Grant Writing Webinar Series for Institutions Building Research and Research Training Capacity

Webinar 1 - Before Writing: Faculty Readiness & Submission Considerations

August 16, 2022
About Today’s Webinar

This webinar is being recorded. It will be posted online for future access. If you registered to attend, you will receive an email notification when the recording is available.

You can enter questions in the Q&A Box. We will answer as many as we can throughout the webinar.

You will also have the opportunity to ask questions in an open Office Hour. Details will be shared at the meeting’s end.
Acknowledgements

Thank you to the following teams that helped make this webinar series possible!

• The NIGMS Information Resources Management Branch
• The NIGMS Web Team
• The NIGMS Administrative, Travel and Service Center
• The NIGMS Communications and Public Liaison Branch
• The NIGMS Division of Extramural Activities

Thank you to all of today’s speakers & volunteers!

Thank you for attending or viewing this event.
This series is *not* a detailed review of specific NIGMS or NIH funding opportunities.

The goal of the entire series is to share strategies for how to navigate the NIH funding process, considerations for determining research and grant writing readiness, and thoughts on effective writing strategies.

This information is appropriate for investigators and sponsored programs or research development professionals.

This information does *not* supersede official NIH instructions in funding opportunity announcements, the SF424 or the Grants Policy Statement.
Today’s Topics & Speakers

1. Determining research idea and grant writing readiness and timing
2. Finding NIH funding
3. Understanding NIH funding opportunity announcements, forms and instructions
4. Common pitfalls from insufficient planning

Speakers:

Sydella Blatch, Ph.D.
NIGMS Program Officer

Anne Gershenson, Ph.D.
NIGMS Program Officer

Marc Rigas, Ph.D.
NIGMS Scientific Review Officer
PART I

Determining Research Idea and Grant Writing Readiness and Timing:

Identify factors affecting research idea and grant writing readiness.
Identify aspects to incorporate into planning of time.

Sydella Blatch, Ph.D.
NIGMS Program Officer
sydella.blatch@nih.gov
Research Idea Readiness

• Great ideas + expertise sometimes ≠ fundable research idea

• Most often, development or refinement of research aims and plans are needed. Often iteratively!

• It helps to allow time to get feedback from people early and multiple times
  - Best to start with just a one-page overview, or even just a conversation!
  - More on feedback teams in Webinar 3: Writing a Competitive Application
Research Idea Readiness

• It is helpful to get feedback from others in order to refine plans, including those that do not work directly in the same specific research area.

• Examples of questions to ask for immediate feedback
  o Are there fatal flaws in your research or project aims?
  o Are these seen as important and interesting questions or plans?
  o Are the methods up-to-date?
  o Does the experimental or program design address what you say it will?
Research Idea Readiness

• If these are not addressed early, it is possible to write an entire grant application with a significant weakness
  ○ And insufficient time to appropriately change it before submission!
Considerations for Planning Time

• Are multiple due dates an option for you?

• If applicable, when does individual and/or institutional eligibility expire?

• If not funded at first, will you be able to resubmit for a future due date?

• A common mistake is to not allow sufficient time for the entire process
  ○ Which begins before the actual grant writing starts!
Considerations for Planning Time

• Time is needed to
  o keep up with the current research or program findings in the field
  o find an appropriate funding opportunity
  o read and re-read funding opportunity announcements and instructions
  o contact the program officer
  o gather a team to provide feedback
  o develop and re-develop research or program ideas (with feedback team), and write application and revise and revise and revise...
  o write additional application components (e.g. Biosketch, facilities,...)
  o obtain letters, complete institutional processes and other external tasks
PART II

Finding NIH funding opportunities:

Gain familiarity with how to find potential funding opportunities.

Anne Gershenson, Ph.D.
NIGMS Program Officer
anne.gershenson@nih.gov
NIH Funding Tutorials

Grants Process Overview

Learn about the steps required for an application to proceed from planning and submission through to award and closeout. Drill down to learn more about each step in the process for guidance that can maximize your understanding of the grants process and help you submit a successful grant application.

VIDEO: Fundamentals of the NIH Grants Process

Grants Process Overview (PDF, 906 KB)

Get Started

Learn the Basics

Learn how NIH approaches grant funding and how your research fits into our research portfolio. Make sure to explore the different types of grant programs offered at NIH, along with the eligibility requirements.

Plan Your Approach

Find and understand funding opportunities, ensure your research is original, understand your organization’s internal procedures, and prepare to write a competitive application.

Apply for Grant Funding

https://grants.nih.gov/grants/grants_process.htm
Finding the Right Mechanism

Level of training and education?

