



NSF Funding Opportunities: Statistics & Data Science

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2024 JSM Portland Funding Opportunities Panel

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National Science Foundation**

NSF's 3 Major Priorities Align with White House and Congressional Priorities



Statistics Program

- Support research in statistical theory & methods, including research for applications to any domain of science and engineering
- [Statistics Program](#)
- [Conferences and Workshops Math Sci.](#)
- [Focused Research Groups in Math Sci.](#) (FRGMS)
- [Research Training Groups in Math Sci.](#) (RTG)
- Program Officers: Yulia Gel, Taps Maiti, Jun Zhu, Yong Zeng



Programs of Special Interest to Students and Junior Faculty

- Faculty Early Career Development Program ([CAREER](#))
- Launching Early-Career Academic Pathways ([LEAPS-MPS](#))
- Math. & Phy. Sci. Ascending Postdoctoral Research Fellowships ([MPS-Ascend](#))
- Mathematical Sciences Postdoctoral Research Fellowships ([MSPRF](#))
- Graduate Research Fellowship Program ([GRFP](#))
- **NSF EPSCoR Graduate Fellowship Program** ([EGFP](#), new)
- NSF Mathematical Sciences Graduate Internship ([MSGI](#))



CAREER

- Support early-career faculty who have the potential
 - to serve as academic role models in research and education, and
 - to lead advances in the mission of their department or organization.
- Activities should build a firm foundation for a lifetime of leadership in integrating education and research.
- All are encouraged, especially women, members of underrepresented minority groups, and persons with disabilities



LEAPS-MPS

- Supports the research of pre-tenure faculty
 - in mathematical and physical sciences,
 - with an emphasis on those at institutions that traditionally do not receive significant NSF funding,
 - such as minority-serving, predominantly undergraduate or R2 institutions.
- Deadline: January 23, 2025



MPS-Ascend and EPSCoR GFP (new)

- Supports postdoctoral fellows
 - performing impactful research in MPS fields
 - while broadening the participation of groups that are underrepresented in the mathematical and physical sciences.
- Deadline: October 16, 2024 ([MPS-Ascend](#))
- Supports institutions in **EPSCoR** jurisdictions by providing funding for graduate fellowships for ***new or continuing students*** who ***received*** the distinction of NSF Graduate Research Fellowship Program (GRFP) ***Honorable Mention*** within the last three years.
- Deadline: October 2, 2024 ([EGFP, new](#))



Mathematical Sciences Institutes-A Community Resource (www.mathinstitutes.org)

- Currently supports six institutes
- **IMSI**: Institute for Mathematical and Statistical Innovation, University of Chicago.
 - IMSI: **Long Program**, Statistical Methods and Mathematical Analysis for Quantum Information Science, September 16 — December 13, 2024
 - IMSI: **Workshop**, Challenges in Neuroimaging Data Analysis, August 26 — 30, 2024



Interdisciplinary Programs (1)

- Old ones: [AMPS](#), [ATD](#), [CDS&E](#), [CRCNS](#), [DMREF](#), [DMS/NIGMS](#)
- Accelerating Computing-Enabled Scientific Discovery ([ACED](#))
- Artificial Intelligence, Formal Methods, and Mathematical Reasoning ([AIMing](#))
- Collaborations in Artificial Intelligence and Geosciences ([CAIG](#))
- Mathematical Foundations of Artificial Intelligence ([MFAI](#))
- Mathematical Foundations of Digital Twins ([MATH-DT](#))
- Foundations for Digital Twins as Catalyzers of Biomedical Technological Innovation ([FDT-BioTech](#))



Interdisciplinary Programs (2)

- Emerging Mathematics in Biology ([eMB](#))
- Incorporating Human Behavior in Epidemiological Models ([IHBEM](#))
- Mathematical modeling of policy options for evolving public health challenges ([MPOPHC](#))
- Internet Measurement Research: Methodologies, Tools, and Infrastructure ([IMR](#))
- Secure and Trustworthy Cyberspace ([SaTC](#))
- Smart Health and Biomedical Research in the Era of Artificial Intelligence and Advanced Data Science ([SCH](#))



Community Resources

- ▶ Mathematical Sciences Institutes (www.mathinstitutes.org)
- ▶ NSF TRIPODS Institutes: <https://nsf-tripods.org/>
 - [Foundations of Data Science Institute](#)
 - [Institute for Foundations of Data Science](#)
- ▶ NSF–SF MoDL centers
 - [THEORINET](#)
 - [The Collaboration on the Theoretical Foundations of Deep Learning](#)
- ▶ AI Institutes, e.g.
 - [Institutes for Foundations of ML \(UT Austin\)](#)
 - [AI Institutes in Dynamic Systems \(U Washington\)](#)
- ▶ HDR Institutes



Final Remarks

- Check the published abstracts on the NSF website:
<http://www.nsf.gov/awardsearch>
- Volunteer as a reviewer! Email POs or visit
<https://www.nsf.gov/additional-resources.jsp?org=DMS>
- Subscribe to DMS listserv: <https://www.nsf.gov/mps/dms/about.jsp>
- Talk to Program Officers
 - DMS virtual office hours (VOH): <https://www.nsf.gov/events/index.jsp?org=DMS>

Questions?

