

CDDR Wiki

NCSA Center-Directed Discretionary Research (CDDR)

NCSA is committed to enabling new, innovative research by providing seed funding for NCSA staff through a competitive proposal process.

Pre-proposal Deadline:

Any time but no later than **Monday, February 13th** to be considered for the current round

Full Proposal Deadline (due by 11:59 pm CT):

Next deadline is **Friday, February 24, 2023**

SUMMARY OF PROGRAM REQUIREMENTS

General Information

Program Title:

NCSA Center-Directed Discretionary Research (CDDR)

Program Objectives (Synopsis of Program):

1. Maintain the scientific and technical vitality of NCSA.
2. Enhance NCSA's ability to address future University of Illinois' and funding agencies' missions.
3. Serve as a proving ground for new concepts in research and development, including high-risk, potentially high-value ideas.

Proposed projects should align with [NCSA's Vision, Mission and Strategic Goals](#). Proposed projects can but are not limited to providing early support for development of new R&D instruments (technologies) or providing the flexibility to respond quickly to new R&D opportunities, including developing concept work often required by agency funding Request for Proposals (RFPs).

Award Information

NCSA is committed to enabling new, innovative research by providing seed funding for NCSA staff through a competitive proposal process.

Estimated Number of Awards: 2-3

Anticipated Funding Amount: \$150,000

Eligibility Information

***NCSA Staff MUST discuss their participation on a proposal with their manager. This discussion and subsequent approval should occur prior to the submission of the CDDR pre-proposal [form](#).**

Who may serve as PI: The PI of a CDDR proposal must be a full-time NCSA staff member. Faculty with zero percent affiliate positions may participate as a team member.

Proposal Preparation and Submission Instructions

***NOTE: The NCSA Proposal Development Office (PDO) is available to assist in developing CDDR proposals.**

Pre-Proposal

- **Pre-proposal Submission:**

- Participants may submit the pre-proposal form in [mis / Savannah](#) at any time and no later than Monday, February 13th to be considered for the current round; pre-proposals will be approved/denied by the NCSA Director's Office on a rolling basis and no later than Friday, February 17th for the current round. Please allow at least five (5) business days for review.
- **Pre-Proposal (form located on Savannah as [CDDR Pre-proposal](#); please allow at least 5 business days for review)**

Fill out the contact information with the correct information:

- Organization Unit (NCSA Dept): state what unit/department
- Principal Investigator/NCSA Lead: Who is the appointed person in charge of this project?
- Date
- Principal Investigator's Email

- **Pre-proposal Checklist:**

- Read through the pre-proposal guidelines and be certain to understand what information needs to be submitted.
 - Because the primary purpose of CDDR projects is to benefit NCSA, please do not submit project proposals that will not directly impact NCSA.
 - The pre-proposal approval period may take some time to complete due to workload at the time of submission.
 - The principal investigator must be the person to submit the pre-proposal.
 - Staff participation in a proposed project **MUST** be discussed with and approved by the primary manager(s). The proposal must contain a statement naming the manager approving the project.
 - Please do not resubmit old project ideas (whether funded or declined); if an idea needs to be revisited, please schedule a meeting with the [Proposal Development Office](#).
- **mis/Savannah CDDR Pre-proposal form requirements**
 - **Proposed Project Title (30 word maximum):** State the project title at this stage of the process. Project thesis statement: Focus ideas into one or two sentences, this should present the topic of the project and should briefly explain what the project is about.
 - **Project Duration: What is the proposed start date of this project – what is the proposed end date of this project?**

There is a **12-month initial maximum** duration for all projects; if more work is planned, it should be made clear in the project description, and it will be contingent on results of the first 12 months, so expected results during this period should also be discussed in the description. If you are developing a multi-year project, please discuss this with the [Proposal Development Office](#) in advance.
 - **Project Description (300 word maximum):** Describe the project and how the research will be conducted.
 - **Budget (50 word maximum):**
 - Total dollar amount requested from NCSA: How much money are you requesting from NCSA for your research?
 - Note that the CDDR program has a budget of \$150,000 and will typically award 2-3 projects within that budget.
 - Other intended funding sources for project funds: please list all other projected sources of funding other than NCSA.
 - **Primary Impacted Beneficiaries (150 word maximum):**
 - How will this project benefit NCSA? Describe the impact this project will have at NCSA.
 - Training Opportunities: What are the potential opportunities to learn with this project?
 - Listed below are examples that the project could provide opportunities for:
 - NCSA Staff
 - UIUC Post-Docs
 - Students
 - **Criteria for Success:** What defines success of the project; in numbers, findings, methods, etc.
 - **Buyout Time for Full CDDR Proposal Development**
 - A maximum of 5% of your time for one month may be requested via your pre-proposal
 - If extra time is needed, please schedule a meeting with the [Proposal Development Office](#).

