

MARITIME SAFETY COMMITTEE
105th session
Agenda item 20

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**REPORT OF THE MARITIME SAFETY COMMITTEE
ON ITS 105TH SESSION**

Table of contents

Section	Page
1 INTRODUCTION – ADOPTION OF THE AGENDA	5
2 DECISIONS OF OTHER IMO BODIES	6
3 CONSIDERATION AND ADOPTION OF AMENDMENTS TO MANDATORY INSTRUMENTS	14
4 MEASURES TO IMPROVE DOMESTIC FERRY SAFETY	30
5 DEVELOPMENT OF FURTHER MEASURES TO ENHANCE THE SAFETY OF SHIPS RELATING TO THE USE OF FUEL OIL	31
6 GOAL-BASED NEW SHIP CONSTRUCTION STANDARDS	35
7 DEVELOPMENT OF A GOAL-BASED INSTRUMENT FOR MARITIME AUTONOMOUS SURFACE SHIPS (MASS)	38
8 MEASURES TO ENHANCE MARITIME SECURITY	44
9 PIRACY AND ARMED ROBBERY AGAINST SHIPS	44
10 UNSAFE MIXED MIGRATION BY SEA	44
11 FORMAL SAFETY ASSESSMENT	44
12 COST IMPLICATIONS FOR MSI AND SAR INFORMATION PROVIDERS CONCERNING THE RECOGNITION OF MULTIPLE GMDSS MOBILE SATELLITE SERVICES	45
13 IMPLEMENTATION OF IMO INSTRUMENTS (report of the seventh session of the Sub-Committee)	49
14 CARRIAGE OF CARGOES AND CONTAINERS (report of the seventh session of the Sub-Committee)	52

15	SHIP DESIGN AND CONSTRUCTION (report of the eighth session of the Sub-Committee)	54
16	HUMAN ELEMENT, TRAINING AND WATCHKEEPING (urgent matters emanating from the eighth session of the Sub-Committee)	59
17	APPLICATION OF THE COMMITTEE'S METHOD OF WORK	64
18	WORK PROGRAMME	64
19	ANY OTHER BUSINESS	73
20	CONSIDERATION OF THE REPORT OF THE COMMITTEE ON ITS 105TH SESSION	76

LIST OF ANNEXES

ANNEX 1	LIST OF INSTRUMENTS UNDER THE REMIT OF THE MARITIME SAFETY COMMITTEE FOR WHICH A CONSOLIDATED VERSION WOULD BE MOST BENEFICIAL	
ANNEX 2	RESOLUTION MSC.495(105) – ACTIONS TO FACILITATE THE URGENT EVACUATION OF SEAFARERS FROM THE WAR ZONE AREA IN AND AROUND THE BLACK SEA AND THE SEA OF AZOV AS A RESULT OF THE RUSSIAN FEDERATION AGGRESSION AGAINST UKRAINE	
ANNEX 3	RESOLUTION MSC.496(105) – AMENDMENTS TO THE INTERNATIONAL CONVENTION FOR THE SAFETY OF LIFE AT SEA, 1974	
ANNEX 4	RESOLUTION MSC.497(105) – AMENDMENTS TO THE PROTOCOL OF 1988 RELATING TO THE INTERNATIONAL CONVENTION FOR THE SAFETY OF LIFE AT SEA, 1974	
ANNEX 5	RESOLUTION MSC.498(105) – AMENDMENTS TO THE INTERNATIONAL CODE OF SAFETY FOR HIGH-SPEED CRAFT, 1994 (1994 HSC CODE)	
ANNEX 6	RESOLUTION MSC.499(105) – AMENDMENTS TO THE INTERNATIONAL CODE OF SAFETY FOR HIGH-SPEED CRAFT, 2000 (2000 HSC CODE)	
ANNEX 7	RESOLUTION MSC.500(105) – AMENDMENTS TO THE INTERNATIONAL MARITIME SOLID BULK CARGOES (IMSBC) CODE	
ANNEX 8	RESOLUTION MSC.501(105) – AMENDMENTS TO THE INTERNATIONAL MARITIME DANGEROUS GOODS (IMDG) CODE	
ANNEX 9	RESOLUTION MSC.502(105) – AMENDMENTS TO THE CODE OF SAFETY FOR SPECIAL PURPOSE SHIPS, 1983 (1983 SPS CODE)	
ANNEX 10	RESOLUTION MSC.503(105) – AMENDMENTS TO THE CODE OF SAFETY FOR SPECIAL PURPOSE SHIPS, 2008 (2008 SPS CODE)	
ANNEX 11	RESOLUTION MSC.504(105) – AMENDMENTS TO THE CODE FOR THE CONSTRUCTION AND EQUIPMENT OF MOBILE OFFSHORE DRILLING UNITS, 1979 (1979 MODU CODE)	

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- ANNEX 12 RESOLUTION MSC.505(105) – AMENDMENTS TO THE CODE FOR THE CONSTRUCTION AND EQUIPMENT OF MOBILE OFFSHORE DRILLING UNITS, 1989 (1989 MODU CODE)
- ANNEX 13 RESOLUTION MSC.506(105) – AMENDMENTS TO THE CODE FOR THE CONSTRUCTION AND EQUIPMENT OF MOBILE OFFSHORE DRILLING UNITS, 2009 (2009 MODU CODE)
- ANNEX 14 RESOLUTION MSC.507(105) – SYSTEM PERFORMANCE STANDARD FOR THE PROMULGATION AND COORDINATION OF MARITIME SAFETY INFORMATION USING HIGH-FREQUENCY NARROW-BAND DIRECT-PRINTING
- ANNEX 15 RESOLUTION MSC.508(105) – PERFORMANCE STANDARDS FOR THE RECEPTION OF MARITIME SAFETY INFORMATION AND SEARCH AND RESCUE RELATED INFORMATION BY MF (NAVTEX) AND HF
- ANNEX 16 RESOLUTION MSC.509(105) – PROVISION OF RADIO SERVICES FOR THE GLOBAL MARITIME DISTRESS AND SAFETY SYSTEM (GMDSS)
- ANNEX 17 RESOLUTION MSC.510(105) – PERFORMANCE STANDARDS FOR SEARCH AND RESCUE RADAR TRANSPONDERS
- ANNEX 18 RESOLUTION MSC.511(105) – PERFORMANCE STANDARDS FOR SHIPBORNE VHF RADIO INSTALLATIONS CAPABLE OF VOICE COMMUNICATION AND DIGITAL SELECTIVE CALLING
- ANNEX 19 RESOLUTION MSC.512(105) – PERFORMANCE STANDARDS FOR SHIPBORNE MF AND MF/HF RADIO INSTALLATIONS CAPABLE OF VOICE COMMUNICATION, DIGITAL SELECTIVE CALLING AND RECEPTION OF MARITIME SAFETY INFORMATION AND SEARCH AND RESCUE RELATED INFORMATION
- ANNEX 20 RESOLUTION MSC.513(105) – PERFORMANCE STANDARDS FOR INMARSAT-C SHIP EARTH STATIONS CAPABLE OF TRANSMITTING AND RECEIVING DIRECT-PRINTING COMMUNICATIONS
- ANNEX 21 RESOLUTION MSC.514(105) – GUIDELINES FOR THE AVOIDANCE OF FALSE DISTRESS ALERTS
- ANNEX 22 RESOLUTION MSC.515(105) – PERFORMANCE STANDARDS FOR SURVIVAL CRAFT PORTABLE TWO-WAY VHF RADIOTELEPHONE APPARATUS
- ANNEX 23 RESOLUTION MSC.516(105) – AMENDMENTS TO THE PERFORMANCE STANDARDS FOR RADIOCOMMUNICATION EQUIPMENT (RESOLUTION MSC.80(70))
- ANNEX 24 RESOLUTION MSC.517(105) – PERFORMANCE STANDARDS FOR A SHIPBORNE INTEGRATED COMMUNICATION SYSTEM (ICS) WHEN USED IN THE GLOBAL MARITIME DISTRESS AND SAFETY SYSTEM (GMDSS)

ANNEX 25	DRAFT AMENDMENTS TO THE PROTOCOL OF 1978 RELATING TO THE INTERNATIONAL CONVENTION FOR THE SAFETY OF LIFE AT SEA, 1974
ANNEX 26	RESOLUTION MSC.518(105) – MODEL REGULATIONS ON DOMESTIC FERRY SAFETY
ANNEX 27	DRAFT AMENDMENTS TO SOLAS CHAPTER II-2 IN RELATION TO FLASHPOINT
ANNEX 28	ROAD MAP FOR DEVELOPING A GOAL-BASED INSTRUMENT FOR MARITIME AUTONOMOUS SURFACE SHIPS (MASS)
ANNEX 29	LIST OF CERTIFICATES AND DOCUMENTS REQUIRED TO BE CARRIED ON BOARD SHIPS, 2022
ANNEX 30	DRAFT AMENDMENTS TO THE IGC CODE
ANNEX 31	DRAFT AMENDMENTS TO THE IGF CODE
ANNEX 32	DRAFT AMENDMENTS TO THE INTERNATIONAL CONVENTION FOR THE SAFETY OF LIFE AT SEA, 1974 (NEW SOLAS CHAPTER XV TO MAKE THE IP CODE MANDATORY)
ANNEX 33	DRAFT INTERNATIONAL CODE OF SAFETY FOR SHIPS CARRYING INDUSTRIAL PERSONNEL (IP CODE)
ANNEX 34	DRAFT AMENDMENTS TO THE 2011 ESP CODE
ANNEX 35	RESOLUTION MSC.188(79)/REV.1 – REVISED PERFORMANCE STANDARDS FOR WATER LEVEL DETECTORS ON SHIPS SUBJECT TO SOLAS REGULATIONS II-1/25, II-1/25-1 AND XII/12
ANNEX 36	DRAFT REVISED MSC-MEPC.1 CIRCULAR ON THE ORGANIZATION AND METHOD OF WORK OF THE MARITIME SAFETY COMMITTEE AND THE MARINE ENVIRONMENT PROTECTION COMMITTEE AND THEIR SUBSIDIARY BODIES
ANNEX 37	RESOLUTION CONCERNING THE ESTABLISHMENT OF A JOINT ILO/IMO TRIPARTITE WORKING GROUP TO IDENTIFY AND ADDRESS SEAFARERS' ISSUES AND THE HUMAN ELEMENT
ANNEX 38	BIENNIAL STATUS REPORT OF THE MARITIME SAFETY COMMITTEE
ANNEX 39	POST-BIENNIAL AGENDA OF THE MARITIME SAFETY COMMITTEE
ANNEX 40	BIENNIAL STATUS REPORTS OF THE SUB-COMMITTEES
ANNEX 41	PROVISIONAL AGENDAS FOR THE FORTHCOMING SESSIONS OF THE SUB-COMMITTEES
ANNEX 42	SUBSTANTIVE ITEMS FOR INCLUSION IN THE AGENDAS FOR MSC 106 AND MSC 107
ANNEX 43	STATEMENTS BY DELEGATIONS AND OBSERVERS

1 INTRODUCTION – ADOPTION OF THE AGENDA

1.1 The 105th session of the Maritime Safety Committee was held remotely from 20 to 29 April 2022, chaired by Mrs. Mayte Medina (United States). The Vice-Chair of the Committee, Mr. Theofilos Mozas (Greece), was also present.

1.2 The session was attended by Members and Associate Members; representatives from the United Nations and specialized agencies; observers from intergovernmental organizations with agreements of cooperation; and observers from non-governmental organizations in consultative status, as listed in document MSC 105/INF.1.

Opening address of the Secretary-General

1.3 The Secretary-General welcomed participants and delivered his opening address, the full text of which can be downloaded from the IMO website at the following link: <https://www.imo.org/en/MediaCentre/SecretaryGeneral/Pages/Secretary-GeneralsSpeechesToMeetings.aspx>

Measures taken to facilitate remote sessions

1.4 The Committee recalled that at the joint extraordinary session of all IMO Committees (ALCOM/ES), held in September 2020, the Committees had jointly approved the *Interim guidance to facilitate remote sessions of the Committees during the COVID-19 pandemic* (MSC-LEG-MEPC-TCC-FAL.1/Circ.1), and had agreed, in particular, to:

- .1 waive rule 3 of their respective rules of procedure, in part, to allow sessions to be held remotely;
- .2 accept, for the purpose of facilitating remote sessions, electronically submitted credentials, with originals to follow; and
- .3 to consider Members that had submitted valid credentials, were registered at OMRS and were listed as participants in the remote session, as "present" within rule 28(1) of its rules of procedure.

Adoption of the agenda and related matters

1.5 The Committee adopted the agenda (MSC 105/1) and agreed to be guided in its work, in general, by the annotations contained in document MSC 105/1/1 and by the provisional timetable (MSC 105/1/1, annex, as amended).

1.6 In this regard, the Committee noted that the Chair, having consulted with the Secretariat, had exceptionally accepted two late submissions, i.e. MSC 105/2/5 (Brazil et al.) and MSC 105/18/3 (Ukraine), in accordance with paragraph 6.14 of the Committees' Guidelines (MSC-MEPC.1/Circ.5/Rev.2) concerning exemptions from the provisions of the Guidelines. The Chair advised the Committee that, by taking this decision, she took into account the request of C/ES.35 for the Committees to consider ways to enhance the efforts of Member States and observer organizations in supporting seafarers and commercial ships affected by the ongoing military conflict between Ukraine and the Russian Federation.

Credentials

1.7 The Committee noted that the credentials of 110 delegations attending the session were in due and proper form.

Consideration of selected agenda items by correspondence

1.8 The Committee considered the Chair's proposals concerning the consideration of agenda items 6 (Goal-based new ship construction standards) and 19 (Any other business) in total or in part by correspondence, as set out in document MSC 105/1/2, together with the comments received on those proposals, as well as any resulting modifications to the proposed actions, as set out in document MSC 105/1/2/Add.1. In this regard, the Committee noted that the intention of considering the aforementioned selected agenda items by correspondence was to address the backlog that had been accumulating over the last two sessions and that the proposed actions only concerned documents submitted to MSC 102, MSC 103 and MSC 104 that the Committee, owing to lack of time, had not been able to consider; and that any submissions made under those agenda items to this session would be considered separately, under the relevant agenda items.

1.9 The Committee approved the proposed actions, as might have been modified following comments submitted, as set out in annex 2 to document MSC 105/1/2/Add.1, and noted that the actions just approved had been reflected in this report under the appropriate agenda items (see sections 2, 6 and 19).

2 DECISIONS OF OTHER IMO BODIES

Outcome of TC 71, C/ES.34, MEPC 77 and C 126

2.1 The Committee, having noted the decisions of TC 71, C/ES.34, MEPC 77 and C 126 relevant to its work, as set out in document MSC 105/2 (Secretariat), agreed to take them into account under the relevant agenda items.

Certified true copies of consolidated texts of IMO instruments

2.2 The Committee recalled that MSC 104, following a request by C 125, had requested the Secretariat, in consultation with the Chair, to prepare, for consideration at this session, a priority list of conventions under the remit of the Committee for which a consolidated version would be most beneficial.

2.3 Having considered document MSC 105/2/1 (Chair and Secretariat), and having agreed that the preparation of a consolidated version of the SAR Convention should also be given priority, the Committee approved the List of instruments under the remit of the Maritime Safety Committee for which a consolidated version would be most beneficial, as set out in annex 1, for submission to the Council.

Outcome of A 32

IACS submissions on safety and the decarbonization goal

2.4 The Committee, having noted the outcome of A 32 (MSC 105/2), agreed to consider documents A 32/12/2 and MSC 105/2/2 (IACS), on the role of MSC in addressing the multidimensional challenge posed by the decarbonization aim, under agenda item 14 (Carriage of cargoes and containers), taking into account the close relation between the proposals in the two documents and the work of the CCC Sub-Committee on the development of amendments to the IGF Code and safety guidance for low-flashpoint fuels (see paragraphs 14.9 to 14.11).

Consideration of consolidated audit summary reports

2.5 The Committee noted that A 32 had requested MSC and MEPC to consider the consolidated audit summary reports (CASRs) containing lessons learned from seven mandatory audits completed in 2019 and 2020 (Circular Letter No.4442) and, in due course, to advise the Council of the outcome of their consideration. The Committee agreed to follow previous practice and, subject to a concurrent decision by MEPC 78, instructed the III Sub-Committee to consider the CASRs of the audits completed in 2019 and 2020 and report to the Committees the outcome of their considerations.

Urgent matters emanating from C/ES.35 and LEG 109

2.6 The Committee, having noted the decisions of C/ES.35 and LEG 109 (MSC 105/2/3 and MSC 105/2/4), agreed to take them into account under the relevant agenda items, as appropriate, except for the following two issues which did not fall under any existing agenda items:

- .1 unlawful practices associated with fraudulent registration and registries of ships; and
- .2 ongoing military conflict between the Russian Federation and Ukraine and its effect on international shipping and seafarers.

Unlawful practices associated with fraudulent registration and registries of ships

2.7 The Committee noted that LEG 109 had invited MSC 105 to consider whether to investigate how ships without proper registration were able to obtain Maritime Mobile Service Identity (MMSI) numbers, in particular to manipulate AIS data transmissions. Taking into account the technical nature of the issue, the Committee agreed to refer the matter to the NCSR Sub-Committee for consideration and advice, as appropriate, and invited Member States and international organizations to submit relevant comments and proposals to the Sub-Committee.

Ongoing military conflict between the Russian Federation and Ukraine and its effect on international shipping and seafarers

2.8 The Committee had the following documents for its consideration:

- .1 documents MSC 104/17/3 and MSC 105/19/4 (Ukraine) and MSC 104/17/10 and MSC 105/19/11 (Russian Federation) concerning the safety and security of navigation in the northern part of the Black Sea, the Sea of Azov and the Kerch Strait;
- .2 relevant outcome of C/ES.35 (MSC 105/2/3);
- .3 relevant outcome of LEG 109 (MSC 105/2/4); and
- .4 document MSC 105/18/3 (Ukraine), inviting the Council and the Committee to take urgent action to address the ongoing armed conflict and its effects on shipping; and document MSC 105/2/5 (Brazil et al.), requesting urgent action regarding the evacuation of seafarers and ships from Ukrainian ports and additional ways to enhance the efforts to establish maritime safe corridors.

2.9 The Committee recalled that the Chair had allowed two late submissions, by Brazil et al. (MSC 105/2/5) and Ukraine (MSC 105/18/3), as exceptional cases, in accordance with paragraph 6.14 of the Committees' Guidelines, and the Committee had agreed, under agenda item 1 (see paragraph 1.6), to consider them.

2.10 The Committee recalled that proposed actions on matters postponed for consideration at MSC 104 had been arranged by correspondence (MSC 105/1/2 and Add.1) and had been approved under agenda item 1 (see paragraph 1.9), where it had noted the information provided in documents MSC 104/17/3 (Ukraine) and MSC 104/17/10 (Russian Federation) concerning safety and security of navigation in the northern part of the Black Sea, the Sea of Azov and the Kerch Strait.

2.11 In this regard, the Committee also noted the information provided in documents MSC 105/19/4 (Ukraine) and MSC 105/19/11 (Russian Federation) concerning safety and security of navigation in the northern part of the Black Sea, the Sea of Azov and the Kerch Strait.

2.12 The Committee, in considering the outcome of C/ES.35 (MSC 105/2/3 from the Secretariat), noted that the Council, having considered the impacts of the ongoing military conflict between Ukraine and the Russian Federation on shipping and seafarers, had:

- .1 requested IMO committees to consider ways to enhance the efforts of Member States and observer organizations in supporting affected seafarers and commercial vessels and consider the implications of this situation for the implementation of the Organization's instruments, to take appropriate action and report back to Council;
- .2 agreed to encourage the establishment, as a provisional and urgent measure, of a blue safe maritime corridor to allow the safe evacuation of seafarers and ships from the high-risk and affected areas in the Black Sea and the Sea of Azov to a safe place in order to protect the life of seafarers, and ensure the mobilization and commercial navigation of vessels intending to use this corridor by avoiding military attacks and protecting and securing the maritime domain; and
- .3 invited the Secretary-General to collaborate with the relevant parties and take necessary immediate actions to initiate the establishment and support the implementation of a blue safe maritime corridor in the Black Sea and the Sea of Azov and keep Member States informed of developments and to report to a future session of the Council.

2.13 In this regard, the Committee noted information provided by the Secretary-General on action taken following C/ES.35, in particular that he had written to the Ministers of Foreign Affairs of the Russian Federation and Ukraine, and to the littoral States, to share ideas on the establishment of a blue safe maritime corridor and that the Russian Federation had informed the Organization about the establishment of a humanitarian corridor to provide for the safe evacuation of ships once outside the territorial waters of Ukraine. He advised that Ukraine had also provided their preconditions for the safe evacuation of ships from their ports, including an end to hostilities, the withdrawal of troops and ensuring the freedom of navigation in the Black Sea and the Sea of Azov, and carrying out minesweeping activities with the involvement of Black Sea littoral States. He reiterated that his priority had been to support seafarers stranded in Ukraine.

2.14 The Committee also noted information by the Special Advisor to the Secretary-General on Maritime Security, providing an update on the situation and the actions IMO had been taking to support ships and seafarers affected by the conflict.

2.15 In considering the outcome of LEG 109 in the matter, as set out in document MSC 105/2/4 (Secretariat), the Committee noted that LEG 109, having considered the impacts on shipping and seafarers of the ongoing military conflict between the Russian Federation and Ukraine, had:

- .1 included a new sub-item on the "Impact on shipping and seafarers of the situation in the Black Sea and the Sea of Azov" in the agenda of the Legal Committee under its existing agenda item on "Advice and guidance in connection with the implementation of IMO instruments"; and
- .2 approved the *Guidance on the impact of the situation in the Black Sea and the Sea of Azov on insurance or other financial security certificates (LEG.1/Circ.12)*, providing guidance on the implementation of IMO's liability and compensation conventions and, in particular, on insurance certificates issued pursuant to these conventions.

2.16 The Committee considered document MSC 105/18/3 (Ukraine), suggesting a number of actions to be taken by the Council and the Committee to address the impacts of the armed conflict on shipping, and document MSC 105/2/5 (Brazil et al.), requesting a number of urgent actions to address the safety and security of ships and seafarers caught up in the armed conflict.

2.17 The Committee having recalled the earlier statements by the Secretary-General and his Special Advisor (see paragraphs 2.13 and 2.14), informing the Committee of the action taken to address the situation, noted, inter alia, the following general views:

- .1 the aggression by the Russian Federation against Ukraine, which threatened its territorial integrity and the lives of its people, was condemned;
- .2 the ongoing military conflict was a breach of international law and the UN Charter;
- .3 the Russian Federation had failed to uphold its responsibilities as a full-time member of the UN Security Council;
- .4 the Russian Federation should cease its military action and withdraw immediately from Ukraine;
- .5 the impacts of the conflict on regional and international shipping must be considered;
- .6 the safety and security of shipping, seafarers, the marine environment and global supply chains were threatened by the ongoing conflict;
- .7 the harassment of innocent seafarers must be stopped, and proper consideration given to the physical and mental well-being of seafarers;
- .8 Ukrainian seafarers were being subjected to discrimination and poor conditions as a result of their nationality;

- .9 the thirty-fifth extraordinary session of the Council had requested relevant IMO Committees to consider the implications of the ongoing conflict for the implementation of IMO instruments;
- .10 an MSC resolution was needed to condemn the aggression by the Russian Federation against Ukraine and to consider the impact on shipping, seafarers, the marine environment and global supply chains;
- .11 the Committee must not go beyond its mandate, and must focus on the safety and security of shipping and seafarers with the cooperation of all relevant parties;
- .12 the thirty-fifth extraordinary session of the Council had already reached decisions relating to the ongoing conflict and the work of IMO and there was no need for a resolution by the Committee;
- .13 Russian Federation flagged ships were being denied access to certain ports and Russian seafarers were being dismissed from certain employment;
- .14 a blue safe corridor had been established, but could not be used owing to the inability of commercial shipping to leave Ukrainian ports;
- .15 there was a need to ensure that any information concerning the ongoing conflict distributed was factual and supported by evidence;
- .16 concerns relating to the impact of the ongoing military conflict on trade and food security were expressed; and
- .17 there was a need to ensure factual information was provided with respect to the status of ships and seafarers in the conflict area.

