ENGINEERING RESEARCH DIGEST

A Weekly Newsletter for Engineering Pls Interested in Funding Opportunities and News



Issue: September 2, 2020 Email: proposalsupport@tamu.edu

COVID-19 Updates & Opportunities

[Watch out for the Special COVID-19 Edition on Fridays]

https://tees.tamu.edu/covid-19/index.html

COVID-19 Request for Information (RFI): Click Here

COVID-19 Research Opportunities (NetID Login Required): Click Here



Funding Opportunities

A database with a more in-depth review of funding opportunities including details such as funding size, sponsor, and topic can be found <u>HERE</u>.

(Items denoted with: LS - Limited Submission, IF - Junior Faculty, SPD - Student or Postdoctoral)

Engineering News, Awards, Research Stories, and SoundBytes can be found HERE.

LIMITED SUBMISSIONS

The Division of Research has implemented a brand new proposal submission and review portal. The system will be used for limited submissions and most internal grant programs. You will find available opportunities here.

NSF National Artificial Intelligence (AI) Research Institutes (<u>link</u>) – Internal Submission Deadline: September 9, 2020.

NIH Postbaccalaureate Research Education Program (R25 - Independent Clinical Trial Not Allowed) (link) – Internal Submission Deadline: September 16, 2020

USDA-NIFA-SARE On-Farm Research Grant Program (link) – Internal Submission Deadline: September 30, 2020

CPRIT Core Facility Support Awards (CFSA) (link) – Internal Submission Deadline: October 14, 2020 CPRIT High-Impact/High-Risk Research Awards (HIHR) (link) – Internal Submission Deadline: October 20, 2020

CPRIT Texas Regional Excellence in Cancer Award (<u>link</u>) – **Internal Submission Deadline:** October 28, 2020

NSF Major Research Instrumentation (MRI) Program: Instrument Acquisition or Development (link) – Internal Submission Deadline: November 2, 2020

NSF Advanced Computing Systems & Services: Adapting to the Rapid Evolution of Science and Engineering Research (<u>link</u>) – Internal Submission Deadline: <u>Limited Submissions</u>.

NSF Louis Stokes Alliances for Minority Participation (link) – Internal Submission Deadline: Limited Submissions

NSF Harnessing the Data Revolution: Coordination Hub (HDR Central) (link) – Internal Submission Deadline: Limited Submissions

■ New – Internal ■

TAMU National Laboratories Office

Development Fellowships (link) – Full Due: September 15, 2020. Award: A typical development fellowship would support a one-year (or shorter) collaborative research project. Funding would cover up to 1½ months of salary for the TAMUS researcher and reimburse travel costs up to \$5,000 for the TAMUS researcher to visit one or more LANL technical staff members for several weeks.

Research Projects (<u>link</u>) – **Full Due:** September 15, 2020. **Award**: Funding for a typical research project would support one graduate student (stipend, tuition, and fees) and one month of time for a TAMUS researcher (typically the student's advisor) per year for up to four years.

TAMU/São Paulo FAPESP

(Anticipated October 27, 2020) SPRINT Call for Proposals – 4th Edition 2020 São Paulo Researchers in International Collaboration (SPRINT) (link) – Full Due: January 25, 2021. Award: Funds can be requested for the mobility of researchers, according to FAPESP standards, to accomplish the purposes set forth under item 1 of this Call for Proposals and must be must be requested individually for each researcher and per scientific mission.

_____ New – External ____

Department of Commerce (DOC)

FY 2020 STEM Talent Challenge Program (link) – Full Due: October 14, 2020. Award: Up to \$2,000,000

Department of Defense (DOD)

Broad Agency Announcement (BAA) Electronic Intelligence Information Exploitation (<u>link</u>) – Full **Due:** FY21 September 30, 2020. **Award**: Multiple awards between \$500,000 and \$12,000,000 are anticipated.

DARPA Virtual VPR/VCR Summit – Included announcement of Young Faculty Award (YFA) Program (Slides attached)

Department of Energy (DOE)

NAWI Funding Opportunity Announcement (FOA): Innovations in Intensified Brine Management (link) – **Concept Paper Due:** September 21, 2020. **Full Due:** January 11, 2021. **Award**: Up to \$8,000,000 split between 4-12 awards.

Environmental Protection Agency (EPA)

Innovative Ways to Destroy PFAS Challenge (link) – Application Due: November 23, 2020 Award: Between \$30,000 and \$50,000.

National Aeronautics and Space Administration (NASA)

Research Opportunities in Physical Sciences Appendix A: Soliciting Proposals for Fluid Physics Experiments on the International Space Station in Flow Boiling to Support Cryogenic Propellant Tank Transfer Research (link) – Step 1 Proposals Due: October 1, 2021. Step 2 Proposals Due: December 1, 2021. Award: Up to \$1,237,500.

