Review of Aircraft Engine Health Management Systems

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Abstract:
Aircraft engine is one of the most complex systems demanding efficient monitoring for safe operation and timely maintenance of the aircraft. A survey of the aircraft engine health monitoring / management (EHM) systems available in the literature is presented in this report. Attempt has been made to identify distinct systems and methodologies available at present for the aircraft engines. This will provide a good basis towards the engine health monitoring research initiated at NAL under a NPMASS sponsored project. Detailed review of gas turbine engine health management systems and related literatures has been presented. Attempt has been made to understand future requirements of the advance sensors for intelligent aero engine from EHM perspective.