

National Science Foundation 4201 Wilson Boulevard Arlington, Virginia 22230

NSF 12-108

Dear Colleague Letter - Graduating 10,000 New Engineers and Computer Scientists - A Partnership between the President's Jobs Council and NSF (Graduate 10K+)

DATE: September 12, 2012

The President's Council on Jobs and Competitiveness (Jobs Council) was created to provide non-partisan advice to the President on continuing to strengthen the Nation's economy and ensure the competitiveness of the United States and on ways to create jobs, opportunity, and prosperity for the American people. The High Tech Education working group on the Jobs Council was tasked with designing approaches to increase the number of U.S. engineering and computer science graduates.

This letter announces a cooperative activity between NSF and members of the Jobs Council's High Tech Education working group, led by Intel and GE, to stimulate comprehensive action at universities and colleges to help increase the annual number of new B.S. graduates in engineering and computer science by 10,000. Proposals for support of projects would be submitted under a special funding focus (Graduate 10K+) within the NSF Science, Technology, Engineering, and Mathematics Talent Expansion Program (STEP), see http://www.nsf.gov/funding/pgm_summ.jsp?pims_id=5488.

Studies have shown that retention during the critical first two years in a student's major, or along the path towards declaration of a major, is an excellent predictor of eventual graduation with a STEM degree. Recognizing that the correlation between retention and graduation is particularly strong for students in **engineering and computer science**, we invite proposals from institutions that can demonstrate their commitment to: i) significant improvement in first and second year retention rates in these particular majors, beyond current levels; and ii) sustained, institutionally-embraced practices (e.g. http://www.asee.org/retention-project) that lead, ultimately, to increased graduation. Jobs Council members anticipate providing support for this special funding focus, with the number of awards to be made contingent on the availability of funds.

"Graduate 10K+" especially encourages projects that seek to increase retention among women and other groups of students who are traditionally underrepresented in their pursuit and attainment of engineering and computer science degrees. Collaborations among two- and four-year institutions that smooth the transition from associate to baccalaureate degree programs are also encouraged. "Graduate 10K+"; also envisions creative alliances that bring institutions with already high retention and graduation rates together with institutions with more modest rates to share effective practices and develop common cause and action. In addition, the special funding focus will include support for applying the principles of continuous quality improvement to the projects and participating in common research studies that can inform future cohorts of institutions.

Award sizes in the "Graduate 10K+" focus area would match those described in the current STEP solicitation (see link above); and likewise for the proposal submission deadline. Beyond the focus on engineering and computer science majors, no other eligibility restrictions would apply. See the solicitation for additional information regarding the limit on the number of proposals from an organization.

Important Proposal Preparation and Submission Reminders

In addition to addressing the program description in the current STEP solicitation, proposers seeking support from the "Graduate 10K+" funding opportunity should pay close attention to the guidance in Section V.A., "Proposal Preparation Instructions," regarding projects with a significant focus on retention.

Additional Submission Instructions

Institutions submitting a proposal to this special funding focus should select the appropriate "Graduate 10K+" option from the relevant drop down menu when completing the Project Data Form. Proposals should also be identified as in one of two categories: Type 1A or 1B.

- An institution that has not been previously the lead institution on a STEP Type 1A or Type 1B award submits a Type 1A proposal.
- An institution that has been previously the lead institution on a STEP Type 1A or Type 1B award submits a Type 1B proposal.

This cooperative activity between the President's Jobs Council and NSF represents a model for publicprivate cooperation that supports a high-priority goal to improve the educational fitness of the Nation in STEM. We look forward to receiving creative and innovative proposals that will help spur this improvement.

Sincerely,

Joan Ferrini-Mundy, Assistant Director/EHR Thomas Peterson, Assistant Director/ENG Farnam Jahanian, Assistant Director/CISE