2.18 The full text of statements made by the delegations of Australia, Canada, the Democratic People's Republic of Korea, Dominica, France (supported by Belgium, Croatia, Cyprus, Denmark, Estonia, Finland, Germany, Greece, Ireland, Italy, Japan, Luxembourg, Malta, Poland, Portugal, Slovenia, Spain, Sweden and EC), Georgia, Iceland, New Zealand, Norway, the Republic of Korea, the Russian Federation, Turkey, Ukraine, the United Kingdom, the United States and Vanuatu is set out in annex 43.

2.19 Regarding the proposals in documents MSC 105/18/3 (Ukraine) and MSC 105/2/5 (Brazil et al.), the Committee noted, inter alia, the following views:

- .1 the proposals in document MSC 105/2/5 were supported and an MSC resolution should be developed to address the impacts of the ongoing conflict on shipping and seafarers;
- .2 the establishment of safe maritime corridors and efforts to support the safe evacuation of merchant ships and their crew from the affected area needed to be pursued as a priority and with urgency, as this was a humanitarian effort;
- .3 the proposals in document MSC 105/18/3 were supported and should be submitted to the Council for thorough consideration; however, any amendments to the III Code and the IMO Member State Audit Scheme (IMSAS) needed to be considered very carefully;

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- .4 IMSAS and the III Code were developed as a balanced and fragile package; and any revision of both instruments should be very carefully considered and preserve the fundamental principles and scope of IMSAS to ensure fairness and participation of all Member States and should stay well within the mandate of IMO;
 - .5 the Secretary-General and the Secretariat were thanked for the action taken, in cooperation with other UN agencies and industry organizations, to ensure the safety of shipping and seafarers in the ongoing conflict;
 - .6 the Secretary-General should continue to seek assistance from other international organizations;
 - .7 the earlier proposal to develop an MSC resolution condemning the aggression by the Russian Federation against Ukraine and considering the impact on shipping, seafarers, the marine environment and global supply chains was supported, including the establishment of a drafting group to finalize such a resolution; and
 - .8 in all actions to be taken, the mandate of the Committee needed to be respected.

2.20 Following the discussion, the Committee:

- .1 urged the Secretary-General and the Secretariat to continue their efforts regarding the establishment of safe maritime corridors and the safe evacuation of seafarers from the affected area as a priority;
- .2 established a drafting group and instructed it, taking into account the outcome of C/ES.35 and comments and decisions made in plenary, in particular regarding documents MSC 105/18/3 and MSC 105/2/5, to draft an MSC resolution for consideration by the Committee, taking into account the impacts of the ongoing military conflict in Ukraine on the safety and security of shipping, the physical and mental well-being of seafarers, the marine environment and global supply chains; and
- .3 invited the Council to:
 - .1 consider the issues raised in paragraph 14 of document MSC 105/18/3, in particular the consideration and analysis of reports on States' armed interference in maritime shipping, including ships, ports and shipping security systems, and the development of guidance relating to the prevention of such interference; and
 - .2 consider the need for including any procedural matters in the conduct of audits under IMSAS, in relation to the proposal for auditors to take into account information provided by other coastal States relating to the adjacent marine areas, in the context of the revision of the *Framework and Procedures for the IMO Member State Audit Scheme* (resolution A.1067(28)), possibly through establishing the Joint Working Group on the Member State Audit Scheme (JWGMSA).

2.21 Having received the report of the Drafting Group (MSC 105/WP.12), the Committee had a lengthy discussion, with the overwhelming majority of the delegations that spoke supporting the adoption of the resolution as drafted. However, a small number of Member States expressed the following concerns:

- .1 the draft resolution, including the title, contained a number of terms which went beyond the authority of the Organization and the terminology used in UN General Assembly resolutions, e.g. "war zone", "invasion", "zone of hostilities";
- .2 the draft resolution contained incorrect factual statements, e.g. illegal seizure of SAR ship, shelling of ships;
- .3 the reference to a naval blockade was inaccurate because a number of commercial ships had safely been evacuated from the Sea of Azov because of the Russian Federation naval forces;
- .4 the draft resolution should be based on the following points: content should respect the facts; all parties involved should cooperate to ensure the implementation of relevant measures; and the resolution should stay within the remit of the Organization;
- .5 the reference to the global supply chain was not appropriate owing to the unilateral sanctions imposed upon the Russian Federation;
- .6 operative paragraphs went beyond the remit of the Drafting Group, the Committee and the Organization, as the objective of the resolution was to ensure the safe and secure evacuation of seafarers and ships, not what was being called for under operative paragraph 5 of the draft;
- .7 the draft resolution did not mention the blue safe corridor which had already been established by the Russian Federation in the Black Sea;
- .8 the draft resolution included inaccurate information on the illegal seizure of civilian ships, including SAR ships, as these ships had been safely returned;
- .9 they could not see the purpose of the draft resolution as currently drafted since the purpose of the resolution was to facilitate the urgent evacuation of seafarers and its main text did not support this; and
- .10 operative paragraph 5 went beyond the remit of the Committee and the mandate of the Organization; such call should be to all countries involved.

2.22 Following the discussion, the Committee agreed that the Chair, in consultation with the Secretariat, should review the text of the draft resolution (MSC 105/WP.12), with a view to checking the consistency of the terminology used against the decisions of C/ES.35 (C/ES.35/D) and the UN General Assembly Resolutions (A/RES/ES-11/1, A/ES-11/L.2 and A/RES/ES-11/2) and providing editorial amendments only; and the verification of factual statements within the draft should not be addressed.

2.23 A revised draft resolution, set out in document MSC 105/WP.12/Rev.1, was subsequently presented to the Committee, including only minor editorial changes. In the discussion that followed, a small number of Member States reiterated their previous concerns that:

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- .1 the purpose of the resolution was to facilitate the urgent evacuation of seafarers and the main text of the draft resolution did not support this;
 - .2 the draft resolution did not examine the issue of the blue safe corridor which had already been established by the Russian Federation, and this needed to be considered as requested by C/ES.35;
 - .3 the draft resolution contained inaccurate facts and went beyond the mandate of the Organization;
 - .4 it was not clear whether the Secretariat believed that the wording relating to the UNCTAD report was consistent with the actual wording of the report; similarly the language of the UN General Assembly resolutions should be checked;
 - .5 in operative paragraph 2, the term "zone of hostilities" was still being used and needed amending;
 - .6 in operative paragraph 5, the term "war zones" was still being used and needed amending; and
 - .7 there was a significant problem with operative paragraph 5 which, as currently drafted, implied that the evacuation of commercial ships and seafarers required a ceasefire and withdrawal of Russian Federation forces from the region, which contradicted the fact that such evacuations had already taken place and could imply that no attempts at such evacuations should take place until a ceasefire and the withdrawal of the Russian Federation forces had been effected.

2.24 The delegation of the Russian Federation specifically requested that the following views be reflected in the report:

- .1 the draft resolution contained a number of terms which went beyond the UN General Assembly resolutions, e.g. "war zone", "zone of hostilities";
- .2 the draft resolution contained incorrect factual statements, e.g. shelling of ships;
- .3 the reference to a naval blockade was inaccurate because a number of commercial ships had safely been evacuated from the Sea of Azov by the Russian Federation;
- .4 the reference to the global supply chain was not appropriate owing to the unilateral sanctions imposed upon the Russian Federation;
- .5 operative paragraphs went beyond the remit of the Drafting Group; this was about the safe and secure evacuation of seafarers and ships, not what was called for under operative paragraph 5; and
- .6 they could not see the purpose of the resolution as currently drafted.

2.25 As the overwhelming majority of members continued to support the revised draft resolution, the Committee approved the revised report of the Drafting Group (MSC 105/WP.12/Rev.1) in general and adopted resolution MSC.495(105) on *Actions to*

facilitate the urgent evacuation of seafarers from the war zone area in and around the Black Sea and the Sea of Azov as a result of the Russian Federation aggression against Ukraine, as set out in annex 2.

3 CONSIDERATION AND ADOPTION OF AMENDMENTS TO MANDATORY INSTRUMENTS

GENERAL

3.1 Contracting Governments to the 1974 SOLAS Convention were invited to consider and adopt proposed amendments to:

- .1 chapters II-1, III, IV and V of, and the appendix (Certificates) of the annex to the 1974 SOLAS Convention, in accordance with the provisions of article VIII of the Convention;
- .2 the International Code of Safety for High-Speed Craft, 1994 (1994 HSC Code), in accordance with the provisions of article VIII and regulation X/1.1 of the Convention;
- .3 the International Code of Safety for High-Speed Craft, 2000 (2000 HSC Code), in accordance with the provisions of article VIII and regulation X/1.2 of the Convention;
- .4 the International Maritime Solid Bulk Cargoes (IMSBC) Code, in accordance with the provisions of article VIII and regulation VI/1-1.1 of the Convention; and
- .5 the International Maritime Dangerous Goods (IMDG) Code, in accordance with the provisions of article VIII and regulation VII/1.1 of the Convention.

3.2 More than one third of the Contracting Governments to the 1974 SOLAS Convention were present during the consideration and adoption of the said amendments by the expanded Maritime Safety Committee, in accordance with articles VIII(b)(iii) and VIII(b)(iv) of the Convention. The proposed amendments to the Convention and the Codes mandatory under it had been circulated, in accordance with SOLAS article VIII(b)(i), to all IMO Members and Contracting Governments to the Convention by Circular Letters No.4452 and No.4453 of 8 October 2021 and No.4459 of 18 October 2021.

3.3 Parties to the 1988 SOLAS Protocol were invited to participate in the consideration and adoption of proposed amendments to the appendix to the annex to the Protocol. Parties constituting more than one third of the total of Parties to the Protocol were present during the consideration and adoption of the said amendments by the expanded Maritime Safety Committee, in accordance with the provisions of articles VIII(b)(iii) and VIII(b)(iv) of the 1974 SOLAS Convention and article VI of the 1988 SOLAS Protocol. The proposed amendments to the 1988 SOLAS Protocol were circulated in accordance with SOLAS article VIII(b)(i) and article VI(c) of the 1988 SOLAS Protocol to all IMO Members and Parties to the 1988 SOLAS Protocol by Circular Letter No.4459 of 18 October 2021.

3.4 In connection with the adoption of the aforementioned amendments, the Committee was also invited to consider and adopt/approve, as appropriate:

- .1 draft MSC resolutions on:

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- .1 amendments to the Code of Safety for Special Purpose Ships, 1983 (1983 SPS Code);
 - .2 amendments to the Code of Safety for Special Purpose Ships, 2008 (2008 SPS Code);
 - .3 amendments to the Code for the Construction and Equipment of Mobile Offshore Drilling Units (1979 MODU Code);
 - .4 amendments to the Code for the Construction and Equipment of Mobile Offshore Drilling Units, 1989 (1989 MODU Code);
 - .5 amendments to the Code for the Construction and Equipment of Mobile Offshore Drilling Units, 2009 (2009 MODU Code);
 - .6 System performance standard for the promulgation and coordination of maritime safety information using high-frequency narrow-band direct-printing;
 - .7 Performance standards for the reception of maritime safety information and search and rescue related information by MF (NAVTEX) and HF;
 - .8 Provision of radio services for the Global Maritime Distress and Safety System (GMDSS);
 - .9 Performance standards for search and rescue radar transponders;
 - .10 Performance standards for shipborne VHF radio installations capable of voice communication and digital selective calling;
 - .11 Performance standards for shipborne MF and MF/HF radio installations capable of voice communication, digital selective calling and reception of maritime safety information and search and rescue related information;
 - .12 Performance standards for Inmarsat-C ship earth stations capable of transmitting and receiving direct-printing communications;
 - .13 Guidelines for the avoidance of false distress alerts;
 - .14 Performance standards for survival craft portable two-way VHF radiotelephone apparatus;
 - .15 amendments to the *Performance standards for radiocommunication equipment* (resolution MSC.80(70)); and
 - .16 Performance standards for a shipborne integrated communication system (ICS) when used in the Global Maritime Distress and Safety System (GMDSS); and

- .2 draft MSC circulars on:
- .1 Participation of non-SOLAS ships in the Global Maritime Distress and Safety System (GMDSS) and guidance on the development of training materials for GMDSS operators on non-SOLAS ships, to be disseminated as MSC.1/Circ.803/Rev.1;
 - .2 Guidance for the reception of maritime safety information and search and rescue related information as required in the Global Maritime Distress and Safety System (GMDSS);
 - .3 Revised interim guidance for conducting the refined MHB (CR) test, to be disseminated as MSC.1/Circ.1600/Rev.1;
 - .4 Lists of solid bulk cargoes for which a fixed gas fire-extinguishing system may be exempted or for which a fixed gas fire-extinguishing system is ineffective, to be disseminated as MSC.1/Circ.1395/Rev.5;
 - .5 amendments to the *Revised emergency response procedures for ships carrying dangerous goods (EmS Guide)*, to be disseminated as MSC.1/Circ.1588/Rev.2; and
 - .6 Revised recommendations on the safe use of pesticides in ships applicable to the fumigation of cargo transport units, to be disseminated as MSC.1/Circ.1361/Rev.1.

PROPOSED AMENDMENTS TO THE 1974 SOLAS CONVENTION

3.5 The Committee recalled that MSC 104 had approved draft amendments to chapters II-1, III, IV and V of, and the appendix (Certificates) of the annex to, the 1974 SOLAS Convention, concerning the modernization of the Global Maritime Distress and Safety System (GMDSS), with a view to adoption at this session (MSC 104/18, paragraph 12.6).

3.6 In this regard, the Committee considered document MSC 105/3/5 (Liberia et al.), commenting on the aforementioned draft amendments and, at the same time, seeking clarification concerning the date by which the ship certificates should be reissued as a result of the amendments to be adopted at this session.

3.7 Having agreed to the modifications proposed in document MSC 105/3/5, the Committee confirmed the proposed amendments to chapters II-1, III, IV and V of, and the appendix (Certificates) of the annex to, the 1974 SOLAS Convention, as modified, as set out in annex 1 to document MSC 105/WP.5, subject to editorial improvements, if any.

Date of entry into force of the proposed amendments

3.8 The Committee agreed that the aforementioned draft amendments proposed for adoption at this session should be deemed to have been accepted on 1 July 2023 and enter into force on 1 January 2024, in accordance with the *Guidance on entry into force of amendments to the 1974 SOLAS Convention and related mandatory instruments* (MSC.1/Circ.1481).

Consequential revocation of resolution MSC.456(101)

3.9 The Committee noted that the forms of certificates and the related records of equipment in annex 1 of document MSC 105/WP.5 were reproduced as consolidated versions, incorporating also the amendments adopted by resolution MSC.456(101) on *Amendments to the International Convention for the Safety of Life at Sea (SOLAS), 1974, as amended*, which were expected to enter into force on 1 January 2024, together with the current amendments under discussion.

3.10 Taking into account the guidance provided in paragraph 3.3.1.1 of the *Guidance on drafting of amendments to the 1974 SOLAS Convention and related mandatory instruments* (MSC.1/Circ.1500/Rev.1), the Committee agreed to the revocation of resolution MSC.456(101) upon adoption of the draft amendments to the 1974 SOLAS Convention under consideration at this session.

Re-issue of ship certificates as a result of amendments to the 1974 SOLAS Convention

3.11 The Committee considered the proposals in document MSC 105/3/5 concerning the need for re-issuance of the relevant certificates after entry into force of the draft amendments to the 1974 SOLAS Convention and other instruments to be adopted at this session, taking into account the provisions in paragraph 3.1 of the *Guidance on the timing of replacement of existing certificates by the certificates issued after the entry into force of amendments to certificates in IMO instruments* (MSC-MEPC.5/Circ.6).

3.12 After consideration, the Committee agreed that, in accordance with the Guidance provided in MSC-MEPC.5/Circ.6, re-issuance of the relevant certificates and their supplements, if any, after entry into force of the amendments to be adopted at this session, would not be necessary until their expiry.

PROPOSED AMENDMENTS TO THE 1988 SOLAS PROTOCOL

3.13 The Committee recalled that MSC 104 had approved draft amendments to the appendix to the annex to the 1988 SOLAS Protocol, concerning the modernization of the GMDSS, with a view to adoption at this session (MSC 104/18, paragraph 12.6).

3.14 In this regard, the Committee considered the modifications suggested in document MSC 105/3/5, as also set out in annex 2 to document MSC 105/WP.5, and agreed to incorporate them in the draft amendments to be adopted.

3.15 Subsequently, the Committee confirmed the contents of the proposed amendments to the appendix to the annex to the 1988 SOLAS Protocol, as modified, as set out in annex 2 to document MSC 105/WP.5, subject to editorial improvements, if any.

Date of entry into force of the proposed amendments

3.16 The Committee agreed that the aforementioned draft amendments proposed for adoption at this session should be deemed to have been accepted on 1 July 2023 and enter into force on 1 January 2024, in accordance with the Guidance (MSC.1/Circ.1481).

PROPOSED AMENDMENTS TO THE 1994 AND 2000 HSC, IMSBC AND IMDG CODES, MANDATORY UNDER THE 1974 SOLAS CONVENTION (EXPANDED COMMITTEE UNDER SOLAS ARTICLE VIII)**Draft amendments to the 1994 and 2000 HSC Codes**

3.17 The Committee recalled that MSC 104 had approved draft amendments to chapters 8 (Life-saving appliances and arrangements) and 14 (Radiocommunications), as well as the Record of Equipment for High-Speed Craft Safety Certificate, of the International Code of Safety for High-Speed Craft (1994 and 2000 HSC Codes), concerning the modernization of the GMDSS, with a view to adoption at this session (MSC 104/18, paragraph 12.6).

3.18 Having noted that no comments on the draft amendments had been submitted, the Committee confirmed their contents, as set out in annexes 3 and 4 to document MSC 105/WP.5, respectively, subject to editorial improvements, if any.

Date of entry into force of the proposed amendments

3.19 The Committee agreed that the draft amendments to the 1994 and 2000 HSC Codes, proposed for adoption at this session, should be deemed to have been accepted on 1 July 2023 and enter into force on 1 January 2024, in accordance with the Guidance (MSC.1/Circ.1481).

Draft amendments to the IMSBC Code

3.20 The Committee recalled that the draft amendments (06-21) to the IMSBC Code had been agreed by CCC 7, finalized by E&T 35 and subsequently circulated in accordance with SOLAS article VIII(b)(i) and the agreed amendment procedure for the IMSBC Code (MSC 86/26, paragraph 7.2), for consideration with a view to adoption at this session.

3.21 The Committee recalled also that amendments to the IMSBC Code were exempted from the four-year cycle for entry into force of SOLAS amendments (MSC.1/Circ.1481, paragraph 3.4).

3.22 Having noted that no comments on the draft amendments had been submitted, the Committee confirmed their contents, as set out in annex 5 to document MSC 105/WP.5/Add.1, subject to editorial improvements, if any.

Date of entry into force of the proposed amendments

3.23 Having noted that the projected entry into force of the IMSBC Code amendments (06-21) had been delayed by one year owing to the disruption caused by the COVID-19 pandemic, and in order to avoid further delays, as well as to facilitate adoption of the subsequent IMSBC Code amendments (07-23) in the projected time frame, the Committee agreed that the draft amendments, proposed for adoption at this session, should be deemed to have been accepted on 1 June 2023 and should enter into force on 1 December 2023, and that Contracting Governments to the SOLAS Convention could apply the amendments from 1 January 2023 on a voluntary basis.

Draft amendments to the IMDG Code

3.24 The Committee recalled that the draft amendments (41-22) to the IMDG Code had been agreed by CCC 7, finalized by E&T 35 and subsequently circulated in accordance with SOLAS article VIII(b)(i) and with the agreed amendment procedure for the IMDG Code (MSC 75/24, paragraph 7.36.3), for consideration with a view to adoption at this session.

3.25 In considering the draft amendments, the Committee noted the confirmation provided by E&T 35 that the work under the output on "Amendments to the IMDG Code related to portable tanks with shells made of fibre-reinforced plastics (FRPs) for multimodal transportation of dangerous goods" was covered by the draft amendments (CCC 8/6, paragraph 3.16).

3.26 Having noted that no comments on the draft amendments had been submitted, the Committee confirmed their contents, as set out in annex 6 to document MSC 105/WP.5/Add.2, subject to editorial improvements, if any.

Date of entry into force of the proposed amendments

3.27 The Committee agreed that the draft amendments to the IMDG Code, proposed for adoption at this session, should be deemed to have been accepted on 1 July 2023 and should enter into force on 1 January 2024, and that Contracting Governments to the SOLAS Convention could apply the amendments from 1 January 2023 on a voluntary basis.

NON-MANDATORY INSTRUMENTS

Draft amendments to the 1983 and 2008 SPS Codes

3.28 The Committee recalled that MSC 104 had approved, in principle, draft amendments to the Form of Safety Certificate for Special Purpose Ships under the 1983 and 2008 SPS Codes, concerning the modernization of the GMDSS, with a view to adoption at this session in conjunction with adoption of the related draft amendments to the 1974 SOLAS Convention (MSC 104/18, paragraph 12.8).

3.29 In this regard, the Committee considered the modifications suggested in document MSC 105/3/5, as set out in annexes 7 and 8 to document MSC 105/WP.5, respectively, and agreed to incorporate them in the draft amendments to be adopted.

3.30 Subsequently, the Committee confirmed the contents of the proposed amendments, as set out in annexes 7 and 8 to document MSC 105/WP.5, respectively, subject to editorial improvements, if any.

Effective date of the proposed amendments

3.31 The Committee agreed that the draft amendments to the 1983 and 2008 SPS Codes, proposed for adoption at this session, should take effect on 1 January 2024, in conjunction with the entry into force of the related draft amendments to the 1974 SOLAS Convention.

Draft amendments to the 1979, 1989 and 2009 MODU Codes

3.32 The Committee recalled that MSC 104 had approved, in principle, draft amendments to chapters 10 (Life-saving appliances and equipment) and 11 (Radiocommunication and installations/navigation) of the 1979, 1989 and 2009 MODU Codes, concerning the modernization of the GMDSS, with a view to adoption at this session, in conjunction with the adoption of the related amendments to the 1974 SOLAS Convention (MSC 104/18, paragraph 12.8).

3.33 Having noted that no comments on the draft amendments had been submitted, the Committee confirmed their contents, as set out in annexes 9 to 11 to document MSC 105/WP.5, respectively, subject to editorial improvements, if any.

Effective date of the proposed amendments

3.34 The Committee agreed that the draft amendments to the 1979, 1989 and 2009 MODU Codes, proposed for adoption at this session, should take effect on 1 January 2024, in conjunction with the entry into force of the related draft amendments to the 1974 SOLAS Convention.

Draft MSC resolutions on related non-mandatory instruments

3.35 The Committee recalled that MSC 104 had approved, in principle, draft MSC resolutions on:

- .1 System performance standard for the promulgation and coordination of maritime safety information using high-frequency narrow-band direct-printing;
- .2 Performance standards for the reception of maritime safety information and search and rescue related information by MF (NAVTEX) and HF;
- .3 Provision of radio services for the Global Maritime Distress and Safety System (GMDSS);
- .4 Performance standards for search and rescue radar transponders;
- .5 Performance standards for shipborne VHF radio installations capable of voice communication and digital selective calling;
- .6 Performance standards for shipborne MF and MF/HF radio installations capable of voice communication, digital selective calling and reception of maritime safety information and search and rescue related information;
- .7 Performance standards for Inmarsat-C ship earth stations capable of transmitting and receiving direct-printing communications;
- .8 Guidelines for the avoidance of false distress alerts;
- .9 Performance standards for survival craft portable two-way VHF radiotelephone apparatus;
- .10 Amendments to the *Performance standards for radiocommunication equipment* (resolution MSC.80(70)); and
- .11 Performance standards for a shipborne integrated communication system (ICS) when used in the Global Maritime Distress and Safety System (GMDSS),

concerning the modernization of the GMDSS, with a view to adoption at this session in conjunction with adoption of the related draft amendments to the 1974 SOLAS Convention (MSC 104/18, paragraph 12.8).

3.36 In this regard, the Committee considered the modifications suggested in document MSC 105/3/6 (China), as set out in annex 13 to document MSC 105/WP.5, and agreed to incorporate them in the draft MSC resolution on Performance standards for the reception of maritime safety information and search and rescue related information by MF (NAVTEX) and HF.