What the PI needs for their current career stage

✓ **F** (fellowship), **K** (career development) (students & post-docs)
✓ **R** (research) – research project by independent investigators
✓ **T** (training grant) - institutions develop/enhance research training opportunities for individuals selected by the institution
Finding the Right Mechanism

➢ Kind of institution?
  • e.g., R15, R16 for institutions with limited NIH Funding

➢ How well developed are the research ideas?
  • e.g., R21, R03, shorter time and smaller $.
  • Note: NIGMS does not participate in the R03 and has limited participation in R21
Finding the Right Mechanism

➢ How defined are the research aims?
  • e.g., R01 – Well-developed specific aims
  • e.g., NIGMS MIRA R35 – Research program rather than a specific project

➢ Technology development (Tech dev)?
  • Parent versus Tech dev (Limited ICs: NIGMS, NCI & NIA)

Remember to check what Institutes/Centers (ICs) participate in each Funding Opportunity Announcement (FOA)!
Types of FOAs: Make Sure the IC of Interest Participates

- **Parent Announcements**
  - Broad, unsolicited - allow investigator-initiated applications, e.g., parent R01

- **Program Announcements (PAs)**
  - FOAs from one or more IC that highlight areas of scientific interest (e.g., tech dev) or particular demographics (e.g., undergraduate serving)
  - PAR = PA with *special receipt, referral and/or review* considerations (e.g., R15, R16)
  - PAS = PA that includes specific set-aside funds

- **Request for Applications (RFAs)**
  - FOAs that highlight more narrowly defined areas of scientific interest (e.g., Covid) with specific program objectives and, often, a single receipt date
Finding an Appropriate FOA

Use Keywords to search:

- **The NIH Guide**
  - Can limit search to particular funding opportunities (e.g., parent, RFA), ICs, etc.

- **Grants.gov**
  - Can search for funding from multiple government agencies
Finding a FOA by Googling or Social Media

Is it the correct FOA?

Funding Opportunity Title

Academic Research Enhancement Award for Undergraduate-Focused Institutions (R15 Clinical Trial Not Allowed)

Companion Funding Opportunity

PAR-21-154 - Academic Research Enhancement Award for Undergraduate-Focused Institutions (R15 Clinical Trial Required, R15 Academic Research Enhancement Awards (AREA))

Is it the most recent FOA?

Expiration Date

May 08, 2024
Finding a FOA by Googling or Social Media

What to do if you land on an expired FOA:

The previous AREA R15 FOA: PAR-18-714

Expiration Date
May 8, 2021

Related Notices

See Notices of Special Interest associated with this funding opportunity

• May 19, 2021 - This PAR has been reissued as PAR-21-155.
**All Kinds of Dates!**

About the FOA: Posted date, Open date & Expiration date
Due dates: “Standard dates apply..”, FOA specific dates

For example, the AREA R15 FOA has a list of specific dates:

The following table includes NIH standard due dates marked with an asterisk.

<table>
<thead>
<tr>
<th>Application Due Dates</th>
<th>Review and Award Cycles</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Scientific Merit Review</td>
</tr>
<tr>
<td>New</td>
<td>Renewal / Resubmission / Revision (as allowed)</td>
</tr>
<tr>
<td>June 25, 2021 *</td>
<td>June 25, 2021 *</td>
</tr>
<tr>
<td>October 25, 2021 *</td>
<td>October 25, 2021 *</td>
</tr>
<tr>
<td>February 25, 2022 *</td>
<td>February 25, 2022 *</td>
</tr>
</tbody>
</table>

- **AIDS**

PART III

Understanding NIH Funding Opportunity Announcements (FOAs):

Learn strategies for reading NIH FOAs.

Anne Gershenson, Ph.D.
NIGMS Program Officer
anne.gershenson@nih.gov
FOA Table of Contents

Part 1. Overview Information
  Key Dates

Part 2. Full Text of the Announcement
  Section I.  Funding Opportunity Description
  Section II. Award Information
  Section III. Eligibility Information
  Section IV. Application and Submission Information
  Section V. Application Review Information
  Section VI. Award Administration Information
  Section VII. Agency Contacts
  Section VIII. Other Information
The Annotated FOA

Follow the tips in the blue boxes below to help you understand the importance of key pieces of information in funding opportunity announcements (FOA).

