



### Overview

The Maryland Energy Innovation Institute (MEI<sup>2</sup>) is focused on translating university energy research into new clean energy companies in the State of Maryland and thus simultaneously benefiting our environment and creating high paying jobs to help our State economy. MEI<sup>2</sup> proposes a unique opportunity through the following seed grant program to bridge the gap between academic transformative laboratory research results and prototype demonstrations to move early stage projects onto a pathway to commercial development. This call will support multiple seed grant awards with a maximum award ceiling of \$100,000 USD as well as potential Phase 2 awards with a maximum ceiling of \$200,000 USD for those projects that received a prior seed grant. The total amount of funding available for the FY2023 Seed Grant Program is \$650,000 USD. Twenty-one Energy Seed Grant awards (for ~\$2M) have previously been made to recipients from academic institutions throughout the state of Maryland. Success rate is dependent upon the number of proposals, but has averaged **40%**. Previous recipients can be found at: <https://energy.umd.edu/grantsawardschallenges>

### Criteria

**Eligibility:** All full-time tenure-track or professional track faculty members at any higher education institution with graduate program(s) and relevance to energy technology within the state of Maryland or Maryland based companies affiliated with and commercializing inventions created by those faculty.

**Program Focus:** The intent of the program is to foster commercialization by translating energy research into a prototype device or process through technology development, creation and/or advancement of university start-up companies within the state of Maryland.

**Expectations:** The project should advance energy technology and economic growth in Maryland. The device or process should have appropriate intellectual property protection (invention disclosure, patent application, or patent) filed with the applicant institution. At the end of one year, a report that describes work done and includes a plan for the next steps toward commercialization will be the final deliverable for the project. The plan should include: 1) clear assessment of technical readiness (including ultimate cost and scalability) of the product; 2) a survey of potential customers for the product; and 3) a strategy for next steps in financing the plan.

**Review:** Funding for the seed grants will be awarded on a competitive basis. The MEI<sup>2</sup> Investment Committee will review and select proposed projects. Applicants should not expect detailed written critiques of their proposals. Proposals will be reviewed for: 1) innovation and technical merit, 2) the likelihood of attracting follow-on funding, and 3) potential for commercialization.

*MEI<sup>2</sup>, in its sole discretion, selects projects for funding on a competitive basis with the primary aim of advancing the State of Maryland's interest in clean energy. MEI<sup>2</sup> is under no obligation to fund any particular proposed project and MEI<sup>2</sup> reviewers assume no liability related to proposals.*

**Allowable Expenses:** Research supplies; purchase or rental of equipment and materials; travel for project purposes (**excluding travel to meetings or symposia**); salary support for a temporary position (1 year or less) technician, or research associates (post-docs), and/or graduate students, and/or commercialization consultants; up to 10% salary support for Professional Track Faculty (PTK) in a Phase I proposal and up to 10% salary support for either PTK or Tenure Track Faculty (TTK) in a Phase II proposal.

**Unallowable Expenses:** Salaries for PIs (*with exceptions listed above*); administrative support

- **Conditions of the Award:** Money must be spent within 12 months of receipt of award to advance technology as described in the proposal. The awardees must submit an intermediate report after 6 months and a final report no later than 3 weeks after the end of the funded project. Awardees must submit a proposal to at least one external funding agency within 18 months of receiving the seed funding, and provide information on the seed funding (e.g., grant funds, publications, conferences) annually in the year following the award. Awardees should also acknowledge MEI<sup>2</sup> in any publications that result from the energy seed grant.

### **Proposal Content:**

#### **Signed proposal cover sheet (see attachment)**

*MEI<sup>2</sup> endeavors to protect confidential information but neither MEI<sup>2</sup> nor outside reviewers can guarantee confidentiality or security of the information submitted in a proposal.*

#### **Project Proposal (maximum 8 single-spaced pages) including:**

- Project Motivation—rationale for project and potential for investment (2 pages maximum)
- Project Description (4 pages maximum)
  - Description of market and why proposed technology provides a unique or preferred solution to meet those market needs
  - Clear description of the technology device or process, summarizing previous results obtained with enough technical information for reviewers to assess the feasibility and technical readiness-level of the project.
  - Description of intellectual property secured
  - Clear description of proposed technology development and why it is necessary to secure follow on investment funding
  - Brief risk assessment
- Additional Information including References (including full titles) 1 page maximum
- Targeted Proposal Budget - (see template for budget and justification: be specific about what the funds will be used for and how the PIs will allocate funds between the PIs).

### **Phase 2 Proposal Addenda**

Phase 2 proposals must also include progress made on the technical and business aspects of the project during the previous funding period and provide a more complete business plan towards

commercialization (3 pages max). External funding supporting the technology since the start of the initial seed grant will be viewed favorably in the review process for Phase 2 proposals.

