

Figure 1.6 - Operation of the RFD marine evacuation system

(c) Survival craft: marine escape system

See Figures 1.5 to 1.8.

(d) Single and double escape slides

The double escape slide deployed (Figures 1.4, 1.5, 1.7, 1.8 and 1.11) shows the liferaft stowage arrangements and the bowing line securement. In general, this slide is found on high freeboard vessels, such as RoRo or passenger ferry type craft.



Figure 1.7 - Practical demonstration of the Viking Marine Evacuation System

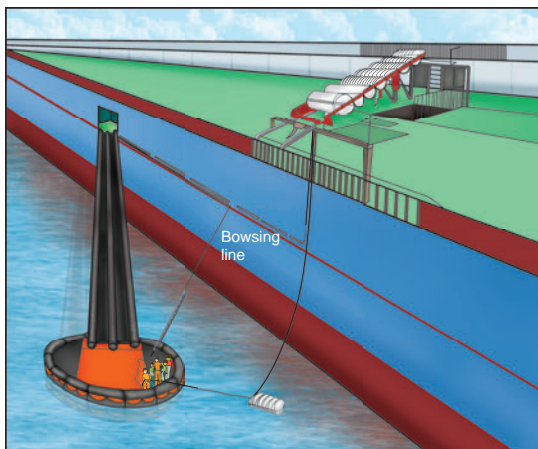


Figure 1.8 - Marine evacuation systems: double escape slide

A single slide (Figures 1.9 and 1.10) is used as an alternative to the double slide when the freeboard of the vessel is limited

and the number of passengers dictates fast evacuation.



Figure 1.9 - Marine evacuation systems: single escape slide



Figure 1.10 - Demonstration of the single trackway escape slide. Racked stowage of liferafts can also be seen, together with the single-arm davit rescue boat in a midships position.

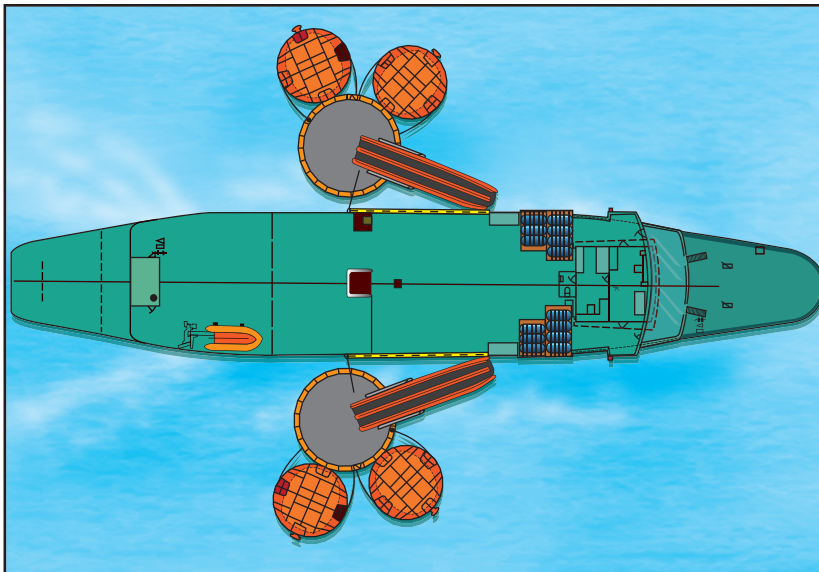


Figure 1.11 - Dual-track slide with a '100 Person' evacuation platform

Example showing the Viking Marine Evacuation System deployed to port and starboard.

Note the positions of the liferaft racks and the rescue boat.

Incident Report – ‘Sally Albatross’

March 1994, a Viking Marine Escape System was deployed to evacuate 1250 passengers and crew from a Finnish cruise ship following grounding of the vessel in ice conditions.

This was the first ever recorded use of an MES to save life at sea. The rescue time was approximately one and a half hours.

(e) Rack stowage arrangement for use with RFD marine evacuation systems

This is shown in Figure 1.17.

1.5.4 Marine Evacuation Chute (MEC) System

Several companies have now manufactured the chute system, including DBC of Canada and RFD in the UK. Although variations of operation differ slightly between manufacturers, the principle of safe fast evacuation is the same.

How it Works

A single or double, near vertical fabric chute, is deployed from an upper embarkation deck by the action of a single crew member. The chute will then act as a ‘feeder’ for evacuees to descend to an inflated boarding platform or, in the case of the RFD model, directly into large capacity

inflated liferafts. Once fully loaded these would be manoeuvred away from the distressed vessel by the rescue boat(s).

Systems generally require the entrance and exits of the chutes to be manned to ensure a rapid throughput of personnel towards the survival craft.



