

## ANNEX I

**SAFETY REQUIREMENTS FOR NEW AND EXISTING  
PASSENGER SHIPS ENGAGED ON DOMESTIC VOYAGES**

## CHAPTER III

**LIFE SAVING APPLIANCES****1 Definitions (R 3)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

For the purpose of this chapter, unless expressly provided otherwise, the definitions of the 1974 SOLAS Convention Regulation III/3, as amended, shall apply.

**2 Communication, survival craft and rescue boats, personal life-saving appliances  
(R 6 + 7 + 18 + 21 + 22)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

Every ship shall carry at least the radio life-saving appliances, radar transponders, personal life-saving appliances, survival craft and rescue boats, distress flares, line-throwing appliances specified in the following table and relative notes, on the basis of the ship's class.

All above appliances, including their launching appliances where applicable, shall comply with the regulations of Chapter III of the Annex to the 1974 SOLAS Convention, as amended, unless expressly provided otherwise in the following paragraphs.

Furthermore every ship shall carry immersion suits and thermal protective aids to be used by persons to be accommodated in lifeboats and rescue boats as far as required by the regulations of Chapter III of the Annex to the 1974 SOLAS Convention, as amended.

Ships not carrying a lifeboat or a rescue boat shall for rescue purposes be provided with at least one immersion suit. However if the ship is constantly engaged in warm climates where to the opinion of the Administration thermal protection is unnecessary, this protective clothing need not be carried.

Ship's class:	B		C		D	
	> 250	≤ 250	> 250	≤ 250	> 250	≤ 250
Number of persons (N)						
Survival craft <sup>abcd</sup> :						
— existing ships	1,1 N	1,1 N	1,1 N	1,1 N	1,1 N	1,1 N
— new ships	1,25 N	1,25 N	1,25 N	1,25 N	1,25 N	1,25 N
Rescue boats <sup>de</sup>	1	1	1	1	1	1
Lifebuoys <sup>f</sup>	8	8	8	4	8	4

*Status: This is the original version (as it was originally adopted).*

Life jackets <sup>hi</sup>	1,05 N	1,05 N	1,05 N	1,05 N	1,05 N	1,05 N
Child life jackets	0,1 N	0,1 N	0,1 N	0,1 N	0,1 N	0,1 N
Distress flares <sup>g</sup>	12	12	12	12	6	6
Line-throwing appliances	1	1	1	1	—	—
Radar transponders	1	1	1	1	1	1
Two-way VHF radiotelephone apparatus	3	3	3	3	3	2

- a** Survival craft may be either lifeboats complying with section 4.5 or 4.6 or 4.7 of the LSA Code or life-rafts complying with the requirements of section 4.1 of the LSA Code and of either section 4.2 or 4.3 of the LSA Code. In addition, life-rafts on ro-ro passenger ships have also to comply with the requirements of Regulation III/5-1.2. When justified by the sheltered nature of the voyages and/or the favourable climatic conditions of the area of operation, the Administration of the flag State may accept, if this is not rejected by the host Member State:
- (a) open reversible inflatable life-rafts not complying with the section 4.2 or 4.3 of the LSA Code provided that such life-rafts entirely comply with the requirements of Annex 10 of the High-Speed Craft Code;
  - (b) life-rafts not complying with the requirements of paragraphs 4.2.2.2.1 and 4.2.2.2.2 of the LSA Code on the insulation against cold of the floor of the life-raft.
- Survival craft for existing B, C and D ships shall comply with the relevant regulations of the 1974 SOLAS Convention, as amended, for existing ships as amended at the date of adoption of this Directive. A marine evacuation system or systems complying with section 6.2 of the LSA Code may be substituted for the equivalent capacity of life-rafts and launching appliances required by the table.
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- b** Survival craft shall, as far as practicable, be equally distributed on each side of the ship.
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- c** The total number of survival craft shall be in accordance with the percentage mentioned in the table above and the aggregate capacity of a combination of survival craft and additional life-rafts shall be 110 % of the total number of persons (N) the ship is certified to carry. Sufficient number of survival craft has to be carried in order to ensure that in the event of any one survival craft being lost or rendered unserviceable, the remaining survival craft can accommodate the total number of persons the ship is certified to carry.
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- d** The number of lifeboats and/or rescue boats, shall be sufficient to ensure that in providing for abandonment by the total number of persons the ship is certified to carry, no more than nine life-rafts need to be marshalled by each lifeboat or rescueboat.
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- e** Rescue boats shall be served by their own launching appliances capable of launching and recovery. If a rescue boat complies with the requirements of section 4.5 or 4.6 of the LSA Code, it may be included in the capacity of the survival craft specified in the table above. At least one of the rescue boats on ro-ro passenger ships shall be a fast rescue boat complying with the requirements of Regulation III/5-1.3. When the Administration of the flag State considers that the installation of a rescue boat on board of a ship is physically impossible, such ship may be exempted from carrying a rescueboat, provided the ship meets all of the following requirements:
- (a) the ship is arranged to allow a helpless person to be recovered from the water;
  - (b) recovery of the helpless person can be observed from the navigating bridge; and
  - (c) the ship is sufficiently manoeuvrable to close and recover persons in the worst intended conditions
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- f** At least one lifebuoy on each side shall be equipped with a buoyant lifeline equal in length to not less than twice the height at which it is stowed above the waterline in the lightest seagoing condition or 30 metres, whichever is the greater. Two lifebuoys shall be equipped with a self-activating smoke signal and a self-activating light; they shall be capable of quick release from the navigation bridge. The remainder of the lifebuoys shall be equipped with self-igniting lights, in compliance with the provisions of paragraph 2.1.2 of the LSA Code.
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- g** Distress flares, complying with the requirements of section 3.1 of the LSA Code shall be stowed on the navigation bridge or steering position.

