



Materials Technologies Corporation, a fast growing small business dedicated to engineering research and technology development, has an immediate opening for an outstanding entrepreneurial Control Systems Engineer to join its aviation and aerospace group. The individual must provide extensive technical expertise in the area of structure and mechanism controls in a broad field of engineering, to directly perform product oriented R&D on a variety of programs funded by various DoD agencies, NASA, and large aerospace primes.

Responsibilities Include:

- Provide extensive expertise in modern time and frequency domain MIMO active control applications for vibration isolation and cancellation in complex aerospace structures. He/She will conduct experimental tests to establish data as the basis for controls design, or to validate control design performance.
- Create, develop, design and test complex controls for mechanisms and systems involving electrical, mechanical, optical, software, and/or hardware components, which will require a collaborative teaming with subject experts in several fields, and an extensive knowledge of own specialty.
- Provide expertise in System Identification; test and analyze system response data to ascertain system behavior.
- Provide expertise in the use of Matlab/Simulink software for the analysis and modeling of both linear and nonlinear systems. The applicant should have some familiarity with structural dynamics and the output of analysis tools such as MSC NASTRAN/PATRAN software.

Experience Requirements:

Education: Requires B.S. degree, preferably in Engineering or in a technical area of science and research with 6-10 years work experience or a MS degree with 2-8 years work experience, or a PhD with 0-4 years work experience.

- Expertise in control theory with high proficiency in Matlab/Simulink.
- Familiarity and interaction with structural dynamics, finite element analyses, and modal testing is highly desired.
- Broad knowledge of several fields and an extensive knowledge of own specialty
- Desired experience in component lifecycle ownership feasibility analysis;
- Excellent writing skills to author technical reports, proposals, and customer briefing documents;
- Management skills to coordinate research efforts by subcontractors and consultants.

MTC provides an open and healthy environment for not just *think-outside-the-box* creativity but encourages entrepreneurial drive to create a whole new box altogether.

Excellent compensation and work environment with ability to quickly grow into leadership.

Send detailed vitae and a list of patents and publications to: Opportunities@AboutMTC.com