3.37 Having agreed to the modifications proposed in document MSC 105/3/6, the Committee confirmed the contents of the draft MSC resolution, as modified, together with the other aforementioned draft MSC resolutions, as set out in annexes 12 to 22 to document MSC 105/WP.5, subject to editorial improvements, if any.

Draft MSC circulars on related non-mandatory instruments

3.38 The Committee recalled that MSC 104 had approved, in principle, draft MSC circulars on:

- .1 Participation of non-SOLAS ships in the Global Maritime Distress and Safety System (GMDSS) and guidance on the development of training materials for GMDSS operators on non-SOLAS ships, to be disseminated as MSC.1/Circ.803/Rev.1; and
- .2 Guidance for the reception of maritime safety information and search and rescue related information as required in the Global Maritime Distress and Safety System (GMDSS),

concerning the modernization of the GMDSS, with a view to final approval at this session, in conjunction with adoption of the related draft amendments to the 1974 SOLAS Convention (MSC 104/18, paragraph 12.8).

3.39 The Committee recalled also that, as instructed by CCC 7, E&T 35 had finalized draft amendments to:

- .1 *Revised interim guidance for conducting the refined MHB (CR) test (MSC.1/Circ.1600)*, to be disseminated as MSC.1/Circ.1600/Rev.1;
- .2 *Lists of solid bulk cargoes for which a fixed gas fire-extinguishing system may be exempted or for which a fixed gas fire-extinguishing system is ineffective (MSC.1/Circ.1395/Rev.4)*, to be disseminated as MSC.1/Circ.1395/Rev.5;
- .3 *Revised emergency response procedures for ships carrying dangerous goods (EmS Guide) (MSC.1/Circ.1588/Rev.1)*, to be disseminated as MSC.1/Circ.1588/Rev.2; and
- .4 *Revised recommendations on the safe use of pesticides in ships applicable to the fumigation of cargo transport units (MSC.1/Circ.1361)*, to be disseminated as MSC.1/Circ.1361/Rev.1,

with a view to approval at this session, in conjunction with adoption of the draft amendments to the IMDG and IMSBC Codes, as appropriate.

3.40 Having noted that no comments on the matter had been received, the Committee confirmed the contents of the aforementioned draft MSC circulars, as set out in annexes 23 to 28 to documents MSC 105/WP.5, MSC 105/WP.5/Add.1 and MSC 105/WP.5/Add.2, as appropriate, subject to editorial improvements, if any.

CONSEQUENTIAL REVOCATION OF EXISTING NON-MANDATORY INSTRUMENTS

3.41 The Committee recalled that MSC 104 had agreed, in principle, to revoke a number of existing non-mandatory instruments which would become obsolete, effective from the date of entry into force of the related draft amendments to the 1974 SOLAS Convention (MSC 104/18, paragraph 12.9).

3.42 In this regard, the Committee:

- .1 confirmed the revocation of resolutions MSC.131(75), MSC.199(80) and MSC.247(83), and circulars MSC/Circ.1038, MSC/Circ.1123, MSC.1/Circ.1382/Rev.2 and COMSAR/Circ.17; and
- .2 invited A 33 to revoke resolutions A.334(IX), A.383(X), A.385 (X), A.421(XI), A.524(13), A.530(13), A.570(14), A.612(15), A.614(15), A.660(16), A.661(16), A.699(17), A.701(17), A.702(17), A.703(17), A.801(19), as amended, A.802(19), as amended, A.805(19) and A.814(19),

from the date of entry into force (i.e. 1 January 2024) of the related amendments to the 1974 SOLAS Convention adopted at this session. In addition, the Committee noted that MSC/Circ.882 had already been superseded by MSC/Circ.1040 and, therefore, no further action was required with regard to this circular.

PROPOSED CONSEQUENTIAL AMENDMENTS TO THE 1978 SOLAS PROTOCOL

3.43 The Committee noted that the modifications to the draft amendments to the 1974 SOLAS Convention proposed in annex 1 to document MSC 105/3/5 were also considered to be applicable to the Form of Safety Equipment Certificate for Cargo Ships contained in the appendix to the annex to the 1978 SOLAS Protocol, as reflected in annex 29 to document MSC 105/WP.5.

3.44 In this respect, having recalled its earlier decision concerning the modifications proposed in document MSC 105/3/5 (see paragraph 3.8) and the relevant provision of the *Guidance on the harmonization of certificates among the SOLAS Protocols* (MSC.1/Circ.1500/Rev.1, annex, paragraph 3.2.1.3.11), the Committee agreed to prepare consequential draft amendments to the 1978 SOLAS Protocol, with a view to approval at this session and subsequent adoption at MSC 106, with an expected entry-into-force date of 1 January 2026, as agreed by MSC 104 (MSC 104/18, paragraph 3.16.1).

PROPOSAL CONCERNING THE USE OF CERTAIN TERMS IN NON-MANDATORY INSTRUMENTS

3.45 The Committee considered document MSC 105/3/4 (IACS), providing options to clarify the understanding and intended meaning of terms such as "fitted", "provided", "installed" or "installation" used in application statements of resolutions concerning performance standards or other non-mandatory instruments; and proposing to revise MSC.1/Circ.1500/Rev.1, paragraph 4.2.6.3.1(a), in recognition of the use of the "building contract" date in the application statements of regulations.

3.46 In considering the intended meaning of the above-mentioned terms, the Committee recalled that the option explained in paragraph 9 of document MSC 105/3/4 had already been used by SSE 8 in the draft MSC resolution on amendments to the LSA Code (SSE 8/20, annex 1), following a proposal by IACS (SSE 8/3/1).

3.47 In the ensuing discussion, the Committee noted the following views on the two options presented in paragraphs 9 and 10 of document MSC 105/3/4, i.e. insertion of the definition of the relevant term (i.e. "installed") in the application statements of future resolutions concerning non-mandatory instruments or revision of MSC.1/Circ.1500/Rev.1 to include amendments to non-mandatory instruments:

- .1 MSC.1/Circ.1500/Rev.1, paragraph 4.2.6.3.1(a), should be revised as suggested in paragraph 10 of the document;
- .2 the solution suggested in paragraph 9 of the document (insertion of the definition of "installed" in future non-mandatory instruments) was preferable, given that MSC.1/Circ.1500/Rev.1 addressed SOLAS and related mandatory instruments;
- .3 notwithstanding the view stated in paragraph 3.47.2, the option presented in paragraph 9 could be too specific to address the issue for all non-mandatory instrument amendments;
- .4 a solution should be found based on the statement set out in paragraph 3.2.1.3.9 (clear understanding of the definitions) of MSC.1/Circ.1500/Rev.1; and
- .5 the Sub-Committees should take into account different needs, requirements and circumstances when determining the installation statements of resolutions of non-mandatory instruments.

3.48 Having considered the views expressed on the matter, the Committee invited interested Member States and international organizations to submit relevant proposals on the issues concerning the use of the terms "fitted", "provided", "installed" or "installation" in the application statements of resolutions of non-mandatory instruments and on the revision of MSC.1/Circ.1500/Rev.1, paragraph 4.2.6.3.1(a), in recognition of the use of the "building contract" date in the application statements of regulations, to MSC 106 under the agenda item "Consideration and adoption of amendments to mandatory instruments".

ASSESSMENT OF CAPACITY-BUILDING AND TECHNICAL COOPERATION AND ASSISTANCE IMPLICATIONS FOR THE DRAFT AMENDMENTS TO MANDATORY INSTRUMENTS

3.49 The Committee, having recalled the decision of MSC 104 to discontinue the agenda item "Capacity-building for the implementation of new measures" and in future to absorb that work under this agenda item (MSC 104/18, paragraph 4.2), instructed the Drafting Group to assess the implications of the amendments to existing mandatory instruments considered for adoption at this session for capacity-building and technical cooperation and assistance, against the procedures and criteria for identification of capacity-building implications set out in annex 2 of the Committees' Guidelines (MSC-MEPC.1/Circ.5/Rev.2).

ESTABLISHMENT OF THE DRAFTING GROUP

3.50 Having considered the above matters, the Committee established the Drafting Group on Amendments to Mandatory Instruments and instructed it, taking into account comments made and decisions taken in plenary, to:

- .1 prepare the final text of the:
 - .1 draft amendments to chapters II-1, III, IV and V, and the appendix (Certificates) to the annex to the 1974 SOLAS Convention, including the associated MSC resolution;
 - .2 draft amendments to the appendix to the annex to the 1988 SOLAS Protocol, including the associated MSC resolution;
 - .3 draft amendments to the 1994 and 2000 HSC Codes, including the associated MSC resolutions;
 - .4 draft amendments to the IMSBC Code, including the associated MSC resolution;
 - .5 draft amendments to the IMDG Code, including the associated MSC resolution;
 - .6 draft amendments to the 1983 and 2008 SPS Codes, including the associated MSC resolutions;
 - .7 draft amendments to the 1979, 1989 and 2009 MODU Codes, including the associated MSC resolutions;
 - .8 draft MSC resolutions on:
 - .1 System performance standard for the promulgation and coordination of maritime safety information using high-frequency narrow-band direct-printing;
 - .2 Performance standards for the reception of maritime safety information and search and rescue related information by MF (NAVTEX) and HF;
 - .3 Provision of radio services for the Global Maritime Distress and Safety System (GMDSS);
 - .4 Performance standards for search and rescue radar transponders;
 - .5 Performance standards for shipborne VHF radio installations capable of voice communication and digital selective calling;
 - .6 Performance standards for shipborne MF and MF/HF radio installations capable of voice communication, digital selective calling and reception of maritime safety information and search and rescue related information;
 - .7 Performance standards for Inmarsat-C ship earth stations capable of transmitting and receiving direct-printing communications;
 - .8 Guidelines for the avoidance of false distress alerts;

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- .9 Performance standards for survival craft portable two-way VHF radiotelephone apparatus;
 - .10 Amendments to the *Performance standards for radiocommunication equipment* (resolution MSC.80(70)); and
 - .11 Performance standards for a shipborne integrated communication system (ICS) when used in the Global Maritime Distress and Safety System (GMDSS); and
- .9 draft MSC circulars on:
- .1 Participation of non-SOLAS ships in the Global Maritime Distress and Safety System (GMDSS) and guidance on the development of training materials for GMDSS operators on non-SOLAS ships, to be disseminated as MSC.1/Circ.803/Rev.1;
 - .2 Guidance for the reception of maritime safety information and search and rescue related information as required in the Global Maritime Distress and Safety System (GMDSS);
 - .3 Revised interim guidance for conducting the refined MHB (CR) test, to be disseminated as MSC.1/Circ.1600/Rev.1;
 - .4 Lists of solid bulk cargoes for which a fixed gas fire-extinguishing system may be exempted or for which a fixed gas fire-extinguishing system is ineffective, to be disseminated as MSC.1/Circ.1395/Rev.5;
 - .5 Amendments to MSC.1/Circ.1588/Rev.1 on *Revised emergency response procedures for ships carrying dangerous goods (EmS Guide)*, to be disseminated as a consolidated revision with the symbol MSC.1/Circ.1588/Rev.2; and
 - .6 Revised recommendations on the safe use of pesticides in ships applicable to the fumigation of cargo transport units, to be disseminated as MSC.1/Circ.1361/Rev.1,
- with a view to adoption or approval, as appropriate;
- .2 assess the implications for capacity-building and technical cooperation and assistance of the amendments to existing mandatory instruments submitted for adoption at this session (sub-paragraphs .1.1 to .1.5 above), against the procedures and criteria for identification of capacity-building implications set out in annex 2 of the Committees' Guidelines (MSC-MEPC.1/Circ.5/Rev.2), and advise the Committee as appropriate; and
 - .3 prepare draft amendments to the appendix to the annex to the 1978 Protocol, and the associated draft MSC resolution, based on annex 29 to document MSC 105/WP.5 and taking into account document MSC 105/3/5, for consideration by the Committee, with a view to approval at this session and subsequent adoption at MSC 106.

REPORT OF THE DRAFTING GROUP

3.51 Having considered the report of the Drafting Group (MSC 105/WP.7), the Committee approved it in general and took action as outlined below.

Adoption of amendments to the 1974 SOLAS Convention and related mandatory codes***Amendments to the 1974 SOLAS Convention***

3.52 The expanded Committee, including delegations of 109 Contracting Governments to the 1974 SOLAS Convention, considered the final text of the proposed amendments to chapters II-1, III, IV and V, and the appendix (Certificates) to the annex to the 1974 SOLAS Convention, prepared by the Drafting Group (MSC 105/WP.7, annex 1), and adopted them unanimously by resolution MSC.496(105), as set out in annex 3.

3.53 In adopting resolution MSC.496(105), the expanded Committee determined, in accordance with article VIII(b)(vi)(2)(bb) of the 1974 SOLAS Convention, that the adopted amendments should be deemed to have been accepted on 1 July 2023 (unless, prior to that date, objections are communicated to the Secretary-General, as provided for in article VIII(b)(vi)(2) of the Convention) and enter into force on 1 January 2024, in accordance with the provisions of article VIII thereof and the *Guidance on entry into force of amendments to the 1974 SOLAS Convention and related mandatory instruments* (MSC.1/Circ.1481).

Amendments to the 1994 and 2000 HSC Codes

3.54 The expanded Committee, including delegations of 109 Contracting Governments to the 1974 SOLAS Convention, considered the final text of the proposed amendments to the 1994 and 2000 HSC Codes, prepared by the Drafting Group (MSC 105/WP.7, annexes 3 and 4), and adopted them unanimously by resolutions MSC.498(105) and MSC.499(105), as set out in annexes 5 and 6, respectively.

3.55 In adopting resolutions MSC.498(105) and MSC.499(105), the expanded Committee determined, in accordance with article VIII(b)(vi)(2)(bb) of the 1974 SOLAS Convention, that the adopted amendments should be deemed to have been accepted on 1 July 2023 (unless, prior to that date, objections are communicated to the Secretary-General, as provided for in article VIII(b)(vi)(2) of the Convention) and enter into force on 1 January 2024, in accordance with the provisions of article VIII of the Convention.

Amendments to the IMSBC Code

3.56 The expanded Committee, including delegations of 109 Contracting Governments to the 1974 SOLAS Convention, considered the final text of the proposed amendments to the IMSBC Code, prepared by the Drafting Group (MSC 105/WP.7/Add.1, annex 5), and adopted them unanimously by resolution MSC.500(105), as set out in annex 7.

3.57 In adopting resolution MSC.500(105), the expanded Committee determined, in accordance with article VIII(b)(vi)(2)(bb) of the 1974 SOLAS Convention, that the adopted amendments should be deemed to have been accepted on 1 June 2023 (unless, prior to that date, objections are communicated to the Secretary-General, as provided for in article VIII(b)(vi)(2) of the Convention) and enter into force on 1 December 2023, in accordance with the provisions of article VIII of the Convention.

Amendments to the IMDG Code

3.58 The expanded Committee, including delegations of 109 Contracting Governments to the 1974 SOLAS Convention, considered the final text of the proposed amendments to the IMDG Code, prepared by the Drafting Group (MSC 105/WP.7/Add.2, annex 6), and adopted them unanimously by resolution MSC.501(105), as set out in annex 8.

3.59 In adopting resolution MSC.501(105), the expanded Committee determined, in accordance with article VIII(b)(vi)(2)(bb) of the 1974 SOLAS Convention, that the adopted amendments should be deemed to have been accepted on 1 July 2023 (unless, prior to that date, objections are communicated to the Secretary-General, as provided for in article VIII(b)(vi)(2) of the Convention) and enter into force on 1 January 2024, in accordance with the provisions of article VIII of the Convention.

Amendments to the 1988 SOLAS Protocol

3.60 The expanded Committee, including delegations of 95 Parties to the 1988 SOLAS Protocol, considered the final text of the proposed amendments to the appendix to the annex to the Protocol prepared by the Drafting Group (MSC 105/WP.7, annex 2) and adopted the amendments unanimously by resolution MSC.497(105), as set out in annex 4.

3.61 In adopting resolution MSC.497(105), the expanded Committee determined, in accordance with article VIII(b)(vi)(2)(bb) of the 1974 SOLAS Convention and article VI of the 1988 SOLAS Protocol, that the adopted amendments should be deemed to have been accepted on 1 July 2023 (unless, prior to that date, objections are communicated to the Secretary-General, as provided for in article VIII(b)(vi)(2) of the 1974 SOLAS Convention and article VI of the 1988 SOLAS Protocol) and should enter into force on 1 January 2024, in accordance with the provisions of article VIII of the Convention, article VI of the 1988 SOLAS Protocol and MSC.1/Circ.1481.

Adoption/approval of related non-mandatory instruments

3.62 Having considered the final text of the proposed draft MSC resolutions concerning non-mandatory instruments prepared by the Drafting Group (MSC 105/WP.7, annexes 7 to 22), the Committee adopted the following resolutions, as set out in the respective annexes:

- .1 MSC.502(105) on *Amendments to the Code of Safety for Special Purpose Ships, 1983 (1983 SPS Code)* (annex 9);
- .2 MSC.503(105) on *Amendments to the Code of Safety for Special Purpose Ships, 2008 (2008 SPS Code)* (annex 10);
- .3 MSC.504(105) on *Amendments to the Code for the Construction and Equipment of Mobile Offshore Drilling Units, 1979 (1979 MODU Code)* (annex 11);
- .4 MSC.505(105) on *Amendments to the Code for the Construction and Equipment of Mobile Offshore Drilling Units, 1989 (1989 MODU Code)* (annex 12);
- .5 MSC.506(105) on *Amendments to the Code for the Construction and Equipment of Mobile Offshore Drilling Units, 2009 (2009 MODU Code)* (annex 13);

- .6 MSC.507(105) on *System performance standard for the promulgation and coordination of maritime safety information using high-frequency narrow-band direct-printing* (annex 14);
- .7 MSC.508(105) on *Performance standards for the reception of maritime safety information and search and rescue related information by MF (NAVTEX) and HF* (annex 15);
- .8 MSC.509(105) on *Provision of radio services for the Global Maritime Distress and Safety System (GMDSS)* (annex 16);
- .9 MSC.510(105) on *Performance standards for search and rescue radar transponders* (annex 17);
- .10 MSC.511(105) on *Performance standards for shipborne VHF radio installations capable of voice communication and digital selective calling* (annex 18);
- .11 MSC.512(105) on *Performance standards for shipborne MF and MF/HF radio installations capable of voice communication, digital selective calling and reception of maritime safety information and search and rescue related information* (annex 19);
- .12 MSC.513(105) on *Performance standards for Inmarsat-C ship earth stations capable of transmitting and receiving direct-printing communications* (annex 20);
- .13 MSC.514(105) on *Guidelines for the avoidance of false distress alerts* (annex 21);
- .14 MSC.515(105) on *Performance standards for survival craft portable two-way VHF radiotelephone apparatus* (annex 22);
- .15 MSC.516(105) on *Amendments to the Performance standards for radiocommunication equipment (resolution MSC.80(70))* (annex 23); and
- .16 MSC.517(105) on *Performance standards for a shipborne integrated communication system (ICS) when used in the Global Maritime Distress and Safety System (GMDSS)* (annex 24).

3.63 Having also considered the final text of the proposed draft MSC circulars prepared by the Drafting Group (MSC 105/WP.7, annexes 23 to 28), the Committee approved:

- .1 MSC.1/Circ.803/Rev.1 on *Participation of non-SOLAS ships in the Global Maritime Distress and Safety System (GMDSS) and guidance on the development of training materials for GMDSS operators on non-SOLAS ships*;
- .2 MSC.1/Circ.1645 on *Guidance for the reception of maritime safety information and search and rescue related information as required in the Global Maritime Distress and Safety System (GMDSS)*;
- .3 MSC.1/Circ.1600/Rev.1 on *Guidance for conducting the refined MHB (CR) test*;

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- .4 MSC.1/Circ.1395/Rev.5 on *Lists of solid bulk cargoes for which a fixed gas fire-extinguishing system may be exempted or for which a fixed gas fire-extinguishing system is ineffective*;
 - .5 Amendments to the *Revised emergency response procedures for ships carrying dangerous goods (EmS Guide)* (MSC.1/Circ.1588/Rev.1), to be disseminated as MSC.1/Circ.1588/Rev.2; and
 - .6 MSC.1/Circ.1361/Rev.1 on *Revised recommendations on the safe use of pesticides in ships applicable to the fumigation of cargo transport units*.

Assessment of capacity-building implications

3.64 Having considered the relevant parts of the Drafting Group's report (MSC 105/WP.7, paragraphs 23 to 28), the Committee agreed that there was no capacity-building implication nor a need for technical cooperation (TC) assistance at this stage as a result of the amendments to the mandatory instruments adopted at this session.

3.65 However, the Committee noted the Group's view that a reassessment of the capacity-building implications and TC assistance needs concerning the implementation of the amendments to the 1974 SOLAS Convention, the 1988 SOLAS Protocol and the 1994 and 2000 HSC Codes could be required in the future, when new equipment/systems (e.g. NAVDAT and VDES) were introduced.

3.66 The Committee also noted the Group's discussion on the practicalities of undertaking the assessment of capacity-building implications, in particular the views expressed on the need for further guidance and revision of the assessment checklist set out in annex 2 to the Committees' Guidelines (MSC-MEPC.1/Circ.5/Rev.2).

3.67 In this regard, having noted a view that the assessment process should involve TC experts and that a further detailed assessment could be carried out by the Technical Cooperation Committee (TCC), the Committee:

- .1 recalled that the aim of the assessment was to identify potential capacity-building implications and TC assistance needs arising from the adoption of amendments to mandatory instruments, for further consideration and assessment by TCC in due course; and
- .2 in this context, invited TCC to consider the outcome of the assessment as described above and take action as appropriate.

Draft amendments to the 1978 SOLAS Protocol

3.68 The Committee considered the draft amendments to the appendix to the annex to the 1978 SOLAS Protocol, prepared by the Group, ensuring harmonization of the Form of Safety Equipment Certificate for Cargo Ships under the 1978 SOLAS Protocol, with the forms of certificates in the appendix (Certificates) to the annex to the 1974 SOLAS Convention, amended by resolution MSC.496(105) for consistency.

3.69 Subsequently, the Committee approved relevant draft amendments to the appendix to the annex to the 1978 SOLAS Protocol, as set out in annex 25, and requested the Secretary-General to circulate them in accordance with SOLAS article VIII(b)(i) and article II of the 1978 SOLAS Protocol, with a view to adoption at MSC 106.

Authorization of the Secretariat

3.70 The Committee authorized the Secretariat, when preparing the authentic texts of the amendments adopted at this session, to make any editorial corrections that might be identified, including updating references to renumbered paragraphs, and to bring to the attention of the Committee any errors or omissions which required action by the Contracting Governments to the 1974 SOLAS Convention and/or the Parties to the 1988 SOLAS Protocol.

3.71 The Committee further requested the Secretariat to ensure that the final text of the amendments contained in the annexes to this report was presented as clean text (i.e. not showing track changes).

4 MEASURES TO IMPROVE DOMESTIC FERRY SAFETY

Model Regulations on Domestic Ferry Safety

4.1 The Committee recalled that MSC 104 had approved the draft Model Regulations on Domestic Ferry Safety with a view to adoption at this session (MSC 104/18, paragraph 5.5.2).

4.2 In this regard, having considered document MSC 105/4 (Secretariat) containing the draft MSC resolution on adoption of the Model Regulations on Domestic Ferry Safety, the Committee noted the general support from delegations for the adoption of the Model Regulations, which could be voluntarily and practically incorporated into national legislation, to reduce accidents related to domestic ferry safety.

4.3 The Committee noted information provided by the delegation of Thailand regarding the ASEAN Regional Forum on Ferry Safety including workshop and training, co-hosted by China and Thailand, envisaged to be held in July 2022; and an offer by China to assist with the development of online training courses related to domestic ferry safety. Furthermore, the delegation highlighted the cooperation with Member States and IMO on improving domestic ferry safety, in particular the collaboration with China in delivering workshops and training events. The full text of the statement by the delegation of Thailand is set out in annex 43.

4.4 Subsequently, the Committee adopted resolution MSC.518(105) on *Model Regulations on Domestic Ferry Safety*, as set out in annex 26, and encouraged Member States to take accelerated measures towards the domestication and implementation of the model regulations and inform the Secretary-General in due course of any action taken in this regard.

4.5 The Committee also invited the Technical Cooperation Committee to assist with the development of an explanatory manual for the model regulations and related online training material.