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- h** Life jackets on board ro-ro passenger ships shall comply with the requirements of Regulation III/5-1.5.
- i** An inflatable life jacket shall be provided for each person that has to carry out work on board in exposed areas. These inflatable life jackets may be included in the total number of life jackets required by this Directive.
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### **3 Emergency alarm, operating instructions, training manual, assembly lists and emergency instructions (R 6 + 8 + 9 + 19 + 20)**

#### **NEW AND EXISTING CLASS B, C AND D SHIPS:**

Every ship shall be provided with:

**.1 A general emergency alarm system (R 6.4.2)**

It must comply with the requirements of paragraph 7.2.1.1 of the LSA Code, and be suitable for summoning passengers and crews to assembly stations and to initiate the actions included in the assembly list.

In all ships carrying more than 36 passengers the emergency alarm system shall be supplemented by a public address system that can be used from the bridge. The system shall be of a such nature and so arranged and located that messages read out over the system are readily audible for persons whose hearing is normal, in all places where persons are likely to stay when the main engine is in operation.

**FOR NEW CLASS B, C AND D SHIPS CONSTRUCTED ON OR AFTER 1 JANUARY 2003:**

The general emergency alarm systems shall be audible on all open decks and minimum sound pressure levels for the emergency alarm tone shall be in accordance with paragraphs 7.2.1.2 and 7.2.1.3 of the LSA Code.

**.2 A public address system (R 6.5)**

**.2.1** In addition to the requirements of Regulation II-2/B/15.4 and of paragraph .1, all passenger ships carrying more than 36 passengers shall be fitted with a public address system. With respect to existing ships the requirements of paragraphs .2.2, .2.3 and .2.5, subject to the provisions of paragraph .2.6, shall apply not later than the date of the first periodical survey after 1 July 1998.

**.2.2** The public address system shall be a loudspeaker installation enabling the broadcast of messages into all spaces where crew members or passengers, or both, are normally present, and to assembly stations. It shall allow for the broadcast of messages from the navigation bridge and such other places on board the ship as the Administration of the flag State deems necessary. It shall be installed with regard to acoustically marginal conditions and not require any action from the addressee.

**.2.3** The public address system shall be protected against unauthorised use and be clearly audible above the ambient noise in all spaces, prescribed by paragraph .2.2, and shall be provided with an override function controlled from one location on the navigation bridge and such other places on board as the Administration of the flag State deems necessary, so that all emergency messages will be broadcast if any loudspeaker in the spaces concerned has been switched off, its volume has been turned down or the public address system is used for other purposes.

**FOR NEW CLASS B, C AND D SHIPS CONSTRUCTED ON OR AFTER 1 JANUARY 2003:**

The minimum sound pressure levels for broadcasting emergency announcements shall be in accordance with paragraph 7.2.2.2 of the LSA Code.

