

Improvements in Facilities, Communications, and Equipment at Biological Field Stations and Marine Laboratories (FSML)

Program Solicitation

NSF 04-543

Replaces Document NSF 02-040



National Science Foundation

Directorate for Biological Sciences

Division of Biological Infrastructure

Directorate for Geosciences

Division of Ocean Sciences

Full Proposal Target Date(s):

April 13, 2004

is a target date for full proposal submission in FY 2004

First Friday in March

is the target date for full proposal submission in FY 2005 and thereafter

SUMMARY OF PROGRAM REQUIREMENTS

General Information

Program Title:

Improvements in Facilities, Communications, and Equipment at Biological Field Stations and Marine Laboratories (FSML)

Synopsis of Program:

Biological Field Stations and Marine Laboratories (FSMLs) are off-campus facilities for research and education conducted in the natural habitats of terrestrial, freshwater, and marine ecosystems. FSMLs support biological research and education by preserving access to study areas and organisms, by providing facilities and equipment in close proximity to those study areas, and by fostering an atmosphere of mutual scientific interest and collaboration in research and education. To fulfill these roles, FSMLs must offer modern laboratories and educational spaces, up-to-date equipment, appropriate personal accommodations for visiting scientists and students, and modern communications and data management systems for a broad array of users. In recognition of the importance of FSMLs in modern biology, NSF invites proposals that address these general goals of FSML improvement.

Cognizant Program Officer(s):

- Gerald B. Selzer, Directorate for Biological Sciences, Division of Biological Infrastructure, 615 N, telephone: (703)

292-8470, fax: (703) 292-9063, email: gselzer@nsf.gov

- Muriel E. Poston, Directorate for Biological Sciences, Division of Biological Infrastructure, 615 N, telephone: (703) 292-8470, fax: (703) 292-9063, email: mposton@nsf.gov
- Kandace S. Binkley, Directorate for Geosciences, Division of Ocean Sciences, 725 N, telephone: (703) 292-8583, fax: (703) 292-9085, email: kbinkley@nsf.gov

Applicable Catalog of Federal Domestic Assistance (CFDA) Number(s):

- 47.074 --- Biological Sciences
- 47.050 --- Geosciences

Eligibility Information

- **Organization Limit:** Proposals are accepted from U.S. colleges and universities, free-standing research and education institutions, and U.S. chartered corporations with formally constituted research and education programs at off campus field stations or marine laboratories. To qualify for support through the FSML program, the research and education activities at the proposing facility must focus primarily on study of biological phenomena and organisms in natural habitats, or on study of organisms whose availability for research depends upon the existence of the facility. A significant fraction of the research and education projects that use the proposing facility as a platform for their execution should be in science and engineering fields supported by the National Science Foundation. Facilities whose primary focus is on precollege or informal education, or on agriculture, aquaculture, or mariculture are not usually considered to be field stations or marine laboratories.
- **PI Eligibility Limit:** None Specified.
- **Limit on Number of Proposals:** Only one proposal may be submitted on behalf of any single facility per round of the FSML competition. This limitation does not prevent a single institution from submitting more than one proposal, as long as each proposal is submitted on behalf of a different eligible facility.

Award Information

- **Anticipated Type of Award:** Standard Grant
- **Estimated Number of Awards:** 15 to 20 - Approximately 15 - 20 new awards annually, including 3 - 5 awards for planning, with the exact number dependent on the quality of the proposals received and the amounts requested.
- **Anticipated Funding Amount:** \$2,300,000 Approximately \$2.3 million annually, subject to the availability of funds.

Proposal Preparation and Submission Instructions

A. Proposal Preparation Instructions

- **Full Proposal Preparation Instructions:** This solicitation contains information that supplements the standard Grant Proposal Guide (GPG) proposal preparation guidelines. Please see the full text of this solicitation for further information.

B. Budgetary Information

- **Cost Sharing Requirements:** Cost Sharing is Specialized. Please see the full text of this solicitation for further information.
- **Indirect Cost (F&A) Limitations:** Not Applicable.
- **Other Budgetary Limitations:** Other budgetary limitations apply. Please see the full text of this solicitation for further information.

C. Due Dates

- **Full Proposal Target Date(s):**

April 13, 2004

is a target date for full proposal submission in FY 2004

First Friday in March

is the target date for full proposal submission in FY 2005 and thereafter

Proposal Review Information

- **Merit Review Criteria:** National Science Board approved criteria. Additional merit review considerations apply. Please see the full text of this solicitation for further information.

