



APPLICATION INSTRUCTIONS AND CHECKLIST FOR SCIENTIFIC RESEARCH APPLICATION

STUDY THE FOLLOWING DETAILS ON HOW TO PROCEED WITH YOUR SCIENTIFIC RESEARCH APPLICATION

1. Should there be any question of institutional or project eligibility for application for support, contact Dr. Moses Lee for advice at 360-694-8415.
2. All Scientific Research Applications will be submitted through the Submittable grants portal, and as of April 2018, all requests will begin with a Scientific Research Letter of Inquiry (SR LOI).
3. The Grants Administrator, the submitter, will register as a user in the Submittable grants portal.
4. Login to the Submittable grants portal to complete the SR LOI. As the Grants Administrator begins the application process, it is important to invite collaborators (see instructions in the SR LOI). Sections include:
 - a. Organization Name and Contact Information
 - b. Project Description (Project Title; For Equipment Requests, Number of Users; Anticipated Date of Application Submission; and Project Summary—Distill the essentials from the “Full Project Description,” Section E, so that the reader can get an overview of the project. The Project Summary should be able to stand on its own as the official description of your proposed project. You may expand on this statement as you think necessary. Be sure to state clearly the central theme and objectives of the project, the plan you are proposing to address them, and the scientific significance of the project. Use language comprehensible to the intelligent non-scientist.
 - c. Summary of Project Budget (Total Cost, Amount Requested; Describe how the Trust funds will be used including the cost share; and Anything else we should know?)
5. If your LOI is approved, you will be invited to complete and submit a full application.
6. Login to the Submittable grants portal. Click on your Scientific Research Application. As you begin, it is important to invite collaborators, those who will assist in completing the application. Sections include:
 - a. Project Title
 - b. Project Timetables (Project timetable; Fundraising Timetable
 - c. Budget Summary (Amount Requested, Outside Funding in Hand, Funding Committed from Institution, Balance from Other Sources)
7. Download the SR Proposal Narrative (Departmental Information - Section A) form, under Project Documents. All information should be completed as requested in the space provided.
8. Continue the research proposal by adding pages behind the Departmental Information page. Up to 18 pages may be added, numbering them starting with page 2 and continuing to a maximum of page 19. Sections B-H should be completed on these added pages. Information to guide you in addressing these sections is found in this document under Instructions for Completing the Scientific Research Application and under the Continuing Format for Completing the Scientific Research Application.
9. Upload the completed Scientific Research Application as a PDF file, under Project Documents using the Proposal Narrative “Choose File”.
10. Download and complete the Suggested Reviewers List form, under Project Documents.
11. Upload all other supporting documents in the Projects Document section (Letter of endorsement from CEO; Letter of endorsement from the VP of Research; Suggest Reviewers List; Relevant Research Papers).
12. Complete and Submit your Scientific Research Application request. All contacts may edit and save the application, but the Grants Administrator will submit it.

The review process may take six months or more from date of Trust acknowledgment before action on the proposal is complete.

INSTRUCTIONS FOR COMPLETING THE SCIENTIFIC RESEARCH APPLICATION

All information must be filled out online and on the SR Proposal Narrative (Departmental Informational - Section A) form **within the spaces provided**. Up to 18 additional pages may be added using the format specified below (Sections B-H). Use a font no smaller than 10 pt. in filling out the Form.

Complete the Project Title, Timetables, and Budget Summary in the spaces provided online.

Project Title: Provide a concise, one-phrase title that encapsulates the central theme of the project for which the requested funds will be used (such as Research Laboratory Equipment for Structural and Functional Analyses of Complex Biological Systems).

Project Timetables: (self-explanatory)

Budget Summary: *“Total Project Cost”* means the cost of the overall project (example: a new scanning electron microscope with energy dispersive x-ray spectrometer), not just that portion of the project for which support from the Trust is being requested (example: the energy dispersive x-ray spectrometer). The *“Outside Funding in Hand”* is the amount already received or awarded from outside agencies for this project. The *“Funding Committed from Institution”* is the actual firm commitment of the institution to the direct costs of this project. The *“Balance from Other Sources”* should be listed here and detailed in *Section E*. **(Except for the major research universities, following amended guidelines of February 8, 2022, given below; all other applications do not include indirect costs either in the “Revised Amount Requested (from Murdock Trust)” or in the “Revised Total Cost.”)**

The amounts you put in these spaces will auto-calculate the total project cost. If the overall project is part of a larger program (example: a central instrument laboratory), describe the larger effort separately on an attachment to this Scientific Research Application Form.

Continue by downloading and completing the SR Proposal Narrative (Departmental Information - Section A) form.