Measures to improve domestic ferry safety implemented by Member States

4.6 The Committee noted document MSC 105/INF.4 (Republic of Korea) on managing safety of domestic ferries by implementing operation management regulations and a three-layered management system.

4.7 The Committee also noted the information provided by China in document MSC 105/INF.16, on improving information management of ferry companies to strengthen shore-based monitoring of ferries and the crew, thereby improving safety of ferry navigation; document MSC 105/INF.17, on new life-saving equipment designed to meet the demand for rapid evacuation of passengers of all ages on board compact ferry boats to avoid casualties from ferry accidents; and document MSC 105/INF.18, on ferry hull colouring and marking

measures taken to improve visibility of ships to avoid collisions when ships were crossing narrow waterways. The observer from ILAMA shared their interest in assisting Member States with research initiatives to improve ferry safety.

5 DEVELOPMENT OF FURTHER MEASURES TO ENHANCE THE SAFETY OF SHIPS RELATING TO THE USE OF FUEL OIL

Background

5.1 The Committee recalled that MSC 103, in order to progress the work intersessionally, had re-established the Correspondence Group on Development of Further Measures to Enhance the Safety of Ships Relating to the Use of Fuel Oil and requested the Group to submit its report to this session (MSC 103/21, paragraph 6.27).

Outcome of MEPC 77

5.2 The Committee noted that MEPC 77 had invited the Committee to note the status of the work undertaken at MEPC in relation to flashpoint of fuel oil (MEPC 77/16, paragraphs 5.20 to 5.22), in particular that:

- .1 concerning a proposed amendment to appendix V of MARPOL Annex VI to include flashpoint as mandatory information in the bunker delivery note, MEPC 77 had noted the deliberations of the Working Group on Air Pollution and Energy Efficiency, in particular that it was preferable to await the outcome of the work being carried out by MSC on the development of further measures to enhance the safety of ships relating to the use of fuel oil; and
- .2 with regard to updating and improving the MARPOL Annex VI GISIS module, MEPC 77 had requested the Secretariat to proceed with the improvements in line with the related recommendations, which included the addition of a voluntary checkbox for flashpoint to the regulation 18.9.6 tab of the module.

Report of the Correspondence Group

5.3 The Committee noted the report of the Correspondence Group on the Development of Further Measures to Enhance the Safety of Ships Relating to the Use of Fuel Oil (MSC 105/5 and Add.1), together with the following documents providing comments on the report:

- .1 MSC 105/5/1 (IBIA), providing comments and proposals regarding the proposed draft SOLAS amendments (MSC 105/5/Add.1, annex 1) and commenting that there was a disconnect between having a regulation with a specific limit for flashpoint (60°C), while not accepting the test precision statement (Repeatability/Reproducibility) of the accepted test method to establish flashpoint; and
- .2 MSC 105/5/2 (China), providing comments on the repeatability and reproducibility of flashpoint determined by the Pensky-Martens closed cup method and expressing the view that in practical fuel oil testing, the shipping industry needed IMO and ISO to specify repeatability and reproducibility values for determining flashpoints that were outside the temperature scope of ISO 2719-2016; and that there was no need to record the exact flashpoint value in the test report for recheck, only the flashpoint range being recorded was enough.

5.4 The Committee also noted with appreciation the information provided in document MSC 105/INF.14 (China) on experience on the pre-evaluation of the risk of marine fuel mixing, which could decrease the accident rate and the failure rate of the main engine, with a view to quantifying the risk of miscibility of oil fuel and the possibility of engine failure aiming at safer navigation; and document MSC 105/INF.15 (China), providing information on a pre-filter device and implementation experience, which could be of significant help to remove the catalyst powder from marine fuel oil and prevent engine failure.

Reporting confirmed cases of oil fuel suppliers failing to meet the flashpoint requirements

5.5 Having noted the Correspondence Group's discussion on reporting confirmed cases where oil fuel suppliers had failed to meet the flashpoint requirements (MSC 105/5 and Add.1, paragraphs 4 to 7 and annex 1), the Committee instructed the Working Group to finalize the draft SOLAS amendments on reporting confirmed cases where oil fuel suppliers had failed to meet the flashpoint requirements, based on annex 1 to document MSC 105/5/Add.1 and taking into account the relevant parts of documents MSC 105/5/1 and MSC 105/5/2.

Action against oil fuel suppliers in confirmed cases of deliveries of oil fuel not complying with flashpoint requirements

5.6 Having noted the Correspondence Group's deliberations on action to be taken against oil fuel suppliers in confirmed cases of deliveries of oil fuel that did not comply with the requirements specified in SOLAS regulation II-2/4.2.1 (MSC 105/5, paragraphs 8 to 9), the Committee instructed the Working Group to finalize the draft SOLAS amendments on actions against oil fuel suppliers that had been found to deliver oil fuel that did not comply with minimum flashpoint requirements, based on annex 1 to document MSC 105/5/Add.1.

Documentation of the flashpoint of the actual fuel batch when bunkering

5.7 Having noted the Correspondence Group's discussion on requirements regarding the documentation of the flashpoint of the actual fuel batch when bunkering (MSC 105/5 and Add.1, paragraphs 10 to 12 and annex 1) and a view expressed that the actual value of the flashpoint for the fuel delivered to the ship needs to be specified, the Committee instructed the Working Group to finalize draft SOLAS amendments on the documentation of the flashpoint of the actual fuel batch when bunkering, based on annex 1 to document MSC 105/6/Add.1 and taking into account the relevant parts of documents MSC 105/5/1 and MSC 105/5/2, as well as the outcome of MEPC 77, as appropriate.

Guidelines to address situations where indicative test results suggest that oil fuel supplied may not comply with flashpoint requirements

5.8 Having noted the Correspondence Group's discussion on guidelines for ships to address situations where they had indicative test results suggesting that the oil fuel supplied might not comply with SOLAS regulation II-2/4.2.1 (MSC 105/5 and Add.1, paragraphs 13 to 15 and annex 2), the Committee instructed the Working Group to further develop the guidelines for ships to address situations where indicative test results suggested that the oil fuel supplied might not comply with SOLAS regulation II-2/4.2.1, taking into account annex 2 to document MSC 105/5/Add.1 and the relevant part of document MSC 105/5/1.

Measures related to oil fuel parameters other than flashpoint

5.9 Having noted the information provided by the Correspondence Group on possible measures related to oil fuel parameters other than flashpoint (MSC 105/5, paragraphs 16 to 19), the Committee instructed the Working Group to consider further possible actions, including measures related to oil fuel parameters other than flashpoint, and advise the Committee how best to proceed.

Action plan for measures to enhance the safety of ships relating to the use of oil fuel

5.10 Having recalled that MSC 103 had endorsed the updated action plan for the work under this agenda item and extended the target completion year for the output to 2023 (MSC 103/21, paragraph 6.26), the Committee instructed the Working Group to update the plan, taking into account the progress made at this session.

Establishment of the Working Group

5.11 Having considered the above matters, the Committee established the Working Group on Measures to Enhance the Safety of Ships Relating to the Use of Oil Fuel, and instructed it, taking into account comments and decisions made in plenary, to:

- .1 finalize draft SOLAS amendments on the reporting of confirmed cases where oil fuel suppliers had failed to meet the flashpoint requirements of the Organization, based on annex 1 to document MSC 105/5/Add.1 and taking into account the relevant parts of documents MSC 105/5/1 and MSC 105/5/2;
- .2 finalize draft SOLAS amendments on actions against oil fuel suppliers that had been found to deliver oil fuel that did not comply with minimum flashpoint requirements, based on annex 1 to document MSC 105/5/Add.1;
- .3 finalize draft SOLAS amendments on the documentation of the flashpoint of the actual fuel batch when bunkering, based on annex 1 to document MSC 105/5/Add.1 and taking into account the relevant parts of documents MSC 105/5/1 and MSC 105/5/2 as well as the outcome of MEPC 77, as appropriate;
- .4 prepare the check/monitoring sheet for the above-mentioned draft SOLAS amendments, as appropriate;
- .5 further develop the guidelines for ships to address situations where indicative test results suggested that the oil fuel supplied might not comply with SOLAS regulation II-2/4.2.1, taking into account annex 2 to document MSC 105/5/Add.1 and the relevant part of document MSC 105/5/1;
- .6 further consider the other proposals in documents MSC 105/5/1 and MSC 105/5/2 and possible measures related to oil fuel parameters other than flashpoint, taking into account documents MSC 105/INF.14 and MSC 105/INF.15, and advise the Committee how best to proceed;
- .7 review and update the plan for the work under this output; and
- .8 consider whether the Correspondence Group should be re-established and, if so, prepare terms of reference for consideration by the Committee.

Report of the Working Group

5.12 Having considered the report of the Working Group (MSC 105/WP.10), the Committee approved it in general and took action, as described below.

Draft amendments to SOLAS chapter II-2 in relation to flashpoint

5.13 The Committee approved draft amendments to SOLAS chapter II-2 in relation to flashpoint, as set out in annex 27, and requested the Secretary-General to circulate them in accordance with SOLAS article VIII(b)(i), with a view to adoption at MSC 106.

Guidelines for ships to address situations where they have indicative test results suggesting that the oil fuel supplied may not comply with flashpoint requirements

5.14 The Committee noted the deliberations of the Group on the draft guidelines for ships to address situations where they had indicative test results suggesting that the oil fuel supplied might not comply with flashpoint requirements (MSC 105/WP.10, paragraphs 21 to 24).

Measures related to oil fuel parameters other than flashpoint

5.15 The Committee noted the deliberations of the Group on measures related to oil fuel parameters other than flashpoint (MSC 105/WP.10, paragraphs 25 to 29). In this context, the Committee invited interested Member States and international organizations to work with ISO on the matters of repeatability and reproducibility values for the fuel flashpoints and invited submissions to a future session of the Committee, as appropriate.

Revised action plan for further work

5.16 The Committee endorsed the revised action plan for measures to enhance the safety of ships relating to the use of oil fuel, as set out in annex 3 to document MSC 105/WP.10.

5.17 In this context, the Committee invited MEPC 78, as a matter of urgency, to note the draft SOLAS amendments with regard to flashpoint (see paragraph 15.3) and the revised action plan for the development of measures to enhance the safety of ships relating to the use of oil fuel (MSC 105/WP.10, paragraphs 19 and 30 and annexes 1 to 3).

Re-establishment of the Correspondence Group

5.18 Having considered the above matters, in order to progress the work intersessionally, the Committee re-established the Correspondence Group on Oil Fuel Safety, under the coordination of Germany,¹ with the following terms of reference:

- .1 develop guidelines for sampling procedures, taking into account resolution MEPC.182(59);

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- .2 collect information on possible further measures to enhance the safety of ships relating to the use of fuel oil;
 - .3 consider possible measures related to oil fuel parameters other than flashpoint, taking into account documents MSC 100/8/2, MSC 102/INF.19 and MSC 105/INF.14, MSC 105/INF.15 and MSC 105/5 and Add.1; and
 - .4 submit a written report to MSC 107.

5.19 In this context, the Committee invited interested Member States and international organizations to nominate fuel oil experts to participate in the Correspondence Group, in particular to make contributions on further possible measures to enhance the safety of ships relating to the use of oil fuel (MSC 105/WP.10, paragraph 31 and annex 3).

6 GOAL-BASED NEW SHIP CONSTRUCTION STANDARDS

General

6.1 The Committee recalled that it had not been able to consider all documents submitted to previous sessions under this agenda owing to a lack of time and that, in order to address the backlog that had been accumulating over the last three sessions, it had agreed to consider those documents by correspondence (MSC 105/1/2, annex, section 1) under agenda item 1 (see paragraph 1.9).

6.2 The Committee, having considered, under agenda item 1, the Chair's proposals for the actions to be taken in relation to the documents considered by correspondence prior to the meeting and having taken into account the comments received thereon (MSC 105/1/2/Add.1, relevant parts of annexes 1 and 2), took decisions as set out in paragraphs 6.3 to 6.10.

Status report of corrective actions taken to address non-conformities

6.3 The Committee noted the corrective actions taken by Bureau Veritas (BV) (MSC 102/7/7) and China Classification Society (CCS) (MSC 103/7/4) in addressing their individual non-conformities and invited them, and all other ROs with outstanding non-conformities, to submit a joint request for a rectification audit.

Status report addressing GBS audit observations

6.4 With respect to the status reports addressing audit observations provided in documents MSC 102/INF.15, MSC 103/INF.4 and MSC 104/INF.20, MSC 102/INF.24 and MSC 103/INF.6 (Secretariat) and MSC 102/INF.20 and MSC 103/INF.9 (IACS), the Committee noted the information therein and requested the Secretariat to provide an updated list of all GBS audit findings to future sessions.

Report on auditors' observations and outcome of the GBS workshop

6.5 The Committee noted the auditors' observations in documents MSC 102/7/4 and MSC 103/7/3 (Secretariat), together with the comments received from IACS (MSC 103/7/2) and the information provided in document MSC 104/INF.8 (IACS and Secretariat) on the GBS workshop.

6.6 The Committee also noted the recommendation of the GBS workshop participants to re-establish the GBS Working Group after the conclusion of each three-year maintenance audit for the purpose of considering gaps in the Revised GBS Verification Guidelines (MSC 104/INF.8, paragraph 12). The Committee further noted the intention of the GBS workshop participants to organize regular workshops for all ROs confirmed to be GBS-compliant. In this regard, the Committee recommended to the participants that the aims and objectives of the workshops be limited to giving feedback with a view to improving the Organization's GBS Audit Scheme (MSC 104/INF.8, paragraph 23) and that ROs whose request for initial verification was pending be invited to attend such workshops.

6.7 With respect to document MSC 103/7/5 (China), proposing to amend the Revised GBS Verification Guidelines (resolution MSC.454(100)) to include a requirement for the Audit Team to provide conclusions based on improvements made to address observations raised in previous GBS audits, the Committee agreed to hold the document in abeyance until it could allocate sufficient time to consider possible future revisions of the GBS Guidelines (e.g. when the GBS Working Group was re-established).

Report on the current status of GBS verification audits and the GBS Trust Fund

6.8 The Committee noted the report on the current status of GBS verification audits and on the GBS Trust Fund in document MSC 102/7 (Secretariat) and the update related thereto in document MSC 103/7 (Secretariat).

6.9 Having acknowledged that some of the actions requested in document MSC 103/7 had been overtaken by time, the Committee:

- .1 noted that IACS member ROs had submitted their requests for a verification audit on the rectification of all outstanding non-conformities by 31 January 2022 (paragraph 5);²
- .2 noted the calculated audit fees for the NC-audit and the planned assessment for the audit fee for the third GBS maintenance audit, which had commenced in April 2022 (paragraphs 6 and 7, respectively);
- .3 agreed that all communications of annual rule changes deriving from a continuous improvement process in accordance with paragraph 26.2 of the Revised GBS Verification Guidelines should be submitted by 31 March each year (paragraph 9);
- .4 agreed that ROs, when submitting their request for the scheduled three-yearly maintenance audits (Revised GBS Verification Guidelines, paragraph 27.4), should provide a complete technical documentation package with the accumulated rule changes over the last three-year period so as to facilitate the work of the GBS auditors (paragraph 9);
- .5 notwithstanding sub-paragraph 6.9.4 above, noted that this matter had been discussed during the GBS workshop, where it had been clarified that no additional submission for the maintenance audit would be required, as long as the accumulated rule changes over the last three-year period were clearly identified;

² Paragraph numbers refer to document MSC 103/7.

- .6 agreed to a harmonized three-year scheduled maintenance cycle so that all ROs already verified as complying with the GBS, regardless of the year of their initial verification, be subject to the third GBS maintenance audit which had commenced in April 2022 (paragraph 10);
- .7 agreed that all GBS audit reports for consideration by the Committee should be submitted by the Committee's deadline for bulky documents (13-week deadline) (paragraph 11); and
- .8 noted the intention of the Secretariat to investigate the possibility of a software solution to provide a secure information database for auditors with respect to the IMO GBS Audit Programme (paragraph 14).

Probabilistic approach for the development of GBS-compliant ship construction rules

6.10 The Committee noted the information provided in document MSC 103/INF.5 and Add.1 (Poland), containing a proposal to use a probabilistic approach for the development of GBS-compliant ship construction rules.

Combined 2022 GBS Audit on rectification of non-conformities and third maintenance audit

6.11 The Committee noted that the Secretary-General had received requests to conduct the third maintenance audit from all 13 ROs currently verified against the GBS, all of which had submitted their audit request by the agreed deadline of 31 March 2022.

6.12 The Committee also noted that the Secretary-General had established an audit team to conduct a combined 2022 Audit, which comprised the audit of the outstanding non-conformities stemming from the second maintenance audit in 2019 and the audit of the rule changes submitted over the period 2019 to 2021, and which would be conducted in accordance with paragraphs 30 and 27.4, respectively, of the Revised GBS Verification Guidelines (resolution MSC.454(100)).

6.13 In this regard, the Committee noted that the rationale for the combined 2022 GBS Audit was to save costs by having a larger single audit team so that auditors' resources could be managed more efficiently to make full use of each auditors' expertise, knowledge and experience. The Committee also noted that the combined 2022 GBS Audit should be concluded in time for consideration by MSC 106.

Remaining matters postponed for consideration at MSC 106

6.14 Owing to time constraints, the Committee postponed consideration of documents MSC 105/6, MSC 105/INF.6 and MSC 105/INF.7 (Secretariat) and MSC 105/INF.9 (IACS) to MSC 106.

7 DEVELOPMENT OF A GOAL-BASED INSTRUMENT FOR MARITIME AUTONOMOUS SURFACE SHIPS (MASS)

Background

7.1 The Committee recalled that MSC 103 had approved the outcome of the regulatory scoping exercise (RSE) for the use of MASS (MSC.1/Circ.1638), providing an assessment of the degree to which the existing regulatory framework under the purview of the Committee might be affected in order to address MASS operations; and guidance to the Committee and interested parties on how to identify, select and decide on future work on MASS so as to facilitate the preparation of, and requests for, new outputs.

7.2 The Committee also recalled that LEG 108 had completed its RSE with the outcome presented in LEG.1/Circ.11 and that the Intersessional Working Group on MASS established by the Facilitation Committee had finalized its RSE with a view to approval at FAL 46 in May 2022.

7.3 The Committee further recalled that MSC 104 had agreed:

- .1 to include in the 2022-2023 biennial agenda of the Committee and the provisional agenda for this session a new output on "Development of a goal-based instrument for maritime autonomous surface ships (MASS)", with a target completion year of 2025;
- .2 that the first step would be the finalization of a road map to have a common understanding of the work to be undertaken;
- .3 that the title of the output might need to be adjusted, based on the outcome of the discussions at MSC 105; and
- .4 that the ultimate goal would be the preparation of a mandatory instrument to address MASS operations and that, if time permitted, MSC 105 could also embark on the development of such instrument(s).

MASS road map

7.4 The Committee considered the proposal for a MASS road map in document MSC 105/7 (Chair) as a priority to commence its work on the development of a MASS instrument, together with the related comments in documents MSC 105/7/2 (Japan et al.), MSC 105/7/3 (Norway), MSC 105/7/6 (Republic of Korea), MSC 105/7/7 (China) and MSC 105/7/8 (Russian Federation and United Arab Emirates). In this connection, Argentina expressed the view that work towards an instrument should first focus on the vehicles with lower level of autonomy.

7.5 In this regard, the Committee noted the view of one delegation that the definitions of "degrees of autonomy", as contained in the RSE (MSC.1/Circ.1638), were developed for the RSE only and limited to ships' manning and not for developing technical provisions for a MASS Code; therefore, any discussion on the need for definitions for ships' degrees of autonomy might be developed at a later phase when the MASS instrument was more mature.

7.6 Following the discussion, the Committee agreed to the development of a road map on the basis of the annex to document MSC 105/7 and instructed the Working Group to finalize it, taking into account the relevant parts of documents MSC 105/7/2, MSC 105/7/3, MSC 105/7/6, MSC 105/7/7 and MSC 105/7/8.

Development of a goal-based MASS instrument

7.7 With respect to the development of a new goal-based MASS instrument, the Committee considered the following documents:

- .1 MSC 105/7/2 (Japan et al.), providing an outline of draft guidelines for MASS operations mainly relating to SOLAS requirements which could ultimately become part of a mandatory goal-based instrument; the structure and elements contained in the proposed guidelines would also facilitate discussion on the development of a road map for finalization by MSC 105;

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- .2 MSC 105/7/3 (Norway), addressing key issues to be considered in the development of a goal-based instrument for MASS for the purpose of obtaining a common understanding of the output and a possible structure of such an instrument;
 - .3 MSC 105/7/6 (Republic of Korea), providing comments on key issues in the development of an instrument for MASS operations;
 - .4 MSC 105/7/7 (China), raising several key principles to facilitate a common understanding of a MASS instrument and maintaining that, after consideration of these key principles, further adjustments of the road map might be necessary; and
 - .5 MSC 105/7/8 and MSC 105/7/9 (Russian Federation and United Arab Emirates), proposing basic definitions and provisions for MASS operation to be included in the draft goal-based guidelines for MASS operations, as proposed in annex 1 to document MSC 105/7/2.

7.8 In this regard, the Committee also noted the information provided in document MSC 105/INF.2 (Finland) on considerations of the One Sea alliance with respect to an appropriate terminology to be used for the interaction of a human with an automated system.

7.9 The Committee also recalled the input on this matter contained in the draft road map (MSC 105/7, annex) which proposed discussing the following:

- .1 a decision by the Committee on whether to commence work on a mandatory or non-mandatory Code;
- .2 a preliminary discussion on how the instrument would be given effect;
- .3 a decision on the purpose and objective of the new instrument; and
- .4 agreement on what was meant by "goal-based instruments".

7.10 In considering the work plan for the development of the road map, the Committee noted the following views:

- .1 the development of guidelines as a first step was preferred, to serve as an interim solution until a mandatory MASS Code was prepared;
- .2 while the development of a mandatory MASS instrument from the start would be the preferred option, if a non-mandatory instrument was to be prepared as a first step, then it should be developed in the format of a Code, which should clearly outline the purpose, objectives, goals and functional requirements, to facilitate the transition to a mandatory Code;
- .3 the scope of work on the MASS instrument should be limited to defining goals and functional requirements for cargo ships, as proposed in document MSC 105/7/3, leaving passenger ships out for the time being; and
- .4 the scope of work should encompass all ships operating autonomously.

7.11 Taking into account the views expressed on the matter, the Committee agreed to:

- .1 develop a non-mandatory goal-based Code as a first step before proceeding to the development of a mandatory Code; and
- .2 the above non-mandatory Code should initially cover cargo ships while also assessing the application to passenger ships with a view to considering detailed provisions for such ships at a later stage.

7.12 Subsequently, the Committee instructed the Working Group to develop a non-mandatory goal-based MASS Code, taking into account documents MSC 105/7/2, MSC 105/7/3, MSC 105/7/6, MSC 105/7/7, MSC 105/7/8 and MSC 105/7/9, in line with the road map.

Establishment of a Joint MSC-LEG-FAL Working Group

7.13 The Committee considered the following documents submitted in respect of the establishment of a Joint MSC-LEG-FAL Working Group:

- .1 MSC 105/7/4 (Chairs of MSC, LEG and FAL), proposing the establishment of a Joint MSC-LEG-FAL Working Group on MASS to consider common gaps and themes identified during the RSEs conducted by the three committees; and
- .2 MSC 105/7/5 (United Arab Emirates), proposing to amend the draft terms of reference contained in the annex to document MSC 105/7/4 to instruct the Joint Working Group to develop a comprehensive IMO road map for the use of MASS, taking into account the road maps developed and updated by the MSC, LEG and FAL Committees.

7.14 In this respect, the Committee noted that the MSC, FAL and LEG Committee Chairs had invited the Committee to consider the establishment of a Joint Working Group on MASS, with terms of reference as set out in the annex to document MSC 105/7/4, and the Secretariat to make the necessary arrangements for the holding of the first meeting of the Joint Working Group as soon as possible after C 127 in July 2022, subject to LEG, MSC, FAL and Council's approval.