Award Administration Information

- **Award Conditions:** Standard NSF award conditions apply.
- **Reporting Requirements:** Standard NSF reporting requirements apply.

TABLE OF CONTENTS

Summary of Program Requirements

I. Introduction

II. Program Description

III. Eligibility Information

IV. Award Information

V. Proposal Preparation and Submission Instructions

- A. Proposal Preparation Instructions
- B. Budgetary Information
- C. Due Dates
- D. FastLane Requirements

VI. Proposal Review Information

- A. NSF Proposal Review Process
- B. Review Protocol and Associated Customer Service Standard

VII. Award Administration Information

- A. Notification of the Award
- B. Award Conditions
- C. Reporting Requirements

VIII. Contacts for Additional Information

IX. Other Programs of Interest

I. INTRODUCTION

Biological Field Stations and Marine Laboratories (FSMLs) are off-campus facilities for research and education conducted in the natural habitats of terrestrial, freshwater, and marine ecosystems. FSMLs support biological research and education by preserving access to study areas and organisms, by providing facilities and equipment in close proximity to those study areas, and by fostering an atmosphere of mutual scientific interest and collaboration in research and education. For FSMLs to fulfill their role in biological research and education, they must offer modern laboratories and educational spaces, up-to-date equipment, appropriate personal accommodations for visiting scientists and students, and modern communications and data management systems for a broad array of users.

II. PROGRAM DESCRIPTION

In recognition of the continuing need for modernization of facilities and equipment at FSMLs, the NSF invites proposals that address the general goal of FSML improvement. Proposals should focus on well-defined projects of physical plant improvement, major equipment acquisition, data management and communication systems modernization, or institutional planning for such needs. In addition to a clear description of the proposed improvement or planning project, proposals are expected to present a compelling justification based on demonstrated need for the project, and a realistic appraisal of its potential impact on biological research and education activities at the applicant facility.

Proposals may include one or more of the following elements, except that requests for support of planning efforts may not be combined with requests for other types of improvements:

- Improvements in the physical plant of a field station or marine laboratory. Funds may be requested for renovation of existing structures or for construction of new structures to be used for research, for associated training and education responsibilities, or for personal accommodations intended for visiting scientists and students. Requests for improvement of facilities or equipment used for research or educational activities to be carried out on board a UNOLS (University-National Oceanographic Laboratory System) research ship or similar vessel are inappropriate.
- Equipment purchase. Such requests should focus on major, multi-user or general use items (including special purpose vehicles and boats) that are essential to the facility's research agenda and associated training and education programs. Requests for extensive sets of small items are discouraged.
- Improvements in data management and communication systems. Such requests should be directed at deployment of appropriate, up-to-date technology and should be directed toward broad community use of such systems for research and education collaboration on the Internet. Requests for ongoing costs of operations, including staffing and fees for telecommunications services, are inappropriate.
- Institutional planning. Such requests should address the need for comprehensive planning at the level of the whole station or laboratory in support of its research and training mission. The effort should produce plans useful throughout at least a five-year time frame. Planning proposals may address, but are not limited to, facility needs appraisal and design activities, and research/training program development. Proposed activities will normally be cast in the format of workshops, conferences, and visits designed to involve broad participation of the scientific community outside the applicant institution. Requests for support of planning efforts should not be combined with requests for support of equipment acquisition or other improvements. Award of a planning grant does not imply an NSF commitment beyond the planning period.

Conceptual Issues

Although the primary purpose of the FSML program is to aid in the improvement of physical facilities and equipment at biological field research facilities, the complete agenda for the program is broader in concept. The program expects that the projects it supports will assist the users of FSMLs to achieve new and higher levels of collaboration on both scientific and educational fronts. The program's emphasis on modernization of data management and communication systems is expected to foster opportunities for expanded spatial and temporal scales of research, and to facilitate substantive comparisons among

biological entities in different biomes. It is likely that new collaborations among scientists, across disciplines and in different locations will grow from this emphasis, and that increased access to data sets will provide the impetus for new directions of scientific inquiry.

