

# Chan Zuckerberg Initiative

## REQUEST FOR APPLICATIONS

### Collaborative Pairs Pilot Project Awards (Cycle 2)

The Chan Zuckerberg Initiative (CZI) invites applications for a new Request for Applications (RFA) for Cycle 2 of the Collaborative Pairs Pilot Project Awards program to support pairs of investigators and their teams to explore innovative, interdisciplinary approaches to address critical challenges in the fields of neurodegenerative disease and fundamental neuroscience. Awards are \$200,000 in total costs per collaborating pair for a period of 18 months, after which successful projects will be eligible to apply for additional four-year acceleration grants that build on pilot phase studies. Collaborative Pairs teams will benefit from the support, mentoring and collaborative interactions of the Challenge Network, as well as interactions with the broader CZ Science programs and grantee network.

## OPPORTUNITY

### Overview of the Challenge Network and Collaborative Pairs Pilot Awards program

The CZI [Neurodegeneration Challenge Network](#) (NDCN) was launched in 2018 as a new type of collaborative research network that brings together biologists, computational scientists, engineers, and physicians from across broad research areas who are motivated by collaboration and open science to tackle unsolved challenges in neurodegenerative disease. Collaboration has been at the core of the vision for the Challenge Network approach and in developing the NDCN program strategy, we have sought to develop funding mechanisms that motivate and support novel collaborative approaches that will lead to bold, innovative, risk-taking science.

The **Collaborative Pairs Pilot Project Awards** were developed as a funding mechanism to catalyze new collaborations and scientific partnerships and springboard early-stage projects that are bold, creative and “out-of-the-box.” We recognize that great collaborations can take many forms — from teams of two to large consortia and everything in between. The Collaborative Pairs mechanism focuses specifically on pairs of investigators. While scientific creativity is often represented as emanating from a singular lone genius, science works best when it is a collaborative effort, and it’s often creative duos and partnerships that fuel the engines of innovation.

In 2019, we launched the first cycle of Collaborative Pairs projects, funding [30 teams](#) to explore innovative approaches addressing cross-cutting questions related to neurodegenerative disease

biology. The application process was designed to encourage new teams and new ideas — no preliminary data, previous work together, or prior experience in neurodegeneration research was required to apply. We looked for talent, expertise, and great ideas. The first cohort of Collaborative Pairs working on 30 pilot projects included cell biologists, RNA biologists, neuroscientists, immunologists, cancer researchers, computer scientists, and even a plant biologist. Many of these investigators were new to neurodegeneration research. Sixteen of these projects have now moved forward to the second, four-year acceleration phase, where they are breaking new ground in unraveling the underlying mechanisms of neurodegenerative diseases. Learn more about the vision for the Collaborative Pairs Pilot Project Awards through this [Medium post](#) and more information about the teams who were funded through Cycle 1 on our [website](#).

Building on the [successes of the Challenge Network](#) and the first cycle of Collaborative Pairs, we are now pleased to invite applications for a new Request for Applications (RFA) that supports Cycle 2 of the Collaborative Pairs Pilot Project Awards. For this new cycle of the Collaborative Pairs, we are excited to broaden the scope of our network to also support investigations into areas of fundamental neuroscience beyond neurodegenerative disease, in particular in areas where there is potential for complementarity or synergy with our existing work in the Neurodegeneration Challenge Network and/or other [CZ Science program areas](#). This expanded RFA scope includes basic investigations into the cellular, molecular and circuit mechanisms of memory and cognition and the neuroscience of sleep.

We are excited about this next chapter for the Challenge Network and neuroscience at CZI. With the view that a better understanding of the fundamental mechanisms of brain function in the healthy brain will also be critical for contextualizing the types of processes that go awry in neurodegenerative disease, we believe that this expanded neuroscience scope will allow us to continue to bring together innovative, cutting-edge scientists from across a range of disciplines, to develop new ideas and approaches for tackling the many unsolved questions in neurodegenerative disease. And, likewise, we see tremendous opportunity for extending the Challenge Network approach and collaborative models to other areas of neuroscience.

### **The Collaborative Pairs Pilot Project Awards (Cycle 2):**

The Collaborative Pairs program will be a **two-phase process**:

**Phase 1** of the Collaborative Pairs grants RFA will provide **seed funds for new interdisciplinary collaborations involving a pair of investigators and their labs to pursue a pilot project towards addressing a critical gap in the field** (see section on scope below). Each pair is required to include **at least one early or mid-career researcher** (less than 10 years in an independent academic PI role). **Collaborative Pairs projects will be funded for 18 months (\$200,00 total costs/collaboration) for a pilot phase where teams will generate tools and data and further develop their project proposal and team, with the main goal being the development of a project plan for Phase 2.** Funded teams will benefit from the support, mentoring and collaborative interactions of the Challenge Network, as well as interactions with the broader CZ Science programs and grantee network.

The purpose of the phase 1 Pilot Project Award is to give the collaborating teams the freedom to explore new, out-of-the-box, potentially transformative ideas. We are looking for **teams and proposals that are addressing a critical problem and doing so in a bold, innovative way.**

In **Phase 2**, Collaborative Pairs teams that received pilot project funding and have successfully progressed their project will be eligible to apply for an acceleration grant award of **\$400,000 total costs/year/pair for four years (\$1.6 million total)** to build on the work done in the pilot phase, for a **total of \$1.8 million over five-and-a-half years for the entirety of the project (Phase 1 and Phase 2).**

### **Scientific Scope**

The Collaborative Pairs Pilot Project Awards RFA is focused on foundational and mechanistic basic science investigations. Building on and expanding from the successful foundations of the Neurodegeneration Challenge Network, applications may address fundamental questions related to the cellular, molecular or circuit mechanisms of neurodegenerative disease or areas of fundamental neuroscience beyond neurodegenerative disease. This expanded RFA scope includes basic investigations into the cellular, molecular and circuit mechanisms of memory and cognition and the neuroscience of sleep. We particularly encourage proposals where there is potential for complementarity or synergy with our existing work in the Neurodegeneration Challenge Network and/or other CZI program areas.