7.15 The Committee also noted that LEG 109 (March 2022) had considered the same proposal and having highlighted, in particular, that it was not intended that such a Joint Working Group would oversee, monitor or supervise the MASS work of the Organization, had subsequently:

- .1 agreed to amend the draft terms of reference for the Joint Working Group to include a new sub-item reading: "develop a work plan taking into account the road maps developed and updated by the three Committees";
- .2 agreed, in order not to delay the establishment of the Joint Working Group, that LEG would be content with the draft terms of reference, as proposed in documents MSC 105/7/4 and LEG 109/13/3, in case MSC and FAL did not agree to the proposed amendment;
- .3 approved, subject to concurrent approval by MSC and FAL, the establishment of a Joint MSC-LEG-FAL Working Group on MASS, to be convened as soon as possible after C 127 in July 2022; and

-
- .4 encouraged Member States and observer organizations to submit proposals on common issues to the Joint Working Group.

7.16 The Committee further noted that LEG 109 had agreed to include a new output on "Measures to address maritime autonomous surface ships (MASS) in the instruments under the purview of the Legal Committee" in its biennial agenda, with a target completion year of 2025.

7.17 The Committee instructed the Working Group, taking into account the outcome of LEG 109, to consider the need for the establishment of a Joint MSC-LEG-FAL Working Group and to advise on the need for the Group to meet prior to MSC 106 by reviewing the proposed terms of reference in documents MSC 105/7/4 and MSC 105/7/5, together with the amendments agreed by LEG 109, and to advise on a possible date, duration and modalities for the meeting.

Results of MASS trials

7.18 With respect to MASS trials conducted by Member States, the Committee noted the information in the following documents:

- .1 MSC 105/INF.12 (Russian Federation), providing information on general results from 28 commercial voyages with a-Navigation systems on board ships flying the flag of the Russian Federation;
- .2 MSC 104/INF.14 (China), providing information on the MASS trials conducted by China on board the **MV Jin Dou Yun 0 Hao**; and
- .3 MSC 104/INF.19 (France), providing information on the MASS trials conducted by France on board the **VN Rebel**.

7.19 With regard to information provided on tests performed, the delegation of Argentina stated that degrees of autonomy three and four were not contemplated under UNCLOS and, therefore, entry of MASS at these degrees to jurisdictional waters was subject to the consent of coastal States.

Comprehensive review of and experimental amendment to COLREG 1972

7.20 The Committee noted the information provided in document MSC 104/INF.13 (China) on a comprehensive review of, and draft amendments to, COLREG 1972, conducted by China to facilitate future COLREG amendments to address MASS operations.

Establishment of the MASS Working Group

7.21 Having considered the above matters, the Committee established the MASS Working Group and instructed it, taking into account comments and decisions made in plenary, to:

- .1 finalize, as a priority, the road map, based on document MSC 105/7 and taking into account documents MSC 105/7/2, MSC 105/7/3, MSC 105/7/6, MSC 105/7/7 and MSC 105/7/8;
- .2 consider the need for the holding of the first meeting of a Joint MSC-LEG-FAL MASS Working Group prior to MSC 106 by reviewing the draft terms of reference contained in documents MSC 105/7/4 and MSC 105/7/5, together with the amendments agreed by LEG 109, and advise the Committee accordingly, including possible dates, duration and modalities for the meeting;

- .3 if time permitted, commence developing a non-mandatory goal-based MASS Code, taking into account documents MSC 105/7/2, MSC 105/7/3, MSC 105/7/6, MSC 105/7/7, MSC 105/7/8 and MSC 105/7/9, in line with the road map developed under sub-paragraph .1; and
- .4 consider the need to establish an intersessional correspondence group and prepare draft terms of reference, as appropriate, for consideration by the Committee.

Report of the MASS Working Group

7.22 Having considered the report of the Working Group (MSC 105/WP.8), the Committee approved it in general and took action, as described below.

Finalization of the road map for developing a goal-based Code for MASS

7.23 As part of the road map for developing a goal-based Code for MASS (MSC 105/WP.8, annex 1), the Committee noted that, following its earlier decision to develop a non-mandatory MASS Code prior to the adoption of a mandatory Code (see paragraph 7.12.1), the Working Group agreed to work towards the entry into force of a mandatory MASS Code by 1 January 2028, despite the short period for gaining experience with the application of a non-mandatory Code that would provide.

7.24 Having also noted that the road map should be considered to be a living document, which might require regular updating and modification at the Committee's future sessions, and that the planned actions under the work plan might be revised as the draft MASS Code matured, the Committee approved the *Road map for developing a goal-based Code for MASS*, as set out in annex 28.

Terms of reference of the Joint MSC/LEG/FAL Working Group

7.25 The Committee, taking into account the proposal of the Chairs of the MSC and the LEG and FAL Committees (MSC 105/7/4, paragraph 4) to establish a joint group as soon as possible after C 127, agreed to the Working Group's recommendation to hold the first meeting of the Joint MSC/LEG/FAL Working Group on Maritime Autonomous Surface Ships (MASS) remotely from 7 to 9 September 2022, subject to concurrent approval by FAL 46 and C 127.

7.26 The Committee noted that the Group had prepared draft terms of reference for the Joint Working Group, taking into account documents MSC 105/7/4 and LEG 109/13/3, as amended by LEG 109, including references to the Committees' RSEs. In this regard, the Committee agreed that, subject to concurrent approval by FAL 46, the Joint Working Group on MASS would serve as a cross-cutting mechanism to address common high-priority issues identified by the RSEs for the use of MASS conducted by the three Committees.

7.27 Subsequently, the Committee, based on the outcome of the aforementioned RSEs and the recommendations of the Committees, instructed the Joint MSC/LEG/FAL MASS Working Group, subject to the concurrent approval of FAL 46, to:

- .1 develop a work plan, taking into account the road maps developed and updated by the three committees;
- .2 address the common issues³ identified by the three committees; and

³ Based on MSC.1/Circ.1638, LEG.1/Circ.11 and the FAL RSE, to be finalized by FAL 46.

- .3 provide advice to the committees after every meeting.

7.28 With respect to the work of the Joint MSC-LEG-FAL MASS Working Group and the approved road map, the Committee noted a statement by the delegation of Argentina, highlighting the need to ensure the Joint Group would be able to address issues identified by any of the Committees.

Development of a non-mandatory goal-based MASS instrument

7.29 Following the earlier decision to develop a non-mandatory goal-based MASS Code as a first step (see paragraph 7.12.1 and annex 28), the Committee, having noted that the Group had not been able to agree on a base document for the development of the new Code, decided to forward all relevant documents submitted to MSC 105 to the intersessional correspondence group for further consideration (see paragraph 7.31).

Establishment of a MASS Correspondence Group

7.30 In considering whether to establish an intersessional correspondence group, the Committee noted several concerns regarding the limitation in the draft terms of reference to initially focus on developing provisions for cargo ships only, with a view to considering application to passenger ships at a future stage (see paragraph 7.31.5). In this regard, the Committee recalled its earlier decision (see paragraph 7.12.2) that the new Code would initially cover cargo ships while also assessing the application to passenger ships with a view to considering detailed provisions for such ships at a later stage.

7.31 Having considered the above issue and the need to make progress intersessionally, the Committee established the MASS Correspondence Group, under the coordination of the Marshall Islands,⁴ and instructed it, taking into account the comments and decisions made at MSC 105, to:

- .1 consider key principles and common understanding of the purpose and objectives for the new instrument;
- .2 commence the development of a non-mandatory goal-based MASS Code, taking into account the potential gaps and themes identified, the scope and framework of the non-mandatory Code, as well as documents MSC 105/7/2, MSC 105/7/3, MSC 105/7/6, MSC 105/7/7, MSC 105/7/8 and MSC 105/7/9;
- .3 consider the common potential gaps and/or themes identified during the regulatory scoping exercise (RSE) (MSC.1/Circ.1638, section 5), focusing on the high-priority items (MSC.1/Circ.1638, paragraphs 6.11.1 to 6.11.3);
- .4 if time permitted, develop MSC MASS positions on the following points with the intention that these be submitted to a Joint MSC/LEG/FAL MASS Working Group in the future (MSC.1/Circ.1638, paragraphs 6.11.1 to 6.11.3), which included, but were not limited to:

⁴ **Coordinator:**
Mr. Charles McHardy
Deputy Commissioner Maritime Affairs
Republic of the Marshall Islands
Email: cmchardy@register-iri.com
Phone: +44 7876 897 924

- .1 consideration, together with relevant documents, whether to amend the definition for MASS and degrees of autonomy (including the respective definition);
- .2 meaning of the terms master, crew or responsible person;
- .3 remote control station/centre; and
- .4 determination of the remote operator as a seafarer,
and advise on a way forward in addressing them;
- .5 limit the development of the non-mandatory MASS Code to cargo ships with a view to considering the feasibility for application to passenger ships at a future stage; and
- .6 submit a written report to MSC 107.

7.32 The Committee also requested the coordinator of the MASS Correspondence Group to provide a verbal status report at MSC 106.

7.33 In addition to the above, the Committee authorized virtual meetings for the intersessional correspondence group as and when considered appropriate by the coordinator, so as to facilitate the otherwise very difficult task of exchanging and considering written responses on this complex matter, in particular under paragraph 7.31.4 of the above terms of reference.

8 MEASURES TO ENHANCE MARITIME SECURITY

8.1 Owing to time constraints, the Committee postponed consideration of this agenda item, including documents MSC 105/8, MSC 105/8/1 and MSC 105/8/2, to MSC 106.

9 PIRACY AND ARMED ROBBERY AGAINST SHIPS

9.1 Owing to time constraints, the Committee postponed consideration of this agenda item, including documents MSC 105/9, MSC 105/9/1, MSC 105/INF.3 and MSC 105/INF.8, to MSC 106.

10 UNSAFE MIXED MIGRATION BY SEA

10.1 Owing to time constraints, the Committee postponed consideration of this agenda item, including documents MSC 105/10 and MSC 105/10/1, to MSC 106.

11 FORMAL SAFETY ASSESSMENT

11.1 Owing to time constraints, the Committee postponed consideration of this agenda item, including document MSC 105/WP.11, to MSC 106.

12 COST IMPLICATIONS FOR MSI AND SAR INFORMATION PROVIDERS CONCERNING THE RECOGNITION OF MULTIPLE GMDSS MOBILE SATELLITE SERVICES

12.1 The Committee recalled that MSC 103 had established a Correspondence Group on Dissemination of MSI and SAR-related information, under the coordination of Australia (MSC 103/21, paragraph 14.10).

12.2 The Committee had for its consideration document MSC 105/12 (Australia) presenting the report of the Correspondence Group, including conclusions and recommendations related to:

- .1 the mandatory use of all recognized mobile satellite services (RMSSs) that provide services within the service area for dissemination of information by maritime safety information (MSI) and search and rescue (SAR) information providers (hereafter referred to as "information providers"); and
- .2 options to address cost implications for information providers concerning the dissemination of information over multiple RMSSs,

and the following documents commenting on the report of the Correspondence Group:

- .1 MSC 105/12/1 (France) proposing a revision of resolution A.707(17) on *Charges for distress, urgency and safety messages through the Inmarsat system* to address special arrangements in respect of charges to shore services for distress, urgency or safety communications carried over RMSSs;
- .2 MSC 105/12/2 (Liberia et al.) supporting the need for all NAVAREA and METAREA Coordinators to provide MSI to ships through all RMSSs available in the service area;
- .3 MSC 105/12/3 (China) proposing a possible way forward to broadcast MSI and SAR-related information through all RMSSs and address cost implications for information providers; and
- .4 MSC 105/12/4 (France) commenting on the consideration and conclusions of the Correspondence Group concerning the mandatory use of all RMSSs by information providers and options to address related cost implications.

12.3 The Committee considered the issues raised in the documents submitted under this agenda item in two parts, as follows:

- .1 mandatory use of all RMSSs that provide services within a specific service area; and
- .2 options to address cost implications for information providers concerning the dissemination of information over multiple RMSSs.

Mandatory use of recognized mobile satellite services

12.4 The Committee considered the mandatory use of all RMSSs that provide services within a specific service area for the purpose of disseminating MSI and SAR-related information to ships navigating within those areas, taking into account, in particular, the relevant part of the Report of the Correspondence Group (MSC 105/12, paragraphs 70.1 to 70.4) and commenting documents MSC 105/12/2 and MSC 105/12/4.

12.5 A number of delegations did not agree with the proposal in document MSC 105/12/2 that the Committee confirm the mandatory use of all recognized services by information providers, and indicated that technical solutions for dissemination of information over multiple services, including interoperability issues, should first be considered before taking a final decision. They also indicated that the recognition of additional mobile satellite services did not necessarily guarantee a better service to the mariner. They further indicated that a cost increase for dissemination of information could lead to a situation where information providers would no longer be in a position to disseminate the information through all recognized services, and this could also affect the recognition of new services, which should be prevented.

12.6 Other delegations were of the view that the Committee should confirm the mandatory use of all recognized services by information providers servicing their areas of dissemination, on the understanding that once a service was recognized by the Organization, it must then be used by all information providers covering the service area and implemented as soon as possible. In this connection, they also stated that the use of recognized services by ships was an option, and the availability of this option should be ensured by disseminating the information through all recognized services, with no restriction on services availability for ships operating in different ocean regions.

12.7 Some delegations recommended that the NCSR Sub-Committee be instructed to prepare amendments to MSI and SAR-related instruments and, if necessary, to the SOLAS Convention to clarify this understanding, while others indicated that it would be premature to start developing amendments and that the Committee should first wait for the result of technical considerations and the subsequent decision on whether to make the use of all recognized services mandatory for information providers.

12.8 Views were also expressed that:

- .1 the implementation of new services recognized by the Organization was considered to be critical for the Global Maritime Distress and Safety System (GMDSS) and for mariners depending on the reception of such information;
- .2 the recognition of new services was intended, among others, to extend the coverage area of existing services at no additional cost to information providers and shipowners;
- .3 the consideration of technical solutions, including the implementation of the Application Programming Interface (API) standard developed by IHO in collaboration with the RMSS providers, should not delay the implementation of the Iridium SafetyCast service; and
- .4 a revision of resolution A.707(17) was necessary to address cost implications for information providers.

12.9 Following the discussion, the Committee:

- .1 acknowledged the efforts and contribution of NAVAREA and METAREA Coordinators and SAR authorities to provide timely information to ships navigating within their service areas for the benefit of the whole shipping community;
- .2 agreed that dissemination of MSI and SAR-related information was an integral service of the GMDSS and critical to preserving the safety of life at sea and, therefore, once a mobile satellite service was recognized by the Organization, it must then be used by all information providers covering its service area;

- .3 to that end, agreed also to instruct the NCSR Sub-Committee to continue considering technical solutions for the dissemination and reception of MSI and SAR-related information over multiple services, including interoperability issues and broadcast monitoring, with a view to addressing the operational and financial burden of disseminating the information to ships;
- .4 urged information providers to take the necessary actions to expedite the use of all RMSSs that provide services within their service areas for the dissemination of information to ships navigating in those areas and to keep the information updated in the GMDSS Master Plan module of GISIS as and when planning and implementation were progressed; and
- .5 also instructed the NCSR Sub-Committee to consider any necessary amendments to existing MSI-related instruments, including the SOLAS Convention, if necessary, in order to clarify the understanding of dissemination of information through all recognized mobile satellite services.

12.10 Commenting on the above, a number of delegations expressed concern regarding some of the conclusions and, in particular, the reference that information providers must use all services after recognition and urging them to use all services without considering first the results of technical considerations by the NCSR Sub-Committee. In this regard, it was noted that the conclusion was not calling for immediate implementation of the decisions of the Committee and that this would be progressed simultaneously with the consideration of technical solutions, interoperability issues, cost implications and the preparation of any necessary amendments to the SOLAS Convention and other instruments, as appropriate.

Options to address cost implications for information providers

12.11 With regard to options to address cost implications for information providers concerning the dissemination of information over multiple RMSSs, as reported by the Correspondence Group (MSC 105/12, remaining parts) and commenting documents MSC 105/12/1, MSC 105/12/3 and MSC 105/12/4, the Committee, having noted the discussions and progress made by the Correspondence Group, agreed to refer the matter to a working group for further consideration and advice, as appropriate.

12.12 In this regard, and in view of the instructions given to the NCSR Sub-Committee (see paragraph 12.9), it was noted that the consideration of technical solutions and interoperability issues could also contribute to addressing cost implications for information providers.

Establishment of the Working Group

12.13 Having considered the above matters, the Committee established the Working Group on Cost Implications for MSI and SAR Information Providers, chaired by Mr. Trond Ski (Norway), and instructed it, taking into account comments made and decisions taken in plenary, as well as all documents submitted under this agenda item, to consider options to address cost implications for MSI and SAR information providers concerning the dissemination of information over multiple RMSSs, and advise the Committee, as appropriate.

Report of the Working Group

12.14 The Committee approved the report of the Working Group (MSC 105/WP.9) in general and took action as follows, starting with the general consideration of the report, when the following comments were made:

- .1 the Group had given only initial consideration to the options to address cost implications and more work would still be required; this could also include a combination of several options;
- .2 in the absence of clear policy direction, the Committee should instruct the NCSR Sub-Committee to consider cost options, identify advantages and disadvantages and provide a scoring, in order to assist the Committee in taking a final decision;
- .3 the consideration of options should continue in parallel with technical considerations; however, the scoring of options would not favour some of the coastal States responsible for the dissemination of MSI and SAR-related information, in particular developing countries;
- .4 the need to prioritize the consideration of technical issues, including interoperability and interconnectivity issues, was emphasized;
- .5 while the importance of safety of life at sea was recognized, information providers should not be made responsible for bearing additional costs due to the recognition of new mobile satellite services;
- .6 it was important to note the offer by Iridium (MSC 105/WP.9, paragraph 14), that they had deferred charging MSI information providers for the last two years to facilitate the onboarding process and that rescue coordinating centres were not being charged; and that Iridium would continue to defer charging to Member States that had informed IMO about having financial difficulties for the implementation of the Iridium SafetyCast service; and
- .7 while the offer by Iridium was greatly appreciated, this was just a temporary measure and a definitive solution would be required.

12.15 The Chair, recalling the previous decisions of the Committee (see paragraph 12.9), noted that this was not a political issue, but rather an issue of safety of life at sea that had technical and financial implications.

12.16 The Committee urged MSI providers to make the necessary efforts to provide MSI on all RMSSs, and recognized their efforts for safety of navigation and safety of life at sea, which were of paramount importance.

12.17 The Committee, having noted that the Group had not been able to conclude on any particular option to address cost implications for information providers concerning the dissemination of information over multiple RMSSs:

- .1 invited information providers, as a provisional approach, to explore cost reduction options, as indicated in paragraph 13.1 of the report of the Working Group, taking also into account the offer by Iridium (MSC 105/WP.9, paragraph 14);
- .2 invited Member States to request, if necessary, technical assistance from the IMO Secretariat, as appropriate;

- .3 invited interested parties to actively participate in the deliberations of the NCSR Sub-Committee concerning technical solutions for the dissemination of MSI and SAR-related information over multiple RMSSs, including interoperability and interconnectivity issues; and
- .4 also invited interested parties to actively participate in further deliberations on cost implications, with a view to arriving at a definitive solution, including the possibility of requesting financial assistance from the IMO Secretariat and, if necessary, considering the need to establish a mandatory fund.

12.18 The Committee also:

- .1 invited RMSS providers to make technical presentations at NCSR 9 to assist with its deliberations;
- .2 agreed that resolution A.707(17) should be revised to take into account current RMSSs and anticipate the recognition of services by further providers and, in this respect, instructed the NCSR Sub-Committee to start revising the resolution; and
- .3 referred document MSC 105/12/3 (China) to NCSR 9 for technical consideration, as appropriate, including for addressing interconnectivity issues.

12.19 Some delegations expressed the view that the NCSR Sub-Committee, when revising resolution A.707(17), should carefully consider the timing of the adoption of such a revision and any potential impact on the existing Public Service Agreements with RMSS providers, as well as any consequential amendments to other instruments.

12.20 Regarding the comment made in paragraph 12.14.2, the Committee instructed the NCSR Sub-Committee to further consider the cost options, identify advantages and disadvantages, and advise the Committee, as appropriate. The Committee did not agree with the proposal to provide a scoring of options.

12.21 The delegation of Argentina, supported by several delegations, stated that the recognition of new services contributed to higher maritime safety; however, for an obligation to be truly viable, it would be necessary not only to state it in a document, but also to duly address two aspects, i.e. to explore and identify technical solutions that could fully or partially resolve the increased costs through, for example, an interface (API), and to consider and identify one or more options so that, at least, MSI and shore-to-ship SAR messages would not entail higher costs for NAVAREA and METAREA Coordinators. The full text of the statement is set out in annex 43.

13 IMPLEMENTATION OF IMO INSTRUMENTS

Report of III 7

13.1 The Committee recalled that MSC 104 had considered urgent matters emanating from III 7 and taken action, as recorded in document MSC 104/18, paragraphs 13.1 to 13.10.

13.2 The Committee approved, in general, the report of the seventh session of the Sub-Committee on Implementation of IMO Instruments (III) (III 7/17 and Add.1, and MSC 105/13) and took action as indicated below.

Extension of the mandatory carriage requirement for electronic inclinometers

13.3 The Committee recalled that MSC 101, having considered documents MSC 101/21/14 and MSC 101/INF.9 (Germany), proposing the development of SOLAS amendments to make the *Performance standards for electronic inclinometers* (resolution MSC.363(92)) mandatory for container ships and bulk carriers, had included in the post-biennial agenda of the Committee an output on "Development of SOLAS amendments for mandatory carriage of electronic inclinometers on container ships and bulk carriers", with one session needed to complete the item, assigning the NCSR Sub-Committee as the coordinating organ.

13.4 The Committee also recalled that MSC 101 had agreed that the new mandatory requirement should not apply retroactively to existing ships and instructed the Sub-Committee to take this into account accordingly.

13.5 In this regard, the Committee noted that III 7, after having considered document III 7/4/7 (Germany et al.) on the **MSC Zoe** marine safety investigation report and document III 7/1/1/Add.1 commenting on it, had recommended to revise the scope of the output agreed by MSC 101 on "Development of SOLAS amendments for mandatory carriage of electronic inclinometers on container ships and bulk carriers" by extending the requirement for the mandatory carriage of electronic inclinometers to all SOLAS ships of more than 3,000 GT.

13.6 During the discussion on the matter, all delegations that intervened reiterated that the new mandatory requirements should not apply retroactively to existing ships, in line with the decision of MSC 101 (see paragraph 13.4). With respect to a possible extension of the new output to all SOLAS ships of more than 3,000 GT, views of delegations were split between those in favour of an extension and those against.

13.7 In light of the foregoing, the Committee, having noted that this output was already on the agenda of NCSR 9, instructed the NCSR Sub-Committee to consider the proposal to extend the mandatory carriage of electronic inclinometers to all SOLAS ships of more than 3,000 GT and to advise the Committee, as appropriate.

13.8 The Committee re-confirmed the decision of MSC 101 that the new mandatory requirements should not apply retroactively to existing ships (see paragraph 13.4).

Interim guidance on control and compliance measures to enhance maritime security (resolution MSC.159(78))

13.9 The Committee authorized the Sub-Committee to review the *Interim guidance on control and compliance measures to enhance maritime security* (resolution MSC.159(78)) with a view to inclusion as a new appendix to the *Procedures for port State control* in a future version, in accordance with the methodology agreed by the Committees, noting that the resolution made reference to IMO instruments which in the meantime had been revoked or superseded.

