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## MAIN DECISIONS OF MEPC 80

*The scope of the Marine Information Notice publication is to provide the Shipping Sector with information relevant to RINA, its organization, initiatives and services as well as to disseminate information of a general nature which in RINA view may be of interest. The information provided does not intend to be exhaustive and is given for reference only.*

The 80<sup>th</sup> session of the IMO Marine Environment Protection Committee (MEPC 80) was held from 3 to 7 July 2023. The main decisions taken are summarized below on the basis of the information obtained while participating in the debate.

### IMO GHG STRATEGY AND MEDIUM/LONG-TERM MEASURES TO REDUCE GHG EMISSIONS FROM SHIPS

#### 2023 IMO Strategy for the reduction of Green House Gases from ships (2023 IMO GHG Strategy)

2023 IMO GHG Strategy (Res. MEPC.377(80)) includes new level of ambition:

- uptake of zero or near-zero GHG emission technologies, fuels and/or energy sources to represent at least 5%, striving for 10%, of the energy used by international shipping by 2030; and
- to peak GHG emissions from international shipping as soon as possible and to reach net-zero GHG emissions by or around (i.e. close) to 2050, taking into account different national circumstances, whilst pursuing efforts towards phasing them out as called for in the Vision consistent with the long-term temperature goal set out in Article 2 of the Paris Agreement,

with the following checkpoint:

- reduction of the total annual GHG emissions from international shipping by at least 20% striving for 30% by 2030, compared to 2008; and
- reduction of the total annual GHG emissions from international shipping by at least 70% striving for 80% by 2040, compared to 2008.

In order to achieve the above-mentioned targets and promote the energy transition of shipping, the Strategy includes a basket of candidate mid-term GHG reduction measures, consisting of both technical and economic elements to be developed and agreed by 2025: a goal-based marine fuel standard regulating the phased reduction of the marine fuel's GHG intensity, based on the newly adopted life-cycle assessment (LCA) Guidelines; and measures based on a maritime GHG emissions pricing mechanism.

In addition to the basket of candidate mid-term GHG reduction measures, the Strategy lists other mid-term GHG reduction measures which should be developed before 2030, such as further development of the life-cycle assessment Guidelines; regulatory assessment of safety aspects associated with reducing GHG emissions; measures to address methane, nitrous oxide and volatile organic compounds emissions; incentives for first movers to take up new technologies; measures to support supply of zero or near-zero GHG emission fuels and/or energy sources, and further optimize the logistic chain and its planning.

The next revision of the Strategy is scheduled for 2028.

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## Guidelines on life cycle GHG intensity of marine fuels (LCA Guidelines)

The LCA Guidelines (Res. MEPC.376(80)) provides the methodology and the default factors to calculate the Well-to-Tank (WtT), Tank-to-Wake (TtW), and Well-to-Wake (WtW) GHG intensity for all fuels and other energy carriers (e.g. electricity) used on-board, covering carbon dioxide (CO<sub>2</sub>), methane (CH<sub>4</sub>), and nitrous oxide (N<sub>2</sub>O) emissions. The GHG emissions are calculated as CO<sub>2</sub>-equivalent (CO<sub>2eq</sub>), using the Global Warming Potential over a 100-year time horizon (GWP100) to convert emissions of other gases than CO<sub>2</sub>.

Moreover, the LCA Guidelines address and specify sustainability themes/aspects for marine fuels, defining a Fuel Lifecycle Label (FLL), which carries information about fuel type, feedstock (feedstock type and feedstock nature/carbon source), conversion/production process (process type and energy used in the process), GHG emission factors, information on fuel blends and sustainability themes/aspects.

The FLL consists of five main parts, as follows:

- Part A: fuel type; fuel pathway code; lower calorific value LCV (MJ/g); WtT GHG emission factor (gCO<sub>2eq</sub>/MJ<sub>(LCV)</sub> calculated on GWP100); and share of each blend component in case of fuel blend.
- Part B: emissions credits related to biogenic carbon source  $e_c$  (gCO<sub>2</sub>/g<sub>fuel</sub> calculated on GWP100); emissions credits related to source of captured carbon  $e_{ccu}$  (gCO<sub>2</sub>/g<sub>fuel</sub> calculated on GWP100).
- Part C: TtW GHG emission factor of the fuel type in conjunction with the energy converter(s) on board the ship (in gCO<sub>2eq</sub>/MJ<sub>(LCV)</sub> calculated on GWP100)
- Part D: WtW GHG emission factor of the fuel type (in gCO<sub>2eq</sub>/MJ<sub>(LCV)</sub> calculated on GWP100)
- Part E: sustainability performance of the fuel.

Although the LCA Guidelines have been approved, they are still a stand-alone document with no link to any IMO regulatory measures, even if the newly adopted revised IMO GHG Strategy clearly states that such Guidelines will be considered in the development of medium-term technical measures.

