



UPR external funding success is of utmost importance to strengthen the connection between its investigators/faculty and funding entities who have the potential to sponsor their research and academic endeavors. This publication has been developed in order to summarize funding opportunities and promote the participation of faculty and collaborative research groups in their intent to apply for external funds. Such efforts are aligned with the UPR Strategic Plan 2017-2022: A New Era of Innovation and Transformation for Student Success; Certification 50 (2016-2017) of the Governing Board, December 19, 2016. Strategic Area: Research and Creative Work. Goal 2: Increase Applications for and awards of external funds for research and creative work.

SELECTED FUNDING OPPORTUNITIES

This is a selection of identified funding opportunities for the period ending 4/4/2024 and is in no way all-inclusive of funding opportunities available. Further information has been shared with External Resource Coordinators and Research Coordinators at each UPR campus.

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1. Support for Conferences and Scientific Meetings (Parent R13 Clinical Trial Not Allowed), NIH

Application Deadlines: August 12, 2024

Award Information: budgets are not limited but need to reflect the actual needs of the proposed project

The purpose of the NIH Research Conference Grant (R13) is to support high quality scientific conferences that are relevant to the NIH's mission and to public health. A conference is defined as a symposium, seminar, workshop, or any other organized and formal meeting, whether conducted face-to-face or via the internet, where individuals assemble (or meet virtually) for the primary purpose to exchange technical information and views or explore or clarify a defined subject, problem, or area of knowledge, whether or not a published report results from such meeting. The NIH recognizes the value to members of the research community and all other interested parties in supporting such forums.

The NIH recognizes that the value of conferences is enhanced when persons from diverse backgrounds and perspectives are included in all aspects of conference/meeting planning and when attendees are assured of a safe, respectful, and inclusive environment free from discrimination, harassment, and other barriers that might prevent or inhibit one's participation. NIH encourages conference grant applicants to enhance diversity by increasing the participation of individuals from diverse backgrounds, including those from underrepresented groups, in the planning and implementation, and ultimately, participation in the proposed conference.

NIH is also committed to changing the culture of science to end sexual harassment and other forms of harassment, including harassment on the basis of race, color, national origin, sex/gender, disability, and age in NIH-funded activities. Harassment, in any form, is detrimental and presents obstacles that hinder an individual's ability to fully participate in science. Only in safe, respectful, and inclusive environments can individuals achieve their fullest potential and support the mission of the NIH.

Additionally, all NIH sponsored and/or supported conferences must be held at accessible sites. Conference registration materials should provide a questionnaire that will allow participants with disabilities to voluntarily identify any special needs, so that conference organizers can make plans to accommodate these needs.

Support of conferences is contingent on the fiscal and programmatic interests and priorities of the individual NIH Institutes and Centers (ICs). Therefore, a conference grant application is required to contain a permission-to-submit letter from any one of the participating ICs' conference grant contact person.

Applicants are urged to initiate contact well in advance of the chosen application due date and no later than 6 weeks before that date.

Link to Additional Information: <https://grants.nih.gov/grants/guide/pa-files/PA-24-141.html>

2. Promoting Postbaccalaureate Opportunities for Hispanic Americans (PPOHA) Program, Dept. of Education

Application Deadlines: May 13, 2024

Award Amount:

- **Individual Development Grants: \$550,000 per year for a project period of up to 60 months**
- **Cooperative Arrangement Development Grants: \$1,000,000 per year for a project period of 60 months**

The purposes of the PPOHA Program are to: (1) expand postbaccalaureate educational opportunities for, and improve the academic attainment of, Hispanic students; and (2) expand the postbaccalaureate academic offerings, as well as enhance the program quality, at the institutions of higher education (IHEs) that are educating the majority of Hispanic college students and helping large numbers of Hispanic and low-income students complete postsecondary degrees.

This competition includes an absolute priority focused on expanding the number of Hispanic and other underrepresented graduate and professional students served by the applicant institution, or the institutions that are part of the cooperative agreement application, through expanded courses and institutional resources. In responding to this absolute priority, applicants should demonstrate how they will expand academic offerings that prepare postbaccalaureate students for the

workforce by developing or enhancing current course offerings in existing postgraduate degree, certificate, or credentialing programs or by establishing new postgraduate degree, certificate, or credentialing programs. Additionally, applicants are encouraged to form partnerships with other Hispanic- Serving Institutions (HSIs) and non-HSI IHEs that may assist the applicant IHE in leveraging resources and opportunities for apprenticeships, internships, workplace learning, or similar experiences for students.

This competition also includes two competitive preference priorities focused on meeting students' holistic needs and providing flexible, high- quality, and accessible learning opportunities, and three invitational priorities that support increasing the number of Hispanic doctoral candidates and graduates through collaboration, increasing the number of Hispanic educators, and increasing the number of Hispanics prepared for the STEM workforce.

Absolute Priority: Expanding the number of Hispanic and other underrepresented graduate and professional students that can be served by the institution by expanding courses and institutional resources.

Competitive Preference Priorities:

- **Competitive Preference Priority 1:** Meeting Student Social, Emotional, and Academic Needs (up to 10 points). Projects that are designed to improve students' social, emotional, academic, and career development, with a focus on underserved students, through one or both of the following areas:
 - a) Creating education or work-based settings that are supportive, positive, identity-safe and inclusive with regard to race, ethnicity, culture, language, and disability status, through supporting students to engage in real-world hands- on learning that is aligned with classroom instruction and takes place in community-based settings, such as apprenticeships, pre-apprenticeships, work-based learning, and service learning, and in civic activities, that allow students to apply their knowledge and skills, strengthen their employability skills, and access career exploration opportunities. (up to 2 points)
 - b) Creating a positive, inclusive, and identity-safe climate at IHEs through one or both of the following activities:
 - 1) Implementing evidence-based practices for advancing student success for underserved students. (up to 4 points)
 - 2) Providing evidence-based professional development opportunities designed to build asset-based mindsets for faculty and staff on campus and that are inclusive with regard to race, ethnicity, culture, language, and disability status. (up to 4 points)
- **Competitive Preference Priority 2:** Increasing Postsecondary Education Access, Affordability, Completion, and Post-Enrollment Success (up to 5 points). Projects that are designed to increase postsecondary access, affordability, completion, and success for underserved students by supporting the development and implementation of high-quality and accessible learning opportunities, including learning opportunities that are accelerated or hybrid online; credit-bearing; work- based; and flexible for working students.

Invitational Priorities:

- **Invitational Priority 1:** Improving the Hispanic Ph.D. Pipeline through Collaboration. Projects that are supported by a consortium of HSIs, including no fewer than three HSIs that award Ph.D.s, and are designed to improve the Hispanic Ph.D. pipeline and increase the number of Hispanic Ph.D.s by supporting teaching, research, and resource sharing across institutions, creating mentorship opportunities, and supporting experiential learning, as well as other high-impact practices that have demonstrated positive results for Hispanic postbaccalaureate students.

Under this priority, we are particularly interested in projects designed to address the low percentage of Hispanics who both enroll in Ph.D. programs and attain the Ph.D. degree by establishing, improving, or expanding programs that:

- a) Increase the Hispanic student pipeline for Ph.D.s.
- b) Improve the academic preparation of postbaccalaureate students through course offerings, research opportunities (including study abroad opportunities), mentorship, and learning communities.
- c) Combine traditional academic training with industry-standard specialized knowledge and skills that

will improve student educational outcomes.

- d) Evaluate the association between the consortium’s activities and Ph.D. attainment by Hispanic students.
- **Invitational Priority 2:** Supporting the Hispanic Educator Pipeline. Projects that are designed to establish or expand entry points into the educator pipeline, to increase the number of Hispanic educators, the number of Hispanic students earning postgraduate degrees in preparation for employment as an educator, or both.

Under this priority, we are particularly interested in projects designed to establish, improve, or expand programs that address one or more of the following:

- a) Recruit racially, ethnically, and linguistically diverse educators.
 - b) Retain diverse educators by strengthening support networks and providing professional development.
 - c) Combine traditional academic training with specialized knowledge and skills that will prepare students for entry into the educator profession.
- **Invitational Priority 3:** Increasing Hispanics in Science, Technology, Engineering, and Mathematics (STEM). Projects that are designed to increase the number of Hispanic postbaccalaureate students and educators in STEM. Under this priority, we are particularly interested in projects designed to establish, improve, or expand programs that:
 - a) Identify and implement instructional strategies, systems, and structures that improve postsecondary learning and retention that leads to completion of a master’s, Ph.D. or terminal degree in STEM.
 - b) Combine traditional academic training with specialized knowledge and skills through research, apprenticeships, and technology applications that will prepare students for STEM fields.
 - c) Provide pathways for entry into the STEM workforce.

Link to Additional Information: <https://www.govinfo.gov/content/pkg/FR-2024-03-14/pdf/2024-05463.pdf>

3. Confronting Hazards, Impacts and Risks for a Resilient Planet (CHIRRP), NSF

Application Deadline:

- **Concept Outline: 30 days in advance of the full proposal**
- **Full Proposal: June 6, 2024**

Estimated Award Amounts: budgets are not limited but need to reflect the actual needs of the proposed project

The Confronting Hazards, Impacts and Risks for a Resilient Planet Program (CHIRRP) invites projects focusing on innovative and transformative research that advances Earth system hazard knowledge and risk mitigation in partnership with affected communities. Hazards compounded by changing climates, rising populations, expanding demands for resources, aging infrastructure, and increasing reliance on technology are putting our economy, well-being, and national security at risk. Researchers, academics, and community leaders will work together to develop community-driven research questions and actionable, science-based solutions that increase community resilience now and in the future. CHIRRP projects are expected to advance understanding, forecasting and/or prediction of future Earth system hazards and risks, engage communities in development of research questions and approaches, and produce actionable, science-based solution pathways for adaptation methodologies, products, and services. CHIRRP projects may evaluate a single or system of cascading hazards, impacts, and risks at a local, regional, or global scale through the lens of transformative earth system science research. Competitive projects will engage community partners at all stages of a project from development to implementation.

CHIRRP currently supports planning, conference, RCNs, EAGER, and RAISE proposals that support development of community partnerships, provide training for effective community engagement, catalyze ideas, and/or support the initial conceptualization, planning and collaboration activities aimed at formulating new and sound plans for future large-scale projects.

CHIRRP Elements

Projects will demonstrate convergence of three essential elements:

1. **Build Equitable Community Partnerships:** projects will serve a community and equitably co-produce project research questions and solutions. CHIRRP teams will bring together community members with direct knowledge of hazard impacts and community priorities and researchers with expertise in the natural and human dimensions of the Earth system. Partners may include, but are not limited to, local governments, Tribal Nations, civil society organizations, youth groups, and non-government organizations (NGOs). Robust partnerships are responsive to community priorities, may involve a social science component, and lead to actionable solutions that increase community resilience.
2. **Advance Earth System Science:** Generating practical and foundational knowledge on many of the nation's most urgent challenges requires a systems approach to understand the highly interdependent and complex natural and human components of the Earth system. CHIRRP projects will innovate and advance Earth System Science approaches that explore dynamic interactions and couplings among natural and social processes that affect Earth's capacity to sustain the well-being of communities, infrastructure, and national security.
3. **Evaluate Actionable Science-Based Solutions:** CHIRRP deliverables include co-produced innovative, science-based actionable solution pathways that mitigate future hazards, impacts, and risks. Multiple solutions may exist, and new solutions may emerge in the future. CHIRRP projects will inform pathways to resilience through evaluation of different solutions informed by the advancement of earth systems knowledge delivered from the project. An understanding of risk, vulnerability and resilience necessarily entails an understanding of relevant social dynamics including methods and analysis to identify how the impacts of hazards may disproportionately affect specific segments of a community or region. Solutions should be responsive to community priorities, including objectives such as reducing Earth system hazard related risk, increasing resilience, and advancing equity.

Link to Additional Information: <https://new.nsf.gov/funding/opportunities/confronting-hazards-impacts-risks-resilient-planet>

4. Strategies to Improve Health Outcomes and Advance Health Equity in Rural Populations (R01 Clinical Trial Optional), NIH

Application Deadline:

- **Letter of Intent: 30 days prior to the application due date**
- **Full Proposal: May 7, 2024**

Award Information: up to \$500,000 per year in direct costs for a maximum project period of five years

This funding opportunity will support research to develop, adapt, or implement intervention strategies addressing SDOH to improve health and promote health equity in rural populations. Research must address social determinants of health, along with community priorities, needs, and preferences, in the development, adaptation, or implementation of interventions. Interventions or implementation strategies seeking to either mitigate or eliminate the impacts of adverse social determinants of health and/or bolster positive social determinants of health are of interest. Investigators are encouraged to leverage community strengths in intervention design. Community-based participatory research (CBPR) or other community-engaged approaches may be useful for understanding community priorities, needs, and preferences, as well as for leveraging strengths of and knowledge embedded in rural communities.

Research studies should seek to improve health outcomes and must be guided by a conceptual framework that identifies hypothesized pathways between the intervention and health outcome(s). The primary outcome may reflect health or functional status, health conditions, quality of life, well-being, morbidity and mortality, and/or health behaviors. Individual-, population-, system-, and multi-level interventions could be responsive to this NOFO. Successful, evidence-based interventions may be adapted to specific rural communities and tested for acceptability and efficacy or effectiveness. Pragmatic and implementation studies are welcome, including hybrid effectiveness/implementation studies

of adapted interventions or intervention bundles.

Examples of topics of interest include, but are not limited to:

- Intervention studies focused on improving outcomes in conditions or risks that occur at higher rates in rural populations.
- Development, adaptation, and implementation of interventions that address social determinants of health (<https://www.ninr.nih.gov/research/nih-sdohrcc#tabs2>) in marginalized populations living in rural or remote areas of the United States such as migrant workers, immigrants, people with disabilities, racial and ethnic minority groups, people of low income, and sexual and gender minority groups.
- Implementation studies to advance the reach, effectiveness, and sustainability of evidence-based interventions in rural communities or in identified marginalized rural populations.
- Adaptation of technologies to address structural barriers to health in rural areas (e.g., healthcare resource shortages and telecommunication limitations that affect access to specialty care or pharmacy services).
- Interventions that seek to improve health by addressing limited access to healthy foods, places for physical activity, or housing options in rural communities.
- Studies that develop, test, and/or implement firearm injury prevention intervention(s) to address the disproportionate burden of morbidity and mortality due to firearm injury in rural communities.
- Service and care models that build upon places of social interaction in rural communities, such as churches, schools, libraries, and grocery stores.

Areas of Interest of Participating Institutes, Centers, and Offices (ICOs)

- **National Institute of Arthritis and Musculoskeletal and Skin Diseases (NIAMS)** - research areas include rheumatology, orthopaedics, dermatology, metabolic bone diseases, heritable disorders of bone and cartilage, inherited and inflammatory muscle diseases, and sports and rehabilitation medicine. In the context of this NOFO, the NIAMS is interested in applications that support the exploration of strategies to address social determinants of health to improve quality of health and promote equity in rural populations in the NIAMS mission-relevant disease areas. Research in community health care settings is particularly encouraged.
- **National Institute of Mental Health (NIMH)** - The National Institute of Mental Health (NIMH) is interested in applications relevant to priorities described in this RFA and that support the NIMH Strategic Plan for Research. For the purposes of this RFA, NIMH is particularly interested in (but not limited to) projects that:
 - Develop and test new mental health preventive, treatment, and services interventions and/or strategies for implementing interventions with established effectiveness, with a focus on the challenges faced in rural areas as primary mechanisms (factors that impact the useability of evidence-based practice, cultural fit of these practices, implementation and access barriers, and service/system challenges, such as workforce limitations).
 - Develop and test multi-level mental health interventions that address structural, system and policy challenges that contribute to mental health disparities.
 - Identify rural area factors that mediate or moderate intervention and/or implementation effectiveness.
 - Examine/adapt parameters of evidence-informed lethal means safety interventions (e.g., dose, duration, method of administration) that impact generalization of efficacious interventions to rural practice settings.
 - Investigate whether and to what extent financing mechanisms, policies, regulations, and healthcare system rules optimize patient-level outcomes, and identify mutable factors and policy interventions that can improve mental health outcomes in rural areas.
- **National Institute on Minority Health and Health Disparities (NIMHD)** - The mission of NIMHD is to lead scientific research to improve minority health and reduce health disparities in populations that experience health disparities. Of specific interest are intervention studies that focus on the intersectionality of race/ethnicity and/or low SES with rural populations. See <https://jamanetwork.com/journals/jama-health-forum/fullarticle/2812750> for more information.

- **Sexual & Gender Minority Research Office (SGMRO)** - The SGMRO coordinates research and activities related to the health and well-being of sexual and gender minority populations by working directly with the NIH institutes and centers (ICs) and serves as a liaison for the research community to ensure SGM populations are considered and represented in research activities across the agency.

Link to Additional Information: <https://grants.nih.gov/grants/guide/rfa-files/RFA-NR-24-005.html>

5. Agriculture and Food Research Initiative Competitive Grants Program Education and Workforce Development, USDA / NIFA

Application Deadline: see Program Area Priority

Award Information: see Program Area Priority

The AFRI is America’s flagship competitive grants program that provides funding for fundamental and applied research, education, and extension projects in the food and agricultural sciences. In 2024, the National Institute of Food and Agriculture (NIFA) requests applications for the AFRI’s EWD program area to support:

1. professional development opportunities for K-14 educational professionals.
2. non-formal education that cultivates food and agricultural interest in youth.
3. workforce training at community, junior, and technical colleges.
4. training of undergraduate students in research and extension.
5. fellowships for predoctoral candidates and postdoctoral scholars.

