Project Title: Upgrading of Tai Po Sewage Treatment Works (EIA-286/2022)

Further Information to EPD

Request for Further Information — Information on the hazard to life assessment result by conducting a sensitivity test on the assumption that a population of 500 within the Shuen Wan Golf Course area that falls within the consultation zone of Tai Po Gas Production Plant.

Further Information

Tai Po Gas Production Plant (TPGPP) is a Potentially Hazardous Installation (PHI). Part of the Shuen Wan Golf Course (SWGC) is overlapping with the Consultation Zone (CZ) of TPGPP. Population increase due to development within the CZ of TPGPP may increase the hazard to life impact posed by the PHI. Based on the information provided in the approved EIA Report for SWGC (Register No.: AEIAR-221/2019), a daily average of 40 transient population would be arranged within this "Overlapping Area".

The hazard to life assessment conducted under this EIA for Upgrading of Tai Po Sewage Treatment Works assumed that a total population number of 500 would be evenly distributed within the entire SWGC. This is equivalent to a population of approximately 185 within the concerned "Overlapping Area", which is conservative as compared to 40 transient population assumed in the EIA for SWGC.

As presented in this EIA Report, the area within SWGC would be exposed to an individual risk level of less than 1E-09 per year from TPGPP. This is well below the acceptable off-site individual risk level of 1E-05 per year.

To further address the uncertainties on the future population in SWGC, a separate sensitivity test has been conducted assuming that the population within the concerned "Overlapping Area" would be 500. The sensitivity test indicated that adopting this new population assumption would not change the hazard to life assessment results (including the shape of F-N Curves and the Potential Loss of Life Distribution) presented in this EIA Report.

The F-N Curve for TPGPP produced under this sensitivity test are presented in **Figure 1**, and as compared to the relevant F-N Curve presented in the EIA Report as extracted in **Figure 2**, the shape of the F-N Curve remains unchanged.

Figure 1 F-N Curve for Tai Po Gas Production Plant (Sensitivity Test)

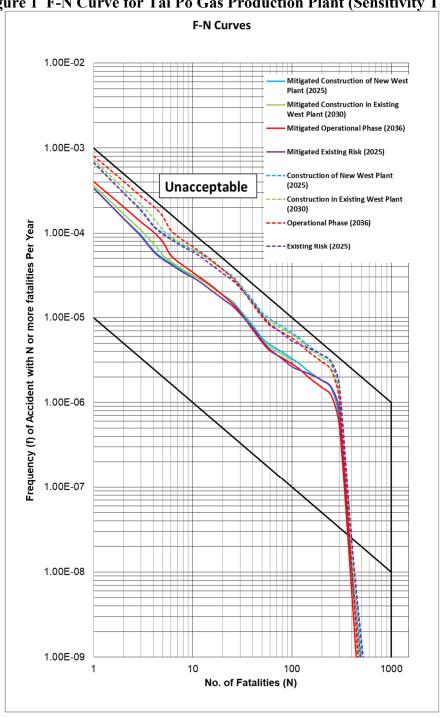


Figure 2 F-N Curve for Tai Po Gas Production Plant (Extracted from the EIA Report)

