

Reducing home energy usage based on TRIZ concept

ABSTRACT

The increasing cost of energy especially with the recent electricity tariff hike in Malaysia has made home owners to be mindful of ways to reduce energy consumption. There are many ways to cut energy consumption at home, fundamentally they can be grouped into two types of approach namely technological and behavioural approach. Both approaches are not easy to implement as the technological one requires replacement of old devices and the behavioural one requires change of lifestyle. In view of this, this research work attempts to apply the theory of inventive problem-solving, TRIZ to solve the problem of increasing consumption of electricity at home. The aim of this research is to derive potential conceptual solutions to help home owners to reduce their energy consumption. The reduction in energy used will also contribute to cost saving for household and the reduction of carbon footprint.

Keywords: TRIZ; Engineering parameters; Energy usage