The purpose of AFRI is to support research, education, and extension projects that address key problems of local, regional, national, and global importance in sustaining conventional, organic, urban food, and agricultural and natural systems. These include farm and ranch production efficiency, profitability, and sustainability; bioenergy and bio-based products; forestry; aquaculture; rural communities and entrepreneurship; human nutrition; mitigating impacts of biotic and abiotic constraints on food production; food safety; mitigating food waste and food loss; physical and social sciences; rural human ecology; development of circular/regenerative economies, and genetic improvement of plant and animals. In addition, the economic sustainability of food systems is an overarching priority for the projects funded in response to this Request for Applications (RFA); therefore, projects focusing on plant or animal species or commodities that are important to underserved communities, farmers, ranchers, or small- or medium-sized farms or ranches are also welcome. Through this support, AFRI advances knowledge in both fundamental and applied sciences important to agriculture. It also allows AFRI to support education and extension activities that deliver science-based knowledge to end users, allowing them to make informed, practical decisions. This AFRI Education and Workforce Development (EWD) RFA provides funding for research-only, education-only, extension-only, and/or integrated research, education, and/or extension projects addressing the six priorities identified in Part I A. Each Program Area priority within this RFA may offer all or some of these project types.

Program Area Priorities and Deadlines

1. Professional Development for Agricultural Literacy (PDAL)

Application Deadline: September 12, 2024

Award Information: up to \$500,000 for a project period of 36 – 48 months

The PDAL Program Area Priority seeks to increase the number of K-14 educational professionals trained in the food and agricultural sciences. Participants (teachers, post-baccalaureate pre-service teachers, counselors, administrators) are expected to develop and apply skills necessary for integrating food and agricultural science concepts in their classes; explore the opportunities available in food and agricultural science career paths; and/or forge mentorships with professional and business leaders, and faculty at four-year institutions.

Education, Extension, or Integrated Projects must:

- a. Promote faculty expertise and encourage widespread implementation of educational innovation at K-14

- levels in the food and agricultural sciences. This includes topics that contain elements of the human sciences (e.g., disciplines that address issues challenging individuals, youth, families, and communities).
- b. Provide immersive learning experiences (e.g., teacher hands-on research, teacher experiential learning), curriculum development and implementation, and teaching training for K-14 education professionals (e.g., teachers, counselors, administrators) and post-baccalaureate pre-service teachers to create and replicate best practices to improve student success outcomes within the food and agricultural sciences.
 - c. Non-exhaustive examples of projects include:
 - i. Developing self-sustaining models for professional development that better prepare education professionals to provide outstanding teaching, guidance, institutional structures, etc., that enhance student outcomes in the food and agricultural sciences.
 - ii. Changing instructional approaches to effectively identify skill gaps and address conceptual areas particularly challenging to students.
 - iii. Integrating innovations in science and pedagogy into existing professional development programs (e.g., through hands-on research and extension experiences with partner institutions and laboratories).
 - iv. Exploring self-sustaining web-based approaches for professional development for education professionals.
 - v. Adapting curricula to train or retrain agricultural workforce for the future.
 - vi. Other methods to fill the existing gap of professional development in advanced food and agricultural sciences for education professionals at the K-14 education level.

2. Agricultural Workforce Training at Community Colleges (AWT)

Application Deadline: September 19, 2024

Award Information:

- **Design Projects: up to \$250,000 for a project period of 12-24 months**
- **Implementation Projects: up to \$650,000 for a project period of 36-48 months**

The AWT Program Area Priority seeks to develop a workforce ready for the field as well as industry jobs in the food and agricultural sector. Through the development of new workforce training programs, or the expansion, improvement, or renewal of existing workforce training programs at community, junior, and technical colleges/institutes, this program will expand job based experiential learning opportunities, acquisition of industry-accepted credentials and occupational competencies for students to enable a work-ready labor force for the 21st century. Proposals aimed towards developing baccalaureate or graduate degree programs or pathways towards these degrees are not supported under this Program Area Priority.

In order to strengthen the capacity of Community Colleges, the AWT program is offering two focus areas: Design and Implementation, with distinct requirements, goals, timelines, and budget maximums. Design projects seek to support faculty and staff to design and develop new credentialed workforce training programs that will train the workforce once the credential is recognized by the cognizant institution. Design projects do not support nor require student activities or training, but the development of training programs. On the other hand, Implementation projects seek to train students to acquire the skills and tools necessary to secure an industry-accepted credential and join the workforce. Implementations projects may update or expand existing workforce training programs, but these activities are restricted to the first year of the grant; the remaining project time must be allocated to student training. AWT applicants must design their proposal based on the focus area that best fits their project's goals, objectives, and timeline. Applicants need not have applied or received a Design or Implementation project grant to be eligible to apply or receive the other project type award.

3. Food and Agricultural Non-Formal Education (FANE)

Application Deadline: December 5, 2024

Award Information: up to \$750,000 for a project period of 36 – 48 months

This Program Area priority will support content development and activities for non-formal education to foster development of technology-savvy youth. Projects must adopt or develop curriculum and activities to cultivate

interest and competencies in STEM and in food and agricultural sciences supported by the six Farm Bill Priority areas of AFRI. Data science, including artificial intelligence, automation, robotics, gene editing, biotechnology and other projects involving emerging technologies will be supported in this Program Area Priority.

FANE applications must address the following:

- a. Develop curriculum and activities to enhance youth's understanding of gene editing, biotechnology, data science, artificial intelligence, robotics, automation, and other technologies that enhance the food and agricultural enterprise and prepares them to help meet the needs of the future workforce through enhanced non-formal education modules.
- b. Develop outreach materials that clearly communicate the demonstrated benefits of agricultural technologies.
- c. Complement and build upon programs that have successfully demonstrated positive youth development strategies and outcomes (i.e., 4-H programming, Agriculture in the Classroom, FDA's Agricultural Biotechnology Education and Outreach Initiative, etc.).
- d. Involve youth in the design, execution, and evaluation of activities that lead to the development of consumer-friendly content that builds public confidence in the safe use of data science, biotechnology and other emerging technologies in agriculture and the food.

4. Research and Extension Experiences for Undergraduates (REEU)

Application Deadline: August 15, 2024

Award Information:

- up to \$600,000 for a project period of 48 months
- up to \$750,000 for a project period of 60 months

The REEU Program Area Priority promotes research and extension learning experiences for undergraduates such that upon graduation they may enter the agricultural workforce with exceptional skills. This initiative allows colleges and universities to provide opportunities for undergraduate students, including those from underrepresented and economically disadvantaged groups, minority-serving institutions, community colleges, and universities.

Projects must provide undergraduate students with experiential learning opportunities that include significant research, extension/outreach, and/or education components in the food and agricultural sciences.

Also, of interest are the projects that provide experiences in innovative agricultural technologies, including data science and artificial intelligence, robotics and automation, and gene editing. Additionally, NIFA supports nutrition security, which is defined as having consistent access, availability, and affordability of foods and beverages that promote well-being and prevent (and if needed, treat) disease, particularly among our nation's most socially disadvantaged populations. Promoting nutrition security is a critical ingredient to containing the COVID-19 pandemic, ensuring racial justice and equity, rebuilding the rural economy, addressing the impacts of climate change, providing open markets and fair trade, and reinvigorating a competitive workforce.

Link to Additional Information: <https://www.nifa.usda.gov/grants/funding-opportunities/agriculture-food-research-initiative-education-workforce-development>

6. NINDS Advanced Institutional Research Training Program (T32 Clinical Trial Not Allowed), NIH

Application Deadline: May 25, 2024

Award Amount: budgets are not limited, but need to reflect the actual needs of the proposed project

The purpose of the Ruth L. Kirschstein National Research Service Award (NRSA) Institutional Research Training Grant (T32) program is to develop and/or enhance research training opportunities for individuals interested in careers in biomedical, behavioral or social sciences, and clinical research, in health services research, or in any other discipline relevant to the NIH mission.

Each proposed program should provide high-quality research training, and mentored research experiences, and are expected to help trainees develop:

- A strong foundation in scientific reasoning, rigorous and reproducible research design, experimental methods, analytic techniques, including quantitative/computational approaches, and data gathering, storing, analysis, interpretation and sharing appropriate for the proposed research area.
- Their individual development plans to identify areas of strengths and areas of career and personal growth with the ability to identify and engage mentors.
- Skills in engaging in their chosen area of science including networking, presentation and publication skills and opportunities to interact with members of the broader scientific community at appropriate scientific meetings and workshops.
- The competencies needed to advance to independent careers in their chosen field.
- The ability to think critically, independently, and to develop important research questions to initiate and conduct research and approaches that push forward their areas of study.
- An understanding of the relationship of their research training to health, diseases, and disorders.
- A commitment to approaching and conducting research responsibly and with integrity.
- The competencies to work effectively with colleagues from a variety of backgrounds and scientific disciplines to contribute to inclusive and supportive scientific research environments.
- The knowledge, professional skills, and experiences required to identify and transition into careers that sustain biomedical research in areas that are relevant to the NIH mission.

Program Objective

The objective of the NINDS Institutional Research Training Program is to support outstanding training with the breadth and depth to prepare advanced predoctoral and postdoctoral trainees to become successful scientists in a rapidly evolving research enterprise that is increasingly complex and multidisciplinary. Neuroscience research requires investigators who can draw on knowledge and approaches from multiple disciplines and levels of analysis and apply this broad knowledge in novel ways to yield new discoveries about the nervous system. Moreover, impactful neuroscience research requires investigators with strong foundational skills in experimental design, statistical methodology, and quantitative reasoning.

It is expected that the programs supported under this funding opportunity announcement will provide:

- training and activities with a defined goal and within a thematic area that will add depth and breadth to the trainees' scientific development.
- an emphasis on sound experimental design, the proper use of statistical methodology, and a theoretical understanding by each trainee of the quantitative limits and capabilities of his or her experimental system (quantitative literacy).
- effective oversight of trainee mentoring and progression to the next career stage.
- an environment that promotes the success of individuals with a wide variety of backgrounds and perspectives.
- an inclusive research environment that strives to provide trainees with access to a diversity of role models, both within the institution and through activities such as invited seminars.
- activities for trainees to develop oral and written skills for communicating their science to a wide variety of audiences.
- access to structured career development advising and opportunities to learn about career options in various sectors.

Moreover, NINDS T32 support should only be provided to trainees whose mentors proactively ensure that their trainees have the opportunity to lead and be first author on a significant project.

Program Considerations

NINDS training programs should be designed to increase the depth and breadth of trainee expertise within a thematic area.

Programs should consist of an integrated set of activities that will both unify a cohort of trainees and expand their expertise beyond what would occur in the absence of the program. For NINDS T32 training grants, a well-developed program 1) has a programmatic purpose and a scientific theme, 2) provides activities created to address that purpose that go beyond the standard activities (e.g. journal club, departmental seminars) associated with research career development and 3) has programmatic activities that bring together faculty and trainees with a broad spectrum of expertise, the integration of which has the potential to stimulate innovative ideas and solutions to scientific problems. The fundamental benefit of an institutional, T32-funded training program is to create a rich, theme-driven environment that stimulates innovation, drives trainee focus on the highest standards in scientific rigor, and provides multiple opportunities for practice in scientific communication. Thus, in most cases, the creation of a T32-funded training program should benefit trainees who are not directly supported financially by the grant as well as those who are.

Programs should create novel and/or expanded research training experiences and activities; they are not intended to simply support trainees in conducting research. Education in career skills (e.g. grant-writing, oral presentation) although a critical component of all programs, is not sufficient to constitute a T32-funded training program. Moreover, the activities that constitute the program should be specifically designed to achieve the stated thematic purpose of the training program, and not simply be cobbled together from existing activities that the institution or department offers.

Training PDs/PIs are encouraged to develop institutional training programs that will expose trainees to a variety of scientific approaches, systems for study and tools and technologies. The training provided should enhance the trainees' ability to conceptualize and think through research problems with increasing independence. Moreover, programs should foster a culture in which trainees draw from a broad knowledge obtained from both neuroscience and other disciplines to address their research questions.

Types of Programs

NINDS supports T32 programs that address basic, clinical, translational or a combination of approaches in any area of research across the NINDS mission. All types of innovative programs are encouraged. Programs that intend to educate trainees in translational research and the steps required for moving basic discoveries to clinical applications may apply to this NOFO or may wish to apply under a NOFO specifically developed to support translational training programs.

Thematically, programs may include, for example, those in which applicants identify sophisticated multidisciplinary approaches and/or combinations of expertise that, within the specified field, are likely to promote significant future breakthroughs. Such programs will be marked by the cross-training of individuals, for example, in multiple technologies, or from different scientific backgrounds, to address specific areas of need in that field. Training programs may also be developed around specific research or disease areas (note that programs do not need to address a disease or set of diseases; programs may focus on a basic research theme that will lead to a greater understanding of neuroscientific processes). Regardless of the thematic area, all programs should provide a breadth and depth of training to enable trainees to make novel discoveries and apply knowledge from other disciplines to their research.

Programs may support predoctoral students (dissertation-stage predoctoral students in their 3rd and/or 4th year of graduate school, NINDS does not support first or second-year graduate students under this PAR), PhD postdoctoral fellows, fellowship-stage clinicians, or any combination of trainees from these three groups. For institutions that also have MSTP programs and intend to support MD/PhD students with this funding opportunity, the PD/PI should ensure that the majority of trainees supported by the program are those seeking a PhD rather than an MD/PhD.

Training grants that will support both predoctoral students and postdoctoral fellows should have a single program in which both groups of trainees participate and interact. The program may include shared and different activities, but they must occur in the context of an integrated program in which both predocs and postdocs benefit from the interaction, programmatic activities, and collaborative possibilities that the program creates.

Link to Additional Information: <https://grants.nih.gov/grants/guide/pa-files/PAR-24-126.html>

7. Coastal Ecosystems Climate Resilience, EPA

Application Deadline: May 1, 2024

Award Budget: up to \$1,200,000 per award for a project period of up to three years

This funding opportunity solicits research needed to advance our understanding of the properties and processes important to climate resilience in estuarine and coastal marine ecosystems to better inform coastal ecosystem management strategies. Resilient coastal ecosystems and the benefits they provide may persist over time in the face of multiple stressors or disturbances. However, the cumulative impacts of multiple stressors may exceed resilience capacity, alter ecosystem structure and function, or result in loss of coastal ecosystems. Elucidation of the mechanistic basis of resilience in coastal ecosystems and development of quantitative indicators or metrics rooted in the mechanisms of resilience will greatly advance the science of coastal ecosystem management. Effective coastal ecosystem management strategies also require advances in economic valuation approaches to estimate the benefits provided by coastal ecosystems, particularly those benefits related to increasing climate change resilience (e.g., avoided costs from flooding and property damage, avoided costs from disruptions to commercial activities such as tourism or fisheries, or benefits provided when considered together with other public infrastructure).

The Science to Achieve Results (STAR) Program's goal is to stimulate and support scientific and engineering research that advances EPA's mission to protect human health and the environment. It is a competitive, peer-reviewed, extramural research program that provides access to the nation's best scientists and engineers in academic and other nonprofit research institutions. STAR funds research on the environmental and public health effects of air quality, environmental changes, water quality and quantity, hazardous waste, toxic substances, and pesticides.

Outputs and Outcomes

Outputs expected from the awards made under this solicitation may include publications of research results in peer-reviewed journals, guidance documents, decision support tools, models, demonstrations and case studies, reports, and presentations.

Specific outputs may include, but are not limited to:

- Dynamic monitoring datasets to evaluate coastal ecosystem responses to current and changing cumulative stressors.
- Identification of the characteristics of a resilient coastal ecosystem and translation to coastal resilience across the nation.
- Identification of the mechanistic processes supporting resilience in coastal ecosystems through development of quantitative indicators or metrics, including thresholds.
- Monitoring data that can be used in ecosystem resilience metrics or indicators and can reflect coastal ecosystem responses to current and changing cumulative stressors.
- Predictive models or algorithms that demonstrate sensitivity to changes in ecosystem resilience under different scenarios, including future climate scenarios and management scenarios.
- Valuation of coastal ecosystem benefits that can be utilized under different scenarios to quantify future climate scenarios and management strategy effectiveness.
- Case studies or applications of methods and approaches to characterize coastal ecosystem resilience and benefits.
- Primary (not benefit transfer based) economic studies of the resilience benefits of coastal ecosystem presence and function.
- Repeatable and scalable economic valuation methods based on real-money and observable transactions (property sales, insurance, infrastructure siting choice, etc.) to capture resilience benefits of coastal ecosystems.
- Development of robust economic valuation methods and approaches for coastal ecosystem services that can be applied broadly and can be utilized in decision-making frameworks.

Specific Research Areas of Interest

- **Research Area 1: Characterize, quantify, and define indicators or metrics of resilience for various types of coastal ecosystems, especially those ecosystems that have climate mitigation and adaptation and/or blue**

carbon sequestration potential (i.e., tidal wetlands and marshes, seagrass beds, mangrove forests).

Coastal ecosystems are composed of dynamic and interacting floral and faunal species and communities interacting with the abiotic environment. Stress associated with a changing climate along with other anthropogenic impacts can impact the ability of these ecosystems to function and to provide benefits and services to coastal areas and human communities. While existing research has developed methods to understand and identify the vulnerability of different coastal ecosystems to climate change and other stressors, more research is needed to understand what makes coastal ecosystems resilient in response to current and changing cumulative stressors. EPA is particularly interested in understanding the resilience of coastal ecosystems that provide climate mitigation and adaptation benefits, such as carbon sequestration by tidal wetlands and salt marshes, mangroves, or seagrass beds. The ability to identify the characteristics of resilient coastal ecosystems is a vital step to informing current and future coastal ecological protection.

- **Research Area 2: Develop methods and approaches to advance economic valuation of the resilience benefits of coastal ecosystems.**

Resilient coastal ecosystems provide many benefits and services to humans, including habitat for recreationally and economically important aquatic species, recreational opportunities, carbon sequestration, and historical and cultural significance. These ecosystems can also provide climate resilience-related benefits to coastal areas and communities, such as dampening wave energy, preventing erosion, and decreasing storm surge, which can mitigate damage and impacts. A better understanding and accounting of the ecological and economic benefits provided by coastal ecosystems can inform management of these natural resources.