Proposal Process:

- As appropriate and requested, a mentor may be identified and assigned to work with the submitter to provide guidance and support as the proposal is developed.
- Once the pre-proposal form is approved, teams may begin developing a full proposal. A committee will complete a technical and management review of full proposals twice per year. The next deadline is **February 24, 2023**.

Full Proposal

- **Full Proposal Submission:**
 - CDDR proposals should be submitted via EasyChair here: <https://easychair.org/conferences/?conf=cddr2023>. Proposals for Spring 2023 are due **February 24, 2023 by 11:59pm**. If you do not have an EasyChair account, see the [instructions for creating an account](#). Read the "Overview" information, and then click on "New Submission." (Link to create a new submission is here: <https://easychair.org/conferences/?conf=cddr2023>):
 - Fill in the author information
 - Fill in the title in plain text
 - Fill in the abstract in plain text (Limit 300 words)
 - Fill in at least three keywords for searching
 - Upload a PDF of your proposal

When you have completed the form, press 'Submit' **only once**. It will take time to upload the submission. ***Please note*** Full proposals should not be submitted until your pre-proposal form has been approved (see "Pre-Proposal" section above.)

• Full Proposal Checklist

The full CDDR proposal is limited to 5 pages (not including bios) and should consist of:

- a. Proposal Title
- b. Abstract (1/2 page)
- c. Project Description
 - i. Scientific and Technical Opportunity
 - ii. Context

1. Description of similar previous work (who, what, when and relationship to this project)
2. How the proposed work is unique and innovative
3. Clear understanding of any competition or partnership opportunities
- d. Benefits, Beneficiaries, and Customers as related to the Center as a whole
 - i. Approach
 1. Nature of work
 2. Deliverables
 3. Milestones and Timeline
 4. Leveraging of external activities
 5. Expected results
 - ii. Investigator(s) (Bios may be included at end of proposal)
 - iii. Resources Required
 1. Key Skills
 2. Existing Staff
 3. Equipment
 - iv. Future Funding Opportunities
 1. Identify specific funding sources and outline a future funding plan/path to sustainability
 - v. Budget and Budget Justification - please follow the requirements in the Budgetary Information section below.

Budgetary Information

- The CDDR program has a planning budget of \$150,000 and will typically award 2-3 projects within that budget.
- **Indirect Costs (F&A/Overhead) and Other Budgetary Limitations:** Please note that there is no fringe, tuition remission, or F&A allowed on CDDR proposals.
- Please use the linked [CDDR budget template](#) to develop your budget.
- **Period of Performance:** The maximum duration of a project is twelve (12) months
 - The start date is June 1st with an end date on or before May 31st.
 - The project may have a no-cost extension (NCE) depending on the project
- **Allowable Costs**

It is anticipated that the majority of the budget will be to support staff and student time. Other costs may be allowed as described below. Any questions with respect to allowability of costs should be addressed with the [Proposal Development Office](#).

- Travel will be supported **only** if it is strictly necessary to conduct the work. Typically, conference attendance will not be supported.
- Hardware purchases will be supported **only** if it is specific to this project work. Laptops and similar items will not be allowed and are supported through NCSA's budget process.
- Software purchases will be supported **only** if it is specific to this project work.

Proposal Review Information Criteria

Review Process

Competitive proposals will present a well-defined research plan that leverages Center resources and external activities, benefits NCSA and the University of Illinois strategic plans, and provide a clear path to sustainability. Awards are made subject to the availability of funds and review committee's recommendations.

Merit Review Criteria

1. **Significance**
 - a. Does the proposed research hold scientific, technical and marketing merit?
 - b. Does the proposed research address an important problem or a critical barrier to progress in the field?
 - c. Does the proposed research present a clear and compelling connection to NCSA's Vision, Mission, and Strategic Goals?
2. **Innovation**
 - a. Is the proposed research novel, innovative or original?
 - b. Is there a clear understanding of competition and how it differs from related work?
3. **Investigators**
 - a. Does the proposed research leverage NCSA scientific and technical expertise from one or more NCSA groups and/or develops skills and expertise in one or more NCSA groups?
 - b. Are the qualifications of the investigators appropriate and adequate for the proposed research?
4. **Approach**
 - a. Is the written proposal clear and complete, including any graphics?
 - b. Are the overall strategy, methodology, and analysis well-reasoned and appropriate to accomplish the scientific aims of the proposed research?
 - c. Are potential problems, alternative strategies and benchmarks for success presented?
 - d. Is the proposed research likely to be successful for the duration and funds proposed? Are NCSA support, equipment, and other resources available to the investigators adequate for the proposed research?
 - e. Does the proposed research include plan(s) for continued collaboration and pursuit of external funding from Federal agencies, Foundations or Industry?
 - f. If the proposed research proves to be successful, is there strong potential for follow-on funding?

