The NIH F series awards provide training support for graduate, postdoctoral and professional students in select STEM fields. Included within this series are the F99/K00, F30, and F31 awards.

**NIH F30/F31 series awards**

The NIH F series awards provide training support for graduate, postdoctoral and professional students in select STEM fields. The most popular awards that graduate students seek in this series are the Ruth L. Kirschstein Individual Predoctoral NRSA for MD/PhD and other Dual Degree Fellowships (F30) and the Ruth L. Kirschstein Predoctoral Individual National Research Service Award (F31). These awards are open to students conducting research in health-related areas that align with the research goals of the NIH Institutes as listed in the Funding Announcement. The students must be US citizens, non-citizen nationals, or US permanent residents currently enrolled in a PhD or equivalent program, or a combined MD/PhD or other combined professional/clinical and research program. The F30 provides up to 6 years of research support and the F31 provides up to 5 years of research support towards the degree.

**NIH Individual Predoctoral to Postdoctoral Fellow Transition Award (F99/K00)**

The NIH F99/K00 award provides support to talented graduate students completing their doctoral studies who seek to transition into Postdoctoral training. The supported fields of study include engineering, statistics, data science, imaging, biochemistry, and physics. This award provides support towards the final 2 years of the dissertation research training (F99) and up to 4 years of support towards mentored postdoctoral research training (K00). Eligible students must be US citizens, noncitizen national, permanent resident, or a non-US citizen with a valid US visa at the time of application. The student must identify a postdoctoral mentor distinct from their dissertation research advisor to apply for this award. There are currently 3 open funding opportunities:

1. The KUH Predoctoral to Postdoctoral Fellow Transition Award (Funded by the National Institute of Diabetes and Digestive and Kidney Diseases (NIDDK) Division of Kidney, Urologic, and Hematologic Diseases (KUH))

2. NIDCR Predoctoral to Postdoctoral Transition Award for a Diverse Dental, Oral, and Craniofacial Research Workforce (funded by the National Institute of Dental and Craniofacial Research (NIDCR))
3. NIH Blueprint Diversity Specialized Predoctoral to Postdoctoral Advancement in Neuroscience (D-SPAN) Award (Funded by the agencies listed below)

NIH Blueprint for Neuroscience Research (http://neuroscienceblueprint.nih.gov)
National Institute of Neurological Disorders and Stroke (NINDS)
National Eye Institute (NEI)
National Institute on Aging (NIA)
National Institute on Alcohol Abuse and Alcoholism (NIAAA)
National Institute of Biomedical Imaging and Bioengineering (NIBIB)
Eunice Kennedy Shriver National Institute of Child Health and Human Development (NICHD)
National Institute of Dental and Craniofacial Research (NIDCR)
National Institute on Drug Abuse (NIDA)
National Institute of Environmental Health Sciences (NIEHS)
National Institute of Mental Health (NIMH)
National Institute of Nursing Research (NINR)
National Center for Complementary and Integrative Health (NCCIH)
Office of Behavioral and Social Sciences Research (OBSSR)

Advice from the Office of Fellowships

When mentoring students about NIH awards, I have a one-on-one consultation with each student to determine the type of assistance that is needed. The best place for F series students to begin their investigation about how to assemble and write a NIH grant is with their PI. Students who are interested in applying to F series awards are in labs that conduct health-related research, therefore most of the PI’s hold or have held a NIH award. Reading a “sample grant” from their PI of either a currently funded or previously submitted NIH grant will help the student to understand how they should explain and describe their research to the NIH. They will also see the level of detail necessary to be successful in securing a grant from the NIH. Therefore, I encourage students to work closely with their PI’s to complete the Specific Aims, Significance, Approach and general Research Strategy for their applications. Generally, NIH grants are reviewed by experts in the applicants’ field of study, therefore, the PI is the best individual to provide guidance about the types of experiments necessary to pursue the research study, and the rationale for conducting the research study based on previous work done in the field and preliminary data collected by the lab. I am best qualified to provide assistance on the Biographical Sketch and the Doctoral Dissertation and Research Experience (for F99/K00 awards only). Once the application is complete, I am also capable of reviewing the applications to assess the general ease of readability, the presence of a clearly defined hypothesis or hypotheses, and if the applicant has provided clear descriptions of how the proposed experiments will investigate the hypothesis or hypotheses.
NIH “F” series Application information

The table below lists the general sections of the application for F Series awards. Applicants applying to the F99/K00, F30, and F31 must include all of these sections in their applications.