Figure 1.12 - Marine evacuation chute training exercise

The RFD ‘Main-Ark’ configuration options: Double Chute with 2, 3 or 4 fully reversible liferafts providing speedy dry shod evacuation.

An example configuration of MEC system, as manufactured and produced by Dunlop/Beaufort - Canada, is shown in Figure 1.13, along with alternative housing arrangements (types ‘I’ & ‘O’ respectively) shown deployed from the embarkation deck.

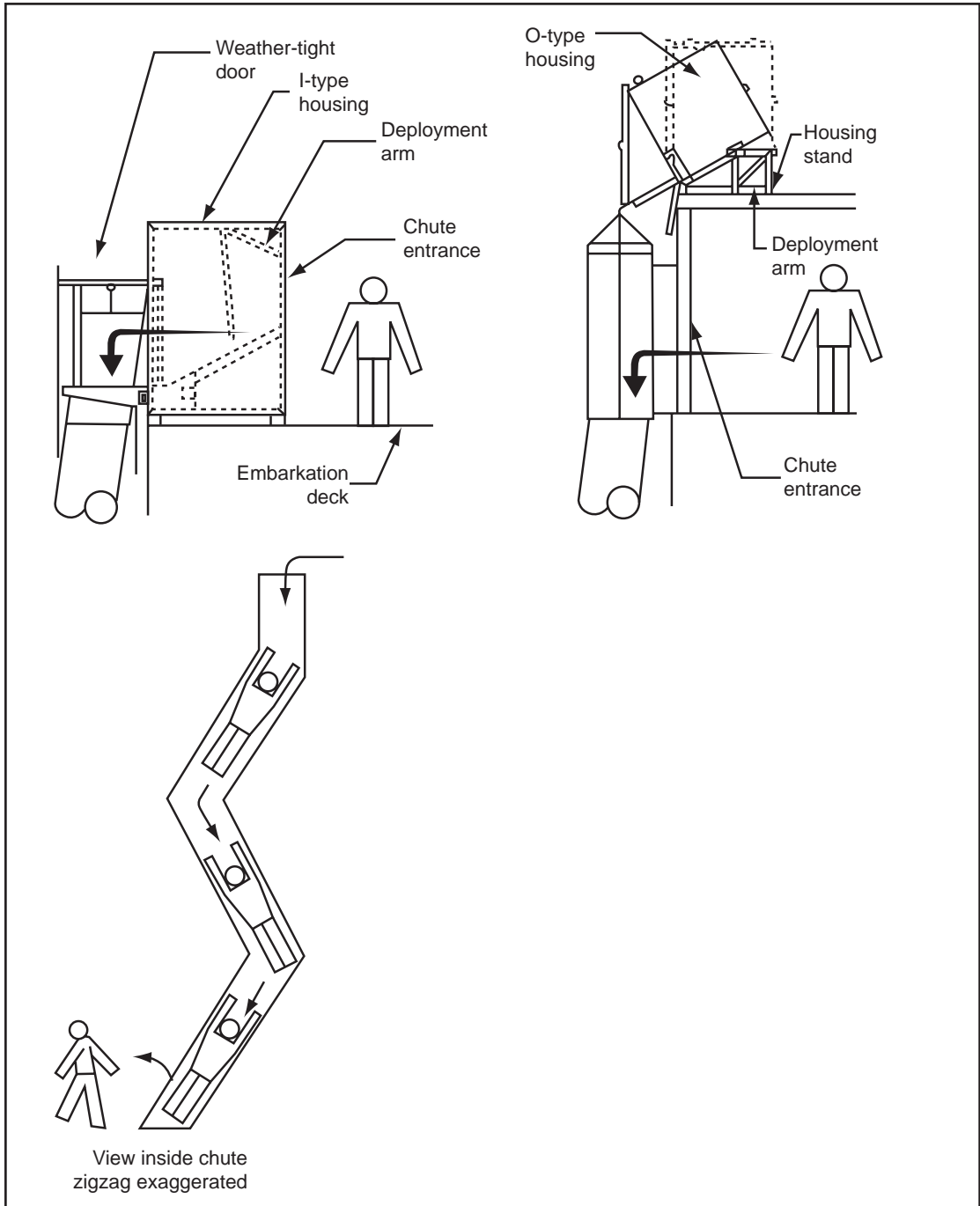


Figure 1.13 - Once passengers descend the MEC chute in zigzag pattern they are transferred to a liferaft that is bowsed in at the platform. The actual controlled passive descent takes about 2 to 3 seconds from the point of entry through an approximate 13 metre fall. (Example configuration of MEC system as manufactured and produced by Beaufort - Canada)