Department of Health and Human Services
Part 1. Overview Information

<table>
<thead>
<tr>
<th>Participating Organization(s)</th>
<th>National Institutes of Health (NIH)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Components of Participating Organizations</td>
<td></td>
</tr>
<tr>
<td></td>
<td>National Heart, Lung, and Blood National Institute on Aging (NIA)</td>
</tr>
<tr>
<td></td>
<td>National Institute on Alcohol Abuse and Alcoholism (NIAAA)</td>
</tr>
<tr>
<td></td>
<td>National Institute of Allergy and Infectious Diseases (NIAID)</td>
</tr>
<tr>
<td></td>
<td>National Institute of Arthritis and Musculoskeletal and Skin Diseases (NIAMS)</td>
</tr>
<tr>
<td></td>
<td>National Institute on Drug Abuse (NIDA)</td>
</tr>
<tr>
<td></td>
<td>National Institute of Environmental Health Sciences (NIEHS)</td>
</tr>
<tr>
<td></td>
<td>National Institute of General Medical Sciences (NIGMS)</td>
</tr>
<tr>
<td></td>
<td>National Human Genome Research Institute (NHGRI)</td>
</tr>
<tr>
<td></td>
<td>National Institute of Mental Health (NIMH)</td>
</tr>
<tr>
<td></td>
<td>National Institute on Minority Health and Health Disparities (NIMHD)</td>
</tr>
<tr>
<td></td>
<td>National Institute of Neurological Disorders and Stroke (NINDS)</td>
</tr>
<tr>
<td></td>
<td>National Institute of Nursing Research (NIHR)</td>
</tr>
<tr>
<td></td>
<td>National Center for Complementary and Integrative Health (NCCIH)</td>
</tr>
</tbody>
</table>

Your research has to fit within the mission of one of these participating organizations for your application to be assigned for funding consideration.

Note: Not all NIH Institutes and Centers (ICs) participate in Parent Announcements. Applicants should carefully note which

https://grants.nih.gov/grants/Annotated_FOA.pdf
Example FOA: PAR-21-155

Funding Opportunity Title
Academic Research Enhancement Award for Undergraduate-Focused Institutions (R15 Clinical Trial Not Allowed)

Activity Code
R15 Academic Research Enhancement Award (AREA)

Announcement Type
Reissue of PAR-18-714

Part 1. Overview Information

Participating Organization(s)
National Institutes of Health (NIH)

Components of Participating Organizations
National Institute of General Medical Sciences (NIGMS)
National Eye Institute (NEI)
National Human Genome Research Institute (NHGRI)
National Institute on Aging (NIA)

What IC supports the PI’s research/training objectives? Does the IC participate?
Related Notices

Augment/Supersede the FOA
Must-read, most up-to-date information

Related Notices

See Notices of Special Interest associated with this funding opportunity

May 3, 2022 - Understanding the Basic Mechanisms of Immune-related Adverse Events (irAEs) in Cancer Immunotherapy. See Notice NOT-CA-22-063.

February 16, 2022 - Notice of Change to IC-Specific Interests for NINDS to PAR-21-155, "Academic Research Enhancement Award for Undergraduate-Focused Institutions (R15 Clinical Trial Not Allowed)". See Notice NOT-NS-22-080.


Related Notices

Augment/Supersede the FOA

Must-read, most up-to-date information

Revisit BEFORE you submit an application to check for any new related notices!

Upcoming: New Data Management & Sharing Policy Effective January 25, 2023!

Part 2. Full Text of Announcement

Section I. Funding Opportunity Description

Read carefully!

Often contains IC specific interests, key information, and instructions about specific information that must be included in the application!
Part 2. Full Text of Announcement

Section II. Award Information

Includes:

• Application Types (New, Resubmission, Renewal)
• Does this FOA support clinical trials?
• Restrictions on budgets and project period

Section III. Eligibility

Is the institution eligible?

Is the PI eligible?
Section V. Application Review Information

- The text of the application should be responsive to the review criteria
- Note any special criteria
- Read carefully – every question in the “Scored Review Criteria” section matters
Part 2. Full Text of Announcement

Section VII. Agency Contacts

Direct your question to the appropriate person or help desk.

Scientific/Research Contact(s)
Charles Ansong, Ph.D.
National Institute of General Medical Sciences (NIGMS)
Email: charles.ansong@nih.gov

Anne Gershenson, Ph.D.
National Institute of General Medical Sciences (NIGMS)
Email: anne.gershenson@nih.gov

Biman C. Paria, Ph.D., MS (Reg. Sc)
National Cancer Institute (NCI)
E-mail: ncireffof@dea.nci.nih.gov

Susan L. Sullivan, Ph.D.
National Institute on Deafness And Other Communication Disorders (NIDCD)
Phone: 301-496-9633
E-mail: sullivas@nidcd.nih.gov

Hua-Chuan Sim, MD
National Library Of Medicine (NLM)
Phone: 301-594-4882
E-mail: simh@hotmail.nlm.nih.gov

Peer Review Contact(s)
Examine your eRA Commons account for review assignment and contact information.

General R15-Related Review Questions:
Svetlana E. Koliarova, PhD
Center for Scientific Review (CSR)
Telephone: 301-594-7945
Email: koliars@csr.nih.gov

Financial/Grants Management Contact(s)
Jessica Dean
National Institute of General Medical Sciences (NIGMS)
Email: deanj@mail.nih.gov

Crystal Wolfrey
National Cancer Institute (NCI)
Telephone: 240-276-6277
Email: wolfreyc@mail.nih.gov

Christopher Myers
National Institute On Deafness And Other Communication Disorders (NIDCD)
Phone: (301) 435-0713
E-mail: cr143g@nih.gov
PART IV

Understanding the Required Forms:

Gain a Basic Understanding of NIH Forms.