**.2.4 NEW CLASS B, C AND D SHIPS:**

- .1 The public address system shall have at least two loops which shall be sufficiently separated throughout their length and have two separate and independent amplifiers; and
- .2 the public address system and its performance standards shall be approved by the Administration of the flag State having regard to the recommendations adopted by the IMO.
- .2.5 The public address system shall be connected to the emergency source of electrical power.
- .2.6 Existing ships which are already fitted with the public address system approved by the Administration of the flag State which comply substantially with those required by paragraph .2.2, .2.3 and .2.5 are not required to change their system.
- .3 Assembly list and emergency instructions (R 8)

Clear instructions to be followed in the event of an emergency shall be provided for every person on board, in accordance with IMO Resolution A.691 (17).

Assembly lists and emergency instructions complying with the requirements of SOLAS Regulation III/37 shall be exhibited in conspicuous places throughout the ship including the navigating bridge, engine room and crew accommodation spaces.

Illustrations and instructions in appropriate languages shall be posted in passenger cabins and be conspicuously displayed at assembly stations and other passenger spaces to inform passengers of:

- (i) their assembly station;
- (ii) the essential actions they must take in an emergency;
- (iii) the method of donning life jackets.

The person, who in accordance to SOLAS Regulation IV/16, is designated to have primary responsibility for radio-communications during distress situations, shall have no other duties assigned in such situations. The above shall be reflected in the assembly list and the emergency instructions.

#### .4 Operating instructions (R 9)

Posters or signs shall be provided on or in the vicinity of survival craft and their launching controls and shall:

- (i) illustrate the purpose of controls and the procedures for operating the appliance and give relevant instructions or warnings;
- (ii) be easily seen under emergency lighting conditions;
- (iii) use symbols in accordance with IMO Resolution A.760 (18).

#### .5 Training manual

A training manual complying with the requirements of SOLAS Regulation III/35 shall be provided in each crew messroom and recreation room or in each crew cabin.

#### .6 Instruction for maintenance (R 20.3)

Instructions for on-board maintenance of life-saving appliances or a shipboard planned maintenance programmes which includes the maintenance of life-saving appliances, shall be provided on board and maintenance shall be carried out accordingly. The instructions shall be in compliance with the requirements of SOLAS Regulation III/36.

#### **4 Manning of survival craft and supervision (R 10)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

- .1 There shall be a sufficient number of trained persons on board for assembling and assisting untrained persons.
- .2 There shall be a sufficient number of crew members on board for operating the survival craft and launching arrangements required for abandonment of the total number of persons on board.
- .3 An officer or certified person shall be placed in charge of each survival craft to be used. However, a crew member practised in the handling and operation of life-rafts, may be placed in charge of each life-raft or group of life-rafts. Every rescue boat and motorised survival craft shall have a person assigned who is capable of operating the engine and carrying out minor adjustments.
- .4 The master shall ensure the equitable distribution of persons referred to in paragraphs .1, .2 and .3 among the ship's survival craft.

#### **5 Survival craft assembly and embarkation arrangements (R 11 + 23 + 25)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

- .1 Survival craft for which approved launching appliances are required shall be stowed as close to accommodation and service spaces as possible.
- .2 Assembly stations shall be provided close to the embarkation stations and shall be readily accessible from accommodation and work areas and have ample room for marshalling and instruction of the passengers. Clear deck space at least 0,35 m<sup>2</sup> per person.
- .3 Assembly and embarkation stations, alleyways, stairways and exits giving access to the assembly and embarkation stations shall be adequately illuminated.

Such lighting shall be capable of being supplied by the emergency source of electrical power required by Regulations II-1/D/3 and II-1/D/4.

In addition to and as part of the markings required under II-2/B 6.1.7 for new class B, C and D ships, routes to assembly stations shall be indicated with the assembly station symbol, intended for that purpose, in accordance with IMO Resolution A.760 (18). This requirement shall also be applied to existing class B ships, carrying more than 36 passengers.

- .4 Lifeboats shall be capable of being boarded either directly from the stowed position or from an embarkation deck, but not both.
- .5 Davit-launched life-raft shall be capable of being boarded from a position immediately adjacent to the stowed position or from a position the life-raft is transferred to prior to launching.
- .6 Where necessary means shall be provided for bringing the davit-launched survival craft against the ship's side and holding them alongside so that persons can safely embark.

NEW CLASS B, C AND D SHIPS:

- .7 If a survival craft launching arrangement does not allow embarkation into the survival craft before it is on the water and the height from the embarkation station to the water is more than 4,5 metres above the waterline in the lightest seagoing condition, an approved type of MES (Marine Evacuation System) complying with section 6.2 of the LSA Code shall be installed.

On ships fitted with a marine evacuation system communication between the embarkation station and the platform of the survival craft shall be ensured.

