



RUSSIAN MARITIME REGISTER OF SHIPPING

CIRCULAR LETTER

No. 313-14-1306c

dated 25.12.2019

Re:

amendments to the Rules for the Classification and Construction of Sea-Going Ships, 2020, ND No. 2- 020101-124-E

Item(s) of supervision:

ships under construction

Entry-into-force date:

01.01.2020

~~Valid till:~~

~~Validity period extended till:~~

~~Cancels / amends / adds Circular Letter No.~~

~~dated~~

Number of pages:

1 + 7

Appendices:

Appendix 1: information on amendments introduced by the Circular Letter

Appendix 2: text of amendments to Parts VI "Fire Safety" and XVII "Distinguishing Marks and Descriptive Notations in the Class Notation Specifying Structural and Operational Particulars of Ships"

Director General

Konstantin G. Palnikov

Text of CL:

We hereby inform that in connection with coming into force on 1 January 2020 of IMO resolution MSC.403(96) and IACS Unified Interpretation (UI) GF18 (Feb 2019), the Rules for the Classification and Construction of Sea-Going Ships shall be amended as specified in the Appendices to the Circular Letter.

It is necessary to do the following:

1. Apply the provisions of the Circular Letter during review and approval of the technical documentation on ships:

contracted for construction on or after 1 January 2020;

contracted for conversion or, in the absence of a contract, which commence conversion on or after 1 January 2020.

List of the amended and/or introduced paras/chapters/sections:

Part VI: paras 2.1.5.4.4.2, 3.7.2.12, 3.7.2.13, 4.2.2.2, Table 5.1.2, 6.4.1, 6.4.6, 6.4.13;

Part XVII: paras 6.1.2, 6.4.1.2, 6.4.1.3 – 6.4.1.13, 9.10.2.4.

Person in charge: Evgeny V. Koptev, 313
Vladimir K. Shurpyak

"Thesis" System No. 19-372685

**Information on amendments introduced by the Circular Letter
(for inclusion in the Revision History to the RS Publication)**

Nos.	Amended paras/chapters/sections	Information on amendments	Number and date of the Circular Letter	Entry-into-force date
1	Part VI, para 2.1.5.4.4.2	Requirements for location of storerooms of oxygen and acetylene cylinders on ship have been specified	313-14-1306c of 25.12.2019	01.01.2020
2	Part VI, para 3.7.2.12	Requirements for helideck or helicopter landing area fixed foam fire extinguishing system considering IMO resolution MSC.403(96) have been specified	313-14-1306c of 25.12.2019	01.01.2020
3	Part VI, para 3.7.2.13	Para has been deleted	313-14-1306c of 25.12.2019	01.01.2020
4	Part VI, para 4.2.2.2	Requirements for location of manually operated call points have been specified	313-14-1306c of 25.12.2019	01.01.2020
5	Part VI, Table 5.1.2	Requirements for fitting passenger ships with fireman's outfits have been specified	313-14-1306c of 25.12.2019	01.01.2020
6	Part VI, para 6.4.1	Requirements for structural fire protection of oil recovery ships have been specified	313-14-1306c of 25.12.2019	01.01.2020
7	Part VI, para 6.4.6	Requirements for fitting oil recovery ships with water spraying system have been specified	313-14-1306c of 25.12.2019	01.01.2020
8	Part VI, Chapter 6.4	Chapter has been supplemented with para 6.4.13 containing requirements for fitting oil recovery ships (> 60 °C) with foam fire extinguishing system	313-14-1306c of 25.12.2019	01.01.2020
9	Part XVII, para 6.1.2	Definitions "D-value", "Helicopter landing area", "Deck integrated foam nozzles", "Foam-making branch pipes", "Limited obstacle sector", "Obstacle free sector", "Monitor foam station" and "Hose reel foam station" have been introduced considering	313-14-1306c of 25.12.2019	01.01.2020

		IMO resolution MSC.403(96); definition "Helicopter facility" has been specified considering IMO resolution MSC.403(96)		
10	Part XVII, para 6.4.1.2	Requirements for deck foam extinguishing system of helideck and helicopter landing area have been specified considering IMO resolution MSC.403(96)	313-14-1306c of 25.12.2019	01.01.2020
11	Part XVII, paras 6.4.1.3 – 6.4.1.13	New requirements for deck foam fire extinguishing system of helideck and helicopter landing area have been introduced considering IMO resolution MSC.403(96); paras 6.4.1.3, 6.4.1.4 and 6.4.1.5 have been renumbered 6.4.1.14, 6.4.1.15 and 6.4.1.16 accordingly	313-14-1306c of 25.12.2019	01.01.2020
12	Part XVII, para 9.10.2.4	Requirements for level indicator installed in LNG tank storage space have been specified considering IACS UI GF18 (Feb 2019)	313-14-1306c of 25.12.2019	01.01.2020