- A.** The information requested here is for your Department. If more than one department is involved with this project, reproduce this page and fill it in for each department separately. If there is not a departmental structure at your institution, state the appropriate organizational designation for which you are reporting the data. The following instructions will use the term “department.”

Personnel: List both the FTE faculty as well as the total number. If you have senior researchers who are not formally faculty, list them under “Other” and specify their titles. List the number of research assistants and under “Other” the number (in parentheses) of other support staff, such as secretarial or technical repair people. List the number of postdoctoral fellows in your department and the total number of graduate students majoring in your department. Indicate the average number graduated from your department during the past five years with Master’s and Doctor’s degrees. List or estimate the total number of undergraduate students who are pursuing a major in your department and the average number who received baccalaureate degrees during the past five years.

Financial Support: List your annual departmental budget for instruction, not including salaries for those who teach. If your department has a budget for graduate students who are teaching assistants, list this and so specify under “Other.” Fill in the information showing the external support awarded during the past five years. If several grants were received in a given year, give the combined amount

awarded and in the same box the number of grants (in parentheses). Use appropriate abbreviations for sources, such as NSF, NIH, etc. Also, list the institutional support to your department for direct costs for research during the past five years.

If your institution allocates a percentage of indirect costs for research in your department, list this and explain in "source" box.

Publications: Fill in the information requested for the past three years. Articles should only be counted if they were published on research in reviewed professional journals. Do not include abstracts, talks at meetings, chapters of or whole monographs or editing responsibilities.

Comments: If the above requested information does not fit your situation, please clarify and describe in this section.

CONTINUING FORMAT FOR COMPLETING SCIENTIFIC RESEARCH APPLICATION

The remainder of your research proposal is to be completed following the format specified below. Please address each Section in the order given. You may use up to 18 pages for this, numbering them 2, 3, etc. up to a maximum of page 19 (page 1 is the Departmental Information form – Section A). Additional information deemed critical for an understanding of the project should be provided separately as attachments. Administration of these funds will be done by the Institution and the PIs. A description of the process must be provided in the proposal narrative.

It is recognized that you may be requesting support for something other than a specific research project, such as for a central instrumentation lab that will service a variety of researchers in conducting a wide range of projects. If this is the case, the "project" should be viewed as the central instrumentation lab rather than the specific research projects that it may service. Develop the proposal in this light and attach representative specific research projects written up in the format of Section G below. The following will use the term "project," whether it applies to a specific research endeavor or to an effort that will facilitate work on several research projects.

B. Itemized Project Budget: List the costs for the total project by category. If applicable, asterisk (*) those items for which funds are already in hand and mark (x) those items for which Murdock support is requested. If undesignated Murdock support is being requested, provide a rationale for the level of support requested on page 1. Note that Murdock support will not be provided toward indirect project costs. Also, at public universities, Murdock monies may not be requested for construction renovation costs.

Provide the budget in column form, one column for each year of support requested. Break the budget down by category, such as personnel (specify positions and titles), equipment (list major items), supplies, travel, other, or whatever categories apply best to your project.

If support for major equipment (items costing over \$50,000) is being requested, provide a model and description of each item and a reason why that particular brand has been chosen. Justify the need for major equipment if the same or similar equipment is available on campus or on a nearby campus. Indicate how many similar units are present on campus or on a nearby campus, and in which departments. How many researchers and students will be using the equipment?

Institutions are expected to provide a cost-share of at least 50 percent of the total equipment cost for all proposals. There will be no differentiation between internal or external sources of cost-share support.

Starting February 27, 2014, and amended February 2022, major research universities may request up to \$50,000 or up to 12 percent of the eligible requested amount, whichever is lower, as monies to seed

new research projects and bring in new users. (This item does not apply to biomedical research and other institutions.) These monies do not require cost share. These funds are intended for use to purchase supplies, pay for a research assistant, purchase of small equipment. Travel costs are not permitted but some indirect costs for major research universities are permissible, as noted below.

Also amended in February 2022, major research universities may request up to \$50,000 or up to 12 percent of the eligible requested amount, whichever is lower, for indirect costs and/or supplemental support. Supplemental support is broadly defined as funding to give the PI an opportunity to make the project stronger through purchasing minor pieces of equipment, parts, add-ons, or reagents, and supplies. These monies also do not require cost share. (This does not apply to biomedical research or other institutions.)