- .8 There shall be at least one embarkation ladder, complying with the requirements of paragraph 6.1.6 of the LSA Code on each side of the ship; the Administration of the flag State may exempt a ship from this requirement provided that, in all undamaged and prescribed damage conditions of trim and heel, the freeboard between the intended embarkation position and the waterline is not more than 1,5 metres.

#### 5-1 **Requirements for ro-ro passenger ships (R 26)**

CLASS B, C AND D RO-RO SHIPS CONSTRUCTED BEFORE 1 JANUARY 2003:

- .1 Ro-ro passenger ships constructed before 1 January 2003 shall comply with the requirements of paragraphs .6.2, .6.3, .6.4, .7, .8 and .9 not later than the date of the first periodical survey after 1 January 2006.

Prior to this date, paragraphs .2, .3, .4 and .5 shall apply for ro-ro ships constructed before 1 January 2003.

Notwithstanding the above, when life-saving appliances or arrangements on such ships are replaced or such ships undergo repairs, alterations or modifications of a major character which involve replacement of, or any addition to, their existing life saving appliances or arrangements, such life-saving appliances or arrangements shall comply with the relevant requirements of paragraphs .6, .7, .8 and .9.

#### .2 Life-rafts

- .1 The ro-ro passenger ship's life-rafts shall be served by marine evacuation systems complying with SOLAS Regulation III/48.5, as amended, or launching appliances complying with SOLAS Regulation III/48.6, as amended, equally distributed on each side of the ship.

Communication between the embarkation station and the platform shall be ensured.

- .2 Every life-raft on ro-ro passenger ships shall be provided with float-free stowage arrangements complying with the requirements of SOLAS Regulation III/23, as amended.
- .3 Every life-raft on ro-ro passenger ships shall be of a type fitted with a boarding ramp complying with the requirements of SOLAS Regulation III/39.4.1 or SOLAS Regulation III/40.4.1, as amended.
- .4 Every life-raft on ro-ro passenger ships shall either be automatically self-righting or be a canopied reversible life-raft which is stable in a seaway and is capable of operating safely whichever way up it is floating. Open reversible life-rafts may be permitted if the Administration of the flag State considers this appropriate in view of the sheltered nature of the voyage and the favourable climatic conditions of the area and period of operation, and provided that such life-rafts entirely comply with the requirements of Annex 10 to the High-Speed Craft Code.

Alternatively, the ship shall carry automatically self-righting life-rafts or canopied reversible life-rafts in addition to its normal complement of life-rafts, of such aggregate capacity as will accommodate at least 50 % of the persons not accommodated in lifeboats. This additional life-raft capacity shall be determined on the basis of the difference between the total number of persons on board and the number of persons accommodated in lifeboats. Every such life-raft shall be approved by the Administration of the flag State having regard to the recommendations adopted by the IMO with MSC/Circ. 809.

.3 Fast rescue boats

.1 At least one of the rescue boats on a ro-ro passenger ship shall be a fast rescue boat approved by the administration of the flag State having regard to the recommendations adopted by the IMO by MSC/Circ. 809.

.2 Each fast rescue boat shall be served by a suitable launching appliance approved by the Administration of the flag State. When approving such appliances, the Administration of the flag State shall take into account that the fast rescue boat is intended to be launched and retrieved even under severe adverse weather conditions, and also have regard to the recommendations adopted by the IMO.

.3 At least two crews of each fast rescue boat shall be trained and drilled regularly having regard to section A-VI/2, table A-VI/2-2 'Specification of the minimum standard of competence in fast rescue boats' of the Seafarers Training, Certification and Watchkeeping (STCW) Code and the recommendations adopted by the IMO by Resolution A.771(18). The training and drills shall include all aspects of rescue, handling, manoeuvring, operating these craft in various conditions, and righting them after capsizing.

.4 In the case where the arrangement or size of an existing ro-ro passenger ship is such as to prevent the installation of the fast rescue boat required by paragraph .3.1, the fast rescue boat may be installed in place of an existing lifeboat which is accepted as a rescue boat or boat for use in an emergency, provided that all of the following conditions are met:

.1 the fast rescue boat installed is served by a launching appliance complying with the provisions of paragraph .3.2;

.2 the capacity of the survival craft lost by the above substitution is compensated by the installation of life-rafts capable of carrying at least an equal number of persons served by the lifeboat replaced; and

.3 such life-rafts are served by the existing launching appliances or marine evacuation systems.