Analysis of consolidated audit summary reports

13.10 With regard to the outcome of the analysis of the four consolidated audit summary reports (CASRs) under the IMO Member State Audit Scheme (IMSAS), the Committee, subject to a concurrent decision by MEPC 78:

- .1 endorsed the outcome of the analysis of the four CASRs regarding the five main areas of recurrent findings and observations, the highest numbers of

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- references recorded against the specific provisions of the mandatory IMO instruments, and the four main areas of root causes (III 7/17, paragraphs 7.13 to 7.17 and annex 4, appendices 1, 2 and 3);
- .2 noted the identified areas that might need technical assistance to be forwarded to TCC for consideration and reporting to the Council, as appropriate (III 7/17, paragraphs 7.18 to 7.21 and annex 4, appendix 4);
 - .3 initiated a review of the appropriateness and effectiveness of the provisions identified for review, and referred the initial analysis of the criteria for the determination of the appropriateness and effectiveness to the NCSR, III and HTW Sub-Committees (paragraphs 7.22 to 7.26 and 7.27.1 and annex 4, appendix 5). In particular, the Committee decided to refer the following four provisions to the aforementioned Sub-Committees, as appropriate, for review/revision, which might include development of relevant amendments or guidelines/interpretations, and reporting back to the Committee, while requesting the Secretariat to provide those Sub-Committees with additional background information in relation to each provision referred to them for review:
 - .1 SOLAS regulation IV/5 (Provision of radiocommunication services) to the NCSR Sub-Committee. In this regard, the Committee instructed III 8 to first prepare a justification for a new output, to be submitted to MSC 106 for approval;
 - .2 SOLAS regulation XI-1/6 (Additional requirements for the investigation) to the III Sub-Committee under its existing agenda item "Lessons learned and safety issues identified from the analysis of marine safety investigation reports" (7.4); and
 - .3 STCW regulations I/7 (Communication of information) and I/8 (Quality standards) to the HTW Sub-Committee under its existing agenda item "Implementation of the STCW Convention" (1.32);
 - .4 referred, on the basis of the initial analysis of the criteria for determining the appropriateness and effectiveness, the identified 10 provisions to TCC for consideration in the context of possible additional technical assistance and subsequent reporting back to the Council (III 7/17, paragraphs 7.25 and 7.27.3 and annex 4, appendix 5);
 - .5 concurred with the format of the tracking log of the provisions recommended for review by the Committees and with the format of the overall feedback (III 7/17, paragraphs 7.28, 7.29 and 7.32 and annex 4, appendices 1 to 6) and, in this connection, requested the III Sub-Committee to include background information in relation to provisions recommended for review of appropriateness and effectiveness as part of the methodology and overall feedback in future analyses of CASRs; and
 - .6 agreed to report to the Council on the outcome of the Committees' consideration of the four CASRs (III 7/17, paragraph 7.33) and, in this connection, requested the Secretariat to provide the Council with a note containing a summary of the decisions of the Committee relating to methodology, reporting process and format of the overall feedback from the analysis of CASRs.

List of certificates and documents required to be carried on board ships, 2022

13.11 The Committee approved, concurrently with LEG 109 and subject to a concurrent decision by MEPC and FAL, the draft joint circular FAL.2-MEPC.1-MSC.1-LEG.2 on *List of certificates and documents required to be carried on board ships, 2022*, as set out in annex 29, to be issued as MSC.1/Circ.1646 after concurrent approval, noting that the items related to the amendments to MARPOL Annexes I, IV and VI regarding measures to reduce carbon intensity of international shipping and unmanned non-self-propelled (UNSP) barges, as adopted by resolutions MEPC.330(76) and MEPC.328(76), respectively, were in square brackets, pending acceptance of the associated amendments to MARPOL Annexes I, IV and VI.

Alignment and integration of actions in favour of both seafarers and fishers

13.12 With respect to the handling of issues related to the abandonment and fair treatment of seafarers, the Committee endorsed, concurrently with LEG 109, the III Sub-Committee's recommendation on alignment and integration of actions in favour of both seafarers and fishers, recognizing that both were often confronted with the same kind of problems, which had become even more serious in the context of the COVID-19 pandemic.

14 CARRIAGE OF CARGOES AND CONTAINERS**Report of CCC 7**

14.1 The Committee approved, in general, the report of the seventh session of the Sub-Committee on Carriage of Cargoes and Containers (CCC) (CCC 7/15 and MSC 105/14) and took action as indicated below.

Draft Interim guidelines for the safety of ships using fuel cell power installations

14.2 The Committee approved MSC.1/Circ.1647 on *Interim guidelines for the safety of ships using fuel cell power installations*.

Application of high manganese austenitic steel for cryogenic service

14.3 With regard to the application of high manganese austenitic steel for cryogenic service, the Committee approved:

- .1 draft amendments to the IGC and IGF Codes, as set out in annexes 30 and 31, respectively, and requested the Secretary-General to circulate them in accordance with SOLAS article VIII, with a view to adoption at MSC 106;
- .2 MSC.1/Circ.1648 on *Amendments to the Guidelines for the acceptance of alternative metallic materials for cryogenic service in ships carrying liquefied gases in bulk and ships using gases or other low-flashpoint fuels* (MSC.1/Circ.1622); and
- .3 MSC.1/Circ.1599/Rev.2 on *Revised guidelines on the application of high manganese austenitic steel for cryogenic service* (MSC.1/Circ.1599/Rev.1).

Draft amendments to the IMSBC and IMDG Codes and associated circulars

14.4 The Committee noted that the draft amendments to the IMSBC and IMDG Codes (MSC 105/3/1 and MSC 105/3/2) and the associated circulars, as finalized by E&T 35 directly after CCC 7, had been considered under agenda item 3 (see paragraphs 3.56 to 3.59).

Guidelines for the implementation of inspection programmes for cargo transport units

14.5 The Committee approved MSC.1/Circ.1649 on *Guidelines for the implementation of inspection programmes for cargo transport units* and encouraged Member States and international organizations to implement them. In this regard, the Committee also approved the associated MSC.1/Circ.1650 on *List of voluntary guidance on pest contamination*.

14.6 Having noted a statement by the observer from WSC (full text set out in annex 43) appreciating the involvement of the Organization in the International Plant Protection Convention (IPPC)'s activities regarding container cleanliness, the Committee:

- .1 reiterated the importance of IMO's involvement in the work of IPPC regarding the pest risks associated with the movement of CTUs and their cargoes; and
- .2 requested the Secretariat to continue to follow closely the work of IPPC, in particular on the implementation of the *Guidelines for the implementation of the inspection programmes for cargo transport units* (MSC.1/Circ.1649) (see paragraph 14.5) and to participate in its work with regard to sea containers.

Unified interpretations of the IGC Code

14.7 The Committee approved MSC.1/Circ.1651 on *Amendment to MSC.1/Circ.1625 on Unified interpretations of the IGC Code (as amended by resolution MSC.370(93))*.

Extension of the Sub-Committee's meeting time

14.8 The Committee agreed to an extension of the Sub-Committee's meeting time to eight days (while maintaining four days interpretation in plenary) for two sessions starting with CCC 8 in 2022, subject to endorsement by the Council.

Development of safety requirements to support achievement of the decarbonization goal

14.9 As agreed under agenda item 2 (see paragraph 2.4), following the decisions of A 32 regarding the development of safety requirements to support the achievement of the decarbonization goal, the Committee considered documents:

- .1 A 32/12/2 (IACS), discussing an approach to address the multidimensional challenge posed by the pace of development of technology, decarbonization ambition and the necessary detailed requirements and regulations to deliver a safe zero-CO₂-emitting ship; and
- .2 MSC 105/2/2 (IACS), following up on document A 32/12/2, considering aspects of an approach and offering preliminary views on the risks associated with the options currently researched and trialled to deliver a safe zero-CO₂-emitting ship.

14.10 In this regard, the Committee, taking into account the close relation between the proposals in the two documents and the work of the CCC Sub-Committee on the development of amendments to the IGF Code and safety guidance for low-flashpoint fuels, recalled that:

- .1 MSC 102 had changed the target completion year of the existing output on "Amendments to the IGF Code and development of guidelines for low-flashpoint fuels" to "continuous", taking into account the work plan related to the development of safety provisions for several alternative fuels under the IGF Code; and
- .2 both MSC 104 and MEPC 76, noting the close relation between safety and environmental aspects in order to support the achievement of the decarbonization goal, had noted the work plan prepared by CCC 7 for the development of provisions for new low-flashpoint fuels under the IGF Code, which included ongoing and planned development of safety provisions for several alternative fuels.

14.11 Subsequently, the Committee:

- .1 thanked IACS for its submissions, in particular for raising matters concerning the development of safety requirements to support the achievement of the decarbonization goal and recognizing the related work of the CCC Sub-Committee;
- .2 reiterated its commitment to ensuring the safety of shipping in the wake of new technical solutions and new fuels investigated in pursuance of GHG reduction targets as set by IMO; and
- .3 instructed CCC 8 to further consider documents A 32/12/2 and MSC 105/2/2, and matters related to the development of safety requirements to support the achievement of the decarbonization goal, in the context of its work on the development of the IGF Code and safety provisions for alternative fuels, and advise the Committee on how best to proceed.

15 SHIP DESIGN AND CONSTRUCTION

REPORT OF SDC 8

15.1 The Committee approved, in general, the report of the eighth session of the Sub-Committee on Ship Design and Construction (SDC) (SDC 8/18 and addenda, and MSC 105/15) and took action, as indicated below.

Safety measures for ships carrying industrial personnel

New SOLAS chapter XV

15.2 The Committee approved the draft new SOLAS chapter XV on Safety measures for ships carrying industrial personnel, as set out in annex 32, making the new draft International Code of Safety for Ships Carrying Industrial Personnel (IP Code) mandatory, and requested the Secretary-General to circulate the new chapter in accordance with SOLAS article VIII, with a view to adoption at MSC 106 for entry into force on 1 July 2024, as an exemption from the four-year SOLAS amendment cycle, as agreed by MSC 102 (MSC 102/24, paragraph 17.15).

New International Code of Safety for Ships Carrying Industrial Personnel (IP Code)

15.3 Having approved the new SOLAS chapter XV, the Committee considered the draft MSC resolution on Adoption of the International Code of Safety for Ships carrying Industrial Personnel (IP Code) and, in this respect, considered a proposal by China to incorporate consequential changes to the draft Record of Equipment for the IP Code Certificate (Form IP), by deleting carriage requirements for radio installations, search and rescue locating devices and two-way VHF apparatus following the adoption of amendments to SOLAS certificates.

15.4 Subsequently, the Committee requested the Drafting Group on Amendments to Mandatory Instruments (see paragraph 3.50) to consider the matter in detail and advise the Committee accordingly.

15.5 Having considered the relevant part of the report of the Drafting Group (MSC 105/WP.7, paragraphs 30 and 31), the Committee noted the conclusion of the Group that the carriage of radio installations, search and rescue locating devices and two-way VHF apparatus was still a requirement under SOLAS chapter IV, as amended by the Committee at this session, and, therefore, deleting the reference to radio installations in life-saving appliances without adding it somewhere else could lead to unexpected consequences.

15.6 Having agreed with the recommendation of the Group, the Committee invited interested Member States and international organizations to submit relevant proposals for further consideration of the matter to MSC 106.

15.7 Subsequently, the Committee approved, in principle, the draft MSC resolution on *Adoption of the International Code of Safety for Ships carrying Industrial Personnel (IP Code)*, as set out in annex 33, with a view to adoption in conjunction with the associated new SOLAS chapter XV at MSC 106.

Second phase of work related to the IP Code

15.8 Having considered the need for future work on SOLAS chapter XV and the IP Code, the Committee agreed to a second phase of work (SDC 8/18, paragraph 4.13) to address outstanding matters, including clarifying the interaction between the IP and SPS Codes, incorporating provisions for passenger ships and, with respect to high-speed craft carrying IP, and provisions for sleeping berths and for high-speed craft carrying more than 60 persons, under the new output title "Further development of the IP Code and associated guidance" (see also paragraph 18.54).

Explanatory notes to the Interim guidelines on the second generation intact stability criteria

15.9 The Committee noted that, owing to the close proximity of SDC 8 to this session of the Committee, the very bulky Explanatory Notes had not yet been issued in their entirety (SDC 8/18, annex 4, as set out in addenda 1 to 6 of the report) because they were still being edited with regard to formatting, formulas and identified inconsistencies.

15.10 Having established that the outstanding work was related to editorial corrections only, the Committee approved MSC.1/Circ.1652 on *Explanatory notes to the interim guidelines on the second generation intact stability criteria*, based on document SDC 8/WP.4 and its addenda, and authorized the Secretariat to make the necessary corrections before dissemination of the circular, in consultation with the stability experts who attended SDC 8.

15.11 Having approved the Explanatory Notes, the Committee noted that, while the work under the related output had been completed, SDC 8 had invited Member States and international organizations to further study the application of the *Interim guidelines on the second generation intact stability criteria* (MSC.1/Circ.1627) and the associated Explanatory Notes (MSC.1/Circ.1652), and to submit reports on the experience gained with their application to future sessions of the Sub-Committee under the agenda item "Any other business".

Draft amendments to the 2011 ESP Code

15.12 The Committee approved draft amendments to the 2011 ESP Code, as set out in annex 34, prepared by SDC 8 in accordance with the procedure for undertaking regular updates of the Code agreed by MSC 92 (MSC 92/26, paragraph 13.31), and requested the Secretary-General to circulate them in accordance with SOLAS article VIII, with a view to adoption at MSC 106.

Amendments to the Revised guidelines on alternative design and arrangements for SOLAS chapters II-1 and III (MSC.1/Circ.1212/Rev.1)

15.13 The Committee noted the progress made by SDC 8 on developing draft amendments to MSC.1/Circ.1212/Rev.1 to include goals, functional requirements and expected performances of SOLAS chapter II-1, parts C, D and E; and that SDC 8 had agreed to a time frame for their development (SDC 8/18, paragraph 9.11).

Unified interpretation regarding timber deck cargo in the context of damage stability requirements

15.14 Having noted that IACS had updated its UI SC161, which formed the basis for the *Unified interpretation regarding timber deck cargo in the context of damage stability requirements* (MSC/Circ.998), following several SOLAS amendments and the replacement of the 1991 Timber Code by the 2011 TCD Code, the Committee approved MSC.1/Circ.1653 on *Unified interpretation regarding timber deck cargo in the context of damage stability requirements*, superseding MSC/Circ.998.

Unified interpretation on the noise level limit in workshops on board ships

15.15 The Committee approved MSC.1/Circ.1654 on *Unified interpretation on noise level limit in workshops on board ships*, with the intention of protecting ships' crew from hearing damage.

Unified interpretations relating to the 1988 Load Lines Protocol

15.16 The Committee considered draft amendments to MSC.1/Circ.1535/Rev.1 to clarify freeboard deductions for superstructures and trunks for type-B ships and subsequently approved MSC.1/Circ.1535/Rev.2 on *Unified interpretations relating to the Protocol of 1988 relating to the International Convention on Load Lines, 1966*.

Unified interpretation of SOLAS chapter II-1 (MSC.1/Circ.1362)

15.17 After consideration of the draft unified interpretations of SOLAS regulations II-1/5.4 and II-1/5.5 requiring amendments to the stability/loading information in conjunction with the alterations of lightweight, the Committee approved MSC.1/Circ.1362/Rev.1 on *Unified interpretation of SOLAS chapter II-1*.

Revised performance standards for water level detectors on ships

15.18 The Committee considered draft amendments to the *Performance standards for water level detectors on bulk carriers and single hold cargo ships other than bulk carriers* (resolution MSC.188(79)), consequential to the adoption of new SOLAS regulation II-1/25-1 requiring the installation of water level detectors on multiple hold cargo ships other than bulk carriers and tankers (resolution MSC.482(103)).

15.19 In this regard, the Committee had for its consideration document MSC 105/15/1 (Belgium et al.), providing clarification on paragraph 2.2.2 of the appendix to the draft revised Performance standards and proposing a change thereto with respect to the measurement of installation height of sensors.

15.20 Some delegations expressed concerns that the current paragraph 2.2.2 of the appendix to the draft revised Performance standards was drafted such that it applied to all regulations addressing the location of sensors and, therefore, references should be made to all applicable regulations, and not just those proposed in document MSC 105/15/1.

15.21 Having considered the matter further, the Committee did not agree to the changes proposed in document MSC 105/15/1 and requested the SDC Sub-Committee to consider the document at its next session and to place the output on the provisional agenda of SDC 9.

15.22 Notwithstanding the above decision, the Committee adopted resolution MSC.188(79)/Rev.1 on *Revised performance standards for water level detectors on ships subject to SOLAS regulations II-1/25, II-1/25-1 and XII/12*, as set out in annex 35.

Review of the Guidelines for the reduction of underwater noise from commercial shipping to address adverse impacts on marine life (MEPC.1/Circ.833)

15.23 The Committee noted the progress made in reviewing the *Guidelines for the reduction of underwater noise from commercial shipping to address adverse impacts on marine life* (MEPC.1/Circ.833) and that SDC 8 had agreed to a work plan for the revision of the Guidelines and the identification of next steps (SDC 8/18, annex 11).

Outputs on the Committee's post-biennial agenda assigned to the SDC Sub-Committee

15.24 Following the instruction of MSC 104 to its subsidiary bodies to review the list of outputs in the post-biennial agenda of the Committee for matters under their respective purviews and to advise whether any outputs should be removed, the Committee noted that SDC 8 had reviewed the following two outputs for which it had been assigned responsibilities and subsequently invited the Committee to:

- .1 keep the output on the "Review of the Guidelines for use of fibre-reinforced plastics (FRP) within ship structures (MSC.1/Circ.1574)" on its post-biennial agenda; and
- .2 lift the output on "Revision of the Interim explanatory notes for the assessment of passenger ship systems' capabilities after a fire or flooding casualty (MSC.1/Circ.1369) and related circulars" from the post-biennial agenda to the provisional agenda of SDC 9.

15.25 Having noted the considerations of SDC 8 regarding its review of the list of outputs in the post-biennial agenda under its purview, the Committee decided to consider this matter under agenda item 18 (Work programme) (see paragraph 18.54).

Consideration of amendments to SOLAS chapter XII and revision of associated unified interpretations

15.26 The Committee recalled that MSC 103 had considered a proposal for a new output to amend SOLAS chapter XII and to revise the *Unified interpretations of SOLAS regulations XII/4.2 and XII/5.2* (MSC/Circ.1178), as contained in document MSC 102/21/9/Rev.1 (Brazil et al.), and consequently had instructed the SDC Sub-Committee to consider the document, together with the comments in document MSC 102/21/21 (IACS), taking into account the comments made at MSC 103, and to report back to the Committee with a recommendation on the best way forward (MSC 103/21, paragraph 18.23).

15.27 In this regard, the Committee noted that SDC 8 could not conclude on a way forward and had deferred the matter for further consideration to SDC 9.

Guidelines on measures to reduce risks of use and carriage of heavy fuel oil as fuel by ships in Arctic waters

15.28 The Committee noted that SDC 8 had considered a request from PPR 8 to review the draft guidelines on measures to reduce risks of use and carriage of heavy fuel oil as fuel by ships in Arctic waters, with respect to the arrangements of a heavy fuel tank; had agreed that further clarification was needed before concluding on this matter; and had requested PPR 9 to provide such clarification to SDC 9.

Correspondence Group on Revision of the 1979, 1989 and 2009 MODU Codes

15.29 The Committee noted a request by a significant number of delegations to replace the Russian Federation as the coordinator of the Correspondence Group on Revision of the 1979, 1989 and 2009 MODU Codes established at SDC 8, since the ongoing military conflict between the Russian Federation and Ukraine impeded the continuation of business as usual. These delegations were of the view that wide participation and relevant outcomes emanating from the Group should be ensured, and communication issues should be prevented.

15.30 The Russian Federation, supported by a number of delegations, expressed the opinion that coordinators of correspondence groups, as well as Chairs of other technical bodies, were selected based on their skills and proficiency in the subject matter, regardless of their nationality; and replacing the coordinator of the Correspondence Group at this stage, when the work was already ongoing, would impact negatively on the delivery of its mandate. They also highlighted that political considerations should not drive the decisions of IMO, as a technical specialized agency.

15.31 In connection with the above statement, the delegation of China expressed the view that most Chairs and coordinators of IMO organs and established groups were from a few developed countries.

15.32 Consequently, the Committee, having instructed the Secretariat to identify a suitable alternative coordinator, noted that the Correspondence Group on the Review of the 1979, 1989 and 2009 MODU Codes would now be coordinated by the Secretariat.⁵

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16 HUMAN ELEMENT, TRAINING AND WATCHKEEPING

Urgent matters emanating from HTW 8

16.1 The Committee considered urgent matters emanating from the eighth session of the Sub-Committee on Human Element, Training and Watchkeeping (HTW) (HTW 8/16), as outlined in document MSC 105/16/Rev.1 (Secretariat), and took action as indicated below.

Intersessional drafting groups for model courses

16.2 The Committee approved the holding of virtual meetings of three drafting groups, to take place during 2022, to consider draft model courses for validation at HTW 9 (HTW 8/16, paragraphs 3.3, 3.4 and 13.4), and invited the Council to endorse this decision (see also paragraph 18.56).

Holistic approach on the human element

16.3 The Committee invited all relevant IMO bodies to assess their respective involvement in the human element within their remit and report back to the Committee with a view to devising an outline for a holistic approach on the human element, taking into account resource and budgetary implications within the Organization (HTW 8/16, paragraph 4.10). In this regard, the Committee requested the Secretariat to assist relevant bodies with the above assessment, in order to provide appropriate information for future action, as appropriate.

Revised checklist for considering and addressing the human element

16.4 The Committee approved the draft revised checklist for considering and addressing human element issues and associated draft amendments to the Organization and method of work of the MSC and the MEPC and their subsidiary bodies (MSC-MEPC.1/Circ.5/Rev.2), and the associated draft MSC-MEPC circular, to be issued as MSC-MEPC.1/Circ.5/Rev.3, as set out in annex 36, subject to a concurrent decision by MEPC 78 (HTW 8/16, paragraph 4.16 and annex 4).

Application of casualty cases and lessons learned to seafarers' education and training

16.5 The Committee noted that the Sub-Committee had agreed to a draft guidance framework for the application of casualty cases and lessons learned to seafarers' education and training; had invited III 8 to review and update the information in the appendix to the draft guidance, for approval by the Committee; and had invited interested Member States and international organizations to provide contributions to III 8 to enable finalization of the appendix at that session (HTW 8/16, paragraphs 4.17 and 4.18, and annex 2 to document HTW 8/WP.7).

International Code of Safety for Ships Carrying Industrial Personnel (IP Code)

16.6 The Committee noted that the Sub-Committee had not reached agreement on whether crowd management training would be necessary for seafarers on IP-certified ships, all cargo ships, or would not be necessary in any case; and had invited interested Member States and international organizations to submit relevant proposals for a new output to the Committee, as appropriate, taking into account the comments made at HTW 8 (HTW 8/16, paragraphs 15.8 and 15.9).

Onshore power supply service in-port for ships engaged on international voyages

16.7 The Committee noted that the outcome of HTW 8's consideration of the familiarization of personnel provisions of the draft interim guidelines on safe operation of onshore power supply service in-port for ships engaged on international voyages, together with an inconsistency identified concerning the definition of "high-voltage", had been referred to the SSE Sub-Committee for further consideration and action, as appropriate, as part of its ongoing work on the draft interim guidelines (HTW 8/16, paragraph 15.19).

Coordination of the Correspondence Group on Maritime Training

16.8 The Committee noted a request by a significant number of delegations to replace the Russian Federation as the coordinator of the Correspondence Group on Maritime Training established at HTW 8, since the ongoing military conflict between the Russian Federation and Ukraine impeded the continuation of business as usual. These delegations were of the view that wide participation and relevant outcomes emanating from the Group should be ensured, and communication issues should be prevented.

16.9 The Russian Federation, supported by a number of delegations, expressed the opinion that coordinators of correspondence groups, as well as Chairs of other technical bodies, were selected based on their skills and proficiency in the subject matter, regardless of their nationality; and replacing the coordinator of the Correspondence Group at this stage, when the work was already ongoing, would impact negatively on the delivery of its mandate. They also highlighted that political considerations should not drive the decisions of IMO, as a technical specialized agency.

16.10 Taking into account that only urgent matters emanating from HTW 8 had been considered at this session, the Committee agreed that the current coordinator of the Correspondence Group on Maritime Training would continue their work until MSC 106, when the full report of the Sub-Committee would be considered; and encouraged Member States and international organizations to participate in the Correspondence Group and contact the Secretariat in case of communication problems with the coordinator, so that assistance could be provided.

Terms of reference of the Joint ILO/IMO Tripartite Working Group (JTWG) to identify and address seafarers' issues and the human element and related documents***Terms of reference of the JTWG***

16.11 The Committee noted that LEG 109 (LEG 109/16, paragraph 4(c).4), following approval of the establishment of the JTWG to identify and address seafarers' issues and the human element by the 343rd session of the ILO Governing Body (October-November 2021), had noted that the first meeting, which would deal with the guidelines for port State and flag State authorities on how to deal with seafarer abandonment cases, was expected to take place during the second half of 2022; and a second meeting, on the issue of fair treatment of seafarers detained on suspicion of committing maritime crimes, in 2024.