This is explicitly not a translational or clinical development RFA. Nonetheless, successful projects should be grounded in human biology, disease pathology, or fundamental principles of nervous system function such that the outputs of these efforts will ultimately provide new avenues and rigorous foundations for future translational and clinical development work.

We encourage applications both from investigators who are tackling underexplored topics, as well as those addressing more well-developed areas of science where there remain significant gaps in understanding. Pairings should take an innovative, interdisciplinary approach to address these knowledge gaps in ways that leverage each researcher's unique, complementary area of expertise. For example, we're looking for collaborative research projects that bring together experimentalists with computational biologists or technology developers, or collaborations that bridge multiple disciplines like immunology, cell biology, neurophysiology, genetics, biochemistry, stem cell biology, and bioengineering.

Examples of potential areas that would be **within scope for this program** include, but are not limited to:

- Testing causal hypotheses for the role of circuit, cellular and molecular mechanisms in neurodegenerative disease pathogenesis across the lifespan.
- Defining the contribution of non-neuronal influences on neurodegeneration or healthy brain function, including potential contributions of the innate and adaptive immune systems, brain vasculature, and the gut and microbiome to nervous system function.

- Cellular- and systems-level approaches to studying neural plasticity, aging, and resilience in the context of neurodegenerative disease or healthy aging.
- Investigating the causal contribution of well-defined cell types or circuits in cognitive processes or sleep-wake cycles.
- Investigating interactions between central nervous system (CNS) sleep circuitry and fundamental cellular processes in peripheral organs and tissues of the body.
- Partnerships between computational and experimental biologists that advance the development and validation of data analysis and data integration approaches, including but not limited to machine learning and artificial intelligence applications.

Examples of potential areas that would be **out of scope for this program** include:

- Clinical research investigations involving human research participants and patients, including human neuroimaging studies.
- Translational therapeutic or drug development research programs.
- Fundamental investigations in nervous system disease or injury contexts outside of neurodegeneration, such as neurodevelopmental diseases or psychiatric disease.

### **Building Tools to Support the Neurodegeneration Research Community**

As part of the collective work of the Challenge Network, CZI asks investigators to contribute to the development, validation, and dissemination of robust, reliable, and scalable experimental and analytical tools for the broader research community. We particularly encourage applications that seek to develop, validate and disseminate new technologies and methodological approaches and of pairings of experimentalists and technology developers.

Examples of the types of tools and resources that Challenge Network grantees have contributed towards include:

- Well-validated and reliable platforms for human cell biology, which might be based on tissue samples, iPSCs, organoids, or other advanced tissue biology systems.
- Scalable tools for cellular analysis, including genomic, proteomic, and imaging methods optimized for human cells and relevance to neurodegeneration (for instance, targeted probes and label-free methods for cellular imaging of neurons and non-neuronal cells; robust affinity reagents for proteomics; genome editing and single-cell genomic approaches).
- New tools to improve the specificity, resolution, and scale of cell-type and circuit targeting for phenotyping, monitoring, or manipulation.
- Well-validated, robust, shared animal models that more accurately model human disease biology.
- Unique human tissue resources and associated protocols for their handling and best use.
- Rigorous benchmark datasets for the field, for instance, well-validated longitudinal studies of disease progression that will inform more mechanistic approaches.
- Development and application of computational and machine learning approaches and tools to address neurodegeneration biology, which might include genomics, proteomics,

metabolomics, systems biology, imaging, and/or integration of data across experimental models and scales.

### **Diversity, Equity, & Inclusion**

- We [believe](#) that the strongest teams incorporate a wide range of voices. Those underrepresented in science and technology are strongly encouraged to apply. This includes but is not limited to women, those with disabilities, underrepresented racial and ethnic groups, LGBTQIA+ individuals, and organizations representing disease areas that disproportionately impact underrepresented or underserved communities.
- Researchers from populations that have historically been underrepresented in biomedical research are strongly encouraged to apply. International collaborations between investigators that leverage regional and technological expertise and strengths are encouraged. It is the expectation that international collaborations will follow [guidelines](#) for conducting research in an equitable and mutually beneficial manner.

### **Collaboration and Open Science**

The CZI Neurodegeneration Challenge Network is an approach to address the scientific challenges of neurodegenerative diseases and an experiment in collaborative science. As part of the selection process, we will look for investigators and groups who will enthusiastically contribute to and benefit from a highly collaborative, dynamic, and interdisciplinary approach. For examples of evidence of productivity, reach, and collaboration, please see the [CZI statement of values](#).

- Investigators in the Challenge Network will have the opportunity to **learn from, collaborate with, and interact with the community of investigators and groups within the Network**, as well as with Chan Zuckerberg Initiative scientists and software engineers. Investigators and members of their labs will participate in regular investigator meetings, meetings for students, postdocs, and staff, as well as mentorship and training opportunities.
- **CZI's mission is at the interface of technology and science.** Working in collaboration with, and guided by, Challenge Network investigators, we aim to develop technology-based tools and approaches to support and accelerate the broader field of neurodegeneration.
- **Clinical partners in these collaborative projects will play important roles as mentors** to help the collective work of the Challenge Network stay closely aligned to the clinical contexts of these disorders and to the needs of patients.
- **CZI supports open science values and principles.** To accelerate scientific discovery, collaboration, and rapid dissemination, CZI supports a consent, sharing, and publication policy for open and rapid dissemination of research results and a policy for software development that maximizes accessibility, reuse, and shared development.

### **Criteria we will be looking for in the Collaborative Pair Pilot Phase applications include:**

- **New collaborations:** To be eligible, **proposed pairs cannot have received prior joint grant funding.** Applicants will be asked to describe the nature of their collaboration and what unique perspective this pairing brings to the proposal.

