Executive Summary

This is an environmental baseline monitoring report for the Project "Construction of Lamma Power Station Extension" prepared by the Environmental Team (ET). This report contains the results of the baseline air quality, noise, marine water quality and marine ecological survey that were mainly performed in 2000.

The baseline 24-hour Total Suspended Particulate (TSP) monitoring was conducted at the existing three dust monitoring stations (viz. Reservoir, East Gate and Tai Yuen Village) from January to March 2000. The baseline 1-hour TSP monitoring was carried out for 14 days in March 2000 at the existing two dust monitoring stations (viz. Reservoir and East Gate) when the highest dust impact was expected.

Baseline noise monitoring of six consecutive Leq (5 min) was carried out at the Ash Lagoon for the construction of Lamma Extension during 1-11 November 2000 while that for the construction of the Transmission System was carried out at Pak Kok Tsui during 24-30 November 2000. The monthly 30-minute Leq's measured at the existing Ching Lam noise monitoring station in the past 12 months (viz. from December 1999 to November 2000) were regarded as the baseline noise levels for the construction of Lamma Extension.

The baseline water quality monitoring was conducted between 6 November and 1 December 2000. There were seven sensitive receivers chosen on the basis of their proximity to the dredging and filling operations and five control stations to monitor the ambient marine water quality in relation to other activities with potential water quality impacts from other concurrent construction projects. Monitoring was carried out three times per week for four weeks. Readings were taken at each location during both the mid-flood and mid-ebb tides.

Baseline TSP and water quality data were collected to derive the Action/Limit Levels for air and marine water quality during the impact/compliance monitoring throughout the construction of the Project. The baseline noise monitoring results at Ash Lagoon/Pak Kok Tsui and Ching Lam would be used for applying background correction to the noise levels at the corresponding monitoring locations

Baseline marine ecological monitoring was conducted during 21-23 November 2000 to establish the status of scleractinian and soft coral assemblages prior to the commencement of the reclamation work. The objective of the survey is to provide reference data for future post-construction survey to ascertain the extent of recolonisation of soft corals.

No major activities influencing air quality, noise, marine water quality and marine ecological survey were identified during the baseline monitoring.