



Fuel Cell Challenge 2.0 – Criteria

Please review the below criteria and approved technology and industry categories prior to submitting your application.

Qualifications & Requirements:

All applicants must meet the following criteria for submission to be accepted

- Awardee must be located or commit to relocating in the Greater Columbia, SC market; comprised by Richland County and Lexington County
- The technology or business application must be in the hydrogen, fuel cells, and related applications field for consideration (see approved categories); final determination for inclusion/exclusion rest with the business plan review committee
- Must provide a detailed description and disclosure of intellectual property associated with submission (all submissions will remain confidential throughout the process and afterward, as negotiated)
- Must have secure intellectual property
- Must have a corresponding business plan demonstrating commercial viability
- Cannot have received previous Fuel Cell Challenge or SC Launch! funding for proposed submission
- Awardee must qualify and be approved for SC Launch! funding to be eligible to receive a Fuel Cell Challenge award

Approval Criteria:

Submissions will be subjected to a competitive review based on two principal categories:

Viability

- Principal markets – Size, depth, and commercial breadth of market
- Competition – Position in market and barriers to entry identified
- Competitive Advantage – commercial potential, disruptive technology, durable and protectable IP, potential to sustain
- Strategy – Shows compelling and realistic growth
- Leadership (management team) – Experience, ability to execute, support infrastructure
- Financial status – Current and proposed revenue generation status

Desirability

- University Affiliation - licensed IP, potential research/incubation affiliations
- Prior Investment – status of existing and potential sources of capital
- Economic Impact – Potential for job creation, investment, and economic factors

Approved Technology and Industry Categories

The following categories of fuel cell and related technologies will be considered for review under the Fuel Cell Challenge. Final determination for inclusion/exclusion will rest with the business plan review committee

Technology Categories	Description
Fuel Cell Technologies	Proton Exchange Membrane (PEM), Direct Methanol, Alkaline, Phosphoric Acid, Molten Carbonate, Solid Oxide, and Regenerative Fuel Cells (as defined by US DOE; http://www1.eere.energy.gov/hydrogenandfuelcells/fuelcells/fc_types.html)
Hydrogen Technologies	Storage (compressed gas, chemical hydrides, metal hydrides); Generation (reformation, water electrolysis, anaerobic digestion)
Engineering	Stack manufacturing, system integration, Balance of Plant (BOP) electronics, BOP hydraulics, supplemental technologies (Electrochemical Hydrogen Separation, other power feeds integration)
Materials	Membrane Electrode Assemblies (MEA) and related materials and components; Gas Diffusion layers (GDL) and related materials and components; Nano-materials for fuel cells
Chemical	Non-precious metal electro-catalysts for fuel cells; Electro-catalysts for fuel processing;
Batteries	Battery materials for hybrid fuel cell systems and advanced energy storage
Recycling	Fuel Cell materials recycling