III. ELIGIBILITY INFORMATION

Proposals are accepted from U.S. colleges and universities, free-standing research and education institutions, and U.S. chartered corporations with formally constituted research and education programs at field stations or marine laboratories. To qualify for support through the FSML program, the research and education activities at the proposing facility must focus primarily on study of biological phenomena and organisms in natural habitats, or on study of organisms whose availability for research depends upon the existence of the facility. A significant fraction of the research and education projects that use the proposing facility as a platform for their execution should be eligible for support by the National Science Foundation. Facilities whose primary focus is on precollege or informal education, or on agriculture, aquaculture, or mariculture are not usually considered to be field stations or marine laboratories. An individual may be PI or coPI on more than one proposal; however, only one proposal may be submitted on behalf of an eligible facility per round of the FSML competition. This limitation does not prevent a single institution from submitting more than one proposal, as long as each is submitted on behalf of a different eligible facility.

IV. AWARD INFORMATION

Estimated program budget, number of awards and average award size are subject to the availability of funds.

Proposals may request up to \$500,000, except that requests for planning grants are limited to \$25,000. The program expects to make, on an annual basis, approximately 15 - 20 new standard awards totaling \$2.3 million, of which 3 - 5 will be awards for planning efforts. The exact number will depend on the quality of the proposals received and the amounts requested. The anticipated start date for awards is seven months from the annual target date for receipt of proposals.

V. PROPOSAL PREPARATION AND SUBMISSION INSTRUCTIONS

A. Proposal Preparation Instructions

Full Proposal Instructions:

Proposals submitted in response to this program announcement/solicitation should be prepared and submitted in accordance with the general guidelines contained in the NSF *Grant Proposal Guide* (GPG). The complete text of the GPG is available electronically on the NSF Website at: <http://www.nsf.gov/cgi-bin/getpub?gpg>. Paper copies of the GPG may be obtained from the NSF Publications Clearinghouse, telephone (703) 292-7827 or by e-mail from pubs@nsf.gov.

In developing the proposal, please keep in mind the review criteria that will be used to evaluate the proposal. As discussed below (Section VI.), these include the two National Science Board approved review criteria (Intellectual Merit and Broader Impacts) as well as the Additional Review Criteria specific to FSML proposals.

The following instructions supplement the GPG guidelines. The proposal must include the following elements:

1. Project Summary: This section must include separate statements describing the Intellectual Merit and Broader

Impacts of the project.

2. Project Description: This section must provide the information outlined in items a. through j. in the order described. The section is limited to 15 pages, including any tables, lists or graphical material.
 - a. Basic description of the existing station or laboratory, including its capabilities for supporting scientific research and training. Such information may include site history, facility administration, research areas, buildings, equipment, access and transportation, automated data acquisition systems, data management and communications equipment, staffing, and other items of interest such as unique aspects of the ecosystems and organisms that can be accessed through the station or laboratory.
 - b. Proposed improvements or planning efforts with justification based upon current or projected research and training needs. The description should include sufficient detail to enable reviewers to judge their likely adequacy in meeting these needs, as well as a brief discussion of the manner in which the needs were identified. Special care should be taken to describe how the improvements will benefit visiting scientists and students. Requests for equipment purchase should describe provisions for equipment maintenance.
 - c. Research and training use of the facility during the most recent five-year period, including scientist and student use days on an annual basis, research projects supported, any courses (both academic and public) conducted, any special activities hosted (e.g. workshops, conferences), number of day visitors etc.
 - d. Summary of the most significant research and training accomplishments attributable to the facility during the most recent five-year period.
 - e. Broader Impacts of the proposed project. Some examples of Broader Impacts can be found on the NSF web site at: <http://www.nsf.gov/pubs/2003/nsf032/bicexamples.pdf> .
 - f. Brief description of the "Results from Prior NSF Support." This should report only the results of FSML awards to the applicant facility during the previous five-year period (irrespective of the identity of the PIs).
 - g. Selected bibliography (maximum of 10 complete references) of the most significant research publications attributable to research conducted at the facility during the most recent five-year period. Other relevant publications may be summarized in tabular format as counts of particular types of publications. Any specific references needed to support details of the proposed efforts should be provided in the proposal section

entitled "References Cited."

