



2024 National STEM Festival & Challenge General Fact Sheet

National STEM Festival presented by:

EXPLR, in partnership with the U.S. Department of Education and with support from TIES and the STEM Learning Ecosystems Community of Practice (SLECoP).

Event Name:

2024 National STEM Festival

Festival Event Dates:

April 12-13, 2024

Event Location:

Washington, D.C.

Festival Event Overview:

The 2024 National STEM Festival celebrates a nationwide challenge to foster creativity, critical thinking, and a passion for STEM (Science, Technology, Engineering, and Mathematics) among middle and high school students. Presented by EXPLR in collaboration with the U.S. Department of Education and with support from TIES and the STEM Learning Ecosystems Community of Practice, this event is a key initiative under the Biden-Harris Administration to promote STEM education and careers, advancing equity and excellence for all students.

2024 Festival Themes:

Students participating in the Challenge will design projects within six categories, utilizing the engineering design process or the scientific method to address local or global challenges. These categories include:



1. Environmental Stewardship:

Projects promoting responsible use of natural resources, conserving water and energy, addressing climate change, and exploring scalable solutions to environmental issues.



2. Future Foods Systems:

Research equitable and sustainable practices in food production, distribution, and consumption, considering factors like climate change, population growth, resource scarcity, and food security.



3. Health & Medicine:

Innovating medical devices, disease diagnosis and treatment methods, and healthcare solutions, focusing on equitable access to healthcare.



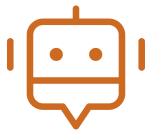
4. Power the Planet:

Designing alternative and sustainable energy sources, energy storage technologies, energy efficiency, and grid optimization.



5. Space Innovation:

Tackling challenges in aviation and aerospace, from life on Mars habitats to carbon emissions reduction and fuel efficiency optimization.



6. Tech for Good:

Utilizing AI, data visualization, robotics, and other technologies to develop programs or devices addressing real-world challenges, including closing the digital divide and addressing racial biases in technology.

Estimated Number of Festival Attendees:

1,000 attendees, including student STEM Champions, parents, corporate leaders, industry experts, official representatives, distinguished guests, STEM experts, educators, and journalists/media outlets.

Challenge Overview:

- Presented by [EXPLR](#), with support from TIES, the STEM Learning Ecosystems Community of Practice, and others, the 2024 National STEM Challenge is a nationwide challenge designed to cultivate creativity, critical thinking, and a love for STEM among middle and high school students.
- Select top-scoring STEM Champions from all 50 states, including the District of Columbia, U.S. territories, Department of Defense schools, Bureau of Indian Education schools, and non-public schools, will be invited to present their projects at the National STEM Festival in Washington, D.C., in April 2024.

Submissions Timeline & Milestones:

- September 12 - Ideation & Design Phase. Students and Teachers invited to [Pre-Register](#) on the [National STEM Challenge website](#).
- October 4 - The call for entries for the National STEM Challenge opens.
- November 12 - Entries close
- December 22 - Challenge finalists announced
- February 6 - National STEM Champions announced
- April 12 - National STEM Festival in Washington, D.C.

Outreach and Inclusion:

- TIES will collaborate with schools, educational institutions, community organizations, businesses, and STEM-focused institutions.
- We are calling for students in grades 6-12 nationwide to showcase their scientific projects, innovations, inventions, and research in solving real-world problems under six themes.
- Through TIES and our STEM Learning Ecosystems Community of Practice, we are dedicated to engaging local, state, and national markets to reach under-represented students in STEM.

About EXPLR:

EXPLR's mission is to help kids thrive in school and life by providing real-world, rigorous, and relevant educational resources. EXPLR is a streaming video and curriculum service for grade 5-12 students, teachers, and families that helps bridge critical gaps in K-12 education. It was co-founded by leading education and entertainment figures Jenny Buccos (founder of ProjectExplorer), Kari Byron (former Discovery Channel Mythbuster), and Andrew Zimmern (TV personality, producer, and U.N. World Food Programme Goodwill Ambassador). Since launching in 2021, EXPLR has been used in over 500 schools across 23 US states.



About TIES:

The Teaching Institute for Excellence in STEM (TIES) is dedicated to making STEM accessible to everyone, especially underserved and underrepresented learners. We do this by connecting stakeholders — educators, funders, community organizations, businesses, and government agencies — who, through collaborative partnerships, create meaningful and gainful STEM learning experiences. Our experienced team of consultants provides strategic planning support and guides design, training, and implementation across all of our services. **For more on STEM Ecosystems, [visit here.](#)**



Social Channels:

- Instagram: [@nationalstemfestival](#), [@EXPLR_media](#)
- Facebook: [NationalSTEMFestival](#), [EXPLRmedia](#)
- TikTok: [@nationalstemfestival](#)
- Threads: [@nationalstemfestival](#)
- X: [@national_stem](#), [@EXPLRmedia](#)
- LinkedIn: [explr-media](#)
- Event Hashtags:
 - [#NationalSTEMfestival](#)
 - [#STEMchallenge](#)
 - [#EXPLR](#)
 - [#SeeltBelt](#)
 - [#STEMpower](#)

Press:

Press Release: [Explr Announces First-Ever National Stem Challenge](#)

Fast Company: [A new national STEM challenge hopes to reinvent the science fair for the 21st century \(exclusive\)](#)

Videos: [Kari Byron announces the National STEM Festival: You Belong In STEM Challenge](#)

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