

Individual Risk (IR)

9.5.7.3 For the current (2001) and future (2012) case, the maximum level of individual risk is less than the “Acceptable Limit of the HK Risk Guidelines for individual risk (1×10^{-5} per year).

9.5.7.4 The IR is less than 10^{-5} per year and so is considered acceptable.

F-N Results

9.5.7.5 The FN curves for all materials and the combined trade lie in the acceptable region of the HKRG. Therefore the societal risk is acceptable.

Potential Loss of Life

9.5.7.6 The PLL results show an increase from 8.1×10^{-7} for the existing location to 7.3×10^{-6} and 7.9×10^{-6} per year for the proposed location for the year 2001 and year 2012 cases respectively. Whilst this is roughly an order of magnitude increase in risk it is not significant since the level of societal risk is acceptable.

Risk Mitigation

9.5.7.7 Since the societal risk for the proposed DG ferry pier lies in the acceptable region of the HKRG and the individual risk does not exceed the acceptable limit, no mitigation is necessary and the proposed relocation should be permitted to proceed.

9.5.8 References

DNV, 1996. “*Quantitative Risk Assessment of the Transport of LPG in Hong Kong*” for EMSD.

DNV, 1997. “*Quantified Risk Assessment Report For The Risk Assessment Of The Transport Of Hydrocarbons In Hong Kong*” for EPD.

DNV, 2000. “*Quantitative Risk Assessment of Proposed LPG Filling Station at Kwun Tong*”.

9.6 Chlorine Unloading Point

9.6.1 It was assumed that the chlorine unloading point will be permanently relocated outside SEKD as a consequence of the recommendations from previous SEKDFS EIA. Detailed information has been requested from Government Supplies Department (GSD). According to GSD, River Trade Terminal Co. Ltd. has planned to construct a commercial DG dock in its terminal in Tuen Mun. GSD is exploring the possibility of using the DG dock for loading and unloading of chlorine. According to the latest information from River Trade Terminal Co. Ltd., the proposed DG dock is expected to be available in the 2nd quarter of 2002.

9.6.2 Confirmation with GSD that permanent relocation of the chlorine loading / unloading point outside SEKD will be made prior to the population intake of SEKD, which is scheduled to be 2005. As such, risk associated with the co-existence of the interim chlorine unloading point and the SEKD population will no longer exist. On the other hand, if in any circumstances there is a need for co-existence of the chlorine dock and the future SEKD population, a detailed QRA would be required and the results are very likely to be unfavourable.