- h. Summary of station or laboratory policies with respect to data collection and management, including provisions governing archiving and sharing of data. Mechanisms for providing access to data, including use of databases and standard communications protocols where appropriate, should be mentioned.
 - i. Fee Schedule. List fees for use of the facility. Please indicate if no fees are charged. Expected impact on the fee structure due to the proposed improvements should be detailed.
 - j. Other items of importance not specifically indicated above.
3. References Cited: Any references used to justify or otherwise support the details of the proposed project should be provided in this section.
4. Facilities, Equipment and Other Resources: This section should be left blank as this information is included in the required content of the project description section.
5. Budget and Budget Justification: The budget should clearly identify funds requested of NSF in each category of the NSF budget form. The amount of funds requested from NSF may not exceed \$500,000, irrespective of the overall cost of the project, except that requests for support of planning efforts are limited to \$25,000. The total amount requested from NSF should appear on line L. Except in unusual circumstances, the program expects to make standard awards with durations of up to 36 months. Thus all funds should be requested in the budget for year one, with zero funds requested in budgets for subsequent years. The cumulative budget is completed automatically by FastLane. Proposers who intend to request an award duration greater than 36 months should first contact the FSML program director for guidance.

The program does not normally provide direct support for salaries of senior staff or for administrative support. No funds for a construction contingency may be included as costs of the proposed project. The amount of cost-sharing (see Section V.B. below for information on cost-sharing) should be clearly specified on line M of the budget form. The budget justification page should be used to present the overall cost of the project, including both those costs to be paid with NSF funds, and those to be paid for with funds from other sources.

In the event that the sum of requested NSF funds (specified on line L) and cost-sharing funds (specified on Line M) is less than the overall cost of the proposed project, the source(s) of the additional funds must be specified in the budget justification, and appropriate documentation provided in the "Special Information and Supplementary Documentation" section. Multiple items of equipment, if requested, should be listed on the justification page with individual costs identified. Allocation of funds to be provided through subcontracts or consulting arrangements should be described. A separate budget form is required for each subcontract.

6. Special Information and Supplementary Documentation: This section is limited to the following types of documentation, as appropriate. The documents should be provided by scanning and inserting as a PDF. Other types of information, including copies of brochures or other information about the applicant facility, may not be included.
 - a. "Certification of Flood Protection" as required under the Flood Disaster and Protection Act of 1973. Proposals requesting funds for new construction or physical plant renovation must certify that the facility is not in a special flood hazard area identified by HUD or, if the facility is in such an area, certify that adequate flood insurance under this act has been obtained (see NSF Grant Policy Manual, section 723).
 - b. Copies of site plans, building floorplans, vendor/builder quotes, price quotes for equipment items costing over \$5000, and architectural/engineering statements, as relevant.
 - c. Letters of collaboration or resource commitment, including any additional funds other than required cost-sharing, as appropriate. Other than these, no letters of support may be provided.

Proposers are reminded to identify the program announcement/solicitation number (04-543) in the program announcement/solicitation block on the proposal Cover Sheet. Compliance with this requirement is critical to determining the relevant proposal processing guidelines. Failure to submit this information may delay processing.

B. Budgetary Information

Cost Sharing:

Cost Sharing: Except as noted below, NSF requires a substantial institutional contribution to the project for which funds are sought. Beginning this year, the level of required cost sharing corresponds to 30% of the amount requested from NSF on line L of the budget form. The amount of costsharing should be shown on line M, and may not exceed the required percentage. The amount of required cost sharing may be provided by using funds from any allowable non-Federal source.

In the event that FSML support is sought for a project whose cost will exceed the sum of the funds requested of NSF (line L) and the required institutional cost share (line M), the additional funds may be provided from any source. Appropriate documentation of the availability of these additional funds should be provided as supplementary documentation. This information is needed for purposes of review. In the event of an award, these additional funds are not auditable.

No cost sharing is required for awards of up to \$125,000 for facilities that have not received FSML funds in the last 5 years, or for awards that support planning activities.

The proposed cost sharing must be shown on Line M on the proposal budget. Documentation of the availability of cost sharing must be included in the proposal. Only items which would be allowable under the applicable cost principles, if charged to the project, may be included as the awardee's contribution to cost sharing. Contributions may be made from any non-Federal source, including non-Federal grants or contracts, and may be cash or in-kind (see OMB Circular A-110, Section 23). It should be noted that contributions counted as cost-sharing toward projects of another Federal agency may not be counted towards meeting the specific cost-sharing requirements of the NSF award. All cost-sharing amounts are subject to audit. Failure to provide the level of cost-sharing reflected in the approved award budget may result in termination of the NSF

award, disallowance of award costs and/or refund of award funds to NSF.

Other Budgetary Limitations:

Requests are limited to \$500,000, except that awards for support of planning efforts are limited to \$25,000. See instructions for proposal preparation.