- C. Project Funding Strategy and Goals:** List support for this project, both requested and received, along with sources and amounts, including the Murdock Trust. If the plan is for multiple-year support, provide the information in column form as for Section D.
- D. Institutional and Departmental Priorities in Research:** Describe the appropriate research priorities of your institution and participant departments for the next decade and how the proposed research project relates to these. Compare this project with any others that are related or similar at institutions in the Pacific Northwest.
- E. Full Project Description:** Describe your project in detail, using language of sufficient precision so that it can be evaluated by individuals with expertise in this field. If more than one research avenue will be pursued with this support, each should be described in sufficient detail for evaluation. Develop this section as follows:
- 1. Background:** Provide both an institutional and a research context out of which this project arises. What events, circumstances, conditions, etc. have served as the springboard for this project? What are the present strengths of your department that make it suitable to carry out this project? What areas need improvement or strengthening to better equip it for the task? How does this project build on your experience, strengths, and priorities? If pertinent preliminary results have been obtained, describe them here.
 - 2. Procedure:** Outline the experimental approach that will be employed. Depending upon the nature of your project, this may be the heart of your proposal. Be sure to develop this with sufficient detail and precision so that it can be evaluated by experts in the field. Be clear about the objectives and the expected measurable outcomes.
 - 3. Scientific Significance:** Discuss the scientific significance of your proposed line(s) of research. By significance, we mean the importance of this research for the scientific world, for researchers beyond the confines of your institution as well as for your own research group.
 - 4. Assessment and Outcomes**

Short descriptions from minor users of the proposed equipment can be included into an appendix.

- F. Project Staff:** Identify key researchers who are available and qualified or will be recruited to conduct this research. If researchers are to be recruited, describe how they will be recruited, what qualifications they must have, and give a timetable for their recruitment and appointment. Separately attach a biographical sketch (NIH or NSF format) for each available researcher to be involved in the project that contains a list of published research papers for the past three years only. For each investigator, list all current research grants by title, dollar amount, funding agency, and dates.

- G. Future of the Project:** Describe how you anticipate this research area will develop in the future and how this project and future projects will participate in that development. How will this project be financially sustained beyond the period of Trust support?
- H. Relevant Research Papers:** List titles and authors of no more than three published research papers authored by the principal investigators that are relevant to this proposal. Submit copies of these papers (as a single PDF file) with the application.

UPLOAD THE FOLLOWING DOCUMENTS, UNDER PROJECT DOCUMENTS SECTION

A complete application must consist of all five files listed below in this section.

If possible, please keep the data size of the submission to fewer than 25 MB. If that is not possible, please provide a link to the documents through Dropbox, Google Drive, or another publicly accessible database.

Proposal Narrative— PDF format generated from a word processor is preferred over a scanned document

This is the main body of the proposal that is suitable for sending out to experts who can provide insightful comments and advice to the Trust on the merits of the submission. It should include the follow items in this order:

1. A complete application that includes the one-page Departmental Information plus up to 18 additional pages may be added using the format specific for Sections B–H, except copies of the papers listed in Section H should be compiled and submitted separately in a single PDF file (upload to Relevant Research Papers).
2. References and notes.
3. Appendices. These could include short descriptions of additional projects by minor users that could not be incorporated in Section G due to space constraints. It could also include supporting letter(s) from collaborator(s) but not institutional support letters.
4. Biographical sketches (NIH or NSF style) for each researcher.
5. Price quotation(s) for the proposed equipment or other services.
6. 8½" x 11" drawing(s) of the laboratory in which the proposed equipment will be located and/or 8½" x 11" drawing(s) of proposed plans for facility construction or renovation for which you seek Trust support.

Letter of endorsement from CEO– PDF format

1. Cover letter from the Chief Executive Officer.
 - A. Endorsing the proposal and explaining how it furthers the institution's mission and priorities;
 - B. Confirming that scheduled progress or final reports from all past Trust-supported projects are current.

Letter of endorsement from Vice President for Research– PDF format

Suggested Reviewers List– Microsoft Excel format

1. The "Suggested Reviewers List" (Excel file) is available for you to download, complete, and upload

in order to provide information on eight experts qualified to review this proposal. (Please include all information requested in the Excel file.) At least six of these should not be personally known to the principal investigator(s). In each case, indicate the extent to which these people are known to the principal investigator(s).

Relevant Research Papers

1. A single PDF file of the papers listed in Section H.

UPLOAD THE FOLLOWING DOCUMENTS, UNDER ORGANIZATION DOCUMENTS SECTION

Board of Directors or Trustees List

1. Include names, addresses, and professional affiliations of your Board of Directors or Trustees.

Entity Document

1. All entities must submit at least one form of documentation:

Nonprofits: IRS determination letter (if the name on your IRS determination letter is different than your current operating name listed above, also include government documentation of your assumed business name or doing business as; if you are operating under a parent organization's EIN, also include your certificate of membership/evidence of current affiliation)

Government Entities: government entity letter

Tribal Entities: tribal entity letter