Dear Colleagues:

With this Dear Colleague Letter (DCL), The National Science Foundation Division of Graduate Education (DGE) in the Directorate for Education and Human Resources (EHR) and the Division of Materials Research (DMR) in the Directorate for Mathematical and Physical Sciences (MPS) invites requests for supplemental funding from existing awardees of NSF Research Traineeship (NRT) program (NSF 21-536) and Partnerships for Research and Education in Materials (PREM) program (NSF 21-510) to collaborate and form new partnerships to enhance efforts to broaden participation in materials research in any research field supported by DMR and NRT.

Supplemental funding requests from partnering institutions in each program should represent mutual benefit and true intellectual collaboration between NRT and PREM. The NRT program aims to broaden participation through the development of interdisciplinary and/or convergent approaches to graduate research and traineeships that emphasize teamwork, communication, ethics, and cross-disciplinary experiences designed to prepare diverse graduates to tackle societally relevant challenges. The PREM program aims to broaden participation through the development of pathways for the recruitment, retention, and graduation of undergraduate and graduate students and postdocs from underrepresented groups in STEM through partnerships in research and education with DMR-supported centers and facilities.

In support of the NSF commitment to broadening participation by individuals, institutions, and geographic areas, supplemental funding requests should emphasize how the proposed partnership will increase participation by members of underrepresented groups in any research field supported by DMR and NRT.

PROGRAM DESCRIPTION

The supplements are intended to support a partnership between a PREM team and an NRT
team to broaden participation and mentorship of underrepresented groups through exposure of (1) PREM program students and PIs to interdisciplinary and/or convergent research and education activities in the NRT programs that presently incorporate or aim to incorporate materials research and traineeships, and (2) NRT program trainees and PIs to pathways, materials research, and partnerships in PREM program activities centered on the recruitment, retention, and graduation of underrepresented groups into STEM fields. Examples of the types of activities to be considered include but are not limited to:

- Exposing PREM students and PIs to broader interdisciplinary and/or convergent activities provided by one or more NRTs;
- Strengthening PREM pathways, research, and partnerships through integration of interdisciplinary and/or convergent NRT activities;
- Enhancing the impact of PREM materials research by encompassing NRT research principles;
- Developing culturally congruent research challenges posed by PREMs and addressing such challenges using interdisciplinary, convergent NRT research and traineeship approaches;
- Exposing NRT trainees and PIs to PREM pathways, materials research, and partnerships provided by one or more PREMs;
- Strengthening NRT recruitment, mentorship, retention, and graduation of members of underrepresented groups through lessons learned in PREM pathways, research, and partnerships;
- Developing collaborative NRT-PREM models for community engagement that include increased understanding of cultures, traditions, and languages of underrepresented communities;
- Conducting joint workshops to explore, identify, and promote collaboration and exchange between NRT and PREM communities;
- Providing reciprocal mentoring and training of PREM and NRT PIs and students/trainees to broaden their vision, perspectives, and knowledge in community leadership, diversity, equity and inclusion, or multidisciplinary teamwork skills;
- Growing partnerships with industry through collaborative NRT-PREM engagement; and
- Developing partnerships between NRT and PREM institutions through collaborative NRT-PREM activities.

ELIGIBILITY

PIs with active NRT or PREM awards are eligible to apply and should collaborate to do so as instructed below. PREM Seed grantees and PREMs and NRTs operating under a no-cost extension are excluded from submitting supplemental funding requests in response to this DCL.

ANTICIPATED TYPE OF AWARD
Supplements to at least one active NRT award and at least one active PRM award that will work in collaboration toward shared goals.

**HOW TO APPLY**

**NSF will conduct a webinar to provide additional guidance and answer questions about this DCL. Register in advance for the webinar:**

December 19, 2022, 1:00 - 3:00 PM Eastern Time (US and Canada)


After registering, you will receive a confirmation email containing information about joining the webinar.

A white paper (2 pages maximum) describing the proposed supplemental activities, coauthored by partnering PREM and NRT PIs, should be jointly submitted by email to: nrt-prem@nsf.gov. Upon review of the white paper, the partnering PIs may be invited to submit a formal request for supplemental support. Only invited supplemental funding requests will be considered for funding.

Deadline for white paper: **February 24, 2023** (5 p.m. submitter's local time)

Deadline for supplemental funding requests from invited PIs: **April 7, 2023** (5 p.m. submitter's local time).

Supplemental funding requests should be prepared and submitted following the guidance in Chapter VI.E of the [NSF Proposal & Award Policies & Procedures Guide](https://www.nsf.gov/publications/show NSF-PAPPG) and the following instructions. The Summary of Proposed Work (not to exceed one paragraph) and the Justification for Supplemental Funds are limited to a total of two pages.

- In the **Summary of Proposed Work**, include:
  1. A title to the supplement beginning with "NRT-PREM"
  2. A brief (not to exceed one paragraph) description of:
     - The proposed activity;
     - The impact of the activity;
     - How the support will broaden participation.
- In the **Justification for Supplemental Funds**:
  1. The PREM and/or NRT students, post-docs, faculty, and institutions to be involved;
  2. The proposed collaborative activities between the PREM(s) and NRT(s);
  3. How the proposed activities will strengthen PREM pathways, research, and partnerships and/or strengthen NRT research and traineeship activities and/or sustainability;
4. How the proposed effort will broaden participation of members of underrepresented groups in materials research and traineeship activities.

- In the *Supplementary Documents section*, provide a letter of collaboration (not to exceed two pages) from each partnering NRT and PREM that describes:
  1. The intended support to be provided by the partners;
  2. The benefit of the collaboration to the partners;
  3. The commitment, track record, and future plans of the partner(s) for inclusive participation of underrepresented groups.

- *Budget Instructions*

Each partnering lead PI should prepare a budget, including a budget justification for the funds requested.

1. The collaboration must submit a request with a total budget of up to $150,000 per NRT team and up to $150,000 per PREM team;
2. Allowable expenses include: support for PI, co-PIs, collaborators, postdoctoral researchers, and/or staff; student stipends and tuition and travel support; fringe benefits consistent with the requirements in both program solicitations and academic institutional practices and any allowed institutional overhead on these costs.

**QUESTIONS AND ADDITIONAL INFORMATION**

For questions or information on submission of an NRT-PREM supplement, NRT and PREM PIs are advised to send their questions to the email: nrt-prem@nsf.gov

**COGNIZANT PROGRAM OFFICERS AND POINTS OF CONTACT FOR THIS DCL:**

**NRT:** Daniel Denecke, ddenecke@nsf.gov, Lead Program Director
Vinod K Lohani, vlohani@nsf.gov
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**PREM:** Debasis Majumdar, damajumda@nsf.gov, Lead Program Director
Shadi Mamaghani, smamagha@nsf.gov

**REPORTING REQUIREMENTS**

The annual and final project reports must discuss the impact of the NRT-PREM collaborative supplements on broadening participation in research fields supported by the Division of Materials Research (DMR) and/or thematic research areas supported by the NRT.

Information about PREM including current awards can be found at: https://prem-dmr.org/
Information about NRT including current awards can be found at: https://beta.nsf.gov/funding/initiatives/nrt

Sincerely,

Sean L. Jones
Assistant Director
Directorate for Mathematical and Physical Sciences

James L. Moore III
Assistant Director
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