Budget Preparation Instructions:

Requests for more than \$250,000 should be discussed in advance with cognizant program staff.

C. Due Dates

Proposals must be submitted by the following date(s):

Full Proposal Target Date(s):

April 13, 2004
is a target date for full proposal submission in FY 2004

First Friday in March
is the target date for full proposal submission in FY 2005 and thereafter

D. FastLane Requirements

Proposers are required to prepare and submit all proposals for this announcement/solicitation through the FastLane system. Detailed instructions for proposal preparation and submission via FastLane are available at: <http://www.fastlane.nsf.gov/a1/newstan.htm>. For FastLane user support, call the FastLane Help Desk at 1-800-673-6188 or e-mail fastlane@nsf.gov. The FastLane Help Desk answers general technical questions related to the use of the FastLane system. Specific questions related to this program announcement/solicitation should be referred to the NSF program staff contact(s) listed in Section VIII of this announcement/solicitation.

Submission of Electronically Signed Cover Sheets. The Authorized Organizational Representative (AOR) must electronically sign the proposal Cover Sheet to submit the required proposal certifications (see Chapter II, Section C of the [Grant Proposal Guide](#) for a listing of the certifications). The AOR must provide the required electronic certifications within five working days following the electronic submission of the proposal. Proposers are no longer required to provide a paper copy of the signed Proposal Cover Sheet to NSF. Further instructions regarding this process are available on the FastLane Website at: <http://www.fastlane.nsf.gov>

VI. PROPOSAL REVIEW INFORMATION

A. NSF Proposal Review Process

Reviews of proposals submitted to NSF are solicited from peers with expertise in the substantive area of the proposed research or education project. These reviewers are selected by Program Officers charged with the oversight of the review

process. NSF invites the proposer to suggest, at the time of submission, the names of appropriate or inappropriate reviewers. Care is taken to ensure that reviewers have no conflicts with the proposer. Special efforts are made to recruit reviewers from non-academic institutions, minority-serving institutions, or adjacent disciplines to that principally addressed in the proposal.

The National Science Board approved revised criteria for evaluating proposals at its meeting on March 28, 1997 ([NSB 97-72](#)). All NSF proposals are evaluated through use of the two merit review criteria. In some instances, however, NSF will employ additional criteria as required to highlight the specific objectives of certain programs and activities.

On July 8, 2002, the NSF Director issued [Important Notice 127](#), Implementation of new Grant Proposal Guide Requirements Related to the Broader Impacts Criterion. This Important Notice reinforces the importance of addressing both criteria in the preparation and review of all proposals submitted to NSF. NSF continues to strengthen its internal processes to ensure that both of the merit review criteria are addressed when making funding decisions.

In an effort to increase compliance with these requirements, the January 2002 issuance of the GPG incorporated revised proposal preparation guidelines relating to the development of the Project Summary and Project Description. Chapter II of the GPG specifies that Principal Investigators (PIs) must address both merit review criteria in separate statements within the one-page Project Summary. This chapter also reiterates that broader impacts resulting from the proposed project must be addressed in the Project Description and described as an integral part of the narrative.

Effective October 1, 2002, NSF will return without review proposals that do not separately address both merit review criteria within the Project Summary. It is believed that these changes to NSF proposal preparation and processing guidelines will more clearly articulate the importance of broader impacts to NSF-funded projects.

The two National Science Board approved merit review criteria are listed below (see the [Grant Proposal Guide](#) Chapter III.A for further information). The criteria include considerations that help define them. These considerations are suggestions and not all will apply to any given proposal. While proposers must address both merit review criteria, reviewers will be asked to address only those considerations that are relevant to the proposal being considered and for which he/she is qualified to make judgments.

What is the intellectual merit of the proposed activity?

How important is the proposed activity to advancing knowledge and understanding within its own field or across different fields? How well qualified is the proposer (individual or team) to conduct the project? (If appropriate, the reviewer will comment on the quality of the prior work.) To what extent does the proposed activity suggest and explore creative and original concepts? How well conceived and organized is the proposed activity? Is there sufficient access to resources?

What are the broader impacts of the proposed activity?

How well does the activity advance discovery and understanding while promoting teaching, training, and learning? How well does the proposed activity broaden the participation of underrepresented groups (e.g., gender, ethnicity, disability, geographic, etc.)? To what extent will it enhance the infrastructure for research and education, such as facilities, instrumentation, networks, and partnerships? Will the results be disseminated broadly to enhance scientific and technological understanding? What may be the benefits of the proposed activity to society?

