</b>	<b>GRT ≥ 1600</b>
Before 18 July 1982	TM69 Art.3(2)(d)	TM69 Art.3(2)(d)	TM69 Art.3(2)(d)
18 July 1982 - 31 December 1985	A.494(XII) / A.541(13)	A.494(XII)	A.494(XII)
1 January 1986 - 18 July 1994	A.494(XII) / A.541(13)	A.494(XII)	Not Eligible
After 18 July 1994	Not Eligible	Not Eligible	Not Eligible

\* Unless otherwise provided for in an International Convention or other instrument.

### Relevant requirements under international conventions

<sup>1</sup> The Interim Schemes for Tonnage Measurement do not apply to ships covered by article 3(2)(d) of the 1969 Tonnage Convention, and may be applied to an eligible ship for the life of the ship under interpretations established at MSC 50 (MSC 50/27). A third Interim Scheme for Tonnage Measurement, resolution A.540(13) for STCW Convention, is no longer applicable as a result of the 1995 amendments to STCW Convention.

4 The term "relevant requirements under" in article 3(2)(d) of the 1969 Tonnage Convention and throughout this Recommendation refers to tonnage-based requirements for which a tonnage threshold was in effect on or before 18 July 1994, the date when the 1969 Tonnage Convention came fully into force. As such, national tonnage may not be used when applying newer tonnage thresholds in international conventions, unless otherwise provided in an international convention or other instrument. For example, for eligible ships, national tonnages may be used to apply the 500 gross tonnage cargo ship exemption threshold of regulation I/3 of SOLAS, which predates 18 July 1994. However, national tonnages may not similarly be used to apply the 500 gross tonnage threshold of SOLAS regulation XI-2/2.1.1.2, which came into effect after this date.<sup>2</sup>

#### **Remarks on International Tonnage Certificates (1969)**

5 Notwithstanding the provisions of resolutions A.494(XII) and A.541(13), which state that gross tonnage measured under the national tonnage rules shall not be shown on the International Tonnage Certificate (1969), an entry may be made under "Remarks" on the International Tonnage Certificate (1969), to reflect the ship owner's decision to use national tonnages, as follows:

- .1 For ships covered by article 3(2)(d) of the 1969 Tonnage Convention,  
  
"The ship is remeasured according to article 3(2)(d) of the 1969 Tonnage Convention. The GROSS TONNAGE according to the measurement system previously in force to the measurement system of the International Convention on Tonnage Measurement of Ships, 1969, is: . . . (*insert GRT tonnage*) . . . RT, according to the regulations of . . . (*insert country name*) . . ."
  
- .2 For ships covered by resolution A.494(XII) and/or resolution A.541(13),  
  
"The ship is additionally measured according to resolution(s) . . . (*insert A.494(XII) and/or A.541(13), as applicable*) . . . The GROSS TONNAGE according to the measurement system previously in force to the measurement system of the International Convention on Tonnage Measurement of Ships, 1969, is: . . . (*insert GRT tonnage*) . . . RT, according to the regulations of . . . (*insert country name*) . . ."

#### **Remarks on other international certificates (1969)**

6 For ships for which the International Tonnage Certificate (1969) includes a "Remarks" entry on national tonnage as described in paragraph 5 of this Recommendation, the appropriate box in the appropriate Ship Safety Certificate, the International Oil Pollution Prevention Certificate or other such official certificates issued by the Administration may show only that national gross tonnage with one of the following footnotes:

---

<sup>2</sup> Refer to the Interim Scheme for the compliance of certain cargo ships with the special measures to enhance maritime security (MSC/Circ.1157) for additional details. The Interim Scheme for the compliance of certain cargo ships and special purpose ships with the management for the safe operations of ships (MSC.1/Circ.1231) similarly addresses use of national tonnages in applying the SOLAS ISM Code.

"The above gross tonnage has been determined by the tonnage authorities of the Administration in accordance with the national tonnage rules which were in force prior to the coming into force of the International Convention on Tonnage Measurement of Ships, 1969"; or

"See REMARKS column of the valid International Tonnage Certificate (1969)".

#### **Removal of remarks**

7 Should a ship lose eligibility for using national tonnage to apply relevant requirements under international conventions by undergoing alterations or modifications which the Administration deems to be a substantial variation in its existing tonnage as described in article 3(2)(b) of the 1969 Tonnage Convention, the Administration should ensure associated certificates described in paragraphs 5 and 6 of this Recommendation are reissued or otherwise amended to delete reference to the ship's national tonnage.

---