RULES FOR THE CLASSIFICATION AND CONSTRUCTION OF SEA-GOING SHIPS, 2020

ND No. 2-020101-124-E

PART VI. FIRE PROTECTION

2 STRUCTURAL FIRE PROTECTION

2.1 GENERAL

- 1 **Para 2.1.5.4.4.2** is replaced by the following text:

"**4.2** storerooms shall be located on or above the uppermost continuous deck and shall not be adjacent to accommodation spaces, control stations, galleys, storerooms for flammable materials, as well as to fuel oil and lubricating oil tanks₂".

3 FIRE-FIGHTING EQUIPMENT AND SYSTEMS

3.7 FOAM FIRE EXTINGUISHING SYSTEM

- 2 **Para 3.7.2.12** is replaced by the following text:

"**3.7.2.12** Helideck or helicopter landing area fixed foam fire extinguishing system on ships and FOP shall meet the requirements of 6.4.1, Part XVII "Distinguishing Marks and Descriptive Notations in the Class Notation Specifying Structural and Operational Particulars of Ships".

- 3 **Para 3.7.2.13** is deleted.

4 FIRE DETECTION AND ALARM SYSTEMS

4.2 FIRE DETECTION AND FIRE ALARM SYSTEMS

- 4 **Para 4.2.2.2** is replaced by the following text:

"**4.2.2.2** Manually operated call points shall be installed to protect all accommodated spaces, service spaces and control stations, considering the requirements of 4.2.1.2.3.3. A manually operated call point fitting is not required in an individual space within the accommodation spaces, service spaces and control stations. A manually operated call point shall be located at each exit (inside or outside) to the open deck from the corridor such that no part of the corridor is more than 20 m from a manually operated call point."

5 FIRE-FIGHTING OUTFIT, SPARE PARTS AND TOOLS

5.1 FIRE-FIGHTING OUTFIT

- 5 **Table 5.1.2, item 10 "Fireman's outfit"**. In column 3 item 1 is replaced by the following text:

"1 In passenger ships, 2 sets and additionally for every 80 m, or part thereof, of the total length of all accommodation and service spaces on the deck they are situated, or if there are more than one such deck on the deck with the maximum total length of the above spaces 2 sets in accordance with 5.1.15 and 2 sets of personal outfit in accordance with 5.1.15.1.1 – 5.1.15.1.5.

In passenger ships carrying more than 36 passengers, two additional fireman's outfits shall be provided for each main vertical zone. However, for stairway enclosures which constitute individual main vertical zones and for the main vertical zones in the fore or aft end of the ship, which do not contain spaces of categories (6), (7), (8) or (12) (refer to 2.2.1.3), no additional fireman's outfits are required.

However, in passenger ships of 24 m in length and over and of less than 300 gross tonnage, 1 set of personal outfit in accordance with 5.1.15.1.1 – 5.1.15.1.5."

6 REQUIREMENTS FOR FIRE PROTECTION OF SPECIAL PURPOSE SHIPS AND SPECIAL FACILITIES ON SHIPS

6.4 OIL RECOVERY SHIPS AND BILGE WATER REMOVING SHIPS

6 **Para 6.4.1** is replaced by the following text:

"**6.4.1** The fire protection of oil recovery ships shall be equivalent to that of oil tankers to the extent applicable for the individual ship project and, in addition, meet the requirements of 6.4.4 – 6.4.10. When exterior boundaries of superstructures and deckhouses enclosing accommodation and including any overhanging decks, which support such accommodation, are protected by a steel bulkhead screening them from the cargo area and installed at a distance of minimum 3 m from them from side to side, compliance with the provisions of 2.4.3 for fire insulation of "A-60" class boundaries, as well as the provisions of 2.4.4 and 2.4.5 for openings in these boundaries, is not required. Openings for free passage of people, ship systems piping, mooring and towing lines etc., the total area of which at each tier of a superstructure or a deckhouse shall not exceed 10 % of the area equal to the width of the side multiplied by the height of the tier of the superstructure or deckhouse, are permitted in the screening bulkhead.