Link to Additional Information: <https://www.grants.gov/search-results-detail/352938>

8. Focus on Recruiting Emerging Climate and Adaptation Scientists and Transformers, NSF

Application Deadlines:

- **Track 1 - Coordination Hub: January 29, 2025**
- **Track 2 and Planning Grant: April 30, 2025**

Anticipated Funding Amount:

- **Track 1 - Coordination Hub: up to \$7.5M for one award for a maximum of 60 months**
- **Track 2 and Planning Grant:**
 - **Track 2: up to \$4M for a maximum of 48 months**
 - **FORECAST: less than \$100 k for planning grants for a maximum of 48 months**

The FORECAST solicitation invites creative proposals designed to prepare students to enter the work environment and conduct community and partner-engaged science in benefit of society. Using a student-centered approach, the goals of the program are to:

- Catalyze entrepreneurship and innovation while fostering supportive student cohorts and professional development opportunities that would result in a new generation of innovators, entrepreneurs, and scientists trained in “engaged translational research” and aware of governmental processes.
- Increase capacity for master’s degree programs at ERIs to train diverse cohorts of transdisciplinary STEM professionals for a range of research and research-related careers within the workforce.
- Promote building innovative community flexibility and adaptability to environmental change by fostering community resilience and the translation of core research outcomes for societal benefits.

Creation of sustainable programmatic capacity at institutions is an expected outcome. Consequently, all proposals should describe mechanisms to institutionalize effective training elements after award expiration and provide appropriate documentation of institutional support for such efforts.

Funding Tracks

- **Track 1: Coordination Hub**, one managing organization will be selected to coordinate support for rising seniors

from either emerging research institutions (ERIs) or from historically excluded and underserved groups as part of a national cohort to participate in structured professional development opportunities.

The hub organization will develop, design, and deliver professional development for Track 1 participants. The participants will start the program, Phase 1, during their senior year and could continue to participate if they transition to a graduate program, Phase 2. Professional development should include attention to training and building skills necessary for making connections between basic science and translation to societal benefits. These skills include management, having vision, communications, and knowing how to organize science (National Academies of Sciences, Engineering, and Medicine 2022). The professional development for the cohort should include entrepreneurial and innovative approaches to community and/or campus resilience, as well as an introduction to government processes related to climate resilience. Participants will have the opportunity to develop transdisciplinary projects while engaging communities in setting up research goals.

Track 1 Phase 1: The coordination hub will be expected to use the Education and Training Application Portal (ETAP) to solicit and review participant applications. Each national cohort of senior undergraduate student participants should be comprised of at least 25 students. Facilitated by the coordination hub, participants enrolled in the last year of their undergraduate program will hone skills on translational research, engaged research, and innovation. The undergraduate student participants will design research projects that they could implement as graduate students or develop business plans in support of the goals and interests of companies or communities.

Track 1 Phase 2: Following their undergraduate education, Track 1 participants may continue to be supported during the first two years of a graduate program (Master's or PhD) at a school of their choice. In Phase 2, graduate student participants will become FORECAST Associates and will continue to receive professional development and support as they implement the research projects designed during Phase 1.

- **Track 2: FORECAST Cohorts** at Emerging Research Institutions (ERIs) projects will support cohorts of Master's degree students at ERIs. Mentorship and capacity building should be central to the cohort approach.
 - Track 2 (~5 awards): FORECAST Cohorts at Emerging Research Institutions (ERIs) - Master's degree-granting emerging research institutions (ERIs) are eligible to submit proposals to both train cohorts of master's degree graduate students and build institutional capacity in translational, engaged research to address challenges related to global change. Track 2 proposals should include an introduction to the broader governmental context of climate resilience. Track 2 proposals may request a total budget (up to four years in duration) of up to \$4 million.
 - FORECAST Planning Grants (10 awards) - Master's degree-granting emerging research institutions (ERIs) are eligible to submit FORECAST planning grant proposals to build capacity at the institution and with the appropriate partners to undertake the activities necessary to establish a future FORECAST Track 2 cohort. Eligibility to submit to FORECAST Planning Grants is limited to master's degree-granting ERIs accredited in, and having a campus located in the US, acting on behalf of their faculty members, that award degrees in STEM disciplines supported by the National Science Foundation.

FORECAST Planning grant proposals for Track 2 will be accepted to build capacity at the institution and with the appropriate partners to undertake the activities necessary to establish a future FORECAST cohort or similar activities at ERIs.

Link to Additional Information: <https://new.nsf.gov/funding/opportunities/focus-recruiting-emerging-climate-adaptation/nsf24-558/solicitation>

9. Model Continuums of Care Initiative (MCCI) to Advance Health Equity and End Health Disparities Among Women and Girls in Racial/Ethnic Minority and Other Underserved Communities (U34 Clinical Trials Required), NIH

Application Deadline:

- **Letter of Intent: 30 days before due date**
- **Full Proposal: June 18, 2024**

Award Budget: up to \$225,000 per year and \$600,000 in direct costs over the 3-year project period

The purpose of this NOFO is to support the planning phase of the Model Continuums of Care Initiative (MCCI) to Advance Health Equity and End Health Disparities Among Women and Girls in Racial/Ethnic Minority and Other Underserved Communities (MCCI). MCCI is a multi-ICO dissemination and implementation science initiative to advance health equity and end health disparities in racial and ethnic minority and other underserved women and girls of reproductive age living in the United States, with special emphasis on those with intersecting identities that increase their risk for health disparities; i.e., NIH-designated populations with health disparities, defined as racial and ethnic minority groups (African Americans, Latinos/Hispanics, American Indians and Alaska Natives, Asian Americans, Native Hawaiians and other Pacific Islanders), people with lower socioeconomic status, underserved rural communities, sexual and gender minority (SGM) groups, and people with disabilities in the U.S. and its territories.

Research Approach

The overarching goals of MCCI are to: 1) strengthen state and community public health surveillance system infrastructure and capacity relevant to the health of REM and other underserved women and girls; 2) promote provider education/training in the implementation of EBPs to prevent/treat multimorbidity in REM and other underserved women and girls; 3) support the integration and coordination of primary healthcare, behavioral health systems, and community-based services to meet the health and social needs of racial/ethnic minority and other underserved women and girls of reproductive age; 4) accelerate the adoption and implementation of evidence-based screening and interventions for common comorbidities affecting REM and other underserved women and girls of reproductive age across the entire continuum of women's health care; and 5) leverage existing federal, state and local resources and collaborations for aligning community and clinical services centering REM and other underserved women and girls.

MCCI Planning Phase (U34): This U34 NOFO supports the Planning Phase of MCCI. During this phase, investigators will have 2 - 3 years to: 1) establish public-private scientific partnerships involving the public health leadership in selected communities and NIH and other Federal agencies; 2) identify and address facilitators of and barriers to the implementation of evidence-based mental health, substance use, cardiovascular, cardiometabolic, cancer, and HIV/AIDS interventions (EBI's) focused on racial and ethnic minority and other underserved women, girls, and families living in communities at high risk for health disparities; 3) complete an assessment of local community surveillance, prevention and treatment needs; 4) identify a set of empirically-informed implementation research goals; 5) identify and develop plans to address essential policy, personnel, data, and other resource needs; and 6) complete a pilot implementation research project.

Awarded U34s that achieve the above milestones established for the planning phase will be eligible to apply for one or more Cooperative Agreement mechanisms during the Implementation Phase, during which awarded grantees will have up to 5 years to: 1) conduct large scale implementation studies to accelerate the translation to community practice of EBI's to prevent and reduce multimorbidity in racial and ethnic minority and other underserved women and girls of reproductive age; and 2) disseminate and share findings and lessons learned through a data coordination center.

Given that MCCI aims to increase the adoption of an integrated set of EBPs delivered across the entire continuum of women's health care, the Implementation Phase will involve conducting a suite of coordinated studies in multiple components of the health care continuum for women and girls, such as adolescent and adult prevention services; adolescent and adult primary care services; adolescent and adult mental and behavioral health services; adult cardiopulmonary care; adult endocrinology services; adult cancer care; adult HIV/AIDS services; and community-based wellness and health maintenance services. Research to determine which strategies and interventions can be implemented

in non-clinical community-based settings (e.g., faith-based institutions, schools, community service centers) is strongly encouraged. In the Implementation Phase, up to 7 studies per continuum are envisioned.

Research Areas of Special Interest

1. **Optimal strategies for assuring the sustainability of evidence-based practices (EBPs)** for the prevention and treatment of common, co-occurring conditions in REM and other underserved women and girls. Specifically, research that illuminates the health infrastructure necessary to assure sustainability of data-driven, evidence-based systems of care.
2. **Current trends** in the prevalence of mental health disorders, SUDs, cardiopulmonary, and metabolic disorders, cancer, and HIV/AIDS among REM and other underserved women and girls of reproductive age in selected high-risk communities.
3. Best approaches to **leveraging health information technology tools** (e.g., electronic health records) and data science approaches to improve community surveillance for mental health and SUDs, cardiopulmonary disease, metabolic disorders, cancer, HIV/AIDS, and other common co-occurring conditions.
4. **Effective community-specific strategies for:**
 - a. **Preventing commonly occurring diseases** in REM girls and women.
 - b. **Improving rates and quality of screening** for depression, anxiety, alcohol and other SUDs, cardiopulmonary and metabolic diseases, cancer, and HIV/AIDS.
 - c. **Promoting adoption of evidence-based brief interventions** for harmful alcohol and other substance use.
 - d. **Improving treatment engagement and retention** for REM and other underserved women and girls with mental health and SUDs and common, co-occurring, somatic conditions.
5. **Best approaches to implementing evidence-based telemedicine models** and other EBIs (e.g., spiritually based interventions; mind/body approaches; complementary and integrative health care approaches, etc.) with potential to significantly reduce disparities in access to care.
6. **Evidence-based implementation strategies for stepped care** to increase reach, uptake, and implementation of integrative, evidence-based, stepped care for common co-occurring conditions in racial and ethnic minority and other underserved women and girls (e.g., Practice Facilitation; Intervention Mapping).
7. **Best approaches to health maintenance in racial and ethnic minority and other underserved community settings**, both before onset and after stabilization of disease is achieved (e.g., community health workers, evidence-based stress management, digital health monitoring devices, health-focused artificial intelligence).

Model Continuum Description

Beyond supporting research that will significantly increase access to state-of-the-art health care among racial and ethnic minority and other underserved women and girls of reproductive age, MCCI seeks to catalyze broader efforts within partnering communities to develop optimized systems of care that can serve as regional models replicable by communities with similar demographic, cultural, and structural characteristics. Each model continuum will ideally be: sustainable; inclusive; trustworthy; person-centered; wellness, prevention and recovery-centered; trauma-informed; culturally competent; empowering; guided by care-integration; well-coordinated and resourceful; community-partnered and collaborative; and evidence-based, flexible, and responsive to real time data.

Link to Additional Information: <https://grants.nih.gov/grants/guide/rfa-files/RFA-AA-24-006.html>

10. Cultural Resources Management Services, National Park Service

Application Deadline: July 15, 2024

Award Amount: from \$2,500 to \$250,000 for a project period between one and five years

The National Park Service, following its Management Policies (2006) seeks to work with partners to collaboratively conduct a variety of activities, including, but not limited to the named studies outlined in NPS-28: Cultural Resource Management Guideline: Archeological Identification/Evaluation Studies; Archival Records Management Plans; Bibliographic and historiographic essays; Collection Management Plan (CMP); Cultural Affiliation Study and Lineal Descent Studies; Cultural Landscapes Inventory (CLI); Cultural Resources Geographical Information System (CRGIS) Studies; Cultural Resources Management Bibliography (CRBIB); Development Concept Plan; Discover our Shared Heritage Travel Itineraries; Ethnohistory and Ethnography; Exhibit Plan and Design (EPD); General Management Plan (GMP); HABS/HAER/HALS documentation; Historic Resource Study (HRS); Historic structure report (HSR); List of Classified Structures (LCS); National Catalog of Museum Objects; National Heritage Area Plans and Evaluations; National Historic Landmark Documentation and Theme Studies; National Underground Railroad Network to Freedom studies; National Register of Historic Places Documentation and Bulletins; National Maritime Initiative Inventory; Oral History interviews, transcription and archival processing; Park and Program Administrative History; Peer Review; and Teaching with Historic Places Lesson Plans.

Moreover, in execution of its responsibilities under the NPS Organic Act of 1916; the Historic Sites Act of 1935, and the National Historic Preservation Act of 1966, the agency seeks partner organizations to:

- further public dialogue of and knowledge about the preservation of nationally significant cultural and historic properties.
- continue to support the mission of the Federal Save America's Treasures program.
- connect with new audiences to pursue sustainability of the preservation movement, encouraging them to address issues affecting preservation in their communities.
- engage with Certified Local Governments (CLG), federal, state, tribal and local preservation offices and other preservation organizations to carry on the NPS mission.
- engage in projects that lead in actionable recommendations for the preservation field and promote research, interpretation and preservation of American history and culture.
- undertake activities that promote the greater public and private understanding of American history.
- assist in the promotion, facilitation, and improvement of the general public's understanding of natural, cultural, recreational and other aspects of history in areas such as national parks, National Historic Landmarks, state and local parks, and other historic sites.
- promote greater public and private participation in historic preservation and interpretive programs and activities nationwide while building build resource stewardship ethics.
- share an appreciation for American history and culture, through a variety of strategies, such as through social media platforms, in order to increase public awareness, knowledge and support for historic preservation, stewardship, and interpretation of the nation's cultural and historical heritage.
- motivate youth participants to become involved in the cultural and historical resource protection of their communities and beyond.
- inform the public, assist professionals in making informed management decisions, and to educate and train students, thereby developing future professionals in historic landscape documentation and preservation.
- assist in directing planning efforts for the preservation, rehabilitation, and/or restoration of historic properties.
- advance historic preservation at the local level by providing training opportunities.
- an application to enable digital cultural surveys of communities, and strengthen local preservation commissions through training and funding opportunities.
- support the culture and heritage activities of the governments of federally recognized Indian tribes, particularly the activities of the various Tribal Historic Preservation Officers (THPOs) and those governments seeking to establish THPO operations.
- increase public awareness, including government agencies, of the importance of the physical environment in the role and preservation of Native traditions and culture.
- promote the greater public and private understanding of American history for their mutual benefit and for the people of the United States as well as for future generations, so that they can enjoy the historic resources in their communities.
- Conduct projects and programs that will result in expanding the knowledge and information available in the areas

of historical education, historic preservation, and cultural resources management.

- Conduct projects, programs, and activities that will result in expanding the opportunities available for public and youth engagement in the areas of interpretation, education, and volunteerism through projects such as youth engagement and conservation projects, student internships, training and workshops, long range interpretive plans, interpretive tours and site visits, program development and implementation, and cooperation on creation of public education and interpretive materials for audiences beyond park boundaries such as social media-based platforms, site bulletins, exhibits, and other interpretive content.
- Conduct scholarly peer review and offer substantive scholarly feedback of NPS to ensure that projects meet the highest standards of the historical and educational professions.
- Support the dissemination of information based on NPS funded research through publications, conferences, symposia, training and exhibitions, as well as other electronic media.
- Design, develop, and deploy and maintain seminars, exhibits, publications, and on-line resources that will benefit teachers and NPS employees.
- Develop and disseminate information related to Certified Local Governments (CLG), State Historic Preservation Offices, and Tribal Historic Preservation Offices, as well as any other program supported by the Historic Preservation Fund, for protecting and preserving cultural resources at the local community level.
- Organize training at conferences in the form of sessions, workshops, information booths, and other types of educational opportunities to promote best practices among the various constituents in the national preservation partnership programs.

Link to Additional Information: <https://www.grants.gov/search-results-detail/353005>

11. NIDCR Mentoring Network to Promote a Diverse Dental, Oral and Craniofacial Research Workforce (UE5 Clinical Trial Not Allowed), NIH

Application Deadline:

- **Letter of Intent: April 30, 2024**
- **Full Proposal: May 30, 2024**

Average Award Amount: up to \$250,000 per year for a project period of up to five years

The over-arching goal of this NIDCR UE5 program is to support educational activities that encourage early career investigators from diverse backgrounds, including those from groups underrepresented in the biomedical, behavioral and clinical sciences, to pursue careers in dental, oral, and craniofacial (DOC) research.

The NIH recognizes a unique and compelling need to promote diversity in the NIH funded biomedical, behavioral, clinical, and social sciences' workforce. Here and throughout the NOFO, diversity should be interpreted broadly to encompass multiple dimensions (e.g., educational background, geography, area of scientific interest).

To accomplish the stated over-arching goal, this NOFO will support creative educational activities with a primary focus on:

- **Mentoring Activities:** The proposed program should establish national mentoring network(s). Within the context of the mentoring network, activities are expected to provide mentoring in scientific, technical, and professional research career development, and to develop grant writing skills leading to the successful submission of a NIH grant application. Proposed activities must address the development of mentor-mentee relationships and peer mentoring among the cohort of participants (mentees). Mentoring activities may provide other advice, insight and skills that advance the research career goals of the participants (mentees) and may include, but are not limited to: developing individual development plans (IDPs) that align with research needs and experiences of the participant, coaching scholarly writing, advising on the preparation and successful career transitions, managing work-life balance and academic/professional service, identifying potential collaborators, building professional relationships, and leadership development. Mentoring activities may be performed on an individual and cohort level. Activities of the program are expected to strengthen the cadre of mentors dedicated to developing the research careers of a diverse pool of early career investigators, including those from underrepresented groups, and to enhance the

diversity of the DOC research workforce.

- **Courses for Skills Development:** Courses and workshop activities for participants (mentees) may include, but are not limited to, training or guidance on NIH grant writing and peer review, scientific writing and communication, negotiating a job offer, establishing and managing a lab and budget, hiring staff, achieving tenure and promotion, mentoring, developing team science skills and collaborations, and other activities that may contribute to the participants' independent research career success.

