



Report on Activities on Energy Efficiency and Conservation

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The activities on Energy Efficiency and Conservation in the months of July and August 2007 commenced with the 'Seminar on Energy Efficiency and Conservation'.

Guidelines -

Implementation and Benefits' on 31 July 2007. This seminar was jointly organised by Pusat Tenaga Malaysia (PTM) with the Institution of Engineers, Malaysia (IEM). This half-day seminar was held at the Marriott Putrajaya together with the launching of the 'Energy Efficiency and Conservation Guidelines for Malaysian Industries Part 1: For Electrical Energy-use Equipment'. The guidelines cover commonly-used equipment in the industries as follows:

1. Transformers
2. Motors
3. Chillers
4. Cooling Towers
5. Fans and Blowers
6. Pumps
7. Air Compressors, and
8. Lighting

The development of this set of guidelines is an activity of the Malaysian Industrial Energy Efficiency Improvement Project (MIEEIP), which is funded by the United Nations Development Programme (UNDP), the Global Environment Facility (GEF), the Malaysian Government and its private sector. The compilation of this set of guidelines is a culmination of the efforts and contributions of Malaysian engineers from the industry represented by government agencies such as Suruhanjaya Tenaga (ST), SIRIM and Jabatan Kerja Raya (JKR), professional bodies such as the Institution of Engineers, Malaysia (IEM), ASHRAE Malaysia Chapter (MASHRAE), the Association of Consulting Engineers, Malaysia (ACEM) and the Federation of Malaysian Manufacturers (FMM).

The seminar commenced with welcoming remarks from the chairman of PTM which was delivered by Dr Annuar Abdul Rahman, who is also the CEO of PTM. It was followed by the keynote address and official launching of the 'Energy Efficiency and Conservation Guidelines for Malaysian Industries, Part 1: Electrical Energy-use Equipment' by Dr Muhamad Hamzah, Senior Director of Economic Monitoring and Industry Development, ST.

The programme continued with talks on energy conservation and management from Dr Paul Hogan from Australia, Hiroshi Shibuya from ECCJ, Japan and Engr. Chen Thiam Leong from Malaysia, who were the distinguished speakers for the day with Engr. Dr KS Kannan as chairman of the session.

It was concluded that, though Malaysia is well-endowed with fossil fuel such as natural gas and petroleum to meet the country's demand, it is fast depleting and there is urgent need to have strategic plans for sustainability. It is also prudent to embark on the Energy Efficiency and Conservation Programme which is in line with the Ninth Malaysian Plan in the initiation of a five-year action plan for Energy Efficiency.

The three steps for promoting Energy Efficiency and Conservation could be summarised as follows:

1. Short-Term Strategy with minimal financial expenditure

To reinforce energy management and increase the efficiency of operations

- To reduce wastages and pollution
- To optimise the use of existing equipment
- To upkeep and maintain existing equipment in line with best practices

2. Medium-Term Strategy with some financial expenditure

Modify process and/or upgrade equipment

- Introduction of energy-saving processes and devices

3. Long-Term Strategy with much higher financial expenditure

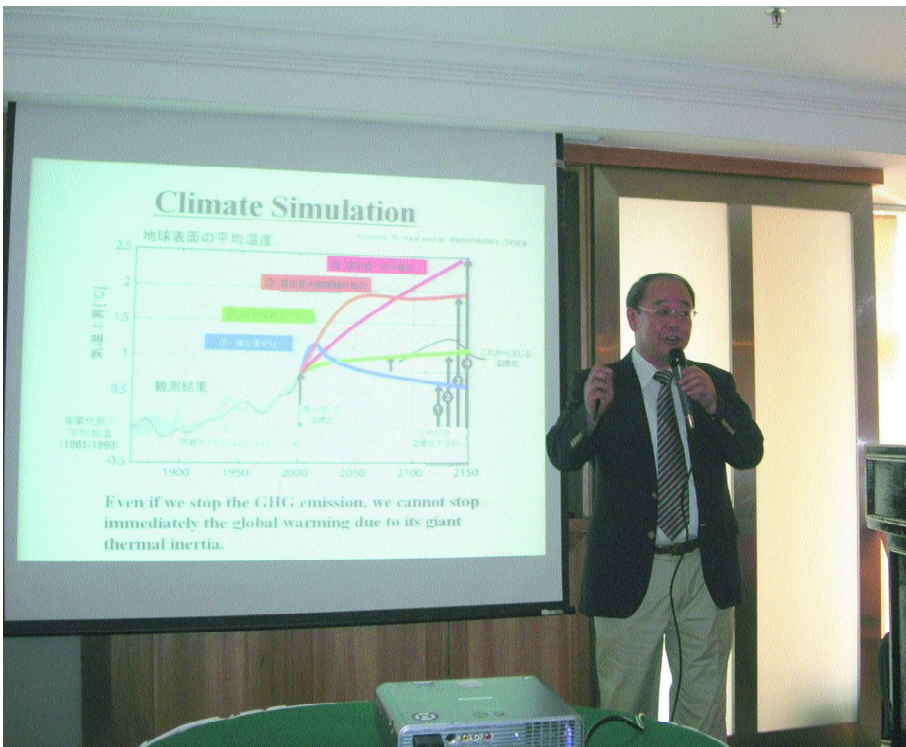
Introduction of new processes and high efficiency equipment

The effects of global climatic change due to the emission of greenhouse gases has caused havoc, damages and sufferings, and these are the reasons why Malaysia should be committed and take appropriate steps to address the issues at hand. Hence, the launching of the guidelines was the first step to get the message across.

On the following day of 1 August 2007, three pilot demonstration projects were launched following the implementation of the guidelines. This serves the purpose of determining the effectiveness of the guidelines after implementation, as well as the various issues, difficulties and constraints that may be encountered during implementation.

On the second day, Keisuke Matsuura, an advisor from the Trade and Economic Cooperation Department of JETRO, Japan, gave a very interesting talk entitled 'If the world were a village of 100 people', followed by a simulation on the prediction of global warming by a super-computer which was installed in the Environmental Institute of Tokyo University. This same presentation was previously given by Professor Ryoichi Yamamoto in Johor Baru. This presents a gloomy outlook of the future which is not that far away unless each of us decides to do something about it.

We should take this as our moral obligation to our future generation, to start conserving the use of energy, and using energy wisely and efficiently with the resultant outcome in the reduction of the emission of greenhouse gases that are causing global warming worldwide. Merely paying lip service will not improve the situation, there should be a concerted effort and commitment towards ensuring sustainable development with consideration towards



protecting the environment to ensure the expected outcome.

On the third day, members of the working group on the drafting of guidelines on ‘Thermal Energy’ were drawn from professionals representing the IEM, PTM, ACEM, MASHRAE, FMM and others from the industry. Guidance was also given by Hiroshi Shibuya,

Toshihiko Harashima and Tadashi Nakagawa, experts from the Energy Conservation Centre of Japan (ECCJ). The time schedule set for the workgroup will be a first review by the end of October 2007 with the final draft completed by December 2008 for official launching and implementation in the first half of 2009. ■