- 14. Requirements for chemical carriers—Every ship to which the Codes of Practice issued under The Shipping (Fire Appliances) Regulations 1989 apply which is a chemical carrier shall comply with the provisions of the Fire Appliances (Codes of Practice) Notice 1989 as they apply to a ship of Class VII, VIII or IX as appropriate and in addition shall be provided with fire appliances and fire protection in compliance with the requirements of the IMO International Code for the Construction and Equipment of Ships Carrying Dangerous Chemicals in Bulk as from time to time amended or substituted.
- 15. Requirements for ships provided with helicopter landing with or without fuelling facilities—(1) In every ship provided with a helicopter deck there shall be provided and stored adjacent to the means of access to that deck:
- (a) Dry powder extinguishers of total capacity not less than $46\ kg$.
- (b) A suitable foam applicator system consisting of monitors or foam making branch pipes capable of delivery foam solution at a rate of not less than 6 litres per minute per square metre of the area contained within a circle of diameter D m for not less than 5 minutes. For the purpose of this clause, D is the distance across the main rotor and tail rotor in the fore and aft line of a helicopter with a single main rotor and across both rotors for a tandem rotor helicopter.
- (c) Carbon dioxide extinguishers of total capacity of not less than 16 kg, which shall be so equipped as to enable it to be applied to the engine area of any helicopter using the deck.
- (2) The arrangement of water service pipes, hydrants, hoses and nozzles shall be such that at least 2 jets of water can reach any part of the helicopter deck, and where helicopter refueling facilities are provided, any part of the fuel storage tanks and associated pumps and piping.
- (3) All such nozzles provided in accordance with sub-clause (2) shall be of dual purpose type complying with the requirements of the Performance Standard.
- (4) In every ship provided with helicopter refueling facilities at least 2 portable extinguishers suitable for fighting oil fires shall be provided adjacent to the fuel storage tanks and associated pumps and piping in addition to any portable extinguishers required elsewhere in The Fire Appliances (Codes of Practice) Notice 1989.
- 16. Fire pumps—(1) In every passenger ship to which fire appliances (Codes of Practice) apply which is required by those Codes of Practice to be provided with fire pumps operated by power, such fire pumps (other than any emergency fire pump) shall together be capable of delivering for fire fighting purposes a quantity of water, under the conditions and at the pressure specified in clause 17 of this Code of not less than 2/3 of the quantity required to be dealt with by the bilge pumps provided in the ship in compliance with the Codes of Practice issued under The Shipping (Construction) Regulations 1989.
- (2) In every ship, other than a passenger ship or a fishing vessel, to which fire appliances (Codes of Practice) apply which is required by those Codes of Practice to be provided with fire pumps operation by power, such fire pumps (other than any emergency fire pump) shall be capable of delivery for fire fighting purposes a quantity of water, under the conditions and at the pressure specified in clause 17 of this Code which shall not be less than 4/3 of the quantity required in compliance with the Codes of Practice issued under The Shipping (Construction) Regulations 1989 to be dealt with by each of the independent bilge pumps in a passenger ship of the same dimensions when employed in bilge pumping, provided that in no such ship need the total required capacity of the fire pumps exceed 180m³/hour.
- (3) In every fishing vessel to which the Codes of Practice issued under the Shipping (Fire Appliances) Regulations 1989 apply which is required by those Codes of Practice to be

provided with fire pumps operated by power, such fire pumps (other than any emergency fire pump) shall together be capable of delivery for fire fighting purposes a quantity of water (Q) not less than that obtained from the following formula:

$$Q = (0.15 L(B + D) + 2.25)^2 m^3/hour$$

where L, B and D are the register dimensions of the vessel in metres. However, the total required capacity of the fire pumps need not exceed $180 m^3 / hour$.

- (4) Each of the fire pumps (other than any emergency pump) required by subclause (1) or (2) of this clause shall have a capacity not less than 80 percent of the total required capacity divided by the minimum number of required fire pumps but in any case not less than 25m³/hour. Provided than where more pumps than the minimum required pumps are installed the capacity of such additional pumps shall be to the satisfaction of the Chief Surveyor.
- (5) Each of the fire pumps (other than any emergency pump) required by subclause (3) of this clause shall have a capacity not less than 40 percent of the total required capacity provided that when more than 2 pumps are installed the capacity of such additional pumps shall be to the satisfaction of the Chief Surveyor.
- (6) Every fire pump required by the Codes of Practice issued under The Shipping (Fire Appliances) Regulations 1989 to be operated by power shall, except as expressly provided otherwise in those Codes of Practice, be operated by a means other than the ship's main engines. Fire pumps provided in compliance with Codes of Practice may be sanitary, ballast, bilge, or general services pumps provided:
 - (a) They are not normally used for pumping oil; and
- (b) If they are subject to occasional duty for the transfer or pumping of oil, suitable change-over arrangements are fitted and operating instructions are conspicuously displayed at the change-over position.
- (7) Every emergency fire pump required by the Codes of Practice issued under the Shipping (Fire Appliances) Regulations 1989 to be provided in ships of Class I with a gross tonnage of less than 1000 tonnes and in ships of Class VII and VIIA with a gross tonnage of more than 2000 tonnes, shall comply with the following:
- (a) The pump shall be capable of delivering at least 1 jet of water simultaneously from each of any 2 hydrants, hoses or nozzles provided in the ship while maintaining a pressure of not less than 200~kPa at any other hydrant in the ship.
- (b) The capacity of the pump shall be not less than 40 percent of the total capacity of the fire pumps required by subclause (1) or (2) of this clause as appropriate and in any case not less than $25 \, \mathrm{m}^3 / \mathrm{hour}$.
- (c) Any diesel driven power source for the pump shall be capable of being readily started in its cold condition down to a temperature of 0°C by hand (manual) cranking. If this is impracticable, or if lower temperatures are likely to be encountered, consideration is to be given to the provision and maintenance of heating arrangements, acceptable to the Chief Surveyor so that ready starting will be assured. If hand (manual) starting is impracticable the Chief Surveyor may permit other means of starting. These means shall be such as to enable the diesel driven power source to be started at least 6 times within a period of 30 minutes, and at least twice within the first 10 minutes.
- (d) Any service fuel tank shall contain sufficient fuel to enable the pump to run on full load at least 3 hours and sufficient reserves of fuel shall be available outside the main machinery space to enable the pump to be run on full load for an additional 15 hours.
- (e) The total suction head of the pump shall not exceed 4.5m under all conditions of list and trim likely to be