Programmatic Features of the NIDCR Mentoring Network

The NIDCR seeks to provide research training opportunities that address the range of needs of the DOC research workforce. It is envisioned that this program will develop a mentoring network to prepare postdoctoral researchers from diverse backgrounds, including those from groups underrepresented in the biomedical, behavioral and social sciences, to transition into an independent investigator position and early career investigators (program participants or mentees). The program is intended to provide emerging scientific talent with a pathway to successful NIDCR/NIH research grant support and research career independence.

The objectives of this mentoring network program are to: (1) advance the participants' research career trajectories by strengthening grant writing and scientific publishing knowledge and skills, and through interactions with potential collaborations and partnerships; (2) improve the participants' retention and advancement in research careers; and (3) promote diversity and inclusion in a research workforce that is highly trained in research areas aligned with the NIDCR mission and research priorities.

Mentoring networks may be national and designed to partner with one or more complementary institutions/organizations including national scientific professional organizations. Applicants may consider leveraging any existing mentoring resources, (such as the Common Fund initiative, National Research Mentoring Network [NRMN]), or other similar resources to enhance the proposed mentoring activities.

A cohort of eight to ten participants per year are expected to be selected and engaged in the mentoring network program activities and for no less than one year while maintaining regular contact with mentors and peers within the network during that time. Continued and sustained engagement among mentors and mentees, and among peer cohorts of mentees beyond each participant's initial selection to the program is strongly encouraged.

The proposed mentoring network is expected to include a combination of innovative individualized mentoring, small group discussions and didactic training through, for example, workshops or seminars. Both formal and informal professional interactions among mentors and participants, and among participants (mentees) are expected. Mentoring plans can be designed for online, virtual, and/or in-person interactions, and are encouraged to take advantage of contemporary communication strategies (e.g., social media), as appropriate, to achieve the goals of the network. A proposed network is expected to provide new opportunities beyond any ongoing mentoring, networking, or research education activities within academic programs, institutions, or existing networks or educational collaborations among institutions. Dedicated time for peer mentoring activities and experiences are to be included. It is anticipated that applicants will propose at least one in-person meeting or workshop to facilitate these experiences, which could be held in conjunction with a national scientific conference. It is expected that this activity will involve experienced investigators who can mentor on NIH grant writing, and additional scientific experts will be recruited, as needed, to facilitate an NIH mock study section. Mentoring network participants are expected to submit subsequent grant applications for R01 (or equivalent) support, other Research Project Grants (RPGs), or for mentored career development awards (e.g., NIDCR K01), depending on the participant's career level and research goals. In addition, mentoring network in-person meetings may be used to provide courses/workshops on relevant topic areas, or to provide time for focused mentoring. Mentoring activities may include identifying appropriate funding opportunities, providing review and feedback on draft research plans or grant applications, and discussing progress on funded and ongoing research projects.

An expected outcome of the mentored NIH grant writing experience is submission of a grant application to the NIDCR/NIH within two years after a participant's completion of their initial year of engagement in the mentoring

network. Through a sustained period of mentorship augmented by the development of grant writing and an array of research career skills, participants will develop enhanced professional career capabilities in DOC sciences and will be better prepared to develop a high quality and independently funded research program.

Link to Additional Information: <https://grants.nih.gov/grants/guide/pa-files/PAR-24-104.html>

12. Cultural and Community Resilience (CCR), NEH

Application Deadline:

- **Optional Draft: April 11, 2024**
- **Full Proposal: May 21, 2024**

Award Amounts: up to \$150,000 for a project period of up to two years

The CCR program helps communities address the impacts of climate change and the COVID-19 pandemic by safeguarding cultural resources and fostering cultural resilience through the identification, documentation, and/or collection of cultural heritage and community experience.

Projects should fall into one of two categories: community collecting initiatives or oral history programs. All projects must address the impacts of either climate change or the COVID-19 pandemic on one or more communities. The program welcomes both modest projects and larger ones and supports projects at any stage, from preliminary planning to final steps and implementation.

Project activities may take many forms including but not limited to:

- Collaborative planning to identify cultural and historical resources.
- Documentation of cultural and historical resources through digital means.
- Recording oral histories.
- Preserving Traditional Knowledge, practices, or technologies, and memories of elders and community, including in languages other than English.
- Establishing shared resources and protocols for rapid response collecting.

The outputs of a successful award will vary according to the stage of development. Outputs and outcomes may include but are not limited to:

- oral history collections, or steps towards establishing these collections, including the development of methods, procedures, workflow and timelines for oral history collection.
- online collections of digital surrogates or born digital materials.
- physical archival collections.
- creation of partnerships resulting in memoranda of understanding.
- technical requirements and strategic planning documents for collecting initiatives.
- shared stewardship agreements.
- collection data sustainability plans.
- other forms of documentation, including but not limited to publications and tool kits.

Link to Additional Information: <https://www.neh.gov/program/cultural-and-community-resilience>

13. Mathematical Foundations of Digital Twins, NSF

Application Deadline: June 20, 2024

Anticipated Funding Amount: \$5,000,000

Recognizing the inherently interdisciplinary nature of Digital Twins and the synergistic relationship between Digital Twin applications and mathematical innovation, the Division of Mathematical Sciences (DMS) within the Directorate for Mathematical and Physical Sciences (MPS) at the National Science Foundation (NSF) has forged a strategic partnership

with the Air Force Office of Scientific Research (AFOSR). This partnership effort is geared towards mathematical and statistical advancements that can enhance the accuracy, reliability, robustness, efficiency, and effectiveness of Digital Twins in applications, ultimately leading to improved decision-making and policy design for various practical applications. This pilot program, jointly launched by DMS and AFOSR, calls for proposals that aim to expand the boundaries of both mathematics and applications. Through this partnership, the NSF and AFOSR aim at driving research and innovation in the burgeoning field of Digital Twins, setting the stage for transformative breakthroughs in the future.

Program Description

MATH-DT is a pilot program designed to foster new and existing collaborative research that innovatively addresses critical mathematical and statistical challenges arise in the development of Digital Twins. The primary objective of the MATH-DT program is to facilitate innovative research that tackles overarching problems characterized by substantial complexity and challenges, such as those involving multi-scale, multi-physics, or high-dimensional components, rather than concentrating on specific application domains. The MATH-DT program seeks proposals that address one or both aspects of the two-directional relationship between mathematics/statistics and Digital Twins within practical applications. In one direction, mathematics/statistics plays a pivotal role in guiding the creation of intricate Digital Twin models and methods for their evaluation while also serving as a problem-solving tool. In the other direction, application domain experts can introduce constraints and objectives that necessitate the development of new mathematical, computational, and statistical approaches for Digital Twins.

The MATH-DT program will provide support for collaborative efforts involving research teams consisting of at least two Principal Investigators (PIs). At least one of the PIs will assume a lead role in addressing the emerging mathematical or statistical challenges of the project, while at least one other PI should be specialized in modeling or have access to data directly related or relevant to practical Digital Twin applications. Some examples of application problems with significant mathematical challenges encompass areas such as design monitoring, operations of civil infrastructure systems, emergency response to disasters, and complex system prediction and control. Mathematical challenges such as these often include, but are not limited to:

- i. the integration of models and data across various scales and levels of fidelity.
- ii. the quantification of uncertainty to assess model inadequacy when dealing with limited and noisy data.
- iii. the comprehensive evaluation of computational costs and scalability within the overarching framework.

Successful proposals are expected to demonstrate substantial innovation within the field of mathematics, computation and/or statistics, and clear evidence of Digital Twins' potential to address real-world problems and issues. These two critical aspects should be prominently featured in the project summary and further elaborated upon in the project description. The MATH-DT program anticipates that the Digital Twins development will capitalize on and be transformed by the synergistic relationship between Digital Twin applications and mathematical/statistical innovations. The program, however, does not impose specific requirements on applications, offering flexibility to advance the foundations of Digital Twins.

The MATH-DT program aims to stimulate a dynamic interaction between mathematics/statistics, application, and the linkage between the two in the realm of Digital Twins. By supporting projects that address the closed loop interaction between the physical and the Digital Twin, the program seeks to catalyze innovation, push, and expand the boundaries of knowledge, and chart new frontiers in both the realms of mathematical theory and its practical application.

The MATH-DT program expects that Digital Twin development will capitalize on, and be transformed by, the synergistic relationship between application domain knowledge and the related mathematical innovations. The program strives to advance the development of Digital Twins and their transformative impact across various scientific and engineering domains through the collaborative synergy between foundational research and practical applications.

Link to Additional Information: <https://new.nsf.gov/funding/opportunities/mathematical-foundations-digital-twins-math-dt/nsf24-559/solicitation>

14. Support for Research Excellence – First Independent Research (SuRE-First) Award (R16 - Clinical Trial Not Allowed), NIH

Application Deadlines: May 29, 2024

Award Budget: up to \$125,000 direct costs/year for a project period of up to four years

The SuRE program supports research capacity building at institutions that award baccalaureate and/or graduate degrees in biomedical sciences, and receive limited NIH Research Project Grant funding. It seeks to develop and sustain research excellence of faculty investigators and provide students with research opportunities while enhancing the institutional research culture and enriching the research environment. The SuRE program will support investigator-initiated research in the basic, social, clinical, behavioral and translational sciences (collectively termed "biomedical" sciences) that falls in the mission areas of NIH Institutes, Centers, and Offices. Research activities funded by the SuRE program require participation by students. Two distinct Notices of Funding Opportunities (NOFOs) support research projects led by faculty investigators at different career stages. This NOFO is for the SuRE-First Award that supports faculty investigators who have not had prior independent external research grants. The SuRE-First Award allows these investigators to develop their independent research programs. A SuRE-First applicant must identify a scientist based in the U.S. with expertise and an extramural funding record in the proposed field of research to serve as a mentor. Its companion NOFO, PAR-24-144, supports faculty investigators who are not funded by an NIH Research Project Grant with the exception of SuRE or SuRE-First awards. A SuRE Resource Center was funded to enhance the administrative research infrastructure of SuRE-eligible institutions and to provide services to advise faculty investigators who are interested in applying for a SuRE award.

SuRE-First-supported projects must have student participation in the execution, analysis, and reporting of the research. An applicant institution must demonstrate a commitment to build its research capacity and support for the Program Director/Principal Investigator (PD/PI) of the award.

To support the best science, NIH encourages inclusivity in research. Examples of structures that promote diverse perspectives include but are not limited to:

- Trans-disciplinary research projects and collaborations among investigators conducting biomedical research.
- Engagement from different types of institutions and organizations (e.g., research-intensive, undergraduate-focused, minority-serving, community-based).
- Individual applications and partnerships that enhance geographic and regional heterogeneity.
- Investigators and teams composed of researchers at different career stages.
- Participation of individuals from diverse backgrounds, including groups historically underrepresented in the biomedical, behavioral, and clinical research workforce (see NOT-OD-20-031), such as underrepresented racial and ethnic groups, those with disabilities, those from disadvantaged backgrounds, and women.
- Project-based opportunities to enhance the research environment to benefit early- and mid-career investigators.

Program Considerations

- **NIGMS** will accept applications within its mission as well as those within the mission of all other NIH ICs with the exception of NIAID, which directly accepts applications within its mission.
- **NCI** supports research projects in areas within the Institute's mission to advance scientific knowledge and help people live longer, healthier lives.
- The mission of the **National Eye Institute (NEI)** is to eliminate vision loss and improve quality of life through vision research. To achieve this mission, NEI supports innovative basic and clinical research on vision and disorders of the visual system; inspires a talented and diverse next generation of researchers; and translates progress into practice.
- **NHGRI** supports the development of resources, approaches, and technologies that will accelerate genomic

research on the structure of genomes, the biology of genomes, and the biology of disease; that will use genomics to advance the science of medicine; and that will incorporate genomics to improve the effectiveness of healthcare. NHGRI also supports genomic research in several cross-cutting areas, including the ethical, legal and societal implications of genomics and genetics research, bioinformatics, technology development, and research training and career development.

- **NIA** supports research projects in areas within the Institute's mission that includes genetic, biological, behavior, social, and economic research on aging. In addition, NIA encourages applications on Alzheimer's Disease (AD) and AD Related Dementias (ADRD).
- **NIAAA** supports basic, translational, and clinical research on the causes, consequences, prevention, diagnosis, progression, and treatment of alcohol-related problems across the lifespan; encourages meritorious alcohol research projects in the broad areas of neuroscience and behavior, organ damage and other health effects, epidemiology and prevention, and treatment and recovery. Also, encourages meritorious research projects on alcohol-related topics of relevance to understanding and addressing minority health and health disparities and that focus on the training of a diverse research workforce.
- **NIAID** will accept applications within its mission areas. NIAID conducts and supports basic and applied research to better understand, treat, and ultimately prevent infectious, immunologic, and allergic diseases, with the goal of developing new therapies, vaccines, diagnostic tests, and other technologies. Research areas include microbiology and infectious diseases, AIDS and AIDS-related research, immunology, allergy, transplantation, and biodefense.
- **NIBIB** interests include the development and integration of advanced bioengineering, sensing, imaging, and computational technologies for the improvement of human health and medical care.
- **NIDCD** is interested in supporting applications that propose research projects in the normal and disordered processes of hearing, balance, taste, smell, voice, speech, and language.
- **NIDDK** conducts and supports medical research and research training and disseminates science-based information on diabetes and other endocrine and metabolic diseases; digestive diseases, nutritional disorders, and obesity; and kidney, urologic, and hematologic diseases, to improve people's health and quality of life.
- **NIEHS** supports a variety of scientific disciplines, including basic, mechanistic, clinical, epidemiological, computational, engineering, and/or health risk communication approaches to advance the NIEHS Strategic Plan. Applications submitted to this NOFO must have a research focus on exposure-health related responses from environmental agents within the mission interest of the NIEHS (e.g., industrial chemicals or manufacturing byproducts, metals, pesticides, herbicides, air pollutants and other inhaled toxicants, particulates or fibers, fungal, and bacterial or biologically derived toxins).
- **NINDS** will support applications that address or seek fundamental knowledge about the brain and nervous system by supporting and conducting research on the healthy and diseased brain, spinal cord, and peripheral nerves and to use that knowledge to reduce the burden of neurological disease. NINDS also encourages activities focused on understanding and addressing disparities in neurologic health, healthcare, and health outcomes in disparate populations, including racial and ethnic minorities, the geographically disadvantaged, sex and gender minorities, and others who have been historically underserved, marginalized, and adversely affected by persistent inequality and socioeconomic disadvantage.
- **NINR** supports research that builds the scientific foundation for nursing practice and policy across clinical and community settings, and advances the prevention, detection, and management of disease and disability. Drawing on nursing's holistic perspective, NINR funds basic, clinical, population, and translational research that integrates factors at multiple levels to identify their role in health, health improvement and health inequities. NINR promotes research that improves the health of individuals, families, and populations in a variety of settings,

translating science in order to maximize the impact of findings on practice and policy.

Applicants are encouraged to contact the NIH IC Scientific/Research contact.

Link to Additional Information: <https://grants.nih.gov/grants/guide/pa-files/PAR-24-145.html>

15. Public Impact Projects at Smaller Organizations, NEH

Application Deadline: June 12, 2024

Award Amounts: up to \$25,000 for a project period of up to two years

Public Impact Projects at Smaller Organizations (PIP) helps small and mid-sized museums and cultural organizations build their interpretive skillset and develop interpretive public humanities programming. The goal of PIP is to help you and your organization identify potential interpretive content based on your collections, increase the interpretive skills of staff and/or volunteers, and/or launch interpretive public programs that attract new audiences.

Successful projects should demonstrate how the humanities matter to audiences and communities. Strong public humanities interpretation is the key factor driving funding decisions under PIP. NEH's definition of the humanities is wide-ranging and includes fields like history, art history, ethnomusicology, archaeology, anthropology, literature, philosophy, and other areas that offer critical examination of human history and culture. While PIP does not support performing arts or artmaking activities, it can support analytical programming that uses the humanities to consider the historical or cultural significance of the arts, such as pre- or post-performance programming, is eligible.

Project Design

Humanities content and scholarship-based interpretation are central to the awards made in this program. A grounding in scholarly research and emphasis on interpretation of content are core aspects that distinguish NEH-funded projects from other grant programs, such as the artmaking and performance-based projects supported by the National Endowment for the Arts (NEA).

PIP supports planning and/or implementation of projects that interpret and analyze humanities topics for public audiences. As such, applicants must collaborate with at least one humanities scholar or a public interpretive specialist who helps organizations identify compelling stories for the public and relate them in accessible ways. Projects should also help expand your audience reach; thus, you must also work with at least one community expert such as a local historian, genealogist, community elder, or knowledge bearer.

You must center your project on interpretation and public programming. This may include activities that expand your capacity to offer engaging public interpretation, create and implement interpretive programs, or do both. NEH encourages you to assess your current humanities programming and its relevance to your community and surrounding neighborhoods. You should consider the relevance of humanities scholarship to your mission and how humanities concepts enrich the experiences of your audiences.

Projects focused on increasing your interpretive capacity might involve staff development, evaluation, or interpretive planning. Public programming activities may take many forms, such as exhibitions, walking tours, or public discussions. NEH encourages you to collaborate with community members as you develop and implement interpretive projects. We particularly invite projects that foster new community partnerships or co-curation, such as training community members to conduct research or oral histories that are utilized during the project to form the basis for an interpretive public program. NEH also welcomes approaches that creatively engage your community and extend audience reach, such as bringing public interpretation to spaces outside your organization (e.g., parks, local government buildings, and public transportation).

Allowable activities include but are not limited to:

- hiring an interpretive consultant to help you think creatively about hidden strengths of your collections or to generate new ideas for engagement with audiences.