In lieu of "A-60" class exterior boundaries of superstructures and deckhouses, "A-0" class constructions protected with a fixed water spraying system in accordance with 6.4.6 may be accepted."

7 **Para 6.4.6** is replaced by the following text:

"**6.4.6** The "A-0" class exterior boundaries of superstructures and deckhouses referred to in 6.4.1 shall be protected by a fixed water spraying system with the rate of water discharge 10 l/min/m² remotely controlled from the navigating bridge."

8 Chapter 6.4 is supplemented with **para 6.4.13** reading as follows:

"**6.4.13** Oil recovery ships (> 60 °C) of less than 6000 t deadweight with tanks used for oil recovery with the maximum total capacity of 700 m³, in lieu of fitting the deck foam fire extinguishing system, may be fitted with two portable foam applicators with the length of air-foam jet not less than 15 m. The amount of foam concentrate for portable foam applicators shall be sufficient to provide joint operation for at least 10 min.

On the ships having a distinguishing mark for a ship carrying equipment for fire fighting aboard other ships, for fire-fighting on the deck parts located above oil recovery tanks, as well as at location of oil spills response (OSR) equipment, monitors of a special foam fire extinguishing system or air-foam nozzles connected to distribution valve manifolds, to which foam supply is provided, may be used."

PART XVII. DISTINGUISHING MARKS AND DESCRIPTIVE NOTATIONS IN THE CLASS NOTATION SPECIFYING STRUCTURAL AND OPERATIONAL PARTICULARS OF SHIPS

6 REQUIREMENTS FOR HELICOPTER FACILITIES

9 **Para 6.1.2. New definition "D-value"** is introduced after definition "Hangar" reading as follows:

"D-value is the largest dimension of the helicopter used for assessment of the helideck when its rotors are turning. It establishes the required area of foam application."

New definition "Helicopter landing area" is introduced after definition "Helicopter facility" reading as follows:

"Helicopter landing area is an area on a ship designated for emergency landing of helicopters."

Definition "Helicopter facility" is replaced by the following text:

"Helicopter facility is a helideck with helicopter refueling facilities and a hangar."

New definitions "Deck integrated foam nozzles", "Foam-making branch pipes", "Limited obstacle sector", "Obstacle free sector", "Monitor foam station" and "Hose reel foam station" are introduced after definition "Touchdown and lift-off area" reading as follows:

"Deck integrated foam nozzles are foam nozzles recessed into or edge mounted on the helideck.

Foam-making branch pipes are air-aspirating nozzles in tube shape for producing and discharging foam, usually in straight stream only.

Limited obstacle sector is a 150° sector outside the take-off and approach sector that extends outward from a helideck where objects of limited height are permitted.

Obstacle free sector is the take-off and approach sector which totally encompasses the safe landing area and extends over a sector of at least 210°, within which only specified obstacles are permitted.

Monitor foam station is a foam monitor, either self-inducing or together with separate fixed foam proportioner, and fixed foam concentrate tank, mounted on a common frame.

Hose reel foam station is a hose reel fitted with a foam-making branch pipe and non-collapsible hose, together with fixed foam proportioner and fixed foam concentrate tank, mounted on a common frame."

10 **Para 6.4.1.2** is replaced by the following text:

"6.4.1.2 Helideck shall be protected by a fixed foam fire extinguishing system according to item 20 of Table 3.1.2.1 of Part VI "Fire Protection".

For helidecks the foam system shall contain at least two fixed foam monitors or deck integrated foam nozzles. In addition, at least two hose reels fitted with a foam-making branch pipe and non-collapsible hose sufficient to reach any part of the helideck shall be provided.

The minimum foam system discharge rate shall be determined by multiplying the *D*-value area by 6 l/min/m².

The minimum foam system discharge rate for deck integrated foam nozzle systems shall be determined by multiplying the overall helideck area by 6 l/min/m².

Each monitor shall be capable of supplying at least 50 % of the minimum foam system discharge rate, but not less than 500 l/min.

Where foam monitors are installed, the distance from the monitor to the farthest extremity of the protected area shall be not more than 75 % of the monitor throw in still air conditions.

The minimum discharge rate of each hose reel shall be at least 400 l/min. The quantity of foam concentrate shall be adequate to allow operation of all connected discharge devices for at least 5 min.

The location and characteristics of the equipment of the foam fire extinguishing system shall provide extinguishing of fire on helicopter high-level units.

