



# LARGE-SCALE GRANTS



# Hello

Dear Colleague,

Thank you for your interest in large-scale grants. As you may know, large-scale grants provide a unique opportunity to pursue challenging scientific questions that often require collaboration across disciplines.


We understand that, at a certain point in your career, you might want to seek new opportunities to advance your research. Competing for large-scale grants is one way to position yourself for tackling big ideas and for expanding, or further engaging, a research network. Large-scale grant success can have lasting benefits for you, your research team, and the institution.

Please read the rest of this booklet for more information, and contact MICHHR to learn about ways we can support you in your pursuit of large-scale grants.

Best wishes,

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Associate Dean for Clinical & Translational Research (Medical School)  
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# Large-Scale Grant Mechanisms

Large-scale grants include NIH U- and P-series mechanisms, such as the following examples:

***P01 – Program Projects:*** Broadly based, long-term research program that organizes large groups around a major theme.

***P30 – Center Core Grants:*** Shared resources/facilities for investigators from different disciplines working on a common theme.

***P50 – Specialized Center:*** Supports a multidisciplinary approach to a specific disease entity or biomedical problem area.

***U01 – Research Project – Cooperative Agreement:*** Supports a project to be performed in an area representing the Principal Investigator's research interests and competencies.

***U24 – Resource-Related Research Projects – Cooperative Agreement:*** Supports research projects that contribute to improving resources that serve biomedical research.

# Large-Scale Grant Mechanisms

Unlike P-series grants, U-series grants are cooperative agreements, which are support mechanisms used by NIH for high-priority areas of research. Cooperative agreements require substantial involvement of NIH staff in terms of oversight, coordination, or facilitation of award activities.

In recent years, several NIH Institutes/Centers eliminated the P01 for their broader research interests and only issue funding opportunity announcements for high-priority research topics. Specific to the National Institute for General Medical Sciences, the P01 was replaced with the RM1 mechanism. The RM1 is designed to support highly integrated research teams of three to six Principal Investigators in addressing ambitious and challenging research questions.

There are many other NIH U- and P-series mechanisms than highlighted here. You can learn more about them on the NIH Grants and Funding webpage. In addition, other Health & Human Services agencies offer U- and P-series grants, including:



All open funding opportunities can be found by searching [grants.gov](https://www.grants.gov).

# Features of Large-Scale Grants

**Synergy:** The pursuit of the research vision requires an integration of ideas and efforts to produce results that could not be achieved through individual projects.

**Collaboration:** Partnering is essential and often occurs across disciplines.

**Complexity:** Virtually all aspects of developing large-scale grants are complex from conceptualization to submission.

## Features: Synergy

The pursuit of the research vision requires an integration of ideas and efforts to produce results that could not be achieved through individual projects.

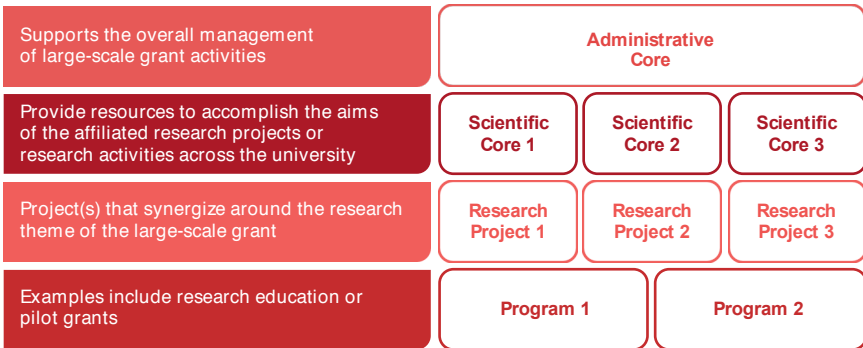
The structure of many large-scale grants, including centers and program projects, have various configurations of projects, cores, and programs that **synergize around a compelling scientific theme**. The exact structure is dictated by the funding opportunity announcement, and developing the grant is similar to writing several R01 and R21 applications that support a collaborative research agenda. Applicants need to present strong justification that coordinating the research under a large-scale grant structure will provide unique opportunities that could not be achieved through siloed efforts.

**NIH Grant Development Resource:** The National Institute for Allergy & Infectious Diseases highlights questions you should consider when writing U- and P-series applications, and much of the information is relevant to other NIH Institutes and Centers.

For links to resources mentioned here, visit:  
[www.michr.umich.edu/large-scale-grants](http://www.michr.umich.edu/large-scale-grants).