NSF staff will give careful consideration to the following in making funding decisions:

Integration of Research and Education

One of the principal strategies in support of NSF's goals is to foster integration of research and education through the programs, projects, and activities it supports at academic and research institutions. These institutions provide abundant opportunities where individuals may concurrently assume responsibilities as researchers, educators, and students and where all can engage in joint efforts that infuse education with the excitement of discovery and enrich research through the diversity of learning perspectives.

Integrating Diversity into NSF Programs, Projects, and Activities

Broadening opportunities and enabling the participation of all citizens -- women and men, underrepresented minorities, and persons with disabilities -- is essential to the health and vitality of science and engineering. NSF is committed to this principle of diversity and deems it central to the programs, projects, and activities it considers and supports.

Additional Review Criteria:

Consistent with the general NSF review criteria elaborated above, the evaluation of FSML proposals will center upon the following aspects of the proposed project:

1. Intrinsic merit of the proposed improvements or planning efforts in enhancing research and training activities at the proposing facility, including the quality and amount of data that can be collected and archived;
2. Thoroughness and appropriateness of the planning or needs assessment effort that led to the specific request;
3. Need for, and adequacy of the justification for, the proposed improvements in terms of the research and training missions of the proposing facility;
4. Significance and uniqueness of the facility's current and potential impact on the progress of biological research and education at local, regional and national levels;
5. Likely impact of the project on the improvement of biological research and training at the facility;
6. Likely impact of the proposed activity on the ability of the facility to accommodate visiting scientists and students;
7. Research and training productivity of the facility during the most recent five-year period;
8. Scope, utility and accessibility of data collected at the site, including the existence of well-defined data management and data sharing policies, and the utilization of standard communications protocols.

B. Review Protocol and Associated Customer Service Standard

All proposals are carefully reviewed by at least three other persons outside NSF who are experts in the particular field represented by the proposal. Proposals submitted in response to this announcement/solicitation will be reviewed by Ad Hoc Review followed by Panel Review.

Reviewers will be asked to formulate a recommendation to either support or decline each proposal. The Program Officer assigned to manage the proposal's review will consider the advice of reviewers and will formulate a recommendation.

A summary rating and accompanying narrative will be completed and submitted by each reviewer. In all cases, reviews are treated as confidential documents. Verbatim copies of reviews, excluding the names of the reviewers, are sent to the Principal Investigator/Project Director by the Program Director. In addition, the proposer will receive an explanation of the decision to award or decline funding.

NSF is striving to be able to tell applicants whether their proposals have been declined or recommended for funding within six months. The time interval begins on the date of receipt. The interval ends when the Division Director accepts the Program Officer's recommendation.

In all cases, after programmatic approval has been obtained, the proposals recommended for funding will be forwarded to the Division of Grants and Agreements for review of business, financial, and policy implications and the processing and issuance of a grant or other agreement. Proposers are cautioned that only a Grants and Agreements Officer may make commitments,

obligations or awards on behalf of NSF or authorize the expenditure of funds. No commitment on the part of NSF should be inferred from technical or budgetary discussions with a NSF Program Officer. A Principal Investigator or organization that makes financial or personnel commitments in the absence of a grant or cooperative agreement signed by the NSF Grants and Agreements Officer does so at their own risk.

VII. AWARD ADMINISTRATION INFORMATION

A. Notification of the Award

Notification of the award is made to *the submitting organization* by a Grants Officer in the Division of Grants and Agreements. Organizations whose proposals are declined will be advised as promptly as possible by the cognizant NSF Program Division administering the program. Verbatim copies of reviews, not including the identity of the reviewer, will be provided automatically to the Principal Investigator. (See section VI.A. for additional information on the review process.)

B. Award Conditions

An NSF award consists of: (1) the award letter, which includes any special provisions applicable to the award and any numbered amendments thereto; (2) the budget, which indicates the amounts, by categories of expense, on which NSF has based its support (or otherwise communicates any specific approvals or disapprovals of proposed expenditures); (3) the proposal referenced in the award letter; (4) the applicable award conditions, such as Grant General Conditions (NSF-GC-1); * or Federal Demonstration Partnership (FDP) Terms and Conditions * and (5) any announcement or other NSF issuance that may be incorporated by reference in the award letter. Cooperative agreement awards also are administered in accordance with NSF Cooperative Agreement Terms and Conditions (CA-1). Electronic mail notification is the preferred way to transmit NSF awards to organizations that have electronic mail capabilities and have requested such notification from the Division of Grants and Agreements.