- working with an evaluator to conduct focus groups, or front-end or formative evaluations aimed at connecting with your surrounding community.
- consultation with scholars and interpretive consultants to develop new narrative frameworks for your collections or site.
- professional development to enhance staff and volunteer skills to present and plan public programming, including attendance at conferences focused on new interpretive approaches and best practices, or the creation and implementation of interpreter training specifically for your organization.
- long-term strategic exhibition or interpretive planning.
- visits to other organizations to observe interpretive best practices.
- planning and/or delivery of interpretive public programs.
- co-curation projects that engage community members in doing the work of the humanities (e.g., primary research, oral histories, and composing interpretive content), resulting in a publicly available interpretive project, such as an exhibition or website.
- development or implementation of programming to amplify a traveling exhibition hosted at your institution (exhibition fees and shipping are not allowable costs in this program).

Program Outcomes and Outputs

The outcomes of a successful PIP award may include but are not limited to:

- an assessment report outlining potential interpretive methods and/or storylines
- participation of staff and/or volunteers in professional development training in new interpretive methods and/or content
- an interpretive plan for the implementation of new public programs
- a new exhibition, tour, or other public programs

Link to Additional Information: <https://www.neh.gov/program/public-impact-projects-smaller-organizations>

16. Centers of Research Excellence in Science and Technology - Research Infrastructure for Science and Engineering, NSF

Application Deadline: August 2, 2024

Award Amounts:

- **CREST-RISE DPSI: up to \$2,000,000 during a five-year period**
- **CREST-RISE RAD: up to \$1,000,000 during a five-year period**
- **CREST-RISE E&I: up to \$500,000 during the one-year award period**

The CREST program's overall goal is to build the STEM research and education capacity of minority serving institutions (MSIs) with strong records of producing STEM graduates, especially those who are members of groups underrepresented in STEM fields.

CREST-RISE is one strand of the larger CREST program whose specific goals are to increase: 1) the number of STEM research doctoral programs at MSIs (as defined in the Eligibility section), 2) the number of STEM research doctoral students graduating from MSIs, especially those from groups underrepresented in STEM, and 3) institutional research capacity to increase doctoral students' graduation rates. It is expected that awards made under this solicitation will catalyze institutional transformation through the strengthening of research capabilities commensurate with an institution's mission and long-term goals, and support the development of STEM scholars, especially those from groups underrepresented in STEM.

As with all CREST projects, CREST-RISE projects should be designed to promote synergy between education and research. CREST-RISE supported research doctoral students should be engaged in the process of discovery and innovation and guided by the faculty. Evidence-based recruitment and retention strategies should be employed to increase the number of STEM research doctoral students and graduates, especially those who are members of groups underrepresented in STEM. Partnerships with other MSIs, especially those that are primarily undergraduate institutions,

are encouraged. Awarded institutions are required to evaluate the impact of the award in influencing institutional transformation as part of their project evaluation.

Program Description

The CREST-RISE program includes three tracks as follows:

- A. **CREST-RISE STEM Doctoral Programs Support Initiative (CREST-RISE DPSI)** - DPSI awards support the production of STEM research doctoral graduates to include those from groups underrepresented in STEM and the development of research capacity in STEM disciplines at MSIs. Proposals should include a component that outlines strategies for connecting with other NSF-funded awards held by the institution and related to the proposed project's goals and scope. Proposals should also include authentic partnerships with other MSIs, especially those that are primarily undergraduate institutions, that contribute to project goals, benefit all partners, and increase the transition of undergraduate students from underrepresented groups to doctoral programs in STEM.

DPSI proposals must address an NSF-supported discipline(s). NSF especially welcomes proposals in areas of strong national interest, such as artificial intelligence, data science and analytics; advanced materials, manufacturing, robotics; cybersecurity; plant genetics/agricultural technologies; quantum information sciences; nanotechnology, semiconductors/microelectronics technologies; climate change and clean energy. In addition, for this solicitation, the areas outlined in the resources below are of great interest:

- CHIPS and Science Act of 2022 (www.whitehouse.gov/briefing-room/statements-releases/2022/08/09/fact-sheet-chips-and-science-act-will-lower-costs-create-jobs-strengthen-supply-chains-and-counter-china/)
- Industries of the Future (<https://www.whitehouse.gov/ostp/news-updates/2022/04/30/the-final-industries-of-the-future-report-to-congress/> OSTP_IOTF_Report.pdf)
- Understanding the Brain (https://www.nsf.gov/news/special_reports/brain/)
- DOE Earthshots (<https://www.energy.gov/policy/energy-earthshots-initiative>)

- B. **CREST-RISE Research Advancement and Development (CREST-RISE RAD)** - The CREST-RISE RAD awards provide funds for junior faculty to develop their research agenda, to collect preliminary data for inclusion in new proposals for extramural funding, and to support the training of research doctoral students. Junior faculty at institutions that have active DPSI awards are eligible to serve as PI on a RAD proposal. PIs must be mentoring or seeking to mentor research doctoral students. PIs should refer to the eligibility section for detailed eligibility criteria. Co-PIs are not permitted for a RAD proposal. RAD funds can be requested after the first year and before the end of the third year from the start date of the DPSI award.

RAD proposals must show clear alignment with the goals of the active DPSI award and must clearly describe how it contributes to the DPSI at the institution. Mentoring (or commitment to mentoring) of research doctoral students, including those from underrepresented groups in STEM is required. Proposed research projects should build a foundation for the PI's long-term research scholarship and help advance the PI's professional goals. Proposals should include a clear research plan, a solid plan for integrating research and educational activities, and a research doctoral student mentoring plan.

- C. **CREST-RISE Equipment & Instrumentation (CREST-RISE E&I)** - The CREST-RISE E&I awards provide funds for the acquisition of equipment and instrumentation to support the training and production of research doctoral graduates including students from groups that are underrepresented in STEM. Institutions with active DPSI awards are eligible to request E&I funds for needs that align with and contribute to the DPSI project goals. Proposals must show clear alignment with goals of the institution's active DPSI award and must include activities that support research doctoral student training. Proposals must clearly describe how equipment expenditures contribute to the DPSI project goals at the institution.

The PI must be affiliated with an active DPSI project and must be actively mentoring research doctoral students. Funds can be requested after the first year and before the end of the third year from the start date of the active DPSI award.

Link to Additional Information: <https://new.nsf.gov/funding/opportunities/centers-research-excellence-science-technology-0/nsf24-562/solicitation>

17. Data Science Corps, NSF

Application Deadline: June 21, 2024

Award Amounts: between \$800,000 to \$1,200,000 for a duration of three years

The objective of the Data Science Corps program is to help build a strong national data science infrastructure and workforce. The Data Science Corps program seeks to engage data science students in real-world data science implementation projects. This engagement will help bridge the data-to-knowledge gap in organizations and communities at all levels, including local, state, and national, and will empower better use of data for more effective decision making. Data Science Corps participants will be able to sharpen their skills in data science by working on real-world projects focused on specific community needs, including rural communities, urban communities, academia, industry, or government. This partnership between communities and data scientists will serve the nation by helping produce a workforce-ready cohort of data scientists and technologists, who have experience with data science in action in real-world settings.

Program Description

This solicitation has a primary focus on broadening participation in data science for undergraduates (including students in community college, Minority-Serving Institutions, other emerging research institutions, and institutions in EPSCoR jurisdictions), and teachers and students in grades 6 -12. Equitable access to data science education presents an opportunity to open doors to higher education, higher-paying careers, and support a more engaged citizenry. The DSC solicitation prompts the PI community to envision and implement diverse and creative mechanisms by which to provide all students with age and developmentally appropriate data science training to gain the expertise needed for understanding and interpreting data. The DSC funded projects should contribute to research and practice that supports data science literacy and practices, as well as creating and enhancing the theoretical and empirical foundations for effecting data science learning. Proposals responsive to this solicitation respond to and implement one or more of the four following mechanisms:

- I. **Learning in the Community:** Effective data science education and training happens in the community. PIs are encouraged to engage students with stakeholder communities, so that students can obtain immersive educational and training experiences via hands-on training on real-world problems and data generated by and of importance to communities at all levels, thus expanding the supply of data science talent in support of local, regional, and national economies and society at large.
- II. **Flexible Educational Pathways:** Flexible educational pathways with multiple points of entry can be effective mechanisms to integrate and provide data science education and training to students with varied educational backgrounds and experiences, skill level, and technical maturity. Effective pathways provide students with data science expertise in a tiered manner in support of building a diverse workforce trained in data management, data analytics, and data-driven decision-making.
- III. **Across the Data Life Cycle:** Foundational data science education and training needs to expose students to a variety of disciplinary approaches that track the full data life cycle, from data collection, processing, storage, to data management, analytics, and decision-making. PIs are encouraged to address the inherent interdisciplinarity of data science and bring multiple perspectives, including but not limited to computer science, statistics, mathematics, and information technology.
- IV. **Data Science in STEM:** Today's very large datasets and modern data science tools are revolutionizing scientific

inquiry knowledge generation, and advancement across the scientific disciplines. NSF welcomes proposals that provide data science training to students pursuing their primary studies in diverse scientific and engineering disciplines and so drive data-centric inquiry and innovation in the sciences.

Program Structure

All Data Science Corps awards will interact and coordinate with one another. One or more award participants, including the project PI, will be expected to attend the annual PI meeting to exchange effective practices, curricula, assessment strategies, as well as challenges. Budget for such attendance should be included in each project.

Project Structure

Collaborative proposals may be submitted to NSF in one of two methods: as a single proposal, in which a single award is being requested (with subawards administered by the lead organization); or by simultaneous submission of proposals from different organizations, with each organization requesting a separate award.

Link to Additional Information: <https://new.nsf.gov/funding/opportunities/data-science-corps-dsc/nsf24-560/solicitation>

18. Peer Reviewed Medical Research Program (PRMRP) - Lifestyle and Behavioral Health Interventions Research Award (LBIRA), DoD

Application Deadline:

- **Letter of Intent: May 13, 2024**
- **Full Proposal: June 6, 2024**

Estimated Total Program Funding: \$27,000,000

The vision of the PRMRP is to improve the health, care, and well-being of all military Service Members, Veterans, and their Families, and its mission is to encourage, identify, select, and manage medical research projects of clear scientific merit that lead to impactful advances in health care of Service Members, Veterans, and their Families. The PRMRP challenges the scientific and clinical communities to address the congressionally mandated FY24 PRMRP Topic Areas with original ideas that foster new directions along the entire spectrum of research and patient care.

PRMRP Topic Areas and Strategic Goals

To meet the intent of the funding opportunity, all applications for FY24 PRMRP funding must specifically address one of the FY24 PRMRP Topic Areas as directed by the U.S. Congress and have direct relevance to military health.

Additionally, the PRMRP implements a portfolio-driven approach by grouping related Topic Areas with Strategic Goals as a framework within which to address critical gaps in major research areas. All applications must address one of the FY24 PRMRP Strategic Goals as it relates to the portfolio assigned FY24 PRMRP Topic Area. If the proposed research does not specifically address one FY24 PRMRP Topic Area and one FY24 PRMRP Strategic Goal, then the government reserves the right to administratively withdraw the application. The government reserves the right to reassign the application's Topic Area if submitted to an incorrect Topic Area.

FY24 PRMRP Portfolio Categories with Associated FY24 PRMRP Topic Areas:

- **Autoimmune Disorders and Immunology** - Celiac Disease, Computational Biology for Precision Health, Food Allergies, Guillain-Barré Syndrome, Inflammatory Bowel Disease, Proteomics, Scleroderma
- **Cardiovascular Health** - Computational Biology for Precision Health, Congenital Heart Disease, Proteomics, Vascular Malformations
- **Infectious Diseases** - Computational Biology for Precision Health, Congenital Cytomegalovirus, Far-UVC Germicidal Light, Hepatitis B, Malaria, Proteomics

- **Internal Medicine** - Accelerated Aging Processes Associated with Military Service, Computational Biology for Precision Health, Focal Segmental Glomerulosclerosis, Interstitial Cystitis, Lymphedema, Nephrotic Syndrome, Pancreatitis, Polycystic Kidney
- **Neuroscience** - Computational Biology for Precision Health, Eating Disorders, Maternal Mental Health, Myalgic Encephalomyelitis/ Chronic Fatigue Syndrome, Neuroactive Steroids, Peripheral Neuropathy, Proteomics, Suicide Prevention
- **Orthopaedic Medicine** - Accelerated Aging Processes Associated with Military Service, Computational Biology for Precision Health, Musculoskeletal Disorders Related to Acute and Chronic Bone Conditions and Injuries, Proteomics
- **Rare Diseases and Conditions** - Computational Biology for Precision Health, Dystonia, Ehlers-Danlos Syndrome, Epidermolysis Bullosa, Fibrous Dysplasia/McCune-Albright Syndrome, Fragile X, Frontotemporal Degeneration, Hereditary Ataxia, Hydrocephalus, Mitochondrial Disease, Myotonic Dystrophy, Proteomics, Rett Syndrome, Sickle-Cell Disease, Von Hippel-Lindau Syndrome
- **Respiratory Health** - Computational Biology for Precision Health, Proteomics, Pulmonary Fibrosis

The FY24 PRMRP Lifestyle and Behavioral Health Interventions Research Award (LBIRA) supports clinical research and/or clinical trials using a combination of scientific disciplines including behavioral health, psychology, psychometrics, biostatistics and epidemiology, surveillance, and public health. Applications are required to address and provide a solution to one of the congressionally directed FY24 PRMRP Topic Areas and FY24 PRMRP Strategic Goals.

The overall intent of the FY24 PRMRP LBIRA mechanism is to promote evidence-based and patient-centered approaches to improve health and/or disease-related outcomes and enhance the patient experience in defined populations.

Research ideas may include, but are not limited to:

- Development and testing for efficacy of lifestyle interventions and symptom management approaches to minimize disease risk and maximize quality of life.
- Studies to investigate the impact of prevention, diagnostics, treatment, or health care delivery approaches on health outcomes.
- Studies to assess the relationship(s) between behavioral, cognitive, and/or social functioning in relation to disease or condition initiation, progression, detection, treatment, and rehabilitation.
- Studies to examine and improve quality of life or decision-making.
- Population-focused studies to identify behavioral and lifestyle predictors of disease and/or disease progression.

The FY24 PRMRP LBIRA mechanism is meant to support clinical research or clinical trials for nonpharmacological interventions or noninvasive devices. Studies involving clinical trials for pharmacological interventions, clinical trials for devices that are implants or attached to the subject, or studies involving animal use are not appropriate for the LBIRA mechanism. If animal studies are proposed, the application may be withdrawn.

Key aspects of the FY24 PRMRP LBIRA:

- **Impact:** The FY24 PRMRP LBIRA is intended to support impactful research that will transform patient outcomes within the context of the FY24 PRMRP Topic Areas and FY24 PRMRP Strategic Goals. Research should challenge paradigms with respect to potential impact on patient care or population health, minimizing disease risk, increasing patient quality of life, and improving clinical decision-making. Proposed projects should include clinical research and may include clinical trials. Impactful research will accelerate the movement of promising ideas into clinical applications, generate knowledge to improve clinical guidelines, or significantly advance behavioral, cognitive, and/or social functioning as related to the targeted patient population. The anticipated outcomes of the research should be expected to have a positive impact on the lives of the relevant patient population(s) in the short and/or long term.

- **Study Design:** Applications should clearly articulate the chosen design of the study. The rationale should support the chosen study design with statistical evaluation to back the design. Studies entailing retrospective or prospective recruitment should define the type of architecture of the study (e.g., descriptive, correlational, field experimental, meta-analyses). Studies may integrate case, control, cohort, or other population science study designs (including the use of biospecimens and data from established databases and ongoing clinical trials), provided the proposed sample is of sufficient size to generate findings with ample statistical power. Study populations should be clearly defined. Questionnaires should be described in sufficient detail to justify interpretation of potential results. Clinical trials testing pharmacological interventions or devices or research involving animal studies are not considered appropriate for the FY24 PRMRP LBIRA mechanism.
- **Preliminary Data:** The FY24 PRMRP LBIRA will require preliminary data for all studies that propose the active (prospective) recruitment of human subjects for clinical trials. Studies not proposing active recruitment of human subjects are not required to present preliminary data, but they should be supported by sound reasoning and relevant literature.
- **Patient Advocate Participation:** Applications to the FY24 PRMRP LBIRA funding opportunity are required to include patient advocates. The research team must include at least one patient advocate who will be integral throughout the planning and implementation of the research project. The patient advocate will be a person living with, or a family member or caretaker of someone with, a disease or condition addressed in one of the congressionally directed FY24 PRMRP Topic Areas. As a lay representative, the patient advocate should be active in an advocacy organization. The patient advocate should be involved in the development of the research question, project design, oversight, and evaluation, as well as other significant aspects of the proposed project. Interactions with other team members should be well integrated and ongoing, not limited to attending seminars and semi-annual meetings. The role of the patient advocate should be focused on providing objective input on the research and its potential impact for individuals with, or at risk for, a disease or condition addressed in one of the congressionally directed FY24 PRMRP Topic Areas.
- **Relevance to Military Health:** Relevance to the health care needs of military Service Members, Veterans, and their Families is a key feature of this award.

Innovative research involving nuclear medicine and related techniques to support early diagnosis, more effective treatment, and improved health outcomes of active-duty Service Members and their Families is encouraged. Such research could improve diagnostic and targeted treatment capabilities through noninvasive techniques and may drive the development of precision imaging and advanced targeted therapies.

CDMRP encourages research on health areas and conditions that affect women uniquely, disproportionately, or differently from men, including studies analyzing sex as a biological variable. Such research should relate anticipated project findings to improvements in women's health outcomes and/or advancing knowledge for women's health.

Link to Additional Information: <https://www.grants.gov/search-results-detail/353209>

19. NINDS Program Project Grant (P01 Clinical Trial Optional), NIH

Application Deadline:

- **Letter of Intent:** 30 days prior to the application due date
- **Full Proposal:** May 25, 2024

Award Amounts: less than \$1M in direct costs per year for a maximum project period of five years

The National Institute of Neurological Disorders and Stroke's program project grants (PPG) support investigator-initiated research programs, consisting of three or more highly interdependent projects, in which a team of investigators works in a clearly defined area of mutual scientific interest. In a program project, there should be a unifying, well-defined goal or

targeted area of research to which each project relates and contributes, thereby producing a synergistic and collaborative research environment that allows each research project to share the creative strengths of the others. Programs should present a compelling case in support of interrelated projects and collaborating investigators will yield results beyond those achievable if each project were pursued separately and without formal interaction among the participating investigators. The applicants should consider why the program project is required to achieve the proposed research goals, how reaching these goals may transform the field, and why the goals of the component projects cannot be achieved without significant contributions from the other components. Overall, the applicants should demonstrate a clear and compelling case that the component projects require one another and the shared core facilities.