.4 Means of rescue

.1 Each ro-ro passenger ship shall be equipped with efficient means for rapidly recovering survivors from the water and transferring survivors from rescue units or survival craft to the ship.

.2 The means of transfer of survivors to the ship may be part of a marine evacuation system, or may be part of a system designed for rescue purposes.

These means shall be approved by the flag State having regard to the recommendations adopted by IMO with MSC/Circ. 810.

.3 If the slide of a marine evacuation system is intended to provide the means of transfer of survivors to the deck of the ship, the slide shall be equipped with handlines or ladders to aid in climbing up the slide.

.5 Life jackets

.1 Notwithstanding the requirements of SOLAS Regulations III/7.2 and III/22.2, as amended, a sufficient number of life jackets shall be stowed in the vicinity of the assembly stations so that passengers do not have to return to their cabins to collect their life jackets.

.2 In ro-ro passenger ships, each life jacket shall be fitted with a light complying with the requirements of SOLAS Regulation III/32.2, as amended.

CLASS B, C AND D RO-RO SHIPS CONSTRUCTED AFTER 1 JANUARY 2003

.6 Life-rafts

.1 The ro-ro passenger ship's life-rafts shall be served by marine evacuation systems complying with section 6.2 of the LSA Code or launching appliances complying with paragraph 6.1.5 of the LSA Code equally distributed on each side of the ship.

Communication between the embarkation station and the platform shall be ensured.

.2 Every life-raft on ro-ro passenger ships shall be provided with float-free stowage arrangements complying with the requirements of SOLAS Regulation III/13.4. as amended.

.3 Every life-raft on ro-ro passenger ships shall be of a type fitted with a boarding ramp complying with the requirements of paragraph 4.2.4.1 or 4.3.4.1 of the LSA Code as appropriate.

.4 Every life-raft on ro-ro passenger ships shall either be automatically self-righting or be a canopied reversible life-raft which is stable in a seaway and is capable of operating safely whichever way up it is floating. Open reversible life-rafts may be permitted if the administration of the flag State considers this appropriate in view of the sheltered nature of the voyage and the favourable climatic conditions of the area and period of operation, and provided that such life-rafts entirely comply with the requirements of Annex 10 to the High-Speed Craft Code.

Alternatively, the ship shall carry automatically self-righting life-rafts or canopied reversible life-rafts in addition to its normal complement of life-rafts, of such aggregate capacity as will accommodate at least 50 % of the persons not accommodated in lifeboats. This additional life-raft capacity shall be determined on the basis of the difference between the total number of persons on board and the number of persons accommodated in lifeboats. Every such life-raft shall be approved by the administration of the flag State having regard to the recommendations adopted by the IMO, with MSC/Circ. 809.

.7 Fast rescue boats

.1 At least one of the rescue boats on a ro-ro passenger ship shall be a fast rescue boat approved by the administration of the flag State having regard to the recommendations adopted by the IMO, with MSC Circ./809.

.2 Each fast rescue boat shall be served by a suitable launching appliance approved by the administration of the flag State. When approving such appliances, the administration of the flag State shall take into account that the fast rescue boat is intended to be



launched and retrieved even under severe adverse weather conditions, and also have regard to the recommendations adopted by the IMO.

- .3 At least two crews of each fast rescue boat shall be trained and drilled regularly having regard to section A-VI/2, table A-VI/2-2 'Specification of the minimum standard of competence in fast rescue boats' of the Seafarers Training, Certification and Watchkeeping (STCW) Code and the recommendations adopted by the IMO by Resolution A.771(18). The training and drills shall include all aspects of rescue, handling, manoeuvring, operating these craft in various conditions, and righting them after capsizing.
- .4 In the case where the arrangement or size of an existing ro-ro passenger ship is such as to prevent the installation of the fast rescue boat required by paragraph .3.1, the fast rescue boat may be installed in place of an existing lifeboat which is accepted as a rescue boat or boat for use in an emergency, provided that all of the following conditions are met:
  - .1 the fast rescue boat installed is served by a launching appliance complying with the provisions of paragraph .3.2;
  - .2 the capacity of the survival craft lost by the above substitution is compensated by the installation of life-rafts capable of carrying at least an equal number of persons served by the lifeboat replaced; and
  - .3 such life-rafts are served by the existing launching appliances or marine evacuation systems.
- .8 Means of rescue
  - .1 Each ro-ro passenger ship shall be equipped with efficient means for rapidly recovering survivors from the water and transferring survivors from rescue units or survival craft to the ship.
  - .2 The means of transfer of survivors to the ship may be part of a marine evacuation system, or may be part of a system designed for rescue purposes.