- **Multi-institutional pairings:** While collaborations within a single institute are eligible to apply, we are especially encouraging of **new collaborations that bridge two distinct institutions**. International collaborations are welcome and encouraged.
- **Strong partnerships that leverage complementary strengths:** We will be looking for collaborations that bring together complementary, balanced skill sets and approaches. We strongly encourage applications from collaborations involving clinicians and physician-scientists, as well as pairs that bring together researchers from different fields, for instance: connecting experimental biologists and computational biologists; pairing technology developers with applied experimentalists; or bridging between multiple disciplines like immunology, cell biology, neuroscience, biochemistry, stem cell biology, and bioengineering.
- **Bold, innovative, high-impact proposals:** We are seeking proposals that address important, not incremental, problems in a creative way. This mechanism is an **opportunity to take well-calculated strategic risks**. We expect that some collaborations will succeed, even if the pilot phase experiments fail and are encouraging of this kind of risk-taking science.
- **Early- or mid-career investigators:** Each pair must include at least one early- or mid-career researcher, someone who has been in an independent academic role for less than 10 years (see eligibility criteria for details).
- **New investigators to the field:** The scope of this RFA includes broader areas of neuroscience. **We continue to encourage applications with proposals that address fundamental challenges related to neurodegenerative diseases but applications are not required to focus on disease or neurodegeneration**. There is no requirement to have worked in neurodegeneration research before and we encourage cross-over work from diverse disciplines.
- **Diversity:** We aspire to create a diverse community in the Challenge Network and **strongly encourage applications from women, those underrepresented or marginalized in science, and diverse groups worldwide**. See application instructions and eligibility criteria for specific details on eligibility.
- The final determination of awards and numbers will depend on the quality of the applications received at CZI's sole discretion.

## ELIGIBILITY

All applications must be submitted by a primary applicant principal investigator (PI) on behalf of the pair. For questions about eligibility, please contact us in advance of the proposal deadline at [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com).

- Applications may be submitted by domestic and foreign non-profit organizations; public and private institutions, such as colleges, universities, hospitals, laboratories, units of state and local governments; and eligible agencies of the federal government. For-profit organizations are not eligible. All grants will be awarded to institutions, not individuals.
- Collaborations should include two principal investigators (PIs). There will be

opportunities to work across collaborative projects, but each collaboration will be limited to two PIs.

- **All applicants must hold a PhD, MD, or equivalent degree** and have an academic faculty position or equivalent independent investigator status at a college, university, medical school or other research facility.
- Independence is typically demonstrated by a full-time academic faculty appointment, a tenure-track position, allocated space, a start-up package, and institutional commitment as defined or verified in a letter from a department chair or equivalent. Independence may be defined differently in different types of organizations. Note: an upload of the letter or proof of independence is not required at the time of application.
- **The Collaborative Pairs RFA is aimed at motivating new collaborations among partners who have not yet had the opportunity to work together.** While it is permissible for applicants to have previously worked together, the pair cannot have received joint funding for either this or any other project.
- While collaborations among two principal investigators from the same institution are eligible, we **strongly encourage applications from pairs affiliated with different institutions** (including any potential international collaborations).
- Collaborations among pairs of investigators with prior mentor/mentee relationships at the graduate, post-doc, or junior faculty levels are strongly discouraged from applying. Examples may include pairings between a PI and their former graduate student or post-doc, or pairings between junior faculty and senior colleagues in the same department.
- At least one of the applicants must be an early-career investigator or a mid-career investigator in an independent academic faculty position or equivalent.
  - In the context of this RFA, we are defining early-career investigators as individuals who have been in their independent academic faculty role for zero to six years at the time of the Letter of Intent due date, i.e. have started their first independent position between June 22, 2017 and June 22, 2023.
  - A mid-career investigator is defined as in their faculty role for more than six years but not more than 10 years at the time of the Letter of Intent due date, i.e. have started a first independent position between June 22, 2013 and June 21, 2017.
  - CZI will make exceptions to these criteria in cases of institutionally approved career breaks, e.g. family or medical leave, etc. (If you believe this applies to you, please contact [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com)).
- Current NDCN Ben Barres Early Career Acceleration Award grantees and NDCN Collaborative Science grantees **are eligible to apply**.
- The following groups **are not eligible** to apply to this Collaborative Pairs RFA:
  - Investigators invited to submit full applications for the Ben Barres Early Career Acceleration Award (Cycle 2) RFA
  - Current NDCN Collaborative Pairs Phase 2 Investigators
  - Current Patient-Partnered Collaborations for Rare Neurodegenerative Disease Investigators

- The two PIs in the pair will **complete the online application together in the [application portal](#)**, but one PI should be designated as the Primary Applicant who will be responsible for submitting the application in the application portal. Funds will be awarded directly to each PI's institution, if selected for funding.
- Applications are strongly encouraged from investigators new to the field of neurodegeneration, and, in particular, applications from researchers with relevant interdisciplinary training and experience in disciplines outside of neurodegeneration who bring new technology, resources, or frameworks to the field.
- There may be more than one application from a given institution.
- Each eligible investigator may only apply to one or be part of one Collaborative Pairs application.
- We [believe](#) that the strongest teams incorporate a wide range of voices. Applications are strongly encouraged from women and those underrepresented or marginalized in science.
- Meta employees, including employees of any subsidiary Meta entities, as well as employees of Chan Zuckerberg Initiative, LLC, are not permitted to apply.
- CZI reserves the sole right to decide if an applicant and applicant organization meet the eligibility requirements.
- CZI reserves the right to request budget changes prior to award.
- Prior to award, all grant applications will be reviewed for compliance with the United States Treasury Department's Office of Foreign Asset Control (OFAC) sanctions program, the United States Department of Commerce's export administration regulations, the Foreign Corrupt Practices Act (FCPA), any other applicable U.S. laws and regulations, and any corresponding laws and regulations in the country where the applicant is based. All grant agreements will require the grantee to comply with these laws and regulations. For additional information, please refer to: the [U.S. Treasury Department's resources](#), the International Trade Administration's [website on US Export Controls](#), and the Department of Justice's [website on the FCPA](#).
- While applicants from all countries are welcome to apply, because of required ongoing compliance with U.S. sanctions and export controls, an applicant's funding eligibility may need to be reassessed if the applicable laws and regulations change at any time. As a result, even if an applicant is eligible to receive funding at the time the application is reviewed, the applicant's status may change later in the process or during the course of the grant term.

CZI suggests that you consult your home institution to determine eligibility to apply for this grant and your institutional policy on indirect costs. For questions about eligibility for this award or the application process, please contact us in advance of the proposal deadline at [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com). Deadline extensions will not be granted.

