

“Study report on photovoltaic (PV) applications and PV potential of building rooftops in HK” released

The Electrical and Mechanical Services Department (EMSD) earlier commissioned a consultant to assess the solar photovoltaic (PV) potential of building rooftops in Hong Kong. A spokesperson for the EMSD said today (July 12) that the study has been completed.

As the consultant pointed out in the study, installation of solar PV systems in Hong Kong is subject to various restrictions. For example, the systems may not be effectively installed in around one-third of the gross total roof area in Hong Kong for reasons such as low solar irradiance, and a large portion of the roof areas being used for other purposes such as refuge areas and building services components including plant rooms and air-conditioner outdoor units. Taking into account these restrictions, the consultant estimated that the annual electricity generated could be around 880 000 megawatt-hours at most, if the building rooftops in Hong Kong are fully used to install solar PV systems. Whether this potential can be fully exploited depends on a number of factors, including the buildings' structural integrity and the building owners' preferences.

To encourage the development of renewable energy (RE), the Government has taken the lead by earmarking \$2 billion to implement various projects at premises such as government buildings, venues and community facilities, and will install larger-scale solar generation systems at suitable locations at reservoirs and landfills. Beyond the Government, the two power companies have introduced a Feed-in Tariff (FiT) to provide incentives for individuals and organisations to invest in RE. The Government has also implemented facilitation measures including suitably relaxing the installation restrictions on the rooftops of New Territories Exempted Houses (commonly known as village houses), and launching Solar Harvest to install solar PV panels for eligible schools and welfare non-governmental organisations.

On technical support, the EMSD has uploaded a reference list of PV system contractors and relevant information to its Hong Kong Renewable Energy Net. The EMSD has also set up the FiT hotline, published the Guidance Notes for Solar PV System Installation, enhanced training for the trade, and more. The Government will continue to encourage the community to join hands in fostering RE development.

The executive summary of the study report has been uploaded to the EMSD's website (re.emsd.gov.hk/english/index.html).