16.12 Having considered document MSC 105/16/2 (Secretariat), providing the terms of reference of the JTWG, as approved by the 343rd session of the ILO Governing Body, the Committee:

- .1 noting that this was a multi-committee group, invited the Council to consider and decide on IMO's eight Government representatives in the Group, based on input from the Secretary-General, giving due consideration to

geographical representation, taking into account that all IMO Members could attend as observers and participate in the debates without decision-making power; and

- .2 approved the establishment of a Joint IMO/ILO Tripartite Working Group to identify and address seafarers' issues and the human element, including the method of work and terms of reference, as set out in annex 37, subject to endorsement by the Council.

Related documents

16.13 The Committee considered the following related documents:

- .1 MSC 105/16/3 (Australia et al.), proposing mandating the JTWG to consider sexual assault and harassment in the maritime sector, specifically under paragraph 4(c) of its terms of reference (MSC 105/16/2, appendix to the annex), with a view to providing recommendations for future steps to address sexual assault and harassment, and change the maritime culture; and
- .2 MSC 105/16/5 (France et al.), proposing that:
 - .1 IMO, with the support of its Member States and governmental and non-governmental organizations, should initiate a campaign to promote the implementation of international policies to combat harassment and bullying in the maritime sector;
 - .2 Member States should implement mechanisms for the notification and control of cases of bullying and harassment, adopt relevant policies and legislation to protect seafarers, and share information on relevant cases and corrective actions with the JTWG; and
 - .3 shipping companies should implement internal monitoring, reporting and prevention policies, as well as procedures aimed at eliminating all forms of bullying and harassment on board ships and take corrective action against persons engaging in unacceptable behaviour and practices of this nature.

16.14 Having recognized the need for joint action with ILO to tackle bullying and harassment in the maritime sector, including sexual assault and sexual harassment, with the objective of ensuring a safe workplace for seafarers, the Committee:

- .1 instructed the JTWG (under paragraph 4(c) of its terms of reference) to "consider bullying and harassment in the maritime sector, including sexual assault and sexual harassment, taking into account information submitted by interested parties, with a view to providing recommendations for future steps, including the development of legislation, mechanisms and policies, and the launching of awareness campaigns by relevant stakeholders, aimed at reporting and addressing these matters", subject to endorsement by the Council;
- .2 invited Member States and international organizations to submit relevant information on these matters directly to the JTWG, as and when the meeting was convened;

- .3 requested the Secretariat to contact the ILO Secretariat in order to:
 - .1 notify ILO of these decisions, for agreement by the ILO Governing Body; and
 - .2 set a suitable date for the holding of the meeting of the JTWG at the earliest opportunity; and
- .4 encouraged:
 - .1 Member States to implement mechanisms and adopt relevant policies and legislation to protect seafarers; and
 - .2 shipping companies to implement internal monitoring, reporting and prevention policies, as well as procedures aimed at eliminating all forms of bullying and harassment on board ships and to take corrective action against persons engaging in unacceptable behaviour and practices of this nature.

Proposed amendments to Model Course 1.21

16.15 The Committee noted that HTW 8 had considered document HTW 8/3/5 (Dominica), proposing to increase the priority for the revision of Model Course 1.21 (Personal Safety and Social Responsibilities), with a view to including specific content to establish appropriate maritime workplace behavioural norms and essential human elements of psychological safety.

16.16 In this regard, the Committee considered document MSC 105/16/4 (Dominica et al.), proposing that Model Course 1.21 be revised and amended to include elements of psychological safety and to deal with trauma and trauma response, subject to agreement by the Committee at this session; and to increase the priority of a comprehensive revision of this model course.

16.17 In considering the above proposals, the Committee noted the following views:

- .1 a multipronged approach would be necessary to address psychological safety and maritime workplace behavioural norms, where education and training played a paramount role;
- .2 since the matters addressed in these documents were within the remit of ILO (Violence and Harassment Convention, 2019 (No.190) and MLC, 2006) rather than IMO, the JTWG to identify and address seafarers' issues and the human element should work on these matters within its new term of reference (see paragraph 16.14.1);
- .3 training provisions to identify relevant competence and knowledge should be developed as a matter of priority;
- .4 Model Course 1.21 should be properly revised, and the process approved by MSC and MEPC for the development and revision of model courses should be adhered to; and
- .5 IMO only validated model courses, which were meant to assist with the development of training programmes, and Administrations were not obliged to use them when preparing and approving training courses.

16.18 Taking into account the actions already taken in relation to the JTWG to identify and address seafarers' issues and the human element (see paragraph 16.14), the Committee:

- .1 confirmed that the JTWG should consider the development of training provisions addressing bullying and harassment in the maritime sector, including sexual assault and sexual harassment, within its new term of reference (see paragraph 16.14.1); and
- .2 instructed the HTW Sub-Committee to develop and finalize, as a matter of priority, STCW training provisions addressing bullying and harassment in the maritime sector, including sexual assault and sexual harassment, as part of the new output on "Comprehensive review of the 1978 STCW Convention and Code" approved at this session (see paragraph 18.13), taking into account the work to be done in coordination with the JTWG.

16.19 The Committee noted an intervention by the delegation of Argentina, highlighting the importance of a comprehensive approach to harassment and violence, which should not be limited to that of a sexual nature and should include other forms of violence and harassment, including that based on gender.

Secretary-General's reports pursuant to STCW regulations

Secretary-General's report pursuant to STCW regulation I/8

16.20 The Committee considered the reports for Azerbaijan, Dominica and the United Kingdom, as set out in document MSC 105/WP.3/Rev.1; confirmed that the information provided demonstrated that these Member States continued to give full and complete effect to the provisions of the STCW Convention; and requested the Secretariat to issue updated information concerning the subsequent reports by means of MSC.1/Circ.1164/Rev.25.

16.21 In this regard, the Committee encouraged Parties to the STCW Convention to submit their subsequent reports, in accordance with sections A-I/7 and A-I/8 of the STCW Code.

Approval of competent persons

16.22 The Committee considered document MSC 105/16/1 (Secretariat), containing information provided by STCW Parties regarding experts made available or recommended for inclusion in the list of competent persons, as well as competent persons withdrawn from the list.

16.23 Following consideration, the Committee:

- .1 approved the inclusion of one competent person recommended by one Party in the *List of competent persons maintained by the Secretary-General pursuant to section A-I/7 of the STCW Code* (MSC.1/Circ.797/Rev.36) and requested the Secretariat to issue the revised list by means of MSC.1/Circ.797/Rev.37;
- .2 noted the competent persons who had been withdrawn from the list by one STCW Party;

- .3 invited STCW Parties to inform the Secretariat of any amendment that the list might require (withdrawals, additions, change of address etc.) with a view to ensuring that the competent persons listed in the latest revision were available to serve and were readily contactable; and
- .4 having thanked those STCW Parties that had nominated competent persons, encouraged all Parties to submit additional nominations to ensure the effective implementation of the provisions of the STCW Convention.

17 APPLICATION OF THE COMMITTEE'S METHOD OF WORK

17.1 Owing to time constraints, the Committee postponed consideration of this agenda item to MSC 106.

18 WORK PROGRAMME

Proposals for new outputs

18.1 The Committee recalled that, owing to time constraints, MSC 104 did not consider 20 proposals for new outputs submitted to that session and had agreed, in principle, not to accept any submissions containing proposals for new outputs for consideration at this session. In this connection, the Committee noted that three documents supplementing or commenting on proposals submitted to MSC 104 (MSC 105/18, MSC 105/18/1 and MSC 105/18/2) had been received for consideration at this session, as well as a proposal for a new output from III 7.

Revision of paragraphs 6.5.1 and 6.5.5 of the 2009 MODU Code

18.2 The Committee considered document MSC 104/15 (Germany et al.) proposing to revise paragraphs 6.5.1 and 6.5.5 of the 2009 MODU Code to clarify the application of requirements to electrical equipment located in spaces other than enclosed spaces and capable of operation after shutdown.

18.3 Consequently, the Committee agreed to include in its post-biennial agenda an output on "Development of amendments to chapter 6 of the 2009 MODU Code regarding electrical equipment capable of operation after shutdown", with one session needed to complete the item, assigning the SSE Sub-Committee as the associated organ.

Enclosed spaces containing a nitrogen receiver or a buffer tank of nitrogen generator systems

18.4 The Committee considered document MSC 104/15/1 (Marshall Islands et al.), proposing a new output to amend chapter 15 (Inert gas systems) of the International Code for Fire Safety Systems (FSS Code).

18.5 Consequently, the Committee agreed to include in its post-biennial agenda an output on "Development of amendments to chapter 15 of the FSS Code on enclosed spaces containing a nitrogen receiver or a buffer tank of nitrogen generator systems", with two sessions needed to complete the item, assigning the SSE Sub-Committee as the associated organ.

18.6 The Committee also agreed, in accordance with MSC.1/Circ.1481 on *Guidance on entry into force of amendments to the 1974 SOLAS Convention and related mandatory instruments* and MSC.1/Circ.1500/Rev.1 on *Guidance on drafting of amendments to the 1974 SOLAS Convention and related mandatory instruments*, that:

- .1 the amendments to be developed should apply to all new ships to which the FSS Code applied on or after date of entry into force;
- .2 the instrument to be amended was the FSS Code; and
- .3 the amendments to be developed should enter into force on 1 January 2028, provided that they were adopted before 1 July 2026.

Review and update of SOLAS regulation II-2/9 on containment of fire

18.7 The Committee considered document MSC 104/15/2 (United Kingdom et al.) proposing to review and update SOLAS regulation II-2/9 on containment of fire to incorporate existing guidance and clarify requirements in SOLAS regulations II-2/9.7.3.1.3 and II-2/9.2.3.3 and tables 9.5 and 9.6, to remove any ambiguities.

18.8 Consequently, the Committee agreed to include in its post-biennial agenda an output on "Review and update SOLAS regulation II-2/9 on containment of fire to incorporate existing guidance and clarify requirements", with two sessions needed to complete the item, assigning the SSE Sub-Committee as the associated organ.

18.9 The Committee also agreed, in accordance with MSC.1/Circ.1481 and MSC.1/Circ.1500/Rev.1, that:

- .1 the amendments to be developed should apply to new ships to which SOLAS chapter II-2 applied;
- .2 the output was to amend SOLAS regulation II-2/9 to incorporate existing guidance and clarify requirements in SOLAS regulations II-2/9.7.3.1.3 and II-2/9.2.3.3 and tables 9.5 and 9.6, to remove any ambiguities; and
- .3 the amendments to be developed should enter into force on 1 January 2028, provided that they were adopted before 1 July 2026.

Guidelines for the use of electronic nautical publications

18.10 The Committee considered document MSC 104/15/4 (Panama et al.) proposing the development of guidelines for the use of electronic nautical publications (ENPs).

18.11 Consequently, the Committee agreed to include in its post-biennial agenda an output on "Development of guidelines for the use of electronic nautical publications (ENPs)", with two sessions needed to complete the item, assigning the NCSR Sub-Committee as the associated organ.

Comprehensive review and revision of the 1978 STCW Convention and Code

18.12 The Committee had for its consideration the following documents:

- .1 MSC 104/15/5 (Australia et al.) proposing a new output to conduct a comprehensive review and revision of the STCW Convention and Code.
- .2 MSC 104/15/33 (Japan) commenting on document MSC 104/15/5 and proposing to:

- .1 initiate the work on this output by determining the scope and principles of the comprehensive review before developing draft amendments to the STCW Convention;
 - .2 focus on identified weak areas rather than conducting a comprehensive review; and
 - .3 separate consideration of matters entailing the review of certain areas of the STCW Convention that were currently being addressed by the HTW Sub-Committee from the work on the comprehensive review; and
- .3 MSC 104/21/38 (ITF), recognizing the need for a comprehensive review of the 1978 STCW Convention and Code and expressing the view that the establishment of a targeted review and revision mechanism would be the most effective way of amending these instruments on a continuous basis, as necessary, in order to keep up with the pace of technological, regulatory and operational developments.

18.13 Following consideration, the Committee:

- .1 agreed to include in the biennial agenda of the HTW Sub-Committee for 2022-2023 and the provisional agenda for HTW 9 an output on "Comprehensive review of the 1978 STCW Convention and Code", with a target completion year of 2026;
- .2 recalled its earlier decision to prioritize the development and finalization of STCW training provisions on bullying and harassment in the maritime sector, including sexual assault and sexual harassment, as part of this output (see paragraph 16.18); and
- .3 instructed the Sub-Committee to start with a preliminary assessment of the scope of the work to be conducted, identifying specific areas to be reviewed, and to prepare a road map for approval by the Committee before initiating the development of draft amendments.

18.14 The Committee further agreed, in accordance with MSC.1/Circ.1587 on *Amendments to safety-related IMO Conventions, other than the 1974 SOLAS Convention, and related mandatory instruments* that:

- .1 the amendments to be developed should apply to seafarers to which the 1978 STCW Convention applied;
- .2 the instruments to be amended were the 1978 STCW Convention and Code; and
- .3 the HTW Sub-Committee should recommend the appropriate entry-into-force date for the revised Convention and Code.

18.15 The Committee further instructed the Sub-Committee to consider ongoing areas of work in the context of the STCW Convention separately from the work on the comprehensive review, as proposed in document MSC 104/15/33.

Standardized digital exchange of vessels' route plans

18.16 The Committee considered document MSC 104/15/7 (Austria et al.) proposing a new output to amend the revised ECDIS Performance Standards (resolution MSC.232(82)) to facilitate a standardized digital exchange of vessels' route plans and inviting the Committee to consider either approving this proposal as a new output or adding this work under an existing output.

18.17 The Committee recalled that NCSR 9 was expected to work on amendments to resolution MSC.232(82) under existing output 7.14 (Revision of ECDIS Guidance for good practice (MSC.1/Circ.1503/Rev.1) and amendments to ECDIS performance standards (resolution MSC.232(82)) which had been approved for a different purpose, i.e. to update guidance for good practice and ECDIS performance standards for the introduction of the next generation of electronic navigational charts.

18.18 Having noted that the deadline for submissions to NCSR 9 had already passed and being conscious of the heavy workload of the Sub-Committee, the Committee agreed that this work should not be added to the existing output.

18.19 During the discussion, a number of delegations commented on the scope of the output, referring, in particular, to the master's responsibilities defined in the SOLAS Convention, the level of qualification of shore-based route planners, the additional workload for ship's navigation officers and the need to provide future-proof digitalization standards to enable the implementation of e-navigation.

18.20 Consequently, the Committee agreed to include in its post-biennial agenda an output on "Amendments to the revised ECDIS performance standards (resolution MSC.232(82)) to facilitate a standardized digital exchange of ships' route plans", with one session needed to complete the item, assigning the NCSR Sub-Committee as the associated organ.

18.21 Notwithstanding the inclusion of the output in the post-biennial agenda, the Committee invited NCSR 9, time permitting, to consider the scope of the output and report back to the Committee; however, not to discuss the contents of the output until the scope had been agreed by the Committee. Additionally, the Committee agreed that NCSR 9 could recommend inclusion of this output in its biennial agenda so as to start to work on it at NCSR 10.

Traditional and non-traditional propulsion and steering systems

18.22 The Committee had for its consideration the following documents:

- .1 MSC 104/15/8 (Austria et al.), proposing to review SOLAS chapters II-1 (part C) and V, and related non-mandatory instruments regarding steering and propulsion requirements;
- .2 MSC 104/15/37 (China), proposing to comprehensively review the safety requirements for steering systems by considering additional instruments (e.g. additional regulations of SOLAS and the HSSC Code) and to develop necessary instruments;
- .3 MSC 105/18/1 (Austria et al.), updating the original proposal by providing the suggested amendments to SOLAS chapters II-1 (part C) and V, and related non-mandatory instruments for both traditional and non-traditional propulsion and steering systems; and underscoring the urgency of the matter; and

- .4 MSC 105/18/2 (China), commenting on document MSC 105/18/1 and providing three proposals.

18.23 Following discussion, the Committee agreed to include in its post-biennial agenda an output on "Revision of SOLAS chapters II-1 (part C) and V and related instruments regarding steering and propulsion requirements to address both traditional and non-traditional propulsion and steering systems", with two sessions needed to complete the item, assigning the SSE Sub-Committee as the coordinating organ, in association with the NCSR and SDC Sub-Committees as and when requested by the SSE Sub-Committee. In this regard, the Committee instructed the SSE Sub-Committee to clarify the scope of the new output, in particular whether propellers of traditional propulsion systems were included, and advise the Committee accordingly.

18.24 The Committee also agreed, in accordance with MSC.1/Circ.1481 and MSC.1/Circ.1500/Rev.1, that:

- .1 the amendments to be developed should apply to new ships;
- .2 the output was to amend regulations in SOLAS chapters II-1 (part C) and V; and
- .3 the amendments to be developed should enter into force on 1 January 2028, provided that they were adopted before 1 July 2026.

Safety of ships using ammonia as fuel

18.25 The Committee had for its consideration the following documents:

- .1 MSC 104/15/9 (Japan et al.), proposing the development of non-mandatory guidelines for the safety of ships using ammonia as fuel;
- .2 MSC 104/15/10 (Japan) on hazard identification of ships using ammonia as fuel; and
- .3 MSC 104/15/30 (Japan) on the necessity of deliberations on operational safety measures and fire safety measures.

18.26 Following discussion, the Committee agreed to include in the biennial agenda of the CCC Sub-Committee for 2022-2023 and the provisional agenda for CCC 8 an output on "Development of guidelines for the safety of ships using ammonia as fuel", with a target completion year of 2023.

Carriage of liquefied hydrogen in bulk

18.27 The Committee considered document MSC 104/15/11 (Australia et al.), proposing a revision of the interim recommendations for carriage of liquefied hydrogen in bulk.

18.28 Following discussion, the Committee agreed to include in the biennial agenda of the CCC Sub-Committee for 2022-2023 and the provisional agenda for CCC 8 an output on "Revision of the Interim recommendations for carriage of liquefied hydrogen in bulk", with a target completion year of 2024.

18.29 In this regard, the Committee noted concerns expressed by the delegation of Italy that further clarifications were needed with regard to the cargo containment system and the leakage detection philosophy, in particular that the use of flammable gases in the interspace should be carefully considered and detailed relevant safety justifications should be provided.

Seafarers' hours of work and rest hours and fatigue

18.30 The Committee considered document MSC 104/15/14 (France et al.) proposing a new output to initiate a scoping exercise with a view to enhancing the effectiveness of provisions on seafarers' hours of work and rest hours, and on fatigue.

18.31 Following consideration, the Committee agreed:

- .1 to include in its post-biennial agenda an output on "Scoping exercise and enhancement of the effectiveness of provisions on fatigue and seafarers' hours of work and rest", with two sessions needed to complete the item, assigning the HTW Sub-Committee as the coordinating organ, in association with the III Sub-Committee as and when requested by the HTW Sub-Committee;
- .2 that coordination with ILO would be necessary to take any follow-up action as a result of the scoping exercise carried out in the context of the IMO provisions which should not solely be based on the WMU report referenced in the proposal; and
- .3 to request the Secretariat to liaise with the ILO Secretariat for coordination purposes and report to MSC 106 on the matter.

Upgrading VDR on existing ships

18.32 The Committee had for its consideration the following documents:

- .1 MSC 104/15/15 (United Arab Emirates et al.) proposing a new output to amend SOLAS regulation V/20 for upgrading VDR on existing ships; and
- .2 MSC 105/18 (United Arab Emirates et al.) updating the original proposal and proposing the expansion of the existing output "Development of amendments to VDR performance standards and carriage requirements" to include the proposal in document MSC 104/15/15.

18.33 Following discussion, and having noted views and concerns of several delegations regarding, inter alia, cost implications, legacy VDR's life expectancy, data sensitivity and the risk of equipment malfunctions and consequential loss of data, the Committee did not agree to the proposal and invited the proponents to reconsider it, taking into account the views and concerns expressed.

Standards for Mobile Offshore Wind Power Service Operation Units

18.34 The Committee considered document MSC 104/15/22 (China), proposing to develop interim guidelines for the design, construction and other standards for Mobile Offshore Wind Power Service Operation Units.

18.35 Having noted the views of several delegations questioning the need for and urgency of the proposed output, and referring, in particular, to the adequacy of the existing regulatory framework enabling appropriate national implementation of regulating such units, the Committee did not agree to the proposal.

Mandatory root cause investigation

18.36 The Committee considered document MSC 104/15/16 (Vanuatu et al.), proposing to amend the Casualty Investigation Code to mandate a root cause investigation.

18.37 In the ensuing discussion, while a majority of delegations supported the proposal in principle, concerns were raised about the extent of investigation, in particular concerning proposed new paragraphs 6.3.1.8 and 6.3.2 of chapter 6 of the Casualty Investigation Code in terms of legal basis and possible conflicts with existing legislation, such as the GBS under the SOLAS Convention, and the STCW Convention.

18.38 Consequently, the Committee instructed the III Sub-Committee to assess the proposal, taking into account the above views, and report back to the Committee.

Revision of Guidelines for the application of plastic pipes on ships (resolution A.753(18))

18.39 The Committee considered document MSC 104/15/18 (China), proposing to revise the *Guidelines for the application of plastic pipes on ships* (resolution A.753(18)).

18.40 Consequently, the Committee agreed to include in its post-biennial agenda an output on "Revision of the *Guidelines for the application of plastic pipes on ships* (resolution A.753(18))", with one session needed to complete the item, assigning the SSE Sub-Committee as the associated organ.

Fire risk of ships carrying new energy vehicles

18.41 The Committee considered document MSC 104/15/19 (China), proposing an evaluation of the adequacy of fire protection, fire detection and fire extinction arrangements in vehicle, special category and ro-ro spaces in order to reduce the fire risk of ships carrying new energy vehicles.

18.42 In the ensuing discussion, the Committee noted the following views:

- .1 although the submission lacked technical data, the matter could be addressed by the SSE Sub-Committee and, therefore, the output proposal should be taken on board;
- .2 any retroactive application of the new measures to be developed should be carefully considered by the SSE Sub-Committee;
- .3 the amendments should be applicable only to new ships;
- .4 notwithstanding the view in subparagraph .3 above, the carriage of such vehicles posed fire risks not only to new ships but also to existing ships and, therefore, all ships carrying new energy vehicles should be within the scope of the output; and
- .5 the charging of electric vehicles on board ships should also be addressed as part of the output.

18.43 Following discussion, the Committee agreed to include in its post-biennial agenda an output on "Evaluation of adequacy of fire protection, detection and extinction arrangements in vehicle, special category and ro-ro spaces in order to reduce the fire risk of ships carrying new energy vehicles", with four sessions needed to complete the item, assigning the SSE Sub-Committee as the associated organ; and instructed the SSE Sub-Committee to

evaluate the applicability of the new measures to be developed to existing ships and to address the charging of electric vehicles on board ships.

18.44 The Committee also agreed, in accordance with MSC.1/Circ.1481 and MSC.1/Circ.1500/Rev.1, that:

- .1 the instruments to be amended were SOLAS and the FSS Code, and new guidelines for reducing the fire risk of ship's vehicle, special category and ro-ro spaces carrying new energy vehicles might need to be developed; and
- .2 the amendments to be developed should enter into force on 1 January 2028, provided that they were adopted before 1 July 2026.

Endorsement of new outputs by the Council

18.45 In accordance with Assembly resolution A.1149(32) on revised *Strategic Plan for the Organization for the six-year period 2018 to 2023*, the Committee invited the Council to endorse the agreed new outputs.

Postponement of remaining proposals for new outputs

18.46 Owing to time constraints, the Committee postponed the consideration of six more proposals for new outputs originally received at MSC 104 and from III 7 to MSC 106; i.e.:

- .1 Proposal for a new output to amend the regulation relating to the system control requirements of fixed gas fire-extinguishing systems in the FSS Code (MSC 104/15/20);
- .2 Proposal for a new output for amendments to SOLAS regulation II-2/10.8.1 (MSC 104/15/21);
- .3 Proposal for a new output to amend SOLAS regulation V/23 and associated instruments to improve the safety of pilot transfer arrangements (MSC 104/15/23, MSC 104/17/8, MSC 104/15/32 and MSC 104/15/35);
- .4 Proposal for a new output to develop guidance to assist competent authorities in the implementation of the Cape Town Agreement of 2012 (MSC 104/15/27);
- .5 Proposal for a new output to amend SOLAS regulation V/19-1 on LRIT (MSC 104/15/28); and
- .6 Justification for a new output on "Development of measures to ensure safe operation of elevators on board ships" (MSC 105/13 and III 7/17).