## APPLICATION REQUIREMENTS



The application for this Collaborative Pairs Pilot Project Awards RFA is a two-step process, initiated with a Letter of Intent (LOI). Letters of Intent will be evaluated, and finalists proceeding to the next stage of review will be notified by early August.

- **Key Dates:**

May 9, 2023	Letter of Intent (LOI) application portal opens
June 22, 2023	LOIs due by 5 P.M. (Pacific Time)
August 3, 2023	LOI decisions announced Full application portal opens
September 14, 2023	Applications due by 5 P.M. (Pacific Time)
January 2024	Earliest notification of decisions (subject to change)
March 1, 2024	Expected start date of award period (subject to change)

- **Application specifics:**

- **Award Period:** The award period is 18 months in duration with an expected project start date of March 1, 2024.
  - **Budget:** \$200,000 total costs, inclusive of indirect costs (\$100,000 total costs per collaborative pair investigator over 18 months, unless otherwise stated).
  - **Number of Principal Investigators/labs:** Two.
- One application should be submitted per collaborative pair. However, funds will be awarded directly to each PI's institution if selected for funding.
  - Institutional sign-off by the institutions of both PIs in the collaborative pair is required at the time of the LOI submission.
  - All applications must be completed and submitted through the Chan Zuckerberg Initiative's online [grants management portal](#). It is recommended that applicants familiarize themselves with this portal well in advance of any deadlines.

## SELECTION PROCESS

CZI will evaluate all applications for scientific merit and will seek independent expert review of applications. Final decisions will be made by CZI staff in consultation with our scientific advisors. CZI does not provide feedback on decisions for unfunded proposals.

The selection of awardees will be based on:

- The scientific quality, creativity, and rigor of the proposed work. **We are looking for innovative, bold, potentially transformative proposals;**
- Demonstration that the proposal addresses a critical question or bottleneck for neurodegenerative disease or fundamental neuroscience associated with sleep or memory and cognition biology;
- The quality of the scientific team and the degree to which this collaboration leverages complementary strengths;

- The potential of the work to open up new research directions and/or bring new approaches to critical problems in neurodegeneration research or fundamental neuroscience related to sleep, or memory and cognition;
- The potential of the Collaborative Pairs and their teams to contribute to the collaborative, open science goals of the Neurodegeneration Challenge Network.

## POLICIES

- Funds from this award are intended to support research activities. Grants are made to institutions on behalf of the named award recipients, and reasonable flexibility on how these funds are utilized is allowed, provided that the funds are used to support research activities related to the project. **A categorical budget for the 18-month grant period is required as part of the grant proposal at the time of the full application stage.** Funded investigators will be asked to provide summary budgets during annual reporting.
- Specific deliverable requirements and due dates will be outlined in the award notification. Grantees of funded projects will be required to participate in regular meetings, including annual scientist meetings (which may be in person or virtual). Travel support for these meetings will be provided by CZI separately from the requested grant funds.
- Grantees may obtain funds for their research from other funding sources, provided that there is no conflict with meeting the terms of the CZI award.
- Unused research funds may be carried over to the following year, and requests for no-cost extensions will be considered at the end of the overall project period and upon receipt of an annual report.
- Indirect costs cannot exceed 15 percent of direct costs. Indirect costs may not be assessed on capital equipment or subcontracts, but subcontractors may include up to 15 percent indirect costs of their direct costs.
- International grantees must use all grant funds exclusively for activities conducted outside the United States of America. Travel expenses to the United States must not be covered from the requested grant funds.
- **Ethical conduct:** CZI advocates the highest standards for the ethical conduct of research. In addition to requirements of their own countries, grantees must adopt procedures for the use of animals in research and for the ethical treatment of human subjects and tissue donors, including obtaining their or their appropriate proxy's written informed consent. CZI regards the policies of the National Institutes of Health as a strong model for such procedures.
- **Data, publication, and dissemination policies:** To accelerate scientific discovery and collaboration, CZI supports a consent, sharing, and publication policy for open and rapid dissemination of research results, including methods, data and reagents, and a policy for software development that maximizes accessibility, reuse, and shared development. Under rare circumstances, exceptions to the above may be considered where there are specific situations that make meeting these goals impossible or counterproductive to the project.
  - **Software code:** CZI requires sharing of software code developed by its grantees generally to be made publicly available on GitHub (or a similar public service). All new code must be released under a permissive open source license (MIT, BSD 2-Clause, BSD 3-Clause, or Apache v2.0). All pre-existing and derivative code must

be licensed under the most permissive license possible, given the licensing terms of the pre-existing code. All analysis packages must be released through the appropriate language-specific package manager (e.g., PyPi for Python, Bioconductor and CRAN for R) with documentation, example data, and interactive demos (e.g., Jupyter notebooks), and the use of Docker or similar container technologies to ensure portability and reproducibility. Software code supported by CZI must be archived for [long-term digital preservation](#) and [citability](#), when applicable.

- **Content and data sharing:** CZI is committed to developing and using platforms that disseminate data openly and freely. Any datasets either curated or generated through the proposal must be made as publicly available and easily accessible through an appropriate [data repository](#) as legally permissible, when applicable, under an [Open Definition conformant license](#). Ideally data sets would not include personally identifiable information, but if they do, consent to sharing the data must be obtained. Metadata, documentation, and intended use cases, as appropriate, must be made available under an Open Definition conformant license, preferably CC0 or CC BY/CC BY SA for content that requires explicit attribution.
- **Publications:** To encourage rapid dissemination of results, any publications related to this funded work must be submitted to a preprint server (such as bioRxiv, medRxiv, arXiv, or any appropriate preprint repository), at or before the first submission to a journal. Experimental protocols should be made publicly available through a protocol sharing service, such as protocols.io. CZI requests that scientific publications, preprints, and presentations that result from this award acknowledge support from this funding.
- **Reagent sharing:** Resources and reagents developed with this funding support must be available for rapid dissemination to the community, where possible in an accessible community repository, such as Addgene (for plasmids/DNA reagents/viruses) and Jackson Labs (for model systems lines), etc. This requirement applies to cell lines, transgenic organisms, plasmids/clones, antibodies, and other reagents.
- **Consent:** All human tissues must be adequately and fully consented to permit full sharing of the resulting data and any resulting tools, in accordance with laws and regulatory requirements, or other requirements. Any desired exceptions to this policy must be identified at the time of application, and such requests may affect the application's chance of success. We are aware that there may be circumstances where broad consent may be challenging, and in some cases consent may be subject to revocation; we encourage investigators to discuss these cases with CZI scientific staff. As a reference, the Human Cell Atlas (HCA) community has developed [ethics guidelines and a tool kit](#) with template consent forms.
- **Intellectual property rights:** CZI does not require assignment of ownership to any data, published results, or any other intellectual property that results from the work funded by these grants but will have the same rights generally granted to others. CZI supports and promotes policies that enable results and technologies to have the broadest reach and impact. To this end, all newly developed software must be made available through permissive open source licenses as described more fully above.