National Institutes of Health (NIH)

Multi-disciplinary Machine-assisted, Genomic Analysis and Clinical Approaches to Shortening the Rare Diseases Diagnostic Odyssey (UG3/UH3 Clinical Trial Not Allowed) (link) – LOI Due: 30 days prior to application due date. Application Due: November 12, 2020 Award: Direct cost funding support may not exceed \$125,000 per year for the UG3 phase of awards and \$250,000 per year for the UH3 phase awards. The project period may not exceed 3 years for the UG3 phase. The project period may not exceed 2 years for the UH3 phase. The maximum project period for the entire UG3/UH3 award is 5 years.

NCI Research Specialist (Core-based Scientist) Award (R50 Clinical Trial Not Allowed) (link) – LOI **Due:** 30 days prior to application due date. **Application Due:** January 4, 2021 **Award:** Application budgets may request the following two expenses in direct costs per year: 1) salary support for the Research Specialist commensurate with their level of funded effort (at least 6 person-months) on NCI-funded research grants during Federal Fiscal Year 2020; and, 2) travel costs to attend research meetings/conferences not to exceed \$2,500 per year

National Science Foundation (NSF)

September 9, 2020. Full Due: December 4, 2020. Award: NSF plans to make approximately 8 Institute awards. Total estimated program funding: \$128,000,000 to \$160,000,000.

LS Advanced Computing Systems & Services: Adapting to the Rapid Evolution of Science and Engineering Research (link) – Internal Submission Deadline: Limited Submissions. Full Due: December 3, 2020. Award: \$5,000,000 for a period of up to five years.

Plasma Physics (link) – Full Due: November 16, 2020 – PD 20-1242

Dear Colleague Letter: UKRI/BBSRC-NSF/BIO Lead Agency Opportunity in Biological Informatics, Microbes and the Host Immune System, Quantum Biology and Synthetic Cell (link)

- Fall 2020 NSF Grants Conference CANCELLED Virtual Grants Conference to be held in November-December timeframe. Details to follow: to receive updates, sign up for mailing list here.
- Frequently Asked Questions (FAQs) for Computer and Information Science and Engineering (CISE)
 Research Initiation Initiative (CRII) NSF 20-113
- Frequently Asked Questions (FAQs) for International Research Experiences for Students (IRES) NSF 20-119
- Frequently Asked Questions (FAQs) for PAPPG 2020 NSF 20-1

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Commonwealth Scientific and Industrial Research Organisation (CSIRO) - Australia SPD *CSIRO Early Research Career (CERC) Postdoctoral Fellowship Program* (link) - Application Due: September 7, 2020. **Award**: AU\$83k - AU\$94k plus up to 15.4% superannuation for a term of 3 years.

Deutscher Academischer Austausch Dienst (DAAD) / German Academic Exchange Service

Research Stays for University Academics and Scientists (link) – Application Due: October 15, 2020 for scholarships starting between April 1 and September 30, 2021. May 17, 2021 for scholarships starting between October 1 and March 31, 2022. Award: Monthly payments of 2,000 euros for assistant teachers, assistant professors and lecturers, 2,150 euros for professors Travel allowance, unless these expenses are covered by the home country or another source of funding

ADDITIONAL OPPORTUNITIES/OUTREACH —

Apple AI/ML Residency Program (link) – Apple's AI/ML residency is a year-long program inviting experts in various fields to apply their own domain expertise to build revolutionary machine learning and AI empowered products and experiences. The residency will begin with several weeks of coursework focused on machine learning and deep learning, followed by a project with one of our global machine learning teams. Apple AI/ML residents will be matched with a machine learning research/engineering mentor, and will contribute to their team's research, product design, and development. Some residents may also have the opportunity to publish and present their work at premiere academic conferences.

Texas Division of Emergency Management (TDEM) has created a new Research web page through which researchers across the state may provide information related to their research which impacts the planning for, response to, recovery from, and mitigation against disasters. The searchable website will be shared with the public and emergency management officials statewide. The address for the login page is https://tdem.force.com/researcher/s/login/. You may also reach it on the TDEM website through the "Research" link at the bottom of www.tdem.texas.gov. When you first log in, there is a "Sign Up" link at the bottom of the graphic. Please follow that link where you will be asked to enter your name and e-mail address. It must be a ".edu" or ".gov" email address for the system to process.

