

Position: Associate Mechanical Engineer

Location: Danbury, CT

We are currently seeking a highly motivated and capable Associate Mechanical Engineer to join the multi-disciplinary Advanced Technology team responsible for designing advanced fuel cell-based systems for both power generation and carbon capture applications. The Associate Mechanical Engineer will be responsible for designing and developing a broad range of fuel cell module and balance-of-plant components and assemblies for these systems as part of FCE's growing Molten Carbon (MCFC) technology. Additionally, the Associate Mechanical Engineer will be expected to work with team members from different disciplines to identify critical requirements and design for the correct operating conditions to ensure timely delivery of fabrications. This position requires flexibility to work on multiple projects in various stages of the design or validation process.

Responsibilities:

- Work with a broad multi-disciplinary team to gather design inputs requirements and implement into to CAD model designs.
- Model designs using Autodesk Inventor (preferred) and/or Solid Works.
- Produce and check engineering drawings and equipment specifications.
- Manage a Microsoft Excel based Bill of Materials (BOM)
- Work with component and equipment vendors to co-develop innovative designs that will meet the unique requirements of high temperature fuel cell systems.
- Prepare and present CAD designs and packaging concepts to other members of the team using an appropriate method such as MS Power Point, Design Review, or other.
- Work with team members to design experiments, write test plans, carry-out tests and present results.
- Hands-on assistance with physical assembly or construction of some components and/or systems and/or test set-ups. Includes assisting with assembly or builds, and designing tooling to assist with builds or test set-ups.
- Assist with writing technical reports, providing input, graphics from CAD, and write-ups as needed.
- Perform basic structural and thermodynamic hand calculations to prove out design feasibility.
- Learn to use computer-aided engineering (CAE) software, such as CFD/FEA analysis packages, to perform more detailed analysis to validate designs.
- Performs other tasks and projects as required.
- Travels (5% to 15%) domestically and/or internationally to support and execute project activities.

Qualifications:

Education: B.S. in Mechanical Engineering or related field required.

Experience: Requires 1 to 3 years of experience (may include any co-op positions) designing and building hardware utilizing CAD and engineering analysis either academically or professionally.

Required Experience and Characteristics:

- Highly proficient 3-D CAD part and assembly modeling skills with Autodesk Inventor, SolidWorks, or similar programs.
- Hands-on experience with working on equipment or hardware, even in a recreational or hobby/academic level.
- Test experience, especially with writing test plans and setting up experiments.
- Able to create detailed build-to-print engineering drawings taking into account availability of materials, manufacturing processes, packaging, and cost issues, especially for metal fabrications.
- Experience and understanding of basic structural and thermodynamic principles
- Ability to check the feasibility of a design by performing structural and thermodynamic hand calculations. Capable of learning and performing detailed analysis with FEA/CFD software tools.
- Basic understanding of electrical principles such as series/parallel circuits and heaters and control instruments such as pressure, flow, and temperature measurement devices.
- Must be versatile and willing to become proficient in many skills and take charge of all manner of engineering challenges associated with bringing a new concept to reality
- Comfortable with multi-tasking, working in an environment that requires rapid design changes, and take the initiative to address all impacted areas associated with the developing design
- Excellent oral and written communication skills to work effectively and openly with others, both internally and externally. Proficient in the use of Microsoft Office
- Team player who works willingly with others and keeps a positive, goal-focused outlook when tackling challenging, time-sensitive engineering problems.
- Understanding of AWS weld call-outs and familiarity with ASME Y14.5 GD&T is helpful.
- Experience with instrumentation such as thermocouples, pressure transducers, flow elements, and associated I/O equipment is helpful.
- Ability to obtain/maintain a valid passport and travel internationally without restrictions is required.

Working Environment/Physical Requirements:

- Desk work using a computer.
- This position is located indoors and requires the ability to move between separated rooms within the same building.
- Occasional travel via car and/or commercial airlines.
- Occasional work outdoors in a power plant environment during commissioning activities.
- May be required personal protective equipment as designated when required to perform occasional field work or in-house test facilities.

How to Apply:

Submit a copy of your resume, along with the voluntary self-identification forms, to jobs@fce.com. Please reference the Position (Job Title) in the subject header of your email.

Please note only those authorized to work in the United States will be considered.

No agency submissions, please. Resumes submitted to any FuelCell Energy employee without a current, signed and valid contract in place with the FuelCell Energy Recruiting team for this position will become the property of FuelCell Energy and no agency fees will be paid.

Equal Opportunity Employer - Vet/Disability

We offer a competitive compensation package as well as comprehensive benefits including medical, dental, vision, company-paid life/disability insurance, 401(k) plan, employee stock purchase plan and generous paid leave.

Employment with FCE is subject to pre-employment drug-screen and background investigation.

FuelCell Energy, Inc. is committed to ensuring that its application process provides an equal employment opportunity to all U.S. job seekers, including individuals with disabilities. If you believe you need a reasonable accommodation in order to search for a job opening or to submit an application, please send an email with your resume to **jobs@fce.com** indicating the specifics of the assistance needed.

You may also use **203-205-2070**, a phone line designed **exclusively** to assist disabled job seekers whose disability prevents them from being able to apply online. Only messages left for this purpose will be acknowledged. A response to your request may take up to two business days.