Other technology and intellectual property rights (such as patents) must be made freely available for all academic and non-commercial use, and where intellectual property rights are commercialized, they must generally be subject to non-exclusive commercial licenses that enable broad availability and dissemination.

- Applications selected through this process will either be funded by the Chan Zuckerberg Initiative Foundation (CZIF) or recommended for funding through the Chan Zuckerberg Initiative Donor-Advised Fund (CZI DAF) at the Silicon Valley Community Foundation (SVCF)

## **CONFIDENTIALITY**

All submitted applications will be kept confidential, except (1) as necessary for our evaluation or to comply with any applicable laws; and (2) to the extent that the application is made public or available to others without a duty of confidentiality through no fault of CZI. Notwithstanding, successfully funded proposals may be made publicly available and/or shared with other grantees or collaborators. Unfunded proposals will remain confidential as provided herein; however, information, including brief summaries of the proposed projects, project metrics, and the types of organizations that have applied for funding, may be made publicly available in aggregate form. Application materials will not be returned to applicants.

## **RFA CONTACT**

For administrative and programmatic inquiries, or other questions pertaining to this RFA, please contact [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com).

## **IMPORTANT DOCUMENTS**

[Application Instructions](#)

[Institutional Approval Form](#)

# Chan Zuckerberg Initiative

## APPLICATION INSTRUCTIONS

### Neurodegeneration Challenge Network Collaborative Pairs Pilot Project Awards (Cycle 2)

#### Some helpful information as you get started:

- This document contains:
  - [General guidance on using the portal](#)
  - [How to submit an application](#)
  - [Application details specific to this Collaborative Pairs RFA](#)
- Please review the Request for Applications.
- The Chan Zuckerberg Initiative uses SurveyMonkey Apply (SMAppl) as its grants management portal. All applications must be submitted through this portal (<https://apply.chanzuckerberg.com>). SMAppl is configured to work best using the Google Chrome browser. It is recommended that you familiarize yourself with this portal well in advance of any deadlines. Deadline extensions will not be granted.
- **Key Dates:**

May 9, 2023	Application portal opens
June 22, 2023	LOIs due by 5 P.M. (Pacific Time)
August 3, 2023	LOI decisions announced
	Full application portal opens
September 14, 2023	Applications due by 5 P.M. (Pacific Time)
January 2024	Earliest notification of decisions (subject to change)
March 1, 2024	Expected start date of award period (subject to change)
- **Application specifics:**
  - **Eligibility:** Please refer to the [RFA announcement](#).
  - **Award Period:** The award period is 18 months in duration with an expected project start date of March 1, 2024.

- **Budget:** \$200,000 total costs, inclusive of indirect costs (\$100,000 total costs per collaborative pair investigator over 18 months, unless otherwise stated).
  - **Number of Principal Investigators/labs:** Two.
- One application should be submitted per collaborative pair. However, funds will be awarded directly to each PI's institution if selected for funding.
  - Institutional sign-off by the institutions of both PIs in the pair is required at the time of the LOI submission.
  - The application must be prepared in the grants portal by both principal investigators together in the collaborative pair, so please **designate one principal investigator (PI) as the primary applicant (“owner” in the portal), who should then invite the other PI to be a “collaborator” in the portal** (see [instructions for inviting application collaborators](#)). The primary applicant is the PI in the pair who creates the application, invites the collaborating PI to be a “collaborator” on the application, and is responsible for submitting the application on behalf of the pair. It is expected that each PI will independently complete their designated Applicant Details, Equal Opportunity & Diversity, Organization Details, and Budget tasks within the portal and then collaborate to jointly complete the remaining tasks in the portal. **Once all tasks are complete, the primary applicant PI will need to click submit on behalf of the pair.**

## GETTING STARTED

**Account setup:** The primary applicant PI must first set up an account in the CZI online grants portal at <https://apply.chanzuckerberg.com/>.

To set up an account:

1. Go to <https://apply.chanzuckerberg.com/>.
2. Click the green Register button in the upper right corner.
3. Complete the requested fields and then click the green Create Account button.
4. Click the green Continue button to proceed to the site.

Please note you will need to verify your account through the auto-email that you receive after registering. You will not be able to submit an application until your account is verified.

**Personal data:** Where we ask for personal data of individuals in grant applications, please only submit personal data that you have a right to provide. We will use and store any personal data collected through the application process for grant-related purposes (e.g., administering the grant, analyzing and improving our grant practices). The Chan Zuckerberg Initiative Foundation and Chan Zuckerberg Initiative, LLC (collectively "CZI") will be the “data controllers” for any such personal information, and the data may be stored on servers outside of your home country, including within the United States. If you have any questions or concerns regarding our privacy practices or collection or use of personal data, you can contact us at [privacy@chanzuckerberg.com](mailto:privacy@chanzuckerberg.com).

**Navigating the portal:** Once you have set up an account, you can log in to the grants portal at <https://apply.chanzuckerberg.com/>. Using the links in the upper right corner, you can access available programs (which includes RFAs for all CZI areas, not just science) and any applications you have in preparation or previously submitted. Use the information (“i”) link to get help with the portal. To access your account information, click on your name in the upper right. Your application will pre-populate with the name and email listed in your account information so if you need to edit it, click on your name in the upper right corner to make any necessary changes.

