

MARINE ENVIRONMENT PROTECTION
COMMITTEE
77th session
Agenda item 7

MEPC 77/7/22
XX October 2021
Original: ENGLISH
Pre-session public release:

REDUCTION OF GHG EMISSIONS FROM SHIPS

Comments on a proposed draft MEPC resolution on zero emission shipping by 2050, and revision of the IMO GHG Strategy

Submitted by ICS

SUMMARY

Executive summary: Commenting on MEPC 77/7/3 (Kiribati et al.), ICS supports development of an MEPC resolution which focuses on a net zero CO₂ target whilst recognizing the need to phase-out other GHG emissions too. ICS also supports increasing the level of ambition in the revised IMO GHG Strategy, including consideration of a target of net zero annual CO₂ emissions by 2050. But for such a high level of ambition to be plausible, the Committee must adopt the necessary measures to accelerate R&D of zero-carbon technologies and expedite their deployment, including immediate approval at this session of the IMRF (as set out in document MEPC 76/7/7) and development of an appropriate global MBM.

*Strategic direction,
if applicable:* 3

Output: 3.2

Action to be taken: Paragraph 17

Related documents: Resolution MEPC.304(72), MEPC 76/7/7, MEPC 76/7/39, MEPC 77/7/1, MEPC 77/7/3, MEPC 77/7/6, ISWG-GHG 10/7/2

INTRODUCTION

1 This document is submitted in accordance with the document on Organization and method of work of the MSC and MEPC and their subsidiary bodies (MSC-MEPC.1/Circ.5/Rev.2) and comments on document MEPC 77/7/3 (Kiribati et al.).

2 A number of governments have indicated that the current IMO level of ambition to reduce the total annual GHG emissions from international shipping by at least 50% by 2050, compared to 2008, may be insufficient to ensure that the sector makes an adequate contribution to global CO₂ reduction efforts consistent with the Paris Agreement temperature

goals. Some governments have indicated that rather than seeking to deliver a phase-out of GHG emissions as soon as possible this century (as stated in the Vision of the Initial Strategy) the revised Strategy should seek to achieve net zero CO₂ emissions by 2050.

3 UNFCCC¹ and IPCC² place particular emphasis on the global economy aiming to achieve net zero carbon emissions over the coming decades. As proposed by Kiribati et al. in document MEPC 77/7/3, the co-sponsors therefore support development of an MEPC resolution, provided it focuses on a net zero CO₂ emissions target for 2050 whilst recognizing the need to phase-out other GHGs too (rather than an absolute zero GHG target for 2050 as suggested by Kiribati et al.).

4 With regard to the Organization having a plausible Strategy for achieving a net zero, goal, a distinction must be made between the feasibility of decarbonizing international shipping as opposed to global economic activity covered by NDCs. This is a distinction which must recognize the limited decarbonization options available to this hard to abate sector, as well as shipping's indispensability given its pivotal role in the global transportation of raw materials, manufactured products, food and passengers. ICS emphasizes that while IMO regulates ships, the development of relevant technologies, fuels, propulsion systems and related infrastructure that will be required to achieve net zero by the sector are the responsibility and in the control of stakeholders other than shipowners, particularly energy providers and engine manufacturers which IMO is unable to regulate directly.

5 Despite these observations, and noting that the NDCs of many major economies currently fall short of achieving net zero carbon by 2050, ICS supports increasing the level of ambition in the IMO GHG Strategy, including consideration of setting a target for international shipping to achieve total annual CO₂ emissions of net zero by 2050.

6 Notwithstanding the huge enormity of this challenge, with the necessary commitment from governments and all other relevant stakeholders, plus a credible plan for delivery, a net zero carbon ambition could be achievable by 2050. But only provided that the Organization takes the necessary decisions to manage this process within a global regulatory framework. If the Organization does not adopt the necessary measures, including approval at this session of the IMRF (as set out in document MEPC 76/7/7), ICS fears that adoption of a net zero goal will be perceived by the World as an empty gesture, damaging confidence in the Organization's leadership on GHG reduction issues.

DISCUSSION

Action required to make any increased level of ambition plausible

7 If increasing the level of ambition is to be more than a political gesture, the first step will be for Member States to recognise the magnitude and complexity of the challenge of phasing-out CO₂ emissions from ships more or less completely by 2050. Critical to successful achievement of rapid decarbonization will be for the Committee to take the urgent measures required to accelerate and expedite an increase in Technology Readiness Levels by 2030, as underlined by Mission Innovation in June 2021³ and by document MEPC 77/7/1 (ICS et al.). Just setting another target to reduce shipping emissions will not make this happen by itself.

8 The Initial Strategy already notes that *“technological innovation and the global introduction of alternative fuels and/or energy sources for international shipping will be integral to achieve the overall ambition.”* Any increase to the level of ambition therefore has to be

¹ <https://unfccc.int/climate-action/race-to-zero-campaign>

² https://www.ipcc.ch/report/ar6/wg1/downloads/report/IPCC_AR6_WGI_Headline_Statements.pdf

³ <http://mission-innovation.net/missions/shipping/>

supported by an IMO regulatory framework to ensure the necessary zero-carbon fuels and technologies will be in place for such a rapid transition to be plausible.

9 As recognised by Mission Innovation⁴, thousands of zero-carbon ships will need to be delivered by 2030 if the current IMO level of ambition for 2050 is to be achieved. Technology Readiness Levels with respect to zero-carbon technologies and fuels suitable for marine application are currently inadequate to achieve this by 2030. If the IMO level of ambition for 2050 is increased, the possibility of success will become even more remote unless R&D of zero-carbon technologies is rapidly accelerated between now and 2030. Otherwise, the required acceleration of R&D will occur too late to achieve the goal set by Mission Innovation “for ships capable of running on zero-emission fuels to make up at least 5% of the global deep-sea fleet by 2030”, jeopardising achievement of the current level of ambition for 2050, let alone any more ambitious target that might be agreed by the MEPC.