Multiple NSF Program Director Positions Available:

- CMMI Mind, Machine and Motor Nexus Program (ENG/CMMI) (link)
- Dynamics Control and System Diagnostics Program (ENG/CMMI) (link)
- Engineering for Civil Infrastructure Program (ENG/CMMI) (link)
- Humans, Disasters and the Built Environment Program (ENG/CMMI) (link)
- Mechanics of Materials and Structures Program (ENG/CMMI) (link)

Previously Notated Opportunities -

DOD Combat Readiness, Rapid Development and Translational Research Award (link)

DOT Dwight David Eisenhower Transportation Fellowship Program (DDETFP) Grants for Research

Fellowship (GRF) (link)

NASA 2020 Human Exploration Research Opportunities (HERO) (link)

NASA B.5 System-Wide Safety Project (SWS) (link)

NIH The NINDS Human Biospecimen and Data Repository (U24 Clinical Trial Not Allowed) (link)

NIH Device-Based Treatments for Substance Use Disorder (UG3/UH3, Clinical Trial Optional) (link)

NIH NIDDK Catalyst Award (DP1 Clinical Trial Not Allowed) (link)

NIST Public Safety Innovation Accelerator Program – Augmented Reality (link)

NSF Division of Materials Research: Topical Materials Research Programs: Biomaterials (BMAT),

Condensed Matter Physics (CMP), Metals and Metallic Nanostructures (MMN), Polymers (POL) (link)

NSF Graduate Research Fellowship Program (GRFP) (link)

NSF Cyberinfrastructure for Sustained Scientific Innovation (CSSI) (link)

NSF Computer and Information Science and Engineering (CISE): Core Programs (link)

NSF Computer and Information Science and Engineering (CISE) Research Initiation Initiative (link)

NSF/VMware Partnership on The Next Generation of Sustainable Digital Infrastructure (link)



Junior Faculty Opportunities

CURRENT & FUTURE

- Young Investigators Programs (<u>link</u>)
- Junior Faculty Targeted Funding Opportunities (<u>link</u>)
- Young Investigator Awards (link)
- If Sloan Research Fellowships (link) Nominations Due: 11:59 pm EST September 15, 2020. Candidates must be nominated by a department head or other senior researcher. Award Amount: \$75,000.
- **DeBakey Executive Research Leadership Program** (link) This unique program trains junior faculty, postdocs and doctoral students to successfully lead a multifaceted high-end research operation, conveying critical skills to lead, manage, and direct high-achieving students and staff at all levels

Funds are available to help Assistant Professors in visiting funding agency program officers at DoD, DoE, NSF, DARPA, etc., when they are ready. Readiness will be assessed by Dr. Z.J. Pei based on a justification statement submitted by the faculty member, including expertise, experience, and research ideas. TEES will pay up to half of the cost of travel to Washington, D.C., for an approved Assistant Professor. Please contact Dr. Z.J. Pei, TEES Director of Research Development, at rightpei@tamu.edu for more information.



Student/Postdoctoral Opportunities

CURRENT & FUTURE -

CSIRO Early Research Career (CERC) Postdoctoral Fellowship Program (link) – Application Due: September 7, 2020. Award: AU\$83k – AU\$94k plus up to 15.4% superannuation for a term of 3 years.

NVIDIA Graduate Fellowships (link) – **Application Due:** September 11, 2020. **Award:** \$50,000. Open to PhD Students researching topics that will lead to major advances in accelerated computing and its applications.

Google PhD Fellowship Program (link) – Application Due: September 30, 2020. Created to recognize outstanding graduate students doing exceptional and innovative research in areas relevant to computer science and related fields. Fellowships support promising PhD candidates of all backgrounds who seek to influence the future of technology. Google's mission is to foster inclusive research communities and encourages people of diverse backgrounds to apply. Fellowships are currently offered in Africa, Australia and New Zealand, East Asia, Europe, India, the United States and Canada.

Facebook Fellowship Program 2021 (link) – Application Due: October 1, 2020. Award: Annual stipend of \$42,000. Tuition and fees paid for academic year (up to two years/four semesters). *Open to full-time PhD students.*

Science Undergraduate Laboratory Internships (SULI) (link) – Full Due: October 7, 2020. Award: Students receive a stipend of \$600 per week during the internship period. In general, housing opportunities will vary from laboratory to laboratory. An allowance is available for participants placed at host laboratories that are unable to offer direct housing arrangements.

NSF Graduate Research Fellowship Program (GRFP)(link) – Full Due: October 20, 2020 (CISE), October 21, 2020 (ENGR). Award: \$34,000 USD stipend is provided to help with living expenses for 12-month period prorated in whole month increments of \$2,833.

Sandia National Laboratories President Harry S. Truman Fellowship in National Security Science and Engineering (link) – Application Due: November 1, 2020. Award: Annual salary of \$111,200.

NIH NCI Predoctoral to Postdoctoral Fellow Transition Award (F99/K00 Clinical Trial Not Allowed) (link) – LOI Due: 30 days prior to application due date. Application Due: November 18, 2020 Award: For the F99 phase, award budgets are composed of stipends, tuition and fees, and institutional allowance, as described below. For the K00 phase, award budgets are composed of salary and fringe benefits, tuition and fees, research and career development support, and indirect costs, as described below.

