Questions from and related to the NSF Division of Chemistry Early-Career Investigator Workshop (Virtual) - Hosted on June 6, 2025

General questions

1. How will the Fiscal Year 2026 Budget Request to Congress and the general uncertainty in NSF's budget impact the U.S. National Science Foundation Faculty Early Career Development (NSF CAREER) program?

NSF plans to hold NSF CAREER awards in FY 2026 and looks forward to receiving exciting proposals by July 23, 2025, 5 p.m., submitting organization's local time. We recognize the significant time and effort that is required to submit a quality proposal. NSF continues to accept proposals to all open funding opportunities, including the CAREER program. Please note that decisions regarding funding opportunities and the number and amount of awards are always subject to appropriations. Always keep an eye on the CAREER program solicitation page and the Proposal & Award Policies & Procedures Guide (PAPPG) for the latest information.

2. What indirect cost rate should I use when developing my budget?

Please follow the guidance of your sponsored research office and work with the research office staff at your university for budget development, including the use of the appropriate indirect cost rate. Please note that on June 20, 2025, the U.S. District Court for the District of Massachusetts, in No. 1:25-cv-11231-IT, vacated NSF's 15% Indirect Cost Rate policy (NSF 25-034). In compliance with the court's decision, NSF will not implement the policy at this time. New NSF awards issued will not implement NSF 25-034, but will include a term applying NSF 25-034 for the entirety of the award if a subsequent court decision permits application of the policy. For more information about NSF 25-034 and the most up-to-date information about the NSF Indirect Cost Rate policy, please check the NSF policy page as needed.

3. Can I include broadening participation activities as part of my broader impacts?

Yes. However, it is important to note that NSF's broadening participation activities, including activities undertaken in fulfillment of the broader impacts criterion and research on broadening participation, must aim to create opportunities for all Americans everywhere. These efforts should not preference some groups at the expense of others, or directly/indirectly exclude individuals or groups.

Investigators should prioritize the first six broader impacts goals as defined by the "America COMPETES Reauthorization Act of 2010." Investigators wishing to address goal seven — expanding participation in science, technology, engineering and mathematics for women and underrepresented groups — must ensure that all outreach, recruitment or participatory activities in NSF projects are open and available to all Americans.

Investigators may conduct these types of engagement activities to individuals, institutions, groups or communities based on protected characteristics only as part of broad engagement activities. Investigators may also expand participation in STEM based on non-protected characteristics, including, but not limited to, institutional type, geography, socioeconomic status and career stage. However, engagement activities aimed at these characteristics cannot indirectly preference or exclude individuals or groups based on protected characteristics. For more information, please read the NSF priorities page and the FAQ section carefully.

4. Will the slides be shared?

The slides are available at the <u>NSF Division of Chemistry Early-Career Investigator</u> <u>Workshop</u> website in the "Additional resources" section.

5. I want to discuss with a program officer whether my proposal fits in with their program. Who should I reach out to?

Prospective principal investigators (PIs) can find the list of NSF Division of Chemistry (NSF CHE) programs, as well as the program officers working within each program, at our website. Once you have identified which program you think might be the best fit for your proposal, please contact the listed program officers via email with a one-page white paper. The program officers will let you know if the proposed research fits within their program. If not, they may refer you to program officers from another program better suited for your proposed research. If you do not hear from your program officer(s) within a week, please send them a reminder email.

6. I have recently received an NSF award. Does this negatively impact my CAREER proposal?

First, congratulations on having a proposal awarded. You would need to make sure that there are no overlaps in the intellectual merit and in the broader impacts. In the project description, you will need to include a section on "Results from Prior NSF Support." Specific details on what to include in that section can be found in the PAPPG.

7. Does submitting a proposal for the CAREER program and then submitting another proposal as a PI around the same time to an unsolicited program affect the likelihood of either proposal being accepted?

Provided that (a) the proposals are submitted to different programs, and (b) there is no overlap between the proposals, the proposals would be reviewed independently.

8. What date should I put as my "expected start date" on my CAREER proposal?

Typically, you should select a start date that is six to 12 months after the deadline.

9. Are proposals from predominantly undergraduate institutions (PUIs) evaluated on the same panel as proposals from research-intensive (R1) and high research activity (R2) institutions?

In NSF CHE, proposals from PUIs, including those submitted under the research in undergraduate institutions (RUI) mechanism, are discussed with all other proposals, including those from R1 and R2 institutions, in accordance with the agency's merit review procedures. The reviewers of these proposals usually include several individuals from predominantly undergraduate institutions, but also researchers from other institutions who are experts in the particular research area. For RUI proposals, special reviewer instructions are supplied with the request for reviews. These instructions call attention to the RUI Impact Statement and the special circumstances under which PUI investigators work. Reviewers are also asked to recognize that the publication rate of PUI investigators and the pace of their research may be slower than at a major research university. The slower pace can be attributed to heavier teaching loads and limited availability of support personnel, facilities and equipment, as well as the involvement of undergraduates rather than graduate students in the research activities.

There may be specific pieces of information for certain solicitations that allow PIs at PUIs to offer details about how their institution supports research for undergraduates. The specific solicitation, the PAPPG, and/or your program officer can explain the different mechanisms within NSF.

10. How does the NSF Established Program to Stimulate Competitive Research (NSF EPSCoR) program and the CAREER program interact?

The NSF EPSCoR program aims to promote participation across the United States. The CAREER program is a specific solicitation and award mechanism. If you are applying from an EPSCoR state and your proposal is deemed competitive for an award, then the EPSCoR program may help support an award.