These means shall be approved by the flag State having regard to the recommendations adopted by IMO with MSC/Circ. 810.

- .3 If the slide of a marine evacuation system is intended to provide the means of transfer of survivors to the deck of the ship, the slide shall be equipped with handlines or ladders to aid in climbing up the slide.
- .9 Life jackets
  - .1 Notwithstanding the requirements of SOLAS Regulations III/7.2 and III/22.2, as amended, a sufficient number of life jackets shall be stowed in the vicinity of the assembly stations so that passengers do not have to return to their cabins to collect their life jackets.
  - .2 In ro-ro passenger ships, each life jacket shall be fitted with a light complying with the requirements of paragraph 2.2.3 of the LSA Code.

#### 5-2 Helicopter landing and pick-up areas (R 28)

NEW AND EXISTING CLASS B, C AND D RO-RO SHIPS:

- .1 Existing ro-ro passenger ships shall comply with the requirements of paragraph .2 of this regulation not later than the date of the first periodical survey after 1 July 1998.

.2 Ro-ro passenger ships shall be provided with a helicopter pick-up area approved by the Administration of the flag State having regard to the recommendations adopted by the IMO in Resolution A.229(VII).

.3 New ro-ro passenger ships of class B, C and D of 130 metres and upwards in length shall be fitted with a helicopter landing area approved by the Administration of the flag State having regard to the recommendations adopted by the IMO.

### 5-3 **Decision support system for masters (R 29)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

.1 Existing ships shall comply with the requirements of this regulation not later than the date of the first periodical survey after 1 July 1999.

.2 In all ships, a decision support system for emergency management shall be provided on the navigation bridge.

.3 The system shall, as a minimum, consist of a printed emergency plan or plans. All foreseeable emergency situations shall be identified in the emergency plan or plans, including but not limited to, the following main groups of emergencies:

.1 fire;

.2 damage to ship;

.3 pollution;

.4 unlawful acts threatening the safety of the ship and the security of its passengers and crew;

.5 personnel accidents; and

.6 cargo-related accidents;

.7 emergency assistance to other ships.

.4 The emergency procedures established in the emergency plan or plans shall provide decision support to masters for handling any combination of emergency situations.

.5 The emergency plan or plans shall have a uniform structure and be easy to use. Where applicable, the actual loading condition as calculated for the ship's voyage stability shall be used for damage control purposes.

.6 In addition to the printed emergency plan or plans the Administration of the flag State may also accept the use of a computer-based decision-support system on the navigation bridge which provides all the information contained in the emergency plan or plans, procedures, check lists, etc., which is able to present a list of recommended actions to be carried out in foreseeable emergencies.

### 6 **Launching stations (R 12)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

Launching stations shall be in such positions as to ensure safe launching having particular regard to clearance from the propeller and steeply overhanging portions of the hull, and so that survival craft can be launched down the straight side of the ship. If positioned forward they shall be positioned abaft the collision bulkhead, in a sheltered position.

### 7 **Stowage of survival craft (R 13 + 24)**

#### NEW AND EXISTING CLASS B, C AND D SHIPS:

- .1 Each survival craft shall be stowed:
  - a. so that neither the survival craft nor its stowage arrangements will interfere with other survival craft launching operations;
  - b. as near to the water surface as is safe and practicable; for a davit-launched survival craft the height of the davit head, with the survival craft in embarkation position, shall, as far as practicable, not exceed 15 metres to the waterline when the ship is in its lightest seagoing condition, and the position of a davit launched survival craft in the embarkation position shall be such that it stays clear of the waterline with the ship in the fully loaded condition under unfavourable conditions of trim of up to 10 ° and listed up to 20 ° either way for new ships, respectively up to at least 15 ° either way for existing ships, or to the angle at which the ship's weatherdeck becomes submerged, whichever is less;
  - c. in a state of continuous readiness so that two crew members can prepare it for embarkation and launching within 5 minutes;
  - d. as far forward of the propeller as is practicable; and
  - e. fully equipped, as required by the relevant SOLAS regulations, as amended, except that additional life-rafts as defined in note 3 to the table of Regulation III/2 may be exempted from some of the SOLAS requirements for equipment as mentioned in this note;
- .2 Lifeboats shall be stowed attached to launching appliances, and on passenger ships of 80 metres in length and upwards, each lifeboat shall be so stowed that the after end of the lifeboat is not less than 1,5 times the length of the lifeboat forward of the propeller.
- .3 Every life-raft shall be stowed:
  - a. with its painter attached to the ship;
  - b. with a float-free arrangement, complying with the requirements of paragraph 4.1.6 of the LSA Code enabling the life-raft to float free and, if inflatable, to inflate automatically when the ship sinks. One float-free arrangement may be used for two or more life-rafts if the float-free arrangement is sufficient to comply with the requirements of paragraph 4.1.6 of the LSA Code;
  - c. so as to permit manual release from its securing arrangements.
- .4 Davit-launched life-rafts shall be stowed within reach of the lifting hooks, unless some means of transfer is provided which is not rendered inoperable within the limits of trim of up to 10 ° and list up to 20 ° either way for new ships, respectively up to at least 15 ° either way for existing ships, or by ship motion or power failure.
- .5 Life-rafts intended for throw-overboard launching shall be so stowed as to be in a position providing easy side to side transfer at a single open deck level. If this stowing arrangement cannot be met additional life-rafts shall be provided so that the total capacity available on each side will accommodate 75 % of the total number of persons on board.
- .6 Life-rafts associated with a Marine Evacuation System (MES) shall:
  - a. be stowed close to the container containing the MES;