Anne Gershenson, Ph.D.
NIGMS Program Officer
anne.gershenson@nih.gov
It is critical that applicants follow the instructions in the SF424 (R&R) Application Guide, except where instructed to do otherwise (in the FOA or in a Notice from NIH Guide for Grants and Contracts).

Conformance to all requirements (both in the Application Guide and the FOA) is required and strictly enforced.

Section IV. Application and Submission Information

Includes:

- Details on what information to put in your application and where to put it
- Links to submission dates & times
  - Try to submit early so system-detected errors can be fixed
  - Some errors may not be automatically detected

The instructions in the FOA supersede or augment the instructions in the SF424 application guide
The Facilities & Other Resources Attachment needs to include additional information, e.g., a profile of the students of the applicant institution.

R15 applications must include a letter from the provost (or equivalent) containing information specified in this FOA section.

Additional information is required in the Budget Justification.

Can/should you use a Modular Budget?

Are there special budgeting requirements?
Instructions in the SF424 Application Guide & FOA Must Be Followed

• Applications can be withdrawn and not reviewed if
  ➢ Required components are absent, or required information is missing
  ➢ Disallowed components are included
  ➢ Instructions are not followed correctly
The Importance of the Biosketch

• Document an individual’s qualifications and experience

• Demonstrate mentoring experience (e.g. for R15, undergraduate mentoring is particularly important)

• Showcase service to the local and global community (particularly important for NIGMS MIRA/R35)

• Showcase Diversity, Equity, Inclusion & Accessibility (DEIA) efforts

• NOT an afterthought

https://grants.nih.gov/grants/forms/biosketch.htm
PART V

Common Pitfalls from Insufficient Planning:

Gain familiarity with pitfalls often associated with insufficient planning.

Marc Rigas, Ph.D.
NIGMS Scientific Review Officer
marc.rigas@nih.gov
Preparation is Key

• If you have a research administrator, engage early
• Determine all the application materials that will be needed
• Write early – may need to plan for more time than you think!

Aspects that can get neglected with insufficient planning...
Withdrawn Applications

- Applications can be withdrawn because they are missing a required component, include an unallowed component, violate instructions etc.
  - Importance of understanding NIH FOAs and forms
  - Importance of reading and re-reading them (make a requirements list and check them off)
Not Discussed Applications

• “ND” – Not Discussed by reviewers
  o Could poorly address FOA-specific review criteria
  o Could have significant weaknesses in design or other concerns

• But, you will get reviewer feedback, which can be very helpful

Strategies to help with this will be discussed in Webinars #2 and #3.
Grantsmanship

• Make sure the proposal looks professional with all necessary components addressed in a thoughtful way.
• Proofread! More than once! Multiple pairs of eyes helps.
• Consider overall appeal of the format, layout, figures, etc., while adhering to instructions.
• Do others find the application easy to read?

Strategies to help with this will be discussed in Webinars #2 and #3.
Review Criteria

• Reviewers are instructed to address review criteria; applicants should too!
• Carefully read the review criteria in the FOA
• Consider framing parts of the application in ways that address these
• Do others think you have addressed them?
Framing the Problem

• Sell (but don’t oversell)
• Provide compelling and reasonable context for research
• Example: A project aims to create an epitope map – by fully characterizing antibody binding sites on the nucleocapsid protein of a virus.
• Which virus? Why is the nucleocapsid protein particularly important to characterize?

Check out Webinar 3 for how your Feedback Team can help with this.
Crafting the Research Aims

• In a research proposal, specific aims logically meet the overall research objectives laid out in the proposal.

• Hazards of overly dependent aims (e.g. “Aim 1 may not succeed and now…”)

• Avoid jargon

• Don’t assume knowledge of specialized research methods

Check out Webinar 3 for how your Feedback Team can help with this.
Anticipating and Articulating Risks

- Know the riskiest or most challenging aspects
- Acknowledge those in the proposal with mitigation possibilities, including perhaps alternate approaches
- Requires knowing current literature to know what’s been tried

Check out Webinar 3 for how your Feedback Team can help with this.
Additional Tips

• A (good) picture is worth a thousand words.

• The NIH deadline is NOT your deadline. (Yours is much earlier.)

• And did I mention… start early.

• You will make it across the finish line!
Open Office Hour

Monday, August 22, 2022. 1-2pm ET

No RSVP Needed. Up to 30 attendees.

We will send the link to the email used to log into this webinar.

If you have additional questions, please reach out!
sydella.blatch@nih.gov, anne.gershenson@nih.gov, marc.rigas@nih.gov