

# SUSTAINABLE ENERGY MANAGEMENT PROGRAM

## SCOPE OF SEMP (GUARANTEED SAVING)

### **1.1 Installation of Real Time Energy Monitoring System (RT-EMS):**

- Web-Based Metering Points (Isolation)
- Split Core Current Transformer (CT)  
(Inclusive Networking Cabling, Wiring, Testing & Commissioning)
- Networking Hub (Upgrade)
- LCD Monitor 21" Inch
- Controller (Built in)
- Outdoor Wireless Access Point
- Software & Program
- Data Plan for 10 Years
- System Warranty 2 Years against manufacturing defect
- User Manual for the System
- Daily Online Analytics Report
- SMS / Email Alert

### **1.2 Energy Conservation Program (No-Cost & Low-Cost)**

#### **i) Technical Support for 6-Months**

- TOFM will provide Site Energy Technician for **6-months (Twice a Week)** for daily site energy monitoring and data collection

#### **ii) Daily Energy Monitoring Report**

- To submit Daily online energy monitoring report

#### **iii) Monthly Energy Analytics Report Submission**

- To carry out data monitoring, measure, audit, evaluate and analyze the total electrical energy consumption at the installation, including the significant end use of electricity

#### **iv) Energy Awareness Training & Energy Committee**

- To cultivate Energy Awareness Training to the key management team & technical staff in the organization
- Setting up Energy Committee and Energy Policy in the Organization

#### **v) Baseline and Energy Account Centre (EAC)**

- To determine the baseline Energy Efficiency Indices (EEI) for the Energy Management for each EAC

**vi) Preparation & Implementation of Energy Efficiency Program**

- Preparation & Submission of Energy Efficiency Improvement Action Plan (EEIAP)
- Improvement of Standard Operation Procedure
- Improvement of M&E Performance
- Carry out No-Cost and Low-Cost Measures activities (ECM)

**vii) Preliminary Energy Audit**

- To prepare 1<sup>st</sup> quarter Preliminary Energy Audit Report

**viii) Certified Energy Manager Report**

- To appoint Certified Energy Manager (CEM) and provide monthly CEM Report

**ix) Guaranteed Energy Saving**

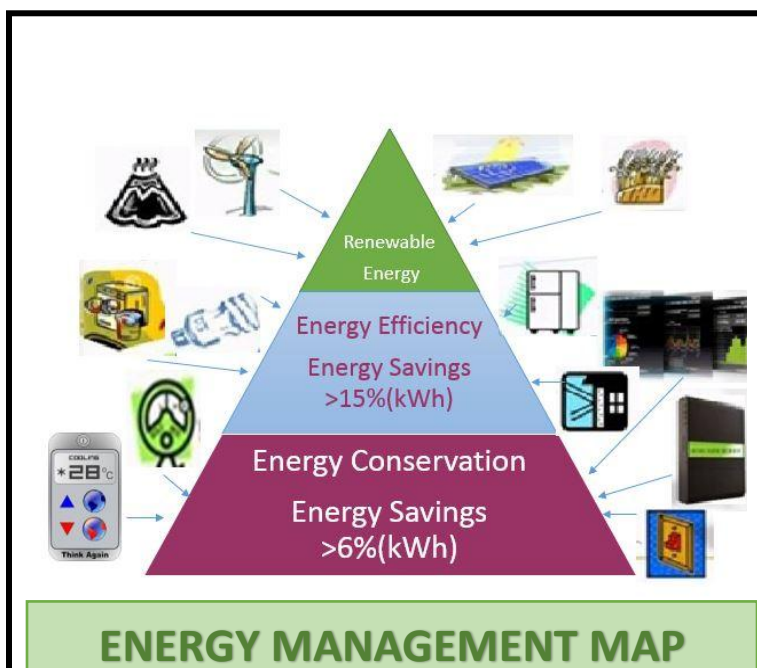
- Deliver **Guaranteed 6% of Energy Saving** within 6<sup>th</sup> month Implementation of Real Time Energy Monitoring System

**x) Detail Energy Audit Report for Energy Efficiency Proposal**

- To prepare detail **Technical Document for the Medium-Cost & High-Cost Measures (retrofit for load side equipment, upgrading, modification & replacement) to achieve Energy Saving more than 15%**. The document to be comprised with Energy Performance Contracting (EPC) guideline according to JKR with or without investment.

**xi) Preparation of Certification for Energy Management Gold Standard (EMGS) 1-Star Rating by Malaysian Green Technology Corporation**

- To assist on documentation preparation for EMGS 1-Star Audit & Certification



✓**Energy Conservation:** how to avoid using or wasting energy (usually no cost measures);

✓**Energy Efficiency:** How to do more, with the same resources or less

✓**RE** is the use of alternative, clean energy in place of conventional energy.