- b. be capable of release from its stowage rack with arrangements which will enable it to be moored and inflated alongside the boarding platform;
- c. be capable of release as an independent survival craft; and
- d. be provided with retrieving lines to the boarding platform.

#### 8 **Stowage of rescue boats (R 14)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

Rescue boats shall be stowed:

- .1 in a state of continuous readiness for launching in no more than 5 minutes;
- .2 in a position suitable for launching and recovery;
- .3 so that neither the rescue boat nor its stowage arrangements will interfere with the operation of any survival craft at any other launching station;
- .4 if it is also a lifeboat, in compliance with the requirements of Regulation 7.

#### 8a **Stowage of marine evacuation systems (R 15)**

NEW CLASS B, C AND D SHIPS AND EXISTING CLASS B, C AND D RO-RO SHIPS:

- .1 The shipside shall not have any openings between the embarkation station of the marine evacuation system and the waterline in the lightest seagoing condition and means shall be provided to protect the system from any projections.
- .2 Marine evacuation systems shall be in such position as to ensure safe launching having particular regard to clearance from the propeller and steeply overhanging positions of the hull and so that, as far as practicable, the system can be launched down the straight side of the ship.
- .3 Each marine evacuation system shall be stowed so that neither the passage nor the platform nor its stowage or operational arrangements will interfere with the operation of any other life-saving appliance at any other launching station.
- .4 Where appropriate, the ship shall be so arranged that the marine evacuation systems in their stowed positions are protected from damage by heavy seas.

#### 9 **Survival craft launching and recovering arrangements (R 16)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

- .1 Launching appliances complying with the requirements of section 6.1 of the LSA Code shall be provided for all survival craft and except:
  - .1 FOR EXISTING CLASS B, C AND D SHIPS:
    - a. survival craft which are boarded from a position on deck which is less than 4,5 metres above the waterline in the lightest seagoing condition and which either:
      - have a mass of not more than 185 kg, or
      - are stowed for launching directly from the stowed position under unfavourable conditions of trim of up to 10 ° and list up to at least 15 ° either way, or
    - b. survival craft which are carried in excess of the survival craft for 110 % of the total number of persons on board; or survival craft provided for use in conjunction with a marine evacuation system (MES) complying with the requirements of section 6.2

of the LSA Code and stowed for launching directly from the stowed position under unfavourable conditions of trim of up to 10 ° and list of up to 20 ° either way.

.2 FOR NEW CLASS B, C AND D SHIPS:

where, subject to survival craft and rescue boat embarkation arrangements being effective within the environmental conditions in which the ship is likely to operate and in all undamaged and prescribed damage conditions of trim and heel, the freeboard between the intended embarkation position and the waterline in the lightest seagoing condition is not more than 4,5 metres, the Administration of the flag State may accept a system where persons board life-rafts directly.

.2 Each lifeboat shall be provided with an appliance which is capable of launching and recovering the lifeboat.

FOR NEW CLASS B, C AND D SHIPS CONSTRUCTED ON OR AFTER 1 JANUARY 2003:

In addition there shall be provision for hanging-off the lifeboat to free the release gear for maintenance.

.3 Launching and recovering arrangements shall be such that the appliance operator on the ship is able to observe the survival craft at all times during launching and for lifeboats during recovery.