In keeping with its tradition of strong support of investigator-initiated research, the NINDS expects the PPG director to define the integrating theme and to develop the approaches that would be used to accomplish the objectives of the proposed research program. The theme of a program project could be, for example, basic research on regeneration and plasticity in the nervous system or basic and clinical research on a specific disease process; the unifying concept could be a hypothesis concerning the fundamental mechanisms that result in the clinical manifestations of the specific disease process.

Every component to be included in a PPG should be carefully considered. All projects that are included should be of the highest scientific and technical merit. All cores should provide resources that are essential to success of the goals and synergistic nature of the PPG. The PPG director must be an established leader in scientific research with demonstrated capabilities in program direction. Regular meetings of participating investigators who share and evaluate results and new ideas are essential to the consolidation of the research projects into a cohesive program.

The following distinguishing features must be well documented in the program project application:

- There should be a clearly defined overarching goal or targeted area of research to which each component relates and makes essential contributions. It is expected that support of this set of interrelated projects and collaborating investigators will yield results that would not be achievable if each project were pursued separately and without formal interaction and/or collaboration among the participating investigators.
- The PPG director should possess recognized scientific and administrative excellence, must make a substantial commitment of time and effort to the program, and must exercise leadership in the maintenance of its quality. The anticipated duties and responsibilities of the PPG Director should be clearly defined and an appropriate level of effort proposed.
- A PPG must contain a minimum of three component research projects. Each project should have significant and substantial scientific merit on its own as well as being an essential contributor to the central theme of the PPG. It should be evident that the synergistic and/or collaborative nature of the projects will help transform the field.
- Program projects are expected to involve the participation of investigators in several disciplines (e.g., basic, translational, or clinical research) or investigators with special expertise in several areas of one discipline. All investigators should contribute to, and share in, the responsibilities of fulfilling the objectives of the PPG.

It is strongly recommended that potential applicants consult NINDS Scientific/Research staff about their anticipated budget very early in the planning stage and a minimum of 8 weeks before submission of an application is anticipated.

Link to Additional Information: <https://grants.nih.gov/grants/guide/pa-files/PA-24-169.html>

20. Maximizing Access to Research Careers (MARC) (T34), NIH

Application Deadline: May 29, 2024

Award Amounts: budgets should reflect the actual needs of the proposed project

Advances in biomedical research depend upon a workforce composed of people trained in multiple disciplines and from different backgrounds who can provide the breadth of creativity, and individual interests, perspectives and experiences needed to identify and address important and complex scientific problems. Research shows that teams with members from different backgrounds utilize their members' unique experiences and perspectives better capitalize on innovative ideas and outperform homogenous teams. There are many benefits that flow from an NIH-supported scientific workforce that leverages the talents of rigorous researchers from all backgrounds: fostering scientific innovation, enhancing global competitiveness, contributing to robust learning environments, improving the quality of research, enhancing public trust, and increasing the likelihood that health disparities and the needs of underserved populations are addressed in biomedical research (for more information, see Notice of NIH's Interest in Diversity). The NIH recognizes the need to promote broad participation in the scientific workforce, including by encouraging institutions to enhance the participation of individuals from groups underrepresented in the biomedical research workforce through means consistent with applicable law. NIGMS strives to ensure that future researchers will be drawn from the entire pool of potential contributors and seeks to expand opportunities to contribute to the biomedical research workforce by supporting individuals from a variety of backgrounds at multiple training and career stages in a variety of organizational settings across the country.

Authentic research experiences, both course-based and in the context of a research group, are a critical component of undergraduate Science, Technology, Engineering and Mathematics (STEM) education as they can support student mastery of scientific concepts, development of a professional scientific identity, and persistence in STEM degree programs. While authentic research experiences are beneficial for all students, they are particularly helpful for strengthening STEM disciplinary identity and belonging among students from historically underrepresented groups and first generation students. However, first generation students, low-income students, and students from historically underrepresented racial and ethnic groups are less likely to participate in undergraduate research for multiple reasons, including a lack of awareness about undergraduate research or how to access such opportunities, financial barriers, and lack of scientific mentorship.

The objective of the **Maximizing Access to Research Careers (MARC)** (T34) program is to promote broad participation in the biomedical research workforce by strengthening research training environments and expanding the pool of well-trained students who:

- Complete their baccalaureate degree, and
- Transition into and complete biomedical, research-focused higher degree programs (such as Ph.D. or M.D./Ph.D.).

The program should provide trainees with the following:

- A broad exposure to foundational biomedical disciplines.
- The skills to acquire the knowledge needed to advance their chosen fields and careers.
- The ability to think critically about important biomedical research questions and approaches that push forward the boundaries of their areas of study.
- A strong foundation in scientific reasoning, rigorous research design, experimental methods, quantitative and computational approaches, and data analysis and interpretation.
- The skills to conduct research in the safest manner possible, and a commitment to approaching and conducting biomedical research responsibly, ethically, and with integrity.
- Experiences conducting, interpreting, and presenting rigorous and reproducible biomedical research with increasing self-direction.
- The ability to work effectively in teams with colleagues from a variety of cultural and scientific backgrounds, and to promote inclusive and supportive scientific research environments.
- The skills to communicate scientific methodologies and findings to a wide variety of audiences (for example, discipline-specific, across disciplines, and for the public).
- The knowledge, professional skills and experiences required to identify and transition into careers in the biomedical research workforce (for example, the breadth of careers that sustain biomedical research in areas that

are relevant to the NIH mission).

NIGMS intends to fund applications that propose feasible, rigorous, well-designed research training programs that will build on the most effective elements of successful programs while furthering the goal of the MARC program. For the purpose of this announcement, organizations are encouraged to recruit prospective candidates from groups underrepresented on the national basis to grow and diversify the program applicant pool. In addition, because underrepresentation can vary from setting to setting, organizations should design a recruitment strategy to promote broad participation based on their local context as well as on national needs.

Programs are expected to be tailored to the organizational context, for example by using data to identify specific strengths and areas of improvement in the training environment, and developing strategies that leverage organizational strengths to address areas of need. Programs should not simply layer additional activities onto existing structures, but instead should use creative and transformational approaches to undergraduate biomedical research training, mentoring practices, and enhancing departmental and organizational capacity to create and sustain inclusive research training environments.

NIGMS training programs that aim to promote broad participation in the biomedical research workforce are intended to provide research training opportunities to students from the breadth of biomedical disciplines at the organization.

Funded programs are expected to:

- Be well integrated within one or more department(s)/program(s) and exert a strong, positive influence at the organizational level on undergraduate biomedical research training and mentoring practices.
- Have clearly defined training objectives that take into account the applicant organization's specific context, resources, and strengths, and show evidence of meeting the objectives in progress reports and in renewal applications.
- Implement evidence-informed training and mentoring activities (for example, approaches grounded in literature and evaluations of existing relevant research training programs). Programs are expected to be responsive to evaluations, particularly with respect to trainee feedback.
- Provide rigorous, well-designed mentored authentic research experiences (including at least one summer research experience (SRE)), and additional opportunities that will build a strong cohort of research-oriented individuals. Programs are expected to assist students in identifying and arranging the SREs to broaden and deepen their research training (for additional details, see SRE policy). Training grant funds may not be used solely as a vehicle to provide financial aid for trainees to conduct research.
- Demonstrate effective oversight of trainee development and promote retention for the entire time the trainee is in the undergraduate program. Retention efforts are activities designed to sustain the scientific interests and participation of trainees from all backgrounds. Retention and oversight activities might include monitoring academic and research progress, building strong trainee cohorts, as well as increasing science identity, self-efficacy, and a sense of belonging within research training environments. Programs are expected to make efforts to identify individuals who may need additional academic and social supports to successfully complete the program, and ensure they receive the needed support.
- Promote inclusive, safe, accessible, and supportive research training environments to maximize success for all individuals in the training program. Specifically, funded programs should have organizational and departmental environments where individuals from all backgrounds are welcomed, feel integrated into, and supported by the biomedical research community. Safety in research training should encompass (1) environments free from harassment, discrimination, and intimidation, in which all are treated in a respectful and supportive manner, (2) laboratory and clinical settings where individuals exercise the highest standards of practice for chemical, biological and physical safety, and (3) practices at the organizational leadership and research community levels

that demonstrate core values and behaviors to emphasize safety over competing goals.

Applicants are strongly encouraged to read information about the MARC program found on the NIGMS website and to contact program staff before preparing or submitting an application to verify that the proposed program is eligible and in alignment with NIGMS funding priorities.

Link to Additional Information: <https://grants.nih.gov/grants/guide/pa-files/PAR-24-138.html>

21. Digital Projects for the Public, NEH

Application Deadline:

- **Optional Draft: May 1, 2024**
- **Full Proposal: June 12, 2024**

Award Amounts:

- **Discovery: up to \$30,000 for a project period of up to two years**
- **Prototyping: up to \$100,000 for a project period of up to two years**
- **Production: up to \$400,000 for a project period of up to three years**

The Digital Projects for the Public program supports projects that interpret and analyze humanities content in primarily digital platforms and formats, such as websites, mobile applications and tours, interactive touch screens and kiosks, games, and virtual environments.

All Digital Projects for the Public projects must:

- provide public audiences with structured analysis that deepens public understanding of significant humanities ideas.
- incorporate sound humanities scholarship.
- involve humanities scholars in all phases of development and production.
- include appropriate digital media professionals.
- reach a broad audience through a realistic plan for development, marketing, and distribution.
- demonstrate the capacity for sustainability.

NEH seeks proposals that explore a range of interpretive possibilities. Competitive proposals include collaboration with multiple scholars offering diverse perspectives. Projects that depend on input from a single scholar are not competitive.

NEH also welcomes applications for digital projects that enrich the users' experience and engagement with a larger project. For example, if your request is for a mobile experience that would operate within a museum or would work in conjunction with a film, explain how this element will enhance the audience's humanities learning experience. The digital component must enhance the project and not serve merely as promotion for it.

You may identify particular communities and groups, including students, to whom a project may have particular appeal. Projects intended for K-12 students should include community partners to extend the project's impact beyond the classroom.

NEH encourages audience evaluation throughout all stages of a project. Evaluation could include testing of the project's concept, approach, and key components.

Funding categories

- **Discovery** - supports the exploratory stages of a digital project, bringing together humanities scholars, content experts, and digital media experts to determine which approaches a project might take. The Discovery phase should emphasize collaboration among these groups to identify the combination of content and platform that will most effectively communicate the humanities ideas to public audiences. To be successful at this level, the project team should have a solid grasp of the content and collections with which they will work and be looking for a

platform, or the team should have chosen a subject and a platform and be looking to assess and interpret the humanities content. In either case, the project team must include humanities content experts and media experts. Projects intended for classroom use must also include an education consultant.

- **Prototyping** - supports the creation of a proof-of-concept prototype. If you apply in this category, you must submit a design document that describes the platform, user interface, and design, and the ways in which you will convey the project's central humanities ideas.
- **Production** - supports the production and distribution of humanities projects that have a primarily digital format. If you apply to this category, you must submit a design document and a prototype that demonstrate a solid command of the humanities content and scholarship related to the subject. The prototype must also show how the narrative, audiovisual, and interactive elements bolster an audience's understanding of the project's humanities ideas.

Program Outcomes and Outputs

- **Discovery** - a written design document that details fundamental aspects of the project such as the content, format, technical specifications, budget, work plan, intended audience, and learning objectives. The design document serves as a roadmap for further work on the project.
- **Prototyping** - a digital prototype that explains the key digital features and humanities content of the project and demonstrates the project's technical feasibility and design through screenshots, videos, mockups, or other illustrations.
- **Production** - a completed project that has been (or will be) distributed for widespread public use. NEH strongly encourages partnerships with organizations and individuals who can assist you in distributing your project to the public.

Link to Additional Information: <https://www.neh.gov/grants/public/digital-projects-the-public>

22. Specialized Programs of Research Excellence (SPOREs) in Cancer Health Disparities and Minority Health (CHD-MH) (U54 Clinical Trial Optional), NIH

Application Deadline:

- **Letter of Intent: 30 days prior to the application due date**
- **Full Proposal: September 26, 2024**

Award Amounts: up to \$1.6M in direct costs per year for a maximum project period of five years

The National Cancer Institute (NCI) invites applications for U54 Specialized Programs of Research Excellence in Cancer Health Disparities and Minority Health (CHD-MH SPOREs). The program will fund a network of multidisciplinary, multi-institutional U54 CHD-MH SPOREs uniquely focused on health disparities and/or minority health translational research for improved prevention, early detection, diagnosis, and treatment of cancer in populations who are underserved (and/or underrepresented). U54 CHD-MH SPOREs can investigate more than one cancer type in underserved populations, including groups of highly related cancers (e.g., gastrointestinal, neuroendocrine, and head and neck). The research supported through this program must be translational and must stem from knowledge of human biology, addressing the interplay of various determinants of health with the biology of the disease. U54 CHD-MH SPORE projects must have the goal of reaching a translational human endpoint within the project period of the grant.

Research Objectives

This NOFO supports a collaborative network of SPOREs, under the U54 cooperative agreement mechanism, that is uniquely focused on CHD-MH translational research in populations who are underserved. Applicants are encouraged to focus on cancer types for which health disparities are particularly well documented, including cancers of the breast, prostate, lung, gastrointestinal systems, cervix, endometrium, head and neck, liver, lung, and kidney, as well as leukemia

and myeloma. Although studies involving these cancers are strongly encouraged, other cancer types can be included if a disparity or disparities population is appropriately justified. Unlike minority health projects, proposed CHD projects will include a reference or comparator group to assess disparities in cancer outcomes. However, the identified reference group would be based on the scientific rationale or question proposed and is not by definition required to be non-Hispanic White.

While the goals of the proposed research may vary widely, examples are listed below:

- Discovery, validation, and assessment of how various determinants of health intersect with the biology of cancer to affect cancer incidence, diagnosis, treatment, early detection, and prevention in populations who are underserved.
- Characterization of the biological impact of social determinants of health and identifying specific biological pathways that might be targeted by clinical or public health interventions.
- Hypothesis generating studies characterizing risk factor prevalence or biological differences in populations who are underserved.
- Investigating the role of determinants of health and comorbidities on toxicity of therapeutic interventions in populations who are underserved.

Human Endpoints

Every SPORE project must be translational and include both a laboratory component and a human endpoint reached during the project period of the grant. Therefore, proposed projects must combine experimental/laboratory approaches with studies involving human specimens or other types of human-focused applied research (e.g., epidemiology, population studies, or clinical trials). Laboratory/experimental research may involve any relevant cellular, molecular, structural, biochemical, and/or genetic approaches in vitro and/or in vivo.

In each SPORE project, at least one of the following types of human endpoints should be proposed:

- Early phase clinical trials, including pilot/feasibility studies, of new investigational drugs, biologics, experimental procedures, medical devices, or combinations.
- Early phase clinical trials, including pilot/feasibility studies, of new combinations or new uses of Food and Drug Administration (FDA)-approved agents and devices.
- Discovery and development of biomarkers, only when measurements are made in human specimens, or directly in human subjects.
- Laboratory studies that begin with an observation in the clinic, for example development of therapeutic resistance, and use human specimens to generate new clinical hypotheses.
- Population, behavioral, or psychosocial studies, including pilot/feasibility studies, addressing mechanistic aspects of the biology of the disease.
- Investigational New Drug (IND)-directed toxicology studies conducted following a pre-IND meeting with the FDA in which the plan proposed by the investigators is acceptable to the FDA.

Prospective applicants are encouraged to consult with the NCI scientific staff member(s) listed in Scientific/Research Contact(s). Consultations are intended to help the PD(s)/PI(s) (along with one or more of their intended co-investigators) understand the SPORE program, understand the SPORE translational objectives, and discuss strategies for preparing a competitive application.

Link to Additional Information: <https://grants.nih.gov/grants/guide/rfa-files/RFA-CA-24-020.html>

23. Undergraduate Research Training Initiative for Student Enhancement (U-RISE) (T34), NIH

Application Deadline: May 29, 2024

Award Amounts: budgets should reflect the actual needs of the proposed project

The overarching objective of the Undergraduate Research Training Initiative for Student Enhancement (U-RISE) program is to promote broad participation in the biomedical research workforce by strengthening research training environments and expanding the pool of well-trained students who:

- Complete their baccalaureate degree, and
- Transition into and complete biomedical, research-focused higher degree programs (such as Ph.D. or M.D./Ph.D.).

The program should provide trainees with the following:

- A broad exposure to foundational biomedical disciplines.
- The skills to acquire the knowledge needed to advance their chosen fields and careers.
- The ability to think critically about important biomedical research questions and approaches that push forward the boundaries of their areas of study.
- A strong foundation in scientific reasoning, rigorous research design, experimental methods, quantitative and computational approaches, and data analysis and interpretation.
- The skills to conduct research in the safest manner possible, and a commitment to approaching and conducting biomedical research responsibly, ethically, and with integrity.
- Experiences conducting, interpreting, and presenting rigorous and reproducible biomedical research with increasing self-direction.
- The ability to work effectively in teams with colleagues from a variety of cultural and scientific backgrounds, and to promote inclusive and supportive scientific research environments.
- The skills to communicate scientific methodologies and findings to a wide variety of audiences (for example, discipline-specific, across disciplines, and for the public).
- The knowledge, professional skills and experiences required to identify and transition into careers in the biomedical research workforce (for example, the breadth of careers that sustain biomedical research in areas that are relevant to the NIH mission).