## Further works on mid-term measures

The Committee agreed to work before next MEPC 81 and establish

- a Correspondence Group (CG) on the further development of the LCA framework;
- an expert workshop on the life cycle GHG intensity of marine fuels;
- the Intersessional Working Group on Reduction of GHG Emissions from Ships (ISWG-GHG 16) to consider the development of candidate mid-term measure; further develop the LCA framework on the basis of the CG work; and consider onboard capture issues, if time permits.

## BIOFUEL ISSUES

Following the adoption of the LCA Guidelines, the Committee discussed the issues of the uptake of sustainable biofuels in relation to the calculation of the Attained CII and approved the Interim guidance on the use biofuels under regulations 26, 27 and 28 of MARPOL Annex VI (DCS and CII) (MEPC.1/Circ.905).

The Interim Guidance - applicable from 1 October 2023 – indicates that, in implementing DCS and CII requirements, biofuels that

- have been certified by an international certification scheme, meeting its sustainability criteria; and
- provide a well-to-wake GHG emissions reduction of at least 65% compared to the well-to-wake emissions of fossil MGO of 94 gCO<sub>2e</sub>/MJ (i.e. achieving an emissions intensity not exceeding 33 gCO<sub>2e</sub>/MJ) according to that certification may be assigned a Cf equal to the value of the well-to-wake GHG emissions of the fuel according to the certificate (expressed in gCO<sub>2eq</sub>/MJ) multiplied by its lower calorific value (LCV, expressed in MJ/g).

In any case, the Cf value of a biofuel cannot be less than 0. For blends, the Cf should be based on the weighted average of the Cf for the respective amount of fuels by energy.

A Proof of Sustainability or similar documentation from a recognized scheme should be provided along with the Bunker Delivery Note, to facilitate the verification of the reported biofuel consumption.

Biofuels not certified as "sustainable" or not fulfilling the well-to-wake emission factor criterion above, should be assigned a Cf equal to the Cf of the equivalent fossil fuel type.

The interim Guidance clarifies also that Administrations should inform the Committee on which international certification schemes have been used.

## REVISION OF SHORT-TERM MEASURES TO REDUCE GHG EMISSIONS FROM SHIPS

The Committee agreed with a plan for an effective and efficient review of GHG short-term measure including, inter alia, the revision of CII Guidelines (G1, G3 and G5 on correction factors and voyages adjustments) and the application of the LCA Guidelines. The plan describes also the following timeline in order to finalize the review by 1 January 2026:

- Data gathering stage: from MEPC 80 to MEPC 82 (autumn 2024);
- Data analysis stage: working group at MEPC 82 to be continued by a correspondence group; and
- Convention and Guidelines review stage: an intersessional working group between MEPC 82 and MEPC 83 (spring 2025) as well as a working group at MEPC 83.

Interested Member States and international organizations are invited to collect data and submit information and proposals to the relevant MEPC meetings during the data gathering stage. Additionally, other stakeholders (e.g. shipowners, charterers, manufacturers, ports authorities, etc.) are invited to provide data to facilitate the review process, through the designated email address: [ghg@imo.org](mailto:ghg@imo.org).

## AMENDMENTS TO MANDATORY INSTRUMENTS

### Amendments to BWM Convention entering into force on 1 February 2025

The amendments to the BWM Convention (Res. MEPC.369(80)) include modifications to the Form of Ballast Water Record Book (BWRB), deleting the duplication of the information contained in the International Ballast Water Management Certificate and reviewing the BWRB items to improve clarity on how to record the operation of the ship. Relevant Guidance on matters relating to ballast water record-keeping and reporting (BWM.2/Circ.80) has been approved.

## DRAFT AMENDMENTS APPROVED IN VIEW OF THEIR ADOPTION AT MEPC 81 (APRIL 2024)

### Draft amendments to MARPOL Annex VI

Draft amendments to MARPOL Annex VI concern the following regulations:

- Regulation 13 “NO<sub>x</sub>” clarifying that a marine diesel engine replacing a steam system (e.g boiler) is to be considered as a major conversion and that engine is to be considered a replacement engine. Therefore, the engine replacing the steam system may be according to Tier II instead of Tier III in those cases foreseen by the IMO Guidelines which will be adopted at MEPC 81 concurrently with the MARPOL Annex VI amendments. In all cases of installations of Tier II engine instead of a Tier III one, notification to IMO is required;
- Regulation 18 “Fuel oil availability and quality”, resolving the inconsistency between MARPOL and the amendments to SOLAS chapter II-2 adopted at MSC 106 on low-flashpoint fuels. It is clarified that the Bunker Delivery Note (BDN) of "low-flashpoint fuel" shall comply with a limited number of information respect to those included in Appendix V (only items 1 to 6);
- Regulation 19 “Application”, clarifying that SEEMP requirements relevant to CII are not applicable to category A ships as defined in Polar Code;
- Regulation 27 “Collection and reporting of ship fuel oil consumption data”, including the possibility of an ad-hoc basis for the Secretary-General to share DCS data with analytical consultancies and research entities, under strict confidentiality rules, and - on the request of a company - to grant access to the fuel oil consumption reports of the company's owned ship(s) in a non-anonymized form to the general public.
- Appendix IX “Information to be submitted to the IMO Ship Fuel Oil Consumption Database”, including more detailed information, such as the distinction of fuel oil consumed per main category of combustion system (i.e. main engine(s), auxiliary engine(s)/generator(s), oil-fired boilers) and fuel oil consumption while the ship is not underway; the installation of innovative technologies; and the total transport work data, using actual tonne-mile, TEU-mile and/or passenger-mile data. Additional guidance and consequential amendments the SEEMP Guidelines, the DCS administration verification guidelines and the DCS database guidelines will be developed.