<table>
<thead>
<tr>
<th>Section of Application</th>
<th>Page Limits * (if different from FOA, FOA superseded)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Project Summary/Abstract</td>
<td>30 lines of text</td>
</tr>
<tr>
<td>Project Narrative</td>
<td>Three sentences</td>
</tr>
<tr>
<td>Introduction to Resubmission or Revision Application (when applicable)</td>
<td>1</td>
</tr>
<tr>
<td>Applicant’s Background and Goals for Fellowship Training</td>
<td>6</td>
</tr>
<tr>
<td>Specific Aims</td>
<td>1</td>
</tr>
<tr>
<td>Research Strategy</td>
<td>6</td>
</tr>
<tr>
<td>Respective Contributions</td>
<td>1</td>
</tr>
<tr>
<td>Selection of Sponsor and Institution</td>
<td>1</td>
</tr>
<tr>
<td>Training in the Responsible Conduct of Research</td>
<td>1</td>
</tr>
<tr>
<td>Sponsor and Co-Sponsor Statements</td>
<td>6</td>
</tr>
<tr>
<td>Letters of Support from Collaborators, Contributors, and Consultants</td>
<td>6</td>
</tr>
<tr>
<td>Description of Institutional Environment and Commitment to Training</td>
<td>2</td>
</tr>
<tr>
<td>Note: This page limit includes the Additional Educational Information required for F30 and F31 applications.</td>
<td></td>
</tr>
<tr>
<td>Applications for Concurrent Support (when applicable)</td>
<td>1</td>
</tr>
<tr>
<td>Biographical Sketch</td>
<td>5</td>
</tr>
</tbody>
</table>

F99/K00 specific application information

Students applying to the F99/K00 are required to address the following in their application materials in addition to the sections listed in the table:

**Fellowship Applicant Section**

**Applicant’s Background and Goals for Fellowship Training**

This section should address both phases of the F99/K00.
A. **Doctoral Dissertation and Research Experience**

Describe how the current doctoral project and research experience, which is not within the mission of KUH (F99) will be leveraged for identifying and pursuing a post-doctoral research question within the mission of KUH (K00).

B. **Training Goals and Objectives**

Describe the long-term career goal and explain how the F99/K00 will enable the attainment of that goal. For each phase (F99 and K00), describe how the proposed research training and career development plan will enhance the applicant's knowledge, technical expertise, and professional skills, keeping in mind existing strengths as well as any gaps in existing skills. Describe efforts and/or plans during the F99 phase that will prepare for the K00 transition. If a K00 mentor has not been identified prior to application submission, include a strategy for identifying a K00 mentor.

C. **Activities Planned Under This Award**

Describe the scientific and professional development activities planned for each phase (F99 and K00) and explain how these activities will facilitate the transition to each subsequent career stage. Include a timeline with scientific, professional development, and career milestones.

**Research Training Plan**

All instructions in the SF424 (R&R) Application Guide must be followed, with the following additional instructions:

**Specific Aims**

All applicants must use the following Specific Aims:

**Specific Aim 1** (F99 phase): The Dissertation Research Project (not within the mission of KUH). Provide a detailed description of the non-KUH research to be completed in the F99 phase.

**Specific Aim 2** (K00 phase): The Postdoctoral Research Direction (within the mission of KUH). With guidance from the K00 mentor (or the F99 sponsor if a K00 mentor has not yet been identified at the time of application), identify a K, U or H research direction to be pursued during the K00 phase. More information about the KUH research programs can be found at the [NIDDK/KUH](#) website.

**Research Strategy**

Applicants should address the Significance and Approach for each Specific Aim individually.
Specific Aim 1 (F99 phase): Dissertation Research Project (not within the mission of KUH):

Significance

Provide an overview of the non-KUH dissertation research, including the scientific question being addressed and its potential impact on the dissertation research field.

Approach

Provide an overview of the dissertation research, including the background, goal, rationale, and hypotheses of the research project(s). The Approach for this Aim should be organized into two sections:

1. A progress report on the dissertation research project thus far, including the approaches used, research outcomes obtained, and important methodologies learned;

2. A detailed research proposal for the work to be completed in the F99 phase, including experimental design, anticipated results, potential problems, alternative strategies, and potential follow-up studies.

Specific Aim 2 (K00 phase): Postdoctoral Research Direction (within the mission of KUH):

Significance

Explain the significance of the proposed K00 research direction. Describe a specific question or observation that might be investigated. Explain how this question or observation is related to the applicant's research interests. Explain how this work will advance K, U or H research.

Approach

While it is recognized that the actual approach and experimental detail may change from the time of application and activation of the K00 phase of the award, the applicants should provide a general description of how the research might be conducted, including approaches and methodologies to be used, anticipated results, challenges that might arise and how to address them. Explain the relationship between the approaches used in the F99 dissertation project to the proposed K00 project.
Northwestern doctoral students who hold or have held NIH F99/K00 award

The earliest program announcement for this award is for 2015, and the award start date was in 2016. I have identified 3 recipients from Northwestern who have held this award as listed in the NIH RePORTER database: 2 in 2017/2018, and 1 current student as of 2018:

<table>
<thead>
<tr>
<th>Award years</th>
<th>Name</th>
<th>Current institution</th>
</tr>
</thead>
<tbody>
<tr>
<td>2018/2018</td>
<td>Christie Sze</td>
<td>Northwestern University (current student, still in the F99 phase)</td>
</tr>
<tr>
<td>2017/2018</td>
<td>Clarissa Valdez</td>
<td>UT Southwestern (K00 phase)</td>
</tr>
<tr>
<td>2017/2018</td>
<td>Ryan Rickles</td>
<td>Duke University (K00 phase)</td>
</tr>
</tbody>
</table>

Northwestern students who hold or have held F30 and F31 awards

[Graph showing NIH F30 (MD/PhD) and F31 (PhD) awards 2016-2019]

[Graph showing NIH F30/F31 NRSA awards 2014-2016]

Note: awards were not listed and reported as F30 and F31 for these years