*These documents may be accessed electronically on NSF's Website at http://www.nsf.gov/home/grants/grants_gac.htm. Paper copies may be obtained from the NSF Publications Clearinghouse, telephone (703) 292-7827 or by e-mail from pubs@nsf.gov.

More comprehensive information on NSF Award Conditions is contained in the NSF *Grant Policy Manual* (GPM) Chapter II, available electronically on the NSF Website at <http://www.nsf.gov/cgi-bin/getpub?gpm>. The GPM is also for sale through the Superintendent of Documents, Government Printing Office (GPO), Washington, DC 20402. The telephone number at GPO for subscription information is (202) 512-1800. The GPM may be ordered through the GPO Website at <http://www.gpo.gov>.

C. Reporting Requirements

For all multi-year grants (including both standard and continuing grants), the PI must submit an annual project report to the cognizant Program Officer at least 90 days before the end of the current budget period.

Within 90 days after the expiration of an award, the PI also is required to submit a final project report. Failure to provide final technical reports delays NSF review and processing of pending proposals for the PI and all Co-PIs. PIs should examine the formats of the required reports in advance to assure availability of required data.

PIs are required to use NSF's electronic project reporting system, available through FastLane, for preparation and submission of annual and final project reports. This system permits electronic submission and updating of project reports, including information on project participants (individual and organizational), activities and findings, publications, and other specific products and contributions. PIs will not be required to re-enter information previously provided, either with a proposal or in earlier updates using the electronic system.

VIII. CONTACTS FOR ADDITIONAL INFORMATION

General inquiries regarding this program should be made to:

- Gerald B. Selzer, Directorate for Biological Sciences, Division of Biological Infrastructure, 615 N, telephone: (703) 292-8470, fax: (703) 292-9063, email: gselzer@nsf.gov
- Muriel E. Poston, Directorate for Biological Sciences, Division of Biological Infrastructure, 615 N, telephone: (703) 292-8470, fax: (703) 292-9063, email: mposton@nsf.gov
- Kandace S. Binkley, Directorate for Geosciences, Division of Ocean Sciences, 725 N, telephone: (703) 292-8583, fax: (703) 292-9085, email: kbinkley@nsf.gov

For questions related to the use of FastLane, contact:

- email: biofl@nsf.gov

IX. OTHER PROGRAMS OF INTEREST

The NSF *Guide to Programs* is a compilation of funding for research and education in science, mathematics, and engineering. The NSF *Guide to Programs* is available electronically at <http://www.nsf.gov/cgi-bin/getpub?gp>. General descriptions of NSF programs, research areas, and eligibility information for proposal submission are provided in each chapter.

Many NSF programs offer announcements or solicitations concerning specific proposal requirements. To obtain additional information about these requirements, contact the appropriate NSF program offices. Any changes in NSF's fiscal year programs occurring after press time for the *Guide to Programs* will be announced in the NSF *E-Bulletin*, which is updated daily on the NSF Website at <http://www.nsf.gov/home/ebulletin>, and in individual program announcements/solicitations. Subscribers can also sign up for NSF's *Custom News Service* (<http://www.nsf.gov/home/cns/start.htm>) to be notified of new funding opportunities that become available.

A number of other NSF programs are potential sources of support for research, infrastructure improvement and educational activities at FSMLs. A list of several relevant programs is provided below, with URLs for their most recent program announcements. Because the announcements for NSF programs are revised periodically, prospective applicants should search for the most recent versions using the list of program announcements available at <http://www.nsf.gov/home/menus/publications.htm>. It is generally useful for potential applicants to discuss opportunities with the appropriate program director before preparing a proposal.