There are many permissible activities to promote broad participation in the biomedical research workforce, and to encourage the participation of individuals from underrepresented groups. For example:

- Outreach activities to foster awareness of research training opportunities for potential trainees from all backgrounds.
- Targeted recruitment activities to diversify program applicant pools.
- Program admissions processes that consider factors beyond grade point average and standardized test scores – such as how a trainee candidate's lived experiences and perspectives further their commitment to program goals and a biomedical research career.
- Efforts to create and sustain inclusive research training environments for trainees from diverse backgrounds, for example strengthening faculty skills to work effectively with trainees from various cultural and neurodiverse groups.
- Updating curricula, pedagogy, and academic supports to enhance student success and engagement.
- Expanding mentoring, networking, and skills development opportunities, and financial support for trainees.
- Utilizing data to identify, and as appropriate, feasibly address biases and barriers in the research training environment that impede trainee success.

NIGMS intends to fund applications that propose feasible, rigorous, well-designed research training programs that will build on the most effective elements of successful programs while furthering the goal of the U-RISE program. For the

purpose of this announcement, organizations are encouraged to recruit prospective candidates from groups underrepresented on the national basis to grow and diversify the program applicant pool. In addition, because underrepresentation can vary from setting to setting, organizations should design a recruitment strategy to promote broad participation based on their local context as well as on national needs.

Programs are expected to be tailored to the organizational context, for example by using data to identify specific strengths and areas of improvement in the training environment, and developing strategies that leverage organizational strengths to address areas of need. Programs should not simply layer additional activities onto existing structures, but instead should use creative and transformational approaches to undergraduate biomedical research training, mentoring practices, and enhancing departmental and organizational capacity to create and sustain inclusive research training environments.

NIGMS training programs that aim to promote broad participation in the biomedical research workforce are intended to provide research training opportunities to students from the breadth of biomedical disciplines at the organization. Proposed programs focused on a single biomedical discipline or approach at an organization with multiple biomedically relevant departments will be a low priority for funding.

Funded programs are expected to:

- Be well integrated within one or more department(s)/program(s) and exert a strong, positive influence at the organizational level on undergraduate biomedical research training and mentoring practices.
- Have clearly defined training objectives that take into account the applicant organization's specific context, resources, and strengths, and show evidence of meeting the objectives in progress reports and in renewal applications.
- Implement evidence-informed training and mentoring activities (for example, approaches grounded in the literature and evaluations of existing relevant research training programs). Programs are expected to be responsive to evaluations, particularly with respect to trainee feedback.
- Provide rigorous, well-designed mentored authentic research experiences (including at least one summer research experience (SRE)), and additional opportunities that will build a strong cohort of research-oriented individuals. Programs are expected to assist students in identifying and arranging the SREs to broaden and deepen their research training (for additional details, see SRE policy). Training grant funds may not be used solely as a vehicle to provide financial aid for trainees to conduct research.
- Demonstrate effective oversight of trainee development and promote retention for the entire time the trainee is in the undergraduate program. Retention efforts are activities designed to sustain the scientific interests and participation of trainees from all backgrounds. Retention and oversight activities might include monitoring academic and research progress, building strong trainee cohorts, as well as increasing science identity, self-efficacy, and a sense of belonging within research training environments. Programs are expected to make efforts to identify individuals who may need additional academic and social supports to successfully complete the program, and ensure they receive the needed support.
- Promote inclusive, safe, accessible, and supportive research training environments to maximize success for all individuals in the training program. Specifically, funded programs should have organizational and departmental environments where individuals from all backgrounds are welcomed, feel integrated into, and supported by the biomedical research community. Safety in research training should encompass (1) environments free from harassment, discrimination, and intimidation, in which all are treated in a respectful and supportive manner, (2) laboratory and clinical settings where individuals exercise the highest standards of practice for chemical, biological and physical safety, and (3) practices at the organizational leadership and research community levels that demonstrate core values and behaviors to emphasize safety over competing goals.

Applicants are strongly encouraged to read information about the U-RISE program found on the NIGMS website and to contact program staff before preparing or submitting an application to verify that the proposed program is eligible and in alignment with NIGMS funding priorities.

Link to Additional Information: <https://grants.nih.gov/grants/guide/pa-files/PAR-24-137.html>

24. Humanities Collections and Reference Resources (HCRR), NEH

Application Deadline:

- **Optional Draft: June 4, 2024**
- **Full Proposal: July 16, 2024**

Award Amounts:

- **Planning: up to \$50,000 for a project period of up to two years**
- **Implementation: up to \$350,000 for a project period of up to three years**

HCRR advances scholarship, education, and public engagement in the humanities by helping libraries, archives, museums, and historical organizations across the country steward important collections of books and manuscripts, photographs, sound recordings and moving images, archaeological and ethnographic artifacts, art and material culture, and digital objects. The program strengthens efforts to make the content of such materials accessible through digitization and description. Awards also support the creation of reference resources that facilitate the use of cultural materials, from works that provide basic information quickly to tools that synthesize and codify knowledge of a subject for in-depth investigation.

The HCRR program encourages open access, collaboration, and sustainable strategies for managing digital collections and resources. To the extent that the condition of the materials, intellectual property rights, and privacy and cultural considerations allow, you should make the resources you develop publicly available. NEH encourages collaboration between smaller and larger repositories, as well as between humanities experts, information professionals, and community stakeholders to expand participation in cultural heritage and promote engagement with primary sources. You should prioritize methods that allow for sharing and the interoperability of information and resources to ensure their long-term availability.

Funding Levels

- **Planning awards:** support assessment, planning, and pilot projects that incorporate cross-disciplinary expertise in the foundational stages of preserving and creating access to humanities collections or producing reference resources. Experts may include humanities scholars, curators, archivists, librarians, collections and preservation specialists, local historians, and community elders or knowledge bearers, depending on your project goals.

Planning activities may include:

- analyzing and evaluating the content areas, intellectual control requirements, and preservation needs of significant humanities collections, including the development and distribution of collection-level descriptive information (projects to process or catalog collections at more detailed levels should apply instead for an Implementation award).
- identifying and prioritizing humanities materials for digitization, developing projectspecific selection criteria, evaluating technical requirements for digital preservation and access, reformatting test-bed items, and/or exploring service arrangements.
- developing plans and protocols to ensure the preservation of digital humanities content (previously digitized or born digital), which could include preliminary testing and evaluation of institutional and/or distributed digital repository systems.
- creating editorial plans, locating and assembling resources, devising strategies for technological and programmatic sustainability, and producing content exemplars for reference resources such as databases, encyclopedias, dictionaries, or atlases.
- developing plans for and/or conducting collection surveys to inform future repatriation efforts, sustainable

- and inclusive collection development, or deaccessioning.
- o formalizing partnerships between organizations and developing strategic plans to aggregate digital collections or resources.

You should complete the preliminary stages of project development before applying. Those stages may include initial collections appraisal and accessioning, conceptualization of scope and audience for reference resources, or consortium partner contact and cooperation.

- **Implementation awards:** support projects that preserve and create access to humanities collections or produce reference resources.

Implementation activities may include:

- o arranging and describing archival and manuscript collections.
- o cataloging collections of printed works, photographs, recorded sound, moving images, art, and material culture.
- o digitizing and reformatting collections.
- o preserving and improving access to born-digital sources, including updating existing digital resources.
- o developing indexes, databases, digital collections, or other project-specific tools to codify information on a subject or to provide integrated access to selected humanities materials.
- o creating encyclopedias.
- o preparing linguistic resources, such as historical and etymological dictionaries, corpora, and reference grammars (separate funding is available for endangered language documentation projects in partnership with the National Science Foundation).
- o producing resources for spatial analysis and representation of humanities data, such as atlases and geographic information systems (GIS).

Because ensuring the longevity of humanities sources is critical to enabling their ongoing use, you may request support for implementing preservation measures – such as rehousing, item level stabilization, and conservation treatment – in the context of projects that also create or enhance access to humanities collections.

In recognition of the time-sensitive nature of reformatting sound recordings and moving images stored on degrading and obsolescent media, this program encourages applications that address the need to preserve and access these critically endangered sources.

Link to Additional Information: <https://www.neh.gov/grants/preservation/humanities-collections-and-reference-resources>

25. Louis Stokes Alliances for Minority Participation, NSF

Application Deadline:

- **BD-Master's and NETWORKS Proposals: June 24, 2024**
- **BD-Master's and BD-Doctoral Proposals and All Alliance Proposals: ADG, B2B, SPIO and SPRA: November 15, 2024**

Award Amounts:

- **Alliance Development Grant (ADG): up to \$125,000 for a project period of up to 18 months**
- **Bridge-to-the-Baccalaureate (B2B): up to \$2,000,000 for a project period of up to 60 months**
- **STEM Pathways Implementation-Only Projects: up to \$5,000,000 for a project period of up to 60 months**
- **STEM Pathways Research Alliance Projects: up to \$4,000,000 for a project period of up to 60 months**
- **Bridge to STEM Graduate Degrees in National Priorities (BD-Master's): up to \$597,000 for a project period of up to 36 months**
- **Bridge to STEM Graduate Degrees in National Priorities (BD-Doctoral): up to \$1,173,000 for a project period of up to 60 months**
- **STEM Networking Incentive and Engagement (NETWORKS): up to \$600,000 for a project period of up to 60 months**

36 months

The LSAMP program invests in the nation's colleges and universities to aid student success, directly or indirectly, at all STEM pathways, thereby creating a new generation of STEM discoverers for the STEM enterprise nationally and internationally. With a focus on the participation of underrepresented groups, particularly those from named LSAMP populations, in national priority areas, specifically emerging science and technologies, the program's priorities are to:

- increase individual student engagement, retention, and completion of baccalaureate degrees for LSAMP populations.
- enable the successful transfer of LSAMP populations from two-year to four-year institutions in STEM degree programs.
- increase access to evidence-based, high quality and highly impactful practices in STEM recruitment and retention.
- facilitate seamless transition of underrepresented groups into STEM graduate programs and subsequent graduate degree completion.
- stimulate new research and learning on broadening participation in STEM disciplines.

Alliances

LSAMP, at its core, is an alliance-based program that provides student and mentor support beginning at the undergraduate level. K-12 activities should be leveraged through other resources.

An alliance is defined as a group of organizations working together for mutual benefit and support of the goals and objectives of the national LSAMP program. B2B, SPIO and SPRA are alliance-type projects. At a minimum, an alliance must consist of four IHEs. These projects are funded to implement comprehensive evidence-based strategies that ultimately result in the graduation of highly competitive STEM students from LSAMP populations who pursue graduate degrees or careers in STEM fields, particularly in emerging or trending fields of national priority. Other non-academic organizations may also participate in an alliance. Forming an alliance should be intentional and allow for building relationships among institutions.

LSAMP alliances should directly address recruitment, preparation and retention of LSAMP populations. Alliances are expected to significantly increase the numbers of STEM degrees to students under-represented in STEM fields. These students may include those who transfer from two-year institutions to four-year STEM programs to complete the STEM baccalaureate degree. Students may also enter directly into undergraduate STEM programs from secondary school to fulfill the STEM baccalaureate degree.

Rationale and Expectations for Each LSAMP Funding Opportunity

1. **Alliance Development Grants (ADG)** - The purpose of an ADG project is to support the conceptualization and development of new B2B and new SPIO alliances and to ultimately increase the number of alliances around the country, specifically in regions where LSAMP activities are non-existent. Institutions that have considered forming an alliance, identified partner institutions, begun compiling STEM enrollment and degree data to assess the feasibility of forming an alliance, and garnered support from administrators and STEM faculty, are highly encouraged to seek ADG funding.

ADG funding may be used to conduct needs assessments, conduct organizational planning meetings, attend STEM broadening participation professional development conferences or meetings. NSF expects that a full B2B or SPIO proposal (described below) will be submitted to the LSAMP program at the end of the planning period. ADG proposals should not include activities to fund direct student support or to begin STEM recruitment and retention intervention activities.

2. **Bridge to the Baccalaureate (B2B) Alliances** - Community colleges are valuable contributors to the diversity of the STEM workforce. The B2B alliances are partnerships of community colleges collaborating to implement strategies that facilitate the successful transfer of students from LSAMP populations to four-year institutions in

pursuit of STEM baccalaureate degrees. B2B alliances should focus on innovative, evidence-based recruitment and retention strategies at the community college level, with particular emphasis on strengthening skills for successful transfer to baccalaureate STEM degree programs. For recruitment and outreach purposes, evidence of linkages to the K-12 community must be demonstrated. A cohort model for stipend support during the matriculation period at the community college may be proposed.

Community college strategies, components, and interventions aimed at strengthening the transfer to four-year STEM degree programs are supported through these alliances. Proposers of B2B support must present evidence of strong articulation and transfer agreements with four-year institutions in the project description. All proposers must commit to a significant increase in student transfer into STEM fields at four-year institutions and justify the level of increase they define as significant. A clear plan of action to meaningfully increase the transfer of students to four-year degree programs in STEM from LSAMP populations that is supported by data and student outcomes tracking is essential for a highly competitive proposal.

3. **STEM Pathways Implementation-Only Alliances (SPIO)** - SPIO alliances are the first implementation projects for new alliances or alliances that have reconstituted its alliance membership and have been funded by the LSAMP program for 10 years or less.

SPIO alliances focus on building and strengthening strategies and collaborative approaches to assist IHEs in diversifying the nation's science, technology, engineering and mathematics (STEM) workforce by increasing the number of STEM baccalaureate and graduate degrees awarded to LSAMP populations.

These projects are expected to (a) address the production of highly competitive STEM students at the undergraduate level leading to increases in STEM baccalaureate degrees from LSAMP populations and entry into graduate school, (b) include plans for building upon established strategies and collaborative approaches that have been effective in the recruitment, retention and graduation of LSAMP populations and relative to the evolving state of STEM workforce development, and (c) indicate past institutional successes, (e.g., efforts at transforming the academic and/or research environment), in producing highly competitive students from LSAMP populations in STEM disciplines. Activities must include implementation of evidence-based strategies to support successful recruitment, retention and graduation of LSAMP populations in STEM, or adaptation of previously successful approaches for a new institutional context and/or STEM discipline. Although direct support for K-12 activities are not allowable, evidence of linkages to the K-12 community is expected.

4. **STEM Pathways Research Alliances (SPRA)** - SPRA alliances are successful partnership models of excellence in recruitment and retention practices that have resulted in significant increases in STEM degrees to underrepresented populations in STEM. While continuing to significantly increase STEM degrees to LSAMP populations and preparing students for a 21st century workforce or in emerging STEM disciplines and technologies, SPRA alliances are required to address: (1) the continuing production of highly competitive STEM students at the undergraduate level leading to increases in STEM baccalaureate degrees from LSAMP populations and entry into graduate school, (2) the national need for production and dissemination of new scholarly research on broadening participation of racial/ethnic minorities in STEM disciplines and the nation's STEM workforce and, (3) holistically assess the state of institutionalization and sustainability progress for the alliance.

SPRA alliance proposals are required to include a robust broadening participation research component in the form of an innovative knowledge-generating research plan that rigorously investigates effective practices or innovations in STEM education grounded in existing theories of student success. The primary purpose of the research component is to produce new knowledge and to disseminate new learning to the nation.

5. **Bridges to STEM Graduate Degrees in National Priorities: (BD-Master's and BD-Doctoral) Activity** - BD-Master's and BD-Doctoral projects provide financial support (stipends and cost of education) to a critical mass of six or twelve STEM baccalaureate-degree recipients, respectively, who were active, certified participants in LSAMP programs as undergraduates. BD participants are funded for the first two years of their graduate studies in

STEM.

The goal of the BD-Master's and BD-Doctoral Activity is to prepare students from LSAMP populations for completion of STEM graduate degree programs, particularly the STEM doctoral degree, at Master's comprehensive and doctoral-degree granting institutions. At the post-baccalaureate level, BD-Master's and BD-Doctoral sites provide necessary academic, research and professional development skills that enable participants to successfully persist in STEM graduate degree programs.

- 6. STEM Networking Incentive and Engagement Projects (NETWORKS)** - LSAMP network projects aim to strengthen STEM research and education activities in disciplines of national priority and emerging technologies to broaden participation in these fields. The goal is to increase the participation and professional identity and development of STEM students and faculty from LSAMP populations in new industries and emerging fields of science and technology.

This support offers opportunities to catalyze participation from LSAMP populations in research networks by supporting the creation of new networks and/or increasing participation in existing disciplinary networks regionally, nationally and internationally. Networks are collaborative and are limited to a maximum of four organizations. Non-LSAMP institutions may submit proposals but must partner with at least one LSAMP alliance institution. Non-LSAMP institutions serving as lead of network projects must provide evidence of meaningful linkages to LSAMP alliances and/or LSAMP institutions. Proposals from social scientists that address broadening participation topics and minority-serving institutions (MSIs) are encouraged to submit proposals for this funding opportunity.

Required Network Convenings: Inclusion of a convening or conference during the project period is a requirement of STEM Networking Incentive and Engagement projects.

Link to Additional Information: <https://new.nsf.gov/funding/opportunities/louis-stokes-alliances-minority-participation/nsf24-563/solicitation>

Forecasted Opportunities

1. Materials to Enhance Training in Experimental Rigor (METER) (UE5 Clinical Trial Not Allowed), NIH

The purpose of this Notice is to alert the community that the National Institute of Neurological Disorders and Stroke (NINDS) plans to reissue initiative RFA-NS-21-033 Materials to Enhance Training in Experimental Rigor (METER) with one receipt date. The program is designed to support the compilation and refinement of educational materials that will be incorporated into a new cutting-edge online resource that aims to promote awareness, understanding, and practice of fundamental principles of rigorous biomedical research for scientists in various career stages and learning environments. Awardees will collaborate with the established coordinating center, which is funded by the companion RFA-NS-21-009 Creating an Educational Nexus for Training in Experimental Rigor (CENTER). This coordinating center (CENTER) is responsible for organizing the initiative, building the final web-based platform, harmonizing the educational units, and producing digital elements (e.g., videos, graphics, interactive components) that are beyond the technical capabilities of METER awardees. This collaboration between CENTER and METER awardees will include activities to improve, finalize, evaluate, and disseminate the resulting educational units drafted by METER awardees.

