

EXECUTIVE SUMMARY FOR STUDY ON PRIVATE OFFICES

Realizing the importance of energy efficiency and conservation, the Energy Efficiency Office (EEO) of Electrical and Mechanical Services Department (EMSD) of the Hong Kong SAR Government had commissioned a study to develop the first set of energy indicators and benchmarks for the private office buildings in Hong Kong in 2001. As part of the Government's ongoing efforts to promote efficient use and conservation of energy, the EEO of the EMSD of the Hong Kong SAR Government commissioned another study in 2007 to develop and update a new set of energy consumption indicators and energy consumption benchmarks so as to keep track the recent energy consumption of the private offices in Hong Kong.

The establishment of the energy benchmarks for this study aims to provide comparable indicators for office building premises with their operational and end-use characteristics difference being identified and normalized. With the use of energy benchmarking model and benchmarks, the energy consumption efficiency difference of premises within a subgroup can be compared in an equal and fair basis.

As part of the study, extensive survey was carried out to collect in-depth field data about energy consumption, building and operational use, usage and adoption of different energy efficient system and equipment in the premises of private offices in Hong Kong. Survey data were collected and used for the development of energy consumption indicators and benchmarks as well as for the subsequent updating of the web-based energy benchmarking ware that is currently available at the EMSD web site.

With the publication of the new set of energy consumption indicators and benchmarks, the general public is able to collect information about the energy consumption levels of the private offices in Hong Kong. This also serves as a valuable tool for the property management to analysis their energy consumption and efficiency levels of their energy end-use as compared with other similar office premises in Hong Kong. In particular, Government can. also make use of the new information in helping the formulation of future policies regarding the promotion of efficient energy consumption in Hong Kong.

In this study, energy indicators and benchmarks as well as the energy benchmarking models for different premises of office buildings are developed and updated to reflect the latest energy consumption of private offices in Hong Kong. The processes and major work during the energy consumption indicators and benchmarks development process leading to the

development of benchmarking models of the study are as follows:

- i) Conduct office energy consumption surveys to gather up-to-date field data and to derive relevant energy end-use and energy consumption information for the private office segment.
- ii) Compilation of the energy consumption indicators, primary and secondary indicators from data and information derived from the field survey data.
- iii) Derives and updates energy benchmarking models for energy consuming subgroups of the private office building. The benchmarking models can be used by the general public on benchmarking their energy consumption performance against peers of the same subgroups.