**Forgotten username or password:** Please note that your username is your email address. If you have forgotten your password, please navigate to the grants portal at <https://apply.chanzuckerberg.com/> and click on the Log In button. Click the Forgot your password link and then enter the email address associated with your SMAApply account. You will then receive an email with information to reset your password.

**Other questions:** If you have other questions about using the portal, please use the information (“i”) link in the upper right corner of the window. Here you will find a link to FAQs about using the portal, as well as links to submit specific help requests. If you have specific questions about the RFA, please contact us at [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com).

## SUBMITTING AN APPLICATION

The application requires each of the collaborating principal investigators (PIs) to both complete their respective applicant details, organization details, and budget sections within the application portal. One PI should start the application in the portal (instructions below) and the second PI should be invited as a “collaborator” (instructions below). **Note: the applicant designated as the primary applicant (and the “owner” of the application in the portal) will be the only one who is able to submit the application on behalf of the collaborative pair.**

### Inviting application collaborators:

Once an application has been created, complete the following steps to add your collaborating PI:

1. Click the **Add Collaborator** button on the left side of the page on the initial application screen to invite your collaborating investigator, OR from within an application task marked as “Collaborator only task” click the **Add Collaborator** button.
  - a. Enter the email address of your collaborating PI in the first line.
  - b. By default the type of access should be set to “View & edit.” Do not change this option.
  - c. Add an optional message notifying your collaborating PI that they are invited to edit your application and should complete their portion.
  - d. Click the green Send Invite button in the bottom right corner.
  - e. To remove, resend invite, or change access, select the three dots next to the email address of the invited collaborator. Once a collaborator has registered and accepted, there is an option to change the primary applicant by selecting “Make Owner.”

### Submitting an application:

1. Go to <https://apply.chanzuckerberg.com>.
2. Log in.
3. Click the green View Programs button that is displayed or click on the Programs link in the upper right corner. This will bring you to a listing of all programs/RFAs that CZI is hosting in SMAApply. To **find the program/RFA** you are looking for, you may need to scroll down.
4. Find the program/RFA you are interested in and click the green More button.
5. Click the green Apply button in the upper right and complete all sections (details below).
  - a. You will first be prompted to **enter the title** of your application, after which you will have access to the application tasks to complete. Project title is limited to 60 characters, including spaces. If you need to **edit your project title**, click on the My Applications link in upper right and click the green Continue button on the application you wish to edit. Once the application page opens, click on the three dots to the right of the application title (next to the Preview link) and select Rename from the dropdown menu.
  - b. The application is made up of several sections called tasks that are listed in a menu on the left side of the page. To **open a task**, click on the one you would like to work on. You can edit and complete tasks in any order. You may need to scroll down to see the remaining tasks.
  - c. Once you **complete a task**, click the green Mark as Complete button within the task. All tasks must be marked as complete before submitting. To **edit a task** after marking it as complete, click the three dots in the upper right of the task and select edit, which will re-open the task.
  - d. Your application will autosave every few seconds, but you can also click the Save & Continue Editing on each task as you go along to **save your application**.
  - e. In the tasks that require a PDF upload: if you need to **delete and replace a PDF** after you have uploaded it, click on the three dots to the right of the file under the Attach File section within the task and select Remove from the dropdown menu.
  - f. To **download your application**, click on the three dots in the upper right corner of the application page and select download. If you are within a task, first click on the Back to application link in the upper left. Please **be aware of any pop-up blockers** in your browser that may prevent downloading your application.
  - g. To **access an application that you have previously saved**, click on the My Applications link in upper right and click the green Continue button on the application you wish to edit.
6. Once all tasks are completed, click the green Submit button to **submit your application**.
  - a. If the button is grayed out, it means your application is not yet complete; please be sure all required fields and uploads are complete within each task and that you have clicked the Mark as Complete button within each task.
  - b. To **download your application**, click on the download link in the upper right corner. Please be mindful of **any pop-up blockers** that may be active in your browser that prevent/hide downloads.
  - c. Review your application in the window (or in the PDF that you have downloaded). If you want to make changes, navigate back to your application and reopen/edit any



tasks that need editing. **It is strongly recommended that you download your application as a PDF (instructions above in b.) to review your application before clicking submit.**

- d. Once you are **ready to submit**, click the green Submit Your Application button on the left side of the window. You will need to confirm your submission by clicking the green Submit button in the pop up window. **Once your application has been submitted, it cannot be edited. Please be sure that your application is complete BEFORE submitting.** If you inadvertently submit your application and it is before the deadline, please contact [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com).
7. Once your application is submitted, you will **receive an auto-email** confirming submission within a few minutes. If you do not receive a confirmation email within a few minutes, please check your spam folder. If you still did not receive your confirmation email, please email [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com).
8. If you would like to view your application after you have submitted it, click the My Applications link in the upper right corner.
9. Complete the sections below and **submit by no later than 5 P.M (Pacific Time) on the due date.**
10. Applications must be submitted by the primary applicant PI on behalf of the collaborative pair.

**The Letter of Intent (LOI) consists of the following sections (called tasks in the grants portal):** Applicant Details, Equal Opportunity & Diversity, Organization Details, Biosketches, Pilot Project Details, and Research Statement.

The PIs of the collaborative pair are both responsible for filling out all relevant application sections. Each PI should complete the following sections independently: Applicant Details, Equal Opportunity & Diversity, Organization Details. The Biosketches, Pilot Project Details, and Research Statement sections should be completed jointly by both PIs.

- **Principal Investigator 1 (PI #1):** The primary applicant is responsible for submitting the application on the team's behalf and completing their individual tasks in addition to the collaborative project details and proposal.
- **Principal Investigator 2 (PI #2):** The collaborating PI is responsible for completing their individual tasks in addition to the collaborative project details and proposal.
- **Applicant Details (PI #1 & PI #2):** Complete all fields in this task; all fields are required. The information entered should be for the primary applicant (Principal Investigator #1), who will be the person submitting the application on behalf of the pair. Information about the collaborating PI should be entered in the "Principal Investigator #2 (PI #2)" sections.
  - Name and email
    - PI #1:(auto-filled for primary applicant): To edit your name or email, please do so in your account information by clicking your name in the upper right corner and clicking My Account in the dropdown menu.
    - PI #2: Enter your First name, Last name, and Email.
  - Degree(s).