Acceptance of Funding Conditions

PI Funding Responsibilities

- Managing and overseeing project costs
- Notifying the CDDR program coordinator of any significant problems or concerns
- Providing project leadership and share results/findings including as part of publications
- Appropriately considering protection and disposition of intellectual property
- All CDDR projects must work with the line management structure for the individual employee researcher
- Submitting three- and six-month reports to the NCSA Director's Office
- Submitting year-end final Summary Report

Accruals

Project funds will be monitored on encumbrances, including commitments to pay for goods and/or services that have been received/supplied but not paid for or invoiced.

Award Administration Information

Each project must submit reports after three and six months, in addition to a year-end summary to the NCSA Director's Office, which will be reviewed by the CDDR Program office, who will provide feedback.

- **The three- and six-month reports should be ~2 pages or a few slides and should include:**
 - Progress to date and comparison with proposed schedule
 - Any challenges that have arisen
 - Major accomplishments, publications (even if in development) and presentations
- **The final report should discuss [use [form](#)]:**
 - Please provide a synopsis of your NCSA CDDR project activity and outcomes over the lifetime of your project, including major accomplishments, publications (including those in development), presentations, grants, new partnerships, etc.
 - Please list any participants in the CDDR project to date (and indicate whether they are staff, faculty, postdocs, students, or other).
 - Please describe any changes to the original project plan or any challenges encountered and how they have been addressed. Address progress with respect to the originally proposed schedule.
 - How has this project benefitted NCSA, and how is it expected to in the future?
 - Please describe any beneficial outcomes outside of new scholarly knowledge of the project
 - Please describe the next steps for the project. Have you submitted or do you plan to submit any proposals for external funding and if so, which have you identified as possible opportunities?
 - We are in the process of revamping the CDDR program and would love to hear your feedback. Do you have any suggestions on how to improve the program?

Timeline

(Note that this timeline currently includes one set of projects being proposed, selected, and funded each year, but the committee wants to leave the opportunity for this to be expanded to two cycles annually if sufficient budget is available. For this reason, "Spring Start" is used for these projects, recognizing that we may add "Fall Start" projects in the future.)

mid-January	Spring cycle kick-off; discuss how to write a good proposal
now-February 13	Accepting pre-proposal submissions
now-February 17	Approving pre-proposals (please allow five business days)
Last Friday in February	Full spring-start proposal submission deadline
First three weeks of March	Spring-start Proposal Reviews conducted
Last week of March	Recommendations for spring-start projects provided to EAD of Engagement
First week of April	Recommendations for spring-start projects sent to Exec Committee
Mid-April	Recommendations for spring-start projects sent to Director for approval
May 1	Notifications to proposers on review outcomes for spring-start projects
May	Writing and processing MOUs for approved spring-start projects; accounts set up with Business Office
June 1	Start date for spring-start projects.
September 1	Three month report due for spring-start projects
December 1	Six month report for spring-start projects due
June 1	Final Reports for spring-start projects due; schedule a presentation of the project to NCSA staff

FAQs

Can I request time to work on the development of the proposal?

The PI may request up to 5% time for one month for proposal development through the pre-proposal form.

Previously Funded Projects

NOTE: *These projects were supported under the prior program definition. With this update, some may be less relevant as examples. The committee debated whether to include them and decided they provide at least some examples and are beneficial.*

Project Start Date	Title	PI	Co-PIs
January 2019	NCSA Computational Program in Racial Health Disparities	Liudmila Sergeevna Mainzer	Zeyneyp Madak-Erdogan Ruby Mendenhall Aiman Soliman Vlad Kindratenko
May 2019	Measuring Astrophysical Variability in DES and LSST	Eric Morganson	Samantha Thrush Athol Kemball
August 2019	PixSure Image Annotation System	Colleen Bushell	Peter Groves
August 2019	ICI Shared Monitoring and Metrics Infrastructure	J.D. Maloney	Corey Eichelberger Mark Fredrickson Paul Guder
October 2020	NCSA Working Group on Applied AI for Wildlife Conservation	Aiman Soliman	Brian Allen Nathan Robinson Steven Kessel
May 2021	Advancement development of NExt-generation sequencing Analysis Toolkit (NEAT), for standardized biomedical analyses	Joshua Allen Christina Fliege	
August 2021	Taming amphotericin B, the antifungal drug of last resort: making it safe and effective	Vlad Kindratenko	Taras Pogorelov