



National Science Foundation Research Traineeship (NRT) Program Innovations in Graduate Education (IGE) Track



Hi Everyone, this is Claire Hemingway. I'm a Program Director in the Division of Graduate Education and a member of the NSF Research Traineeship Program Team.

This informational video provides an overview of the Innovations in Graduate Education Track in the NSF Research Traineeship (NRT) program.

The goal is to help you respond to the solicitation by emphasizing several key features and requirements. Of course, I encourage you to read the solicitation carefully. And I invite you to participate in one or more of the online Q&A sessions NRT program officers to address lingering questions that may have after viewing this video.



IGE Goals

- Catalyze rapid advances in STEM education broadly, as well as respond to disciplinary or interdisciplinary graduate education needs.
- Generate the knowledge needed to inform model implementation, adaptability, and scalability.

I would like to start off by describing the goals of this new track within the NRT program.

IGE is intended to catalyze rapid advances in STEM education and to generate the evidence needed for their customization, implementation, and broader adoption.

The track responds to the need for transformative improvements in graduate education, whether the focus is on a single discipline, across multiple disciplines, or graduate education generally.



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IGE Key Features

- Design, pilot and test new, innovative and transformative approaches, models, activities.
- Examine the potential to extend or transfer a successful approach to a new discipline or context.
- Develop test-bed projects that are informed by the learning sciences and extend the knowledge base.

Thus, the IGE Track seeks proposals that design, pilot, and test new, innovative and transformative approaches, models, or activities in graduate education.

Proposals that examine the potential to extend a successful approach developed in one discipline to other disciplines or to transfer an evidence-based approach from one context to a new one are also welcome.

The IGE track supports test-bed projects that are informed by the learning sciences and have high potential to enrich, improve, and extend the knowledge base with attention to transferability and innovation.

Proposals may address needs for improvements at the master's and/or doctoral level.

Strategic collaborations with key stakeholders, including the private sector, non-governmental organizations, government agencies, national laboratories, field stations, teaching and learning centers, museums, and academic partners are encouraged.



What Can You Do?

Activities may include, but are not limited to,

Faculty training	Student Training
Innovative Partnerships	Virtual Networks
Mentoring	Communication Skills
Transitions/Bridges from Undergrad to Grad Education	Professional Skills Development

Given the open nature of the call for innovative improvements in graduate education, you may wonder if your project idea falls within the scope of the IGE Track. Activities proposed may focus on or include a variety of activities, including both faculty and student training, innovative partnerships, virtual networks, mentoring, communication skills training and evaluation, bridges from undergraduate to graduate education, or student professional skills development. Keep in mind that this is by no means an exhaustive list of the types of activities that might comprise IGE.



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Things to Think About

- What is the graduate education need addressed?
- What expertise is needed?
- What strategic collaborations would add value?
- What evidence will be collected to test the efficacy of the approach, model, or activity?
- How will you share lessons-learned across the institution and nationally?

As you plan your project and write your proposal, we recommend that you think about several key questions.

What is the graduate education need addressed by the approach, model, or activities in your project? How will your proposed project provide appreciable and meaningful added value to the current degree programs for master's and/or doctoral students?

What expertise is needed on your team in order for you to successfully implement and evaluate your plan and approach? We encourage leadership teams comprised of a combination of professionals with expertise in the learning sciences and pedagogy as well as the principle science domains.

What strategic collaborations with key stakeholders, including the private sector, NGOs, government agencies, national laboratories, field stations, teaching and learning centers, museums, and academic partners, would add value to the proposed approach?

What types of data or information will you collect to evaluate the proposed model or activity?

Have you included a detailed plan for disseminating the results and the lessons-learned from the test-bed project, both within the institutions involved and with others across the nation who are interested in graduate education?



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Budget

What can be requested in an IGE budget?

- Faculty time in academic or summer months
- Travel
- Costs for students to participate in workshops

IGE Track does not support student stipends

The IGE test-bed projects may have a duration of 2-3 years and budgets between \$300K-\$500K.

The direct costs included in the budget must be commensurate with the goals of the project. The types of budgeted items that are appropriate for IGE projects of course depend on the proposed activities, but allowable costs include faculty and senior personnel salaries, travel, and costs for programmatic elements. The IGE track will not support student stipends. However, participant support costs could include expenses for students to participate in workshops or other piloted activities.



WHERE DISCOVERIES BEGIN



Who May Submit?

Opportunities:

- Open to all STEM disciplines – no interdisciplinary requirement or priority research theme
- All eligible organizations may submit

Restrictions:

- Organizations may submit 2 proposal to IGE Track
- An individual may serve as PI or Co-PI on only 1 proposal submitted to the NRT program

The open eligibility for the IGE track creates an unusual opportunity for innovations that advance STEM graduate education. These innovations may be proposed for any STEM discipline or research theme and may be submitted from any eligible organization.

To submit to the IGE track an organization does not need to be an academic institution that awards research-based master's and doctoral degrees -- as is the case for the Traineeship track. Organizations that are eligible to submit NSF proposals may submit to the IGE track, this includes nonprofit, nonacademic organizations or for profit organizations. If you are still wondering if your institution qualifies, we recommend that you consult the NSF Grant Proposal Guide for a full description.



Reminders

Review Criteria

- Intellectual Merit
- Broader Impacts
- Solicitation Specific Criteria
 - Evaluation
 - STEM education, disciplinary, interdisciplinary, and workforce needs
 - Knowledge generation

2016 Deadlines: December 9th 2015 **Mandatory** LOI; February 9th 2016 Full Proposal
2017 Deadlines: December 9th 2016 **Mandatory** LOI; February 7th 2017 Full Proposal

In closing, we want to remind you to prepare your proposal with the review criteria in mind. Reviewers will be asked to consider not only the Intellectual Merit and Broader Impacts of your proposal, but also the Solicitation Specific Criteria.

For the IGE track, reviewers will consider the following questions:

Is there a well-conceived plan, including tangible metrics, to evaluate the outcomes of the proposed project?

To what extent would the project fulfil STEM education, disciplinary, interdisciplinary and workforce needs?

To what extent would the project generate the knowledge needed to inform implementation, adaptability and scalability of potentially transformative improvement to graduate education?

And finally, required Letters of Intent for FY2016 are due December 9th 2015 and Full Proposals are due February 9th 2016.

required Letters of Intent for FY2017 are due December 9th 2016 and Full Proposals are due February 7th 2017.



WHERE DISCOVERIES BEGIN



Q&A Sessions with NRT POs

11/9/2015	1:30 pm – 2:30 pm	EDT
11/10/2015	1:30 pm – 2:30 pm	
11/17/2015	2:30 pm – 3:30 pm	

Please check NSF's Division of Graduate Education site for updates

<http://www.nsf.gov/div/index.jsp?div=DGE>

Send questions in advance to NRT@NSF.gov

For additional information on the IGE track, we recommend that you to take part in Question and Answer Webinars with NRT program officers on the dates and times listed on this slide. The times are Eastern Daylight Savings time. We encourage you to send questions prior to the Q&A session to nrt@nsf.gov.

On behalf of the NRT team, I'd like to thank you for your interest in the program and wish you luck with preparing your proposals.