# Features: Synergy

Common large-scale grant components that must align with the overall vision:



*Potential Components of a Large-Scale Grant*

# Features: Collaboration

To address major scientific challenges, partnering is essential and often occurs across disciplines. Effective collaborative proposal development requires that you select the best people, make time for regular communication, develop a collaborative research agenda, manage conflicts, promote mentoring, and consistently communicate the overall vision and goals of the proposal as well as individual responsibilities and expectations.

These team science efforts require strong management and communication skills. Here are some resources that might help:

***Team Science Toolkit:*** From the National Cancer Institute, a user-generated collection of information and resources that supports the practice of, and study of, team science.

***Collaboration & Team Science—A Field Guide:*** Topics include building research teams, fostering trust, developing a shared vision, and handling conflicts.

***TeamScience.net:*** Online learning resources to enhance skills needed to perform cross-disciplinary, team-based research.



# Features: Complexity

Virtually all aspects of developing large-scale grants are complex from conceptualization to submission. Allowing significant time to plan, develop, and write a large-scale grant is one way to position your team to tackle the inherent complexities. Below are a few strategies for advanced planning:

***Be proactive in identifying funding opportunity announcements that align with your research vision before they are released.*** Consider reading minutes from NIH Council Meetings. At these meetings, the director and council members discuss program priorities, including upcoming funding opportunity announcements. Council meeting minutes are posted on NIH Institute and Center websites for public viewing. Another strategy is to review the NIH Guide to Grants and Contracts webpage for pending funding opportunity announcements.

***Draft the “Overall Vision” and “Budget” sections of your large-scale grant early.*** Share these sections with your collaborators for feedback. This will help you create buy in for the vision, objectives, and goals and will lay the foundation for strategic concepts that will need to be woven throughout the grant. It will also help create transparency about the funds allocated to projects and cores so your team of writers can create realistic plans.

# Value of Large-Scale Grant Funding

## *For the Principal Investigators & Research Team*

***Expanding your scientific network:*** Large-scale grants are excellent opportunities to further develop cross-disciplinary partnerships that advance the research agendas of both you and your colleagues. Your networks may extend beyond the university or, in the case of cooperative agreements, involve federal agency staff.

***Responding to the funding climate:*** Federal agencies are offering more team-based grants that encourage the pursuit of ambitious research questions.

***Sharpening your leadership skills:*** The development and implementation of large-scale grants requires high-level management, communication, decision-making, and conflict resolution skills that can position you for additional leadership roles.

# Value of Large-Scale Grant Funding

## *For the Institution*

**Faculty recruitment:** The coordination of a breadth of research activities and training in specific fields can be an attractive tool for recruiting new faculty.

**Research core facilities:** Certain large-scale grants (eg, NIH P30) support funding of centralized research resources that provide investigators access to technologies, instrumentation, expert consultation, and other services.

**Training and funding opportunities:** Numerous large-scale grants have embedded training and funding opportunities that foster the advancement of research careers and scientific goals.

# Is a Large-Scale Grant Right For You?

- Are there value-added benefits to coalescing research and faculty efforts into a unified vision?
- Do you have a track-record of R-series, or similar, funding and publication success in your field of research?
- Does your team have a successful history of collaboration?
- Is there a funding opportunity announcement that aligns with your research vision and long-term goals?

# MICHR Support For Large-Scale Grants



*MICHR Large-Scale Grant Support Services*

# MICHR Support For Large-Scale Grants

**Strategic Input:** MICHR faculty grant experts can help you conceptualize a large-scale grant and advise on coordination of projects and cores, study design, biostatistics, and potential collaborators.

**Financial:** MICHR's \$100,000 Accelerating Synergy Award is designed to position your team to submit competitive large-scale grants. Faculty can compete twice for \$200,000 in total funding.

**Resources:** MICHR grant experts can create tailored writing templates and provide you with guidance materials for various components of the grant.

**Project Management:** MICHR can provide you guidance with pre- or post-award planning and organization.

**Administrative:** MICHR can help you coordinate brainstorming and writing sessions for your grant team.

**Editing:** MICHR's grant editor will ensure logic, flow, and clarity of ideas across the various components of your large-scale grant.

**Education:** MICHR hosts small roundtable discussions about large-scale grants with interested faculty upon request.

For more information, and for links to resources in the booklet, visit: [www.michr.umich.edu/large-scale-grants](http://www.michr.umich.edu/large-scale-grants).



# Notes

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**For more information, contact:**

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