

# Caltech | Funding Memo

**Title:** W. M. Keck Foundation Research Program - Concept Papers - Limited Opportunity

**Funding Agency:** W. M. Keck Foundation

**Internal Deadline:** 05/05/2022 05:00 PM PDT

**External Deadline(s):**

06/30/2022 04:30 PM PDT (1-page Concept Paper)

11/01/2022 04:30 PM PDT (Phase I Proposal)

02/15/2023 04:30 PM PST (Phase II Full Proposal)

**Cognizant Office:** Office of Foundation Relations

**Description:**

The W. M. Keck Foundation strives to fund endeavors that are distinctive and novel in their approach. The Foundation invites eligible institutions to submit concept papers in the areas of medical research, and science & engineering. It encourages projects that are high risk with the potential for transformative impact. "High risk" comprises a number of factors, including questions that push the edge of the field, present unconventional approaches to intractable problems, or challenge the prevailing paradigm.

**This call for concept papers corresponds to the W.M. Keck Foundation's November 1, 2022 Phase I Application Deadline. After Caltech's internal selection (internal deadline: 5/5/2022), concept papers are submitted to the Foundation, and pre-application counseling takes place from July 1 - August 15. If selected through this pre-proposal process, phase I submissions will be due November 1.** Further details can be found under the 'external deadlines' section of this memo. Please contact the Office of Foundation Relations with any questions.

**Frequency:** Typically offered multiple times per year

**Total Award:** \$1,000,000

- Awards are typically approximately \$1,000,000. Somewhat larger budgets may be considered. Please reach out to the Office of Foundation Relations with any specific budgetary questions.

**Indirect Costs:** Not Allowed

- **Caltech's minimum overhead rate is based on the award's annual gross funding. Please refer to the [FY22 Annual Rate Memo](#) for applicable minimum overhead requirements. Applicants must work within their division to account for the required overhead via an approved MORA form, which will be required if the project is selected for phase 1.**

**Duration:** 3 years

- A 2 year project may be considered if outcomes are achievable in that time frame
- On occasion, longer time frames may also be acceptable if there is a valid reason for the particular project.

**Discipline(s):** Biology and Biological Engineering; Chemistry and Chemical Engineering; Engineering and Applied Science; Geological and Planetary Sciences; Humanities and Social Sciences; Physics, Mathematics, and Astronomy

**Eligibility:** Research Faculty, Tenure-Track Faculty, Tenured Faculty

- Research universities, medical colleges, and major private independent scientific and medical research institutes are eligible to apply to the Research Program.
  - Eligible institutions may submit one Phase I application per grant cycle.
- Caltech PIs who currently serve as Co-Is or Co-PIs on Keck Foundation-funded projects at other organizations may apply if the project is significantly different from that funded with collaborators elsewhere.
- Multi-investigator teams are eligible and preferred to single investigator submissions.
  - Teams may include extramural collaborators.
- Caltech researchers other than tenure-track faculty will need to obtain approval from their Division Chair and Vice Provost for Research prior to submitting an application.

**Research Areas of Interest:**

- Medical Research refers to those projects whose focus is on understanding and probing biological systems of relevance to human biology and/or human health. Projects that exploit biological systems as templates or tools or are primarily bioengineering-oriented may fall under the Science & Engineering category. Projects involving creation of medical devices, the operation of clinical trials, or that focus on drug development fall outside the scope of the Keck Foundation's interests.
  - Please see medical research abstracts from the previous 4 years (link below) for more details on what types of projects the foundation considers a fit in this category. Please contact the Office of Foundation Relations with any questions.
- Science & Engineering projects are those that focus primarily, but not exclusively, on physics, chemistry, and earth science. In some cases, projects involving biological systems or bioengineering may fall under this category, rather than Medical Research.
  - Please see Science & Engineering abstracts from the previous 4 years (link below) for more details on what types of projects the foundation considers a fit in this category. Please contact the Office of Foundation Relations with any questions.
- Projects should focus on important and emerging areas of research.
- Projects should have the potential to develop breakthrough technologies, instrumentation or methodologies.
- Projects should be innovative, distinctive and interdisciplinary.
- Projects should have the potential for transformative impact, such as the founding of a new field of research, the enabling of observations not previously possible, or the altered perception of a previously intractable problem.
  - The Foundation has often spoken of having the willingness to pursue what are ultimately "Noble Failures" – projects that are out-of-the-box and potentially paradigm-shifting that may fail, but nonetheless push the boundaries of a field.