Science, Mathematics, and Research for Transformation (SMART) Scholarship (link) – Application Due: December 1, 2020. Award: Full tuition and education related educational expenses (meal plans, housing, and parking not included), stipend paid at a rate of \$25,000 - \$38,000 a year depending on degree level (may be prorated depending on award length), Summer research internships ranging from 8 to 12 weeks, health insurance allowance of up to \$1,200 per academic year, miscellaneous allowance of up to \$1,000 per academic year, an experience mentor at one of the Sponsoring Facilities, potential employment placement at a DoD facility upon degree completion.

Apple Scholars in AI/ML (link) – Selected PhD students will receive support for their research and academic travel for two years, internship opportunities, and a two-year mentorship with an Apple researcher in their field. The PhD fellowship in AI/ML is currently open to invited institutions. For more information, please email aiml scholars@apple.com.

DeBakey Executive Research Leadership Program (<u>link</u>) – This unique program trains junior faculty, postdocs and doctoral students to successfully lead a multifaceted high-end research operation, conveying critical skills to lead, manage, and direct high-achieving students and staff at all levels.

Sandia National Laboratories Internships (<u>link</u>) – Internships provide students: Opportunities to work on challenging projects at competitive pay, academic credits for some co-op and other internships, research mentoring from top scientists and engineers, training and practical work experience using state-of-the-art

equipment and instruments. Multiple internship periods available, application due date dependent on dates of internship period. Inquire on Sandia job board for specific opportunities and dates.



Upcoming Events

For all events, registration, and information, please visit (<u>link</u>).

INTERNAL =

Managing Research Data: A Guide to Good Practice

September 9, 2020 6:00 – 7:00 p.m.

<u>Information and Registration</u>

Incorporating Census Data in Your Research

September 10, 2020 12:00 - 1:00 p.m.

Information and Registration

Keeping your Research out of the "Data Dumpster"

September 10, 2020 3:00 - 4:00 p.m.

<u>Information and Registration</u>

Publishing Data in the Texas Data Repository

September 15, 2020 12:00 - 1:00 p.m.

<u>Information and Registration</u>

Save the Date - DOE Early Career Research Program Webinar

September 16, 2020 via Zoom

<u>Information and Registration</u>

Creating a Data Management Plan

September 22, 2020 6:00 - 7:00 p.m.

<u>Information and Registration</u>

4th Annual Texas A&M University Postdoctoral Research Symposium

September 23, 2020 1:00 - 5:00 p.m.

See Flyer Attached

<u>Information and Registration</u>

EXTERNAL

DARPA Proposers Day for Science of Atomic Vapors for New Technologies (SAVaNT) Program BAA

September 3, 2020 10:00 a.m. - 1:00 p.m.

Information and Registration

Microscopy & Imaging Center: Bring Your Own Lunch & Learn – Introducing the new Cryo Dual Beam: Scope and Application Capabilities featuring Dr. Anindito Sen

September 8, 2020 12:00 p.m. – 1:00 p.m.

Please RSVP

xTech Search 3 Summit

September 9 to 11, 2020 12:00 p.m. - 3:20 p.m.

See Flyer Attached

Information and Registration

Federal Energy Management Program's (FEMP) Technical Resilience Navigator (TRN)

Overview

September 9 and 15, 2020

Information and Registration

DOE Bioeconomy Initiative Forum

September 15 to 16, 2020 12:00 p.m. - 3:20 p.m.

<u>Information and Registration</u> – Register by September 11, 2020

Fall 2020 NIH Virtual Seminar on Program Funding and Grants Administration

October 27-30, 2020

Save the Date



Resources

- NSF Broader Impact Expo List of Resources (<u>link</u>)
- Funding Opportunities Spreadsheet (<u>link</u>)
- Facilities (<u>link</u>)
- Education/Broader Impacts Requirements (<u>link</u>)

TEES RESEARCH DEVELOPMENT - PROPOSAL DEVELOPMENT SERVICES —

- NSF CAREER workshops geared towards supporting junior faculty
- Proofreading, editing, and rewriting to refine project narratives and summaries
- Graphics
- Quality Check proposal packages for completion and compliance
- Format and update supplementary documents to have cohesive appearance on large proposals
- Develop checklists based on the solicitation
- Develop templates for supplementary documents and draft budget justification
- Serve as liaison between SRS and subcontractors.

RESEARCH DEVELOPMENT TEAM

Dr. Sharmila Pathikonda, Sharon McCord, Amber Mastrobattista, and Dr. Sindhu Jose **CONTACT US**

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Prepared by TEES Research Development under the auspices of the Associate Agency Director for Strategic Initiatives and Centers. For questions, email proposalsupport@tamu.edu.