It is recommended to provide additionally 100 % reserve of foam concentrate for supply of its calculated value in case of helicopter landing after partial use of foam concentrate in testing, drills or fire extinction."

11 **New paras 6.4.1.3 - 6.4.1.13** are introduced reading as follows:

"**6.4.1.3** For helicopter landing areas, at least two portable foam applicators or two hose reel foam stations shall be provided, each capable of discharging a minimum foam solution discharge rate, in accordance with Table 6.4.1.3.

Table 6.4.1.3

Category	Helicopter overall length (<i>D</i> -value), in m	Minimum foam solution discharge rate, in l/min
H1	up to but not including 15 m	250
H2	from 15 m up to but not including 24 m	500
H3	from 24 m up to but not including 35 m	800

The quantity of foam concentrate shall be adequate to allow operation of all connected discharge devices for at least 10 min. For tankers and oil recovery ships fitted with a deck foam system, an alternative arrangement, taking into account the type of foam concentrate to be used may be considered.

6.4.1.4 Manual release stations capable of starting necessary pumps and opening required valves, including the fire main system, if used for water supply, shall be located at each monitor and hose reel. In addition, a central manual release station shall be provided at a protected location. The foam system shall be designed to discharge foam with nominal flow and at design pressure from any connected discharge devices within 30 s of activation.

6.4.1.5 Activation of any manual release station shall initiate the flow of foam solution to all connected hose reels, monitors, and deck integrated foam nozzles.

6.4.1.6 The system and its components shall be designed to withstand ambient temperature changes, vibration, humidity, shock impact and corrosion normally encountered on the open deck, and shall be manufactured and tested in accordance with the requirements of 3.13, Part VI "Fire Protection".

6.4.1.7 A minimum nozzle throw of at least 15 m shall be provided with all hose reels and monitors discharging foam simultaneously. The discharge pressure, flow rate and discharge pattern of deck integrated foam nozzles shall be based on tests that demonstrate the nozzle's capability to extinguish fires involving the largest size helicopter for which the helideck is designed.

6.4.1.8 Monitors, foam-making branch pipes, deck integrated foam nozzles and couplings shall be constructed of brass, bronze or stainless steel. Piping, fittings and related components, except gaskets, shall be designed to withstand exposure to temperatures up to 925 °C.

6.4.1.9 The foam concentrate shall be demonstrated effective for extinguishing aviation fuel spill fires, shall be suitable for application with sea water and shall conform to performance standards not inferior to those acceptable to ICAO. Where the foam storage tank is on the exposed deck, freeze protected foam concentrates shall be used, if appropriate, for the area of operation.

6.4.1.10 Any foam system equipment installed within the take-off and approach obstacle-free sector shall not exceed a height of 0,25 m. Any foam system equipment installed in the limited obstacle sector shall not exceed the height permitted for objects in this area.

6.4.1.11 All manual release stations, monitor foam stations (refer to Definitions), hose reel foam stations, hose reels and monitors shall be provided with a means of access that does not require travel across the helideck or helicopter landing area.

6.4.1.12 Oscillating monitors, if used, shall be pre-set to discharge foam in a spray pattern and have a means of disengaging the oscillating mechanism to allow rapid conversion to manual operation.

6.4.1.13 If a foam monitor with flow rate up to 1,000 l/min is installed, it shall be equipped with an air-aspirating nozzle.

If a deck integrated nozzle system is installed, then the additionally installed hose reel shall be equipped with an air-aspirating handline nozzle (foam branch pipes).

Use of non-air-aspirating foam nozzles (on both monitors and the additional hose reel) is permitted only where foam monitors with a flow rate above 1,000 l/min are installed.

If only portable foam applicators or hose reel stations are provided, these shall be equipped with an air-aspirating handline nozzle (foam branch pipes).".

Paras 6.4.1.3, 6.4.1.4 and 6.4.1.5 are renumbered **6.4.1.14, 6.4.1.15 and 6.4.1.16** accordingly.

9.10 MONITORING, CONTROL AND AUTOMATION SYSTEMS

12 **Para 9.10.2.4** is replaced by the following text:

"9.10.2.4 In the drain well of LNG tank storage space, level indicators and temperature indicating devices shall be fitted. As a result of temperature sensor activation, the main gas valve of the tank shall be automatically closed. Upper level indicator shall activate an alarm.

The "level indicator" is understood as a device designed to indicate an alarm status only, e.g. a float switch installed in LNG tank storage space.".