

## **Mechanical Engineer/Materials Design Engineer**

Full Time, Immediate Availability

Dec, 2018

QuesTek Innovations LLC, located in Evanston, IL, a leader in the field of integrated computational materials engineering (ICME), is seeking candidates for a Mechanical Engineer/Materials Design Engineer to perform work related to ICME software development activities. QuesTek uses its proprietary *Materials by Design*<sup>®</sup> technologies to rapidly design and develop materials that have superior performance with reduced capital, processing, operating or maintenance costs. The responsibilities and activities of this position will include:

- Work with project teams to develop and use computational models for materials design
- Employ materials design models in project activities (e.g. thermodynamic modeling using CALPHAD-based applications and materials design-based software tools)
- Perform Process-Structure-Properties modeling and related research
- Perform FEM tasks with both commercial and open source software
- Develop software tools and programs using various coding languages (e.g. Python/C++ etc.)
- Project management, reporting activities, and documentation of development
- Development and writing of scientific proposals for commercial and government research

Strong programming/coding experience, and good communication skills (both written and oral) are essential. A good understanding of materials science is preferred. Preferred candidates will have an advanced degree (Master or equivalent) in mechanical engineer, materials science and engineering, or the equivalent experience level. A background in using ICME tools to develop novel materials is highly desirable. Knowledge of thermodynamic modeling using CALPHAD-based applications is desired but not required. Required expertise includes:

- Experience in scientific programming in a LINUX/Unix environment and BASH
- Proficient in Finite Element Methods and relevant software packages
- Programming experience in languages such as Python and C++
- Preferred to have education or experience in Metallurgy, Material Science, and Mechanical Engineering
- Ability to learn and absorb advanced knowledge in Material Science and Mechanical Engineering

Compensation will be commensurate with experience and will include competitive benefits such as health insurance and a 401(k). Interested candidates shall submit their resumes and other information such as a cover letter summarizing how their experience would allow them to excel in this position via the Careers page of [www.questek.com](http://www.questek.com). No phone calls, please.