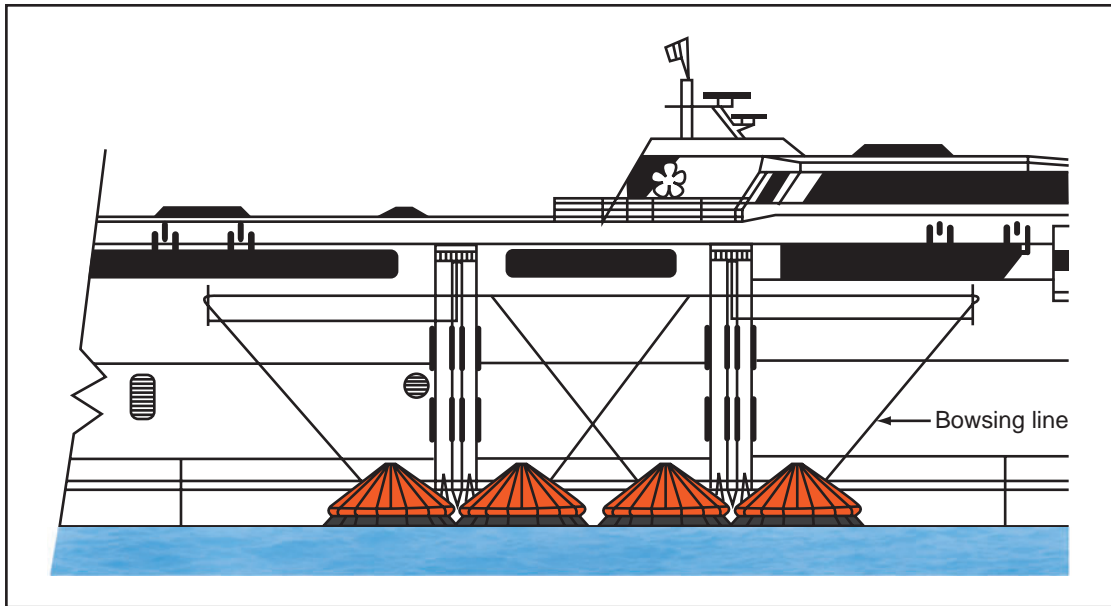


Figure 1.14 - Double chutes deployed with liferafts at the waterline

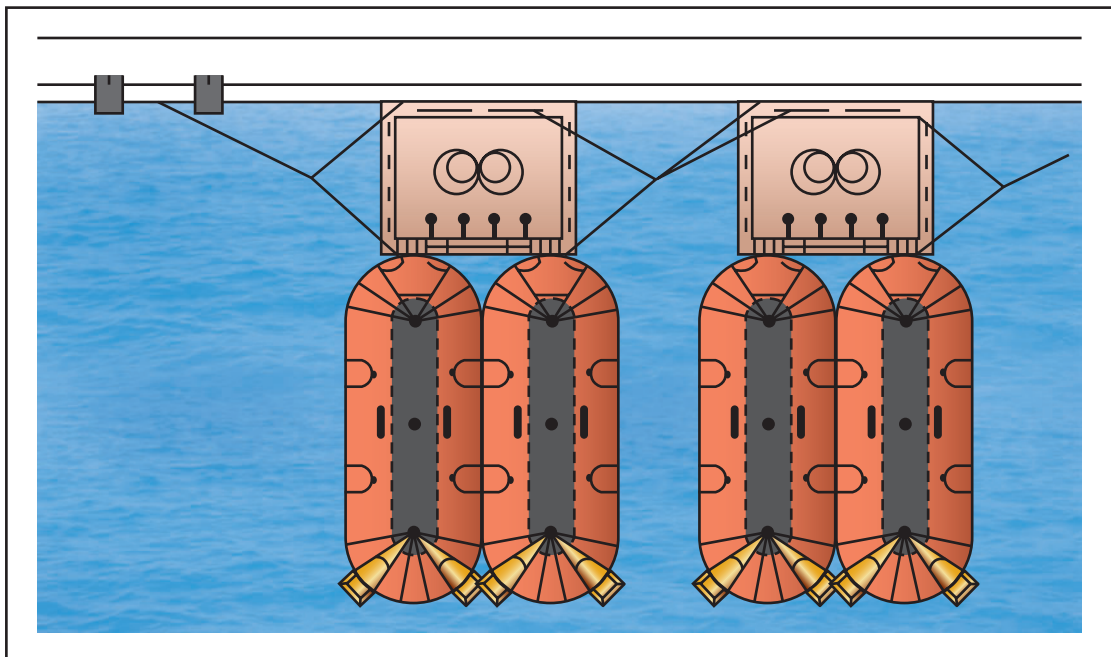


Figure 1.15 - Bowsing in arrangement, showing four liferafts in plan view operational forms of the two double chutes