

2021 Guideline for the Approval and Survey of Exhaust Gas Cleaning Systems

Amended Rules and Guidance

Rules for Marine Pollution Prevention Systems
Guidance for Marine Pollution Prevention Systems

Reason for Amendment

Regulation 14 of MARPOL Annex VI stipulates the maximum allowable sulphur content limits (% by mass) of fuels used on board ships. In addition, the use of exhaust gas cleaning systems (EGCS) (as specified Regulation 4 of MARPOL Annex VI) instead of low-sulphur fuels is considered to be an alternative means of complying with Regulation 14.

The IMO adopted Resolution MEPC.259(68) in May 2015 which established its “2015 Guideline for Exhaust Gas Cleaning Systems”. This guideline included requirements related to EGCS specifications, etc., and Class NK has already incorporated this resolution into its Rules.

The IMO recently conducted a review to amend and clarify the technical requirements of this guideline. As a result, amendments to the guideline were adopted as Resolution MEPC.340(77) at the 77th Session of the IMO Marine Environment Protection Committee (MEPC77) held in November 2021.

Accordingly, relevant requirements related to marine pollution prevention systems are amended based on Resolution MEPC.340(77).

Outline of Amendment

The main contents of this amendment are as follows.

- (1) Clarifies the frequency and accuracy of measurements to be monitored and recorded for the overboard discharging of water.
- (2) Amends requirements for daily checking and recording of Emission Ratios relating to EGCS adopting Scheme A for which inspection and approval based on operational parameter monitoring is required, cases where exhaust gas monitoring systems are not provided.

“Rules for marine pollution prevention systems” has been partly amended as follows:

Part 2 SURVEYS

Chapter 1 GENERAL

1.3 Verification Survey of Certificates, etc.

1.3.2 Certificates and Documents, etc. other than those Specified in 1.3.1*

Sub-paragraph -1(3) has been amended as follows.

1 At surveys, the following certificates and other documents, etc. are to be presented to the Surveyor to verify that these certificates and documents are placed on board the ship (excluding unmanned towed ships), and are appropriate. However, at Occasional Surveys, the presentation of certificates and documents to the Surveyor may be limited to the concerned ones.

((1) and (2) are omitted.)

(3) Relating to the equipment for the prevention of air pollution from ships

((a) to (j) are omitted.)

(k) Documents, etc. regarding the exhaust gas cleaning system or other technological methods specified in the following **i**) or **ii**) (for ships where the exhaust gas cleaning systems or other technological methods to which **1.1.3, Part 8** applies are installed or adopted).

i) For ships where exhaust gas cleaning systems are installed, manuals such as operation manuals and the EGCS Record Book specified in **2.1.2-1(6)(c)**, records of parameters and a SO_x Emissions Compliance Certificate (if any); or other documents prescribed by the Administration

ii) For ships where other technological methods are adopted, approved documentation in respect of the technological methods of achieving compliance with *Regulation 14* of *Annex VI*

((l) is omitted.)

Chapter 2 REGISTRATION SURVEYS

2.1 Registration Surveys during Construction

2.1.2 Submission of Plans and Documents for Approval*

Sub-paragraph -1(6) has been amended as follows.

1 For any ship intending to undergo Registration Surveys, the following plans and documents are to be submitted to the Society for approval:

((1) to (5) are omitted.)

(6) Equipment for the prevention of air pollution from ships

((a) and (b) are omitted.)

(c) Sulphur Oxides (SO_x) and Particulate Matter

For ships where exhaust gas cleaning systems or other technological methods to which **1.1.3, Part 8** applies are installed or adopted, the plans and documents, etc. specified in the following **i)** or **ii)**:

i) For ships where exhaust gas cleaning systems are installed, the plans and arrangements for the system as well as manuals such as operation manuals and the EGCS Record Book of the system; or other documents prescribed by the Administration

ii) For ships where other technological methods are adopted, the plans and arrangements for said means

((d) to (f) are omitted.)

((7) is omitted.)