.4 Only one type of release mechanism shall be used for similar survival craft carried on board the ship.

.5 Falls, where used, shall be long enough for survival craft to reach the water with the ship in its lightest seagoing condition, under unfavourable conditions of trim of up to 10 ° and list of up to 20 ° either way for new ships, respectively up to at least 15 ° either way for existing ships.

.6 Preparation and handling of survival craft at any one launching station shall not interfere with the prompt preparation and handling of any other survival craft or rescue boat at any other station.

.7 Means shall be available to prevent any discharge of water on survival craft during abandonment.

.8 During preparation and launching, the survival craft, its launching appliance, and the area of water into which it is to be launched shall be adequately illuminated by lighting supplied from the emergency source of electrical power required by Regulations II-1/D/3 and II-1/D/4.

10 **Rescue boat embarkation, launching and recovery arrangements (R 17)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

.1 The rescue boat embarkation and launching arrangements shall be such that the rescue boat can be boarded and launched in the shortest possible time.

.2 The rescue boat shall be capable of being boarded and launched directly from the stowed position with the number of persons assigned to crew the rescue boat on board.

.3 If the rescue boat is included in the capacity of the survival craft and the other lifeboats are boarded from the embarkation deck the rescue boat shall, in addition to paragraph .2, also be capable of being boarded from the embarkation deck.

.4 Launching arrangements shall comply with the requirements of Regulation 9. However all rescue boats shall be capable of being launched, where necessary utilising painters, with the ship making headway at speeds up to 5 knots in calm water.

- .5 Recovery time of the rescue boat shall be not more than 5 minutes in moderate sea conditions when loaded with its full complement of persons and equipment. If the rescue boat is included in the capacity of the survival craft, this recovery time shall be possible when loaded with its survival craft equipment and the approved rescue boat complement of at least 6 persons.
- .6 FOR NEW CLASS B, C AND D SHIPS CONSTRUCTED ON OR AFTER 1 JANUARY 2003:

Rescue boat embarkation and recovery arrangements shall allow for safe and efficient handling of a stretcher case. Foul weather recovery strops shall be provided for safety if heavy fall blocks constitute a danger.

#### 11 **Emergency instructions (R 19)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

Whenever new passengers embark a passenger safety briefing shall be given immediately before or after departure. This briefing shall at least include the instructions required by Regulation III/3.3. It shall be made by means of an announcement in one or more languages likely to be understood by the passengers. The announcement shall be made on the ship's public address system or by other suitable means likely to be heard at least by the passengers who have not yet heard it during the voyage.

#### 12 **Operational readiness, maintenance and inspections (R 20)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

- .1 Before the ship leaves port and at all times during the voyage all life-saving appliances shall be in working order and ready for immediate use.
- .2 Maintenance and inspections of life-saving appliances shall be carried out in accordance with the requirements of SOLAS Regulation III/20, as amended.

#### 13 **Abandon ship training and drills (R 19 + R 30)**

NEW AND EXISTING CLASS B, C AND D SHIPS:

- .1 Every crew member with assigned emergency duties shall be familiar with these duties before the voyage begins.
- .2 An abandon ship drill and fire drill shall take place weekly.

Each member of the crew shall participate in at least one abandon ship drill and one fire drill every month. The drills of the crew shall take place before departure of the ship if more than 25 % of the crew have not participated in abandon ship and fire drills on board that particular ship in the previous month. When a ship enters into service for the first time, after modification of a major character or when a new crew is engaged, the above mentioned drills shall be held before sailing.

- .3 Each abandon ship drill shall include the actions required in SOLAS Regulation III/19.3.3.1, as amended.
- .4 Lifeboats and rescue boats shall be lowered at successive drills in accordance with the provision of SOLAS Regulation III/19.3.3.2, 3.3.3, 3.3.6, and 3.3.7, as amended.

The Administration of the flag State may allow ships not to launch the lifeboats on one side if their berthing arrangements in port and their trading patterns do not permit launching of lifeboats on that side. However, all such lifeboats shall be lowered at least once every 3 months and launched at least annually.

- .5 If a ship is fitted with marine evacuation systems drills shall include the actions required in SOLAS Regulation III/19.3.3.8, as amended.
- .6 Emergency lighting for assembling and abandonment shall be tested at each abandon ship drill.
- .7 Fire drills shall be carried out in accordance with the provisions of SOLAS Regulation III/19.3.4, as amended.
- .8 On-board training and instructions shall be given to crew members in accordance with the provisions of SOLAS Regulation III/19.4, as amended.