11. Is it a good idea to reach out to the program director while the proposal is under review?

No. Reaching out to program officers while a proposal is under review is not productive. Program officers do not provide information on the status of proposals that are under consideration, so our messaging to such correspondence typically provides little or no information that would provide much clarity. As we go through the review process, we will contact the PI if we need more information. On the other hand, reaching out to program officers while preparing the proposal and/or after the decision can be helpful.

12. With the amount of turnover, will a new program officer (PO) have notes on previous submissions so they can provide similar levels of insight?

The review process and decisions are well documented and archived. New POs have access to previous proposals, reviews and other relevant information.

13. If the panel summary and individual reviews offer somewhat contradictory opinions, should the comments in the panel summary be given greater weight?

The panel summary may reflect a broader consensus than an individual review, and conflicting opinions may suggest that additional clarity could strengthen the proposal. The program officer comments (PO comments) should be given special consideration to the extent that they clarify what factors weighed most heavily on the decision. Focus on the strengths and weaknesses identified throughout these three sources of feedback.

14. Do you have any proposal samples that you would be willing to share with us?

No. Proposals are confidential; NSF will not share them. You are welcome to ask colleagues if they are willing to share their prior proposals as examples.

15. Can the NSF share reviews of successful proposals? It would be nice to also see what type of comments proposals that are accepted get.

No. Reviewers' comments and panel discussions are confidential. They are also advisory to the NSF, so there is no specific set of comments that definitively indicate that a proposal will be recommended for an award. With that said, comments may reflect the importance of the problem, innovation in the approach, feasibility of the approach, thoughtful consideration of alternative approaches/interpretations and/or impact and/or generalizability of the potential results.

16. Are there any workshops on all steps during submission, checklist, examples of letters?

There are many sources of information on preparing and submitting competitive grant proposals, including from your home institution in many cases. You can also reach out to colleagues to find out how they learned and what they found to be helpful.

Proposal preparation

17. Where do I submit my CAREER proposal?

Proposals can be submitted in <u>research.gov</u> or <u>grants.gov</u>. You will then be able to select the home organization (division) and the home program to receive your proposal.

18. Are reviews from my previous CAREER proposal submission considered in future submissions? If not, how do I show the reviewers that I have incorporated feedback from the previous reviews into my current proposal?

Reviews from a previous CAREER proposal submission are not considered in future submissions. Generally, a different set of reviewers is used for each submission, and they won't know whether it is your first, second or third submission. (The exception would be that if the same reviewer was used, then they would have access to their previous review.) Although you do not need to address prior reviewer comments specifically, you should use the critical feedback from reviewers and PO comments to strengthen your subsequent submission.

19. Can I include preliminary data in my proposal? If so, does the preliminary data need to have been previously published? Is it possible to have a competitive proposal without any preliminary data?

Preliminary data can be included in your CAREER proposal. Preliminary results can help establish feasibility for the proposed work, but it is also possible to have a competitive proposal without preliminary results. Data do not need to have been published to be included in the proposal.

20. How important is the list of previous publications to the success of the proposal?

Prior publications can help establish feasibility and impact. For example, prior publications can show that the PI has the knowledge, expertise and/or track record in the topic area and/or methodologies to provide confidence that the project has the potential to provide new fundamental knowledge to science. The biosketch allows up to five publications associated with the proposed project and up to five additional publications that may not be related to the proposed project.

21. Are mentoring plans required for PIs who are not supporting graduate students (e.g., at a primarily undergraduate institution) or postdocs?

Mentoring plans are not required if there are no graduate students (master's or doctoral) or postdocs funded by the project. However, discussion of how undergraduates might be mentored on the project can be helpful as part of your education or broader impacts plan.

22. Is there a difference between broader impacts and the integration of research and education? If so, what counts as education? Can I include outreach and research experiences for undergraduates as part of my education plan?

Broader impacts and integration of research and education are two distinct components of a CAREER proposal. All proposals must address broader impacts, while the integration of research and education section is specific to CAREER proposals.

The integration of research and education plan should be focused on your development as an educator at your institution. The CAREER award is an investment in the development of a PI as both a scientist and an educator.

Outreach activities and research experiences for undergraduates can be included in either the broader impacts or the education plan. It depends on whether those activities are integrated into your research and fit within your institutional context. Please ensure that all outreach, recruitment and/or participatory activities in NSF projects are open and available to all Americans. Engagement activities cannot indirectly preference or exclude individuals or groups based on protected characteristics.

Proposal review

23. What are the ratings reviewers can assign to a proposal? Do all proposals get a panel summary?

With NSF's current practice, there are five ratings: excellent, very good, good, fair and poor. Reviewers can also do split ratings (e.g., excellent/very good). In a panel, the panelists bin proposals based on categories. These categories vary across NSF. CHE uses high priority, medium priority and low priority.

All proposals discussed in the panel will get a panel summary. If a proposal has uniformly low ratings, a panel may choose not to discuss the proposal. In that case, the proposal will not get a panel summary. Some programs may choose to review some or all proposals ad hoc only. There is no panel convened for ad hoc-only proposals, so these proposals will not get a panel summary. In CHE, all externally reviewed proposals will receive reviewer comments and a PO comment provided by the managing program officer.

For more information about the NSF merit review process, please visit: https://www.nsf.gov/funding/merit-review.

24. How are CAREER review panels different than other review panels done by NSF?

They are largely similar, except that reviewers on CAREER panels will be asked to evaluate the solicitation-specific components, such as the education plan and the department letter.

If you have further questions that were not addressed in this FAQ and/or you would like feedback on programmatic fit, please reach out to your program officer. The list of CHE programs and associated program officers can be found on the <u>website</u>.