### Draft amendments to Article V of Protocol I of MARPOL Convention

In line with the draft reporting requirements on lost freight container approved by MSC 107 (see RINA MNO 200), Article V is amended to read: “In case of the loss of freight container(s), the report required by article II (1) (b) shall be made in accordance with the provisions of SOLAS regulations V/31 and V/32.”

### Draft amendments to BWM Convention

The draft amendments to BWM Convention concern Reg.s A-1 and B-2, aligning the text with the newly adopted Guidance for the use of electronic record books under the BWM Convention (Res. MEPC.372(80)) and the verification of entries by the master.

## PARTICULARLY SENSITIVE SEA AREAS (PSSAs), SPECIAL AREAS AND EMISSION CONTROL AREAS (ECAs)

The Committee agreed with the:

- designation of the North-Western Mediterranean Sea as a PSSA; and
- application from 1 January 2025 of the discharge requirements in Red Sea special area under MARPOL Annexes I (Reg.s 15.3, 15.5, and 34.3 to 34.5) and V (Reg. 6); and
- application from 1 January 2025 of the discharge requirements in Gulf of Aden special area under MARPOL Annex V (Reg. 6);

Moreover, the Committee was informed there are works in progress to implement in future

- an ECA in the North-East Atlantic Ocean, for SO<sub>x</sub> and PM emissions (MARPOL Annex VI Reg. 14) and NO<sub>x</sub> emissions (Reg. 13) linking the existing ECAs in the Baltic Sea, North Sea and English Channel with the recently adopted Mediterranean Sea SO<sub>x</sub> ECA; and
- ECA in Canadian Arctic waters.

Depending on the outcome of the ongoing works, proposals for the designation of new ECAs will be submitted by the concerned States to MEPC 81 (April 2024).

## RECOMMENDATORY INSTRUMENTS ADOPTED/APPROVED

### Unified interpretation of MARPOL Annex VI

Unified interpretation to MARPOL Annex VI (MEPC.1/Circ.795/Rev.8) includes the possibility for the BDN to be in electronic format. It is clarified that the electronic BDN should be protected from edits, modifications or revisions and authentication be possible by a verification method such as a tracking number, watermark, date and time stamp, QR code, GPS coordinates or other verification methods.

### Amendments to 2021 Guidelines on the shaft/engine power limitation system to comply with the EEXI requirements and use of a power reserve

The amendments to 2021 Guidelines (Res. MEPC.375(80)) include deadline and format for reporting the use of power reserve, specifying that on an annual basis by 30 June, the Administration should report to IMO GISIS module, according to the format in the Appendix to the Guidelines, the uses of a power reserve over a 12-month period from 1 January to 31 December for the preceding calendar year.

## OTHER RESOLUTIONS AND CIRCULARS ADOPTED/APPROVED

- Res. MEPC.370(80) - Amendments to the Guidelines for ballast water management and development of Ballast Water Management Plans (G4)
- Res. MEPC.371(80) - Amendments to the Guidelines for ballast water exchange (G6)
- Res. MEPC.373(80) - 2023 Guidelines for thermal waste treatment devices
- Res. MEPC.374(80) - Amendments to the 2022 Guidelines on survey and certification of the energy efficiency design index (EEDI) (Res. MEPC.365(79))
- Res. MEPC.378(80) - 2023 Guidelines for the control and management of ships' biofouling to minimize the transfer of invasive aquatic species
- Res. MEPC.379(80) - 2023 Guidelines for the development of the inventory of hazardous materials

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## MARINE INFORMATION NOTICE

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- MEPC.1/Circ.906 - Revised Guidelines for the reduction of underwater radiated noise from shipping to address adverse impacts on marine life
- MEPC.1/Circ.907 - Guidelines for underwater radiated noise reduction in Inuit Nunaat and the Arctic
- BWM.2/Circ.66/Rev.5 - Unified interpretations to the BWM Convention and the BWMS Code
- BWM.2/Circ.78 - Protocol for verification of ballast water compliance monitoring devices
- BWM.2/Circ.79 - Convention review plan under the experience-building phase associated with the BWM Convention
- MSC-MEPC.1/Circ.5/Rev.5 - Organization and method of work of the maritime safety committee and the marine environment protection committee and their subsidiary bodies
- PPR.1/Circ.7/Rev.1 - Decisions with regard to the categorization and classification of products

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