Funding Opportunity: NIST Releases Manufacturing USA Technology Roadmap Grant Competition

Lewis-Burke Associates LLC – June 21, 2021

The National Institute for Standards and Technology (NIST) released a new solicitation seeking technology roadmaps for advanced manufacturing clusters. Projects will create new or strengthen existing industry-driven consortia to increase U.S. competitiveness in advanced manufacturing including potential technology areas for creating future Manufacturing USA institutes. Manufacturing USA is a network of Institutes that aims to foster advanced manufacturing innovation across the nation, bringing together industry, academia, and federal partners to increase U.S. manufacturing competitiveness and national manufacturing research and development (R&D) infrastructure.

The NIST Manufacturing USA Technology Roadmap (MfgTech) Grant Program aims to support projects to “establish new or strengthen existing industry-driven consortia that address high-priority research challenges to grow advanced manufacturing in the United States.” NIST utilizes technology roadmaps as a decision-making tool that identifies challenges, not solutions, and the time frame in which these challenges need to be addressed. Entities responding to this solicitation should:

- “Address major technological barriers that inhibit the growth of advanced manufacturing in the U.S. that no single organization could tackle on its own;
- Identify and prioritize research projects supporting long-term industrial research needs including but not limited to, those identified in the Strategy for American Leadership in Advanced Manufacturing;
- Create new or update broadly available industry-driven, shared-vision technology roadmaps to support strategic and long-range planning; and
- Catalyze development and support the maintenance of a technology infrastructure and American excellence in advanced manufacturing, including identifying technology areas appropriate for potential new Manufacturing USA institutes.”

Roadmaps are encouraged to address (but not limited to) manufacturing-related challenges across the following industries:

- advanced communications networks;
- advanced industrial robotics;
- artificial intelligence machine learning;
- autonomous and remotely piloted vehicles;
- computing ecosystems;
- critical materials manufacturing;
- electronics design and manufacturing;
- food and agricultural manufacturing;
- high performance and nanomaterial processing;
- medical products manufacturing;
- quantum information science;
semiconductors and advanced packaging.

Teaming is encouraged and should include representatives across the value chain and innovation ecosystem for each industry. Additional information on the goals and objectives of the MfgTech roadmaps can be found in the full solicitation. U.S. innovation and competitiveness are major focus areas for the Administration, Congress, and federal agencies. The roadmaps developed through this, and other related solicitations have the potential to influence significant future funding opportunities across the federal government.

**Eligibility:** The solicitation is open to all nonfederal U.S. entities, including accredited institutions of higher education, nonprofit organizations, U.S.-based for-profit organizations, and state, local, territorial and tribal governments. “An entity may apply only once as a recipient; however, they may participate in any number of proposals as a subrecipient or collaborator.”

**Award Information:** Awards will be up to $300,000 for 18 months through cooperative agreements. The total number of awards will be dependent on final funding allocated in fiscal year (FY) 2022.

**Important Dates:**
- Proposals are due **August 17, 2021**.
- NIST will host a webinar on **June 25, 2021, at 2:00pm ET** to share more information on the MfgTech program and proposals. Interested participants must email manufacturingusa@nist.gov with “MfgTech Roadmap Webinar” in the subject line to register.
- NIST expects to award applicants by **October 2021**.

**Sources and Additional Information:**
- The funding opportunity can be found on [www.grants.gov](http://www.grants.gov) under solicitation number “2021-NIST-MFGTECH-01.”
- More information on Manufacturing USA can be found at [https://www.manufacturingusa.com/](https://www.manufacturingusa.com/).
- Previous examples of NIST roadmaps can be found at [https://www.nist.gov/oam/programs/advanced-manufacturing-technology-consortia-amtech-program](https://www.nist.gov/oam/programs/advanced-manufacturing-technology-consortia-amtech-program).