18.47 In view of its heavy workload, as well as that of Sub-Committees, the Committee urged Member States and international organizations to consider carefully the urgency and the need for submitting proposals for new outputs to MSC 106.

Biennial status report and post-biennial agenda of the Committee

18.48 Having recalled that, as usual, the status of outputs and the updated post-biennial agenda would be produced after the session as annexes to its report to avoid any unnecessary duplication of work, the Committee invited the Council to note its report on the status of outputs for the 2022-2023 biennium and its post-biennial agenda, as set out in annexes 38 and 39, respectively.

Biennial agendas and biennial status reports of the sub-committees and provisional agendas for their forthcoming sessions***Biennial agenda of the CCC Sub-Committee and provisional agenda for CCC 8***

18.49 The Committee considered document MSC 105/14, paragraph 3, and agreed to delete the output on "Amendments to the IMDG Code related to portable tanks with shells made of fibre-reinforced plastics (FRPs) for multimodal transportation of dangerous goods" from the post-biennial agenda of the Committee, as the work under this output had already been covered by amendment 41-22 of the IMDG Code (MSC 105/3/2).

18.50 The Committee, having recalled its earlier decisions to include new outputs on:

- .1 "Development of guidelines for safety of ships using ammonia as fuel"; and
- .2 "Revision of the interim recommendations for carriage of liquefied hydrogen in bulk",

in the biennial agenda of the CCC Sub-Committee for 2022-2023 and the provisional agenda for CCC 8 (see also paragraph 14.8), approved, subject to MEPC's concurrent decision, the Sub-Committee's biennial agenda and the provisional agenda for CCC 8, as set out in annexes 40 and 41, respectively.

Biennial agenda of the HTW Sub-Committee and provisional agenda for HTW 9

18.51 The Committee, having recalled its earlier decisions to include a new output on "Comprehensive review of the 1978 STCW Convention and Code" in the biennial agenda of the HTW Sub-Committee for 2022-2023 and the provisional agenda for HTW 9, approved the Sub-Committee's biennial agenda and the provisional agenda for HTW 9, as set out in annexes 40 and 41, respectively.

Biennial agenda of the III Sub-Committee and provisional agenda for III 8

18.52 The Committee approved, subject to MEPC's concurrent decision, the Sub-Committee's biennial agenda and the provisional agenda for III 8, as set out in annexes 40 and 41, respectively.

Biennial agenda of the NCSR Sub-Committee and provisional agenda for NCSR 9

18.53 The Committee approved the Sub-Committee's biennial agenda and the provisional agenda for NCSR 9, as set out in annexes 40 and 41, respectively.

Biennial agenda of the SDC Sub-Committee and provisional agenda for SDC 9

18.54 The Committee approved the Sub-Committee's biennial agenda and the provisional agenda for SDC 9, as set out in annexes 40 and 41, respectively.

Biennial agenda of the SSE Sub-Committee and provisional agenda for SSE 9

18.55 The Committee approved the Sub-Committee's biennial agenda and the provisional agenda for SSE 9, as set out in annexes 40 and 41, respectively.

Intersessional meetings

- 18.56 The Committee approved, subject to endorsement by the Council, the holding of:
- .1 an intersessional meeting of the E&T Group for the IMSBC Code in 2022 to take place immediately after CCC 8 (MSC 105/14, paragraph 3);
 - .2 virtual meetings of three drafting groups, to take place during 2022, to consider draft model courses for validation at HTW 9 (see paragraph 16.2);
 - .3 an intersessional working group on revision of SOLAS chapter III and the LSA Code, to finalize the draft risk indexing and scoring as well as further develop the hazard identification matrix reporting to SSE 9 (SSE 8/20, paragraph 20.1.1); and
 - .4 a meeting of the Joint MSC-LEG-FAL MASS Working Group (see paragraph 7.25).

Substantive items for inclusion in the agendas for MSC 106 and MSC 107

18.57 Having considered the proposals in document MSC 105/WP.6, the Committee agreed to the substantive items to be included in the agendas of its 106th and 107th sessions, as set out in annex 42.

Establishment of working and drafting groups at MSC 106

- 18.58 The Committee agreed that, based on the decisions taken under various agenda items, working and drafting groups on the following subjects could be established at MSC 106:
- .1 development of a goal-based instrument for MASS; and
 - .2 amendments to mandatory instruments.

Duration and dates of the next two sessions

18.59 The Committee noted that MSC 106 had been scheduled to take place from 2 to 11 November 2022 and MSC 107 tentatively from 31 May to 9 June 2023.

19 ANY OTHER BUSINESS

General

- 19.1 The Committee recalled that MSC 104 had considered, under this agenda item, documents related to:
- .1 the impact of the COVID-19 pandemic on safety-related matters;
 - .2 Assembly-related matters; and
 - .3 matters emanating from MSC 102 and MSC 103 postponed for consideration at MSC 104,

and had postponed consideration of ISO matters, as well as all remaining documents submitted to MSC 104 (MSC 104/18, paragraph 17.32), to this session.

Matters postponed by MSC 104

19.2 Having recalled that proposed actions on matters postponed by MSC 104 for consideration at this session, pertaining to this agenda item, had been arranged by correspondence (MSC 105/1/2 and Add.1), and having noted that the proposed actions had been approved under agenda item 1 (see paragraph 1.9), the Committee took action as outlined below.

Preventing the loss of containers at sea

19.3 The Committee noted the information in document MSC 104/17/4 (Austria et al.) and invited interested Member States to participate in the joint industry project called Top Tier JIP, as appropriate.

Implementation of the Polar Code

19.4 The Committee noted the information in documents MSC 104/17/7 (WWF) and MSC 104/17/12 (FOEI and Pacific Environment) and invited the submitters to liaise with interested Member States to submit a relevant proposal for a new output aimed at addressing the identified gaps and challenges experienced with the implementation of the Polar Code.

19.5 In this regard, the Committee also noted information provided by the observer from ICS that, with respect to paragraph 4 of document MSC 104/17/7, in particular concerning the development of Polar Water Operational Manuals, ICS and OCIMF had produced, in 2019, Guidelines for the development of a Polar Water Operational Manual, which had been submitted to the Organization for information as document MSC 102/INF.21; and that the Guidelines, which were available free of charge on the ICS website, provided helpful guidance that ship operators and masters might use to develop a ship-specific Polar Water Operation Manual to meet the environmental and operational requirements for a planned voyage in polar waters, in accordance with the Polar Code.

Two-way communication service demonstration for Cospas-Sarsat distress beacons using the SAR/Galileo return link service

19.6 The Committee noted the information in document MSC 104/INF.4 (Austria et al.) on the preliminary results of the demonstration of a two-way communication service on Cospas-Sarsat distress beacons to be provided by the Galileo system by using the SAR return link.

Forecast system for integral maritime safety (SIPSEM)

19.7 The Committee noted the information in document MSC 104/INF.12 (Colombia) on a tool to keep an up-to-date system for the forecast of the oceanographic and meteorological conditions in the areas under the jurisdiction of Colombia for the development and safety of maritime and port activities, in particular in relation to possible oil or other noxious substances spills, as well as search and rescue operations.

Application of an intelligent lifebuoy for maritime SAR

19.8 The Committee noted the information in document MSC 104/INF.16 (China) on the application of a remote-controlled intelligent lifebuoy for maritime search and rescue.

Introduction of communication technology support in remote PSC

19.9 The Committee noted the information in document MSC 104/INF.17 (China) on the application and practice of prevailing Internet communication technology used in the process of remote PSC inspections, with a view to further enhancing their applicability and effectiveness and providing a practical foundation for the further revision of procedures for PSC.

Remaining documents for consideration at this session

19.10 Owing to time constraints, the Committee postponed consideration of documents MSC 102/22/6, MSC 105/19/2 and MSC 105/19/6 (ISO); MSC 103/20/15 (IACS); MSC 103/20/17 (ICS et al.); MSC 104/17/6 and MSC 105/19/7 (CESA); MSC 105/19, MSC 105/19/1 and MSC 105/19/3 (Secretariat); MSC 105/19/5 (ILAMA); MSC 105/19/8 (IACS); MSC 105/19/9 (Ecuador et al.), MSC 105/19/10 (ICS and ITF); MSC 105/19/12 (Germany and Netherlands); MSC 105/INF.5 (Austria et al.); MSC 105/INF.10 (Finland et al.); MSC 105/INF.11 (ICS); and MSC 105/INF.13 (Panama) to MSC 106.

Expression of condolence

19.11 The Committee noted with great sadness the recent passing away of Mr. Kees Metselaar, the long-time Head of Delegation of the Netherlands to the meetings of this Committee. Mr. Metselaar was a naval architect by trade and had over 40 years of technical maritime experience working for the Netherlands Ministry of Infrastructure and Environment, including a four-year detachment as a national ship design expert to the European Commission. He was also a long-time IMO delegate to the DE, FP, SSE and SLF Sub-Committees as well as MSC, MEPC and the Council. Mr. Metselaar was greatly respected by fellow delegates for his vast knowledge and deep commitment to the shipping industry. He will be sorely missed. The Committee appreciated his contribution to the work of the Organization and requested the delegation of the Netherlands to convey its sincere sympathy to his family and colleagues.

Expressions of appreciation

19.12 The Committee expressed its sincere thanks and appreciation to Ms. Turid Stemre of Norway, the outgoing Chair of the SDC Sub-Committee, for having guided instrumental work of the Organization so successfully and efficiently for the past 30 years and wished her all the best for her impending retirement.

19.13 The Committee also expressed its sincere thanks and appreciation to the following officers of the Secretariat, wishing both of them a long, happy and healthy retirement:

- .1 Mr. Hans van der Graaf, Deputy Director Operational Safety and Human Element, Maritime Safety Division, for his leadership, loyalty and outstanding service to maritime safety over more than 45 years, 16 of them in IMO; and
- .2 Ms. Christine Gregory, Administrative Officer of the Maritime Safety Division, for her long years of outstanding service to the Committee.

20 CONSIDERATION OF THE REPORT OF THE COMMITTEE ON ITS 105TH SESSION

Procedures for facilitating remote sessions

20.1 During the virtual meeting held on 29 April 2022, delegations had the opportunity to comment on the draft report of the session (MSC 105/WP.1). The Secretariat then prepared the revised draft report (MSC 105/WP.1/Rev.1) for consideration and adoption by the Committee, taking into account the provisions of the *Interim guidance to facilitate remote sessions of the Committees during the COVID-19 pandemic* (MSC-LEG-MEPC-TCC-FAL.1/Circ.1). Those wishing to further comment on the decisions of the Committee were given a deadline of 11 May 2022, 23.59 (UTC+1) to do so by correspondence, as provided for in the aforementioned Interim Guidance.

20.2 By the above deadline, four comments were received which were of an editorial nature and did not require a ruling by the Chair. These comments were accommodated in this report. The report of the Committee was then finalized by the Secretariat in consultation with the Chair. The session was closed on 11 May 2022, 23.59 (UTC+1), pursuant to rule 35 of the Rules of Procedure.

Action requested of other IMO organs

20.3 The Assembly, at its thirty-third session, is invited to:

- .1 note the comments made and decisions taken on matters related to the ongoing military conflict between the Russian Federation and Ukraine and its effect on international shipping and seafarers, including the adoption of resolution MSC.495(105) on *Actions to facilitate the urgent evacuation of seafarers from the war zone area in and around the Black Sea and the Sea of Azov as a result of the Russian Federation aggression against Ukraine* (paragraphs 1.6, 2.8 to 2.25 and annex 2);
- .2 note that the Committee, subject to a concurrent decision by MEPC 78, instructed the III Sub-Committee to consider the consolidated audit summary reports (CASRs) of the Member State audits completed in 2019 and 2020 and report to the Committees the outcome of their considerations (paragraphs 2.5 and 13.10);
- .3 note that the Committee adopted amendments to the 1974 SOLAS Convention and related mandatory codes and the 1988 SOLAS Protocol and approved/adopted a number of non-mandatory instruments (paragraphs 2.25, 3.52 to 3.69, 4.4, 5.13, 14.2 to 14.7, 15.2, 15.7, 15.10, 15.12 to 15.17, 15.22, 16.4, 16.20 and 16.23 and annexes 2 to 27 and 31 to 37);
- .4 revoke resolutions A.334(IX), A.383(X), A.385(X), A.421(XI), A.524(13), A.530(13), A.570(14), A.612(15), A.614(15), A.660(16), A.661(16), A.699(17), A.701(17), A.702(17), A.703(17), A.801(19), as amended, A.802(19), as amended, A.805(19) and A.814(19), from the date of entry into force (i.e. 1 January 2024) of the related amendments to the 1974 SOLAS Convention adopted at this session related to the modernization of the GMDSS (paragraphs 3.42 and 3.52 and annex 3); and
- .5 note the actions taken on matters related to maritime autonomous surface ships (paragraphs 7.22 to 7.33 and annex 28).

20.4 The Council, at its 127th session, is invited to:

- .1 consider the report of the 105th session of the Maritime Safety Committee and, in accordance with Article 21(b) of the IMO Convention, transmit the report, with its comments and recommendations, to the thirty-third session of the Assembly;
- .2 note the comments made and decisions taken on matters related to the ongoing military conflict between the Russian Federation and Ukraine and its effect on international shipping and seafarers, including the adoption of resolution MSC.495(105) on *Actions to facilitate the urgent evacuation of seafarers from the war zone area in and around the Black Sea and the Sea of Azov as a result of the Russian Federation aggression against Ukraine*, (paragraphs 1.6, 2.8 to 2.25 and annex 2) and in particular to:
 - .1 consider the issues raised in paragraph 14 of document MSC 105/18/3, in particular the consideration and analysis of reports on States' armed interference in maritime shipping, including ships, ports and shipping security systems, and the development of guidance relating to the prevention of such interference (paragraph 2.20.3.1); and
 - .2 consider the need for including any procedural matters in the conduct of audits under IMSAS, in relation to the proposal for auditors to take into account information provided by other coastal States relating to the adjacent marine areas, in the context of the revision of the *Framework and Procedures for the IMO Member State Audit Scheme* (resolution A.1067(28)), possibly through establishing the Joint Working Group on the Member State Audit Scheme (JWGMSA) (paragraph 2.20.3.2);
- .3 note the approval of the List of instruments under the remit of the Maritime Safety Committee for which a consolidated version would be most beneficial and take action as deemed appropriate (paragraphs 2.2 and 2.3 and annex 1);
- .4 note the actions taken with regard to the consolidated audit summary reports under the IMO Member State Audit Scheme (paragraphs 2.5 and 13.10);
- .5 note that the Committee adopted amendments to the 1974 SOLAS Convention and related mandatory codes and the 1988 SOLAS Protocol and approved/adopted a number of non-mandatory instruments (paragraphs 2.25, 3.52 to 3.63, 4.4, 5.13, 14.2 to 14.7, 15.2, 15.7, 15.10, 15.12 to 15.17, 15.22, 16.4, 16.20 and 16.23 and annexes 2 to 27 and 31 to 37);
- .6 note the decisions taken on measures to improve domestic ferry safety (paragraphs 4.2 to 4.5 and annex 26);
- .7 note the decisions taken on matters related to goal-based ship construction standards and the GBS verification audit scheme (paragraphs 6.1 to 6.14);

- .8 note the actions taken on matters related to maritime autonomous surface ships and endorse the holding of the first meeting of the Joint MSC/LEG/FAL MASS Working Group, scheduled to be held remotely from 7 to 9 September 2022 (paragraphs 7.22 to 7.33, 18.56 and 20.5.15 and annex 28);
- .9 note that matters related maritime security, piracy and armed robbery against ships, unsafe mixed migration by sea and formal safety assessment were deferred to MSC 106 owing to time constraints (paragraphs 8.1 to 11.1);
- .10 note the action taken with respect to the handling of issues related to the abandonment and fair treatment of seafarers and fishers (paragraph 13.12);
- .11 note the actions taken regarding the outcome of the work of the sub-committees reporting to this session (sections 13 to 16) and, with regard to the establishment of a Joint IMO/ILO Tripartite Working Group to identify and address seafarers' issues and the human element, to:
- .1 consider and decide on IMO's eight Government representatives in the group, based on input from the Secretary-General, giving due consideration to geographical representation, taking into account that all IMO Members may attend as observers and participate in the debates without decision-making power (paragraph 16.12.1);
 - .2 endorse the establishment of a Joint IMO/ILO Tripartite Working Group to identify and address seafarers' issues and the human element, including the method of work and terms of reference (paragraph 16.12.2 and annex 37); and
 - .3 endorse the instruction of the Committee to the JTWG (under paragraph 4(c) of its terms of reference) to "consider bullying and harassment in the maritime sector, including sexual assault and sexual harassment, taking into account information submitted by interested parties, with a view to providing recommendations for future steps, including the development of legislation, mechanisms and policies, and the launching of awareness campaigns by relevant stakeholders, aimed at reporting and addressing these matters" (paragraph 16.14.1);
- .12 endorse the decision of the Committee to extend the CCC Sub-Committee's meeting time to eight days (while maintaining four days' interpretation) for two sessions starting with CCC 8 (paragraph 14.8);
- .13 endorse the new outputs approved by the Committee for the 2022-2023 biennium (paragraphs 18.13.1, 18.26, 18.28 and 18.45);
- .14 note the biennial status report of the Maritime Safety Committee for the 2022-2023 biennium (paragraph 18.48 and annex 38);
- .15 note the post-biennial agenda of the Maritime Safety Committee (paragraph 18.48 and annex 39); and
- .16 endorse the approval of intersessional meetings for 2022 (paragraph 18.56).

20.5 The Marine Environment Protection Committee, at its seventy-eighth session, is invited to:

- .1 concurrently agree to continue to follow previous practice with regard to CASRs and the instruction to the III Sub-Committee to consider the CASRs of the audits completed in 2019 and 2020 and report to the Committees the outcome of their considerations (paragraph 2.5);
- .2 as a matter of urgency, note the decisions taken on measures to enhance the safety of ships relating to the use of oil fuel and, in particular, the draft SOLAS amendments with regard to flashpoint and the revised action plan (paragraphs 5.12 to 5.19 and annex 27);
- .3 concurrently agree with the decisions taken regarding the analysis of the four CASRs under the IMO Member State Audit Scheme (IMSAS) (paragraph 13.10);
- .4 concurrently approve the draft joint circular FAL.2-MEPC.1-MSA.1-LEG.2 on *List of certificates and documents required to be carried on board ships, 2022*, noting that the items related to the amendments to MARPOL Annexes I, IV and VI regarding measures to reduce carbon intensity of international shipping and unmanned non-self-propelled (UNSP) barges, as adopted by resolutions MEPC.330(76) and MEPC.328(76), respectively, are in square brackets, pending acceptance of the associated amendments to MARPOL Annexes I, IV and VI (paragraph 13.11 and annex 29);
- .5 note that CCC 8 was instructed to further consider documents A 32/12/2 and MSC 105/2/2, and matters related to the development of safety requirements to support the achievement of the decarbonization goal, in the context of its work on the development of the IGF Code and safety provisions for alternative fuels, and advise the Committee on how best to proceed (paragraph 14.11);
- .6 note the progress made by the SDC Sub-Committee in reviewing the *Guidelines for the reduction of underwater noise from commercial shipping to address adverse impacts on marine life* (MEPC.1/Circ.833) and that SDC 8 had agreed to a work plan for the revision of the Guidelines and the identification of next steps (paragraph 15.23);
- .7 concurrently approve the draft revised checklist for considering and addressing human element issues and the associated draft amendments to the *Organization and method of work of the Maritime Safety Committee and the Marine Environment Protection Committee and their subsidiary bodies* (MSC-MEPC.1/Circ.5/Rev.2), and the associated draft MSC-MEPC circular, to be issued as MSC-MEPC.1/Circ.5/Rev.3 (paragraph 16.4 and annex 36); and
- .8 concurrently approve the biennial agendas of the CCC and III Sub-Committees and the provisional agendas for CCC 8 and III 8, including the extension of the CCC Sub-Committee's meeting time to eight days (while maintaining four days' interpretation) for two sessions starting with CCC 8 (paragraphs 14.8, 18.50 and 18.53 and annexes 40 and 41).

20.6 The Legal Committee, at its 110th session, is invited to:

- .1 note the actions taken on matters related to unlawful practices associated with fraudulent registration and registries of ships (paragraph 2.7);
- .2 note the comments made and decisions taken on matters related to the ongoing military conflict between the Russian Federation and Ukraine and its effect on international shipping and seafarers, including the adoption of resolution MSC.495(105) on *Actions to facilitate the urgent evacuation of seafarers from the war zone area in and around the Black Sea and the Sea of Azov as a result of the Russian Federation aggression against Ukraine* (paragraphs 2.8 to 2.25 annex 2);
- .3 note the actions taken on matters related to maritime autonomous surface ships, including the holding of the first meeting of the Joint MSC/LEG/FAL MASS Working Group, scheduled to be held remotely from 7 to 9 September 2022, subject to concurrent approval by FAL 46 and C 127 (paragraphs 7.22 to 7.33, 18.56 and 20.5.15 and annex 28);
- .4 note the concurrent approval of the draft joint circular FAL.2-MEPC.1-MS.1-LEG.2 on *List of certificates and documents required to be carried on board ships, 2022* (paragraph 13.11 and annex 29);
- .5 note the concurrent endorsement of the III Sub-Committee's recommendation on alignment and integration of actions in favour of both seafarers and fishers (paragraph 13.12);
- .6 note the approval of the draft revised checklist for considering and addressing human element issues and the associated draft amendments to the *Organization and method of work of the Maritime Safety Committee and the Marine Environment Protection Committee and their subsidiary bodies* (MSC-MEPC.1/Circ.5/Rev.2), and the associated draft MSC-MEPC circular, to be issued as MSC-MEPC.1/Circ.5/Rev.3 (paragraph 16.4 and annex 36); and
- .7 note the action taken regarding the establishment of a Joint IMO/ILO Tripartite Working Group to identify and address seafarers' issues and the human element (paragraphs 16.12 and 20.5.11 and annex 37).

20.7 The Facilitation Committee, at its forty-sixth session, is invited to:

- .1 note the comments made and decisions taken on matters related to the ongoing military conflict between the Russian Federation and Ukraine and its effect on international shipping and seafarers, including the adoption of resolution MSC.495(105) on *Actions to facilitate the urgent evacuation of seafarers from the war zone area in and around the Black Sea and the Sea of Azov as a result of the Russian Federation aggression against Ukraine* (paragraphs 2.8 to 2.25 annex 2);
- .2 endorsed the actions taken on matters related to maritime autonomous surface ships, including the establishment of a Joint MSC/LEG/FAL MASS Working Group, its terms of reference and the date for its first meeting, subject to concurrent approval by C 127 (paragraphs 7.22 to 7.33, 18.56 and 20.5.15 and annex 28);

- .3 concurrently approve the draft joint circular FAL.2-MEPC.1-MSC.1-LEG.2 on *List of certificates and documents required to be carried on board ships, 2022* (paragraph 13.11 and annex 29); and
- .4 note the approval of the draft revised checklist for considering and addressing human element issues and the associated draft amendments to the *Organization and method of work of the Maritime Safety Committee and the Marine Environment Protection Committee and their subsidiary bodies* (MSC-MEPC.1/Circ.5/Rev.2), and the associated draft MSC-MEPC circular, to be issued as MSC-MEPC.1/Circ.5/Rev.3 (paragraph 16.4 and annex 36).

20.8 The Technical Cooperation Committee, at its seventy-second session, is invited to:

- .1 consider the outcome of the assessment of capacity-building implications and technical assistance needs for the implementation of new measures (paragraphs 3.4 and 3.64 to 3.67);
- .2 note the decisions taken on measures to improve domestic ferry safety and consider the invitation to assist with the development of an explanatory manual for the model regulations and related online training material (paragraphs 4.2 to 4.5 and annex 26); and
- .3 note the decisions taken regarding the analysis of the four consolidated audit summary reports (CASRs) under the IMO Member State Audit Scheme (IMSAS) and, in particular, consider the identified areas that may need technical assistance for reporting to the Council, as appropriate (paragraph 13.10).

(The annexes will be issued as addenda to this report.)
