

Efficient Energy Management: A Novel Technique for Prolonged and Persistent Automotive Engine

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Abstract : The need to prevent and control rampant and indiscriminate usage of energy in present-day realm on earth has motivated active research efforts aimed at understanding of controlling mechanisms leading to sustained energy. Although much has been done but complexity of the problem has prevented a complete understanding due to nonlinear interaction between flow, heat and mass transfer in terrestrial environment. Therefore, there is need for a systematic study to clearly understand mechanisms controlling energy-spreading phenomena to increase a system's efficiency. The present work addresses the issue of sustaining energy and proposes a devoted technique of optimizing energy in the automotive domain. The proposed method focus on utilization of the mechanical and thermal energy of an automobile IC engine by converting and storing energy due to motion of a piston in form of electrical energy. The suggested technique utilizes piston motion of the engine to generate high potential difference capable of working as a secondary power source. This is achieved by the use of a gear mechanism and a flywheel.

Keywords : internal combustion engine, energy, electromagnetic induction, efficiency, gear ratio, hybrid vehicle, engine shaft

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