- Organization, Title/Position, Department or equivalent.
- Career status: Select early-career (0 to 6 years), mid-career (6+ to 10 years), or neither.
  - Early-Career Definition: In the context of this RFA, an early-career investigator is someone who has been in an independent position for zero to six years at the time of the Letter of Intent due date, i.e. has started their first independent position between June 22, 2017 and June 22, 2023.
  - Mid-Career Definition: In the context of this RFA, a mid-career investigator is someone who has been in an independent position for more than six but not more than 10 years at the time of the Letter of Intent due date, i.e. has started their first independent position between June 22, 2013 and June 21, 2017.
- ORCID iD: Enter in format XXXX-XXXX-XXXX-XXXX. ORCID iDs are unique, digital identifiers that distinguish individual scientists and unambiguously connect their contributions to science over time and across changes of name, location, and institutional affiliation. ORCID iDs will be used to streamline reporting in our applications and grant reports to reduce the burden on grantees. For more information, please visit <https://orcid.org/register>. (Please contact us at [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com) if you wish to opt out).
- **Equal Opportunity & Diversity (PI #1 & PI #2):** CZI Science supports the science and technology that will make it possible to cure, prevent, or manage all diseases by the end of this century. Different communities are affected by or experience disease in different ways. Moreover, due to systemic barriers, the scientific enterprise itself is not a place where all voices and talents thrive. We believe the strongest scientific teams — encompassing ourselves, our grantees, and our partners — incorporate a wide range of backgrounds, lived experiences, and perspectives that guide them to the most important unsolved problems. To enable our work, we incorporate diverse perspectives into our strategy and processes, and we also seek to empower community partners to engage in science.

We request demographic information associated with applications submitted to CZI in response to our open calls. This information helps us learn from the RFA process, as well as improve our strategies to help ensure members of underrepresented or marginalized groups in science are aware of and able to apply to CZI opportunities. **Please note that answering the questions below is voluntary and receiving funding is not contingent on providing this information. Demographic information provided may be used in our grant-making process, but will not be used as the sole or determinative factor in our grant funding decisions.** We may also publish aggregated data in various public forums, such as a website or blog. All responses will be shared only with limited personnel and service providers, who will use that information only for the purposes described in this paragraph.

If you have any additional questions about why we ask this, what we do with the data, or to share suggestions for improvement, please reach out to [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com).

The information may be entered for the primary applicant (Principal Investigator #1), who will be the person submitting the application on behalf of the pair. Information about the collaborating PI may be entered in the “Principal Investigator #2 (PI #2)” sections. The categories listed below may not capture all possible identities; in the event that the categories do not accurately reflect your identities, please use the space provided to self describe.

- What is your race/ethnicity? (optional)
  - What is the year of your last academic degree? (optional)
  - What is your gender? (optional)
  - Are you transgender? (optional)
  - Are you a member of the LGBTQIA+ community? (optional)
  - Do you have one or more disabilities? Please specify (optional)
- **Organization Details (PI #1 & PI #2):** Complete all fields in this task; all fields are required. The information entered should be for the organization of the applicable PI.
    - Organization name/Street address/City/State/Country/Website.
    - Type of Organization (Academic, Other Non-profit, Government, Other).
    - Tax ID: Enter your organization’s Employer Identification Number (EIN), as assigned by the Internal Revenue Service in the 9-digit format (XX-XXXXXXX; 10 characters total). Foreign organizations or others who do not have an EIN should enter 44-4444444.
    - Organizational/Administrative Contact: List the name and contact information for the administrative contact to discuss additional information needed, if selected for award.
      - First name, Last name, Title/Position, Email.
    - Signing Official: List the name and contact information for the person authorized to sign on behalf of your organization.
      - First name, Last name, Title/Position, Email.
    - Press Contact / Public Relations Official: List the name and contact information for the person to discuss press releases and media.
      - First name, Last name, Title/Position, Email.
    - Institutional Approval Form: Upload as a single PDF. This [form](#) should be reviewed and signed by a person authorized to sign on behalf of your organization agreeing to the stated institutional and investigator requirements and commitments on data, resource sharing, and publication policies, as well as endorsing/verifying your application materials and confirming their ability to receive funding for the proposal. In the event of an award, funds will be awarded to the institutions of each PI in the pair as the prime institution, and those institutions will be responsible for ensuring compliance of all of the terms, including compliance of all partners/subcontract institutions. **These policies are non-negotiable so this form should only be signed if the organization is able to comply with the terms as stated.** While CZI does not require sign-off by all of your partner institutions, please refer to what your institution requires. **Note: digital signatures are permitted as long as the document is not encrypted or password-protected.**

- **Biosketches (PI #1, PI #2):** Upload the biosketches in PDF format for each PI in the Collaborative Pair. Biosketches can be uploaded in a combined PDF or one PDF for each PI; maximum of five pages per biosketch; [NIH](#) format or similar.
  
- **Pilot Project Details:** Complete all fields in this task; all fields are required.
  - **Project Title:** (maximum of 60 characters, including spaces) If you need to edit your project title, navigate to your application summary page, click on the three dots to the right of the application title (next to the Preview link) and select Rename from the dropdown menu.
  - **Project Purpose:** (maximum of 200 characters, including spaces) Summarize your research project; limited to one sentence. Please use a third-person voice.
    - *Example: To leverage a CRISPR-based functional genomics platform in human iPSC-derived neurons and glia to elucidate cell-type selective and non-cell autonomous mechanisms of neurodegeneration*
  - **Statement on Diversity and Equity:** (maximum of 250 words) Describe how your proposal and team seek to promote diversity and equity in this project. Examples can include your approach to diversity/equity on your team; diversity in the context of your scientific approach, for instance, engagement with diverse cohorts/populations; or a focus on diseases that are prevalent or overrepresented among populations living in high-potential countries that are historically under-resourced.
  