- Multi-User Equipment and Instrumentation Resources for Biological Sciences (<http://www.nsf.gov/bio/progdes/nsf98137.htm>)
- Biological Databases and Informatics (<http://www.nsf.gov/bio/progdes/nsf02058.htm>)
- Major Research Instrumentation (<http://www.nsf.gov/od/oia/programs/mri/start.htm>)
- Course, Curriculum and Laboratory Improvement (http://www.ehr.nsf.gov/ehr_pgm_detail.cfm?pgmPimsid=5741&pgmPubid=6040)

- Facilitation Awards for Scientists and Engineers with Disabilities (http://www.ehr.nsf.gov/ehr_pgm_detail.cfm?pgmPimsid=5516&pgmPubid=5761)
- Oceanographic Centers and Facilities (<http://www.nsf.gov/cgi-bin/getpub?pd985410>)
- Informal Science Education (<http://www.ehr.nsf.gov/esie/programs/ise/ise.asp>)

ABOUT THE NATIONAL SCIENCE FOUNDATION

The National Science Foundation (NSF) funds research and education in most fields of science and engineering. Awardees are wholly responsible for conducting their project activities and preparing the results for publication. Thus, the Foundation does not assume responsibility for such findings or their interpretation.

NSF welcomes proposals from all qualified scientists, engineers and educators. The Foundation strongly encourages women, minorities and persons with disabilities to compete fully in its programs. In accordance with Federal statutes, regulations and NSF policies, no person on grounds of race, color, age, sex, national origin or disability shall be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any program or activity receiving financial assistance from NSF, although some programs may have special requirements that limit eligibility.

Facilitation Awards for Scientists and Engineers with Disabilities (FASSED) provide funding for special assistance or equipment to enable persons with disabilities (investigators and other staff, including student research assistants) to work on NSF-supported projects. See the GPG Chapter II, Section D.2 for instructions regarding preparation of these types of proposals.

The National Science Foundation promotes and advances scientific progress in the United States by competitively awarding grants and cooperative agreements for research and education in the sciences, mathematics, and engineering.

To get the latest information about program deadlines, to download copies of NSF publications, and to access abstracts of awards, visit the NSF Website at <http://www.nsf.gov>

- **Location:** 4201 Wilson Blvd. Arlington, VA 22230
- **For General Information** (NSF Information Center): (703) 292-5111
- **TDD (for the hearing-impaired):** (703) 292-5090 or (800) 281-8749
- **To Order Publications or Forms:**
 - Send an e-mail to: pubs@nsf.gov
 - or telephone: (703) 292-7827
- **To Locate NSF Employees:** (703) 292-5111

PRIVACY ACT AND PUBLIC BURDEN STATEMENTS

The information requested on proposal forms and project reports is solicited under the authority of the National Science Foundation Act of 1950, as amended. The information on proposal forms will be used in connection with the selection of qualified proposals; project reports submitted by awardees will be used for program evaluation and reporting within the Executive Branch and to Congress. The information requested may be disclosed to qualified reviewers and staff assistants as part of the proposal review process; to applicant institutions/grantees to provide or obtain data regarding the proposal review process, award decisions, or the administration of awards; to government contractors, experts, volunteers and researchers and educators as necessary to complete assigned work; to other government agencies needing information as part of the review process or in order to coordinate programs; and to another Federal agency, court or party in a court or Federal administrative proceeding if the government is a party. Information about Principal Investigators may be added to the Reviewer file and used to select potential candidates to serve as peer reviewers or advisory committee members. See Systems of Records, NSF-50, "Principal Investigator/Proposal File and Associated Records," 63 Federal Register 267 (January 5, 1998), and NSF-51, "Reviewer/Proposal File and Associated Records," 63 Federal Register 268 (January 5, 1998). Submission of the information is voluntary. Failure to provide full and complete information, however, may reduce the possibility of receiving an award.

An agency may not conduct or sponsor, and a person is not required to respond to an information collection unless it displays a valid OMB control number. The OMB control number for this collection is 3145-0058. Public reporting burden for this collection of information is estimated to average 120 hours per response, including the time for reviewing instructions. Send comments regarding this burden estimate and any other aspect of this collection of information, including suggestions for reducing this burden, to: Suzanne Plimpton, Reports Clearance Officer, Division of Administrative Services, National Science Foundation, Arlington, VA 22230.

OMB control number: 3145-0058.

[nsf.gov](https://www.nsf.gov)

[| About NSF](#) | [Funding](#) | [Publications](#) | [News & Media](#) | [Search](#) | [Site Map](#) | [Help](#)



The National Science Foundation
4201 Wilson Boulevard, Arlington, Virginia 22230, USA
Tel: 703-292-5111, FIRS: 800-877-8339 | TDD: 703-292-5090 or (800) 281-8749

[Policies](#)
[Contact NSF](#)
[Customize](#)