Link to Additional Information: <https://www.grants.gov/search-results-detail/353093>

2. Academic Research Enhancement Award (AREA) for Undergraduate-Focused Institutions (R15 Clinical Trial Required), NIH

The National Institutes of Health (NIH) Institutes and Centers (ICs) intend to reissue a Notice of Funding Opportunity (NOFO) to continue the Academic Research Enhancement Award (AREA) for Undergraduate-Focused Institutions (R15 Clinical Trial Required) program. The full list of participating ICs will be available in the published NOFO. This Notice is

being provided to allow potential applicants sufficient time to develop meaningful collaborations and responsive applications. The NOFO is anticipated to be published in Spring 2024 with an expected first application due date in Summer 2024. The NOFO will utilize the R15 activity code.

Link to Additional Information: <https://www.grants.gov/search-results-detail/353095>

3. Academic Research Enhancement Award (AREA) for Undergraduate-Focused Institutions (R15 Clinical Trial Not Allowed), NIH

The National Institutes of Health (NIH) Institutes and Centers (ICs) intend to reissue a Notice of Funding Opportunity (NOFO) to continue the Academic Research Enhancement Award (AREA) for Undergraduate-Focused Institutions (R15 Clinical Trial Not Allowed) program. The full list of participating ICs will be available in the published NOFO. This Notice is being provided to allow potential applicants sufficient time to develop meaningful collaborations and responsive applications. The NOFO is anticipated to be published in Spring 2024 with an expected first application due date in Summer 2024. The NOFO will utilize the R15 activity code.

Link to Additional Information: <https://www.grants.gov/search-results-detail/353091>

4. Limited Competition: Mentored Research Career Development Program Award in Clinical and Translational Science Awards (CTSA) Program (K12 Clinical Trial Optional), NIH

The National Center for Advancing Translational Sciences (NCATS) intends to reissue a Notice of Funding Opportunity (NOFO) for Institutional Research Career Development (K12) programs through the Clinical and Translational Science Awards (CTSA). This Notice is being provided to allow potential applicants sufficient time to develop meaningful collaborations and responsive projects.

Link to Additional Information: <https://www.grants.gov/search-results-detail/353094>

Proposals Accepted Anytime

1. Division of Environmental Biology, NSF
<https://new.nsf.gov/funding/opportunities/division-environmental-biology-deb/nsf24-543/solicitation>
2. Computational and Data-Enabled Science and Engineering in Mathematical and Statistical Sciences, NSF
<https://beta.nsf.gov/funding/opportunities/computational-and-data-enabled-science-and-engineering-mathematical-and>
3. Condensed Matter and Materials Theory (CMMT), NSF
https://www.nsf.gov/pubs/2022/nsf22610/nsf22610.htm#pgm_desc_txt
4. Division of Materials Research: Topical Materials Research Programs (DMR: TMRP), NSF
<https://www.nsf.gov/pubs/2022/nsf22609/nsf22609.htm>
5. Research in the Formation of Engineers, NSF
<https://beta.nsf.gov/funding/opportunities/research-formation-engineers-rfe>
6. Computer and Information Science and Engineering (CISE): Core Programs, NSF – Small Projects
<https://www.nsf.gov/pubs/2022/nsf22631/nsf22631.htm>
7. Manufacturing Systems Integration (MSI), NSF
<https://beta.nsf.gov/funding/opportunities/manufacturing-systems-integration-msi>

8. Cybersecurity Innovation for Cyberinfrastructure (CICI), NSF
<https://www.nsf.gov/pubs/2023/nsf23532/nsf23532.htm>
9. Division of Molecular and Cellular Biosciences Core Programs (MCB), NSF
<https://new.nsf.gov/funding/opportunities/division-molecular-cellular-biosciences-core/nsf24-539/solicitation>
10. Division of Integrative Organismal Systems Core Programs, NSF
<https://www.nsf.gov/pubs/2023/nsf23547/nsf23547.htm>
11. Electronics, Photonics and Magnetic Devices (EPMD), NSF
<https://beta.nsf.gov/funding/opportunities/electronics-photonics-magnetic-devices-epmd-0>
12. Plant Genome Research Program (PGRP), NSF
<https://www.nsf.gov/pubs/2023/nsf23559/nsf23559.htm#elig>
13. Communications, Circuits, and Sensing-Systems (CCSS), NSF
<https://beta.nsf.gov/funding/opportunities/communications-circuits-sensing-systems-ccss-0>
14. Fluid Dynamics, NSF
<https://beta.nsf.gov/funding/opportunities/fluid-dynamics-2>
15. Biophotonics, NSF
<https://beta.nsf.gov/funding/opportunities/biophotonics-2>
16. Environmental Sustainability, NSF
<https://beta.nsf.gov/funding/opportunities/environmental-sustainability-2>
17. Particulate and Multiphase Processes, NSF
<https://beta.nsf.gov/funding/opportunities/particulate-multiphase-processes-2>
18. Interfacial Engineering, NSF
<https://beta.nsf.gov/funding/opportunities/interfacial-engineering-0>
19. Nanoscale Interactions, NSF
<https://beta.nsf.gov/funding/opportunities/nanoscale-interactions-0>
20. Combustion and Fire Systems (CFS), NSF
<https://new.nsf.gov/funding/opportunities/combustion-fire-systems-cfs>
21. Infrastructure Innovation for Biological Research (Innovation), NSF
<https://www.nsf.gov/pubs/2023/nsf23578/nsf23578.htm>
22. Infrastructure Capacity for Biological Research (Capacity), NSF
<https://www.nsf.gov/pubs/2023/nsf23580/nsf23580.htm>
23. Energy, Power, Control, and Networks (EPCN), NSF
<https://new.nsf.gov/funding/opportunities/energy-power-control-networks-epcn-0>
24. Engineering of Biomedical Systems, NSF
<https://new.nsf.gov/funding/opportunities/engineering-biomedical-systems-0>
25. Catalysis, NSF
<https://new.nsf.gov/funding/opportunities/catalysis-2>

26. Process Systems, Reaction Engineering, and Molecular Thermodynamics, NSF
<https://new.nsf.gov/funding/opportunities/process-systems-reaction-engineering-molecular-2>
27. Disability and Rehabilitation Engineering (DARE), NSF
<https://new.nsf.gov/funding/opportunities/disability-rehabilitation-engineering-dare-2>
28. Cellular and Biochemical Engineering, NSF
<https://new.nsf.gov/funding/opportunities/cellular-biochemical-engineering-0>
29. Facility and Instrumentation Request Process (FIRP), NSF
<https://www.nsf.gov/pubs/2023/nsf23602/nsf23602.htm>
30. Research Infrastructure in the Social and Behavioral Sciences (RISBS), NSF
<https://new.nsf.gov/funding/opportunities/research-infrastructure-social-behavioral-sciences>
31. Secure and Trustworthy Cyberspace (SaTC), NSF
<https://www.nsf.gov/pubs/2024/nsf24504/nsf24504.htm>
32. Mind, Machine and Motor Nexus (M3X), NSF
<https://new.nsf.gov/funding/opportunities/mind-machine-motor-nexus-m3x>

Announcing Previous Important Funding Opportunities

1. Ideas Lab: Breaking the Low Latency Barrier for Verticals in Next-G Wireless Networks, NSF
Deadline: April 18, 2024 (Pre-Proposal); September 30, 2024 (FP)
<https://new.nsf.gov/funding/opportunities/ideas-lab-breaking-low-latency-barrier-verticals/nsf24-545/solicitation>
2. Campus Cyberinfrastructure (CC*), NSF
Deadline: April 22, 2024
<https://www.nsf.gov/pubs/2024/nsf24530/nsf24530.htm>
3. Innovations in Graduate Education (IGE), NSF
Deadline: April 22, 2024
<https://www.nsf.gov/pubs/2024/nsf24529/nsf24529.htm>
4. Partnership to Advance Conservation Science and Practice (PACSP), NSF
Deadline: April 24, 2024
<https://www.nsf.gov/pubs/2024/nsf24531/nsf24531.htm>
5. Educational Technology, Media, and Materials for Individuals With Disabilities Program—Stepping-Up Technology Implementation, Dept. of Education
Deadline: April 30, 2024
<https://www.grants.gov/search-results-detail/352667>
6. Civic Innovation Challenge (CIVIC), NSF
Deadline: May 1, 2024 (Planning); February 10, 2025 (Full Award)
<https://new.nsf.gov/funding/opportunities/civic-innovation-challenge-civic/nsf24-534/solicitation>
7. Computer and Information Science and Engineering Research Expansion Program, NSF
Deadline: May 2, 2024
<https://new.nsf.gov/funding/opportunities/computer-information-science-engineering-research-0/nsf24-536/solicitation#elig>

8. Equipment Grants Program, USDA/NIFA
Deadline: May 3, 2024
<https://www.nifa.usda.gov/grants/funding-opportunities/equipment-grant-program>
9. Long-Term Effects of Disasters on Healthcare Systems in Populations with Health Disparities (R01- Clinical Trial Optional), NIH
Deadline: May 4, 2024 (LOI); June 5, 2024 (FP)
<https://grants.nih.gov/grants/guide/pa-files/PAR-24-109.html>
10. Caribbean Partners for Conservation (CPC), USDA / Natural Resources Conservation Services (NRCS)
Deadline: May 8, 2024
<https://www.grants.gov/search-results-detail/352262>
11. ACED: Accelerating Computing-Enabled Scientific Discovery, NSF
Deadline: Mayo 13, 2024
<https://new.nsf.gov/funding/opportunities/aced-accelerating-computing-enabled-scientific/nsf24-541/solicitation>
12. Multi-Messenger Coordination for Windows on the Universe, NSF
Deadline: May 13, 2024
<https://new.nsf.gov/funding/opportunities/multi-messenger-coordination-windows-universe-mmcs/nsf24-542/solicitation>
13. Understanding Mechanisms and Outcomes of Trained Immunity (R21 Clinical Trial Not Allowed), NIH
Deadline: May 15, 2024 (LOI); June 16, 2024 (FP)
<https://grants.nih.gov/grants/guide/pa-files/PAR-24-111.html>
14. Sustainable Regional Systems Research Networks (SRS RNs), NSF
Deadline: May 15, 2024
<https://new.nsf.gov/funding/opportunities/sustainable-regional-systems-research-networks-srs/nsf24-533/solicitation>
15. Distributed Array of Small Instruments, NSF
Deadline: May 15, 2024
https://new.nsf.gov/funding/opportunities/distributed-array-small-instruments-dasi/nsf24-538/solicitation#pgm_desc_txt
16. Research Initiative for Vaccine and Antibiotic Allergy (UG3/UH3 Clinical Trial Not Allowed), NIH
Deadline: May 20, 2024 (LOI); June 21, 2024 (FP)
<https://grants.nih.gov/grants/guide/rfa-files/RFA-AI-24-002.html>
17. Research and Development, NEH
Deadline: May 21, 2024
<https://www.neh.gov/grants/preservation/research-and-development>
18. Preservation and Access Education and Training, NEH
Deadline: May 21, 2024
<https://www.neh.gov/grants/preservation/preservation-and-access-education-and-training>
19. Institutional Translational Research Training Program (T32 - Clinical Trial Not Allowed), NIH
Deadline: May 25, 2024
<https://grants.nih.gov/grants/guide/pa-files/PAR-24-108.html>

20. Next Era of Wireless and Spectrum, NSF
Deadline: May 28, 2024
<https://new.nsf.gov/funding/opportunities/next-era-wireless-spectrum-newspectrum/nsf24-549/solicitation>
21. Stephen I. Katz Early-Stage Investigator Research Project Grant (R01 Clinical Trial Not Allowed), NIH
Deadline: May 29, 2024
<https://grants.nih.gov/grants/guide/pa-files/PAR-24-075.html>
22. Coastal Program - FY24, U.S. Fish and Wildlife Service
Deadline: May 30, 2024
<https://www.grants.gov/web/grants/view-opportunity.html?oppId=350418>
23. Building Interdisciplinary Research Careers in Women's Health (BIRCWH) (K-12 Clinical Trial Optional), NIH
Deadline: May 30, 2024
<https://grants.nih.gov/grants/guide/rfa-files/RFA-OD-24-013.html>
24. Improving Undergraduate STEM Education: Computing in Undergraduate Education (IUSE:CUE), NSF
Deadline: May 30, 2024
<https://new.nsf.gov/funding/opportunities/improving-undergraduate-stem-education-computing/nsf24-553/solicitation>
25. Artificial Intelligence, Formal Methods, and Mathematical Reasoning, NSF
Deadline: June 3, 2024
<https://new.nsf.gov/funding/opportunities/artificial-intelligence-formal-methods/nsf24-554/solicitation>
26. Assessment of Climate at Institutions (ACt) Award (RC2 - Clinical Trial Not Allowed), NIH
Deadline: June 3, 2024 (LOI); July 1, 2024 (FP)
<https://grants.nih.gov/grants/guide/pa-files/PAR-24-038.html>
27. Hispanic-Serving Institutions: Enriching Learning, Programs, and Student Experiences, NSF
Deadline: June 4, 2024
<https://new.nsf.gov/funding/opportunities/hispanic-serving-institutions-enriching-learning/nsf24-551/solicitation>
28. Computer Science for All, NSF
Deadline: June 4, 2024
<https://new.nsf.gov/funding/opportunities/computer-science-all-csforall-research-rpps/nsf24-555/solicitation>
29. NINR Areas of Emphasis for Research to Optimize Health and Advance Health Equity (R01 Clinical Trial Optional), NIH
Deadline: June 5, 2024
<https://grants.nih.gov/grants/guide/pa-files/PAR-22-230.html>
30. Modular R01s in Cancer Control and Population Sciences (R01 Clinical Trial Optional), NIH
Deadline: June 5, 2024
<https://grants.nih.gov/grants/guide/pa-files/PAR-24-122.html>
31. Agriculture and Food Research Initiative - Sustainable Agricultural Systems, USDA / NIFA
Deadline: June 6, 2024
<https://www.nifa.usda.gov/grants/funding-opportunities/agriculture-food-research-initiative-sustainable-agricultural-systems>

32. BRAIN Initiative: Development and Validation of Novel Tools to Probe Cell-Specific and Circuit-Specific Processes in the Brain (R01 Clinical Trial Not Allowed), NIH
Deadline: June 7, 2024
<https://grants.nih.gov/grants/guide/rfa-files/RFA-MH-24-280.html>
33. Exploratory Grant Award to Promote Workforce Diversity in Basic Cancer Research (R21 Clinical Trial Not Allowed), NIH
Deadline: June 18, 2024
<https://grants.nih.gov/grants/guide/pa-files/PA-24-039.html>
34. Environmental Education Local Grants Program for Region 2, EPA
Deadline: July 1, 2024
<https://www.grants.gov/web/grants/view-opportunity.html?oppId=350204>
35. Advancing Genomic Medicine Research (R21 Clinical Trial Optional), NIH
Deadline: July 8, 2024
<https://grants.nih.gov/grants/guide/rfa-files/RFA-HG-23-033.html>
36. Mechanistic Studies on Social Behavior in Substance Use Disorder (R01 Clinical Trial Optional), NIH
Deadline: July 14, 2024 (LOI); August 14, 2024 (FP)
<https://grants.nih.gov/grants/guide/rfa-files/RFA-DA-25-032.html>
37. Mechanistic Studies on Social Behavior in Substance Use Disorder (R01 Basic Experimental Studies with Humans (BESH) Required), NIH
Deadline: July 14, 2024 (LOI); August 14, 2024 (FP)
<https://grants.nih.gov/grants/guide/rfa-files/RFA-DA-25-033.html>
38. University Research & Development (R&D) Projects & Capstone Projects, Naval Surface Warfare Center Dahlgren Division
Deadline: July 17, 2024
<https://www.grants.gov/view-opportunity.html?oppId=349325>
39. Developmental Sciences, NSF
Deadline: July 30, 2024
<https://new.nsf.gov/funding/opportunities/developmental-sciences-ds/nsf24-544/solicitation>
40. Measurement Science and Engineering (MSE) Research Grant Programs, National Institute of Standards & Technology (NIST)
Deadline: Applications will be accepted and considered on a rolling basis as they are received.
<https://www.grants.gov/web/grants/view-opportunity.html?oppId=347512>
41. ECosystem for Leading Innovation in Plasma Science and Engineering (ECLIPSE), NSF
Deadline: August 13, 2024
<https://new.nsf.gov/funding/opportunities/ecosystem-leading-innovation-plasma-science>
42. BRAIN Initiative: Research on the Ethical Implications of Advancements in Neurotechnology and Brain Science (R01 Clinical Trial Optional), NIH
Deadline: September 29, 2024 (LOI); October 11, 2024 (FP)
<https://grants.nih.gov/grants/guide/rfa-files/RFA-MH-25-170.html>

43. Advanced Scientific Computing Research (ASCR), Department of Energy
Deadline: September 30, 2024
<https://science.osti.gov/ascr>
44. Biological and Environmental Research (BER), Department of Energy
Deadline: September 30, 2024
<https://science.osti.gov/ber>
45. F24AS00431 FY24 Recovery Implementation, Fish and Wildlife Service
Deadline: September 30, 2024
<https://www.grants.gov/web/grants/view-opportunity.html?oppId=350612>
46. Basic Energy Sciences (BES), Department of Energy
Deadline: September 30, 2024
<https://science.osti.gov/bes/>
47. Fusion Energy Sciences (FES), Department of Energy
Deadline: September 30, 2024
<https://science.osti.gov/fes/>
48. Measurement Science and Engineering (MSE) Research Grant Programs, Dept. of Commerce / NIST
Deadline: accepted and considered on a rolling basis as they are received
<https://www.grants.gov/search-results-detail/352807>



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