Proposals must be submitted electronically to Cathy Stephens ([csteph5@umd.edu](mailto:csteph5@umd.edu)) as a **combined .pdf prior to close of business on Friday, January 12, 2024.**

**Additional Information Required (not included in page count)**

- Up-to-date Current and Pending funding statement that includes recent governmental (local, state or federal) support related to the project, all current governmental support, and all proposals for other government support that are pending (**see attached**); For the Current and Pending, indicate the relationship of each project to the proposal
- Provide information on angel, seed or venture funding already received or being actively sought for this project
- Biosketches (not included in page count) – 2-page NIH or NSF format (all senior personnel)

*\*The MEI<sup>2</sup> Investment Committee reserves the right to adjust the award amount given to less than what is proposed.*

-----  
The Maryland Energy Innovation Accelerator (MEIA) is a State of Maryland-sponsored venture development and advancement program focused on commercializing advanced energy and climate technologies developed at Maryland-based businesses, universities, and federal laboratories. MEIA provides Startups with access to domain experts, strategic partners, professional services, and project management support to execute commercialization milestones. To form or augment Startup Teams, MEIA recruits and engages experienced, industry-specific business executives and entrepreneurs (“energy executives”) who want to become founders or executives of a startup to lead its commercialization activities. This energy executive model can create higher-quality leadership teams that, when combined with great technology, produce the investible Maryland-based companies that form the foundation of an emerging clean energy and climate technology cluster.

MEIA provides three programs that represent a three-tiered approach that moves technology from concept to demonstration: 1) Pre-Accelerator – A 2-month customer-discovery program for the earliest technologies from universities and labs; 2) Launchpad – A 6-month commercialization planning program for high-potential technologies in universities or labs; and 3) Accelerator – A 6+ month program for established companies looking to fill senior roles, to demonstrate technology, and to obtain third-party capital investment.

MEI<sup>2</sup> encourages, but does not require, those interested in Energy Seed Grant funding to reach out to MEIA ([www.mdeia.org](http://www.mdeia.org)) for help and advice for developing the market section of the seed grant proposal. MEI<sup>2</sup> also encourages, but does not require, Energy Seed Grant funding recipients to meet with MEIA to discuss the development of the required commercialization plan. *Note: The MEIA program is sponsored by the State of Maryland, and it is free to participate.*



# MARYLAND ENERGY INNOVATION INSTITUTE

## Energy Innovation Seed Grant Request for Proposals FY2023

### COVER PAGE

**Title:**

**PI names and affiliations:**

**Name of Partnering Company (if applicable):**

**Total amount requested:**

**Statement of how this project translates research into technology and enables private investment (technology validation):**

### FINANCIAL AND REPORTING OBLIGATIONS

By signing, the PIs understand the conditions of the award (below).

### CONDITIONS OF THE AWARD

Awards are for one year, and funds must be spent within the year time frame. The final scientific and financial report must account for and demonstrate how seed funds enabled the research. No-cost extensions are not offered except under extreme circumstances (*i.e. COVID or other research shut down*). A mid-term report should outline advances towards scientific and other milestones and should be submitted promptly.

Promoting the success of MEI<sup>2</sup> energy seed grant teams is a central mission of the MEI<sup>2</sup>; therefore, PIs agree to:

- Provide scientific progress report to the MEI<sup>2</sup> at 6.5 months.
- Provide a scientific progress report and a summary of expenses to the MEI<sup>2</sup> at 13 months.
- Submit a proposal to at least one external funding agency within 18 months of receiving the seed funding, and provide information on the outcomes of the seed funding (e.g., grant funds, publications, conferences) annually.
- Acknowledge MEI<sup>2</sup> in any publications that result from the energy seed grant.

By signing the below, you acknowledge that the award is administered on a cost-reimbursable basis if the PI is not a University of Maryland College Park faculty member.

PI: \_\_\_\_\_

Date: \_\_\_\_\_

PI/Company Partner: \_\_\_\_\_

Date: \_\_\_\_\_



**ESTIMATED BUDGET**

**Allowable Expenses:** Research supplies; purchase or rental of equipment for new research; user fees for campus facilities; tuition; and direct salary and [fringe based on current rate](#) for a temporary position (1 year or less) for technicians, research associates (post-docs), graduate students, and/or commercialization consultants; travel for project purposes (excluding travel to meetings or symposia). Please draft your budget with guidance from departmental grants coordinator or financial administrator.

**Unallowable Expenses:** Salaries for PIs, administrative support, general telephone services and postage, alterations or renovations of laboratory space, purchase of laboratory or office furniture, purchase of periodicals and books, and dues and memberships in scientific societies.

Cost Categories	Description	Costs
Personnel (e.g. pre-doc, post-doc, lab staff, hourly)		
Personnel (e.g. pre-doc, post-doc, lab staff, hourly)		
Personnel (e.g. pre-doc, post-doc, lab staff, hourly)		
Personnel (e.g. pre-doc, post-doc, lab staff, hourly)		
Tuition		
<a href="#">Fringe benefits</a>		
Equipment (must be well justified)		
Supplies		
Other (detail)		
Other (detail)		
Other (detail)		
<b>Total of all Costs</b>		<b>0</b>



# MARYLAND ENERGY INNOVATION INSTITUTE

## **Energy Innovation Seed Grant Request for Proposals FY2023**

### **BUDGET JUSTIFICATION**

**Please provide a short justification for all budgeted cost categories above (i.e., Personnel, Tuition, Fringe, Equipment, Supplies, Other).**

### CURRENT AND PENDING SUPPORT (TEMPLATE)

Current:	Pending:			
Title:				
Source of Support:				
Senior Personnel:				
Total Award Amount:		Total Award Period Covered:		
Location of Project:				
Person-months Per year Committed to Project		Cal:	Acad:	Summer:
Relationship to Proposal:				