10 In the absence of immediate measures by the Committee to ensure that large numbers of oceangoing zero-carbon ships can be delivered from 2030, including the vital need to approve the IMRF at this session, it will be incumbent on the Organization to demonstrate how the pathway to zero emissions by 2050 can plausibly be achieved. Before any revision of the current level of ambition for 2050 is agreed by the Committee, commissioning appropriate research will be essential to ensure that a net zero pathway does not ration the supply of maritime transport or undermine economic development.

11 Further to document MEPC 76/7/39 (ICS et al.) and document ISWG GHG 10/5/2 (ICS and INTERCARGO), ICS also emphasizes that an appropriate global MBM should be developed by the Organization to expedite the uptake and deployment of zero-carbon technologies and fuels. A piecemeal or regional approach to the introduction of MBMs will result in barriers to trade and ultimately would most likely fail to achieve the overriding policy objective of reducing global GHG emissions from international shipping. Any MBM should also take account of the characteristics of shipping, including the bulk/tramp sectors which, according to UNCTAD, conduct the majority of international shipping trade. ICS emphasizes that when the MBM is first established, it will be premature to impose a disproportionately high carbon price on shipping, especially if there are no zero-carbon technologies and net zero fuels, available globally, that can be readily applied to international shipping, for ships to transition to, at the time when the MBM is initially implemented.

Issues to be considered when revising the IMO Strategy

12 With regard to how any revision of the 2050 level of ambition might be described, the current level of ambition for 2050 refers to halving GHG emissions and sets an absolute reduction target. Whilst the phase-out of other GHG emissions will also need to be addressed, a revised target for 2050 will only be plausible if described as a ‘net zero CO₂ target’, consistent with the current emphasis of UNFCCC and IPCC on achieving net zero carbon emissions over the coming decades. ICS therefore suggests that the new level of ambition in the revised IMO Strategy should be described as follows: “To achieve total annual CO₂ emissions of net zero by 2050.”

13 According to IPCC, the terms ‘net zero’ and ‘carbon neutral’ are more or less synonymous with both IPCC and UNFCCC generally using net zero. The current IPCC definition is as follows: “net zero CO₂ emissions are achieved when anthropogenic CO₂ emissions are balanced globally by anthropogenic CO₂ removals over a specified period. Net zero CO₂ emissions are also referred to as carbon neutrality”⁵. Use of the term ‘net zero’ would

⁴ The members of Mission Innovation include Australia, Austria, Brazil, Canada, Chile, China, Denmark, European Union, Finland, France, Germany, India, Italy, Japan, Morocco, Netherlands, Norway, Republic of Korea, Saudi Arabia, Sweden, United Arab Emirates, United Kingdom, United States.

⁵ <https://www.ipcc.ch/sr15/chapter/glossary/>

thus leave open the possibility of using a wider range of alternative fuels and, should this be technologically feasible, deploying other technologies such as carbon capture and storage (CCS) and direct carbon capture from the atmosphere. Notwithstanding questions relating to the potential desirability and use of other measures, the term 'net zero CO₂' could also leave open the possibility for IMO to give further consideration to exploring these should it subsequently decide to do so, in addition to leaving the Organization with greater flexibility depending on the decisions it might take with respect, inter alia, to carbon life-cycle analysis.

14 If the current level of ambitions set by the Organization are to be revised, it is suggested that with regard to the level of ambition for carbon intensity which applies to the existing fleet, it will be premature to consider revising this for 2030 or for any year after 2030 (other than 2050) until after the CII reduction rates for 2027 to 2030 have been established following the review in 2026 agreed at MEPC 76. Given that any further significant reduction of carbon intensity to be achieved after 2030, as an average across the fleet, will primarily depend on the availability and deployment of low and zero-carbon technologies, the issues raised above with respect to the measures that will need to be adopted by the Organization – including the vital need for approval at this session of the IMRF – will be equally relevant. The 2008 baseline should also be retained for all of the levels of ambition, otherwise there will not be any continuity with respect to measurement of progress.

CONCLUSION

15 Noting the current emphasis of UNFCCC and IPCC on achieving net zero carbon emissions over the coming decades, and recognising the need to phase-out other GHGs, ICS supports consideration of an objective of net zero CO₂ emissions from international shipping by 2050. However, it is critical that Member States demonstrate clear support for the industry to achieve such a high level of ambition by adopting the measures necessary to accelerate R&D of zero-carbon technologies, including approval of the IMRF proposal at this session, and expediting their uptake and deployment through the development of an appropriate global MBM. For the revised IMO Strategy to succeed, both the IMRF and an appropriate MBM need to be adopted by the Organization, otherwise the revised Strategy will lack credibility. ICS reiterates that development of relevant technologies, fuels, propulsion systems and related infrastructure required to achieve such an increased level of ambition are the responsibility and in the control of stakeholders other than shipowners.

16 It will be incumbent on the Organization, through commissioning of appropriate research, to demonstrate how the pathway to net zero CO₂ emissions by 2050 can be achieved, especially in the absence of the increase in Technology Readiness Levels required by 2030, completing this work before any revision of the current level of ambition for 2050 is agreed by the Committee in 2023. This also includes the need for a full assessment of the macro-economic impacts on States.

ACTION REQUESTED OF THE COMMITTEE

17 The Committee is invited to consider this document and take action as appropriate.