“Guidance for marine pollution prevention systems” has been partly amended as follows:

Part 2 SURVEYS

Chapter 1 GENERAL

1.3 Verification Survey of Certificates, etc.

1.3.2 Certificates and Documents, etc. other than those Specified in 1.3.1

Sub-paragraph -4 has been amended as follows.

4 With respect to the “EGCS Record Book” specified in **1.3.2-1(3)(k)i)**, **Part 2 of the Rules for exhaust gas cleaning systems recording with the an Electronic Logging System, records of the logging system are to be checked** it is to be confirmed that said book has been maintained for a minimum period of three *years*. In addition, in the case of exhaust gas cleaning systems which use electronic data recordings devices for record keeping purposes, displayed or printed versions of recorded content are to be checked.

Chapter 2 REGISTRATION SURVEYS

2.1 Registration Surveys during Construction

2.1.2 Submission of Plans and Documents for Approval

Sub-paragraph -3 has been amended as follows.

3 The “manuals such as operation manuals” and “EGCS Record Book” referred to in **2.1.2-1(6)(c)i), Part 2 of the Rules** mean the following (1) and (2):

- (1) The EGC system Technical Manual specified in 4.2.2 or 5.6 of *IMO* resolution *MEPC.~~259(68)~~340(77)*, the Onboard Monitoring Manual specified in section 8 of the said resolution, and the SOx Emissions Compliance Plan specified in section 9.1 of the said resolution; and
- (2) The EGCS Record Book specified in *IMO* resolution *MEPC.~~259(68)~~340(77)*.

2.1.3 Inspections of Construction and Equipment

Sub-paragraphs -5 and -6 have been amended as follows.

5 The “examinations of work, such as installation, etc.” referred to in **2.1.3-5(2)(b)i), Part 2 of the Rules** are to be in accordance with the following (1) or (2):

- (1) For ships where exhaust gas cleaning systems are installed, satisfactory installation of the exhaust gas cleaning systems is to be examined in accordance with the requirements of *IMO* resolution *MEPC.~~259(68)~~340(77)* (excluding 4.2.2 and 5.6, sections 8 and 9.1 of the resolution), unless the instructions by the Administration are to be followed.
- (2) (Omitted)

6 The “performance tests” referred to in **2.1.3-5(2)(b)ii), Part 2 of the Rules** are to be in accordance with the following (1) or (2):

- (1) For ships where exhaust gas cleaning systems are installed, satisfactory operation of the exhaust gas cleaning systems is to be examined in accordance with the requirements of *IMO* resolution *MEPC.~~259(68)~~340(77)*, unless the instructions by the Administration are to be followed.
- (2) (Omitted)

Chapter 3 REGISTRATION MAINTENANCE SURVEYS

3.1 Annual Surveys

3.1.2 Inspections of Construction and Equipment

Sub-paragraph -3 has been amended as follows.

3 The survey referred to in **3.1.2-4(3)(b), Part 2 of the Rules** is to be in accordance with the following **(1)** or **(2)**:

- (1) For ships where exhaust gas cleaning systems are installed, satisfactory installation and operation of the exhaust gas cleaning system in accordance with the requirements of *IMO* resolution *MEPC.259(68)* ~~*MEPC.259(68)*~~ *340(77)* are to be confirmed according to approved documentation, including sensors monitoring operational or emission parameters as set out in the Onboard Monitoring Manual, unless the instructions by the Administration are to be followed.
- (2) (Omitted)

Part 8 EQUIPMENT FOR THE PREVENTION OF AIR POLLUTION FROM SHIPS

Chapter 1 GENERAL

1.2 General Requirement

1.2.2 Use and Carriage of Fuel Oil (*Regulation 14 of Annex VI*)

Sub-paragraph -1 has been amended as follows.

1 In applying **1.1.3, Part 8 of the Rules** and **-1 or -2 of 1.2.2, Part 8 of the Rules**, in cases where an exhaust gas cleaning system is used as an “alternative” to the use of fuel oil whose sulphur content is equal to or below 0.50% *m/m* or 0.10% *m/m*, such an exhaust gas cleaning system is to comply with the requirements of *IMO* resolution ~~MEPC.259(68)~~ MEPC.340(77) or others deemed appropriate by the Administration taking into account said resolution.