Fatal accident on the Hong Kong registered bulk carrier “GOLDEN TAURUS” at sea on 5 February 2017

1. The incident

1.1 On 31 January 2017, the Hong Kong registered bulk carrier “Golden Taurus” (the vessel) completed loading of wheat at New Orleans, USA and commenced fumigation on the same day. After completion of the fumigation, the vessel commenced her voyage to Oran, Algeria on 1 February 2017.

1.2 At 0730 hours on 5 February 2017, a phosphine gas reading of 2.0 parts per million (ppm) was measured at the upper deck alleyway of the accommodation. The master instructed the crew to vacate their cabins immediately, but the engine cadet did not come out from his cabin. He was later found lying on his bed and taken outside by the crew at once. Although revival had been attempted on board, the engine cadet was confirmed dead by the Centro Internationale Radio Medico (CIRM) at 1422 hours. On arrival at Bermuda, the engine cadet’s body was lowered to a police boat and sent ashore at 1545 hours on 7 February 2017.

1.3 The investigation reveals the following contributory factors leading to the accident:

a) When the vessel was built, an electric cable conduit connecting No. 5 cargo hold and the accommodation was added at the request of the shipowner. This additional work had not been checked against the relevant rules and regulations of the classification society (CS) of the vessel. Both ends of the cable conduit were not sealed thus allowing the passage of phosphine gas from No. 5 cargo hold into the accommodation; and

b) the senior officers of the vessel were in lack of safety awareness. They did not inform the management company of the fumigation according to the company’s procedures. No immediate actions were taken to detect the cause of increasing phosphine gas concentration within the accommodation.
2. **Lessons learnt**

2.1 Ship crew are to ensure strict compliance with the company’s procedures and guidelines on fumigation of its fleet.

2.2 Senior officers should take cautious steps in relation to risk assessment and handling of toxic gas.