- Proposals should demonstrate that private philanthropy generally, and the W. M. Keck Foundation in particular, is essential to the project's success.
  - Explanations for why the project is not suitable for federal agency funding is required. Please contact the Office of Foundation Relations with any questions.

### Research Exclusions:

- Funding will not support:
  - Clinical or translational research, treatment trials or research for the sole purpose of drug development;
  - Projects that are exclusively computational in nature;
  - Conference or seminar sponsorship;
  - Public policy research.

### Post-Award Obligations:

- Annual and final progress reports are required.

### Recent Caltech Recipients:

- Dimitri Mawet (Science & Engineering - June 2021)

### Guidelines & Other Information:

Overview: <http://www.wmkeck.org/grant-programs/grant-programs>

Eligibility and Priorities: <http://www.wmkeck.org/grant-programs/research>

Previous Recipients: <http://www.wmkeck.org/grant-programs/research/medical-research-grant-abstracts>

Below, in the Documents section of this memo, please find a spreadsheet "Keck Recent Recipients - Sortable", which reflects all winning projects from the past 4 years in both categories. It can be filtered and sorted to view abstracts, institutions, PI names, and dates of awards. Key words are highlighted.

FAQ: <http://www.wmkeck.org/grant-programs/faq>

### Documents:

[Keck Recent Recipients - Sortable](#)

[Concept Paper Template - Medical Research](#)

[Concept Paper Template - Science & Engineering](#)

### Pre-Proposal Requirements:

- This is a limited opportunity – **Caltech may nominate 1 (one) candidate for medical research and 1 (one) candidate for science & engineering.** Please send pre-proposals to the Office of the Provost at [provostoffice@caltech.edu](mailto:provostoffice@caltech.edu) by 5:00 pm **May 5, 2022.**
- See attached template (for either medical research or science & engineering) and the following instructions:
  - Please do not modify the section headings, font type or size, or margins of the pre-proposal template. The pre-proposal is limited to 1 page total.

- For the proposed project section, emphasize the following:
  - The research that will be conducted during the project period with Foundation funds.
  - The outputs/outcomes at the end of the project period.
  - Impact of those outcomes.
  - Pilot/preliminary studies that demonstrate the feasibility of the proposed project.
  - Innovation - outline the specific ways the proposed research is distinct from published work in the field.
- Justification for Keck support should be brief and should focus on why the project is not suited to receive federal support in its current stage. Recent declinations from federal agencies for the proposed project or a version thereof are not disqualifying, especially if the declinations emphasized that the project was at a too-early stage; broke with conventional paradigms; or, was too high-risk.
- The estimated budget should be broken down, if possible, by major areas, e.g., personnel, equipment, consumable supplies, etc. Budgets can be rough approximations at this stage, but please note the following: The Keck Foundation will not pay indirect costs, nor graduate student tuition, nor faculty salary for any individual faculty member that exceeds 10% of his/her annual salary.
- If possible, within the 1-page limit, authors may add other details (e.g., background to put the research into perspective, description of Caltech's and/or the division/department's prominence in the field).
- No figures.
- If a reference is necessary, abbreviate it as (Science, 323, 45, '11). DO NOT USE (Jones et al., 2011).
- Should this concept be selected for presentation to the Keck Foundation, there will be opportunities to make edits/modifications before it is shared with the Foundation.

Please notify the Foundation Relations team if you anticipate making a submission or if you have any questions regarding this opportunity. We are here to help ensure that Caltech's proposals are competitive. We can assist with proposal development and advise you on the routing of your paperwork. Interested researchers should work with their division grant manager to prepare the budget, the MORA form, and the Division Approval Form (DAF). Submissions and awards for this grant program will be processed through the Office of Foundation Relations.

Opportunity ID: 1079