- **Research Statement:** Upload a narrative statement of your research project in a single PDF; font must be 11 point or larger, and margins must be at least one-half inch (top, bottom, left, and right) for all pages. Include the following sections:
  - **Statement Body** (maximum of 500 words) Address the following points:
    - Describe the question your proposed project is aiming to address and why this is an important gap in the field.
    - A high-level summary of your research plan for addressing the challenge/gap identified, highlighting in particular how your work stands out from other efforts in the field of neurodegeneration, sleep biology, and/or memory and cognition.
    - Highlight how the unique expertise of each PI in the pairing will enable progress toward addressing this scientific question through new collaborative efforts.
    - Highlight any innovative technologies and/or computational approaches your team will bring to the neurodegeneration, sleep biology, or memory and cognition research.
  - **References Cited** in your research project (optional, one page limit): Provide PubMed links or DOIs where applicable; preprints are acceptable and should include the link to the preprint.
  - **Explanatory Figure** (optional): An explanatory figure of your research project may be included with an accompanying figure legend. If you choose to include an explanatory figure, the figure and figure legend must fit on one page. Figure legends

do not count toward the word count.

**Applicants will be notified by email if they have been invited to submit a full application by August 3, 2023.**

To submit a Full Application (if invited):

1. Go to <https://apply.chanzuckerberg.com>.
2. Log in.
3. Click on the My Applications link in the upper right corner.
4. Click the green Start button on your application.
5. Complete the sections below and submit by September 14, 2023, 5 P.M. (Pacific Time).

**The Full Application will consist of the following additional sections (called tasks in the grants portal):** Biosketch, Project Details, Project Proposal, Budget Description.

The PIs of the collaborative pair are both responsible for filling out all relevant application sections. Each PI should complete the following sections independently: Biosketch and Budget Description. The Project Details and Project Proposal sections should be completed jointly by both PIs.

- **Principal Investigator 1 (PI #1):** The primary applicant is responsible for submitting the application on the team's behalf and completing their individual tasks in addition to the collaborative project details and proposal. **The primary applicant identified in the LOI should be the primary applicant for the full application.**
- **Principal Investigator 2 (PI #2):** The collaborating PI is responsible for completing their individual tasks in addition to the collaborative project details and proposal.
- **Biosketches (PI #1, PI #2):** Upload the biosketch for each PI of the collaborative pair in PDF format. Applicants may upload either the same biosketch provided for the LOI or an updated version. Biosketches can be uploaded in a combined PDF or separate PDFs for each PI. Maximum of five pages per biosketch; [NIH format](#) or similar.
- **Project Details:** Complete all fields in this task; all fields are required.
  - **Project Title:** (maximum of 60 characters, including spaces) Auto-filled from LOI information. **This is not an editable section.**
  - **Project Purpose:** (maximum of 200 characters including spaces) Auto-filled from LOI information. **This is not an editable section.**
  - **Abstract/Project Summary:** (maximum of 250 words) Describe your project. Please use a third-person voice.
- **Project Proposal:** Upload your project proposal as a single PDF; font must be 11 point or larger, and margins must be at least one-half inch (top, bottom, left, and right) for all pages. Include the following sections:
  - **Proposal Body:** (maximum of 1500 words) Summary of the project, which should include the following parts:

- **I. Scientific goals:** Define the scientific question or problem that the team aims to explore. Clarify the rationale for why it requires an interdisciplinary approach, why it has been historically difficult to address, and how the team is poised to clarify it.
    - **II. Deliverables and timeline:** In bulleted format describe the deliverables and timeline for deliverables.
    - **III. Research Outline:** Describe the research proposed in the Pilot phase.  
**Note: No preliminary data is required for the pilot phase.**
    - **IV. Transformative Research:** (maximum of 150 words) Describe how your research is transformative for neurodegenerative disease, sleep or memory and cognition research. How do you see this work as standing out from other efforts in the field?
    - **V. Risk:** (maximum of 250 words) A goal of this grant mechanism is to encourage the pursuit of bold, potentially high impact but high-risk science. What do you view as the riskiest parts of this project? Consider both conceptual and operational risks of the project. How are you planning to address these risks in your work?
    - **VI. Tools & Resources:** Provide a summary of the tools, technology, and other resources that your team may bring to the project, aims to develop as a part of the project, and/or hopes to gain from collaborations in the Challenge Network. This list should highlight resources you can share with other projects and those that you feel you would benefit from having access to.
  - **References Cited** in your proposal (no word/page limit).
  - **Figures** (optional): **There is no requirement for preliminary data.** This RFA is intended to stimulate new collaborations and scientific directions. If you would like to provide figures of any kind, limit to one page, inclusive of legends. Figure legends do not count toward the word count.
- **Budget Description (PI #1 & PI #2): (one page maximum per PI)** Upload a separate budget for each PI of the collaborative pair team in PDF format; font must be 11 point or larger and margins must be at least one-half inch (top, bottom, left, and right) for all pages (letter size required). Provide a high-level budget description in narrative or tabular form, outlining costs for personnel, supplies, equipment, travel, subcontracts, other and indirect costs.
    - The collaborative pair team will receive \$200K total costs for 18 months, wherein the assumption is that the budget will be distributed evenly between the PIs (i.e. each PI will receive \$100K total costs for 18 months). If the overall grant breakdown deviates from this assumption, please contact [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com) before submission.
    - Indirect costs are limited to up to 15 percent of direct costs. Indirect costs may not be assessed on capital equipment or subcontracts, but subcontractors may include up to 15% indirect costs of their direct costs.
    - Budget should be requested in U.S. dollars.

- International grantees must use all grant funds exclusively for activities conducted outside the United States of America. Travel expenses to the U.S. (including round-trip tickets) should not be covered from the requested grant funds. Any attendance at CZI meetings in the U.S. will be covered by CZI outside of requested grant funds.

The formatting and component requirements, including word and page limits indicated above, will be enforced by the review team. Any submitted materials that exceed the word and page limits or do not follow the requirements will not be considered during the application review process.

## **QUESTIONS?**

For administrative and programmatic inquiries pertaining to this RFA, please contact [sciencegrants@chanzuckerberg.com](mailto:sciencegrants@chanzuckerberg.com).

For technical assistance with SMaply, please contact [support@smapply.io](mailto:support@smapply.io) or while logged into SMaply, click on the information "i" link in the upper right corner and submit a help request ticket.