

The IMO Maritime Safety Committee (MSC)

**100th session, 3-7 December 2018
(Based on a Media Briefing by IMO staff)**

On 7 December IMO's Maritime Safety Committee (MSC) completed its landmark 100th session with progress on a number of topics.

These are: (i) a regulatory scoping exercise on maritime autonomous surface ships; (ii) approval of revised guidelines on fatigue and further updates on work on goal-based standards, (iii) polar shipping and (iv) safety issues relating to low-sulphur fuel.

In a special session with invited speakers future technologies and the continued role of the seafarer were discussed. A new IMO safety video* was launched, highlighting the wide spectrum of work the MSC has undertaken over 60 years to enhance safety and security at sea, including aspects of navigation, cargoes, ship construction, seafarer training, search and rescue and communications, to name a few examples.

Regulatory scoping exercise on Maritime Autonomous Surface Ships (MASS)

During the 100th session of the MSC the process of assessing IMO instruments to see how they may apply to ships with varying degrees of autonomy continued.

Following testing of the strategy by a correspondence group, the MSC approved the framework and methodology for the regulatory scoping exercise on MASS.

It is understood that for each IMO instrument related to maritime safety and security, and for each degree of autonomy, provisions will be identified which:

- apply to MASS and prevent MASS operations; or
- apply to MASS and do not prevent MASS operations and require no actions; or
- apply to MASS and do not prevent MASS operations but may need to be amended or clarified, and/or may contain gaps; or
- have no application to MASS operations.

The degrees of autonomy identified for the purpose of the scoping exercise are:

- **Degree one**
Ship with automated processes and decision support: Seafarers are on board to operate and control shipboard systems and functions. Some

operations may be automated and at times be unsupervised but with seafarers on board ready to take control.

- **Degree two**

Remotely controlled ship with seafarers on board: The ship is controlled and operated from another location. Seafarers are available on board to take control and to operate the shipboard systems and functions.

- **Degree three**

Remotely controlled ship without seafarers on board: The ship is controlled and operated from another location. There are no seafarers on board.

- **Degree four**

Fully autonomous ship: The operating system of the ship is able to make decisions and determine actions by itself.

Once the first step is completed, a second step will be conducted to analyse and determine the most appropriate way of addressing MASS operations, taking into account, *inter alia*, human element, technology and operational factors. The analysis will identify the need for:

- Equivalences as provided for by the instruments or developing interpretations; and/or
- Amending existing instruments; and/or
- Developing new instruments; or
- None of the above as a result of the analysis.

The initial review of instruments under the purview of the MSC will be conducted during the first half of 2019 by a number of volunteering Member States, with the support of interested international organizations.

An intersessional MSC working group is expected to meet in September 2019 to move forward with the process with the aim of completing the regulatory scoping exercise in 2020.

The list of instruments to be covered in the MSC's scoping exercise for MASS includes those covering safety (SOLAS); collision regulations (COLREG); loading and stability (Load Lines); training of seafarers and fishers (STCW, STCW-F); search and rescue (SAR); tonnage measurement (Tonnage Convention); Safe Containers (CSC); and special trade passenger ship instruments (SPACE STP, STP).

Development of guidelines on MASS trials

The MSC noted provisional principles for the development of guidelines on MASS trials, discussed by a working group. The principles include ensuring that such guidelines should be generic and goal-based, and taking a precautionary approach to ensuring the safe, secure and environmentally sound operation of MASS. Interested parties were invited to submit proposals to the next session of the Committee, taking into account these principles.

Goal-based standards (GBS) and safety level approach

Following the adoption of Goal-based ship construction standards for bulkers and oil tankers and the successful initial verification of twelve Recognized Organizations (ROs) by IMO GBS audit teams at previous sessions, the MSC confirmed that the information submitted concerning the maintenance of verification by those twelve ROs demonstrated continued conformance with the Standards (this covered all IACS member recognized organizations, except for DNV-GL, a classification society formed as the result of a merger between DNV and GL, which would be subject to a re-verification audit of its rules.)

Revised guidelines on fatigue approved

The MSC approved revised Guidelines on fatigue, which provide comprehensive information on the causes and consequences of fatigue, and the risks it poses to the safety and health of seafarers, operational safety, security and protection of the marine environment. The aim is to assist all stakeholders to contribute to the mitigation and management of fatigue.

Safety of ships in polar waters

The Committee discussed how to advance with developing possible mandatory and/or recommendatory measures for ships operating in polar waters which are not currently covered by the Polar Code. A plan was agreed which could see revisions to SOLAS and/or the Polar Code considered for adoption in 2022.

Sulphur 2020 limit – safety issues

The Committee agreed to include in its agenda for MSC 101 a new item on ‘Development of further measures to enhance the safety of ships relating to the use of fuel oil’. This followed the consideration of submissions concerning the potential need for guidance and advice concerning possible safety issues related to the implementation of the 0.50% limit of the sulphur content of fuel oil (outside emission control areas). At the same time, the Committee endorsed the view that, while fuel safety was a longstanding existing concern which needed to be carefully addressed, this should not affect Member States’ commitment to implementing the 2020 sulphur limit from the date of application (1 January 2020).

Amendments adopted

The MSC adopted:

- (i) Amendments to the Code of Safety for Special Purpose Ships (SPS Code), including a revised chapter 8 on life-saving appliances;
- (ii) A requirement for special purpose ships to comply with the provisions of chapter IV of SOLAS; and
- (iii) A revised Form of Safety Certificate for Special Purpose Ships and Record of Equipment for Special Purpose Ship Safety Certificate (Form SPS).

Royal Visit

HRH The Princess Royal visited IMO HQ on 5 December (*See photo here*). She was received by Secretary-General Kitack Lim and addressed the 100th session of the Maritime Safety Committee (MSC) and took a keen interest in the proceedings, as the Committee discussed measures to enhance maritime security particularly with regard to piracy and armed robbery against ships. The Princess Royal, who is Master of Trinity House and President of the Mission to Seafarers, then met delegates from a number of Member States and non-governmental organizations.

This visit was organised as part of a series of events commemorating IMO's 70th anniversary and the World Maritime Day theme – IMO 70: Our Heritage: Better Shipping for a Better Future.

In March 1948, the convention establishing IMO was adopted. The Maritime Safety Committee was one of the IMO bodies established by that convention and is the oldest technical committee of IMO. On 6 March this year, 70 years to the day since the IMO was established, HM the Queen visited IMO Headquarters.

* The IMO video may be found here:

<http://www.imo.org/en/MediaCentre/Multimedia/Video/Pages/Default.aspx?playerUrl=QieBWO2JTDA&autoplay=true&title=Shaping%20maritime%20safety%20and%20security>

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